



UNITED STATES  
NUCLEAR REGULATORY COMMISSION  
WASHINGTON, D. C. 20555

J.P. STOHR

RSS/BS

D. Collins

February 27, 1985

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MEMORANDUM FOR: J. Philip Stohr, Director  
Division of Radiation Safety and Safeguards  
Region II

FROM: David B. Matthews, Acting Chief  
Emergency Preparedness Branch  
Division of Emergency Preparedness  
and Engineering Response  
Office of Inspection and Enforcement

SUBJECT: FEMA EXERCISE EVALUATION REPORT FOR THE  
FARLEY NUCLEAR POWER PLANT

The enclosed memorandum from Richard W. Krimm, Assistant Associate Director, Office of Natural and Technological Hazards Programs, Federal Emergency Management Agency (FEMA), dated February 14, 1985 forwards the FEMA Region IV report of the joint emergency preparedness exercise held on November 28-29, 1984 at the Farley Nuclear Power Plant. The exercise involved full participation by two states in the plume exposure pathway emergency planning zone (EPZ) and three states in the ingestion exposure pathway EPZ.

FEMA finds that there were no deficiencies observed during the exercise and there continues to be reasonable assurance that appropriate protective measures can be taken to protect the public health and safety in the event of a radiological emergency.

It is recommended that you transmit the FEMA exercise report to the licensee and continue to coordinate with FEMA Region IV to ensure that offsite emergency emergency preparedness for the Farley Nuclear Power Plant is maintained.

*David B. Matthews*

David B. Matthews, Acting Chief  
Emergency Preparedness Branch  
Division of Emergency Preparedness  
and Engineering Response  
Office of Inspection and Enforcement

Enclosure:  
Memo to E. L. Jordan from  
R. W. Krimm dtd. 2/14/85

cc: See page 2

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Official Copy

J. Philip Stohr

-2-

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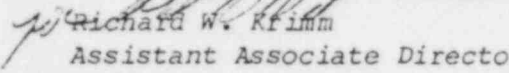


# Federal Emergency Management Agency

Washington, D.C. 20472

MEMORANDUM FOR: Edward L. Jordan  
Director  
Division of Emergency Preparedness  
and Engineering Response  
Office of Inspection and Enforcement  
U.S. Nuclear Regulatory Commission

FEB 14 1985

FROM:  Richard W. Krimm  
Assistant Associate Director  
Office of Natural and Technological  
Hazards Programs

SUBJECT: Exercise Report for the November 28-29, 1984, Exercise of  
the Offsite Radiological Emergency Preparedness (REP)  
Plans for the Farley Nuclear Power Plant (NPP)

Attached are two copies of the Exercise Report for the November 28-29, 1984, full participation joint exercise of the offsite REP plans for the Farley Nuclear Power Plant. The Farley NPP is located in the eastern part of Houston County, Alabama, near the Chattahoochee River. The exercise was the first of its kind, involving two States in the Plume Exposure portion, and three States in the Ingestion Pathway portion. States participating included Alabama and Georgia for all phases of the exercise, and Florida for only the Ingestion Pathway part. The local offsite jurisdictions that fully participated in the exercise were Houston and Henry Counties in Alabama, and Early County in Georgia, all located in the 10-mile plume emergency planning zone.

The exercise report was submitted by Region IV of the Federal Emergency Management Agency (FEMA). There were no NUREG-0654/FEMA-REP-1, Rev. 1 deficiencies observed during the exercise that require a schedule of corrective actions. However, there are several suggestions for improvement which are detailed in Section III of the Alabama (Part 1), Georgia (Part 2) and Florida (Part 3) portions of this report. In general, the suggestions deal with the fine tuning of operating procedures and the procurement of additional equipment to enhance the existing response capability.

FEMA Region IV staff will furnish a copy of this exercise report to the States of Alabama, Georgia, and Florida and will follow up with the three States on the areas identified for improvements.

Based on the results of the November 1984 exercise, there continues to be reasonable assurance that appropriate protective measures can be implemented by offsite jurisdictions around the Farley Nuclear Power Plant to protect the health and safety of the public in the event of a radiological emergency.

If you have any questions, please contact Mr. Robert S. Wilkerson, Chief, Technological Hazards Division, at 297-0200.

Attachment  
As Stated

85-2220059 1P

FARLEY NUCLEAR POWER PLANT

EXERCISE



**FEDERAL EMERGENCY  
MANAGEMENT AGENCY**

**REGION IV**

~~850222-0066~~  
85 pp





# Federal Emergency Management Agency

Region IV    1371 Peachtree Street, NE    Atlanta, Georgia 30309

FARLEY NUCLEAR POWER PLANT

EXERCISE

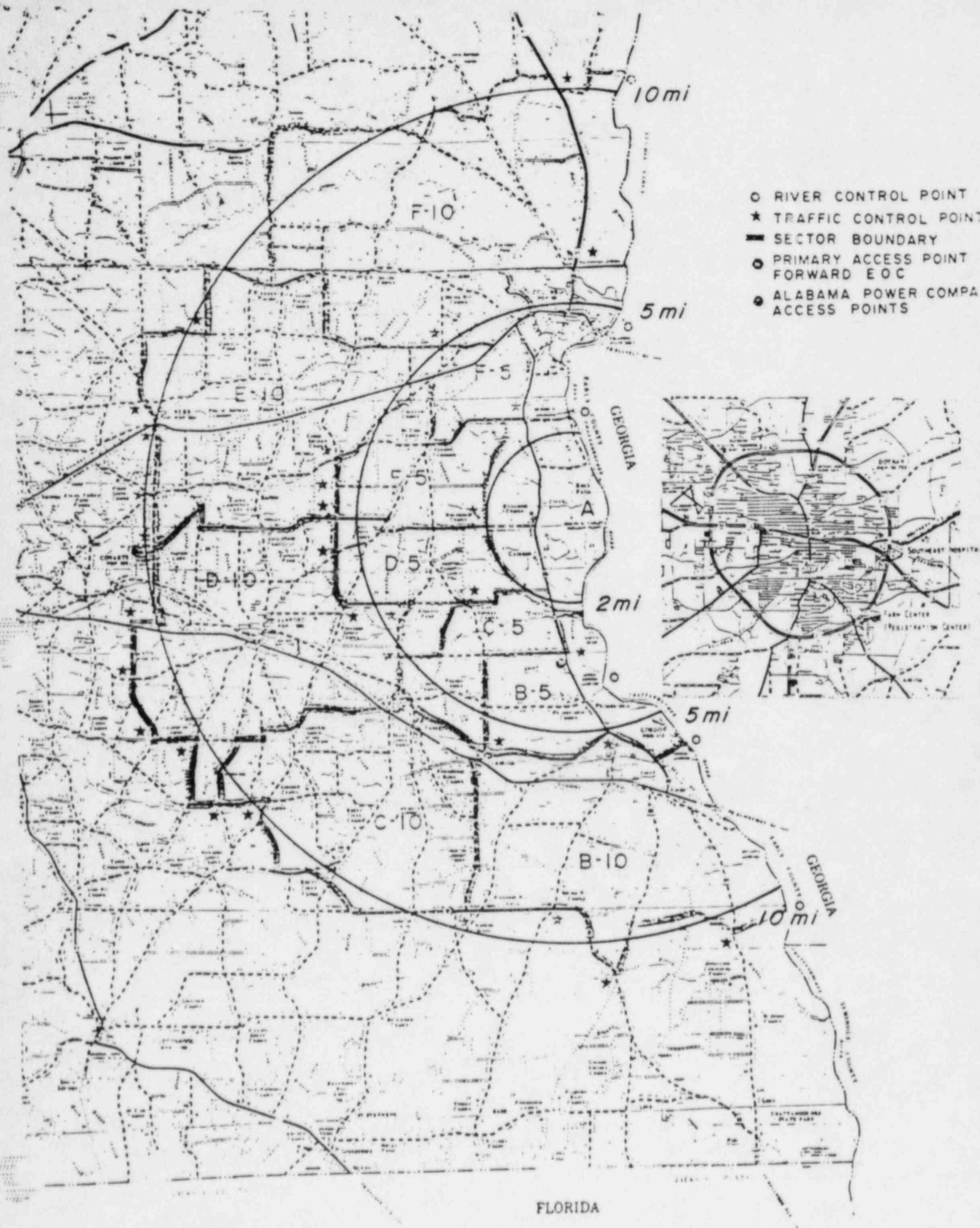
Conducted on November 28-29, 1984

Exercise Report December 13, 1984

Utility: Alabama Power Company  
Plant Location: In Houston County, Near Dothan, Alabama

Participating State and local governments:

State of Alabama  
State of Georgia  
State of Florida  
Counties of: Houston and Henry, Alabama  
County of: Early, Georgia  
County of: Jackson, Florida



ORC  
EARLY MEMORIAL  
HOSPITAL

10 MI

5 MI

2 MI

Plant  
Farley

Page 57

MAP 2  
EVACUATION ROUTES  
AND RECEPTION CENTER  
**EARLY**  
**COUNTY**  
**GEORGIA**

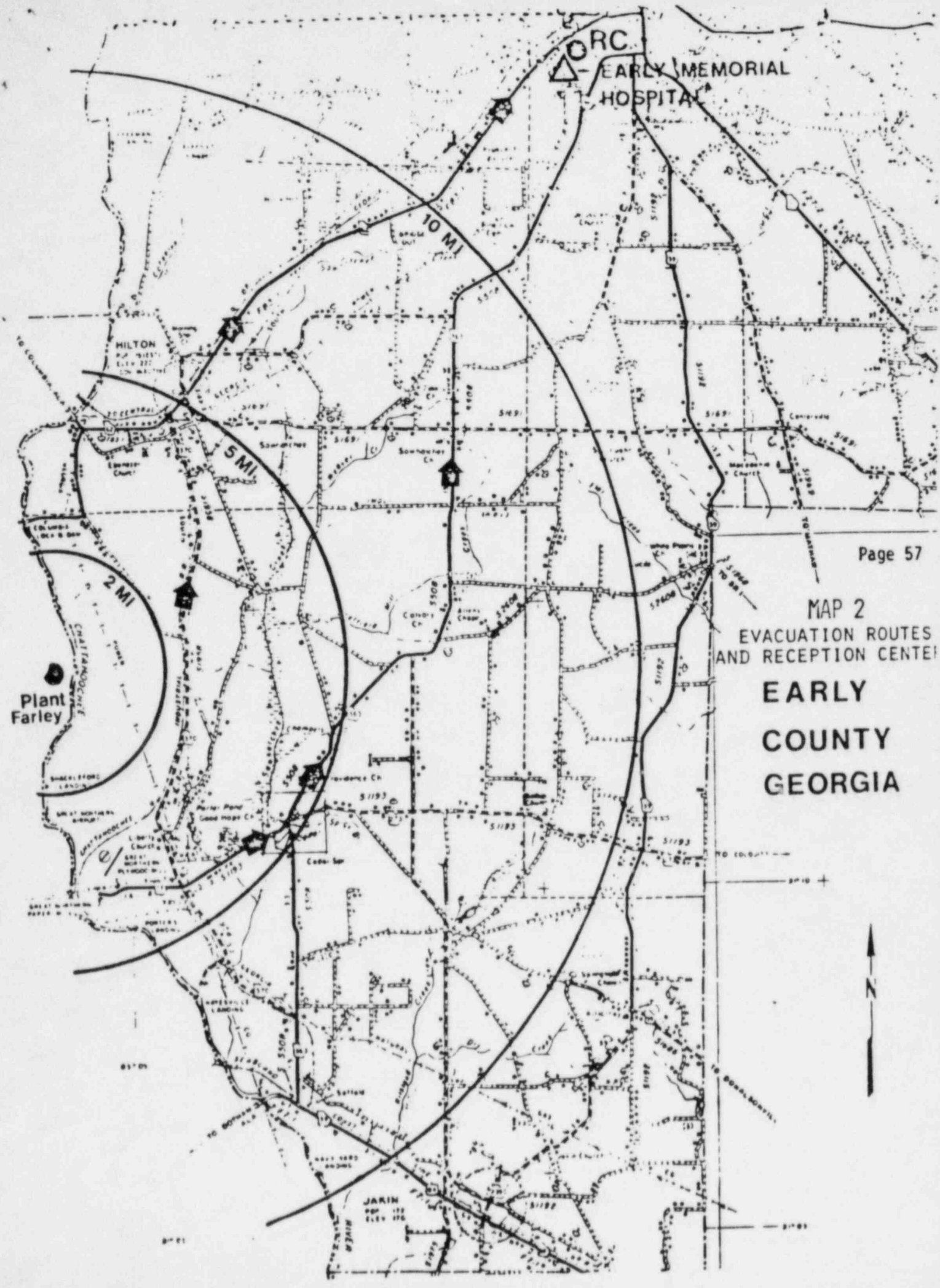


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- C. Exercise Scenarios
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## EXERCISE SUMMARY

This full participation exercise was conducted on November 28-29, 1984, and was observed by 24 Federal evaluators representing six Federal agencies. The exercise was the first of its kind, involving two States in the Plume Exposure portion, and three States (using FEMA approved criteria) in the Ingestion Pathway portion. States participating included Alabama and Georgia for all phases of the exercise, and Florida for the Ingestion Pathway part.

