Duke Power
A Duke Energy Company

Gary R. Peterson
Vice President

Duke Power
Catawba Nuclear Station
4800 Concord Road
York, SC 29745
(803) 831-4251 OFFICE
(803) 831-3426 FAX

August 2, 2000

U.S. Nuclear Regulatory Commission
Attention: Document Control Desk
Washington, DC 20555-0001

Subject: Duke Energy Corporation
Catawba Nuclear Station Units 1 and 2
Docket Nos. 50-413 and 50-414
Emergency Plan Implementing Procedures

Please find enclosed for NRC Staff use and review the following Emergency Plan Implementing Procedures:

RP/0/A/5000/006A,	Notifications to States and Counties from the Control Room (Rev. 012)
RP/0/A/5000/006B,	Notifications to States and Counties from the Technical Support Center (Rev. 011)
RP/0/A/5000/007,	Natural Disaster and Earthquake (Rev. 019)
RP/0/B/5000/013,	NRC Notification Requirements (Rev. 025)
RP/0/A/5000/020,	Technical Support Center (TSC) Activation Procedure (Rev. 013)
RP/0/A/5000/024,	OSC Activation Procedure (Rev. 007)
RP/0/B/5000/028,	Communications and Community Relations EnergyQuest Emergency Response Plan (Rev. 001)
SR/0/B/2000/003,	Activation of the Emergency Operations Facility (Rev. 006)
SR/0/B/2000/004,	Notification to States and Counties from the Emergency Operations Facility (Rev. 001)

These revisions are being submitted in accordance with 10CFR 50.54(q) and do not decrease the effectiveness of the Emergency Plan Implementing Procedures or the Emergency Plan.

By copy of this letter, two copies of the above documents are being provided to the NRC, Region II.

A045

If there are any questions, please call Tom Beadle at 803-831-4027.

Very truly yours,

Gary R. Peterson

Attachments

xc (w/attachments):

L. A. Reyes
U.S. Nuclear Regulatory Commission
Regional Administrator, Region II
Atlanta Federal Center
61 Forsyth St., SW, Suite 23T85
Atlanta, GA 30303

(w/o attachments):

C. P. Patel
NRC Senior Project Manager (CNS)
U.S. Nuclear Regulatory Commission
Mail Stop O-8 H12
Washington, DC 20555-0001

D. J. Roberts
Senior Resident Inspector (CNS)
U.S. Nuclear Regulatory Commission
Catawba Nuclear Site

DUKE POWER COMPANY
CATAWBA NUCLEAR STATION
EMERGENCY PLAN IMPLEMENTING PROCEDURES INDEX

VOLUME I

PROCEDURE	TITLE
RP/0/A/5000/001	Classification of Emergency (Rev. 013)
RP/0/A/5000/002	Notification of Unusual Event (Rev. 035)
RP/0/A/5000/003	Alert (Rev. 037)
RP/0/A/5000/004	Site Area Emergency (Rev. 039)
RP/0/A/5000/005	General Emergency (Rev. 039)
RP/0/A/5000/06	Deleted
RP/0/A/5000/006 A	Notifications to States and Counties from the Control Room (Rev. 012)
RP/0/A/5000/006 B	Notifications to States and Counties from the Technical Support Center (Rev. 011)
RP/0/A/5000/006 C	Deleted
RP/0/A/5000/007	Natural Disaster and Earthquake (Rev. 019)
RP/0/A/5000/08	Deleted
RP/0/B/5000/008	Spill Response (Rev. 017)
RP/0/A/5000/009	Collision/Explosion (Rev. 005)
RP/0/A/5000/010	Conducting A Site Assembly or Preparing the Site for an Evacuation (Rev. 013)
RP/0/A/5000/11	Deleted
RP/0/B/5000/12	Deleted
RP/0/B/5000/013	NRC Notification Requirements (Rev. 025)
RP/0/B/5000/14	Deleted
RP/0/A/5000/015	Core Damage Assessment (Rev. 004)
RP/0/B/5000/016	Deleted
RP/0/B/5000/17	Deleted

DUKE POWER COMPANY
CATAWBA NUCLEAR STATION
EMERGENCY PLAN IMPLEMENTING PROCEDURES INDEX

VOLUME I

PROCEDURE	TITLE
RP/0/A/5000/018	Emergency Worker Dose Extension (1/15/96)
RP/0/B/5000/019	Deleted
RP/0/A/5000/020	Technical Support Center (TSC) Activation Procedure (Rev. 013)
RP/0/A/5000/021	Deleted
RP/0/B/5000/022	Evacuation Coordinator Procedure (Rev. 003)
RP/0/B/5000/023	Deleted
RP/0/A/5000/024	OSC Activation Procedure (Rev. 007)
RP/0/B/5000/025	Recovery and Reentry Procedure (Rev. 002)
RP/0/B/5000/026	Response to Bomb Threat (Rev. 001)
RP/0/B/5000/028	Communications and Community Relations EnergyQuest Emergency Response Plan (Rev. 001)

DUKE POWER COMPANY
CATAWBA NUCLEAR STATION
EMERGENCY PLAN IMPLEMENTING PROCEDURES INDEX

VOLUME II

PROCEDURE	TITLE
HP/0/B/1000/006	Emergency Equipment Functional Check and Inventory (Rev. 053)
HP/0/B/1009/001	Radiation Protection Recovery Plan (Rev. 007)
HP/0/B/1009/003	Radiation Protection Response Following a Primary to Secondary Leak (Rev. 008)
HP/0/B/1009/004	Environmental Monitoring for Emergency Conditions Within the Ten-Mile Radius of CNS (Rev. 027)
HP/0/B/1009/005	Personnel/Vehicle Monitoring for Emergency Conditions (Rev. 016)
HP/0/B/1009/006	Alternative Method for Determining Dose Rate Within the Reactor Building (Rev. 008)
HP/0/B/1009/007	In-Plant Particulate and Iodine Monitoring Under Accident Conditions (Rev. 018)
HP/0/B/1009/008	Contamination Control During Transportation of Contaminated Injured Individuals (Rev. 014)
HP/0/B/1009/009	Guidelines for Accident and Emergency Response (Rev. 038)
HP/0/B/1009/014	Radiation Protection Actions Following an Uncontrolled Release of Radioactive Material (Rev. 008)
HP/0/B/1009/016	Distribution of Potassium Iodide Tablets in the Event of a Radioiodine Release (Rev. 010)
HP/0/B/1009/017	Deleted
HP/1/B/1009/017	Post-Accident Containment Air Sampling System (Rev. 001)
HP/2/B/1009/017	Post-Accident Containment Air Sampling System (Rev. 000)
HP/0/B/1009/018	Deleted
HP/0/B/1009/019	Emergency Radio System Operation, Maintenance and Communication (Rev. 010)
HP/0/B/1009/024	Implementing Procedure for Estimating Food Chain Doses Under Post-Accident Conditions (Rev. 002)

DUKE POWER COMPANY
CATAWBA NUCLEAR STATION
EMERGENCY PLAN IMPLEMENTING PROCEDURES INDEX

VOLUME II

PROCEDURE	TITLE
HP/0/B/1009/025	Deleted
HP/0/B/1009/026	On-Shift Offsite Dose Projections (Rev. 002)
SH/0/B/2005/001	Emergency Response Offsite Dose Projections (Rev. 001)
SH/0/B/2005/002	Protocol for the Field Monitoring Coordinator During Emergency Conditions (Rev. 000)
OP/0/A/6200/021	Operating Procedure for Post Accident Liquid Sampling System II+ (Rev. 032)
SR/0/B/2000/001	Standard Procedure for Public Affairs Response to the Emergency Operations Facility (Rev. 002)
SR/0/B/2000/002	Standard Procedure for EOF Commodities and Facilities (Rev. 001)
SR/0/B/2000/003	Activation of the Emergency Operations Facility (Rev. 006)
SR/0/B/2000/004	Notification to States and Counties from the Emergency Operations Facility (Rev. 001)

(R08-97)

Duke Power Company
PROCEDURE PROCESS RECORD

(1)ID No. RP/0/A/5000/006A
Revision No. 012

PREPARATION

(2) Station Catawba Nuclear Station

(3) Procedure Title Notifications to States and Counties from the Control Room

(4) Prepared By B. R. Sett Date 7/4/00

(5) Requires 10CFR50.59 evaluation?
- ☒ Yes (New procedure or reissue with major changes)
- ☐ No (Revision with minor changes)
- ☐ No (To incorporate previously approved changes)

(6) Reviewed By Grant Mitchell (QR) Date 7/6/00.

Cross-Disciplinary Review By _____ (QR) NA Grant Date 7/6/00

Reactivity Mgmt. Review By _____ (QR) NA Grant Date 7/6/00.

(7) Additional Reviews

Reviewed By _____ Date _____

Reviewed By _____ Date _____

(8) Temporary Approval *(if necessary)*

By _____ (SRO/QR) Date _____

By _____ (QR) Date _____

(9) APPROVED BY Richard L Swigart Date 7/13/00

PERFORMANCE (Compare with control copy at least once every 14 calendar days while work is being performed)

(10) Compared with Control Copy _____ Date _____

Compared with Control Copy _____ Date _____

Compared with Control Copy _____ Date _____

(11) Dates(s) Performed _____

Work Order Number (W/O #) _____

COMPLETION

(12) Procedure Completion Verification

- ☐ Yes ☐ N/A Check lists and/or blanks properly initialed, signed, dated, or filled in NA, as appropriate?
- ☐ Yes ☐ N/A Listed enclosures attached?
- ☐ Yes ☐ N/A Data sheets attached, completed, dated and signed?
- ☐ Yes ☐ N/A Charts, graphs, etc. attached and properly dated, identified and marked?
- ☐ Yes ☐ N/A Procedure requirements met?

