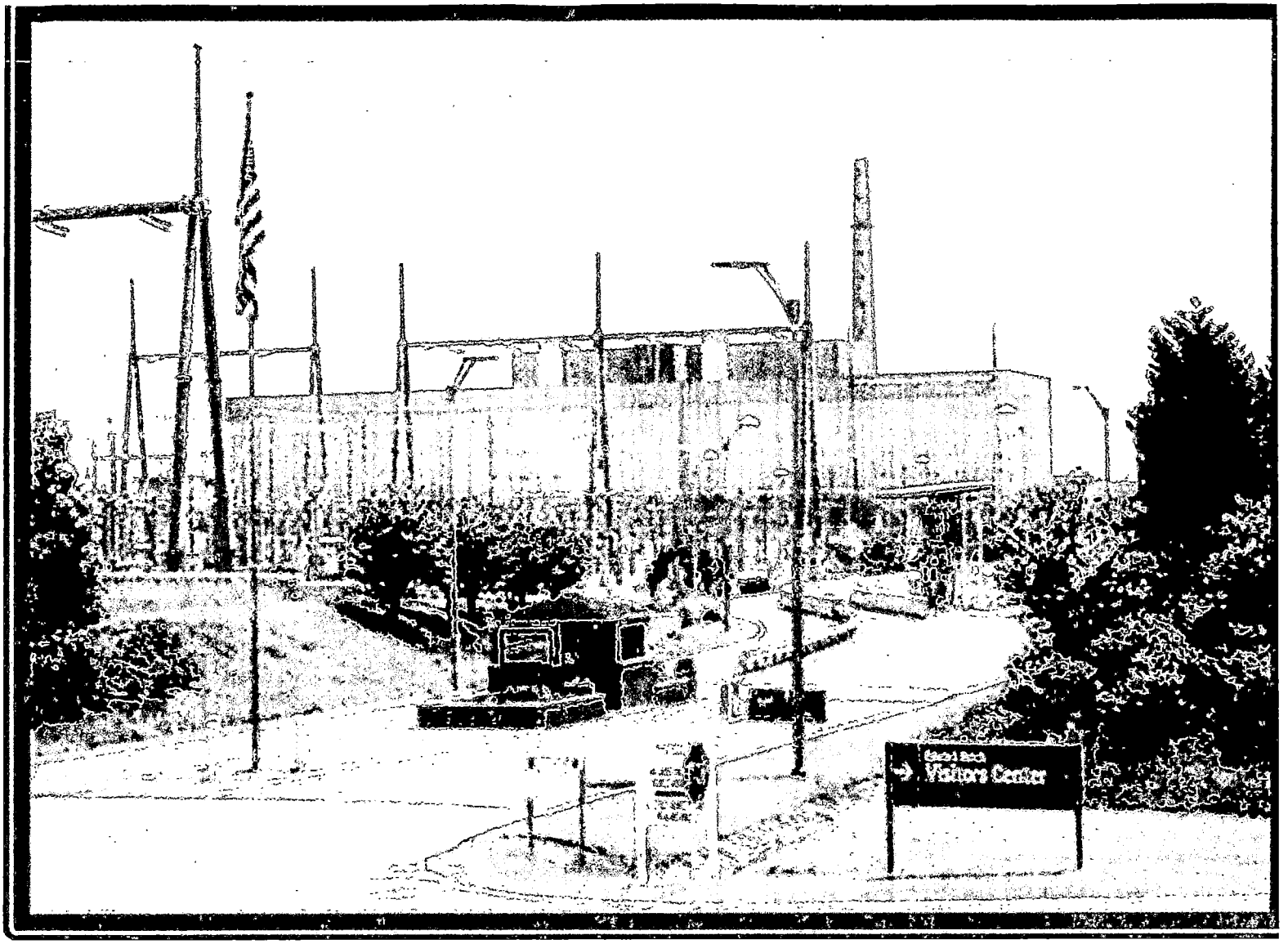
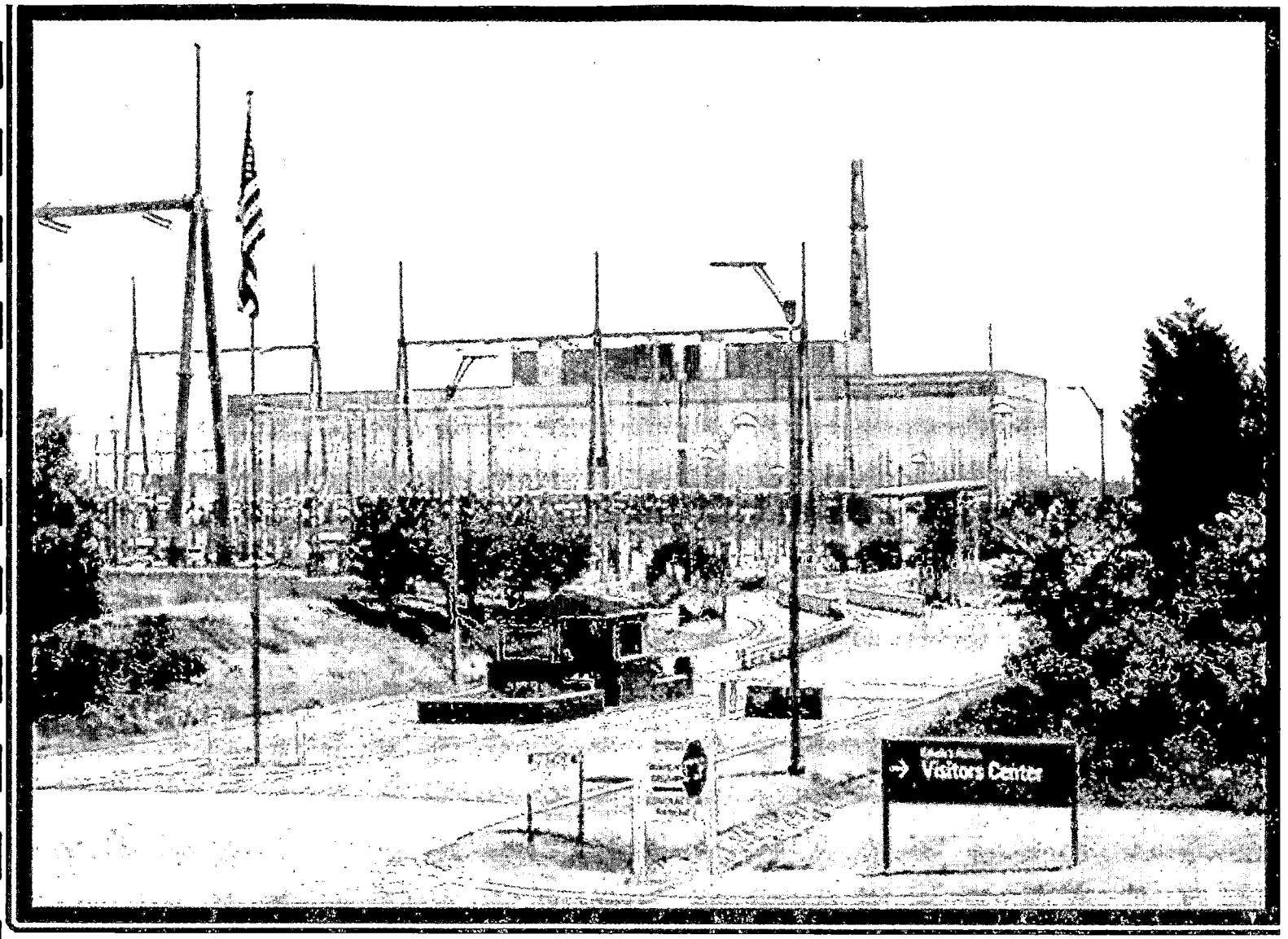



# Final After Action Report

Edwin I. Hatch Nuclear Plant
Radiological Emergency Preparedness Exercise
Exercise Date: October 22, 2019

*February 12, 2020*

FEMA




# Final After Action Report

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FEMA

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# Executive Summary

On October 22, 2019, the U.S. Department of Homeland Security, Federal Emergency Management Agency Region IV, Radiological Emergency Preparedness Program staff evaluated a plume exposure pathway exercise for the 10-mile emergency planning zone for the Edwin I. Hatch Nuclear Plant. The Hatch Nuclear Plant is located in Appling County, approximately eleven miles north of Baxley, Georgia, and is operated by Southern Nuclear Company. The Hatch Nuclear Plant emergency planning zone is divided into sixteen emergency response planning zones. The 10-mile emergency planning zone encompasses portions of Appling, Jeff Davis, Tattnall, and Toombs Counties, with an emergency planning zone population of approximately 8,700 residents.

The Federal Emergency Management Agency's overall objective of the exercise was to assess the level of state and local preparedness in responding to a radiological emergency at the Hatch Nuclear Plant. The exercise was conducted in accordance with Federal Emergency Management Agency policies and guidance concerning the exercise of state and local radiological emergency response plans and procedures. The previous federally evaluated exercise at this site was conducted on October 17, 2017. The qualifying emergency preparedness exercise was conducted in October 1980.

Officials and representatives from participating agencies and organizations demonstrated knowledge of their emergency response plans and procedures and successfully implemented them during the exercise. The evaluations of out of sequence activities conducted on February 6-7, 2019; August 21, 2019; and October 8, 2019, are also included in this report. The activities included: protective actions for schools; a medical services drill; reception and congregate care center; and emergency vehicle monitoring and decontamination. All jurisdictions demonstrated their objectives and the corresponding core capabilities identified in Section 2.2 of this report. Federal Emergency Management Agency staff did not identify any level 1 findings during this exercise; however, one level 2 finding was identified. The level 2 finding was related to emergency workers demonstrating incorrect monitoring and decontamination techniques and unfamiliarity with radiological exposure limits and the use of potassium iodide. The Federal Emergency Management Agency REP staff has worked with the State of Georgia on the development of a schedule of corrective actions to address the level 2 finding. Among the corrective actions planned are to: review and update reception center plans and procedures; provide additional training to remedy the challenges observed with the staff of the Tattnall County Middle School; and the development of visual aids to provide immediate guidance to emergency workers. The state and Tattnall County plans to demonstrate the correction of this finding during the spring of 2020.

The Federal Emergency Management Agency staff wishes to acknowledge the efforts of the many individuals who participated in the exercise and made it a success. The professionalism and teamwork of the participants were evident throughout all phases of the exercise.

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# Section 1: Exercise Overview

## 1.1 Exercise Details

**Exercise Name**
2019 Hatch Nuclear Plant Radiological Emergency Preparedness Exercise

**Type of Exercise**
Full Scale Exercise

**Exercise Date**
October 22, 2019

**Exercise Off Scenario/Out of Sequence Dates**
February 6-7, 2019; August 21, 2019; and October 8, 2019

**Locations**
See the extent of play agreement in Appendix C for exercise locations.

**Program**
Radiological Emergency Preparedness Program

**Mission**
Response

**Scenario Type**
Full Participation Plume Phase Radiological Emergency Preparedness Exercise

## 1.2 Exercise Planning Team Leadership

Lawrence Robertson
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Barty Simonton
Environmental Compliance Specialist
Georgia Department of Natural Resources/Environmental Protection Division
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## 1.3 Participating Organizations

Agencies and organizations of the following jurisdictions participated in the 2019 Hatch Nuclear Plant exercise:

**State of Georgia Jurisdictions:**

4th Civil Support Team
Georgia Emergency Management and Homeland Security Agency
Georgia Department of Agriculture
Georgia Department of Corrections
Georgia Department of Natural Resources/Environmental Protection Division
Georgia Department of Natural Resources/Law Enforcement Division
Georgia Department of Public Health
Georgia Forestry Commission
Georgia State Patrol
University of Georgia Extension Service

**Risk Jurisdictions:**

Appling County, Georgia

Appling County 911
Appling County Coroner
Appling County Board of Commissioners
Appling County Board of Education
Appling County Emergency Management Agency
Appling County Emergency Medical Services
Appling County Division of Family and Children Services
Appling County Health Department
Appling County Public Works
Appling County Road Department
Appling County Sheriff's Office
City of Baxley Fire Department

City of Baxley Police Department
City of Baxley Public Works

Jeff Davis County, Georgia

City of Hazlehurst Fire Department
City of Hazlehurst Fire and Rescue
City of Hazlehurst Police Department
City of Hazlehurst Public Works
Jeff Davis County Division of Family and Children Services
Jeff Davis County Emergency Management Agency
Jeff Davis County Emergency Medical Services
Jeff Davis County Fire Department
Jeff Davis County Public Health
Jeff Davis County Public Works
Jeff Davis County School District
Jeff Davis County Sheriff's Office

Tattnall County, Georgia

City of Cobbtown
City of Glennville Police Department
City of Glennville Public Works
City of Manassas
City of Reidsville
City of Reidsville Fire Department
City of Reidsville Police Department
Tattnall County 911
Tattnall County Board of Commissioners
Tattnall County Board of Education
Tattnall County Commissioner
Tattnall County Coroner
Tattnall County Division of Family and Children Services
Tattnall County Emergency Management Agency
Tattnall County Emergency Medical Services
Tattnall County Health Department
Tattnall County Information Technology
Tattnall County Public Works
Tattnall County Road Department
Tattnall County Sheriff's Office

Toombs County, Georgia

City of Lyons Police Department
City of Vidalia Fire Department
City of Vidalia Police Department
Toombs County Board of Education
Toombs County Division of Family and Children Services
Toombs County Emergency Management Agency
Toombs-Montgomery Emergency Medical Services
Toombs County Fire and Rescue
Toombs County Public Health
Toombs County Schools Transportation
Toombs County Sheriff's Office

**Federal Organizations:**

Nuclear Regulatory Commission – Region II

**Private Organizations:**

American Red Cross
Appling Healthcare
Glenvue Health and Rehabilitation
Jeff Davis Hospital
Meadows Regional Hospital
Optim Medical Center
Pineland Behavioral Health/Developmental Disabilities
Southeastern Technical College
Southern Nuclear Company
Tetra Tech, Inc.

# Section 2: Exercise Design Summary

## 2.1 Exercise Purpose and Design

The Federal Emergency Management Agency administers the Radiological Emergency Preparedness Program pursuant to the regulations found in Title 44 Code of Federal Regulations parts 350, 351, 352, 353, and 354. Title 44 Code of Federal Regulations part 350 codifies 16 planning standards that form the basis for radiological emergency response planning for the licensee, state, tribal, and local governments impacted by the emergency planning zones established for each nuclear power plant site in the United States. The United States Nuclear Regulatory Commission regulations also codify the16 planning standards for the licensee. Title 44 Code of Federal Regulations part 350 sets forth the mechanisms for the formal review and approval of state, tribal, and local government radiological emergency response plans and procedures by the Federal Emergency Management Agency. One of the Radiological Emergency Preparedness Program cornerstones established by these regulations is the biennial exercise of offsite response capabilities. During these exercises, affected state, tribal, and local governments demonstrate their abilities to implement their plans and procedures to protect the health and safety of the public in the event of a radiological emergency at the nuclear plant.