Farley Nuclear Power Plant is located in the eastern part of Houston County, Alabama, near the Chattahoochee River. The 10-mile Emergency Planning Zone (EPZ) extends into Early County, Georgia, and into Houston and Henry Counties, Alabama. Alabama, Georgia and Florida are involved in actions to be taken in the 50-mile Ingestion Pathway.

There were no NUREG-0654 deficiencies observed during the exercise activities. However, there are several suggestions for improvement which are detailed in Section III of the Alabama (Part 1), Georgia (Part 2) and Florida (Part 3) portions of this report. In general, the suggestions deal with the fine tuning of operating procedures and the procurement of additional equipment to enhance the existing response capability.

The following is a brief summary of the States' and counties' exercise activities.

### State Operations (Plume Exposure Pathway 10-Mile EPZ)

Alabama and Georgia both occupy a portion of the 10-mile EPZ around the Farley Nuclear Plant. Each State activated its State Emergency Operations Center located in the respective State capitals. In addition, both Alabama and Georgia established field headquarters. Alabama calls its field headquarters the Central Emergency Operations Center (CEOC), while Georgia calls its field headquarters the Forward Emergency Operations Center (FEOC). The CEOC was located in the basement of the Houston County Courthouse in Dothan, Alabama, and the FEOC was located in the Early County Jail Complex in Blakley, Georgia.

Both the CEOC and the FEOC operations demonstrated effective leadership and a very cooperative relationship during the exercise. Though limited, the CEOC and the FEOC both provided ample space for emergency operations. Georgia also sets up a mobile communications vehicle outside the FEOC. Both field headquarters were well equipped.

Radiological health activities in Alabama and Georgia included accident assessment and field monitoring teams. Alabama also established a field laboratory capability. Radiological Health

personnel in both States are well trained and professional. Communications with the field teams could be improved in each State.

Both State radiological health staffs have the health physics and reactor technology expertise and experience to properly evaluate nuclear reactor accidents and recommend optimum protective actions.

#### State Operations (Ingestion Pathway 50-Mile EPZ)

The 50-mile Ingestion Pathway affects three States; Alabama, Georgia and Florida. The second day, November 29, 1984, of the Farley Exercise was devoted to Ingestion Pathway activities, as required by 44 CFR 350.9(c)(4). FEMA approved criteria for this portion of the exercise may be found in Appendix E.

Since the Farley Nuclear Plant is located in the State of Alabama, more actions were required there than in Georgia or Florida. Alabama effectively demonstrated the gathering and analyzing of agricultural and milk samples. Georgia and Florida were permitted to simulate these activities.

Communications and coordination between all three affected States were excellent. This being the first Ingestion Pathway Exercise conducted in Region IV with established criteria, participation by all parties went extremely well. Objectives were met, and the ability to deal with long term problems was adequately demonstrated.

#### County Operations (Plume Exposure Pathway 10-Mile EPZ)

Two county EOC's were activated during the first day, November 28, 1984, of the Farley Exercise (Early County, Georgia and Houston County, Alabama). These EOC's were adequate in size and internal design, well-equipped, and functioned effectively. Leadership was professional and staffs were trained in all emergency response functions.

#### Outside Facilities and Activities

These local facilities and activities consisted of relocation centers, shelters, traffic control points, a forward command post in Houston County and a hospital/medical drill in Early County. All counties had an excellent level of participation of local staff and volunteers.

#### County Operations (Ingestion Pathway 50-Mile EPZ)

Activities at the local government level during the Ingestion Pathway portion of the exercise were minimal. Communications were tested, and in Alabama, soil, agricultural and milk samples were collected for analysis. Activities at the county level were well done and participation was good.

## PART 1 - ALABAMA

### I. DETAILED DISCUSSION

#### Introduction

The Farley Nuclear Plant is located in Houston County, Alabama, near the west bank of the Chattahoochee River. Approximately half of the 10-mile EPZ lies in Houston County, Alabama, while the other half lies in Early County, Georgia. The river separates the two counties and the two States.

When the 50-mile Ingestion Pathway is considered, several additional counties are affected in Alabama and Georgia. Also, within the 50-mile radius, to the south of the Farley Plant, is a portion of the State of Florida. The magnitude of this exercise was a first for Region IV, involving three States in Ingestion Pathway activities.

Criteria used to evaluate the first day of exercise play, November 28, 1984, which was the Plume Exposure portion of the exercise, are contained in the "Modular Format for Uniformity of Radiological Emergency Preparedness Exercise Observations and Evaluations" issued by FEMA in June 1983. FEMA approved criteria for Ingestion Pathway exercising are in Appendix "E" of this report, and were used to evaluate the second day of the exercise, November 29, 1984.

The Federal evaluators list, exercise objectives, scenario, and State and county resources used in the exercise are contained in the appendices in the last section of this report.

#### State of Alabama November 28, 1984 Plume Exposure Pathway 10-Mile EPZ State Emergency Operations Center (Montgomery)

Direction and control at the State EOC was effective and staff were generally aware of their responsibilities, demonstrating their ability to respond appropriately to the emergency situation.

Periodic briefings given by the Director of Operations and clear status boards helped EOC personnel remain up-to-date on plant status and protective action recommendations. Consideration might be given to having agency representatives periodically contribute to the briefings, describing the response activities of their respective agencies.

Staff were promptly activated as necessary and notification of other relevant organizations was expedient. Most agencies were represented at the EOC. A representative of the Governor's Office was present throughout the exercise, serving as liaison and demonstrating support for the program. A security guard effectively controlled access to the EOC.

Central Emergency Operations Center (CEOC) staff were dispatched (simulated due to pre-positioning) at the proper time. The shift change went smoothly, with the Director of Operations briefing incoming staff and suggesting individuals consult their counterparts for specific agency activities. Staff were generally knowledgeable about their roles. Copies of the plan and SOP's were available and referred to as needed. Although attempts were made to involve all agencies in play, due to the shift change, some individuals did not have the opportunity to exercise their knowledge. More injects would be helpful to maintain staff interest as well as to provide experience. Additional training is necessary to assure greater "depth" in staffing.

Communications were effective. Occasionally, back-ups had to be used, and they were satisfactory. The hard copy devices functioned well throughout the exercise. Message handling was adequate, although the process could be more efficient if streamlined.

#### State Public Health (Radiological Health EOC - Montgomery)

From "Unusual Event" to the declaration of a "General Emergency," the analysis of the reactor condition and the translating of this into potential off-site consequences was carried out in a very effective manner. All personnel performed their assignments in a professional fashion and according to established procedures. All equipment (radiological and communications) functioned well.

#### Emergency Operations Facility (EOF)

See EOF discussion in Georgia section of this report (page 17).

#### State Central Emergency Operation Center (CEOC)

Activation and staffing of the State CEOC was accomplished in a timely and efficient manner. A shift change was demonstrated at 1300 hours and all incoming personnel were briefed by the staff person they replaced. All members of the State CEOC appeared knowledgeable and familiar with operational procedures and policy issues. Representatives from the States of Florida and Georgia were present in the CEOC on both days of the exercise, and their presence added to the professional staff's management decisions.

Message handling procedures in the CEOC were adequate, and a detailed message log was kept. Access to the facility was controlled, and all participants wore identification badges. A copy of the Alabama Radiological Emergency Response Plan was available and written procedures were followed.

Communications were adequate during the exercise. The State CEOC is equipped with adequate telephones and an excellent radio system to the State EOC in Montgomery. One definite benefit is that the CEOC is co-located in the same facility with the Houston County EOC which permitted quick and efficient person to person



contact. In addition, the CEOC has available, complete RACES and other communication systems. Overall, CEOC communications equipment and utilization was adequate.

### Radiological Health Field Activities

Alabama radiological health field activities included three components - the State Radiological Monitoring and Assessment Center (SRMAC), field monitoring teams and the field laboratory. All three components of the radiological health response performed professionally and should be complimented on a job well done.

#### State Radiological Monitoring and Assessment Center (SRMAC)

Management of the SRMAC was effective and actions taken were in accordance with what is designated in the Plan. Briefings of the SRMAC staff were held every 30 minutes throughout the exercise. Message handling was efficient with logs kept and copies distributed to appropriate agencies.

The radiological field team dispatcher failed to brief the State teams during the exercise on plant conditions, protective actions and meteorological data. The dispatcher occasionally was unaware of field team locations.

The facility used by SRMAC personnel provided sufficient equipment, space and resources for proper performance of their assigned functions. Status boards and maps were generally appropriate and used. Overall, facilities and equipment were adequate.

Communications between the SRMAC and other necessary organizations and field activities were adequate. Primary and secondary links were available and demonstrated. Some communications with field teams in the area south of the plant were occasionally broken or difficult. This is apparently due to that area being of low elevation relative to the radio antenna at the assembly point.

Projected doses were made periodically using the Nuclear Regulatory Commission's IRDAM model on a Compaq computer and cross checking with an Alabama model on a Texas Instruments hand-held calculator. The projections were timely and correctly done. Field data was generally appropriate and considered in dose projections and protective action recommendations. Dose projection and protective action recommendations were very professionally and competently carried out.

#### Alabama Field Monitoring Teams

One local and two State teams were sent into the field. The teams did not thoroughly test their equipment before going into the field. Specifically, source checks of monitoring instruments and operational checks of the air samplers were omitted.

All teams received initial briefings. However, the local team received updates throughout the day, while the State teams received no additional information during the day.

Only two air samplers are available, which is insufficient for the number of teams in the field. There would be no back-up air sampler for the first two or three hours in the event of inoperative equipment. Additionally, the State team kits were supplied with only charcoal cartridges and not silver zeolite cartridges.

Houston County does not have adequate personnel to field more than one monitoring team. If one of the members were ill or on vacation, the county may not be able to field a team at all. Also, no predesignated vehicles are available for field teams. One team had to borrow a privately owned car for use during the exercise.

The State teams had some problems maintaining radio contact because of the terrain. However, they were able to move to higher ground or relay messages back to base when problems were encountered.

#### State Field Laboratory

The laboratory staff were capable and had considerable expertise. They are to be commended for their professionalism and abilities in performing the analysis. A few minor areas of concern were noted, primarily in the nature of field forms, which were difficult to interpret. Also, chain of custody procedures broke down on one occasion.

#### Media Center

News releases issued by the Alabama PIO were not always timely. For instance, AEMA news release Number 3, which announced an order to evacuate Zone A and in-place sheltering for Zones B-5 and C-5, was still being coordinated after Zone A was officially "completely evacuated." Conflicting information was also evident in both Alabama and Georgia news releases. The initial GEMA announcement stated that there had been a radiation release long before a release actually occurred. This error was not detected by Alabama staff but was finally brought to everyone's attention by the utility public information staff. AEMA news release Numbers 7 and 8 presented conflicting information to the public. Release Number 7 said residents of Zones D-5, E-5 and F-5 could return to their homes. Number 8, on the other hand, issued later, listed those same zones along with others and stated, "... re-entry will not be permitted until monitoring teams determine there is no radioactive contamination."