Verified By _____ Date _____

(13) Procedure Completion Approved _____ Date _____

(1 Remarks *(attach additional pages, if necessary)*

Duke Power Company Catawba Nuclear Station	Procedure No. RP/**0**/A/5000/006 A
Notifications to States and Counties From the Control Room	Revision No. 012
Multiple Use	Electronic Reference No. CN005GNQ

1. Symptoms

1.1 An emergency classification has been declared and an off-site agency notification is required.

2. Immediate Actions

Initial Notifications

NOTE:	1. The first notification for each of the four emergency classifications is the **Initial Notification**. The transmittal time for an initial notification must be within 15 minutes of the time the emergency classification was declared. Subsequent messages within the same classification are designated as **Follow-up Notifications** (see Section 3). 2. If any calls are received requesting information about the emergency and information is NOT on the Emergency Notification Form, refer to step 3.4 of Subsequent Actions. 3. Changes in Protective Action Recommendations and Termination notifications **must** be transmitted verbally. 4. Changes in Protective Action Recommendations must be transmitted within 15 minutes.

Operations Shift Manager/Emergency Coordinator Duties:

2.1 Obtain pre-printed Emergency Notification Form (ENF) for the appropriate EAL. These forms are located in the Control Room Off-site Agency Communicator's desk drawer.

2.2 Complete appropriate lines of the Emergency Notification Form for transmittal as the Initial Notification. Lines 11-14 may be left blank on Initial Notifications. Refer to Enclosure 4.3 for line by line instructions.

2.3 Delegate transmittal of Initial Emergency Notification Form to Control Room Off-site Agency Communicator.

Control Room Off-site Agency Communicator Duties:

2.4 Obtain copy of Authentication Code Word List (Enclosure 4.7) and Off-site Agency Communicator Guide (Enclosure 4.2) from Control Copy of Off-site Agency Communicator's Notebook.

2.5 Verbally transmit the Initial Emergency Notification Form to the Off-site Agencies using Enclosure 4.2 as a guide.

NOTE: TSC Communicators will assist with Faxing the notification form if requested.

2.6 After verbal transmission of initial notification, fax a copy of the Emergency Notification Form (front side only) to Energy Quest, TSC, EOF, JIC and Off-site Agencies. Refer to Enclosure 4.9 (Fax Communicator Checklist).

3. Subsequent Actions

Follow Up Notifications

NOTE:

1. Notifications following Initial Notifications within the same emergency classification are designated Follow-up Notifications.
2. Follow-up Notifications are required as follows:

   Every **hour** until the emergency is terminated

   OR

   If there is any significant change to the situation (make notification as soon as possible)

   OR

   As agreed upon with an Emergency Management official from each individual agency. Documentation shall be maintained for any agreed upon schedule change and the interval shall not be greater than 4 hours to any agency.
3. OSM/Emergency Coordinator should never approve a Follow-up Notification for a lesser classification after an upgrade to a higher classification is declared. Emphasis should be placed on providing current information and NOT on providing a message to meet a superseded deadline. If a follow-up is due and an upgrade in classification is declared, Off-site Agency Communicators should contact the agencies that the pending follow-up is being superseded by an upgrade in classification and information will be provided within 15 minutes.
4. Termination of the emergency will be transmitted as a Follow-up Notification. Refer to Enclosure 4.4 (Termination) for instructions.
5. Use Enclosure 4.6 (Emergency Status Sheet) as necessary to track Follow-up Notification due times.
6. Changes in Protective Action Recommendations and Termination notifications **must** be transmitted verbally.
7. Changes in Protective Action Recommendations must be transmitted within 15 minutes.

3.1 Complete ENF for Follow-up Notifications. Refer to Enclosure 4.3 for line by line instructions.

3.2 Delegate transmittal of Follow-up Emergency Notification to Control Room Communicator.

3.3 Transmit Follow-up Emergency Notifications to Off-site Agencies by one of the following methods:

NOTE: **1.** Changes in Protective Action Recommendations and Termination notifications **must** be transmitted verbally.

2. Changes in Protective Action Recommendations must be transmitted within 15 minutes.

3.3.1 **Verbally** - Follow verbal transmission by faxing a courtesy copy to the EOF, TSC, EnergyQuest, JIC and Off-site Agencies.

OR

3.3.2 **Fax** the Off-site Agencies, Energy Quest, TSC, EOF, and JIC a copy of the Emergency Notification Form. Call each Off-site Agency to verify receipt and give opportunity for questions. Record Off-site Agency representative name on back side of Emergency Notification Form.

3.4 **Other Information**

3.4.1 **IF** any off-site call is received in the Control Room requesting information about the emergency which is not contained on the Emergency Notification Form, perform the following:

1. Authenticate (Enclosure 4.8) the request to ensure the caller is a legitimate Off-site Agency Official.

2. Log the question, caller's name and agency in the Off-site Agency Communicator's Logbook. (Logbook is located at the Off-site Agency Communicator's desk in the Control Room).

3. OSM/Emergency Coordinator will provide information requested and sign the log entry to document approval for transmission. Transmittal time should also be documented in the logbook.

4. Enclosures

4.1 Emergency Notification Form (ENF)

4.2 Emergency Notification to Off-site Agencies, Off-site Communicator Guide

4.3 Initial/Follow-up Notification Message Completion

4.4 Termination Notification Completion/Transmission

4.5 Communications Systems

4.6 Emergency Status Sheet

4.7 Message Authentication Code List

4.8 Authentication Instructions

4.9 Fax Communicator Checklist

4.10 Additional Reportable Events

EMERGENCY NOTIFICATION

1. [A] THIS IS A DRILL [B] ACTUAL EMERGENCY [ ] INITIAL [ ] FOLLOW-UP MESSAGE NUMBER _____

. SITE: Catawba Nuclear Site UNIT: _____ REPORTED BY: _____

3: TRANSMITTAL TIME/DATE: _____ (Eastern) ____/____/____ mm dd yy CONFIRMATION PHONE NUMBER: (803) 831-8185 (Control Rm)

4. AUTHENTICATION (If Required): _____ (Number) _____ (Codeword)

5. EMERGENCY CLASSIFICATION:
[A] NOTIFICATION OF UNUSUAL EVENT [B] ALERT [C] SITE AREA EMERGENCY [D] GENERAL EMERGENCY

6. [A] Emergency Declaration At: [B] Termination At: TIME/DATE: _____ (Eastern) ____/____/____ mm dd yy (If B, go to item 16.)

7. EMERGENCY DESCRIPTION/REMARKS: _____

8. PLANT CONDITION [A] IMPROVING [B] STABLE [C] DEGRADING

9. REACTOR STATUS: [A] SHUTDOWN: TIME/DATE: _____ (Eastern) ____/____/____ mm dd yy [B] _____% POWER

10. EMERGENCY RELEASE(S):
[A] NONE (Go to item 14.) [B] POTENTIAL (Go to item 14.) [C] IS OCCURRING [D] HAS OCCURRED

**11. TYPE OF RELEASE: [ ] ELEVATED [ ] GROUND LEVEL
[A] AIRBORNE: Started: _____ Time(Eastern) ____/____/____ Date Stopped: _____ Time(Eastern) ____/____/____ Date
[B] LIQUID: Started: _____ Time(Eastern) ____/____/____ Date Stopped: _____ Time(Eastern) ____/____/____ Date

**12. RELEASE MAGNITUDE: [ ] CURIES PER SEC. [ ] CURIES NORMAL OPERATING LIMITS: [ ] BELOW [ ] ABOVE
[A] NOBLE GASES _____ [B] IODINES _____
[C] PARTICULATES _____ [D] OTHER _____

**13. ESTIMATE OF PROJECTED OFFSITE DOSE:. [ ] NEW [ ] UNCHANGED PROJECTION TIME: _____ (Eastern)

	TEDE mrem	Thyroid CDE mrem
SITE BOUNDARY		
2 MILES		
5 MILES		
10 MILES		

ESTIMATED DURATION: _____HRS.

**14 METEOROLOGICAL DATA: [A] WIND DIRECTION (from) _____° [B] SPEED (MPH) _____
[C] STABILITY CLASS _____ [D] PRECIPITATION (type) _____

15. RECOMMENDED PROTECTIVE ACTIONS
[A] NO RECOMMENDED PROTECTIVE ACTIONS
[B] EVACUATE _____
[C] SHELTER IN-PLACE _____
[D] OTHER _____

16. APPROVED BY: _____ (Name) Operations Shift Manager (Title) TIME/DATE: _____ (Eastern) ____/____/____ mm dd yy

* If items 8 - 14 have not changed, only items 1 - 7 and 15 - 16 are required to be completed.
** Information may not be available on Initial Notifications.

GOVERNMENT AGENCIES NOTIFIED

Record the name, date, time and agencies notified:

1. (name) York County
   (date) (time) (agency) Sel. Sig. 513 Bell Line (803) 329-1110
2. (name) Mecklenburg County
   (date) (time) (agency) Sel. Sig. 116 Bell Line (704) 943-6200
3. (name) Gaston County
   (date) (time) (agency) Sel. Sig. 112 Bell Line (704) 866-3300
4. (name) South Carolina WP/EOC
   (date) (time) (agency) Sel. Sig. 518 Bell Line (803) 737-8500
5. (name) North Carolina WP/EOC
   (date) (time) (agency) Sel. Sig. 314 Bell Line (919) 733-3300
6. (name)
   (date) (time) (agency)
7. (name)
   (date) (time) (agency)

Enclosure 4.2

Emergency Notification to Off-site Agencies, Off-site Communicator Guide

NOTE:
1. Use Selective Signal phone as primary communication device. Use Bell line as first back-up, radios as second back-up and the Satellite Phone as the third back-up.
2. Selective Signal may be used simultaneously with Bell line (or other back-up) if an agency fails to receive Selective Signal call.
3. Refer to Enclosures 4.5 for further information regarding back-up communication devices.

1. Establish communications with Off-site Agencies using the Selective Signaling phone:

   Dial *5 to call all agencies simultaneously. If all agencies do not answer, dial the agencies that do not answer individually as indicated below.

   - As each agency answers, say:

"This is Catawba Nuclear Station, Hold Please."

SELECTIVE SIGNAL			BELL LINE
Comm Check	Selective Signal # Agency		Individual phone numbers OR One touch dial button
	513 York County (WP/EOC)		803/329-1110
	116 Mecklenburg County (WP/EOC)		704/943-6200
	112 Gaston County (WP/EOC)		704/866-3300
	518 S.C. (WP/EOC)		803/737-8500
	314 N.C. (WP/EOC)		919/733-3300

For additional phone numbers, refer to the Emergency Response Telephone Directory.