The results of this exercise, together with review of the radiological emergency response plans and verification of the periodic requirements set forth in NUREG-0654/FEMA-REP-1, along with supplements through the annual letter of certification, and staff assistance visits enabled the Federal Emergency Management Agency to provide a statement with the transmission of this final after-action report to the U.S. Nuclear Regulatory Commission, that the affected state, tribal, and local plans and preparedness are: (1) adequate to protect the health and safety of the public living in the vicinity of the nuclear power facility by providing reasonable assurance that appropriate protective measures can be taken offsite in the event of a radiological emergency; and (2) capable of being implemented.

Formal submission of the State of Georgia and involved local jurisdictions of the radiological emergency response procedures for the Hatch Nuclear Plant to the Federal Emergency Management Agency was on June 9, 1980. Formal approval was granted by the Federal Emergency Management Agency on May 5, 1981.

## 2.2 Exercise Core Capabilities and Objectives

Core capabilities-based planning allows for exercise planning teams to develop exercise objectives and observe exercise outcomes through a framework of specific action items. Using the Homeland Security Exercise and Evaluation Program methodology, the exercise objectives meet the Radiological Emergency Preparedness Program requirements and encompass the emergency preparedness evaluation areas. The critical tasks to be demonstrated were negotiated with the State of Georgia and the participating

counties. The core capabilities scheduled for demonstration during this exercise were:

- **Operational Coordination:** Establish and maintain a unified and coordinated operational structure and process that appropriately integrates all critical stakeholders and supports the execution of core capabilities.

- **Situational Assessment:** Provide all decision makers with decision-relevant information regarding the nature and extent of the hazard, any cascading effects, and the status of the response.

- **Public Information and Warning:** Deliver coordinated, prompt, reliable, and actionable information to the whole community through the use of clear, consistent, accessible, and culturally and linguistically appropriate methods to effectively relay information regarding any threat or hazard, as well as the actions being taken and the assistance being made available, as appropriate.

- **Environmental Response/Health and Safety:** Conduct appropriate measures to ensure the protection of the health and safety of the public and workers, as well as the environment, from all-hazards in support of responder operations and the affected communities.

- **On-Scene Security, Protection, and Law Enforcement:** Ensure a safe and secure environment through law enforcement and related security and protection operations for people and communities located within affected areas and also for response personnel engaged in lifesaving and life-sustaining operations.

- **Critical Transportation:** Provide transportation (including infrastructure access and accessible transportation services) for response priority objectives, including the evacuation of people and animals, and the delivery of vital response personnel, equipment, and services into the affected areas.

- **Mass Care Services:** Provide life-sustaining and human services to the affected population, to include hydration, feeding, sheltering, temporary housing, evacuee support, reunification, and distribution of emergency supplies.

- **Public Health, Healthcare, and Emergency Medical Services:** Provide lifesaving medical treatment via emergency medical services and related operations and avoid additional disease and injury by providing targeted public health, medical, and behavioral health support, and products to all affected populations.

These core capabilities, when successfully demonstrated, meet the exercise objectives. The objectives for this exercise were as follows:

**Objective 1:** Demonstrate the ability to provide direction and control and make protective action decisions through the state emergency operations centers, county emergency operations centers, and field activities by exercise play and discussion of plans and procedures.

**Objective 2:** Demonstrate the ability to provide protective action decisions affecting state and county emergency workers and public through exercise play and discussions of plans and procedures.

**Objective 3:** Demonstrate the ability to implement protective actions for state and county emergency workers and public through exercise demonstration.

**Objective 4:** Demonstrate the ability to activate the prompt alert and notification system utilizing the primary notification system and the emergency alert system through exercise play.

**Objective 5:** Demonstrate the effectiveness of plans, policies, and procedures in the joint information center for public and private sector emergency information communications.

**Objective 6:** Demonstrate the ability to monitor, decontaminate, register, and shelter evacuees.

**Objective 7:** Demonstrate the ability to provide dose projection and protective action recommendations to decision makers for the plume phase.

**Objective 8:** Demonstrate the ability to provide appropriate space, adequate resources, and trained personnel to provide transport, monitoring, decontamination, and medical services to contaminated injured individuals.

## 2.3 Exercise Scenario

The following is a summary of the scenario developed by Southern Nuclear Company to drive exercise play. The scenario and supporting documents were deemed adequate for the demonstration of the exercise objectives and associated technical criteria identified in the extent of play agreement.

The exercise began at 0800 with a thunderstorm warning in effect. At 0805, a loss of coolant accident occurred after excess vibrations in a recirculation pump caused a failure of associated piping. Conditions exist to declare an Alert emergency classification level. Between 0904 and 0915, lightning strikes and other storm damage cause various electrical bus failures, and at 0930, the severe weather warning is cancelled. At 0950,

drywell pressure decreases rapidly due to containment penetration failure and conditions exist to declare a Site Area Emergency. Also, a very small radiological release is occurring through the main stack.

At 1120, an increase in gap release causes drywell radiation levels to increase and a loss of all three fission product barriers occurs. Conditions exist to declare a General Emergency and the radiological release significantly increases. The plume is expected to contain significant amounts of noble gases along with fairly small amounts of iodines and particulates. Both utility and state projections are expected to show the potassium iodide administration protective action guideline for emergency workers and institutionalized individuals will not be exceeded (Georgia does not issue potassium iodide to the general public). The expected protective action recommendation from the utility will be to evacuate zones A, B-5, and E-5; the evacuation recommendation only affects zones in Appling and Toombs Counties.

At 1245, exercise termination for the utility was expected, with a commitment from the utility to run a simulation cell to provide data to offsite response organizations until offsite objectives were met. The state and offsite response agencies continued participation until approximately 2:00 p.m.

# Section 3: Analysis of Capabilities

## 3.1 Exercise Evaluation and Results

This section contains the results and findings of the evaluation of all jurisdictions and functional entities that participated in the October 22, 2019, plume exposure pathway exercise and out of sequence activities of February 6-7, 2019; August 21, 2019; and October 8, 2019.

Each jurisdiction and functional entity was evaluated based on the demonstration of core capabilities and the underlying criteria as delineated in the Federal Emergency Management Agency Radiological Emergency Preparedness Program Manual dated January 2016. Exercise criteria are listed by number and the demonstration status of those criteria are indicated by the use of the following terms:

- M: Met (no unresolved level 1 or level 2 findings assessed and no unresolved findings from prior exercises)
- 1: Level 1 finding assessed
- 2: Level 2 finding assessed or an unresolved level 2 finding(s) from a prior exercise
- P: Plan issue
- N: Not demonstrated

## 3.2 Summary Results of Exercise Evaluation

The Homeland Security Exercise and Evaluation Program evaluation methodology is an analytical process used to assess the demonstration of specific capabilities during an exercise. A capability provides a means to perform one or more critical tasks under specified conditions and to specific performance standards. Core capabilities form the foundation of the Federal Emergency Management Agency Region IV Radiological Emergency Preparedness Program evaluations. The core capability summaries below provide an overall combined assessment of state and local jurisdictions based upon their collective demonstrated performance as it relates to the specific core capability. Each jurisdiction's standalone capability summaries are listed in Section 3.3 of this report.

### Operational Coordination:

Leadership personnel from various agencies were able to establish and maintain a unified and coordinated operational structure in order to provide effective direction and control. The decision-making process, led by the State of Georgia, integrated all relevant stakeholders to make sound protective action decisions based on recommendations made by the utility. The affected jurisdictions integrated various support agencies in order to make effective decisions. The level of participation by senior county leadership across all four risk counties was commendable.

**Situational Assessment:**

Georgia Department of Natural Resources-Environmental Protection Division personnel successfully demonstrated the ability to assess plant conditions and to provide sound recommendations to decision makers in response to a radiological incident at the Hatch Nuclear Plant. County and state decision makers were provided with relevant radiological information by state dose assessors throughout the demonstration. The information allowed decision makers to fully understand the hazards, as well as relevant effects, in order to make appropriate protective actions decisions.

**Public Information and Warning:**

The State of Georgia effectively demonstrated the activation of the primary alert and notification system. There were no failures noted; however, the state and counties were able to explain how any failures would be mitigated. News releases were coordinated among the state and risk counties using an efficient review process initiated at the state level. Pre-caucus meetings held prior to media briefings allowed for the delivery of coordinated information. Media briefings, as well as coordinated print information for the public, would be delivered from the utility's joint information center. The processes demonstrated enabled prompt and reliable information to be delivered to the public and media.

**Environmental Response/Health and Safety:**

Firefighting personnel from the Jan Powell Fire Station and Tattnall County demonstrated their ability to perform radiological monitoring of emergency workers and vehicles. In accordance with plans and procedures, proper monitoring and decontamination techniques were followed. Workers were familiar with their equipment and were able to explain radiological exposure limits.

Teaching staff from Tattnall County Middle School participated in the demonstration of radiological monitoring and decontamination of evacuees. Though initial monitoring found contamination on one evacuee, the secondary monitoring point did not locate the contamination as indicated on the evacuee monitoring form. Decontamination of evacuees was not performed in accordance with plans and procedures, which could shield contamination present. When questioned, two emergency workers were unable to articulate their exposure limits and the purpose of potassium iodide or demonstrate the use of dosimetry.

**On-Scene Security, Protection, and Law Enforcement:**

City and county law enforcement personnel were able to explain through interview the setup and operation of traffic control points. All law enforcement personnel were provided a radiological safety briefing at their respective locations as well as radiological safety kits containing the proper equipment to track radiological exposure. They were able to explain their exposure limits as well as the purpose of potassium iodide; they were also aware of the emergency worker decontamination locations.

Georgia Department of Natural Resources Law Enforcement personnel explained through interview that they were knowledgeable and capable of alerting and clearing boaters on the Altamaha River for all four risk counties in response to a radiological incident at the Hatch Nuclear Plant in accordance with their plans and procedures.

**Critical Transportation:**

Appling and Toombs Counties' school representatives were highly knowledgeable of the actions necessary to take in order to implement protective actions to protect students and staff in response to a radiological incident at the Hatch Nuclear Plant. Transportation resources would be readily accessible in order to relocate students and staff from the affected schools. Notification of parents/guardians and reunification procedures with students were thoroughly described.

**Mass Care Services:**

Tattnall County Health Department personnel, along with a representative from the American Red Cross, successfully demonstrated their ability to provide congregate care center services and accommodations for evacuees. They were able to properly identify individuals that had been processed through monitoring and decontamination. Equipment available would be sufficient to support the expected evacuee population as well as extended shelter operations.

**Public Health, Healthcare, and Emergency Medical Services:**

Appling County Emergency Medical Services paramedics successfully demonstrated the ability to provide treatment and transport of a radiologically contaminated injured individual. While the crew understood that lifesaving measures took priority over radiological hazards, they were able to use procedures effectively in order to demonstrate proper contamination control during transport.

Appling Healthcare personnel successfully demonstrated the capability to provide medical treatment to a potentially contaminated injured patient via emergency medical services and related operations. Nurses, maintenance personnel, and Hatch Nuclear Plant radiation protection technicians performed their tasks while preventing cross contamination of the patient and area. The staff demonstrated that medical care was the priority over decontamination.

## 3.3 Jurisdictional Summary Results of Exercise Evaluation

### 3.3.1 State of Georgia

#### 3.3.1.1 State Operations Center

**Operational Coordination Capability Summary:**

Representatives of the Georgia Emergency Management and Homeland Security Agency successfully coordinated response actions to a simulated radiological incident involving the Hatch Nuclear Plant. Overall operational coordination as well as direction and control of the response was demonstrated by the State of Georgia from the state operations center. State operations center staff maintained situational awareness of incident status and facilitated information sharing among stakeholders which ensured well informed and coordinated protective action decisions were made.

The state operations center was recently renovated. The new facility was well equipped and designed to support emergency response operations. It had sufficient space, equipment, communications, and backup power capabilities, as well as support facilities for extended response activations. Multiple maps, signs, and displays were available and used to enhance situational awareness.

The state warning point received the initial notification of the incident over the emergency notification network. The telecommunications specialist who received the call promptly informed leadership in accordance with plans and procedures. State operations center support staff were quickly mobilized and immediately began working to support the incident. An open conference bridge line was established and monitored for the duration of the exercise. Discussions with the risk counties, the emergency operations facility state liaison, and the joint information center regarding incident status and protective actions were achieved using the conference bridge line. Communications equipment functioned effectively with no observed failures. Challenges were observed with the audio of the conference bridge line, but they were resolved with no impact to the response. Independent backup communications were available in the event they were needed.

The operations chief and the Radiological Emergency Preparedness Program Manager employed subject matter experts in the state operations center to share information and recommendations to all stakeholders over the conference bridge line. Protective action decisions for the public and emergency workers were discussed with appropriate response organizations and concurred by all stakeholders prior to implementation. The protective action decisions considered all relevant factors and information which included dose projections and plant, meteorological, and offsite conditions.

For this capability the following radiological emergency preparedness criteria were met: 1.a.1, 1.b.1, 1.c.1, 1.d.1, 1.e.1, 2.a.1, 2.b.2.

a. **Level 1 Finding:** None

b. **Level 2 Finding:** None

c. **Not Demonstrated:** None

d. **Prior Level 2 Findings – Resolved:** None

e. **Prior Level 2 Findings - Unresolved:** None

**Public Information and Warning Capability Summary:**

The Georgia Emergency Management and Homeland Security Agency External Affairs staff were responsible for public affairs activities associated with the simulated radiological incident at the Hatch Nuclear Plant. Staff developed coordinated, accurate, and actionable information for the public within the Hatch Nuclear Plant 10-mile emergency planning zone.

Information developed in the external affairs workroom within the state operations center was promptly emailed to the state public information officer staff in the joint information center for dissemination to the public. Development of news releases at the state operations center and dissemination from the joint information center was efficient. Information was effectively relayed regarding the incident at the Hatch Nuclear Plant and, as appropriate, the actions taken, and the assistance made available.

External affairs staff were notified by the Radiological Emergency Preparedness Program manager via email of the Alert emergency classification level. The notification advised staff to report to their assigned positions in the state operations center. Upon arrival, external affairs staff received an initial briefing, began development of news release #1, and initiated contact with the state public information officer staff at the joint information center. The external affairs staff used an updated news release development and approval process that streamlined the release of public information and reduced the potential for erroneous messages. A total of four news releases were developed using this process.

Following the declaration of a General Emergency, the state and risk counties concurred via the coordination call to evacuate zones A, B5, E5, sound sirens, and activate the Emergency Alert System. The sirens and Emergency Alert System were sounded and activated, respectively, from the state warning point by communications staff.