Throughout both phases of the exercise, State PIO staff failed to make the ENC an effective Joint Information Center to serve the media and the public. Alabama news releases were prepared on two different State agency letterheads, the AEMA and Department of Public Health. A "media hotline" was mentioned in one of Alabama's news



releases, but the "contact" name and phone number on the AEMA news releases continued to list also the AEMA PIO and his phone number. In addition, an Alabama Department of Health release listed still another number and contact name (who apparently was located in Montgomery). In any event, only one telephone was available for media call-in, an inadequacy which would surface very quickly in an actual accident situation. (Likewise, only one telephone was available for rumor control.) Simulated media calls for information and assistance from the Alabama PIO sometimes resulted in the (simulated) reporter being referred to other locations and agencies, a practice which would quickly undermine any effort to build the credibility and effectiveness of the ENC as an official information center.

During a media briefing, the Georgia PIO mistakenly named a zone as being ordered evacuated (J-5), was challenged by an Alabama spokesperson, but the Georgia PIO again confirmed it, and the media session ended without the error ever being corrected. The Alabama news releases used "sectors" instead of the correct nomenclature, zones, when referring to evacuations and sheltering.

The physical facilities (Northview High School) provided by Alabama Power Company (APCO) are superior, but only in terms of location and space which are so practical for an emergency news center. During this exercise, the use of those facilities was far short of effective. The Alabama PIO, the Georgia PIO, Rumor Control, Alabama Department of Public Health, a telecopier and one unidentified phone were all placed together in the space of two folding tables (on which the instruments rested). APCO was located across the room along the wall and also in a separate office, the door of which stayed closed to State ears. No attempt was ever made to bring the utility PIO staff together with the States' staffs during development and discussion of public information activities. Visual aids in the media briefing room were nonexistent until, during the question and answer session following the first (of two) media briefings, an APCO PIO retrieved a Zone map of the EPZ to assist the State spokesperson attempting to explain evacuated versus non-evacuated zones. No status charts were ever used. All media-use telephones were placed tightly together at one long table, the result of which would have been chaotic once the journalists began calling out and receiving calls.

As stated earlier, Rumor Control was given token attention by the provision of a single telephone with no one assigned to answer it. No efforts to coordinate the utility's hotline activities or those of the county EOC's were ever demonstrated.

### Houston County Operations

#### Houston County Emergency Operations Center

The Houston County Emergency Operations Center is well equipped and laid out for emergency operations. Communications equipment is

adequate. Activation and staffing proceeded appropriately, except for a minor problem contacting one agency. Emergency operations were effectively managed by the EMA Director and the EOC staff.

Public alerting and instruction were conducted in a timely manner. However, emergency instructions for the public need to be clearer and more informative. The content of instructional messages should better enable the public to determine if they are in the affected zone, and more clearly instruct them as to what actions to take. Note that such messages are already included in the State Plan, but need to be more fully used.

Appropriate actions were taken to implement the evacuation and supporting activities. Proper provisions were made for radiological protection of emergency workers. The county also provided appropriate general information to the media through their Public Information Officer (PIO).

Houston County acted appropriately to remedy deficiencies from the previous exercise, in keeping EOC staff informed and involved in exercise play.

#### Henry County

The Houston County Civil Defense Director is assigned responsibility, by the Alabama Radiological Emergency Response Plan, for any necessary emergency actions in Henry County. Therefore, no separate exercise activities by Henry County were played or evaluated.

#### Houston County Relocation Center

The Farm Center, designated as the reception center, provides adequate space for monitoring, decontamination and registering evacuees. Some concerns were expressed over the lack of heat in the wash down area for personnel. Plans have been developed to obtain portable heaters for this purpose.

Lack of traffic control, referred to in the last exercise report, was corrected with law enforcement personnel on site for this purpose.

Eleven volunteer evacuees were processed without confusion. However, time involved in monitoring and registering evacuees could be a problem, especially in inclement weather, if not properly addressed.

Personnel at the Houston County Reception Center demonstrated their ability to monitor personnel and vehicles. The space is ample, and the personnel participating displayed skills and abilities to adequately handle evacuees in an emergency.

#### Houston County Shelter Facility

The Wiregrass Recreation Center, used as a shelter, was equipped to handle the allotted number of evacuees. The State Department

of Pensions and Security and Red Cross personnel joined efforts to provide shelter for evacuees. Persons taking part in the exercise demonstrated ability to properly provide food and housing during a real emergency.

#### Traffic Control Points

The State, county and local officials have established procedures that are adequate to protect the public. The exercise demonstrated that the agencies charged with carrying out these procedures are capable of performing in an acceptable manner.

Signs installed at the public boat ramps on the river are well done and clearly instruct boaters concerning river evacuation.

The State has instituted a procedure to assure that the Federal Aviation Administration and the affected railroad companies are advised of an emergency condition.

#### November 29, 1984 Ingestion Pathway 50-Mile EPZ State Emergency Operations Center (Montgomery)

The Emergency Operations Center in Montgomery had limited agency participation during day two of the exercise. There were two representatives from the Department of Agriculture and Industry, one from the Department of Environmental Management, AEMA personnel, and the Governor's Representative.

Activity was limited, with only a couple of inquiries involving the Ingestion Pathway exercise. However, staff did state that they felt it was helpful to have the opportunity to discuss their respective responsibilities.

#### State Central Emergency Operations Center (CEOC)

The Ingestion Pathway portion of the exercise was conducted by CEOC personnel in a responsible and knowledgeable manner. Issues were coordinated with Florida and Georgia and all three States developed Ingestion Pathway recommendations. Detailed maps and charts were available which outlined areas affected and were used to determine sampling points. Sampling areas were determined based on radiological monitoring data.

Generally, the Ingestion Pathway portion of the exercise was demonstrated in an excellent manner.

#### Radiological Health Field Activities

Ingestion Pathway activities in Alabama involved the actual gathering and analysis of soil, milk and agricultural samples. The State Radiological Monitoring and Assessment Center, the field teams and the field laboratory all played active roles in this portion of the exercise.

## State Radiological Monitoring and Assessment Center

Protective actions, for both Plume and Ingestion Pathways, were timely, effective and appropriate. Coordination among States on these actions was effectively achieved.

Coordination of media releases pertaining to protective actions was timely and effective. Reentry and recovery operations were well thought out and appropriate for the scenario. Overall, operations of the SRMAC during both phases of the exercise were very professionally and competently managed.

### Field Monitoring Teams

All team members had TLD's and dosimeters. They have no anti-contamination clothing because they are not expected to go into an area where it would be necessary. Team members read, recorded and reported dosimeter readings appropriately.

All three field teams were instructed in procedures for gathering soil samples on the morning of the second day of the exercise. Each team was issued soil sampling equipment before they were dispatched to the field.

The State and local field monitoring teams performed adequately in both phases of the exercise.

### Ingestion Pathway Sampling

Coordination between the radiological health, milk and agricultural programs was adequate. Briefings were timely and complete.

Sample collection procedures were adequate. Sample identification and transfer to laboratory facilities could be enhanced by developing a common sample collection tag.

### State Field Laboratory

Soil and agricultural samples were received and properly analyzed at the field laboratory. Results were relayed to the Emergency Operations Center. All samples were screened in a timely and efficient manner.

A dedicated phone link or radio would be useful in a real emergency. Commercial lines might be tied up or overloaded, and therefore not usable in a crisis.

### Media Center

There was little effort expended by either State's PIO staff to synchronize their news releases and announcements to insure the public in both States were not confused or anxious. For instance,



Georgia provided no instructions for agricultural protective actions until 2½ hours after Alabama had issued similar instructions. This discrepancy illustrates the counterproductive nature of any attempt to divide the public information effort into two neatly separated endeavors. The audience is singular, and it is the resident and working population of the 10-mile EPZ and the 50-mile Ingestion Pathway. Emergency public information efforts of both Georgia and Alabama must be consolidated to prevent inauspicious differences in the information provided to the affected public, including Florida residents in the Ingestion Pathway.

The only county representation in the ENC both days was when the Houston County PIO attended the first media briefing. Florida never had representation. Media briefings were not ended with any announcement of when the next briefing would be held. There was no media contact list evident in the ENC to cover the media for the Ingestion Pathway or for the EPZ, or at least it was never consulted. Due to no one being assigned to monitor it, the telecopier produced one news release, from an unknown origin, but presumably the SEOC in Montgomery, which was never seen by any PIO in the ENC until the FEMA evaluator pointed it out at the end of day one.

#### Houston County Emergency Operations

##### Houston County Emergency Operations Center

Appropriate actions were taken to implement the evacuation and Ingestion Pathway protective actions. Forces were mobilized for alerting the public, performing aerial, water and ground surveys of the affected area. The county responded appropriately to requests for information and assistance during the recovery phase.

The scenario was adequate to task virtually all of the county agencies involved in the Plan, and to test areas of earlier deficiencies.

II. SUMMARY LISTING OF DEFICIENCIES

State of Alabama

NUREG 0654 Item

None

Houston County

NUREG 0654 Item

None



### III. SUGGESTED AREAS FOR IMPROVEMENT

#### State of Alabama

##### State Emergency Operations Center (Montgomery)

- Future scenarios should attempt to involve all agencies in exercise play. Due to the shift change, some individuals did not have the opportunity to exercise their knowledge.
- Continued training is necessary to assure greater "depth" in staffing.
- Message handling was adequate, although the process could be more efficient if streamlined.

##### State Central Emergency Operations Center (CEOC)

- Periodic briefings to update staff members should be conducted on a more frequent basis. On day one, only two briefings were conducted. However, on day two, more briefings were conducted.
- Efforts should be made to control the noise level during exercises.

#### Emergency Operations Facility

- See EOF suggestions for improvement in Georgia section of this report (page 23).

#### Radiological Health Field Activities

##### State Radiological Monitoring and Assessment Center (SRMAC)

- Additional training should be given to field team dispatchers on updating teams, deploying teams and alternative communications to teams.
- Some sort of team location plotting board might be helpful for the SRMAC.
- Additional antenna height might be considered for the SRMAC radio communications with field teams to enhance radio communications capability.

##### Alabama Field Monitoring Teams

- Initial briefings for field teams could be expanded and include more detail.
- Explicit instructions on equipment checking and testing should be included in the SOP's.

- Vehicles of adequate size and capable of entering expected areas should be provided.
- Additional monitoring and air sampling equipment might be considered in the future to provide backup.

#### Ingestion Pathway Sampling

- Sample identification and transfer to laboratory facilities could be enhanced by developing a common sample collection tag.

#### Alabama Field Laboratory

- Develop field data sheets to be used for sample collection information.
- Provide a log book for logging in samples to insure chain-of-custody is maintained.
- Have USGS maps available for laboratory staff.
- A radio or dedicated phone line is needed to the EOC rather than a commercial phone line.
- A metric/English system conversion table should be available for making conversions.

#### Media Center

- State and local government Public Information Officers from Alabama, Georgia and Florida should meet and discuss the development of the Media Center into a more efficient Joint Information Center.
- Plans and procedures should be developed together, with input from all three States and respective local governments.

#### Houston County Operations

##### Houston County Emergency Operation Center

- Procedures should be reviewed for contacting agencies (particularly State troopers) staffing the EOC.
- Forms and procedures for internal message handling should be reviewed.
- Emergency instructions released to the public should be more clear and informative.

Houston County Relocation Center

- Drills and practice sessions should be conducted aimed at speeding up time required to process evacuees at reception center.

Traffic Control Points

- Continued radiological training for emergency workers, especially for personnel assigned to traffic control points.
- Radio communications on the State net could be enhanced.

## PART 2 - GEORGIA

### I. DETAILED DISCUSSION

#### Introduction

Though the Farley Nuclear Plant is physically located in the State of Alabama, Georgia also has a major responsibility for emergency planning because approximately half of the 10-mile EPZ is located east of the Chattahoochee River, which separates the two States. The portion of the 10-mile EPZ that is located in Georgia is located in Early County.

Criteria used to evaluate the involvement of the State of Georgia and Early County in the Farley Nuclear Plant Exercise was the same as that used in Alabama. A list of evaluators and locations can be found in the appendices.

#### State of Georgia November 28, 1984 Plume Exposure Pathway 10-Mile EPZ State Emergency Operations Center (Atlanta)

The Georgia Emergency Management Agency (GEMA) Emergency Operations Center (EOC) was effectively activated and managed the initial response activities. The Operations Chief maintained control and command. No response capabilities were tested.