2. Document the time all agencies are "on line" on line 3 of Emergency Notification Form.

   Say:

"This is the Catawba Nuclear Station Control Room. This is a drill/emergency. The following is Emergency Notification Information."

3. Transmit Notification Message

   - Slowly read Emergency Notification Message line by line to the agencies allowing time for them to copy the information.
   - To authenticate on line 4: Ask one of the agencies to give you a number, then you will give the corresponding word (document on line 4). Refer to Enclosure 4.8 if authentication instructions are needed.

4. Obtain names of each agency representative. Say:

"I need to verify the name of each agency representative. When I call out the agency, please give your name.

   - Transfer Name, Date, and Time to back side of ENF.*

     * Date and time do not need to be transferred if all parties were on line at the time of message transmission.

5. Say:

"This concludes message #_____. You will be receiving a FAX copy of this message shortly. Are there any questions?"

NOTE:	If question is outside of ENF information, do not answer question.

1. Have the request evaluated by the OSM/Emergency Coordinator.
2. Keep a log of the question, answer, and the time the answer was transmitted.

Enclosure 4.3

Initial/Follow-up Notification Message Completion

Line	Fill out the Emergency Notification Form as follows:	Info Source
1.	Check appropriate blocks: (Drill/Emergency).(Initial/Follow-up) **Initial**: First message in each of the 4 classifications. **Follow-up**: Subsequent messages following the initial message within the same classification. Message #'s are sequentially numbered throughout drill/emergency starting with the Control Room.	OPS Shift Mgr. or Designee
2.	Write in site and unit or units affected and the "Reported by" name NOTE: "Reported by" is communicator's name.	OPS Shift Mgr. or Designee/
3.	Assure confirmation phone number. Document the "transmittal time" at the beginning of message transmission. (Note: Transmittal time is: **Initial** - when all Agencies are verified on the line.	Communicator
4.	Authentication will be completed while transmitting the notification to states and counties (Encl 4.7/4.8).	Communicator
5.	Check appropriate emergency classification.	OPS Shift Mgr/ Designee
6.	Mark box "A" and write time and date current classification is declared.	OPS Shift Mgr/ Designee
7.	**NOTE**: Do not use acronyms or technical abbreviations! It is appropriate to abbreviate understood terms such as gallons per minute (gpm). A. Write a concise description for declaring the current emergency classification. B. Follow emergency description with any other information that requires off-site agency support Refer to Enclosure 4.10 for additional reportable events. For **Follow-up** messages, include relevant information and changes that have occurred since the last message **(Don't just restate the EAL or last message).**	OPS Shift Mgr. or Designee
	Mark appropriate plant condition: **Improving** - Emergency conditions are improving in the direction of a lower classification or termination of the event. **Stable** - The emergency situation is under control. Emergency core cooling systems, equipment, plant, etc., are operating as designed. **Degrading** - Given current and projected plant conditions/equipment status, recovery efforts are not expected to prevent entry into a higher emergency classification or the need to upgrade off-site Protective Action Recommendations	OPS Shift Mgr. or Designee
9.	Write time and date Reactor Shutdown [A] or Reactor Power [B] level as applicable.	OPS Shift Mg. or Designee
10.	Mark appropriate box for emergency release. If A or B, go to Item 14. If C or D, complete Lines 11-14. A release is any unplanned and quantifiable discharge to the environment of radioactive effluent attributable to a declared emergency event. Base determinations on information such as EMF readings, containment pressure and other instrument indications, field monitoring results, and knowledge of the event and its impact on system operation and resultant release pathways. A release is considered to be in progress if the following occurs: • Rx. Bldg. EMF monitors (38, 39 or 40 reading indicates an increase in activity or EMF monitors 53A or 53B read greater than 1.5 R/hr) AND pressure inside the containment building is greater than Tech. Specs. OR an actual containment breach is determined. • Increase in activity monitored by unit vent EMF monitors 35, 36, or 37. • Steam generator tube leak monitored by EMF 33.	OPS Shift Mgr. or Designee
11. - 14.	• Items 11-14 may be left blank on initial notifications. • Items 11-14 - On-Shift Dose Assessment will provide information for follow-up messages..	
15.	• For Unusual Event, Alert, & Site Area Emergency, mark box "A." • For General Emergency, mark and complete information for boxes B & C using RP/0/A/5000/005 (General Emergency).	OPS Shift Mgr. or Designee
16.	Have Operations Shift Manager approve message.	OPS Shift Mgr.

Enclosure 4.4

Termination Notification Completion/Transmission

Fill out the Emergency Notification Form as follows:

NOTE: When sending a termination notification, a follow-up message should be marked on the Emergency Notification Form.

1. Completion

Item #	Action	Source of Information
1.	Check appropriate blocks NOTE: **Message #'s are sequentially numbered** throughout the drill/emergency starting with the Control Room. Termination Notification is to be designated as "Follow-up."	Operations Shift Manager or Designee
2.	Write in site and unit or units affected. Note: Reported by is communicator's name	Operations Shift Manager or Designee
3.	A. Transmittal time is the time you verify all agencies are on the line. B. Assure confirmation phone number that state and counties may call back on is listed.	
4.	Authentication will be completed while transmitting the notification to states and counties.	
5.	Check appropriate classification that is being terminated from.	Operations Shift Manager or Designee
6.	Mark box "B" and write time and date of termination.	Operations Shift Manager or Designee
7	Enter Event/Drill has been terminated as of _____.	
16.	Have Emergency Coordinator approve message.	Operations Shift Mgr./ Emergency Coordinator

2. Transmission

NOTE:	All termination notifications are verbal. Avoid using abbreviation or jargon likely to be unfamiliar to states and counties. If any information is not available or not applicable, write out "Not available" or "Not Applicable" in the margin or other space as appropriate. Do not abbreviate "N.A." because this is ambiguous.

1. Ensure all Counties and States are on the line. Document this time in item # 3.

2. Tell them you have a termination notification and to get out the notification form.

3. Read the message aloud to the State and Counties allowing time for them to copy the information.

4. When you reach item # 4, ask the State or a County to provide a number from the authentication code word list. Then give them the code word corresponding with that number. Write the number and code word on the form.

5. After communicating the entire message, ask if there are any questions. Ask for individual's names and write the names on the back of the form.

6. After verbally transmitting the message, FAX (front page only) of the notification form to the appropriate agencies per Enclosure 4.9.

The following is the suggested priority for the communications systems used to notify the state and counties.

1. **Selective Signaling System**
2. **Commercial Telephone** (Conference Call – bottom of this page)
3. ***a. Duke Power Low Band Radio Network** (Counties)

   ***b. SC and NC Emergency Radio** (States) (Located in the TSC only – If this radio is needed, send a person to the TSC to make this communication)
4. ***Satellite Telephone**

   * Refer to the Emergency Response Telephone Directory for operating instructions

SELECTIVE SIGNALING
NOTES: 1. Selective Signaling is an open line that is capable of connecting all agencies together at the same time. No special conferencing process is required to get all agencies on the line. The line is always active (i.e., no dial tone). *5 may be used initially to contact county and warning points/EOCs. 2. The handset has a "push to talk" button which must be pressed in order for the parties on the other end to hear you. To use the headset instead of the handset, set the switch on the headset controller to "headset" and remove the handset from the phone cradle. Then resume normal operation. There is no "push to talk" feature associated with the headset, **however, the handset must be removed from the cradle when the headset is in use.**
1. Pick up receiver (no dial tone will be heard). Dial * 5 and wait for agencies to answer. Verify that all agencies have answered. Note: If all agencies do not answer the group call, dial the agencies individually per step 2).
2. Alternately, the agencies may be contacted individually by dialing the three digit Selective Signal number for each agency. When they pick up, identify yourself and tell them to hold while you get the other agencies on the line. Dial the second agency's three-digit Selective Signal number. When they pick up, identify yourself and tell them to hold while you get the other agencies on the line. 513 York County (WP/EOC) 116 Mecklenburg County (WP/EOC) 112 Gaston County (WP/EOC) 518 SC (WP/EOC) 314 NC (WP/EOC)
3. Continue this process until all applicable agencies are on the line.
COMMERCIAL TELEPHONE (Conference Call)
1. Pick up the receiver, PRESS preprogrammed button or dial agency number; when they pick up, tell them to hold, PRESS FLASH
2. PRESS preprogrammed number or dial 2nd agency number; when they pick up, tell them to hold, PRESS CONF. Tell both parties to hold, then PRESS FLASH.
3. Repeat Step 2 until you have conferenced all of the appropriate agencies.

Emergency Status Sheet

Initial Notification Within 15 minutes Simulator #3167 EOF # (704)382-0724

TSC # 3438 or (803)831-7410

					WP-117
	513	112	116	518	EOC-314
Communication Check:	York	Gaston	Meck	SC	NC

UNUSUAL EVENT	ALERT	SITE AREA EMERGENCY	GENERAL EMERGENCY
Time Declared:	Time Declared:	Time Declared:	Time Declared:
Message Due Out:	Message Due Out:	Message Due Out:	Message Due Out:
Messages	Messages	Messages	Messages
Time	Time	Time	Time
Msg #_Out_____	Msg #_Out_____	Msg #_Out_____	Msg #_Out_____
Next Msg Due _____	Next Msg Due _____	Next Msg Due _____	Next Msg Due _____
Msg #_Out_____	Msg #_Out_____	Msg #_Out_____	Msg #_Out_____
Next Msg Due _____	Next Msg Due _____	Next Msg Due _____	Next Msg Due _____
Msg #_Out_____	Msg #_Out_____	Msg #_Out_____	Msg #_Out_____
Next Msg Due _____	Next Msg Due _____	Next Msg Due _____	Next Msg Due _____
Follow-up Msg (1 hr)	Follow-up Msg (1 hr)	Follow-up Msg (1 hr)	Follow-up Msg (1 hr)

This page is left intentionally blank.

PLACING A CALL

When providing Emergency Notification Form information to the Off-site Agencies, the Communicator should:

1. Ask a State or County Representative to provide a number from the Authentication Code Word list.
2. Then give them the code word corresponding with the number from Enclosure 4.7, "Message Authentication Code List."
3. Write the number and code word on the Emergency Notification Form (Line 4).