The pre-scripted Emergency Alert System message met the four Federal Emergency Management Agency requirements; however, the actual wording of the message could have caused confusion. As part of the Emergency Alert System demonstration, a message was sent to the Integrated Public Alert and Warning System laboratory. As part of this test, the Emergency Alert System message was accepted, validated, and would have been broadcasted through the Integrated Public Alert and Warning System if this were an actual event.

For this capability the following radiological emergency preparedness criteria were met: 5.a.1, 5.b.1.

a. **Level 1 Finding:** None
b. **Level 2 Finding:** None
c. **Not Demonstrated:** None
d. **Prior Level 2 Findings – Resolved:** None
e. **Prior Level 2 Findings - Unresolved:** None

### 3.3.1.2 Dose Assessment

**Situational Assessment Capability Summary:**

Georgia Department of Natural Resources Environmental Protection Division personnel successfully demonstrated the ability to assess radiological and plant conditions and to provide appropriate recommendations to decision makers during the response to a radiological incident at the Hatch Nuclear Plant.

In accordance with the extent of play agreement, Environmental Protection Division personnel were pre-positioned near the Georgia State Operations Center and promptly responded following the Alert emergency classification level declaration by Hatch Nuclear Plant personnel. The radiation emergency coordinator received text and email messages from the state warning point. He, in turn, notified members of the Radiological Emergency Response Team by email directing them to respond. The Georgia State Operations Center had sufficient equipment and supplies to support emergency operations. In addition, staff members brought computers equipped with two different dose assessment software programs. Redundant communication systems were available including landline telephones, cellular telephones, push-to-talk radio-telephones, computer-based message boards, and email.

The radiation emergency coordinator directed the state's technical response. He and the assistant radiation emergency coordinator gathered information on plant and meteorological conditions, performed dose projection calculations, and verified field monitoring teams were positioned to locate and characterize the radiological release. A utility liaison at the Georgia State Operations Center provided detailed information on plant conditions to state personnel.

Following the General Emergency declaration, the radiation emergency coordinator provided protective action recommendations to state and county decision makers to evacuate appropriate zones. Since projected thyroid doses were well below protective action guides, he recommended potassium iodide not be ingested by emergency workers. When radiation measurements and air sampling results were obtained from field monitoring teams, the radiation emergency coordinator compared the field data with dose projections and determined that no additional protective actions were necessary.

For this capability the following radiological emergency preparedness criteria were met: 1.a.1, 1.d.1, 1.e.1, 2.b.1, and 2.b.2.

a. **Level 1 Finding:** None

b. **Level 2 Finding:** None

c. **Not Demonstrated:** None

d. **Prior Level 2 Findings – Resolved:** None

e. **Prior Level 2 Findings - Unresolved:** None

### 3.3.1.3 Field Monitoring Team Operations and Management

**Environmental Response/Health and Safety Core Capability Summary:**

Personnel from the Georgia Department of Natural Resources Environmental Protection Division and the 4th Civil Support Team successfully demonstrated the ability to perform and manage field monitoring activities in response to a radiological incident at the Hatch Nuclear Plant. Staff members were pre-positioned at the Toombs County Emergency Management Agency in accordance with the extent of play agreement. The field team members described how they would be notified to respond through use of state warning point communications and call-down procedures.

Equipment, maps, instrumentation, dosimetry, potassium iodide, and other supplies were sufficient to support emergency operations. Communications capabilities consisted of push-to-talk radio-telephones, cellular telephones, and an internet connected computer. There were some communication challenges with one field monitoring team which may have been caused by a cellular tower outage in the area; however, this did not have an impact on the demonstration.

The field team coordinator provided a briefing to the field monitoring teams prior to deployment. Dosimetry use, potassium iodide ingestion, plant status, meteorological conditions, turn-back limits, and other safety topics were discussed. There was no authorization for the ingestion of potassium iodide during the exercise due to the low levels of radioiodines in the plume.

The field team coordinator deployed the field teams in appropriate downwind locations which he modified following shifts in wind direction. Once each field monitoring team located the maximum exposure rate during a traverse, the field team coordinator requested an air sample at that location. The field team coordinator promptly transmitted results to the radiation emergency coordinator at the Georgia State Operations Center. Throughout the exercise, the plant and state field team coordinators shared information and coordinated resources.

The teams inventoried, prepared, and checked all equipment, dosimetry, and radiological survey instruments prior to deployment. Once deployed, the field monitoring teams used proper monitoring techniques to identify the plume and determine an appropriate area to take an air sample. Each team properly followed their procedures for collection of an air sample. The samples were transported to a background location and counted, and results were transmitted to the field team coordinator.

For this capability the following radiological emergency preparedness criteria were met: 1.a.1, 1.d.1, 1.e.1, 3.a.1, 4.a.2, and 4.a.3.

a. **Level 1 Finding:** None

b. **Level 2 Finding:** None

c. **Not Demonstrated:** None

d. **Prior Level 2 Findings – Resolved:** None

e. **Prior Level 2 Findings - Unresolved:** None

### 3.3.1.4 Waterway Warning

**On-Scene Security, Protection, and Law Enforcement Capability Summary:**

Georgia Department of Natural Resources Law Enforcement personnel identified through interview that they were knowledgeable and capable of alerting and clearing boaters on the Altamaha River for all four risk counties in response to a radiological incident at Hatch Nuclear Plant in accordance with their plans and procedures.

Law enforcement personnel discussed that when alerted and upon arrival at the Toombs County Emergency Operations Center, they would receive a just-in-time safety briefing from the radiation protection officer, which would include: instructions on administrative dose limits and the use of radiation kits which contained dosimetry to ensure their safety during operations. Radiation kits were issued but not used and were returned to the radiation protection officer at the end of the exercise.

A Georgia Department of Natural Resources Law Enforcement officer showed the boat that would be used to clear the Altamaha River when ordered. Equipment on the boat included an 800-megahertz radio, a public address system, seating for two, and lights for night operations. A computer was available in the truck. If any additional assistance was needed for the boat ramps and landings, the local sheriff's department would assist. The law enforcement officer stated that a pre-scripted message would be used to alert boaters during river clearance operations.

For this capability the following radiological emergency preparedness criteria were met: 1.a.1, 1.d.1, 1.e.1, 3.a.1, 3.d.1.

a. **Level 1 Finding:** None
b. **Level 2 Finding:** None
c. **Not Demonstrated:** None
d. **Prior Level 2 Findings – Resolved:** None
e. **Prior Level 2 Findings - Unresolved:** None

### 3.3.2 Joint Operations

#### 3.3.2.1 Emergency Operations Facility

**Operational Coordination Capability Summary:**

The Georgia Emergency Management and Homeland Security Agency had lead agency responsibility for direction, control, and coordination for all radiological emergency situations throughout Georgia. A liaison was provided by the Georgia Emergency Management and Homeland Security Agency to the Southern Nuclear Company' s corporate emergency operations facility.

The liaison facilitated the flow of information between the utility and state and county agencies. Protective actions taken by the state were provided to the utility by the state liaison. These included precautionary actions, protective action decisions for the public, and alert and notification system activations. Additionally, the liaison contacted the state operations center on several occasions with relevant information provided by the utility before it was officially reported. This provided decision makers with additional time to assess response actions.

The state liaison worked closely with Southern Nuclear Company personnel in the emergency operations facility to obtain accurate and current plant conditions. She followed appropriate procedures and protocols and performed her duties in an effective and professional manner.

For this capability the following radiological emergency preparedness criterion was met: 2.b.1.

a. **Level 1 Finding:** None

b. **Level 2 Finding:** None

c. **Not Demonstrated:** None

d. **Prior Level 2 Findings – Resolved:** None

e. **Prior Level 2 Findings - Unresolved:** None

### 3.3.2.2 Joint Information Center

**Public Information and Warning Capability Summary:**

The State of Georgia and the risk counties of Appling, Jeff Davis, Tattnall, and Toombs successfully demonstrated the capability to provide prompt, reliable, and actionable emergency information to the public and media in support of the Hatch Nuclear Plant. Emergency information provided in the news releases and media briefings was complete and accurate. Instructions provided by the joint information center staff were in support of protective action decisions developed by the relevant state and county agencies.

State and county public information officers were alerted and mobilized by their agencies. The joint information center was activated in a timely manner and in accordance with plans and procedures. Upon activation, the joint information center served as the central point of contact for the release and distribution of information to the public and media. The facility provided ample space and communication resources to support emergency operations. When the primary communication system failed, backup communication systems operated as designed. Equipment, maps, displays, and other supplies were sufficient to support emergency operations.

The ability to provide accurate and timely emergency information and instructions for the public and the media was successfully demonstrated. News releases received from the Georgia State Operations Center were released to the public and media from the joint information center. Three media briefings were held during the exercise. Prior to each media briefing, spokespersons coordinated their messages and determined the order of speakers to prioritize critical emergency information. The spokespersons answered all questions asked of them by mock media and were able to discuss the precautionary and protective actions taken by their agencies. Public inquiry and media monitoring were

performed by the utility within this facility. State, county, and utility spokespersons were made aware of the calls received in order to address trends and rumors during the media briefings. Identified trends and rumors were addressed during the media briefings by the utility spokesperson.

For this capability the following radiological emergency preparedness criteria were met: 1.a.1, 1.d.1, 1.e.1, 5.b.1.

a. **Level 1 Finding:** None

b. **Level 2 Finding:** None

c. **Not Demonstrated:** None

d. **Prior Level 2 Findings – Resolved:** None

e. **Prior Level 2 Findings - Unresolved:** None

### 3.3.3 Risk Jurisdictions

### 3.3.3.1 Appling County, Georgia

#### 3.3.3.1.1 Emergency Operations Center

**Operational Coordination Capability Summary:**

The Appling County Emergency Management Agency Director and staff successfully demonstrated the ability to respond to a radiological emergency at the Hatch Nuclear Plant and ensure the safety of the general population and county emergency workers. The Appling County Manager, City of Baxley Manager, and senior leadership from the supporting county agencies participated at the emergency operations center throughout the exercise. The support staff notification of emergency operations center activation was demonstrated using an automated mass notification system that used voice, text, and electronic mail messages. Throughout the exercise, the director gathered and analyzed pertinent emergency information, and made appropriate decisions with effective direction and control. Proactive planning led to effective discussion and decision-making to simulate the evacuation of the affected population from the designated zones. Periodic staff briefings kept staff informed of emergency conditions and plant status, and the staff periodically briefed their status to the director to maintain effective internal coordination.

The emergency operations center had multiple communication systems to include computer internet access, electronic mail, commercial land lines, cell phones, and other handheld electronic devices. Backup communications also included facsimile machines, and local government radios. Electronic incident management software was used by staff

to maintain situational awareness and track resource requests. Status calls and discussions among the other risk counties and state concerning protective actions were coordinated using a dedicated conference bridge line. Sufficient equipment and supplies were available for extended operations as required.

Staff of the represented agencies demonstrated their understanding and responsibility to assist in implementation of protective actions decisions for the affected population. The radiological protection officer provided relevant briefings to emergency workers who were to be dispatched into the affected Appling County zones. The officer presented a state-generated video presentation on the conditions and use of radiological dosimetry followed by just-in-time training. Emergency workers interviewed demonstrated an understanding of dosimetry, potassium iodide, and management of radiological exposure. The staff performed effective planning to assist access and functional needs people and relocate students and staff.

The Appling County Sheriff and Baxley Police Chief described the establishment of appropriate traffic and access control procedures. Through discussion, a simulated impediment on a major evacuation route was detailed and managed with an understanding of how critical it was to ensure rapid evacuation of residents. The Georgia Department of Natural Resources liaison detailed actions required to prepare vessels for Altamaha River clearance and coordination with adjoining counties.

When the emergency management director ordered the opening of the reception and congregate care center, the health agencies worked directly with the American Red Cross, Appling County Public Health, and Appling County Department of Family and Child Services to provide staffing assistance.

For this capability the following radiological emergency preparedness criteria were met: 1.a.1, 1.c.1, 1.d.1, 1.e.1, 2.a.1, 2.b.2, 2.c.1, 3.a.1, 3.b.1, 3.c.1, 3.c.2, 3.d.1, 3.d.2.

a. **Level 1 Finding:** None

b. **Level 2 Finding:** None

c. **Not Demonstrated:** None

d. **Prior Level 2 Findings – Resolved:** None

e. **Prior Level 2 Findings - Unresolved:** None

**Public Information and Warning Capability Summary:**

The Appling County Emergency Management Agency Director and the Georgia Emergency Management and Homeland Security Agency liaison assisted in the coordination of public information. News releases were received by email, printed by the liason, and presented to the emergency management director for review and approval. Appling County's participation in the approval process resulted in prompt, reliable, and

accurate information being released to the whole community during the emergency response.

Appling County demonstrated their capability to perform primary alerting of the public in a timely manner and ensure electronic notifications in areas where a siren failure might occur. Although siren failure was not a component of the demonstration, the communications officer demonstrated expert understanding of the automated mass notification system. This system was effectively demonstrated for mobilization of key staff for the emergency operations center activation, and would also be used to notify the general public.

For this capability the following radiological emergency preparedness criteria were met: 5.a.1, 5.a.3, 5.b.1.

a. **Level 1 Finding:** None
b. **Level 2 Finding:** None
c. **Not Demonstrated:** None
d. **Prior Level 2 Findings – Resolved:** None
e. **Prior Level 2 Findings - Unresolved:** None

**Critical Transportation Capability Summary (Schools Interview):**

The Appling County School District Superintendent, along with the transportation director, discussed via interview the protective actions that would be taken at Altamaha Elementary School if relocation was necessary due to an emergency at Hatch Nuclear Plant. School district staff would be notified by county emergency operations center staff of the need to implement the precautionary action to relocate students, staff, and faculty. The school would follow standard parental notification procedures through the use of an automated notice system to notify parents/guardians of the need to pick up students from Altamaha High School; additionally, relocation information would be available on the school district website and social media outlets. Buses, along with qualified drivers, would be placed on standby and dispatched as necessary; buses capable of transporting access and functional needs individuals would be available as well. Request for county law enforcement escort would be coordinated within the emergency operations center.

Reunification of students and parents and/or guardians would be accomplished through positive identification as verified with class rosters obtained from assigned teachers. Teachers would be responsible for students not immediately retrieved, and additional assistance to locate parents/guardians would be provided from the school resource officer.

For this capability the following radiological emergency preparedness criteria was met: 3.c.2.

a. **Level 1 Finding:** None

b. **Level 2 Finding:** None

c. **Not Demonstrated:** None

d. **Prior Level 2 Findings – Resolved:** None

e. **Prior Level 2 Findings - Unresolved:** None

#### 3.3.3.1.2 Traffic Control Points

**On-Scene Security, Protection, and Law Enforcement Capability Summary:**

Appling County Sheriff's Office deputies demonstrated their knowledge to provide a safe and secure environment to establish appropriate traffic and access control. Appling County would have seventeen designated traffic control points staffed by a combination of sheriff's office deputies and Baxley Police Department officers.