The GEMA EOC is adequate and could support a long term operation. Space and equipment is more than adequate to accommodate an emergency response.

Communications equipment is in place and functional. A 24-hour capability is maintained. Hard copy is available for transmission to all points of operation during the emergency. The Emergency Notification Network (ENN) was constantly monitored.

A Public Information Officer was available to coordinate news releases with the Near Site Media Center. The GEMA staff is trained and prepared to manage public information activities.

In summary, the GEMA EOC, Atlanta, performed all support role functions assigned. Most of the activity was in the communication area (ENN monitoring, FAX activity and telephones). Operations management, decision-making, communications and physical facilities (maps and charts included) were all well utilized.

### Emergency Operations Facility (EOF)

The State of Georgia dispatched one representative to the Farley EOF. This person was neither responsible for conducting accident assessment nor making decisions for the State. He simply served in a liaison capacity.

The State of Alabama was not represented at the licensees EOF.

After arriving at the EOF and obtaining a briefing from the Alabama Power Company's Recovery Manager, the Georgia representative established communications with the GEMA Forward Emergency Operations Center (FEOC). This liaison capability greatly facilitated overall coordination and the flow of communications between the Alabama Power Company and the State of Georgia.

### Georgia Forward Emergency Operations Center (FEOC)

Staffing of the Georgia State FEOC was completed promptly. The staff, equipment and graphic displays were transported to Early County by simulated helicopter. The EOC, which is usually a county detectives office, was quickly and efficiently transformed into the State FEOC. The facility was declared operational by 0930 EST. The facility was fully staffed and all personnel were well-trained and knowledgeable of their respective responsibilities. Twenty four hour staffing was simulated through the presentation of a data roster for 12-hour shifts. Liaison personnel were dispatched from Atlanta to the EOF and Early County EOC.

Command and control was effectively demonstrated. Although periodic briefings were not conducted, the management of the EOC was such that all personnel were aware of all actions and decisions. The Director and Governor's Representative involved everyone in decision-making. The level and intensity of play were outstanding and realistic. The most troublesome aspect of the Georgia EPZ involved the Great Southern Paper Mill and related industries. To affect effective protective actions, the State has developed contact with the company and a liaison was stationed at the FEOC.

All events were promptly received from the EOF within a few minutes of declaration. The information was received via the hotline by Georgia DNR/EPD. Protective actions were promptly formulated and coordinated between the States. The State promptly requested Federal assistance from DOE (Savannah River) in the form of radiological monitoring personnel and a laboratory technician to ensure round-the-clock support.

The physical facilities for the FEOC were adequate in all areas to support extended operations. Space was somewhat limited in the operations area, but was well-utilized. Back-up power was



available but generally considered inadequate to operate the State and county EOC as well as the jail. However, the Georgia National Guard (GNG) representative would be able to rapidly deploy back-up diesel generators to the facility if needed.

All necessary maps, charts and status boards were posted and well-used. Each was kept up-to-date with current events.

All primary and secondary communications to other Georgia and Alabama locations were demonstrated during the course of the exercise. No communication breakdowns to fixed locations were observed. However, considerable difficulty was observed in communicating with the field monitoring teams. Although this difficulty was observed during this exercise, acquisition of new equipment will likely overcome the problem and should be operational soon.

A full complement of agency phones and radios were also available in the States' DOD mobile command post.

All coordination with other Georgia locations, Florida, Alabama and the Federal government (DOE - Savannah River) was actually demonstrated to ensure phone numbers, physical equipment and official contacts could be depended upon.

Decision-making was realistically played with full consideration of plant, meteorological and plume EPZ sectors. Decisions were promptly formulated and distributed to all locations in a timely fashion. The tone alert radio system (PNS) was activated and verified. Broadcasts over PNS and EBS were monitored. All were implemented on time. EBS messages were actually hand-carried to the radio station just a few blocks away.

All staff members were issued high and low-range self-reading dosimeters. Record cards were maintained. No permanent record devices were available for issue. However, several staff members (GEMA, DNR/EPD) had their own agency-issued film badges.

KI was available and simulated tablets were issued to all staff with strict instructions. Proper procedures for authorization of KI, need for decontamination and avoiding exposure were discussed.

#### Georgia Radiological Field Monitoring Teams

The Georgia field monitoring teams were dispatched from the Forward Emergency Operations Center (FEOC) with equipment packed for prompt deployment, and demonstrated a timely response. They were quite well equipped with adequate vehicles and suitable radiation monitoring equipment. The inventory included survey meters and air sampling instrumentation with capability for local determination of iodine concentrations, as well as equipment for sampling of water and vegetation.



Technical operations were excellent. The main problem was in communications. One team was out of communication during most of the Plume Exposure exercise, and their results were unavailable for dose assessment.

Field team exposure control was adequate for State team members, but local members of the joint teams should have some introduction to exposure control procedures and equipment.

The Plume Exposure scenario was too short in duration, and too unchanging in terms of parameters such as wind direction. The radiation levels were too low to drive decisions on exposure control, KI use, or to provide a fully effective exercise for the field teams. In other aspects, it was acceptable.

#### Media Center

See Media Center comments in Alabama section of this report (page 6)

#### Early County Operations

##### Early County Emergency Operations Center

The physical facility housing the EOC is an improvement over the facility utilized in 1983, the last full-participation exercise. Displays and equipment have also improved since that last exercise.

Leadership and volunteer participation were excellent, and political interest was high. All but one of the newly-elected county and city officials visited the EOC during the course of the exercise.

Internal message-handling needs improvement. One should be able to follow the history of the exercise through a complete paper trail. All substantive messages should be accurately recorded.

To summarize, the Early County EOC facility, equipment and displays were a decided improvement over the 1983 full-participation exercise.

Leadership, direction and control, staff knowledge and participation, and political interest were excellent.

##### Reception Center and Shelter

Early County activated the local high school as a reception center and the elementary school as a shelter. Both facilities are adequate for these activities. Three people were processed through monitoring and registration and directed (transported) to shelter. Staff on hand clearly demonstrated a great deal of pre-planning. All participants were knowledgeable, interest level was high, and cooperation evident. The Department of Family and Children Services, as well as the American Red Cross volunteers, made an impressive demonstration. However, it is

believed that in a real emergency they would need the assistance of additional support groups as provided in the County Plan - i.e., Sheriff's Department, Police Department, Health Department, etc.

#### Early County Memorial Hospital

The emergency response staff of the Early County Memorial Hospital addressed the radiation contamination victim in a very professional manner.

The treatment room was properly prepared, the staff properly dressed, and necessary equipment was readily available. Patient handling was excellent and potential contamination was adequately controlled.

#### November 29, 1984 Ingestion Pathway 50-Mile EPZ

#### Georgia Emergency Operations Center (Atlanta)

The Georgia Emergency Operations Center, in Atlanta, performed adequately in a support role function.

#### Georgia Forward Emergency Operations Center

Recovery/reentry play was conducted in concert with the Ingestion Pathway exercise. A high level of play was observed. Decisions were based on the results of field measurements and sample analysis. Multi-media messages were drafted and disseminated based on careful consideration of long and short-term goals.

GEMA used the State of Georgia Warning Plan to alert and notify the 13 counties within the 50-mile EPZ who had not been notified during the course of the Plume Exposure exercise earlier. Verification that GSP Post G had implemented the notification was received at 1710 EST.

Communications were implemented with "real" test messages to Florida and Alabama as well as local agencies. Decision-making and recovery/reentry play were well-demonstrated. The staff played with high intensity of interest and realism. Coordination between Georgia and Florida was excellent. Decision-making was based on field measurements, sampling and laboratory results. Protective actions were carefully considered and implemented. EBS/multi-media messages were prepared indicating the necessary actions. All objectives of the Ingestion Pathway exercise were met. Representatives from the Georgia Department of Agriculture and the DNR/EPD worked well together and provided a strong demonstration of their capabilities.

### Field Monitoring Teams

Field monitoring teams were simulated during Ingestion Pathway portion of the exercise, in accordance with FEMA approved criteria for Ingestion Pathway exercising.

### Media Center

See Media Center comments in Alabama section of this report (page 10).

### Early County Emergency Operations

#### Early County Emergency Operations Center

Involvement of the Early County Emergency Operations Center was limited during the Ingestion Pathway portion of the exercise. Leadership, direction and control, staff knowledge and participation were excellent.

II. SUMMARY LISTING OF DEFICIENCIES

State of Georgia

NUREG 0654 Item

None

Early County

NUREG 0654 Item

None

### III. SUGGESTED AREAS FOR IMPROVEMENT

#### State of Georgia

##### State Emergency Operations Center (Atlanta)

- Provide more activity in the scenario, such as would occur during a real emergency.
- Staff the EOC with all other State agencies who would have assigned roles.
- Be alert to and track down the sources of incorrect information (i.e., "Site Alert" and "Shelter Zones" vs. Evacuate Zones).
- Additional training is recommended in Radiological Emergency Preparedness (REP) terminology.

##### Emergency Operations Facility (EOF)

- Both States, Alabama and Georgia, along with Alabama Power Company, should give consideration to the development and coordination of a policy, and associated implementing procedures, for ensuring that the States' monitoring team data are provided to the licensee's EOF in a timely fashion.
- The States of Alabama and Georgia should give serious consideration to dispatching at least one member of the Health Department to the Farley EOF. This action would optimize coordination, communications, and ensure that each of the States are in receipt of first hand emergency information in a timely fashion.

##### Georgia Forward Emergency Operations Center

- Improve procedures for overcoming communications "dead spots" with field monitoring teams.
- Ensure all players preface exercise messages with a statement indicating such.

##### Georgia Radiological Field Monitoring Teams

- Plume exposure scenarios should be of longer duration, incorporate larger release of more radionuclides, and exhibit more variability in release rate and wind direction to provide a more effective exercise for field teams.
- Improve radio communications between Georgia radiological field monitoring teams and Georgia Forward Emergency Operations Center.



### Media Center

- See suggestions for improvement in Alabama section of this report (page 14).

### Early County Operations

#### Early County Emergency Operations Center

- Internal communications and recording of messages and actions need improvement. All important actions and messages should be recorded.
- Status boards could have been more effectively utilized.

#### Reception Center and Shelter

- Monitoring of automobiles needs to be addressed. It is doubtful that: 1) evacuees will all arrive at Reception Center via bus; and 2) all evacuees will be content to leave autos at Reception Center parking lot, particularly those going to destinations other than shelters.
- It might be helpful to provide evacuees traveling to shelter via automobiles with a map. (One person picked at random in downtown Blakely was unsure as to the location of the elementary school.)
- More departmental participation is needed.
- A larger number of evacuees going through process would give participants more practice, and would be a more accurate indicator of preparedness.

#### Early County Memorial Hospital

- Since no Health Physicist was available, it would be helpful if several hospital staff were trained in more detail on instrument survey procedures.

## PART 3 - FLORIDA

### I. DETAILED DISCUSSION

#### Introduction

Florida would be involved in actions concerning the Farley Nuclear Plant if the Ingestion Pathway (50-mile EPZ) were affected. For this exercise, the second day of play was devoted to Ingestion Pathway activities. The radioactive materials supposedly released from the plant had deposited in a southerly direction down the Chattahoochee River potentially affecting the State of Florida in addition to Alabama and Georgia.

A great deal of coordination and cooperation was required on the part of all three States both before and during the exercises. Florida, along with Alabama and Georgia, is to be complemented on a job well done.

#### State of Florida November 29, 1984 Ingestion Pathway 50-Mile EPZ State Emergency Operations Center (Tallahassee)

The Florida support for the 50-mile Ingestion Pathway exercise for Plant Farley was excellent. Problem solving was effectively managed. Coordination between State agencies, as well as between States, was accomplished. Exercise play was adequate to demonstrate response capabilities for the 50-mile zone. All exercise objectives were accomplished. Twenty-three staff participated in the exercise representing five State agencies and one county.

The State EOC was effectively staffed and operations worked well. The status board was posted and message logs were kept. All staff were briefed as activities occurred. Maps were available, however, they were very difficult to use for plotting and tracking technical data. Better maps are needed.

Communications posed several problems. Communication links with local governments need to be improved and a back-up capability established for some. The State EOC also needs a more reliable communications link with the Media Center. An additional PIO at the Media Center would be helpful to keep Florida better informed.