RECEIVING A CALL

When receiving a call from off site and the identity of the party calling is not known, you should:

1. Provide a number from Enclosure 4.7, "Message Authentication Code List," to the caller.
2. The caller will then provide the word corresponding with the number of the Message Authentication Code List.
3. Document in Communicator's Logbook.
4. Rule of Thumb: Caller - gives word

   Callee - gives number

1. Faxing Process

1.1 This enclosure provides instruction for faxing the ENF to the primary WP/EOCs. Refer to the following sections of this enclosure for the desired method:

Section 2 - AT&T Enhanced Fax - Preprogrammed Button Method
Section 3 - AT&T Enhanced Fax - Dialing Method
Section 4 - Individually (Via Fax Machine)

2. AT&T Enhanced Fax - Preprogrammed Button Method

NOTE: 1. This process will fax to the following locations simultaneously:

York County	North Carolina	Technical Support Center (TSC)
Gaston County	South Carolina	Emergency Operations Facility (EOF)
Mecklenburg County	EnergyQuest	Joint Information Center (JIC)

2. If a problem is experienced using the AT&T Enhanced Fax Service, send the fax to the agencies individually utilizing one of the other faxing methods.

3. Process may be completed without waiting for the prompts.

_____ 2.1 Place the Notification Form face down in the Fax machine.

_____ 2.2 Using the AT&T Enhanced Fax Phone located by the Fax machine, take the phone off the hook by using the speaker phone option (SP-Phone button) or handset.

2.3 Perform the following:

_____ 2.3.1 Press the preprogrammed button labeled ***AT&T Enhanced Fax***.

_____ 2.3.2 Wait to hear: "***Welcome to AT&T Enhanced Fax ,***" then,

_____ 2.3.3 Press the preprogrammed button labeled ***Subscriber ID***, then

_____ 2.3.4 Press the preprogrammed button labeled ***Password*** (You will hear "*Logging in, please wait*")

_____ 2.3.5 Wait to hear: "*Login Successful*," then

_____ 2.3.6 Press **1,** then

_____ 2.3.7 Press * **5** (Recipient List), then

_____ 2.3.8 Press # (Own Private List), then

_____ 2.3.9 Press **1** # (List Name), then

_____ 2.3.10 Press * # (No other lists to add)

_____ 2.3.11 Press **START** on the Fax machine

_____ 2.3.12 Hang up the phone. (The Fax Service will then fax the Notification Form to the designated facilities).

_____ 2.4 Ensure the primary off-site agencies have received the Fax.

3. AT&T Enhanced Fax - Dialing Method

NOTE: 1. This process will fax to the following locations simultaneously:

York County	North Carolina	Technical Support Center (TSC)
Gaston County	South Carolina	Emergency Operations Facility (EOF)
Mecklenburg County	EnergyQuest	Joint Information Center (JIC)

2. If a problem is experienced using the AT&T Enhanced Fax Service, send the fax to the agencies individually utilizing one of the other faxing methods.

3. Process may be completed without waiting for the prompts.

_____ 3.1 Place the Notification Form face down in the Fax machine.

_____ 3.2 Using the AT&T Enhanced Fax Phone located by the Fax machine, take the phone off the hook by using the speaker phone option (SP-Phone button) or handset.

3.3 Perform the following:

_____ 3.3.1 Dial **1-800-232-9674**, then

_____ 3.3.2 Wait to hear: "***Welcome to AT&T Enhanced Fax,***" then

_____ 3.3.3 Dial **5 3 0 9 1 2 8 #** (Subscriber ID), then

_____ 3.3.4 Dial 4 8 6 6 6 3 5 2 # (Password) (You will hear "*Logging in, please wait*")

_____ 3.3.5 Wait to hear: "***Login Successful,***" then

_____ 3.3.6 Press **1**, then

_____ 3.3.7 Press * **5** (Recipient List), then

_____ 3.3.8 Press # (Own Private List), then

_____ 3.3.9 Press **1** # (List Name), then

_____ 3.3.10 Press * # (No other lists to add)

_____ 3.3.11 Press **START** on the Fax machine.

_____ 3.3.12 Hang up the phone (The fax service will then fax the Notification form to the designated facilities).

_____ 3.4 Ensure the primary off-site agencies have received the fax.

4. Individually (Via Fax Machine)

4.1 To send a fax to multiple locations using the one touch dialing or direct dialing:

_____ 4.1.1 Place the Fax you are transmitting face down into the Fax machine.

4.1.2 Press the preprogrammed one-touch speed dial numbers for the following:

	Press	Energy Quest
	Press	Joint Information Ctr (JIC)
	Press	York Co. WP/EOC
	Press	Gaston Co. WP/EOC
	Press	Meck Warning Pt.
	Press	S.C. WP/EOC
	Press	N.C. WP/EOC
	Press	TSC
	Press	EOF

_____ 4.1.3 Press **Start**.

4.2 To send a Fax to a **single** location using one-touch dialing or direct dialing:

_____ 4.2.1 Insert the document face down

4.2.2 Press the designated agency button labeled on the Fax machine one at a time.

	Press	Energy Quest	or dial	8-831-3415
	Press	Joint Information Ctr (JIC)	or dial	382-0069
	Press	York Co. WP/EOC	or dial	1-803-324-7420
	Press	Gaston Co. WP/EOC	or dial	1-704-866-7623
	Press	Meck Warning Pt.	or dial	1-704-943-6189
	Press	S.C. WP/EOC	or dial	1-803-737-8575
	Press	N.C. WP/EOC	or dial	1-919-733-7554
	Press	EOF	or dial	1-704-382-0722

_____ 4.2.3 Ensure Fax was sent to the designated agency or agencies via the Fax report(s) or phone. Resend as appropriate.

5. AT&T Enhanced Fax Message Retrieval

5.1 IF a Fax is not delivered via the AT&T Enhanced Fax process or if there are problems experienced utilizing the AT&T Enhanced Fax process, the system will generate an ERROR MESSAGE. To retrieve messages from the AT&T Enhanced Fax Service, perform the following:

_____ 5.1.1 Place the Notification form in the Off-site Communicator Fax machine

_____ 5.1.2 Using the Fax telephone located next to the Off-site Communicator Fax machine perform the following:

_____ A. Press the preprogrammed button labeled **AT&T Enhanced Fax** (or dial 1-800-232-9674)

_____ B. Press the preprogrammed button labeled **Subscriber ID** (or dial 5 3 0 9 1 2 8 #)

_____ C. Press the preprogrammed button labeled **Password** (or dial 4 8 6 6 6 3 5 2 #) (*Logging in, Please Wait...*)

_____ D. When Login is verified Successful, **Press 2** (to receive a message)

_____ 5.1.3 Press Start on the Fax machine.

_____ 5.1.4 When prompted, hang up phone.

During a declared emergency, the following are events that should be reported to Off-site Agencies in addition to the Emergency to the Emergency Action Level (EAL)requirements. These events may be the basis for the current emergency classification or an additional event to be reported under Step 7 of the Emergency Notification Form. These events may need off-site agency action or resolution.

- Fires
- Flooding
- Explosions
- Major/Key Equipment Out of Service
- Loss of Off-site Power
- Core Uncoverings
- Core Damage
- Injuries
- Deaths
- Contaminated Individuals
- Individuals Transported Off Site
- Site Evacuations
- Saboteurs
- Intruders
- Chemical or Hazardous Material Spills or Releases
- Extraordinary Noise Audible Off Site

(R08-97)

Duke Power Company
PROCEDURE PROCESS RECORD

(1)ID No. RP/0/A/5000/006B
Revision No. 011

PREPARATION

(2) Station Catawba Nuclear Station

(3) Procedure Title Notifications to States and Counties from the Technical Support Center

(4) Prepared By Duane R Stitt Date 7/18/00

(5) Requires 10CFR50.59 evaluation?
- [X] Yes (New procedure or reissue with major changes)
- [ ] No (Revision with minor changes)
- [ ] No (To incorporate previously approved changes)

(6) Reviewed By Gary L Mitchell (QR) Date 7/18/00

Cross-Disciplinary Review By _____ (QR) NA GLM Date 7/18/00

Reactivity Mgmt. Review By _____ (QR) NA GLM Date 7/18/00

(7) Additional Reviews

Reviewed By _____ Date _____

Reviewed By _____ Date _____

(8) Temporary Approval *(if necessary)*

By _____ (SRO/QR) Date _____

By _____ (QR) Date _____

(9) APPROVED BY Richard L Swaingat Date 7/18/00

PERFORMANCE (Compare with control copy at least once every 14 calendar days while work is being performed)

(10) Compared with Control Copy _____ Date _____

Compared with Control Copy _____ Date _____

Compared with Control Copy _____ Date _____

(11) Dates(s) Performed _____

Work Order Number (W/O #) _____

COMPLETION

(12) Procedure Completion Verification

- [ ] Yes [ ] N/A Check lists and/or blanks properly initialed, signed, dated, or filled in NA, as appropriate?
- [ ] Yes [ ] N/A Listed enclosures attached?
- [ ] Yes [ ] N/A Data sheets attached, completed, dated and signed?
- [ ] Yes [ ] N/A Charts, graphs, etc. attached and properly dated, identified and marked?
- [ ] Yes [ ] N/A Procedure requirements met?

Verified By _____ Date _____

(13) Procedure Completion Approved _____ Date _____

(14) Remarks *(attach additional pages, if necessary)*

10CFR50.54(q) EVALUATION CHECKLIST

Page 1 of 2

SITE:	EVALUATION CHECKLIST APPLICABLE TO:
☒ Catawba Nuclear Site	☐ Emergency Plan Revision No: _____
☐ McGuire Nuclear Site	☒ Emergency Plan Implementing Procedure No: RP/0/A/5000/006B, Revision 011
☐ Oconee Nuclear Site	☐ N/A Emergency Planning Functional Area Manual Section Number: _____
	☐ N/A Other Document : _____

1. Does the change/revision decrease the effectiveness of the plan resulting in the loss of reasonable assurance that adequate protection can and will be taken in the event of a radiological emergency as required by 10CFR50.47(a)?

