

## Operation Unplugged: A Cyber Outage Tabletop Exercise After Exercise Report & Improvement Plan

| Exercise Information                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 |                                                                                                                                                                |                                                  |
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| <b>Event:</b> Operation Unplugged: A Cyber Outage Tabletop Exercise                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  | <b>Location:</b> At individual facility locations (see list of participants) and virtually with the Western Wisconsin Healthcare Emergency Response Coalition. | <b>Date/Time:</b><br>June 9, 2026, 2:00pm-4:00pm |
| <b>Exercise Sponsor:</b> Western Wisconsin Healthcare Emergency Response Coalition                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |                                                                                                                                                                |                                                  |
| <b>Author of Report:</b> Emily Moilanen, MPH, Partners in Preparedness LLC                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |                                                                                                                                                                | <b>Date of this Report:</b> June 23, 2026        |
| Exercise Summary                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     |                                                                                                                                                                |                                                  |
| <p>Operation Unplugged: A Cyber Outage Tabletop Exercise took place on June 9, 2026. The exercise ran for two hours and included a post-exercise hotwash. Participants included nine long term care facilities from Western Wisconsin. The Western Wisconsin Healthcare Emergency Response Coalition sponsored the exercise. Partners in Preparedness LLC designed the exercise with input from planning team members and the Coalition, as well as facilitated the exercise.</p> <p>Participants responded to a cyber outage scenario that took their systems offline for 72 hours. The following objectives were tested during the exercise:</p> <p>During the exercise, participants will:</p> <ol style="list-style-type: none"><li>1) Demonstrate ability to assess impacts to services and business processes resulting from a network outage.</li><li>2) Identify downtime procedures for resident management and business processes.</li><li>3) Discuss return-to-normal processes once the servers are restored.</li></ol> <p>A post-exercise survey showed that over 70 staff members from 9 facilities participated in this exercise.</p> |                                                                                                                                                                |                                                  |

### List of Participants

1. American Lutheran Home Mondovi
2. BSJ Care Center
3. Hillview Health Care Center
4. Lakeview Health Center
5. Marinuka Manor
6. Morrow Home
7. Norseland Nursing Home
8. Riverside
9. Rolling Hills Senior Living

### Post-Exercise Survey

An electronic survey was sent out to exercise participants after the exercise. Eight facilities responded to the survey.

Respondents were asked to rank their level of satisfaction with the exercise on a scale from 1 to 5 with 1 being very dissatisfied and 5 being very satisfied. Respondents rated their overall satisfaction with the exercise as 4.7.

Respondents were also asked to rate their level of satisfaction with the following exercise components: exercise facilitator, materials provided, exercise topic, length of exercise and the group report out. Most respondents rated themselves as Very Satisfied for each of these areas. Additional feedback states that the exercise was well organized and the exercise director was easy to work with. Participants appreciated the opportunity to learn from other facilities during the group report outs after each exercise module.

### Areas of Strength

Survey respondents were asked to share 1-3 areas of strength identified during exercise play. The following themes emerged from respondent feedback:

1. **Established back-up systems.** Many facilities listed existing back-up systems as a strength when responding to a cyber outage. These systems included hotspots, cloud-based services, work-from-home options, back-up systems for ordering food and scheduling, as well as back-up generator support.
2. **Teamwork.** Many respondents mentioned their teams as a strength. Team members were listed as supportive and willing to assist in atypical situations. Staff were aware of existing plans and processes and were able to navigate downtime situations.
3. **Communication.** Communication was listed several times as a strength.

## Areas for Improvement

Survey respondents were asked to share 1-3 areas for improvement identified during exercise play. The following themes emerged from respondent feedback:

1. **Understanding the system impacts of a network outage.** Many respondents listed the need to further investigate which systems would be impacted by a network outage and what those impacts would be. Call lights, fire alarms, door locks, and time clock systems were all listed as areas where respondents identified gaps in knowledge on system impacts during a network outage scenario.
2. **Updating plans, policies, and procedures.** Respondents identified plans or policies that were missing or needed updating. Areas mentioned included:
  - a. A plan to manually manage HVAC systems
  - b. More clearly defined roles and responsibilities during a cyber outage
  - c. Improved business continuity plans
  - d. Reviewing and updating existing policies on cyber-attacks
  - e. Creation of a manual for downtime procedures
  - f. A process for management of paper medical records post-outage
  - g. Meeting with insurance providers to understand their response process during a cyber-attack event.
3. **Training/resources.** A handful of respondents noted the need for additional staff training on downtime procedures as well as reminders to staff on how to maintain HIPAA and protect PHI while using personal cellphones during an outage. Hotspots and landlines not connected to the internet were listed as needed resources.

## Improvement Plan

The following are suggested action items based on the areas for improvement survey respondents identified. Facilities may identify their own priorities based on their facility-specific After Action Report and Improvement Plans.

|    | Area for Improvement                                       | Recommend Action                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |
|----|------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 1. | Understanding the system impacts of a cyber network event. | Many facilities identified systems for which impacts during an outage were unknown. Facilities may consider taking steps to fully understand how these systems will or will not function during a network outage. Meeting with the staff or vendors who manage those systems to understand impacts is a good first step. Potential impacts should be identified and processes for workarounds or downtime procedures should be documented and added to facility plans.                                                                  |
| 2. | Updating plans, policies, and procedures.                  | Facilities should improve and update any plans or policies that were identified as inadequate or missing during the exercise. Facilities should consider creating job action sheets to more clearly define roles and responsibilities during a network outage. Checklists and one-pagers can be created to assist with just-in-time training on downtime procedures. Facilities should consider reviewing their network outage plans to ensure they include procedures for recovery operations once the facility's network is restored. |
| 3. | Training and Resources                                     | Facilities may consider purchasing equipment to support their downtime plans such as hotspots and non-VOIP landlines. Training for staff on paper-charting and record-keeping may be developed and conducted. Policies on use of personal equipment (cellphones and laptops) during a cyber outage event should be developed and regularly reviewed with staff.                                                                                                                                                                         |

**Author of Report:** Emily Moilanen, MPH, Partners in Preparedness LLC

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