All officers were knowledgeable of their dosimetry, radiological exposure, and the procedure for ingesting potassium iodide. Communications and equipment to support the operation were sufficient and available 24 hours a day. The interviewed deputies received a thorough radiological emergency safety briefing which included potassium iodide instructions and issuance of dosimetry. The deputies knew the assignments and shifts would be directed from the emergency operations center. They also knew that the county and city road and public works departments would provide special barricades, signs, and markers. For extended assignments, assistance would be provided from surrounding counties, the Georgia State Patrol and the Georgia Department of Transportation.

For this capability the following radiological emergency preparedness criteria were met: 1.a.1, 1.d.1, 1.e.1, 3.a.1, 3.d.1, 3.d.2.

a. **Level 1 Finding:** None

b. **Level 2 Finding:** None

c. **Not Demonstrated:** None

d. **Prior Level 2 Findings – Resolved:** None

e. **Prior Level 2 Findings - Unresolved:** None

### 3.3.3.1.3 Medical Services Drill

**Public Health, Healthcare, and Emergency Medical Services Capability Summary (EMS):**

Appling County Emergency Medical Services paramedics and staff successfully demonstrated the capability to transport an injured and contaminated evacuee during a radiological emergency at the Hatch Nuclear Plant. Paramedics received initial notification of an injured evacuee from the county 911 dispatcher office over the emergency medical services station intercom system. Prior to being mobilized, paramedics received a radiological protection brief via video. The video covered key radiological protection information such as instructions on the wear and use of dosimeters; exposure limits and turnback values; authorization to use potassium iodide and dosage; potassium iodide side effects and limits to use for pregnant emergency workers; and request and return of radiological kits. Additional instructions concerning safety and completion of exposure forms was provided by the radiation protection officer at the station. Paramedics were issued sufficient equipment and communication capabilities to perform medical missions in a potentially contaminated environment.

Onsite, paramedics took several actions to prevent cross-contamination of equipment and themselves. Equipment was placed on sheets to prevent them from being contaminated and paramedics performed numerous glove changes. Dosimeter checks were conducted frequently throughout the demonstration in accordance with plans and procedures.

Upon arrival at the medical facility, paramedics maintained precautionary actions to prevent cross contamination, and a utility radiation protection technician was available to survey both paramedics and their ambulance. Poor monitoring techniques and lack of contamination avoidance measures by utility personnel were noted during the demonstration and addressed with utility leadership onsite. Patient transfer was done effectively and correctly.

Paramedics were knowledgeable as to the location of the emergency worker decontamination station and knew to go there upon completion of their mission. They effectively prevented cross contamination to themselves and the patient. They communicated regularly with each other, 911 dispatch, and the hospital, maintaining good situational awareness.

For this capability the following radiological emergency preparedness criteria were met: 1.a.1, 1.e.1, 3.a.1, 6.d.1.

**a. Level 1 Finding:** None

**b. Level 2 Finding:** None

**c. Not Demonstrated:** None

**d. Prior Level 2 Findings – Resolved:** None

**e. Prior Level 2 Findings - Unresolved:** None

**Public Health, Healthcare, and Emergency Medical Services Capability Summary (Hospital):**

Appling Healthcare personnel successfully demonstrated the capability to provide medical treatment to a potentially contaminated patient via emergency medical services and related operations. Nurses, maintenance personnel, and Plant Hatch radiation protection technicians performed their tasks while preventing cross contamination of the patient and area. The staff also demonstrated that medical care was the priority over decontamination.

After receiving simulated calls concerning an event at Plant Hatch, the buffer zone nurse alerted emergency room personnel of a potentially contaminated patient arriving and used the hospital public address system to alert hospital personnel. Nurses proceeded to properly dress out in protective clothing and dosimetry. One nurse read plans while other nurses performed the steps. This was a very good process to ensure everyone was dressed out correctly.

Plant Hatch technicians properly source checked survey instruments and dressed out in appropriate protective clothing. Poor monitoring techniques and lack of contamination avoidance measures by utility personnel were noted during the demonstration and addressed with utility leadership onsite. The radiation emergency area had enough supplies and medical equipment to monitor, decontaminate, and medically treat the patient.

Maintenance personnel assisted in setting up the radiation emergency area inside and outside. The maintenance personnel were very familiar with setting up the area and used the plans to properly establish a controlled area for receiving the patient and the ambulance.

Once the patient arrived, the nurses exhibited excellent awareness of contamination control and used very good decontamination techniques. The nurses changed gloves frequently and had the plant technician survey their hands and equipment if they were in doubt of their condition. They used very good techniques to isolate the contamination areas during the decontamination processes to ensure no cross contamination occurred. While the nurses in the room were performing activities, the buffer zone nurse was reviewing the patient decontamination chart on the wall to ensure that no steps were missed or performed out of sequence. The nurses at the buffer zone exit logged results and ensured the nurses were reminded to change gloves, remove potentially contaminated materials, and check dosimetry. Communications within the room and between the personnel in the interior and exterior of the room were very good and all personnel coordinated their actions.

One nurse properly demonstrated how to remove their protective clothing and exit the radiation emergency area. Hospital personnel performed all activities in accordance with their plans and procedures.

For this capability the following radiological emergency preparedness criteria were met: 1.a.1, 1.e.1, 3.a.1, 6.d.1.

a. **Level 1 Finding:** None

b. **Level 2 Finding:** None

c. **Not Demonstrated:** None

d. **Prior Level 2 Findings – Resolved:** None

e. **Prior Level 2 Findings - Unresolved:** None

### 3.3.3.2 Jeff Davis County, Georgia

#### 3.3.3.2.1 Emergency Operations Center

**Operational Coordination Capability Summary:**

Jeff Davis County Emergency Management personnel demonstrated the ability to establish and maintain a unified and coordinated operational structure and process that appropriately integrated all county agencies, other risk counties, and the state. The emergency management director maintained direction and control and ensured all support agencies coordinated their actions. The mayor, county administrator, sheriff, and city clerk participated throughout the exercise and were involved in decision making and support.

Jeff Davis County Emergency Management Agency staff used effective procedures to alert, notify, and mobilize emergency personnel and activate facilities in a timely manner. Although personnel were pre-positioned outside the emergency operations center, the emergency management director demonstrated their primary and secondary notification systems. More than two communication systems were available, and all systems worked throughout the exercise. The emergency operations center had sufficient space, supplies, and equipment to support operations. Each staff position had a laptop computer and a position book that contained the county plans and checklists.

An electronic incident management system was used to maintain situational awareness and track resource requests. Status calls and discussions among the risk counties and state operations center concerning protective actions were coordinated using a dedicated conference bridge line. The emergency operations center had multiple communication systems that functioned during the exercise. The main communication system for receiving alerts from the utility experienced several lapses in communication ability

throughout the exercise. Emergency management staff had multiple devices available and were able to maintain communications. The commercial cell phone service was not functioning and created difficulties in communicating with outside agencies and county personnel. Staff were able to work around these obstacles and maintain operations. Sufficient equipment and supplies ensured emergency operations could be sustained for extended operations as required.

The emergency management director and operations officer conducted briefings and ensured staff were kept informed of all changes in plant status. The director coordinated all actions on conference calls and maintained situational awareness. When emergency classification changes would have required county actions, the director discussed the actions with the appropriate support agencies and ensured they could respond appropriately. Although potassium iodide would not be issued to the general public, it could be issued to emergency workers. It was determined that ingestion of potassium iodide for emergency workers was not necessary. The emergency management director ensured staff were aware of this decision.

Jeff Davis County did not have any people identified as having access and/or functional needs. However, the emergency management director and support agencies had resources available if citizens notified them they needed assistance. Jeff Davis County did not have any schools in the 10-mile emergency planning zone. The director and support agencies described how they would move school students and staff to support opening a shelter for evacuees.

Agency representatives were knowledgeable of appropriate dosimetry, potassium iodide, and procedures to ensure exposure control of emergency workers. Law enforcement representatives provided details on traffic control points and determining the impact of impediments on roads, such as analyzing the effect of closing the Ten Mile Bridge and how it would not influence county traffic flow. All staff members were knowledgeable and used checklists from county plans to ensure the safety of the public and emergency workers.

For this capability the following radiological emergency preparedness criteria were met: 1.a.1, 1.c.1, 1.d.1, 1.e.1, 2.a.1, 2.b.2, 2.c.1, 3.a.1, 3.b.1, 3.c.1, 3.c.2, 3.d.1, 3.d.2.

a. **Level 1 Finding:** None

b. **Level 2 Finding:** None

c. **Not Demonstrated:** None

d. **Prior Level 2 Findings – Resolved:** None

e. **Prior Level 2 Findings - Unresolved:** None

**Public Information and Warning Capability Summary:**

The county dispatched a public information officer to the joint information center and had a public information officer at the emergency operations center. There were four state news releases; the county emergency management director reviewed and approved the messages prior to their release. News releases were accurate and provided clear, consistent, and effective messages which informed the public as conditions changed.

The state and counties concurred on a protective action decision, activation of sirens, and transmitting an Emergency Alert System message. The state had the responsibility for these actions and would inform the county in the event of a siren failure. In this exercise, there were no siren failures thus backup notification was not demonstrated.

For this capability the following radiological emergency preparedness criteria were met: 5.a.1, 5.b.1.

a. **Level 1 Finding:** None
b. **Level 2 Finding:** None
c. **Not Demonstrated:** None
d. **Prior Level 2 Findings – Resolved:** None
e. **Prior Level 2 Findings - Unresolved:** None

### 3.3.3.2.2 Traffic Control Points

**On-Scene Security, Protection, and Law Enforcement Capability Summary:**

The ability to establish and maintain traffic control points was completed by interview. The City of Hazlehurst Police Officer interviewed was well-versed in the law enforcement aspects related to traffic control point establishment and management.

The City of Hazlehurst Police Officer exhibited knowledge of dosimetry, personal protective measures, and aspects related to the ingestion of potassium iodide. The officer was provided information that would assist in responding to queries from evacuees regarding reception and congregate care centers. Police officers would be equipped with both vehicle and handheld radio and cell phones. The emergency response vehicles and officers would have the necessary response and safety equipment.

The City of Hazlehurst Police Officer was conversant in identifying and resolving traffic impediments. Assistance in the clearance of impediments would be coordinated through the emergency operations center.

For this capability the following radiological emergency preparedness criteria were met: 1.a.1, 1.d.1, 1.e.1, 3.a.1, 3.d.1, 3.d.2.

a. **Level 1 Finding:** None

b. **Level 2 Finding:** None

c. **Not Demonstrated:** None

d. **Prior Level 2 Findings – Resolved:** None

e. **Prior Level 2 Findings - Unresolved:** None

### 3.3.3.3 Tattnall County, Georgia

#### 3.3.3.3.1 Emergency Operations Center

**Operational Coordination Capability Summary:**

Tattnall County Emergency Management officials successfully demonstrated the ability to respond to a radiological emergency at the Hatch Nuclear Plant and protect the safety of the general public and emergency workers. The emergency management director had multiple electronic notification methods to alert the staff to report to the emergency operations center. Throughout the exercise, the director gathered and analyzed pertinent emergency information, and made appropriate decisions. Periodic briefings kept the staff informed of emergency conditions and maintained internal coordination.

The emergency operations center had multiple communication systems to include computer internet access, electronic mail, commercial land lines, cell phones, and other handheld electronic devices. An electronic incident management system was used to maintain situational awareness and track resource requests. Status calls and discussions among Georgia Emergency Management and Homeland Security Agency and the other risk counties concerning protective action decisions were coordinated using a dedicated conference bridge line. Equipment and supplies on hand were sufficient to sustain emergency operations for an extended time.

Agency representatives were knowledgeable of appropriate dosimetry, potassium iodide, and procedures to manage radiological exposure of emergency workers. Law enforcement representatives provided details on the establishment of traffic control points and clearance of impediments. Staff members were knowledgeable and effectively used county checklists to protect the safety of the public and emergency workers.

For this capability the following radiological emergency preparedness criteria were met: 1.a.1, 1.c.1, 1.d.1, 1.e.1, 2.a.1, 2.b.2, 2.c.1, 3.a.1, 3.b.1, 3.c.1, 3.c.2, 3.d.1, 3.d.2.

a. **Level 1 Finding:** None

b. **Level 2 Finding:** None

c. **Not Demonstrated:** None

d. **Prior Level 2 Findings – Resolved:** None

e. **Prior Level 2 Findings - Unresolved:** None

**Public Information and Warning Capability Summary:**

Tattnall County Emergency Management Agency personnel demonstrated the ability to deliver prompt, reliable, and actionable information to the general public through coordination with the State of Georgia and the risk counties. The State of Georgia was responsible for the activation of sirens and the release of the Emergency Alert System message. In the event of a siren failure, Tattnall County would use a mass notification system to notify the general public.

The public information officer was assigned to the joint information center. The Georgia Emergency Management and Homeland Security Agency issued four news releases during the exercise; each was coordinated internally by the state and county directors prior to release. The release of public information was the responsibility of the joint information center.

For this capability the following radiological emergency preparedness criteria were met: 5.a.1, 5.a.3, 5.b.1.

a. **Level 1 Finding:** None

b. **Level 2 Finding:** None

c. **Not Demonstrated:** None

d. **Prior Level 2 Findings – Resolved:** None

e. **Prior Level 2 Findings - Unresolved:** None

### 3.3.3.3.2 Traffic Control Points

**On-Scene Security, Protection, and Law Enforcement Capability Summary:**

Through interview, Tattnall County Sheriff's Office deputies discussed their ability to establish and maintain traffic control points to support a radiological emergency at Hatch Nuclear Plant. The Tattnall County Sheriff's Office, with assistance from Tattnall County Public Works and Georgia State Patrol, would have sufficient equipment, maps,

and communication capabilities to conduct traffic and access control operations. Redundant communications would be available.

The Tattnall County Radiation Protection Officer provided the required radiological briefing to deputies prior to issuance of dosimetry and potassium iodide. This was completed using an emergency worker radiological briefing video from the Georgia Emergency Management and Homeland Security Agency. Deputies were made aware of the appropriate turn back values, recording of dosimetry readings, and the ingestion of potassium iodide.

The Tattnall County Sheriff's Office would be responsible for seven traffic and access control points. Assistance with their operation would be provided by the Georgia State Patrol. Debris removal and barricading equipment would be provided by the Tattnall County Public Works Department. The sheriff's office would attempt to clear any impediment and would seek assistance from the county public works department.