   ☐ YES ☒ NO

Justification for Answer (Attach additional pages as needed):
(Explain how the change/revision maintains reasonable assurance of adequate protective actions. An explanation may be based on an assessment of its effects on public health and safety, a review of applicable plans, procedures, and resources, or by demonstration of the affected capabilities in a drill or exercise. Consideration should be given to any applicable site-specific planning needs.)

See attached 50.54(q) Synopsis Of Change Attachment

2. Does the change/revision result in the loss of ability to meet any of the standards or applicable requirements described in 10CFR50.47(b) and the requirements in 10CFR50 Appendix E or any NRC approved alternatives to those standards and requirements? (See page 2 of 2)

   ☐ YES ☒ NO

Justification for Answer (Attach additional pages as needed):
(Explain any change that reasonably brings into question the ability to meet any of the sixteen standards described in 10CFR50.47(b), and any applicable requirements of 10CFR50.47(d) or any NRC approved alternatives to those requirements.)

See attached 50.54(q) Synopsis Of Change Attachment

3. Does this change/revision delete or contradict any regulatory requirement?

   ☐ YES ☒ NO

Justification for Answer (Attach additional pages as needed):

See attached 50.54(q) Synopsis Of Change Attachment

Prepared By: _____ Date: 7/18/00

Reviewed By: GARY L. MITCHELL Date: 7/18/00.

Attach description of proposed change.

10CFR50.54(q) EVALUATION CHECKLIST
Page 2 of 2

10CFR50.47 (b) Review		
Does this change affect any of the following subject areas of 10 CFR 50.47(b)?		
1. Assignment of ERO responsibilities	☐ Yes	☒ No
2. Assignment of on-shift ERO personnel	☐ Yes	☒ No
3. Arrangement for utilizing State or local resources and staff	☐ Yes	☒ No
4. EALs	☐ Yes	☒ No
5. Notifications to off-site agencies, the ERO or the public	☐ Yes	☒ No
6. Communications between off-site agencies, the ERO, or the public	☐ Yes	☒ No
7. Dissemination of public information	☐ Yes	☒ No
8. Adequacy of emergency facilities and equipment	☐ Yes	☒ No
9. Methods, systems, and equipment for off-site response to a radiological emergency	☐ Yes	☒ No
10. Protective Action Recommendations / Determination	☐ Yes	☒ No
11. Emergency Worker radiological control	☐ Yes	☒ No
12. Medical services for contamination injured personnel	☐ Yes	☒ No
13. Re-entry / Recovery plans	☐ Yes	☒ No
14. Drills and exercises	☐ Yes	☒ No
15. Radiological emergency response training	☐ Yes	☒ No
16. Plan development, review and distribution	☐ Yes	☒ No

10CFR50. Appendix E Review		
Does this change effect any of the following subject areas of 10 CFR 50, Appendix E?		
(i)(ii)(iii) Emergency plans as described in the FSAR	☐ Yes	☒ No
(iv) A. Organization for coping with radiological emergencies	☐ Yes	☒ No
(iv) B. Assessment of radiological emergencies	☐ Yes	☒ No
(iv) C. Classifications, EALs and ERO activation	☐ Yes	☒ No
(iv) D. Notification of Federal, State and local agencies and the public	☐ Yes	☒ No
(iv) E. ERFs, equipment, and communications	☐ Yes	☒ No
(iv) F. Training, drills, and exercises	☐ Yes	☒ No
(iv) G. Plans and procedures and surveillance of equipment and supplies	☐ Yes	☒ No
(iv) H. Re-entry and Recovery following an accident	☐ Yes	☒ No

Comments:
See attached 50.54(q) Synopsis Of Change Attachment

50.54(Q) SYNOPSIS OF CHANGE ATTACHMENT

Emergency Plan Revision No: _____
Emergency Plan Implementing Procedure No: RP/0/A/5000/006B, Revision 011
Emergency Planning Functional Area Manual Section Number: _____
Other Document : _____

DESCRIPTION OF CHANGE:

1. Added the clarifying notes to Section 2 page 2 of 6. These included performing steps out of sequence, sign off lines are for place keeping, and changes in Protective action recommendations must be transmitted verbally and within 15 minutes.

2. Reformatted various sections and enclosures to facilitate the notification process.

3. Added the clarifying notes to Section 3 page 4 of 6, and 5 of 6. These included the facility that makes a classification should be the facility that makes the notification and Follow-up notifications that involve a change in protective action recommendations shall be communicated verbally and within 15 minutes

4. Revised procedure (enclosure 4.1) to incorporate the new electronic notification form process.

5. Removed reference section from enclosure 4.2, line 7 instructions.

6. Revised and reformatted enclosures 4.3, section 1 to clearly define the notes and action of the process.

7. Revised enclosure 4.3 section 3 to reflect York County, South Carolina (SC) and North Carolina (NC) phone number changes. York changed from 803-325-2580 to 803-320-1110, SC changed from 803-734-8020 to 803-737-8500 and NC changed from 919-733-3942 to 919-733-3300.

8. Revised Enclosure 4.3, section 4 to clarify follow-up transmittal time.

9. Completely revised Enclosure 4.4 (fax instructions) to clarify the AT&T enhanced fax process.

10. Miscellaneous editorial changes.

JUSTIFICATION FOR CHANGE (From Questions 1, 2 & 3 on Page 1):

This procedure revision incorporates editorial and enhancements to the procedure and does not change, delete or add to any Emergency Plan commitments contained in the Emergency Plan or other associated documents.

Duke Power Company Catawba Nuclear Station **Notifications to States and Counties from the Technical Support Center** **Multiple Use**	Procedure No. RP/**0**/A/5000/006 B Revision No. 011 Electronic Reference No. CN005GNR

1. Symptoms

1.1 An emergency has been declared and an Off-Site Agency notification is required.

2. Immediate Actions

NOTE: 1. Steps may be performed out of sequence at the discretion of the communicator.

2. Sign off lines are for "place-keeping" and are not required to be initialed. The notification form will serve as the official documentation for the notification of the Off-site Agencies.

3. Changes in Protective Action Recommendations must be transmitted within 15 minutes.

4. Changes in Protective Action Recommendations and Termination Notifications must be transmitted verbally.

_____ 2.1 TSC activation:

2.1.1 One TSC Communicator shall proceed directly to the Control Room (C/R) (Simulator during drills) to obtain an update from Operations.

2.1.2 The TSC Turnover Communicator should communicate with the TSC to provide turnover information per section 2.3.

_____ 2.2 A second Off-site Communicator shall proceed to the TSC and sign in on the TSC "sign-in" board and begin the Off-site Communicator duties.

_____ 2.2.1 Contact the Off-site Communicator in the Control Room and perform the following:

_____ A. Obtain the TSC Communicator's Notebook to have immediate access to the Authentication Codeword list and blank hard copies of the Notification form..

_____ B. Ensure that notification forms initiated in the Control Room have been faxed.

_____ C. Provide copies of the previously transmitted forms to the following:

___ Emergency Coordinator **___ OPS Supt.**

___ Dose Assessment **___ NRC Communicator**

___ TSC Logkeeper **___ Emergency Planner**

___ NRC

D. Inform the C/R that you are going to begin the communications check with the Off-site Agencies.

_____ 2.3 Acquire information on the communication status described below:

- Emergency Classification (Circle One) (NOUE, Alert, Site Area Emergency, General Emergency)
- Emergency Declared at _____hrs.
- Last Message #_____ transmitted out at _____ (time)
- Next Message Due at _____ (time)
- Any other pertinent information related to the emergency.

____ 2.4 Call the states and counties (WP/EOC) via Selective Signaling to verify communications can be established. Be sure that the Off-Site Agencies understand that this is only a "communications check" from the TSC.

Use * **5** to call all primary agencies or each agency may be dialed individually.

COMM. CHECK (✓ if OK.)	SELECTIVE SIGNAL (SS)
	513 York County (WP/EOC)
	116 Mecklenburg (WP/EOC)
	112 Gaston County (WP/EOC)
	518 South Carolina (WP/EOC)
	314 North Carolina (WP/EOC)

NOTE: Refer to **Enclosure 4.3 (Page 1)** for Selective Signaling and/or alternate communications instructions.

____ 2.5 After completion of the communication check inform the Emergency Coordinator that communications can be established and assist in coordinating turn over from the Control Room.

NOTE:
1. As the situation dictates, completion of the Notification form may be accomplished utilizing the Electronic Notification Form program or manually by completing a hard copy.
2. **IF** the Electronic Notification Form (ENF) program is **NOT** operational or practical, refer to **Enclosure 4.2** for manual completion and **Enclosure 4.3** for standard transmission of the notification form. **Notify TSC Data Coordinator of any computer problems.**

____ 2.6 Power up Off-Site Communicator computer and LOGON to the Network per the following:
User Name: **CNSEP2**
Password: **CNSEP2**
Domain: **POWER**

_____ 2.7 Ensure that the electronic version of the Emergency Notification Form (ENF) can be accessed. (Reference Enclosure 4.1, Step 1.2 for logon instructions).

_____ 2.8 Ensure that the electronic ENF can also be accessed by:

_____ Dose Assessment

_____ 2.9 Verify the Off-Site Communicator area clock is synchronized with the OAC satellite clock. (Located above Screen #2 in the TSC Emergency Coordinator's Area.)

3. Subsequent Actions

_____ 3.1 Update the Off-site Communicator Status Board in the TSC to include the information from **Section 2.3.**

NOTE:
1. The facility that makes a classification should be the facility that makes the notification to the Off-site Agencies.
2. The timing of TSC activation shall not interfere with the time requirements for off-site agency notifications.

_____ 3.2 Ensure prior to TSC activation that the TSC will have adequate time, after TSC activation, to make the next notification.

_____ 3.3 Inform the TSC Emergency Coordinator and Dose Assessment of when the next message is due, THEN update "Next Message Due" on TSC Coordinator Area Board and Off-site Communicator's board.

_____ 3.4 Notify TSC Emergency Coordinator when the TSC Communicators are prepared to accept communication responsibilities from the Control Room.

_____ 3.5 Immediately after the TSC Emergency Coordinator declares the TSC as **activated**, inform the C/R that the TSC is now responsible for all future notifications.