Overall, the exercise play is to be commended, as the staff participating made every effort to play as real world as possible. The problem solving discussions were excellent, surfacing issues and questions which were difficult to resolve. The exercise was a beneficial training opportunity to test the Florida response plan for the Farley Nuclear Plant.

II. SUMMARY LISTING OF DEFICIENCIES

State of Florida

NUREG 0654 Item

None

### III. SUGGESTED AREAS FOR IMPROVEMENT

#### State of Florida

- Improve communication links with local governments that lie within the Farley Nuclear Plant 50-mile EPZ.
- Improved maps for tracking technical data are needed for use in the Florida Emergency Operations Center.
- A more reliable communication link is needed with the Near Site Media Center. Additional PIO staff in the Near Site Media Center would be helpful to keep the State better informed of media activities.

APPENDIX A

EVALUATOR LIST AND ASSIGNMENTS



FEDERAL EVALUATOR ASSIGNMENTS  
FARLEY NUCLEAR POWER PLANT EXERCISE  
November 27-30, 1984

GENERAL:

CHIEF OF EVALUATORS AND RAC IV CHAIRMAN  
Glenn C. Woodard, Jr. (FEMA)

MOBILE DURING EXERCISE ACTIVITIES  
Doug Hoell (FEMA)

NEAR-SITE MEDIA CENTER  
Jack Glover (FEMA)

FARLEY EMERGENCY OPERATIONS FACILITY (EOF)  
Robert Trojanowski (NRC)

TRAFFIC CONTROL POINTS AND EVACUATION ROUTES  
Al Hall (DOT)

ALABAMA:

EMERGENCY OPERATIONS CENTER (MONTGOMERY)  
Shana Aucsmith (FEMA)

CENTRAL EMERGENCY OPERATIONS CENTER (DOTHAN)  
John Heard (FEMA)  
Bob Conley (USDA)  
Tony Foltman (FEMA) - Dose Assessment/  
Radiological Health

FIELD LABORATORY (DOTHAN)  
Brad Eichorst (FDA/HHS) - Lab. and Mobile  
Terry Surles (FEMA)

RADIOLOGICAL FIELD MONITORING TEAMS  
Mark Collins (FDA/HHS)  
Karen Guziel (FEMA)  
Don Fingleton (FEMA)  
Loren Habegger (FEMA)  
John Alexander (DOE)

HOUSTON COUNTY EMERGENCY OPERATIONS CENTER (DOTHAN)  
Don Newsom (FEMA)  
Russell Yarbrough (FEMA)

GEORGIA:

EMERGENCY OPERATIONS CENTER (ATLANTA)

Brad Loar (FEMA)  
Cheryl Stovall (FEMA) (28th Only)

GEMA FORWARD EMERGENCY OPERATIONS CENTER (BLAKELY, GA)

Jim Levenson (FEMA)

RADIOLOGICAL FIELD MONITORING TEAM

Caroline Herzenberg (FEMA)

EARLY COUNTY EMERGENCY OPERATIONS CENTER (BLAKELY, GA)

Tom Hawkins (FEMA)  
Virginia Baker (FEMA)

FLORIDA:

EMERGENCY OPERATIONS CENTER (TALLAHASSEE)

Cheryl Stovall (FEMA) (29th Only)

EXERCISE OBSERVERS:

Gerard Smith (FEMA-Headquarters)  
Alexandra Tyron-Hopka (DOE)

APPENDIX B

EXERCISE OBJECTIVES

ALABAMA - PART 1

GEORGIA - PART 2

FLORIDA - PART 3

ALABAMA - PART 1

# ALABAMA

## 1984 FARLEY NUCLEAR PLANT EMERGENCY EXERCISE

NOVEMBER 29 & 30, 1984<sup>+</sup>

### I. Participating Organizations

State of Alabama and Houston County, Alabama (Full Scale)  
State of Georgia and Early County, Georgia (Full Scale)  
State of Florida (Full Scale Ingestion Pathway)  
Alabama Power Company (Full Scale)

### II. Purpose

- A. To meet the requirements of 10CFR50, Appendix E, 44CFR350.9 and NUREG-0654/FEMA-REP-1, Rev. 1.
- B. To conduct a full-scale exercise that will include the mobilization of Alabama Power Company, state and local personnel and resources adequate to verify the capability of participating organizations to respond to an accident scenario requiring response.

### III. Objectives

#### A. On-Site Objectives (Alabama Power Company)

1. Demonstrate that control room staff can assess the event, classify the event, take corrective measures to control the event and activate emergency response procedures.
2. Demonstrate that plant staff can activate and staff the Technical Support Center (TSC) and perform accident response activities including:
  - a. Dose assessment
  - b. Off-site notification and protective action recommendations.
  - c. Reclassification of emergency status.
  - d. Personnel accountability for all personnel on-site and evacuation of non-essential personnel.
  - e. Radiation Monitoring Team (RMT) dispatch and control.
  - f. Site access control and admittance of essential personnel.
  - g. De-escalation of emergency class.



\*A drill will be conducted on 11/28/84 to exercise specific portions\* of the APCo Emergency Plan. Plume Exposure and Ingestion Pathway activities will be tested on 11/29. Additional State Ingestion Pathway activities may be conducted on 11/30.

\*E.O.F. preparation (III.A.3) and corporate activation (B.1) will be simulated. These activities were successfully demonstrated in an annual exercise on 2/1/84 and will be tested in a drill on 11/28/84. On 11/29/84, the EOF staff will be instructed to report to the site one to two hours after the start of the exercise.

3. Demonstrate the capability to prepare the Emergency Operations Facility (EOF) in a timely fashion for use by the corporate staff upon arrival.
4. Demonstrate the capability to turnover EOF functions to the EOF staff when EOF is activated and staffed.
5. Demonstrate the capability to augment EOF staff with non-essential plant personnel.

L. Off-site Objectives (Alabama Power Company)

1. Demonstrate that corporate staff can be activated in a timely fashion and dispatched to FNP.\*
2. Demonstrate that Flintridge Emergency Operations Center (EOC) staff can provide initial support for:
  - a. EOF activation
  - b. Logistics
  - c. Support organization notification
  - d. Briefing of company management
  - e. Monitoring news media activities
3. Demonstrate that EOF staff can:
  - a. Assume dose assessment function and RMT direction and communication function from TSC staff
  - b. Assume logistics, manpower and engineering function from Flintridge EOC
  - c. Prepare and coordinate news releases and activate emergency news center
  - d. Shift to Recovery Phase Organization (table top exercise)

C. Off-site Plume Exposure Pathway EPZ Objectives  
(States of Alabama and Georgia and Counties of Houston and Early)

\*E.O.F. preparation (III.A.3) and corporate activation (B.1) will be simulated. These activities were successfully demonstrated in an annual exercise on 2/1/84 and will be tested in a drill on 11/28/84. On 11/29/84, the EOF staff will be instructed to report to the site one to two hours after the start of the exercise.

1. Demonstrate that response organizations can alert, notify and mobilize emergency response personnel.\*\*
2. Demonstrate that the emergency operations centers can be staffed in a timely fashion.
3. Demonstrate that the states can activate emergency worker assembly points, dispatch radiation monitoring teams in a timely manner, provide assessment of a simulated airborne release and communicate their assessment to the EOCs.
4. Demonstrate that the states' radiation control staffs can assess the accident and make appropriate recommendations to the states' decision makers.
5. Demonstrate that decisions can be made with regard to protective measures for the plume exposure pathway EPZ.
6. Demonstrate that the counties can dispatch personnel to appropriate access points that the simulated evacuation would call for and take other measures involved in the simulated evacuation.
7. Demonstrate that adequate communications can be maintained between county EOCs and field units.
8. Demonstrate that county mass care facilities can be activated and staffed in a timely fashion to support a simulated evacuation.
9. Demonstrate that news media centers can be activated and staffed.

D. Off-Site Ingestion Pathway EPZ Objectives

1. Alabama

° Demonstrate point-to-point communication with agencies responsible for the ingestion exposure pathway control

° Demonstrate the capability to perform radiological assessment within the ingestion exposure pathway EPZ

° Demonstrate coordination of decision making and protective action implementation among affected state and local governments.

° Demonstrate capability to implement protective actions for the ingestion pathway EPZ.

\*\*Due to exercise time constraints, selected portions of the State of Georgia emergency organization will prestage in Early County.

2. Florida

° Demonstrate point-to-point communication with contiguous states and those Florida Counties within the ingestion exposure pathway EPZ

° Demonstrate radiological and environmental assessment capabilities within the ingestion exposure pathway EPZ

° Demonstrate coordination of decision making and protective action recommendations among participating state and local governments

3. Georgia

° Demonstrate that personnel responsible for performing sampling activities are identified and can be contacted.

E. Joint objectives (Alabama Power Company, States of Alabama, Georgia and Florida, Counties of Houston and Early)

1. Demonstrate that the parties can coordinate all releases of information to the media.

2. Demonstrate that the parties can coordinate the protective measures to the public (recommendations for protective action, activation of the Prompt Notification System).

3. Demonstrate that the parties can carry out free play in decision making with regard to protective measures for the plume and ingestion pathway EPZs.

IV. General Exercise Scenario

The simulated accident condition will begin as an Alert and escalate to a General Emergency.

Simulated events will be selected to require simulated evacuation of portions of the 10-mile Emergency Planning Zone.

V. Exercise Limits

The exercise will begin no earlier than 6:00 a.m. CST on November 29, 1984. The Plume Exposure EPZ exercise will end by 3:00 p.m. CST on November 29. The Ingestion Pathway EPZ exercise will continue on longer, possibly into November 30, utilizing a different scenario.

The States of Alabama, Georgia and Florida; Houston County, Alabama; and Early County, Georgia will participate at a full scale level, including ingestion pathway activities. The States of Alabama and Georgia will simulate activation of their mass care facilities.

Following proper coordination, the prompt notification system will be activated by Alabama and Georgia.\*\*\*

Alabama Power Company will activate its Technical Support Center, Flintridge (corporate) Emergency Operations Center, its on-site Emergency Operations Facility and its Emergency News Center.

\*\*\* Free play on PNS Activation will be controlled as necessary to allow Georgia Emergency Management Agency personnel to perform actual PNS activation initiation.



STATE OF ALABAMA  
EMERGENCY MANAGEMENT AGENCY  
ADMINISTRATIVE BUILDING  
MONTGOMERY, AL 36130

GEORGE C. WALLACE  
GOVERNOR

DAN TURNER  
DIRECTOR

October 31, 1984


Mr. Glenn Woodard, Director  
Natural & Technological Hazards Div.  
Federal Emergency Management Agency  
1371 Peachtree Street, N.E.  
Atlanta, GA 30309

Dear Mr. Woodard:

Please add the following to the list of objectives we have submitted for the Farley Nuclear Power Plant exercise:

Perform environmental monitoring, sample collection/analysis, hazard assessment and decision making for reentry and resettlement.

Sincerely,

  
Dan Turner  
Director

DT:KEG:lcd



GEORGIA - PART 2

# GEORGIA

## 1984 FARLEY NUCLEAR PLANT EMERGENCY EXERCISE

NOVEMBER 29 & 30, 1984<sup>+</sup>

### I. Participating Organizations

State of Alabama and Houston County, Alabama (Full Scale)  
State of Georgia and Early County, Georgia (Full Scale)  
State of Florida (Full Scale Ingestion Pathway)  
Alabama Power Company (Full Scale)

### II. Purpose

- A. To meet the requirements of 10CFR50, Appendix E, 44CFR350.9 and NUREG-0654/FEMA-REP-1, Rev. 1.
- B. To conduct a full-scale exercise that will include the mobilization of Alabama Power Company, state and local personnel and resources adequate to verify the capability of participating organizations to respond to an accident scenario requiring response.

### III. Objectives

#### A. On-Site Objectives (Alabama Power Company)

1. Demonstrate that control room staff can assess the event, classify the event, take corrective measures to control the event and activate emergency response procedures.
2. Demonstrate that plant staff can activate and staff the Technical Support Center (TSC) and perform accident response activities including:
  - a. Dose assessment
  - b. Off-site notification and protective action recommendations.
  - c. Reclassification of emergency status.
  - d. Personnel accountability for all personnel on-site and evacuation of non-essential personnel.
  - e. Radiation Monitoring Team (RMT) dispatch and control.
  - f. Site access control and admittance of essential personnel.
  - g. De-escalation of emergency class.