For this capability the following radiological emergency preparedness criteria were met: 1.a.1, 1.d.1, 1.e.1, 3.a.1, 3.d.1, 3.d.2.

a. **Level 1 Finding:** None

b. **Level 2 Finding:** None

c. **Not Demonstrated:** None

d. **Prior Level 2 Findings – Resolved:** None

e. **Prior Level 2 Findings - Unresolved:** None

#### 3.3.3.3.3 Emergency Vehicle Decontamination

**Environmental Response/Health and Safety Capability Summary:**

Emergency vehicle monitoring and decontamination for Tattnall County personnel in support of the Hatch Nuclear Plant was successfully demonstrated by Rogers State Prison firefighting personnel at the Jan Powell Fire Station located in Reidsville, GA. Two vehicles were processed through monitoring and decontamination using established plans and procedures. It was demonstrated that equipment, monitoring instruments, dosimetry, and potassium iodide were sufficient to support the monitoring and decontamination of emergency vehicles and equipment. Monitoring equipment and dosimetry were source checked appropriately prior to operational use and were checked for appropriate calibration dates. Radios were the primary form of communication, with supervision having cell phones for backup; they were operational throughout the demonstration without failure.

The Tattnall County Emergency Management Agency Director, serving as the radiological protection officer, successfully demonstrated the capability to issue appropriate dosimetry and potassium iodide in order to manage radiological exposure to emergency workers in accordance with plans and procedures. The use of a state-created video, along with additional information provided by the radiological protection officer, were effective in relaying pertinent information regarding dosimetry use and exposure limits. Emergency workers read their dosimeters at appropriate established intervals, and readings were recorded on the appropriate exposure record. Personnel assigned within the emergency vehicle decontamination site demonstrated the ability to maintain appropriate recordkeeping of the administration of potassium iodide, if necessary, to emergency workers. Emergency workers were able to communicate appropriate administrative limits as well.

As each vehicle approached the vehicle monitoring area, the vehicle's driver was stopped by a portal monitor worker acting as a "recorder," who requested and recorded the appropriate information on the form. It was noted that the individual acting as recorder followed the same vehicle from initial monitoring, through the entire decontamination process, which proved effective in the processing of the vehicles. The driver was instructed to proceed very slowly through the portal monitor, and both vehicles were hand-surveyed in accordance with procedures. The contaminated vehicle was decontaminated accordingly, and appropriate processes were demonstrated until the vehicle was clean. Though monitoring was performed in accordance with procedures, faster monitoring speeds could accelerate the process in order to place critical response vehicles back into service. Lack of supplies such as brushes, vacuum, etc., were noted; however, the emergency workers were able to successfully complete monitoring and decontamination. Both emergency workers were surveyed in accordance with procedures using proper techniques. Emergency workers requiring decontamination would be transported to North Tattnall Middle School, which was demonstrated during the reception and congregate care evaluation.

For this capability the following radiological emergency preparedness criteria were met: 1.e.1, 3.a.1, 3.b.1, 6.b.1.

a. **Level 1 Finding:** None

b. **Level 2 Finding:** None

c. **Not Demonstrated:** None

d. **Prior Level 2 Findings – Resolved:** None

e. **Prior Level 2 Findings - Unresolved:** None

### 3.3.3.3.4 Reception and Congregate Care Center

**Environmental Response/Health and Safety Capability Summary:**

Teachers and staff of North Tattnall Middle School participated in the reception, monitoring, and decontamination of evacuees and emergency workers in response to a radiological incident at Hatch Nuclear Plant. Equipment and monitoring instruments were sufficient to support emergency operations, and emergency worker exposure was appropriately managed within the facility. Displays and visual barriers were present within the initial monitoring area to guide evacuees and emergency workers; however, additional exterior displays and barriers leading to the entrance of the initial monitoring and decontamination facility would be useful.

The vehicle reception area was spacious and would be able to accommodate incoming traffic due to an evacuation. Individuals driving to the facility would park their vehicles in a secure lot controlled by law enforcement personnel. Vehicles would be held and monitored for contamination as time would allow. Though there was not an area designated for decontamination, there would be adequate space to establish a decontamination area. It was suggested that monitoring and decontamination of vehicles be arranged in order to avoid excess vehicle storage and potential spread of contamination. Individuals with access and/or functional needs would be assisted by medical personnel on site. One law enforcement personnel was present for the demonstration; there was no exterior signage in the parking lot or outside the buildings observed at the facility to guide evacuees and emergency workers.

Emergency workers were provided a safety and radiological briefing prior to beginning reception center operations. Dosimetry and simulated potassium iodide were provided, along with necessary documentation. Emergency workers were provided their exposure and contamination limits, and dosimetry was checked accordingly at the prompt of the radiological safety officer. Emergency workers were able to demonstrate the placement of monitoring instruments into service; workers were also aware of the proper wear of personal protective equipment.

Initial monitoring of evacuees was successfully demonstrated through the use of one portal monitor, which was verified to be sufficient to monitor the estimated evacuee population and emergency workers. The monitoring area was large enough to handle the portal monitor and separation of clean and contaminated evacuees. Clearly delineated lines with barrier rope allowed for cordoning of clean and contaminated individuals; those deemed clear of contamination were directed to a clean holding area, and those showing contamination were escorted to the appropriate locker room. Decontamination and additional monitoring in the locker room areas were demonstrated with challenges. Knowledge of exposure limits and potassium iodide were performed with challenges within the women's decontamination area.

For this capability the following radiological emergency preparedness criteria were met: 1.e.1, 3.a.1, 3.b.1.

For this capability the following radiological emergency preparedness criterion was NOT met: 6.a.1.

**a. Level 1 Finding:** None

**b. Level 2 Finding:** 031-19-6.a.1.-L2-01

**Criterion**: Support Operations/Facilities; Monitoring, Decontamination, and Registration of Evacuees. The reception center facility has appropriate space, adequate resources, and trained personnel to provide monitoring, decontamination, and registration of evacuees (Criterion 6.a.1).

**Condition:** During the reception center demonstration, emergency workers demonstrated incorrect monitoring and decontamination techniques; they were also unfamiliar with radiological exposure limits and the use of potassium iodide.

**Analysis:** Emergency workers did not demonstrate the ability to detect possible contamination and conduct proper decontamination of evacuees in order to avoid the spread of contamination. Inadequate handheld survey techniques resulted in the inability of emergency workers to find multiple areas of contamination. Small radioactive sources had been placed on the evacuees to simulate contamination. Emergency workers at the portal monitors clearly marked contamination forms with the location on the evacuee that alarmed the monitor. The emergency workers in the decontamination area did not use this information to focus their surveys on the affected areas. During the demonstration, some areas marked as potentially contaminated by the portal monitor were not monitored at all by the emergency workers in the decontamination area. This resulted in the decontamination area emergency workers declaring the evacuees decontaminated even though the small sources were still on the evacuees and should have alarmed the handheld survey meters. The sources were not detected because the emergency workers were not knowledgeable in survey techniques. The emergency workers held the survey meters too far away from the evacuee and moved the meter too fast.

Emergency workers did not survey personal items that evacuees placed in a plastic bag in the male decontamination area. The bag was allowed to be returned to the evacuee without any survey. If the items were contaminated and the evacuee put the items from the bag back on themselves, and then entered the general population, they could possibly spread contamination or re-contaminate themselves.

Evacuees, after simulated decontamination, were instructed to dress in protective clothing before being monitored for contamination. The protective clothing may prevent the survey instrument from detecting contamination on the evacuees. The plan stated that the evacuees should be monitored immediately after performing decontamination. The emergency workers performing the monitoring were not knowledgeable of the plan or of

the possible interference the protective clothing would provide. When monitoring the evacuees in the protective clothing the emergency workers did not conduct a whole-body survey. Even though a radioactive source was still on an evacuee's ankle the emergency worker conducting the survey declared the evacuee decontaminated. The evacuee was then released to enter the shelter.

Emergency workers were not familiar with their radiological exposure reporting limit, did not accurately record exposure readings on their exposure record, and did not attempt to contact the radiation protection officer to report readings of 0.2 R and higher. An exposure reading was reported as 115 on the emergency workers exposure record. When the evaluator asked for clarification, the worker indicated that it should be 0.115. The next 30-minute exposure reading on the worker's direct-reading dosimeter was 0.4 R which the worker struggled to accurately read without assistance. When the reading was recorded as 0.4 R the worker did not recognize that she should report the reading and did not know who to report the reading to. The radiation monitor consulted the laminated instruction card to find information on radiation exposure limits and was confused by the mix of units on the instruction card.

When questioned on the use of potassium iodide, workers were unfamiliar with how it worked or why they may be required to take it.

**Effect:** Though the evacuee who processed through the women's locker room for monitoring and decontamination was wearing two radioactive sources, she was determined to be clean and released for registration. In the male decontamination area, the evacuee was monitored in protective clothing after simulating decontamination. These monitoring activities were not demonstrated in accordance with plans and procedures. These actions could have resulted in the evacuees being released and spreading contamination.

Workers did not demonstrate that they could manage radiation exposure control for themselves, which could result in unnecessary and/or improperly documented radiation exposure to workers at this facility.

**References:**

1. DNR-EPD-ERP-9.0, Reception/Congregate Care Center Operations, Revision 8, July 15, 2019
2. Program Manual: Radiological Emergency Preparedness, FEMA P-1028 / January 2016.

**Recommendations:**

1. Provide additional and/or more frequent training sessions for workers who are issued dosimetry and tasked with performing contamination surveys.
2. Enlarge and print the diagram in the procedure that provided guidance for conducting a whole-body contamination survey for use as a visual prop for the emergency worker

to use while conducting a survey of an individual. Visual reminders could be helpful for emergency workers who do not perform these tasks on a regular basis.

3. Revise the laminated reminder card attached to the lanyard to provide consistent radiation exposure measurement units, in Roentgen (R), to match current procedures and the information provided in the emergency worker briefing.
4. Potassium iodide ingestion would typically not be recommended for workers stationed at a reception center, which is purposely located outside of the 10-mile emergency planning zone; therefore, it is recommended to remove it from emergency worker kits for this location.

Schedule of Corrective Actions:

The Federal Emergency Management Agency REP staff has worked with the State of Georgia on the development of a schedule of corrective actions to address the level 2 finding. Among the corrective actions planned are to: review and update reception center plans and procedures; provide additional training to remedy the challenges observed with the staff of the Tattnall County Middle School; and the development of visual aids to provide immediate guidance to emergency workers. The state and Tattnall County plans to demonstrate the correction of this finding during the spring of 2020.

**c. Not Demonstrated:** None

**d. Prior Level 2 Findings – Resolved:** None

**e. Prior Level 2 Findings - Unresolved:** None

**Mass Care Services Capability Summary:**

Registration of evacuees was successfully demonstrated by a Tattnall County employee, and the ability to provide temporary care and sheltering of evacuees was successfully demonstrated by the disaster workforce program manager from the American Red Cross. Prior to registration and/or sheltering, each evacuee was required to present a Monitoring/Decontamination Form to provide proof that he or she was free of contamination. Mass care services, to include sheltering and feeding, would be provided in accordance with American Red Cross shelter procedures. The facility had abundant space and reasonable accommodations for the expected evacuee population. The American Red Cross representative, along with the Tattnall County employee, were able to explain the importance of ensuring evacuees were clear of contamination prior to allowing admittance to the shelter. A trailer brought to the facility demonstrated that supplies would be available as necessary to meet the needs of the general public. Any shortages in supplies would be coordinated through the county emergency operations center and the regional program manager from the American Red Cross.

For this capability the following radiological emergency preparedness criteria were met: 6.c.1.

a. **Level 1 Finding:** None

b. **Level 2 Finding:** None

c. **Not Demonstrated:** None

d. **Prior Level 2 Findings – Resolved:** None

e. **Prior Level 2 Findings - Unresolved:** None

### 3.3.3.4 Toombs County, Georgia

#### 3.3.3.4.1 Emergency Operations Center

**Operational Coordination Capability Summary:**

The Toombs County Emergency Management Agency staff successfully demonstrated the ability to notify and mobilize representatives of pertinent agencies to support an effective emergency response to a radiological incident at the Hatch Nuclear Plant. The emergency operations center was populated in a timely manner with all necessary entities to ensure the safety of the public. Radio and telephone equipment were adequate to provide dependable communications between responding local, state, and federal response assets. Back-up communication systems were available and were demonstrated to be operable. Communication links were established early in the exercise with all necessary response partners and were maintained throughout the exercise. The emergency operations center was equipped with sufficient maps, displays, and office supplies to facilitate an effectual overall response effort. Responding agencies had access to ample quantities of dosimetry, potassium iodide, and training materials to provide acceptable levels of radiological protection to their emergency workers.

The Toombs County Emergency Management Director successfully provided direction and control in the emergency operations center. He demonstrated this through decisions and coordination with state and county staff. The director managed situational awareness through the operations officer via frequent briefings to the emergency operations center staff. The director participated in decision line calls and coordinated protective action decisions with state and adjacent risk counties in a timely manner.

All precautionary and protective action recommendations were coordinated by the Georgia State Operations Center and agreed to by the risk counties. The precautionary actions included: recommendation for livestock be put on stored feed and water; don't consume crops/milk; relocation of access and functional needs and school children; restrict air and rail traffic as well as hunting and fishing; and river clearance. The protective action decision was to evacuate zones A, B5, and E5. Additionally, emergency workers were ordered not to ingest potassium iodide. The public notification process included the Georgia State Operations Center's simulated activation of the fixed siren system and the broadcast of an Emergency Alert System with instructions to the affected populace.

The Toombs County Emergency Management Director maintained a list of persons with disabilities and those with access/functional needs. This list included specific needs for each of the individuals identified. The director discussed the process for care and transport of these persons. He explained the notification process, relocation procedures, and the coordination between the American Red Cross and the Toombs County Sheriff's Office to notify and transport the access and functional needs people.

The State of Georgia's policy is to not issue potassium iodide to the general public. Toombs County had no institutionalized individuals within the 10-mile emergency planning zone. Toombs County schools were evaluated during out of sequence activities for this exercise and relevant interviews were conducted. During the exercise, the Toombs County School Superintendent was present in the emergency operations center and simulated contacting the principal of Toombs Central Elementary, the only county school located within the 10-mile emergency planning zone. It was simulated that school students and staff were relocated utilizing county buses and drivers well in advance of a radiological release affecting the offsite population.

Toombs County emergency workers successfully demonstrated response and implementation of plans and procedures concerning public safety in and around the 10-mile emergency planning zone. The radiation protection officer provided an emergency worker video briefing addressing radiological exposure control, exposure action levels, potassium iodide, equipment usage, and exposure tracking. The Toombs County Sheriff's Office and the City of Vidalia Police Department explained their roles in establishing traffic and access control points to aid in the evacuation. They discussed their capability of impediment removal and priority of ensuring an open flow of traffic on major roadways surrounding the nuclear plant in accordance with plans and procedures. Each officer was knowledgeable in the management of traffic and access control.

Waterway clearance of the Altamaha river was demonstrated by interview with a Georgia Department of Natural Resources Law Enforcement emergency worker. The officer received an emergency worker briefing and was issued equipment prior to deployment for waterway clearance. The officer demonstrated skill in the use of issued equipment and was knowledgeable of primary and backup actions required to safely warn the public from the river without delay.