_____ 3.6 Review the following information concerning notifications.

3.7 Initial Notifications

The first notification made in each of the four Emergency Classifications is called an Initial Notification. Initial Notifications **shall** be made within **15 minutes** of entering each of the Emergency Classifications (i.e., Classification changes) and shall be communicated verbally. The Message Number will remain sequential throughout the event beginning with the first message from the Control Room. Refer to Enclosure 4.1 for Electronic Emergency Notification Form Completion/Transmission instructions **OR** Enclosures 4.2 and 4.3 for Manual Emergency Notification Form Completion/Transmission instructions.

3.8 Follow-up Notifications

NOTE:

1. Follow-up notifications that involve a change in Protective Action Recommendations **shall** be communicated to the Off-site Agencies **within 15 minutes** and **should be communicated verbally.** All other Follow-up messages may be faxed with phone verification of receipt.

2. Follow-up messages of a lesser classification should never be approved after an upgrade to a new classification is declared. Emphasis should be placed on providing current information and NOT on providing a follow-up just to meet follow-up deadline. **If** a follow-up is due and an upgrade in classification is declared, Off-Site Agency Communicators should contact the agencies that the pending follow-up is being superseded by an upgrade in classification and information will be provided within 15 minutes.

Notifications following Initial Notifications within the same Emergency Classification are called follow-up notifications. Make follow-up notifications to state and county government officials according to the following schedule:

Every hour until the emergency is closed out

OR

IF there is any significant change to the situation (make notification as soon as possible)

OR

As agreed upon with an Emergency Management official from each individual agency. Documentation shall be maintained for any agreed upon schedule change and the interval shall not be greater than 4 hours to any agency.

3.9 Termination Notification

The last notification sent to the Off-site Agencies terminating the event. Termination notifications will be designated as follow-up messages. (Refer to Enclosure 4.2, Section 2.)

3.10 Other Information

In addition to the Emergency Action Level information that is entered on Line 7 of the initial Emergency Notification Form (ENF), other events/occurrences, protective action recommendation changes, etc. that will affect the Off-site Agencies will need to be reported to the Off-Site Agencies as well. This would include any event which has the potential to affect the public. The following are some examples but is not an all-inclusive list. Each event should be carefully evaluated and discussed with the TSC Emergency Coordinator to assure pertinent information is forwarded to the Off-Site Agencies. *

* - Notification of the Off-site Agencies should take place as soon as possible (i.e.: 15 minutes)

NOTE:	These events may be the basis for the current emergency classification or an additional event to be reported on line 7 of the Emergency Notification Form (ENF). These events may need off-site agency action or resolution.

Examples:

- Fires
- Flooding
- Major/Key Equipment Out of Service
- Explosions
- Loss of Off-Site Power
- Core Uncovery
- Core Damage
- Injuries and Deaths
- Contaminated Individuals Transported Off Site
- Individuals Transported Off-Site
- Site Evacuations/relocation of site personnel
- Saboteurs and Intruders/suspicious devices/threats
- Protective Action Recommendation Changes
- Chemical or Hazardous Material Spills or Releases
- Extraordinary noise audible off-site
- Any event causing/requiring off-site agency response
- Any event causing increased media attention
- Other unrelated classifiable events (for example, during an Alert, an event which, by itself would meet the conditions for an Unusual Event.
- Emergency response actions underway.

4. Enclosures

4.1 Electronic Emergency Notification Form (ENF) Completion/Transmission

4.2 Emergency Notification Form (ENF) Completion

4.3 Emergency Notification Form (ENF) Transmission

4.4 Fax Instructions

4.5 Message Authentication Code List

4.6 Authentication Guideline

4.7 Emergency Notification Form (ENF)

4.8 TSC Lead Off-Site Agency Communicator Duties

Enclosure 4.1

Electronic Emergency Notification Form (ENF) Completion/Transmission

1. Electronic Notification Form Logon

_____ 1.1 **IF** not already performed, ensure Off-Site Communicator Computer is operational.

_____ 1.1.1 Power up the Off Site Agency Communicator computer and log on to the network using the instructions in Section 2, (Immediate Actions section in front of the procedure) step 2.6.

_____ 1.1.2 Ensure the computer internal clock is synchronized with the facility clock in the Emergency Coordinators Area. (Adjust as necessary).

NOTE: (If computer or Electronic Notification Form is not operational, report it to the TSC Data Coordinator. Refer to **Enclosures 4.2 and 4.3** for manual completion and standard transmission of the Notification Form.)

_____ 1.2 **IF** not already performed, log on to the Electronic Notification Form by performing the following:

_____ 1.2.1 Select the Duke Application Environment (DAE) Icon.

_____ 1.2.2 Select **"My Applications"**

_____ 1.2.3 Select **(ERO) Emergency Response Organization**

_____ 1.2.4 Select **ENF v2.0 - CNS MNS ERO**

_____ 1.2.5 Login the Program entering the following information:

User Name: Your Network Logon ID (i.e. BRS1064)
Password: Your Network Password
Domain: POWER

2. Electronic Notification Form Completion (Create Event)

_____ 2.1 Highlight the appropriate station (Catawba) for the event.

_____ 2.2 Create a new event by performing the following: Select **Site** from the menu, then **New Event.**

_____ 2.3 On the **Create Event** screen, fill in the information from the previous message as follows:

_____ 2.3.1 For **Event Information** - Select Drill or Actual Emergency

_____ 2.3.2 For **Description** - Indicate the type of Event (i.e., Loss of Off-Site Power, 03/08/99 1st Quarter Drill)

_____ 2.3.3 For **Emergency Classification** - Select the appropriate Emergency Classification and time of declaration.

_____ 2.3.4 For **Message Information** - Has previous message been sent? (Yes or No).

NOTE:	The last message information is used to set the automatic functions of the program (ie: message number, transmittal times, etc.).

2.3.5 For **Last Message Information** – If previous message **has** been sent:

_____ A. Select (Initial or Follow-up)

_____ B. Number (Last Message Number)

_____ C. Transmittal Date/Time (Last Message Transmittal Time)

_____ 2.4 Select **Create Event** button at the bottom of the screen. (Event Screen should be created)

_____ 2.5 If all information is correct select "Yes" at the prompt "Are you sure you are ready to create this event".

Information for the various Electronic ENF screens should come from the following areas:

Screen/panel	**Information Source**	**Screen/Panel Completed by**
Plant Status Screen	Operations Procedure Support	Off-site Agency Communicators
Plant Summary Screen	Emergency Coordinator/Asst.	Off-site Agency Communicators
Release Screen:	Operations/ TSC Dose Assessors	Dose Assessors
Met/Offsite Dose Screen	TSC Dose Assessors	Dose Assessors
Protective Actions Screen	Operations/ TSC Dose Assessors	Off-site Agency Communicators
Communications Screen	Off-site Agency Communicators	Off-site Agency Communicators

3. Plant Status Screen

_____ 3.1 Select the "Plant Status" Tab (First Tab on the Event screen.)

_____ 3.2 Ensure and update as necessary the "Emergency Classification" and "Declared At:" time field.

_____ 3.3 Select the appropriate Emergency Action Level by performing the following:

_____ 3.3.1 Click the Binocular Icon in the Emergency Action Level section

_____ 3.3.2 Choose the appropriate base EAL number (i.e., 4.2 System Malfunction)

_____ 3.3.3 Click the ⊞ to expand the menu options.

_____ 3.3.4 Click the ⊞ for the appropriate Classification to expand the menu options.

_____ 3.3.5 Highlight the appropriate EAL (ex: 4.2.A.1)

_____ 3.3.6 Click the "**Select**" button

_____ 3.4 Once the appropriate EAL has been chosen, highlighted the "Select" button.

_____ 3.5 In the "Reactor Status" section, select the appropriate unit(s) and status.

_____ 3.6 **IF** the Unit(s) is shutdown, verify that the shutdown time and date(s) are correct

NOTE: **IF** you indicate that Gap Activity has been exceeded, you must be in a General Emergency.

_____ 3.7 Update the "Gap Activity" per the following:

_____ 3.7.1 For **"Alert"** or **"Site Area Emergency"** select **"NO".**

_____ 3.7.2 For General Emergency have Dose Assessment refer to RP/0/A/5000/005, Enclosure 4.3, to determine if containment radiation levels are >100% of GAP activity.

_____ 3.8 When all information is completed select the "Save" button.

4. Plant Summary Screen

_____ 4.1 Select the "Plant Summary" Tab (Second Tab on the Event screen.)

_____ 4.2 Under the "Plant Conditions" section select the appropriate condition. Confirm with the OPS superintendent or the TSC Emergency Coordinator.

- **Improving**: Emergency conditions are improving in the direction of a lower classification or termination of the event.
- **Stable**: The emergency situation is under control. Emergency core cooling systems, equipment, plants, etc. are operating as designed.
- **Degrading**: Given current and projected plant conditions/equipment status, recovery efforts are not expected to prevent entry into a higher emergency classification or the need to upgrade offsite Protective Action Recommendations.

NOTE:
1. Remember to "close the loop" on items from previous notifications
2. EAL information will automatically be included on INITIAL messages only.
3. Facility activation information will automatically be included on the appropriate message.

_____ 4.3 Under the "Description/Remarks" section, write a concise description for declaring the event, or changes since the last notification. The first message in the classification will automatically include the EAL information. Subsequent messages should continue to explain the details as they occur then include any other information that may affect the Off-site Agencies **[See list in Section 3, (Subsequent Actions) step 3.9]**. Follow-up messages should include relevant information and changes that have occurred since the last message. **Don't just repeat the EAL or the last message.**

_____ 4.4 When all information is completed, select the "Save" button.

5. Release Screen and Met/Offsite Dose Screen

_____ 5.1 These screens will be completed by the TSC Dose Assessors.

_____ 5.2 Verify with the TSC Dose Assessors that they are in the process of acquiring RadDose data and are preparing to upload the information to the Electronic Notification form program.

_____ 5.3 Ensure the status indicator at the bottom of the screen for the Release and Met/Offsite Dose have been updated (changed to green).

6. Protective Actions Screen

NOTE: The Protective Actions Screen is only enabled when you are in a General Emergency Classification.

_____ 6.1 Select the "Protective Actions" Tab (Third Tab on the Event screen.)

_____ 6.2 **IF** the Emergency Classification **IS NOT** a General Emergency, select the "Validate" button and GO TO Step 7.