\*A drill will be conducted on 11/28/84 to exercise specific portions of the APCo Emergency Plan. Plume Exposure and Ingestion Pathway activities will be tested on 11/29. Additional State Ingestion Pathway activities may be conducted on 11/30.

\*E.O.F. preparation (III.A.3) and corporate activation (B.1) will be simulated. These activities were successfully demonstrated in an annual exercise on 2/1/84 and will be tested in a drill on 11/28/84. On 11/29/84, the EOF staff will be instructed to report to the site one to two hours after the start of the exercise.

3. Demonstrate the capability to prepare the Emergency Operations Facility (EOF) in a timely fashion for use by the corporate staff upon arrival.\*
  4. Demonstrate the capability to turnover EOF functions to the EOF staff when EOF is activated and staffed.
  5. Demonstrate the capability to augment EOF staff with non-essential plant personnel.
- B. Off-site Objectives (Alabama Power Company)
1. Demonstrate that corporate staff can be activated in a timely fashion and dispatched to FNP.\*
  2. Demonstrate that Flintridge Emergency Operations Center (EOC) staff can provide initial support for:
    - a. EOF activation
    - b. Logistics
    - c. Support organization notification
    - d. Briefing of company management
    - e. Monitoring news media activities
  3. Demonstrate that EOF staff can:
    - a. Assume dose assessment function and RMT direction and communication function from TSC staff
    - b. Assume logistics, manpower and engineering function from Flintridge EOC
    - c. Prepare and coordinate news releases and activate emergency news center
    - d. Shift to Recovery Phase Organization (table top exercise)

C. Off-site Plume Exposure Pathway EPZ Objectives  
(States of Alabama and Georgia and Counties of Houston and  
Early)

\*E.O.F. preparation (III.A.3) and corporate activation (B.1) will be simulated. These activities were successfully demonstrated in an annual exercise on 2/1/84 and will be tested in a drill on 11/28/84. On 11/29/84, the EOF staff will be instructed to report to the site one to two hours after the start of the exercise.

1. Demonstrate that response organizations can alert, notify and mobilize emergency response personnel.\*\*
2. Demonstrate that the emergency operations centers can be staffed in a timely fashion.
3. Demonstrate that the states can activate emergency worker assembly points, dispatch radiation monitoring teams in a timely manner, provide assessment of a simulated airborne release and communicate their assessment to the EOCs.
4. Demonstrate that the states' radiation control staffs can assess the accident and make appropriate recommendations to the states' decision makers.
5. Demonstrate that decisions can be made with regard to protective measures for the plume exposure pathway EPZ.
6. Demonstrate that the counties can dispatch personnel to appropriate access points that the simulated evacuation would call for and take other measures involved in the simulated evacuation.
7. Demonstrate that adequate communications can be maintained between county EOCs and field units.
8. Demonstrate that county mass care facilities can be activated and staffed in a timely fashion to support a simulated evacuation.
9. Demonstrate that news media centers can be activated and staffed.

D. Off-Site Ingestion Pathway EPZ Objectives

1. Alabama

- ° Demonstrate point-to-point communication with agencies responsible for the ingestion exposure pathway control
- ° Demonstrate the capability to perform radiological assessment within the ingestion exposure pathway EPZ

° Demonstrate coordination of decision making and protective action implementation among affected state and local governments.

° Demonstrate capability to implement protective actions for the ingestion pathway EPZ.

\*\*Due to exercise time constraints, selected portions of the State of Georgia emergency organization will prestage in Early County.

2. Florida

° Demonstrate point-to-point communication with contiguous states and those Florida Counties within the ingestion exposure pathway EPZ

° Demonstrate radiological and environmental assessment capabilities within the ingestion exposure pathway EPZ

° Demonstrate coordination of decision making and protective action recommendations among participating state and local governments

3. Georgia

° Demonstrate that personnel responsible for performing sampling activities are identified and can be contacted.

E. Joint objectives (Alabama Power Company, States of Alabama, Georgia and Florida, Counties of Houston and Early)

1. Demonstrate that the parties can coordinate all releases of information to the media.

2. Demonstrate that the parties can coordinate the protective measures to the public (recommendations for protective action, activation of the Prompt Notification System).

3. Demonstrate that the parties can carry out free play in decision making with regard to protective measures for the plume and ingestion pathway EPZs.

IV. General Exercise Scenario

The simulated accident condition will begin as an Alert and escalate to a General Emergency.



Simulated events will be selected to require simulated evacuation of portions of the 10-mile Emergency Planning Zone.

#### V. Exercise Limits

The exercise will begin no earlier than 6:00 a.m. CST on November 29, 1984. The Plume Exposure EPZ exercise will end by 3:00 p.m. CST on November 29. The Ingestion Pathway EPZ exercise will continue on longer, possibly into November 30, utilizing a different scenario.

The States of Alabama, Georgia and Florida; Houston County, Alabama; and Early County, Georgia will participate at a full scale level, including ingestion pathway activities. The States of Alabama and Georgia will simulate activation of their mass care facilities.

Following proper coordination, the prompt notification system will be activated by Alabama and Georgia.\*\*\*

Alabama Power Company will activate its Technical Support Center, Flintridge (corporate) Emergency Operations Center, its on-site Emergency Operations Facility and its Emergency News Center.

\*\*\*Free play on PNS Activation will be controlled as necessary to allow Georgia Emergency Management Agency personnel to perform actual PNS activation initiation.



MG JOSEPH W. GRIFFIN  
THE ADJUTANT GENERAL  
DIRECTOR

STATE OF GEORGIA

**Department of Defense**  
**Georgia Emergency Management Agency**

P.O. Box 18055  
Atlanta, Georgia 30316-0055  
TEL: (404) 656-5500



BILLY J. CLACK  
DEPUTY DIRECTOR

26 September 1984

Mr. Glenn Woodard, Director  
Natural & Technological Hazards Div.  
Federal Emergency Management Agency  
1371 Peachtree Street, N.E.  
Atlanta, Georgia 30309

Dear Mr. Woodard:

Reference is made to my letter of 11 September 1984 which had as an enclosure, the objectives for the 1984 Plant Farley Exercise for the State of Georgia.

The purpose of this letter is to amend these objectives, specifically those in Paragraph III.D.3. by adding the following:

- Demonstrate that the state and local governments within the 50-mile EPZ can establish communications (communications check only for those counties outside the 10-mile EPZ).
- Demonstrate that Emergency Broadcast messages can be prepared for release (actual broadcast to be simulated).
- Demonstrate that staff and facilities for conducting ingestion pathway activities can be activated in accordance with the State Plan (use of EPD Mobile Lab to be simulated).
- Demonstrate that technical information, including dose commitment consequences, can be gathered and analyzed to make decision concerning ingestion pathway activities (field activities to be simulated).
- Demonstrate interstate coordination for decision making, protective actions and public information.
- Demonstrate appropriate protective action procedures for addressing actual or potential contamination of water, milk, crops, fruits and vegetables as well as exposure of livestock.
- Demonstrate the capability to notify farmers, food processors and distributors, and the general public within the 50-mile EPZ (actual transmission of messages to be simulated).

FLORIDA - PART 3

**OBJECTIVES****State of Florida  
Ingestion Exposure Pathway  
Plant Farley Exercise  
November 29, 1984**

These objectives reflect a partial staffing by the State of Florida at the State Emergency Operations Center (SEOC) and representation at the Alabama Power Emergency Operations Facility in Dothan. Field team activity will be simulated. County EOCs will not be activated but will be manned for test of communications and coordinated decision making.

1. Demonstration of point-to-point communications with contiguous states and those Florida counties within the ingestion exposure pathway EPZ.
2. Demonstration of coordination of decision making and protective action recommendations among participating state and local governments.
3. Test of the organization and procedures for the coordinated and timely dissemination of information to the public and media.

APPENDIX C

EXERCISE SCENARIO

ALABAMA - PART 1

GEORGIA - PART 2

FLORIDA - PART 3



ALABAMA - PART 1

NARRATIVE - All times are Central Standard Time

At approximately 0630, the AEMA Duty Officer should be notified of an Emergency Action Level of "ALERT" being declared at the Farley NPP. He will notify Houston County and then report to the State EOC. He will staff the State EOC at minimum levels (OPS Officer, PIO, Communicator, Duty Officer). The County EOC will also be staffed at minimum levels during the "ALERT" phase.

The Emergency Action Level will escalate to "SITE AREA EMERGENCY" at approximately 0835. This will necessitate the full staffing of the State EOC and the County EOC. It will also key the dispatch of the personnel that will man the CEOC in Dothan. (For this exercise, these personnel will be pre-positioned in Dothan and will report to the CEOC at approximately 1000.) The Near Site Media Center should also be activated at this time.

"GENERAL EMERGENCY" will be declared at approximately 1000. At this time the CEOC team should be arriving at the CEOC. The two mile area of the EPZ will probably undergo a simulated evacuation. This will entail setting up road blocks by the Sheriff's Department, and the simulated monitoring of traffic flow. This should also key the opening of the Registration Center.

After teams have demonstrated the capability to respond to an incident and perform their duties, they will be released to return to their normal day to day activities.

At approximately 1430-1500, we will transition to the second phase of this exercise, the 50 mile Ingestion Pathway exercise. For this portion of the exercise, the personnel participating, will receive a situation briefing and will have some time to prepare for their activities. Exercise activities will terminate on the 28th at approximately 1700 hours.

At 0800 hours on the 29th the 50 mile Ingestion Pathway exercise will restart. Activities within the State EOC and CEOC will be primarily that of information gathering and coordination. Staffing will be reduced to only those personnel necessary to complete the necessary tasks. The County EOC will be similarly staffed.

The PIO will remain operational throughout the 50 mile Ingestion Pathway exercise to support the participating agencies in information dissemination.

The exercise will terminate at approximately 1100 hours CST.

Evaluation will be needed for the Media Center, State EOC, CEOC, County EOC, Registration Center and Radiological Field teams. There will be no medical emergency or fire.

SEQUENCE OF EMA EVENTS FOR FARLEY NPP EXERCISE

- 0600 First call goes out from the plant - declaration of "Unusual Event". Counties notified when call reaches AEMA D.O.  
0615  
0615 "Alert" declared - AEMA notified by Radiological Health-Notify Counties.
- 0720 AEMA Duty Officer notifies Houston County and GEMA --- prepares to transfer to the EOC.
- 0745 State EOC should be activated and staffed at minimum level. (Duty Officer, Operations Officer, PIO, Message Controller)
- 0800 Key AEMA Staff briefed and first press release should be prepared for release.
- 0810 Status of plant should be monitored. Any change of status should be reported by plant.
- 0815 Counties should be apprized of status of incident.
- 0830 First call to State EOC from wire service requesting information on the incident.
- 0835 Declaration of "Site Area Emergency" - prepare to dispatch CEOC Team to Houston County. Notify Houston County of status change. Fully staff the State EOC.
- 0840 Local newspaper contacts County EOC for information.
- 0845 Local newspapers contact State EOC for information.
- 0850 Calls from concerned citizens start coming in to the County EOC - requests for assistance, etc.
- 0850 County may activate EBS sometime during this period to put out advisory to residents.
- 0900 PIO at State and local levels should be working together to put out press releases.
- 0905 County EOC should be fully staffed and briefed by this time.
- 0905 State EOC should be fully staffed and briefed by this time.
- 0910 Problems generated for state agencies represented in the State EOC.
- 0915 County EOC should receive an incident status update from the State EOC. Brief agencies.