For this capability the following radiological emergency preparedness criteria were met: 1.a.1, 1.c.1, 1.d.1, 1.e.1, 2.a.1, 2.b.2, 2.c.1, 3.a.1, 3.b.1, 3.c.1, 3.c.2, 3.d.1, 3.d.2.

a. **Level 1 Finding:** None

b. **Level 2 Finding:** None

c. **Not Demonstrated:** None

d. **Prior Level 2 Findings – Resolved:** None

**e. Prior Level 2 Findings - Unresolved:** None

**Public Information and Warning Capability Summary:**

Toombs County successfully participated in the coordination of delivering prompt, reliable, and actionable public information. Primary public notification was simulated through a series of fixed sirens activated by the Georgia State Operations Center for the entire emergency planning zone which was in concurrence with the protective action decision. Public information messages were received and coordinated between the Toombs County Emergency Management Director and the Georgia Emergency Management and Homeland Security Agency liasion, both located in the Toombs County Emergency Operations Center. All messages were coordinated with and approved by the Toombs County Emergency Management Director with a sense of urgency. The Georgia Emergency Management and Homeland Security Agency liaison in the Toombs County Emergency Operations Center was the coordination link between the state and Toombs County.

The news releases and Emergency Alert System messages were culturally and linguistically accurate for public and news media dissemination. The audible and visual notification methods ensured the whole community was alerted with accurate and timely information in accordance with plans and procedures with a sense of urgency.

For this capability the following radiological emergency preparedness criteria were met: 5.a.1, 5.a.3, 5.b.1.

**a. Level 1 Finding:** None

**b. Level 2 Finding:** None

**c. Not Demonstrated:** None

**d. Prior Level 2 Findings – Resolved:** None

**e. Prior Level 2 Findings - Unresolved:** None

**Critical Transportation Capability Summary (Schools Interview):**

The Toombs Central Elementary School principal, along with the county school district's transportation director, discussed via interview the capability to implement precautionary actions for the 556 students, faculty, and staff. Further, knowledge was demonstrated through interview of their roles in relocation of students, faculty, and staff from Toombs Central Elementary School to Toombs Middle School. The principal of the school and the transportation director would be notified by the Toombs County Emergency Management Director or the Toombs County School District Superintendent of the decision to relocate student, faculty, and staff. Redundant communications systems would be used to facilitate communication among the school and transportation staff to aid in relocation. The school's automated messaging system would be used to notify

parents and guardians of the relocation; phone and email would be used as well. Though no access/functional needs students were enrolled at the time of the interview, appropriate accommodations would be available to transport those needing additional assistance. The number of buses and required drivers would be readily available to transport all students, staff, and faculty. Law enforcement support would be coordinated within the emergency operations center and available to assist in the relocation effort.

For this capability the following radiological emergency preparedness criteria was met: 3.c.2.

a. **Level 1 Finding:** None

b. **Level 2 Finding:** None

c. **Not Demonstrated:** None

d. **Prior Level 2 Findings – Resolved:** None

e. **Prior Level 2 Findings - Unresolved:** None

### 3.3.3.4.2 Traffic Control Points

**On-Scene Security, Protection, and Law Enforcement Capability Summary:**

The primary agency responsible for the direction and control of traffic in Toombs County during a radiological emergency at the Hatch Nuclear Plant would be the Toombs County Sheriff's Office. They would be assisted in this assignment by the Lyons Police Department and the Vidalia Police Department. The sheriff's office explained that they would be able to alert and mobilize their personnel in a timely manner. Law enforcement officers would possess redundant communications and safety equipment to establish traffic control points.

The interviewed deputies were issued dosimetry and received a thorough radiological briefing before deployment. They were aware of the need to limit radiological exposure. Both deputies were aware of the need to report to a decontamination site after mission completion and each discussed the ability to direct vehicular traffic. When given a hypothetical situation that would result in the blockage of evacuation routes, they were able to describe methods of clearance and were able to describe alternative routes or detours as necessary.

For this capability the following radiological emergency preparedness criteria were met: 1.a.1, 1.d.1, 1.e.1, 3.a.1, 3.d.1, 3.d.2.

a. **Level 1 Finding:** None

b. **Level 2 Finding:** None

c. **Not Demonstrated:** None

d. **Prior Level 2 Findings – Resolved:** None

e. **Prior Level 2 Findings - Unresolved:** None

# Section 4: Conclusion

Overall, the exercise was a success. All eight exercise objectives were met. No level 1 findings were noted; however, one level 2 finding was identified. The level 2 finding identified was in regard to emergency workers demonstrating incorrect monitoring and decontamination techniques and unfamiliarity with radiological exposure limits and the use of potassium iodide. Officials and representatives from the State of Georgia, the risk counties of Appling, Jeff Davis, Tattnall, and Toombs, as well as many other agencies and numerous volunteers, participated in the exercise. The state, county, response organizations, and volunteers demonstrated knowledge of their emergency response plans and procedures. The cooperation and teamwork of the participants was evident throughout all evaluated and training activities.

The risk counties of Appling, Jeff Davis, Tattnall, and Toombs, along with the State of Georgia, activated their emergency operations centers in accordance with plans and procedures, allowing for efficient direction and control as well as coordination throughout the response. Leadership's protective action decisions showed that protecting the health and safety of the public was of utmost importance. All jurisdictions demonstrated knowledge of their plan and procedures.

The Federal Emergency Management Agency wishes to acknowledge the efforts of the many individuals who participated and made this exercise a success.

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# Appendix A: Hatch Exercise Timeline

| Emergency Classification Level or Event | Time Utility Declared | Time That Notification Was Received or Action Was Taken | | | | | |
|---|---|---|---|---|---|---|---|
| | | SOC/ DOSE | APPLING COUNTY | JEFF DAVIS COUNTY | TATTNALL COUNTY | TOOMBS COUNTY | JIC |
| **Unusual Event** | N/A | N/A | N/A | N/A | N/A | N/A | N/A |
| **Alert** | 0850 | 0900 | 0857 | 0903 | 0858 | 0858 | N/A |
| **Site Area Emergency** | 1029 | 1037 | 1040 | 1037 | 1037 | 1039 | 1036 |
| **General Emergency** | 1153 | 1202 | 1203 | 1201 | 1203 | 1202 | 1158 |
| **Simulated Rad. Release Began** | 1029 | 1037 | 1037 | 1037 | 1037 | 1037 | 1036 |
| **Simulated Rad. Release Ended** | Ongoing | Ongoing | Ongoing | Ongoing | Ongoing | Ongoing | Ongoing |
| **Facility Operational** | 0923 | 0932 | 0925 | 1040 | 1103 | 0900 | 0931 |
| **State of Emergency** State | | 1040 | 1040 | 1040 | 1040 | 1040 | N/A |
| Local | | N/A | 1000 | N/A | 1206 | 1218 | 1300* |
| **Exercise Terminated** | | 1437 | 1405 | 1402 | 1407 | 1402 | 1403 |
| **Precautionary Actions:** Livestock on stored feed and water; don't consume crops/milk; AFN and school relocation; restrict air, rail, and river; hunter/logger clearance | | 1052 | 1052 | 1052 | 1052 | 1052 | 1115* |
| **Protective Action Decision:** Evacuate: A, B5, E5 | | 1219 | 1219 | 1219 | 1219 | 1219 | 1239* |
| **Siren Activation** | | 1225 | 1225 | 1225 | 1225 | 1225 | 1225 |
| **EAS Message** | | 1228 | 1228 | 1228 | 1228 | 1228 | 1228 |
| **KI Decision:** EWs do not ingest | | 1346 | 1346 | 1346 | 1346 | 1346 | 1346 |

***Denotes time which a decision has been messaged from the JIC***

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# Appendix B: Exercise Key Leaders and Evaluators

**Regional Assistance Committee (RAC) Chair:** Randall Hecht

**Section Chiefs:** J.T. Ackermann and Larry Robertson

**Site Specialist:** Elisabeth "Libby" Adkins

## 1. Evaluator Assignments, Out of Sequence:

| Location / Venue | Evaluation Team | Core Capability(ies) Evaluated |
|---|---|---|
| **Appling County** | | |
| Protective Actions for Schools (OOS) | Elisabeth Adkins | Critical Transportation |
| Medical Services Drill (OOS) | Elisabeth Adkins*<br>Joe Harworth<br>Quintin Ivy | Public Health, Healthcare, and Emergency Medical Services |
| **Tattnall County** | | |
| Emergency Worker Decontamination (OOS) | Elisabeth Adkins*<br>DeShun Lowery<br>Deb Blunt<br>Marcy Campbell | Environmental Response/Health and Safety |
| Reception Center & Congregate Care (OOS) | Elisabeth Adkins*<br>DeShun Lowery<br>Deb Blunt<br>Marcy Campbell | Environmental Response/Health and Safety; Mass Care Services |
| **Toombs County** | | |
| Protective Actions for Schools (OOS) | Elisabeth Adkins | Critical Transportation |

## 2. Evaluator Assignments, Exercise Day, October 22, 2019:

| Location / Venue | Evaluation Team | Core Capability(ies) Evaluated |
|---|---|---|
| **STATE OF GEORGIA** | | |
| State Operations Center | Matthew Bradley*<br>Gene Taylor (OJT)<br>Erica Houghton | Operational Coordination; Public Information and Warning |
| Emergency Operations Facility (EOF) | Kent Tosch | Operational Coordination |
| Joint Information Center (Vidalia) | Glenda Bryson*<br>P.J. Neid<br>Bob Princic | Public Information and Warning |
| Dose Assessment | John Fill | Situational Assessment |
| Field Monitoring Team | Deb Blunt<br>Marcy Campbell | Environmental Response/Health and Safety |
| Field Monitoring Team Coordinator (Toombs) | Jill Leatherman | Environmental Response/Health and Safety |
| **RISK COUNTIES** | | |
| **Appling County** | | |
| Emergency Operations Center | Michael Dolder*<br>Roy Smith<br>Tom Hegele | Operational Coordination; Public Information and Warning; On-Scene Security, Protection, and Law Enforcement |
| **Jeff Davis County** | | |
| Emergency Operations Center | Joe Harworth*<br>Robert Nash | Operational Coordination; Public Information and Warning; On-Scene Security, Protection, and Law Enforcement |
| **Tattnall County** | | |
| Emergency Operations Center | DeShun Lowery*<br>David Ortman | Operational Coordination; Public Information and Warning; On-Scene Security, Protection, and Law Enforcement |
| **Toombs County** | | |
| Emergency Operations Center | Gerald McLemore*<br>Lorenzo Lewis<br>Mark Dalton | Operational Coordination; Public Information and Warning; On-Scene Security, Protection, and Law Enforcement |
| Waterway Clearing (Interview) | Lorenzo Lewis | On-Scene Security, Protection, and Law Enforcement |

# Appendix C: Extent of Play Agreement

**EDWIN I. HATCH NUCLEAR POWER PLANT**
**EXTENT OF PLAY AGREEMENT**
**EMERGENCY PREPAREDNESS EXERCISE**

**OCTOBER 22, 2019**

All activities will be demonstrated fully in accordance with respective plans and procedures as they would be in an actual emergency. The Federal Emergency Management Agency (FEMA) Regional Office must receive these plans, guides and procedures at least 90 days before the exercise. This Extent of Play Agreement (EOPA) is written by exception. If it is not listed as an exception it will be demonstrated as described in the plans, standard operating guides (SOGs) and/or procedures (SOPs). Any issue or discrepancy arising during exercise play may be re-demonstrated if allowed by the Regional Assistance Committee (RAC) Chair or as listed herein. This allowance may be granted if it is not disruptive to exercise play and is mutually agreed to by the Offsite Response Organization (ORO) Exercise Controller and FEMA Evaluator. Some activities may be performed as a training-only opportunity, and are identified in the participant description.

**Core Capability: Operational Coordination**– State and county emergency operations centers (EOCs); emergency operations facility (EOF).

**Definition:** Establish and maintain a unified and coordinated operational structure and process that appropriately integrates all critical stakeholders and supports the execution of core capabilities.

**Capability Target: Emergency Operations Management**

**Performance Measure:** Procedures to alert and notify personnel will be demonstrated and personnel will respond only upon notification. Identified communications will be operational. Key personnel with leadership roles will provide direction and control. A particular facility's equipment and supplies must be sufficient and consistent with that facility's assigned role in the ORO's emergency operations plans. Specific equipment and supplies that must be demonstrated under this criterion include KI inventories, dosimetry, and monitoring equipment.

**Participants:** State of Georgia; Appling, Jeff Davis, Tattnall, & Toombs Counties

*Critical Task:* **OROs use effective procedures to alert, notify, and mobilize emergency personnel and activate facilities in a timely manner. (NUREG-0654/ FEMA REP-1, A.1.a, e; A.3, 4; C.1, 4, 6; D.4; E.1, 2; H.3, 4; Criterion 1.a.1)**

Pre-positioning of exercise participants will be allowed. However, exercise participants will not be allowed to report to their assigned duty station prior to receiving notification that the exercise has begun, and they are instructed to respond.

- State of Georgia in agreement with clarifications above.
- All participating counties, to include Appling, Jeff Davis, Tattnall, and Toombs are in agreement with clarifications above.

***Critical Task:*** Facilities are sufficient to support the emergency response. (NUREG-0654/ FEMA REP-1, G.3.a; H.3; J.10.h; J.12; K.5.b; Criterion 1.b.1)

The only facility required to be evaluated under Criterion 1.b.1 is the recently renovated State Operations Center, located at GEMA/HS Headquarters in Atlanta, GA., 935 United Avenue, Atlanta, GA.

- State of Georgia in agreement with clarifications above.

***Critical Task:*** Key personnel with leadership roles for the ORO provide direction and control to that part of the overall response effort for which they are responsible. (NUREG-0654/ FEMA REP-1, A.1.d, A.2.a, b; A.3; C.4, 6; Criterion 1.c.1)

State direction and control will be provided from the State Operations Center (SOC), located at GEMA/HS Headquarters in Atlanta, GA.

All participating counties to include, Appling, Jeff Davis, Tattnall, and Toombs will provide direction and control from their respective county EOCs.

- State of Georgia in agreement with clarifications above.
- All participating counties, to include Appling, Jeff Davis, Tattnall, and Toombs are in agreement with clarifications above.

***Critical Task:*** At least two communications systems are available, at least one operates properly, and communication links are established and maintained with appropriate locations. Communications capabilities are managed in support of emergency operations. (NUREG-0654/ FEMA REP-1, F.1, 2; Criterion 1.d.1)

GEMA/HS liaisons will be deployed to each participating county EOC and the Southern Nuclear EOF in Birmingham, AL. These liaisons will assist in communications and coordination between the SOC and multiple off-site response organizations.

- State of Georgia in agreement with clarifications above.
- All participating counties, to include Appling, Jeff Davis, Tattnall, and Toombs are in agreement with clarifications above.