_____ 6.3 **IF** the Emergency Classification **IS** a General Emergency, load protective action recommendations by performing the following:

6.3.1 Select "Load Protective Action Recommendations" (Protective Actions will automatically be loaded into the ENF program based on Wind Speed, Wind Direction, and Gap Activity).

6.3.2 With input from Dose Assessment, verify that the loaded Protective Action Recommendations are correct utilizing RP/0/A/5000/005.

6.3.3 If additional individual evacuation zones need to be added or deleted us the transfer functions (<, <<, >, >>) to transfer the zones.

_____ 6.4 After the protective action recommendations are verified select the "Save" button.

NOTE: Status Indicator at the bottom of the screen should change to green indicating that the information has been updated.

7. Communications Screen

_____ 7.1 Select Communications tab at the top right of the Event Screen. (Last Tab on the Event screen)

_____ 7.2 Complete the Communicator "Name:" information. (This is the individual performing the communications with the State and County agencies.)

_____ 7.3 Complete the applicable information in the "Event Management" section as follows:

_____ 7.3.1 Select the "Managing Site".

_____ 7.3.2 Select and enter the appropriate facility (TSC or EOF) activation time.

NOTE: Last Message information should be automatically populated if a previous message has been sent. If information is incorrect, it may be revised by selecting the "Change Last Message Information" bar near the bottom of the screen.

_____ 7.4 Once all applicable information has been completed select "Save."

NOTE: Updating the information on a particular panel may be performed by double clicking on the desired indicator panel designator at the bottom of the screen. Status indicator information is as follows:

NOTE: The Plant Status, Plant Summary, Protective Actions, Release, and Met/Offsite Dose indicators at the bottom of the screen are color coded to assure information is being routinely updated. Indicator information is as follows:

Black – information and time conflict
Green – information is 0 to 10 minutes old
Yellow – Information is 10 to 15 minutes old
Red – information is greater than 15 minutes old

NOTE: The "Next Msg Due" time interval color indicators are as follows:	
Initial Notifications	**Follow-Up Notifications**
Black - No information or information time conflict	**Black** - No information or information time conflict
Green - Next Message is due in 10-15 minutes minutes	**Green** - Next Message is due in 30-60
Yellow - Next message is due in 5–9 minutes minutes	**Yellow** - Next message is due in 15-29
Red - Next message is due in 5 mins. or is past due.	**Red** - Next message is due <15 min. or is past due.

_____ 7.5 Periodically validate information on the on the Off-site Agency Communicator assigned screens by reviewing the screen information and selecting the **Validate** button on the bottom right of the screen. (This will update the screens to Green Status).

_____ 7.6 **IF** information needs to be updated, make the appropriate changes on the appropriate screen and then select the **Save** button on the bottom right of the screen. (This will also update the Communicator Indicator).

8. Building a Message

_____ 8.1 When it is time to develop a message to be communicated to the Off-site agencies, perform the following:

NOTE: Contact the responsible group if information needs to updated or validated.

_____ 8.1.1 Ensure Status indicators for the various screens at the bottom of the screen are current. (i. e., Green) If the information needs to be updated or validated, have the responsible individual update or validate the designated screen.

_____ 8.1.2 Select the Communications screen, then select the **Build New Message** bar at the bottom of the screen. Information from the various screens will be incorporated into the message.

_____ 8.1.3 Review the form to verify information is correct.

_____ 8.1.4 **IF** information is correct proceed to step 8.1.6.

_____ 8.1.5 **IF** information needs to be revised, perform the following:

A. Select the appropriate screen by double-clicking the appropriate panel designation at the bottom of the screen.

B. Make changes as necessary and inform the responsible group of those changes.

C. When editing is complete, select Save.

D. Return to the message form, then select **Message** from the Toolbar, then **Refresh**.

E. Select "Yes" if you are ready to refresh the form.

NOTE: You will be prompted that the information needs to be updated if status indicator is any color other than "Green." Refer to step 8.1.1.

_____ 8.1.6 **IF** message is correct, print out a copy by selecting **Message** from the Toolbar, then **Print**.

_____ 8.1.7 Have the TSC Emergency Coordinator review and sign the form.

9. Transmitting Message

_____ 9.1 Locate a copy the Authentication Code Word List.

_____ 9.2 For **Initial Notifications** (15 Minutes) proceed to **Section 10**.

_____ 9.3 For **Follow-up Notifications**, proceed to **Section 11.**

10. Transmission of Initial Notifications

NOTE:
1. All **initial** notifications shall be communicated verbally within 15 Minutes of Emergency Classification declaration. **Avoid using abbreviations or jargon likely to be unfamiliar to states and counties**. If any information is not available or not applicable, say "Not available" or "Not Applicable". Do not abbreviate "N.A." because this is ambiguous.
2. If Selective Signaling is not operational, see **Enclosure 4.6** for Selective Signaling and Alternate Communication Instructions.
3. If the ENF Fax program is not operational refer to **Enclosure 4.7** for additional instructions.

_____ 10.1 Once the ENF has been approved, one Off Site Agency Communicator shall perform steps 10.1.1 – 10.3.4 while another Off Site Agency Communicator establishes contacts as per step 10.4.

NOTE: The "Export To Web" and "Send E-Mail" boxes will be either checked or unchecked. Unless directed otherwise, leave the "Export To Web" and "Send E-Mail" boxes as they are when the "Fax Message" prompt appears.

_____ 10.1.1 To fax the electronic form, Select **Message** from the Toolbar, THEN **Fax**.

_____ 10.1.2 Enter the Name, Title, and Date/Time from Line 16 of the ENF.

_____ 10.1.3 Select the Fax Button on this panel.

_____ 10.1.4 Select "Yes" on confirmation panel if ready to fax the form.

NOTE: The LAN Fax Panel should now be initialized and appear on screen

_____ 10.2 On the LAN Fax Panel, Select the **"TO"** button.

_____ 10.3 Select which Agencies will receive the ENF per the following:

_____ 10.3.1 To Select a group, scroll down the list of agencies and double click **"CNS Drill"** or **"CNS Emergency"** as appropriate to add to the **Recipients'** list.

_____ 10.3.2 To select individual agencies, double click the appropriate agency to add to the **Recipients'** list. Continue this process to include additional agencies.

_____ 10.3.3 When the **Recipients'** list is complete, Click **"OK"**.

_____ 10.3.4 At the next screen, select **"Send" (The ENF will be Faxed to the agencies simultaneously).**

_____ 10.3.5 Select "OK" on the reminder panel for setting the transmittal time and date.

_____ 10.4 Establish communications with the Off-site Agencies via the Selective Signaling Phone per the following:

_____ 10.4.1 Activate the Group Call function by dialing ***5** and verify that all available agencies answer. If all agencies do not respond, contact the missing agency individually via selective signaling.

_____ 10.4.2 When all available parties are verified on the line, document that this is the transmittal time.

NOTE: Transmittal Time and Authentication Code should be handwritten into the signed ENF form.

_____ 10.4.3 Read the following statement "This is Catawba Nuclear Station TSC. This is a drill or actual emergency (whichever applies).

_____ 10.4.4 Ensure that all Agencies have received the Faxed ENF. **(If ENF has not been received ask agencies to get a blank ENF and tell them that you will provide the information.)**

_____ 10.4.5 Read the information on the ENF, line by line, to the Off-site Agencies.

_____ 10.4.6 For Initial Notifications, when you reach item #4, ask the State or a County to authenticate the message. The agency should give you a number to which you will reply with the appropriate code word. Write the number and code word on the form.

_____ 10.4.7 After the information has been covered, inform the agencies the following: "This concludes message # ___. Are there any questions?"

_____ 10.4.8 Obtain the names of the agency representatives. Record the names on the back of the hard copy of the ENF or use a copy of page 2 of Enclosure 4.1.

_____ 10.4.9 Continuous attempts to contact missing agencies must be made using commercial lines, radio etc., if unable to complete the notifications as per 11.4.1. Document the times these agencies were contacted on the back of the notification form.

_____ 10.4.10 After message transmission is complete, select **Message** from the toolbar, then choose **"Set Transmittal Date/Time."**

_____ 10.4.11 Select "Yes" at the prompt if the fax as successfully sent.

_____ 10.4.12 Complete the message transmittal Date and Time and select "Save".

_____ 10.4.13 **IF** information is correct, select the "Yes" button."

10.5 **IF** a question is outside of ENF information, do not answer the question but perform the following:

_____ 10.5.1 Authenticate the request (if question is a return call, you give the number).

_____ 10.5.2 Have the request evaluated by the TSC Emergency Coordinator.

_____ 10.5.3 Document the question, answer, and have the TSC Emergency Coordinator sign.

_____ 10.5.4 Document the time the answer was provided to the Off-site Agency.

_____ 10.6 Repeat the above steps as necessary to communicate other **Initial** messages.

_____ 10.7 Provide copies of the transmitted message form to the list of individuals in Section 2, (Immediate Actions) step 2.2.

_____ 10.8 Update the next message due time on the TSC Emergency Coordinator Area white board.

NOTE: To perform follow up messages, or new initial messages once an event has been created, select the desired event title and return to Section 3 of this enclosure.

11. Transmission of Follow-up Notification

11.1 Once the ENF has been approved, one Off-site Agency Communicator shall perform steps 11.1.1 – 11.3.5 while another Off-site Agency Communicator establishes contacts as per step 11.4.

NOTE: The "Export To Web" and "Send E-Mail" boxes will be either checked or unchecked. Unless directed otherwise, leave the "Export To Web" and "Send E-Mail" boxes as they are when the "Fax Message" prompt appears.

_____ 11.1.1 Select **Message** from the Toolbar, THEN **Fax**.

_____ 11.1.2 Enter the Name, Title, and Date/Time from Line 16 of the ENF.

_____ 11.1.3 Select the Fax Button on this panel.

_____ 11.1.4 Select "Yes" on confirmation panel if ready to fax the form

_____ 11.2 On the **LAN Fax** Panel, Select the **"TO"** button.

_____ 11.3 Select which Agencies will receive the ENF per the following:

_____ 11.3.1 To Select a group, scroll down the list of agencies and double click **"CNS Drill"** or **"CNS Emergency"** as appropriate to add to the **Recipients'** list.