CEOC

- 0930 Major City newspaper contacts County EOC for information concerning incident.---this will also happen at the State EOC and may involve several newspapers.
- 0945 Concerned citizens continue to call requesting information on what action to take.
- 1000 "General Emergency" declared. County notified by State EOC. Alert & Notification system to be activated by Georgia Emergency Management Agency.
- 1000 CEOC Team from State should arrive and prepare to assume operational activities. They should be provided an update briefing via telephone or radio from the State EOC.
- 1015 Evacuation of the two mile area of the EPZ should be under way.
- 1015 Sheriff's Department should be preparing to assist in evacuation of the two mile area of the EPZ.
- 1020 Pensions & Security should be preparing to open the Registration Center.
- 1030 ~~State~~ Problems related to the evacuation will be presented to the County EOC.
- 1035 Problems will be generated for the various County agencies represented in the County EOC.
- 1100-1400 Problems will be injected as necessary to keep activity going. Once participants have demonstrated they can respond to emergency requirements, they will be released.
- 1400 Terminate

RADIOLOGICAL HEALTH ACTIVITIES DURING FARLEY EXERCISE

28 NOV 1984

0900 Dispatch Local Environmental Radiological Monitoring Teams.

0900 Exercise Dairy Product SOP.

1030 State Environmental Radiological Monitoring Teams arrive at assembly point.

1030 Radiological Laboratory personnel arrive in Dothan - remain throughout the afternoon.

1430 Phase II - 50 mile Ingestion Pathway exercise - Relocation and Resettlement.

In the afternoon, milk samples will be collected and analyzed.

1530 Meet with Agriculture and Industries personnel for contamination briefing. Determine appropriate crops to be sampled.

29 NOV 1984

0830 Post-accident sampling from assembly point in AR and soil specimens.

Agriculture and Industries will be collecting crop samples. Dosage assessments for relocation and resettlement will be taking place at the CEOC in the Court House.

During the exercise, two state and two local Environmental Radiation Monitoring teams will be in the field. Also there will be one milk sample group. Radiological Health personnel will be doing dose analysis on both the Ingestion Pathway and the Relocation and Resettlement criteria.



GEORGIA - PART 2

State of Georgia  
Plume Exposure Pathway  
Scenario  
1984 Plant Farley Exercise

28 November 1984

All Times EST and  
are Approximate

7:00 a.m. - State of Georgia receives notification of Alert Status at Plant Farley, Unit 2.

7:15 a.m. - Early County Sheriff's office and appropriate state agencies notified.

Mobilization of state and local emergency response elements initiated (GEMA, EPD, DHR-Rad. Health and Early County CD).

7:30 a.m. - State and local EOCs activated.

Decision made to deploy state emergency response personnel with advance elements moving by air transportation.

8:00 a.m. - State response elements assemble and begin deployment.\*

8:30 a.m. - State and local EOCs fully activated.

FEMA and contiguous states notified.

GEMA Area 2 Coordinator arrives at Early County EOC.

9:00 a.m. - State and local EOCs complete checklist actions for Alert Status at Plant Farley.

Local CD initiates issuance of personal dosimetry and obtains and issues KI for local emergency workers.

9:15 a.m. - Advance state response elements arrive at Early County jail and are briefed on situation.

9:30 a.m. - Advance state response elements fully operational at state FEOC (Early County jail).

Communications established with state EOC, utility, State of Alabama and Houston County via ENN.

Radiation Emergency Coordinator begins initial dose projection calculations.

9:40 a.m. - Utility declares Site Area Emergency.

GEMA notifies State of Alabama and Houston County of intention to activate PNS at 9:50 a.m.

\*Actual deployment of state response elements simulated. Most of these personnel will be pre-positioned in the Farley area 27 November 1984.

- 9:50 a.m. - PNS activated by State of Georgia (test message, yellow).
- 10:00 a.m. - State EOC, State FEOC, and Early County EOCs complete actions required for Site Area Emergency.
- Remaining state emergency response personnel arrive at State FEOC.
- (Those moving by surface transportation.)
- 10:15 a.m. - Arriving state emergency response personnel issued personal dosimetry and KI.
- 10:20 a.m. - State FEOC conducts initial discussions relative to protective actions which may be required for Plume Exposure and Ingestion Pathways.
- 10:30 a.m. - Radiation monitoring teams dispatched.
- (Note: Teams will not remain in the field for the entire exercise.)
- 10:45 a.m. - Georgia representative arrives at the Joint Media Center and establishes communications with representatives at State EOC in Atlanta and FEOC in Blakely.
- 11:05 a.m. - Utility declares General Emergency.
- PNS activation to be simulated.
- 11:15 a.m. - State Radiation Emergency Coordinator makes appropriate recommendations for Protective Actions to State Disaster Coordinator or his designee and to Department of Agriculture Emergency Coordinator or his designee.
- 11:30 a.m. - Early County initiates activation of Reception Center and Shelter.
- Local law enforcement agencies dispatched to establish road blocks and assist in evacuation.
- DNR Conservation Ranger takes action to warn people on or in vicinity of Chattahoochee River.
- 12:30 p.m. - Early Memorial Hospital notified of injury of evacuee in traffic accident within 10 mile EPZ.
- Accident victim requires ambulance transportation to Early Memorial Emergency Room - potential radioactive contamination.
- 1:00 p.m. - Evacuees arrive at Reception Center and are processed.
- 1:15 p.m. - Injured evacuee arrives at Early Memorial Hospital and is treated.

2:00 p.m. - Evacuees at Reception Center complete processing and moved to Shelter at Early Elementary School.

(Sample area will be set up and manned by Shelter Manager.)

Evacuees will be released after arrival at Shelter facility.

2:30 p.m. - Emergency vehicles surveyed for possible contamination. Vehicles located in fenced compound at Early County High School.

3:00 p.m. - Activities now limited to evaluation of plant status reports and reevaluation of Protective Actions ordered.

3:30 p.m. - Plume Exposure portion of exercise terminated.

State of Georgia  
Ingestion Exposure Pathway  
Scenario  
1984 Plant Farley Exercise  
28-29 November 1984

28 November 1984

All Times EST and  
are Approximate

Note: In order to facilitate this portion of the exercise, it is now assumed to be 24 hours after termination of the Plume Exposure Exercise (3:30 p.m. 29 November).

3:30 p.m. - Deposition map available to state and local authorities.

Situation briefing will update Protective Actions which have been taken.

Evacuation has occurred in Section A, I-5, J-5, K-5 and K-10.

Federal resources have arrived (simulated).

3:45 p.m. - Communications established with all counties in 50 mile ingestion pathway.

4:00 p.m. - EPD and Department of Agriculture establish agricultural sampling requirements and initiate sampling actions (simulated sampling).

EPD Environmental Radiation Laboratory in Atlanta placed on standby to receive and analyze samples.

29 November 1984

Note: Based on the 24 hour adjustment at the commencement of this exercise, all activities on this date would occur on 30 November in an actual situation.

9:00 a.m. - Situation briefing updating events which occurred during the night takes place (i.e., results of sampling activities).

Initial data indicates there is a problem at Robert Weir Dairy in Seminole County.

9:30 a.m. - Weir Dairy notified by Georgia Department of Agriculture that permit to sell Grade A milk suspended.

9:45 a.m. - States of Alabama and Florida notified of situation.

10:15 a.m. - Based on samples evaluated, Georgia Department of Agriculture initiates action to withhold from sale crops in affected area.

Farmers and food processors advised.



10:30 a.m. - EBS message prepared, advising private owners of milk cows, other non-commercial agricultural interests and the general public of situation and recommended actions including assistance available from state agencies.

11:00 a.m. - Georgia EPD and Department of Agriculture receives results of earlier surface water samples in Chattahoochee River and in lakes and ponds in affected area.

Appropriate recommendation made.

11:15 a.m. - Tabletop discussion of long term concerns and actions held.

12:00 p.m. - Exercise terminates.

FLORIDA - PART 3

STATE OF FLORIDA  
Ingestion Exposure Pathway  
Scenario Timeline  
1984 Plant Farley Exercise  
November 29, 1984

9:00 a.m. Situation briefing updating events which have occurred previous to SEOC staffing.

- ° An accident has occurred at the Farley Nuclear Power Plant in Alabama resulting in a state of General Emergency. Protective actions have been taken to assure the safety of persons in the 10-mile plume exposure pathway in the states of Alabama and Georgia. Georgia has ordered evacuation of Sections A, I-5, J-5, K-5, and K-10.
- ° Federal assistance has been requested. A U.S. Department of Energy aerial fly over has resulted in a deposition map. Map is made available to state agencies in SEOC.
- ° The release from the plant terminated approximately 42 hours ago.
- ° The states of Georgia and Alabama have begun agricultural sampling. Sampling results are expected soon but have not yet been received by the State of Florida.
- ° There is no indication of a liquid release in the Chattahoochee River.
- ° Florida has sent representatives to the Alabama Power Emergency Operating Facility in Dothan.

EXPECTED ACTIONS:

- ° The Deposition Map should be reviewed and analyzed by the Department of Health and Rehabilitative Services (DHRS).
- ° All counties in the 50-mile Ingestion Exposure Pathway EPZ should be contacted.
- ° The West Florida Area Office of the Division of Emergency Management should be contacted.

- Georgia and Alabama should be contacted for additional information.
- SEOC agencies should discuss
  - activation of the DHRS Mobile Emergency Radiological Laboratory (MERL)
  - agricultural sampling
  - dairy sampling
  - potential need for protective response
- Public Information Release considerations should be discussed.

9:30 a.m. Simulated field team sampling should begin.

9:45 a.m. Florida notified that the Robert Weir Dairy in Seminole County, Georgia has contaminated milk and the permit to sell milk has been suspended.

10:15 a.m. At approximately this time, simulated agricultural and dairy sample results will be provided to DHRS. Protective actions, if appropriate, should be discussed.

At approximately this time Georgia may contact Florida to discuss the transportation of contaminated milk to Florida and how to keep it from reaching the public. Necessary actions may include confiscation of the milk truck at the Florida Agricultural Inspection Station or by the Highway Patrol and later destruction of the milk.

10:30 a.m. Coordination should occur between the states on EBS messages and protective actions.

Any protective actions considered in the SEOC should be discussed with county(ies) and County Emergency Boards -- Agricultural (simulated). (Based on data available at this time, only the extreme northeast corner of Jackson County should have contamination levels requiring protective actions.)

11:15 a.m. Coordinated discussions between states of long term concerns and actions are held.

12:00 p.m. Exercise Termination.

APPENDIX D

STATE AND LOCAL RESOURCES

ALABAMA - PART 1

GEORGIA - PART 2

FLORIDA - PART 3



ALABAMA - PART 1

STATE OF ALABAMA AND HOUSTON COUNTY RESOURCES

Alabama Emergency Management Agency

Department of Public Safety

Department of Public Health

Department of Pensions & Security

Military Department

Department of Agriculture & Industries

Highway Department

Department of Conservation

Department of Environmental Management

Governor's Liaison

RACES Operators

Houston County Commission

Henry County Probate Judge

Houston County Emergency Management Agency

Houston County Sheriff's Department

Municipal Police (Dothan and Columbia)

Houston County Public Health (Hospitals, Mental Health & Paramedics)

Local Emergency Welfare Service:

Department of Pensions & Security

Red Cross

Salvation Army

GEORGIA - PART 2

STATE AGENCY RESOURCES AVAILABLE

NEAR

PLANT FARLEY

<u>Agency</u>	<u>Support Role</u>	<u>Location</u>	<u>Distance From Facility</u>	<u>Emergency Telephone #</u>	<u>Resources &amp; Comments</u>
<u>Department of Agriculture</u>	Collection of food-stuffs Radiological Survey Party	Albany, District 4	60 miles	(0) 912-439-4245 Gist 341-4245	Transportation, radiological capability
<u>Department of Natural Resources</u>					
Environmental Protection Div. Regional Office	Coordination, sample collection	Albany, GA	55 miles	(0) 912-439-4144	Manpower, vehicles
Game & Fish Div. District Office	Law Enforcement	Albany, GA	55 miles	2024 Newton Road Albany, GA 31705 (0) 912-439-4252 Gist 341-4252	Manpower, boats, radios
Early County Ranger	Evacuation & Security			(0) 912-439-4252	
<u>Georgia Forestry Commission</u>	Aircraft and Logistics, Construction Equip.				
Director	Coordination	Macon, GA		(0) 912-744-3237	Heavy equip., aircraft, fire fighting equip., personnel, limited radiological equip.
District 6 Office	Coordination	Columbus, GA	85 miles	(0) 404-568-2158 Gist 251-2158	