***Critical Task:*** Equipment, maps, displays, dosimetry, KI, and other supplies are sufficient to support emergency operations. (NUREG-0654/ FEMA REP-1, H.7, 10; I.7, 8, 9; J.10.a, b, e; J.11, 12; K.3.a; K.5.b; Criterion 1.e.1)

Quantities of KI for emergency workers, Quantities of dosimetry, survey equipment, and their calibration/testing were verified during staff assistance visits (SAVs) identified below:

**Staff Assistance Visits:**

Appling County
Emergency Operations Center
259 West Parker Street
Baxley, GA 31513
Date: February 7, 2019
Time: 10:00 AM

Jeff Davis County
Emergency Operations Center
10 Public Safety Drive
Hazlehurst, GA 31539
Date: February 7, 2019
Time: 3:00 PM

Tattnall County
Emergency Operations Center
194 John O. Parker Drive
Reidsville, GA 30453
Date: February 6, 2019
Time: 10:00 AM

Toombs County
Emergency Operations Center
321 North West Broad Street
Lyons, GA 30436
Date: February 16, 2019
Time: 2:00 PM

- State of Georgia in agreement with clarifications above.
- All participating counties, to include Appling, Jeff Davis, Tattnall, and Toombs are in agreement with clarifications above.

**Capability Target: Protective Action Decision Making**

**Performance Measure:** ORO's demonstrate the capability to; assess and control the radiation exposure received by emergency workers; Radiological Assessment, Protective Action Recommendations, and Precautionary and/or Protective Action Decisions for the Plume Phase of the Emergency; and Precautionary and/or Protective Action Decision Consideration for the Protection of Persons with Disabilities and Access/Functional Needs.

**Participant:** State of Georgia

***Critical Task: OROs use a decision-making process, considering relevant factors and appropriate coordination, to ensure that an exposure control system, including the use of KI, is in place for emergency workers, including provisions to authorize radiation exposure in excess of administrative limits or PAGs.*** (NUREG-0654/FEMA REP-1, ***C.6; J.10.e, f; K.3.a; K.4;*** Criterion 2.a.1)

- State of Georgia in agreement

***Critical Task: A decision-making process involving consideration of appropriate factors and necessary coordination is used to make PADs for the general public (including the recommendation for use of KI, if ORO policy. (NUREG-0654/FEMA-REP- 1,*** A.3; C.4, 6; D.4; J.9; J.10.f, m; Criterion 2.b.2*)*

The State of Georgia, to include local counties, does not issue KI to the general public.

- State of Georgia in agreement with clarifications above.

**Participants:** Appling, Jeff Davis, Tattnall, & Toombs Counties

***Critical Task: OROs use a decision-making process, considering relevant factors and appropriate coordination, to ensure that an exposure control system, including the use of KI, is in place for emergency workers, including provisions to authorize radiation exposure in excess of administrative limits or PAGs.*** (NUREG-0654/FEMA REP-1, ***C.6; J.10.e, f; K.3.a; K.4;*** Criterion 2.a.1)

- All participating counties, to include Appling, Jeff Davis, Tattnall, and Toombs are in agreement.

***Critical Task: A decision-making process involving consideration of appropriate factors and necessary coordination is used to make PADs for the general public (including the recommendation for use of KI, if ORO policy). (NUREG-0654/FEMA-REP- 1, A.3; C.4, 6; D.4; J.9; J.10.f; m;*** Criterion 2.b.2*)*

The State of Georgia, to include local counties, does not issue KI to the general public.

- All participating counties, to include Appling, Jeff Davis, Tattnall, and Toombs are in agreement with clarifications above.

***Critical Task: PADs are made, as appropriate, for groups of people with disabilities and those with access / functional needs. (NUREG-0654/ FEMA-REP-1, D.4; J.9; J.10.d, e;*** Criterion 2.c.1)

- All participating counties, to include Appling, Jeff Davis, Tattnall, and Toombs are in agreement.

**Capability Target: Protective Action Implementation**

**Performance Measure**: Demonstrate the capability to implement emergency worker exposure control; KI decision for institutionalized individuals and the general public; protective actions for persons with disabilities and access/functional needs; schools; traffic and access control and impediments to evacuation.

**Participant:** State of Georgia

***Critical Task:*** Appropriate traffic and access control is established. Accurate instructions are provided to traffic and access control personnel. (NUREG-0654/FEMA REP-1, A.3; C.1, 4; J.10.g, j; Criterion 3.d.1)

State and/or local law enforcement personnel within each County EOC will demonstrate, by interview, that they are capable of selecting, establishing, and staffing appropriate traffic and access control points consistent with current conditions and PADs in a timely manner.

- State of Georgia in agreement.

***Critical Task:*** Impediments to evacuation are identified and resolved. (NUREG-0654/FEMA REP-1, J.10.k; Criterion 3.d.2)

- State of Georgia in agreement.

**Participants:** Appling, Jeff Davis, Tattnall, & Toombs Counties

***Critical Task: The OROs issue appropriate dosimetry, KI, and procedures, and manage radiological exposure to emergency workers in accordance with the plans/procedures. Emergency workers periodically and at the end of each mission read their dosimeters and record the readings on the appropriate exposure record or chart. Appropriate record-keeping of the administration of KI for emergency workers is maintained. (NUREG-0654/FEMA-REP-1, J.10.e, K.3.a, b; K.4; Criterion 3.a.1)***

This capability to be demonstrated during an RPO briefing to selected emergency workers within each County Emergency Operations Center (EOC). The RPO briefing may be conducted out-of-sequence.

Participating emergency workers will be available following the RPO briefing to demonstrate, by interview, that they understand the direction and guidance given by the RPO and how to use the equipment and documentation they have been issued.

The GEMA/HS RPO Video may be used to supplement the local RPO Briefing.

- All participating counties, to include Appling, Jeff Davis, Tattnall, and Toombs are in agreement with clarifications above.

***Critical Task:*** KI and appropriate instructions are made available in case a decision to recommend use of KI is made. Appropriate record keeping of the administration of KI for institutionalized individuals and the general public are maintained. (NUREG-0654/FEMA REP-1, J.10.e, f; Criterion 3.b.1)

The State of Georgia, to include local counties, does not issue KI to the general public.

There are no institutionalized individuals with the Plant Hatch 10-Mile EPZ.

The recommendation to administer KI to emergency workers is provided by the State of Georgia Radiological Emergency Coordinator (REC) to GEMA/HS, by agreement with the Georgia Department of Public Health. The decision to administer KI is coordinated by GEMA/HS with the affected County EMAs. This coordination takes place over the conference bridge line. The administration of KI is the responsibility of the local EMA.

- All participating counties, to include Appling, Jeff Davis, Tattnall, and Toombs are in agreement with clarifications above.

***Critical Task:*** PADs are ***implemented for people with disabilities and those with access/functional needs other than schools within areas subject to protective actions. (NUREG-0654/FEMA-REP-1, J.10.c, d, e, g;*** Criterion 3.c.1)

Demonstration regarding implementation of protective actions for special populations will be demonstrated by interview within each county EOC by local Human Services representatives and/or local EMA officials.

- All participating counties, to include Appling, Jeff Davis, Tattnall, and Toombs are in agreement with clarifications above.

***Critical Task: OROs/school officials implement protective actions for schools. (NUREG-0654/FEMA-REP-1, J.10. c, d, e, g;*** Criterion 3.c.2)

There are no schools in Jeff Davis or Tattnall Counties within the Plant Hatch 10-mile EPZ. School system interviews for Appling and Toombs Counties were conducted during their scheduled Staff Assistance Visit (SAV).

Appling County
Emergency Operations Center
259 West Parker Street
Baxley, GA 31513
Date: February 7, 2019
Time: 10:00 AM

Toombs County
Emergency Operations Center
321 North West Broad Street
Lyons, GA 30436
Date: February 6, 2019
Time: 2:00 PM

- All participating counties, to include Appling, Jeff Davis, Tattnall, and Toombs are in agreement with clarifications above.

***Critical Task:*** Appropriate traffic and access control is established. Accurate instructions are provided to traffic and access control personnel. (NUREG-0654/FEMA REP-1; A.3; C.1, 4; J.10.g, j; Criterion 3.d.1)

Traffic and access control will be demonstrated by interview within each county EOC by local law enforcement agency representatives and/or local EMA officials.

- All participating counties, to include Appling, Jeff Davis, Tattnall, and Toombs are in agreement with clarifications above.

***Critical Task:*** Impediments to evacuation are identified and resolved. (NUREG-0654/FEMA REP-1, J.10.k; Criterion 3.d.2)

Demonstration regarding impediments to evacuation will be demonstrated within each county EOC by law enforcement agency representatives and/or local EMA officials.

- All participating counties, to include Appling, Jeff Davis, Tattnall, and Toombs are in agreement with clarifications above.

**Core Capability: Public Information and Warning** – *State/County EOCs, and JIC*

**Definition:** Deliver coordinated, prompt, reliable, and actionable information to the whole community through the use of clear, consistent, accessible, and culturally and linguistically appropriate methods to effectively relay information regarding any threat or hazard and, as appropriate, the actions being taken and the assistance being made available.

**Capability Target: Emergency Notification and Public Information**

**Performance Measure**: *Sirens and the EAS system will be activated, if needed, in a timely manner to alert the general public along with waterway warning. Back up route alerting will take place in case of failure of the primary alert and notification system.*

**Participant:** State of Georgia

***Critical Task:*** Activities associated with primary alerting and notification of the public are completed in a timely manner following the initial decision by authorized offsite emergency officials to notify the public of an emergency situation. The initial instructional message to the public must include at a minimum the elements required by current FEMA REP guidance. (NUREG-0654/FEMA REP-1, E.5, 6, 7; Criterion 5.a.1)

- State of Georgia in agreement.

***Critical Task:*** OROs provide accurate emergency information and instructions to the public and the news media in a timely manner. (NUREG-0654/FEMA REP-1, E.5, 7; G.3.a; G.4.a, c; Criterion 5.b.1)

- State of Georgia in agreement.

**Participants:** Appling, Jeff Davis, Tattnall, & Toombs Counties

***Critical Task:*** Activities associated with primary alerting and notification of the public are completed in a timely manner following the initial decision by authorized offsite emergency officials to notify the public of an emergency situation. The initial instructional message to the public must include at a minimum the elements required by current FEMA REP. (NUREG-0654/FEMA REP-1, E.5, 6, 7; Criterion 5.a.1)

The Plant Hatch Emergency Planning Zone ANS is composed of a primary and back-up component. The primary component is an Outdoor Siren Warning System and the

Emergency Alert System (EAS). Activation of the sirens and EAS will be simulated up to the point of transmission. The back-up component is a reverse 911 calling system, Code Red.

- All participating counties, to include Appling, Jeff Davis, Tattnall, and Toombs are in agreement with clarifications above.

***Critical Task:*** Backup alert and notification of the public is completed within a reasonable time following the detection by the ORO of a failure of the primary alert and notification system. (NUREG-0654/FEMA REP-1, E.6; Appendix 3.B.2.c; Criterion 5.a.3)

A demonstration, by interview, of the reverse 911 calling system, Code Red, will be provided in each EOC / Warning Point by local EMA personnel.

- All participating counties, to include Appling, Jeff Davis, Tattnall, and Toombs are in agreement.

***Critical Task:*** OROs provide accurate emergency information and instructions to the public and the news media in a timely manner. (NUREG-0654/FEMA REP-1, E.5, 7; G.3.a; G.4.a, c; Criterion 5.b.1)

Participating counties may deploy Public Information Officers (PIOs) to the Joint Information Center (JIC), located in Vidalia, Georgia. These individuals will serve as information liaisons between their respective county, the State of Georgia, and utility participants at the JIC.

- All participating counties, to include Appling, Jeff Davis, Tattnall, and Toombs are in agreement with clarifications above.

**Participants:** Joint Information Center

***Critical Task:*** OROs use effective procedures to alert, notify, and mobilize emergency personnel and activate facilities in a timely manner. (NUREG-0654/ FEMA REP-1, A.1.a, e; A.3, 4; C.1, 4, 6; D.4; E.1, 2; H.3, 4; Criterion 1.a.1)

***Critical Task:*** At least two communications systems are available, at least one operates properly, and communication links are established and maintained with appropriate locations. Communications capabilities are managed in support of emergency operations. (NUREG-0654/ FEMA REP-1, F.1, 2; Criterion 1.d.1)

***Critical Task:*** Equipment, maps, displays, dosimetry, KI, and other supplies are sufficient to support emergency operations. (NUREG-0654/ FEMA REP-1, H.7, 10; I.7, 8, 9; J.10.a, b, e; J.11, 12; K.3.a; K.5.b; Criterion 1.e.1)

***Critical Task:*** OROs provide accurate emergency information and instructions to the public and the news media in a timely manner. (NUREG-0654/FEMA REP-1, E.5, 7; G.3.a; G.4.a, c; Criterion 5.b.1)

County PIOs may choose to participate in media briefings or may choose to provide their county information to a State PIO for dissemination during a media briefing.

A minimum of one (1) media briefing will be conducted. Additional media briefings may be conducted based upon exercise play.

Media releases are posted to the SNC WebEOC portal and provided to the JIC for dissemination to media representatives.

- State of Georgia in agreement.
- All participating counties, to include Appling, Jeff Davis, Tattnall, and Toombs are in agreement.

**Core Capability: Environmental Response/Health and Safety**

**Definition:** Ensure the availability of guidance and resources to address all hazards including hazardous materials, acts of terrorism, and natural disasters in support of the responder operations and the affected communities.

**Capability Target: Protective Action Decision Making**

**Performance Measure:** *OROs authorized to send emergency workers into the plume exposure pathway EPZ must demonstrate a capability to assess and control the radiation exposure received by emergency workers and have a decision chain in place, as specified in the ORO's plans/procedures, to authorize emergency worker exposure limits to be exceeded for specific missions. As appropriate, OROs must demonstrate the capability to make decisions on the distribution and administration of KI as a protective measure for emergency workers.*

**Participants:** State of Georgia

***Critical Task:*** OROs use a decision-making process, considering relevant factors and appropriate coordination, to ensure that an exposure control system, including the use of KI, is in place for EWs, including provisions to authorize radiation exposure in excess of administrative limits or PAGs. (NUREG-0654/FEMA REP-1, C.6; J.10.e, f; K.3.a; K.4 Criterion 2.a.1)

- State of Georgia in agreement.
- All participating counties, to include Appling, Jeff Davis, Tattnall, and Toombs are in agreement.