STATE AGENCY RESOURCES AVAILABLE

NEAR

PLANT FARLEY

<u>Agency</u>	<u>Support Role</u>	<u>Location</u>	<u>Distance From Facility</u>	<u>Emergency Telephone #</u>	<u>Resources &amp; Comments</u>
<u>Department of Public Safety</u>  Georgia State Patrol	Communications, traffic control, police functions, logistics, emergency medical coordination	Donalsonville Post #14	15 miles	Duty Officer 912-524-2177 Gist 346-2260	Radio network, transportation, ambulance
		Cuthbert Post #39	45 miles	Duty Officer 912-732-2167 Gist 341-4376	Radio network, transportation, ambulance
		Albany Post #40	60 miles	Duty Officer 912-439-4248 Gist 341-4248	Radio network, transportation, ambulance
<u>Department of Human Resources</u>  Emergency Medical Services	Emergency Medical coordination	Albany Region 8 Dougherty County Health Department	60 miles	(0) 912-439-4126	Medical district supervision, transportation, equipment, medical aid & care, laboratory facilities, radiological equipment, public health services
		Medical District 5	Columbus District 7	85 miles	(0) 404-571-5314 Gist 8-259-7314
		Albany District 8 Unit 2	60 miles	(0) 912-439-4126 Gist 8-341-4126	



STATE AGENCY RESOURCES AVAILABLE

NEAR  
PLANT FARLEY

<u>Agency</u>	<u>Support Role</u>	<u>Location</u>	<u>Distance From Facility</u>	<u>Emergency Telephone #</u>	<u>Resources &amp; Comments</u>
<u>Georgia Forestry Commission</u>					
District 6 Office	Observation, earth moving, fire control, transportation	Cuthbert, GA	45 miles	(O) 912-732-2595 (O) 912-995-5411	Heavy equip., pickups, patrolmen, fire trucks
District 6 Office	Observation, earth moving, fire control, transportation	Georgetown, GA	45 miles	(O) 912-334-5853 (O) 912-838-4576 (O) 912-828-2265	Patrolman, tower, fire trucks, heavy equip., pickups
District 9 Office	Coordination	Camilla, GA	50 miles	(O) 912-336-5341	
District 9 Office		Camilla, GA	50 miles	(O) 912-336-8585	Aircraft, heavy equip., pickups, fire trucks, observation tower, patrolmen
District 9 Office		Edison, GA	40 miles	(O) 912-835-2303 (O) 912-768-2922	Pickups, fire trucks, patrolmen, towers, heavy equip.
District 9 Office		Bainbridge, GA	40 miles	(O) 912-246-3434 (O) 912-377-3951	Heavy equip., pickups, fire trucks, towers, patrolmen
District 9 Office		Albany, GA	60 miles	(O) 912-439-4247	Heavy equipment, pickups, fire trucks, towers, patrolmen
District 9 Office		Blakely, GA	15 miles	Chester McKnight (O) 912-723-3513	Heavy equip., pickups, fire trucks, towers, patrolmen

STATE AGENCY RESOURCES AVAILABLE

NEAR

PLANT FARLEY

<u>Agency</u>	<u>Support Role</u>	<u>Location</u>	<u>Distance From Facility</u>	<u>Emergency Telephone #</u>	<u>Resources &amp; Comments</u>
<u>Georgia Forestry Commission</u>					
District 9 Office		Colquitt, GA	30 miles	(0) 912-758-3322 (0) 912-524-5245	Heavy equip., pickups, fire trucks, towers, patrolmen
<u>Department of Transportation</u>	Engineering, construction equip., logistics, communications				Heavy equip., trucks, radio network, civil engineering, transportation
District 4 Office		Mitchell County	40 miles	(0) 912-386-3320	Radio #414
District 4 Office		Baker County	30 miles		Radio #415
		Dougherty County	45 miles	(0) 912-439-4198	
District 4 Office		Quitman County	35 miles		Radio #416
		Terrell County	45 miles	(0) 912-732-3066	
		Randolph County	30 miles		
		Calhoun County	25 miles		
		Clay County	20 miles		
District 4 Office		Grady County	45 miles		Radio #417
		Decatur County	25 miles	(0) 912-377-1853	
		Seminole County	15 miles		
		Miller County	15 miles		
		Early County	1 mile		
<u>Department of Defense</u>	Coordination, rad. surveys, communication	Moultrie			Manpower, mobile comms., rad. survey equip., vehicles, etc.
Georgia Emergency Management Agency Area 2 Coordinator				(0) 912-985-5921 After Hr. 912-985-3331/ 1020 (Pager No. 152)	

LOCAL AGENCY RESOURCES AVAILABLE

NEAR

PLANT FARLEY

<u>Agency</u>	<u>Support Role</u>	<u>Location</u>	<u>Distance From Facility</u>	<u>Emergency Telephone #</u>	<u>Resources &amp; Comments</u>
Albany-Dougherty County EMA	Emergency Coordination	Albany	65 miles	EMA Director (0) 912-883-2103	Communications: Base Station, 12 mobiles CD Transportation: 2 sedans, 2 vans Instruments: 34 CDV 777 monitoring kits EOC available
Blakely-Early County CD	Emergency Coordination	Blakely	15 miles	CD Director (0) 912-723-3029	Communications: Base Station, 3 mobiles CD Transportation: 2 station wagons Instruments: 7 CDV 777 monitoring kits <u>Local evacuation plan</u> <u>provided</u>
Randolph County EMA		Cuthbert	45 miles	EMA Director (0) 912-732-3423	Communications: Base Station, 4 mobiles Instruments: 1 CDV 777 monitoring kit Transportation: 1 1 1/2 ton truck
Early Memorial Hospital	Medical Health Support	Blakely	15 miles	(0) 912-723-4241	Hospital Facilities
Rescue Unit		Blakely	15 miles	(0) 912-723-3860	Emergency support unit

LOCAL AGENCY RESOURCES AVAILABLE

NEAR

PLANT FARLEY

<u>Agency</u>	<u>Support Role</u>	<u>Location</u>	<u>Distance From Facility</u>	<u>Emergency Telephone #</u>	<u>Resources &amp; Comments</u>
Early County Sheriff	Law Enforcement (Traffic Control)	Blakely	15 miles	912-723-3214	Communication equip., transportation, law enforcement equip.
Miller County Sheriff		Colquitt	30 miles	912-758-3421	Communications equip., transportation, law enforcement equip.
Seminole County Sheriff		Donalsonville	17 miles	912-524-5115	Communications equip., transportation, law enforcement equip., and 1 CDV 777 monitoring kit
Clay County Sheriff		Ft. Gaines	28 miles	912-768-2262	Communications equip., transportation, law enforcement equip., and 1 CDV 777 monitoring kit
Decatur County Sheriff		Bainbridge	37 miles	912-246-3320	Communications equip., transportation, law enforcement equip., and 1 CDV 777 monitoring kit
Quitman County Sheriff		Georgetown	45 miles	912-334-3726	Communications equip., transportation, law enforcement equip., and 1 CDV 777 monitoring kit
Calhoun County Sheriff		Morgan	35 miles	912-849-2555	Communications equip., transportation, law enforcement equip., and 1 CDV 777 monitoring kit
Baker County Sheriff		Newton	42 miles	912-734-5233	Communications equip., transportation, law enforcement equip., and 1 CDV 777 monitoring kit

LOCAL AGENCY RESOURCES AVAILABLE

NEAR

PLANT FARLEY

<u>Agency</u>	<u>Support Role</u>	<u>Location</u>	<u>Distance From Facility</u>	<u>Emergency Telephone #</u>	<u>Resources &amp; Comments</u>
Randolph County Sheriff	Law Enforcement (Traffic Control)	Cuthbert	45 miles	912-732-2525	Communications equip., transportation, law enforcement equip., and 1 CDV 777 monitoring kit
Terrell County Sheriff		Dawson	60 miles	912-995-5221	Communications equip., transportation, law enforcement equip., and 2 CDV 777 monitoring kits
Dougherty County Sheriff		Albany	62 miles	912-436-1561	Communications equip., transportation, law enforcement equip., and 2 CDV 777 monitoring kits
Mitchell County Sheriff		Camilla	50 miles	912-336-5321	Communications equip., transportation, law enforcement equip., and 2 CDV 777 monitoring kits
Blakely City Police		Blakely	15 miles	912-723-3414	Communications equip., transportation, law enforcement equip., and 2 CDV 777 monitoring kits
Emergency Coordination					
Bainbridge-Decatur County CD	Civil Defense Coordination	Bainbridge	37 miles	Civil Defense Director (0) 912-246-1330	CD Transportation: 2 Jeeps, 1 rescue van, 1 1/4 truck, 1 sedan Instruments: 16 CDV 777 monitoring kits



FLORIDA - PART 3

STATE OF FLORIDA RESOURCES

Florida Division of Emergency Management

Florida Department of Health and Rehabilitative Services

Florida Department of Agriculture & Consumer Services

Florida Game & Fish Commission

Florida Department of Environmental Monitoring

Jackson County Commission

Jackson County Emergency Management Agency

Jackson County Department of Public Health

Jackson County Agriculture Agent

APPENDIX E

CRITERIA FOR INGESTION PATHWAY EXERCISING



# Federal Emergency Management Agency

Region IV 1371 Peachtree Street, NE Atlanta, Georgia 30309

September 7, 1984

Mr. Dan H. Turner, Director  
Alabama Emergency Management Agency  
64 North Union Street  
Montgomery, AL 36130

Dear Mr. Turner:

During the past several months, there have been discussions between this office, several States, and FEMA National Office concerning ingestion pathway exercises as required by 44 CFR 350.9 (c)(4). Recent conversations with members of your staff as well as those in Florida and Georgia, have indicated to us that the November 28-30, 1984 Farley Exercise will include ingestion pathway activities. The following information, which has been coordinated with FEMA National Office, is provided to State and local governments in Region IV for use in conducting this ingestion pathway exercise.

It is our interpretation that the 50-mile ingestion pathway exercise includes five areas of concern. These are:

- I. Communications
- II. Decision Making
- III. Field Measurements, Sampling and Laboratory Tests
- IV. Protective Actions
- V. Public Information

The following is a detailed description of the activities to be demonstrated in each of these areas:

- I. Communications
  - A. States and local governments within the 50-mile EPZ should establish communications (communications check only for those counties not affected by the exercise).
  - B. The capability of the survey and monitoring teams as well as the field laboratory to communicate with one another and with decision making authorities.

- C. Emergency broadcast messages should be prepared for broadcast (FEMA RIV realizes it may not be possible to actually broadcast during the exercise, but any necessary messages should be prepared, and procedures followed).

## II. Decision Making

- A. Staff and facilities, as denoted by each States' plan, for conducting ingestion pathway activities, should be activated.
- B. Technical information, including dose commitment consequences, should be gathered and analyzed to make decisions concerning ingestion pathway activities.
- C. Interstate coordination for decision making, protective actions and public information should be demonstrated.

## III. Field Measurements, Sampling and Laboratory Tests

- A. Teams should be trained and equipped to perform ingestion pathway field measurements and sampling.
- B. Briefing and deployment of monitoring and sampling teams should be demonstrated.
- C. A laboratory analysis capability should be demonstrated, including the processing of representative samples collected.

## IV. Protective Actions

- A. Protective procedures involving water, marine products, milk, livestock, crops, fruits and vegetables should be demonstrated.

## V. Public Information

- A. Capability to notify farmers, food processors and distributors, and the general public in the 50-mile EPZ through a public information system should be demonstrated. (Appropriate messages prepared but not necessarily transmitted.)



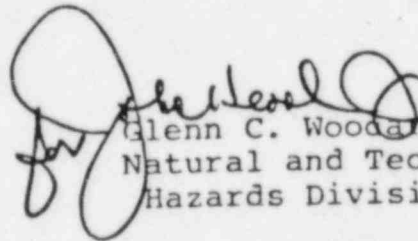
For States and local governments which are impacted by a facility outside its boundaries, I.B. and III. are optional. We would emphasize that, although these procedures are interim measures, they are in accord with NUREG-0654-FEMA-REP-1, Rev. 1, Criterion J-11.

The scenario for the ingestion pathway should include all portions of this planning criterion.

The ingestion pathway exercise should be approached with the same effort and thoroughness as the plume exposure exercise. During objectives and scenario development, RIV staff is available to assist.

Should you have questions, please contact John Heard (404-881-7079) or Doug Hoell (404/881-7096).

Sincerely,



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Natural and Technological  
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