**Capability Target: Protective Action Implementation**

**Performance Measure:** *OROs must demonstrate the capability to provide emergency workers (including supplemental resources) with the appropriate direct-reading and permanent-record dosimetry, dosimeter chargers, KI, and instructions on the use of these items.*

**Participants:** State of Georgia;

***Critical Task:*** OROs issue appropriate dosimetry, KI, and procedures, and manage radiological exposure to EWs in accordance with the plans/procedures. EWs periodically and at the end of each mission read their dosimeters and record the readings on the appropriate exposure record or chart. OROs maintain appropriate recordkeeping of the administration of KI to EWs. (NUREG-0654/FEMA REP-1, J.10.e, K.3.a, b, K.4; Criterion 3.a.1)

State of Georgia Field Monitoring Teams will be provided a Radiological Protection Officer (RPO) Briefing at the Fire Station adjacent to the Toombs County EOC. The RPO briefing may be conducted out-of-sequence.

Field Monitoring Team members will be available following the RPO briefing to demonstrate, by interview, that they understand the directions and guidance given by the RPO and how to operate the equipment and complete the paperwork they have been provided.

If the GEMA RPO video is used to augment the briefing, an RPO will be available to issue the materials and answer any questions.

- State of Georgia in Agreement

***Critical Task:*** KI and appropriate instructions are available if a decision to recommend use of KI is made. Appropriate record-keeping of the administration of KI for institutionalized individuals and the general public is maintained. (NUREG-0654/FEMA REP-1, J.10.e, f; Criterion 3.b.1)

The State of Georgia, to include local counties, does not issue KI to the general public.

- State of Georgia in Agreement

**Capability Target: Field Measurement and Analysis**

**Performance Measure:** *OROs must demonstrate the capability to deploy FMTs with the equipment, methods, and expertise necessary to determine the location of airborne radiation and particulate deposition on the ground from an airborne plume.*

**Participants:** State of Georgia

***Critical Task:*** Field teams (two or more) are managed to obtain sufficient information to help characterize the release and to control radiation exposure. (NUREG C.1; H.12; I.7, 8, 11; J.10.a; Criterion 4.a.2)

The State of Georgia will deploy two (2) Field Monitoring Teams that are managed to obtain sufficient information to help characterize the release and to control radiation exposure.

- State of Georgia in agreement.

***Critical Task:*** Ambient radiation measurements are made and recorded at appropriate locations, and radioiodine and particulate samples are collected. Teams will move to an appropriate low-background location to determine whether any significant (as specified in the plan and/or procedures) amount of radioactivity has been collected on the sampling media. (NUREG C.1; I.8, 9; H.12; J.10.a; Criterion 4.a.3)

The State of Georgia will deploy two (2) Field Monitoring Teams and equipment to determine the location of airborne radiation and particulate deposition on the ground from an airborne plume.

- State of Georgia in agreement with clarifications above.

**Capability Target: Support Operations and Facilities**

**Performance Measure:** *Radiological monitoring, decontamination, and registration facilities for evacuees and emergency workers must be set up and demonstrated as they would be in an actual emergency. For Reception Center and Congregate Care (RCCC), OROs conducting this demonstration must have one-third of the resources (e.g., monitoring teams/instrumentation/portal monitors) available at the facility (ies) as necessary to monitor 20 percent of the population within a 12-hour period; this would include adequate space for evacuees' vehicles. A minimum of six (6) evacuees must be monitored per station using equipment and procedures specified in the plans/procedures. The monitoring sequences for the first six simulated evacuees per monitoring team will be timed by the evaluators to determine whether the 12-hour requirement can be met. For EWD, monitoring of emergency workers does not have to meet the 12-hour requirement, however, appropriate monitoring procedures must be demonstrated for a minimum of two emergency workers and their equipment and at least one vehicle. Monitoring activities shall not be simulated;*

*decontamination of evacuees, emergency workers and vehicles may be simulated and conducted by interview. Provisions for separate showering and same-sex decontamination must be demonstrated or explained. The staff must demonstrate provisions for limiting the spread of contamination; these provisions may be partially simulated to conserve resources. In addition, for any evacuee and emergency worker found to be contaminated, procedures must be discussed concerning handling of potential contamination of vehicles and personal belongings.*

**Participant**: Tattnall County

***Critical Task:*** Equipment, maps, displays, dosimetry, KI, and other supplies are sufficient to support emergency operations. (NUREG-0654 H.7, 10; I.7, 8, 9; J.10.a, b, e; J.11, 12; K.3.a; K.5.b; Criterion 1.e.1)

- Tattnall County in agreement with exceptions above.

***Critical Task:*** OROs issue appropriate dosimetry, KI, and procedures, and manage radiological exposure to emergency workers in accordance with the plans/procedures. Emergency workers periodically and at the end of each mission read their dosimeters and record the readings on the appropriate exposure record or chart. Appropriate record-keeping of the administration of KI for emergency workers is maintained. (NUREG-0654 J.10.e, K.3.a, b, K.4; Criterion 3.a.1)

- Tattnall County in agreement.

***Critical Task:*** KI and appropriate instructions are made available in case a decision to recommend use of KI is made. Appropriate record keeping of the administration of KI for institutionalized individuals and the general public is maintained. (NUREG-0654 J.10.e, f; Criterion 3.b.1)

The State of Georgia, to include local counties, does not issue KI to the general public.

- Tattnall County in agreement with clarifications above.

***Critical Task:*** The reception center facility has appropriate space, adequate resources, and trained personnel to provide monitoring, decontamination, and registration of evacuees. (NUREG-0654 A.3; C.4; J.10.h; J.12; Criterion 6.a.1)

A total of eight (8) individuals will be processed through the Reception Center. Six individuals will represent evacuees from the public and the remaining will represent emergency workers. One female and one male will be identified as contaminated requiring demonstration of the decontamination process. The decontamination process will be simulated except for monitoring the individuals for radiological contamination using hand held survey meters. The removal of clothing and showering portions of the decontamination process will be simulated.

- Tattnall County in agreement with clarifications above.

***Critical Task:*** The facility/ORO has adequate procedures and resources to accomplish monitoring and decontamination of emergency workers and their equipment and vehicles (NUREG-0654 K.5.a, b; Criterion 6.b.1).

Tattnall County will conduct the following FEMA evaluated exercises out-of-sequence.

| | |
|---|---|
| Emergency Vehicle Decontamination | Reception Center / Congregate Care |
| Tuesday, October 8, 2019 | Tuesday, October 8, 2019 |
| 10:00 am | 3:00 pm |
| Reidsville State Prison Fire Station | North Tattnall County Middle School |
| 2658 Hwy 147 | 26189 Hwy 23 |
| Reidsville GA 30453 | Reidsville, GA 30453 |

Emergency Vehicle Decontamination Demonstration:
The PPE portion will include only turn-out pants and helmets worn by the emergency workers (firefighters). The remainder of PPE will be simulated. This due to expected high temperatures.

A minimum of two emergency vehicles will be processed through the emergency vehicle decontamination site. The decontamination process will be fully demonstrated, including water, with no simulations.

**Core Capability: Situational Assessment**

**Definition:** Provide all decision makers with decision-relevant information regarding the nature and extent of the hazard, any cascading effects, and the status of the response.

**Capability Target:** Protective Action Decision Making

**Performance Measure:** *OROs must have the capability to independently project integrated dose from projected or actual dose rates and compare these estimates to the PAGs. OROs must have the capability to choose, among a range of protective actions, those most appropriate in a given emergency.*

**Participants:** State of Georgia DNR-Environmental Radiation Program

***Critical Task: Appropriate PARs are based on available information on plant conditions, field monitoring data, and licensee and ORO dose projections, as well as knowledge of onsite and offsite environmental conditions. (NUREG-0654/FEMA-REP-1, I.10; Supp. 3;*** Criterion 2.b.1)

- State of Georgia in agreement with clarifications above.

**Core Capability: Critical Transportation**

**Definition:** Provide transportation (including infrastructure access and accessible transportation services) for response priority objectives, including the evacuation of people and animals, and the delivery of vital response personnel, equipment, and services into the affected areas.

**Capability Target: Protective Action Implementation**

**Performance Measure:** *Demonstrate the ability to implement PADs for schools.*

**Participant:** Appling and Toombs Counties

***Critical Task:*** OROs/School officials implement protective actions for schools. (NUREG-0654/ FEMA REP-1, J.10.c, d, e, g; Criterion 3.c.2)

There are no schools in Jeff Davis or Tattnall Counties within the Plant Hatch 10-mile EPZ. School system interviews for Appling and Toombs Counties were conducted during their scheduled Staff Assistance Visit (SAV).

| | |
|---|---|
| Appling County | Toombs County |
| Emergency Operations Center | Emergency Operations Center |
| 259 West Parker Street | 321 North West Broad Street |
| Baxley, GA 31513 | Lyons, GA 30436 |
| Date: February 7, 2019 | Date: February 6, 2019 |
| Time: 10:00 AM | Time: 2:00 PM |

- All participating counties, to include Appling and Toombs are in agreement with clarifications above.

**Core Capability: On-Scene Security and Protection**

**Definition:** Ensure a safe and secure environment through law enforcement and related security and protection operations for people and communities located within affected areas and also for all traditional and atypical response personnel engaged in lifesaving and life-sustaining operations.

**Capability Target: Protective Action Implementation**

**Performance Measure:** *Demonstrate the capability to select, establish and staff traffic control and access points; identify and resolve impediments to evacuation; distribute dosimetry and KI; and implement and manage EW exposure control.*

**Participants:** Appling, Jeff Davis, Tattnall, & Toombs Counties

***Critical Task:*** Equipment, maps, displays, monitoring instruments, dosimetry, KI, and other supplies are sufficient to support emergency operations. (NUREG-0654 H.7, 10; I.7, 8, 9; J.10.a, b, e; J.11, 12; K.3.a; K.5.b; Criterion 1.e.1)

- All participating counties, to include Appling, Jeff Davis, Tattnall, and Toombs are in agreement with clarifications above.

***Critical Task:*** OROs issue appropriate dosimetry, KI, and procedures, and manage radiological exposure to EWs in accordance with the plans/procedures. EWs periodically and at the end of each mission read their dosimeters and record the readings on the appropriate exposure record or chart. OROs maintain appropriate recordkeeping of the administration of KI to EWs. (NUREG-0654 J.10.e, K.3.a, b, K.4; Criterion 3.a.1)

- All participating counties, to include Appling, Jeff Davis, Tattnall, and Toombs are in agreement with clarifications above.

***Critical Task:*** Appropriate traffic and access control is established. Accurate instructions are provided to traffic and access control personnel. (NUREG-0654 A.3; C.1, 4; J.10.g, j; Criterion 3.d.1)

A DNR Law Enforcement Officer will participate at the Toombs County EOC during the exercise to discuss river clearance procedures. The DNR-LE Officer will have with him a trailered boat and all necessary equipment to conduct river clearance operations.

This interview at the Toombs County EOC will be on behalf of all four Plant Hatch counties.

- All participating counties, to include Appling, Jeff Davis, Tattnall, and Toombs are in agreement with clarifications above.

***Critical Task:*** Impediments to evacuation are identified and resolved. (NUREG-0654 J.10.k; Criterion 3.d.2)

Impediments to evacuation will be simulated.

- All participating counties, to include Appling, Jeff Davis, Tattnall, and Toombs are in agreement with clarifications above.

**Core Capability: Mass Care**

**Definition:** Provide life-sustaining and human services to the affected population, to include hydration, feeding, sheltering, temporary housing, evacuee support, reunification, and distribution of emergency supplies.

**Capability Target: Support Operations / Facilities**

**Performance Measure:** OROs establish congregate care centers based upon sheltering plan.

**Participant:** Tattnall County

***Critical Task:*** Managers of congregate care facilities demonstrate that the centers have resources to provide services and accommodations consistent with planning guidelines. Managers demonstrate the procedures to assure that evacuees have been monitored for contamination and have been decontaminated as appropriate before entering congregate care facilities. (NUREG-0654; J.10.h; J.12; Criterion 6.c.1)

Tattnall County will conduct the following FEMA evaluated exercise out-of-sequence.

Reception Center / Congregate Care
Tuesday, October 8, 2019
3:00 pm
North Tattnall Middle School
26189 Hwy 23
Reidsville, GA

Reception Center
All demonstrated activities within the Reception Center will be as identified in current plans and procedures.

Congregate Care
The North Tattnall County Middle School is a certified American Red Cross (ARC) shelter.

The shelter demonstration will include set up of the shelter registration process. The remainder of the shelter demonstration will be provided by interview during a walk thru of the North Tattnall Middle School facility. This walk thru will be led by the ARC Shelter Manager and the Tattnall County EMA Director.

An ARC supply trailer will be available on site for viewing of supplies used in an ARC shelter operation. Supply trailer equipment and supplies are for viewing only and will not be set up.

- Tattnall County in agreement with clarifications above.

**Core Capability: Public Health and Medical Services:**

**Definition:** Provide lifesaving medical treatment via Emergency Medical Services and related operations and avoid additional disease and injury by providing targeted public health, medical and behavioral health support, and products to all affected populations.

**Capability Target: Support Operations and Facilities**

**Performance Measure:** *Demonstrate the capability to transport contaminated injured individuals to medical facilities and provide medical services.*

**Participants:** Appling County EMA, Appling County EMS, Appling Healthcare System

***Critical Task:*** Equipment, maps, displays, dosimetry, KI, and other supplies are sufficient to support emergency operations. (NUREG-0654/ FEMA REP-1, H.7, 10; I.7, 8, 9; J.10.a, b, e; J.11, 12; K.3.a; K.5.b; Criterion 1.e.1)

***Critical Task:*** OROs issue appropriate dosimetry, KI, and procedures, and manage radiological exposure to emergency workers in accordance with the plans/procedures. Emergency workers periodically and at the end of each mission read their dosimeters and record the readings on the appropriate exposure record or chart. Appropriate record-keeping of the administration of KI for emergency workers is maintained. (NUREG-0654 J.10.e, K.3.a, b, K.4; Criterion 3.a.1)

Emergency workers will be provided a Radiological Protection Officer (RPO) Briefing at the Appling County EMS facility located at 412 Fair Street, Baxley, GA. The RPO briefing may be conducted out-of-sequence.

Emergency workers will be available following the RPO briefing to demonstrate, by interview, that they understand the directions and guidance given by the RPO and how to operate the equipment and complete the paperwork they have been provided.

If the GEMA RPO video is used to augment the briefing, an RPO will be available to issue the materials and answer any questions.

- Appling County in agreement with clarifications above.

***Critical Task:*** The facility/ORO has the appropriate space, adequate resources, and trained personnel to provide transport, monitoring, decontamination, and medical services to contaminated injured individuals. (NUREG-0654 /FEMA REP-1, F.2; H.10; K.5.a, b; L.1, 4; Criterion 6.d.1)

Appling County will conduct the following FEMA evaluated out-of-sequence exercise.

Medical Services Drill
Wednesday, August 21, 2019
8:00 am
Appling County EMS - 471 Fair St, Baxley, GA
Appling Healthcare - 163 E. Tollison Street
Baxley, GA

- Appling County in agreement with clarifications above.