_____ 11.3.2 To select individual agencies, double click the appropriate agency to add to the **Recipients'** list. Continue this process to include additional agencies.

_____ 11.3.3 When the **Recipients'** list is complete, Click **"OK"**.

_____ 11.3.4 At the next screen, select **"Send." (The ENF will be Faxed to the agencies simultaneously).**

_____ 11.3.5 Select "OK" on the reminder panel for setting the transmittal time and date.

NOTE: For Follow-up messages, the transmittal time will be the time that all agencies are on the line to verify Fax transmission.

_____ 11.4 Establish communications with the Off-site Agencies via the Selective Signaling Phone per the following:

_____ 11.4.1 Activate the Group Call function by dialing * 5 and verify that each agency answers. (If all agencies do not answer the group call, dial the specific agency individually).

_____ 11.4.2 Ensure all agencies are on the line. Document this as the transmittal time.

_____ 11.4.3 Ensure that all Agencies have received the Faxed ENF. **(If ENF has not been received ask agencies to get a blank ENF and tell them that you will provide the information.)**

_____ 11.5 Ask if there are any questions, regarding the Follow-up ENF information.

_____ 11.6 Obtain the names of the agency representatives. Record the names on the back of the hard copy of the ENF or use a copy of page 2 of Enclosure 4.1.

_____ 11.7 After message transmission is complete, select **Message** from the toolbar, then choose **"Set Transmittal Date/Time."**

_____ 11.8 Select "Yes" at the prompt if the Fax is successfully sent.

_____ 11.9 Enter transmittal date and time.

_____ 11.9.1 Select "Yes" if you are ready to update this message (transmittal time will be added to message).

_____ 11.10 **IF** a question is received outside of ENF information, do not answer the question but perform the following:

_____ 11.10.1 Authenticate the request (if question is a return call, you give the number).

_____ 11.10.2 Have the request evaluated by the TSC Emergency Coordinator.

_____ 11.10.3 Document the question, answer, and have the TSC Emergency Coordinator sign.

_____ 11.10.4 Document the time the answer was provided to the Off-site Agency.

_____ 11.11 Repeat the above steps as necessary to transmit other Follow Up messages.

_____ 11.12 Provide copies of the transmitted message form to the list of individuals in Section 2, (Immediate Actions) step 2.2.1.

11.13 Update next message due on the Emergency Coordinator area white board and Off-site Communicator board.

NOTE: To perform follow up messages, or new initial messages once an event has been created, select the desired event title and return to Section 3 of this enclosure.

12. Termination Message

NOTE: 1. Termination notifications are communicated verbally.

2. Termination notification is marked as a Follow-up.

_____ 12.1 Be sure specific Event is highlighted, THEN, from the Menu bar for the specific Event, Select Event, then Terminate Event.

_____ 12.2 Enter Termination Time and Date, then Click **OK**.

_____ 12.2.1 Confirm that event is ready to be Terminated by clicking "Yes."

_____ 12.3 Message will be generated with appropriate information.

_____ 12.3.1 **IF** information is correct, proceed to step 12.4.

_____ 12.3.2 **IF** information needs to be revised, perform the following:

_____ A. Select the appropriate screen by double-clicking the appropriate panel designation at the bottom of the screen.

_____ B. Make changes as necessary and inform the responsible group of those changes.

_____ C. When editing is complete, select Save.

_____ D. Return to the message form, then select **Message** from the Toolbar, then **Refresh**.

_____ E. Select "Yes" if you are ready to refresh the form.

_____ 12.4 Review the form to verify information is correct.

_____ 12.4.1 **IF** message is correct, print out a copy by selecting **Message** from the Toolbar, then **Print**.

_____ 12.4.2 Have the TSC Emergency Coordinator review and sign the form.

____ 12.5 Once approved, one Off-site Agency Communicator shall perform steps 12.5.1-12.5.10 while another Off-site Agency Communicator establishes contacts per step 12.6.

_____ 12.5.1 Fax the Electronic form selecting **Message** from the Toolbar, THEN **Fax**.

NOTE: The "Export To Web" and "Send E-Mail" boxes will be either checked or unchecked. Unless directed otherwise, leave the "Export To Web" and "Send E-Mail" boxes as they are when the "Fax Message" prompt appears.

_____ 12.5.2 Enter the Name, Title, and Date/Time from Line 16 of the ENF.

_____ 12.5.3 Select the Fax Button on this panel.

_____ 12.5.4 Select "Yes" on confirmation panel if ready to fax the form.

NOTE: If the Electronic Notification Form Fax process is not operational, refer to Enclosure 4.4 for alternate Fax instructions.

_____ 12.5.5 On the **LAN Fax** Panel, Select the **"TO"** button.

_____ 12.5.6 Select which Agencies will receive the ENF per the following:

_____ 12.5.7 To Select a group, scroll down the list of agencies and double click **"CNS Drill"** or **"CNS Emergency"** as appropriate to add to the **Recipients'** list.

_____ 12.5.8 To select individual agencies, double click the appropriate agency to add to the **Recipients'** list. Continue this process to include additional agencies.

_____ 12.5.9 When the **Recipients'** list is complete, Click **"OK"**.

_____ 12.5.10 At the next screen, select **"Send" (the ENF will be Faxed to the agencies simultaneously).**

_____ 12.5.11 Select OK on Reminder Panel for setting the transmittal date and time.

NOTE: For Follow-up messages, the transmittal time will be the time when all parties are verified on line.

_____ 12.6 Establish communications with the Off-site Agencies via the Selective Signaling Phone per the following:

_____ 12.6.1 Activate the Group Call function by dialing * 5 and verify that each agency answers. (If all agencies do not answer the group call, dial the specific agency individually).

_____ 12.6.2 Ensure that all Agencies are on line. Document this as the transmittal time.

_____ 12.6.3 Assure that the Agencies have received the Fax. **(If ENF has not been received ask agencies to get a blank ENF and that you will provide the information.)**

_____ 12.6.4 For Termination Notifications, when your reach item # 4, ask the state or a county to authenticate the message. The agency should give you a number to which you will reply with the appropriate code word. Write the number and code word on the form.

_____ 12.6.5 Read the message to the Off-site Agencies.

_____ 12.7 Ask if there are any questions regarding the termination message.

_____ 12.8 Obtain the names of the agency representatives. Record the names on the back of the hard copy of the ENF or use a copy of page 2 of Enclosure 4.1.

_____ 12.9 After message transmission is complete, select **Message** from the toolbar, then choose **"Set Transmittal Date/Time."**

_____ 12.10 Select "Yes" at the prompt if the fax is successfully sent.

_____ 12.11 Complete the message transmittal Date and Time and select "Save."

_____ 12.12 At the confirmation prompt select "YES" if you are ready to update this message.

_____ 12.13 If a question is outside of ENF information, do not answer the question but perform the following

_____ 12.13.1 Authenticate the request (if question is a return call, you give the number).

_____ 12.13.2 Have the request evaluated by the TSC Emergency Coordinator.

_____ 12.13.3 Document the question, answer, and have the TSC Emergency Coordinator sign.

_____ 12.13.4 Document the time the answer was provided to the Off-site Agency.

_____ 12.14 Provide copies of the transmitted message form to the list of individuals in Section 2, (Immediate Actions) step 2.2.

Enclosure 4.2

Emergency Notification Form (ENF) Completion

Initial and Follow-up Completion

Item #	NOTE: Items 11-14 may be skipped on initial notifications Communicator Action	Info Source
1.	Check appropriate blocks: (Drill/Emergency).(Initial/Follow-up) **Initial**: First message in each of the 4 classifications. **Follow-up**: Subsequent messages following the initial message within the same classification. Message #'s are sequentially numbered throughout drill/emergency starting with the C/R.	TSC Comm.
2.	Write in the site, unit or units affected, and the phone communicator's name (Reported by).	TSC Comm.
3.	Assure confirmation phone number. Document the "transmittal time" at the beginning of message transmission. (Note: Transmittal time is: **Initial** - when all Agencies are verified on the line. **Follow-up** - when the form is faxed.)	TSC Comm
4.	Document the Authentication while transmitting the notification. Refer to Authentication Enclosures (Enclosure 4.5 and 4.6) for additional instructions.	TSC Comm.
5.	Check appropriate classification	OPS Supt
6.	Mark the appropriate box and write time and date current classification was declared.	OPS Supt
7.	Write a concise description for declaring the current emergency classification. Also use this space for any other important information. **The first message from the TSC should include a statement indicating that the TSC has been activated**. Do not use acronyms or abbreviations. For **Follow-up** messages, include relevant information and changes that have occurred since the last message **(Don't just restate the EAL or last message).**	OPS Supt
8.	Mark appropriate plant condition.: **Improving** - Emergency conditions are improving in the direction of a lower classification or termination of the event. **Stable** - The emergency situation is under control. Emergency core cooling systems, equipment, plant, etc., are operating as designed. **Degrading** - Given current and projected plant conditions/equipment status, recovery efforts are not expected to prevent entry into a higher emergency classification or the need to upgrade off-site protective action recommendations.	OPS Supt
9.	Write time and date Reactor Shutdown or Reactor Power level as applicable.	OPS Supt.
10.	Mark appropriate box for emergency release. **If** A or B, go to Item 14. **If** C or D, complete Lines 11-14. A release is any unplanned and quantifiable discharge to the environment of radioactive effluent attributable to a declared emergency event. Base determinations on information such as EMF readings, containment pressure and other instrument indications, field monitoring results, and knowledge of the event and its impact on system operation and resultant release pathways. A release is considered to be in progress if the following occurs: • Rx. Bldg EMF Monitors (38, 39, or 40 reading indicates an increase in activity or EMF monitors 53A or 53B read greater than 1.5 R/hr) AND pressure inside the containment bldg is greater than Tech. Specs. OR an actual containment breach is determined. • Increase in activity monitored by unit vent EMF monitors 35, 36, or 37. • Steam generator tube leak monitored by EMF 33.	Rad Assess.
11.*	* Items 11-14 may be left blank on initial notifications Indicate type of release and time/date. Mark Ground Level for any airborne releases.	Rad Assess
12.*	Indicate release magnitude and whether release is above or below normal operating limits.	Rad Assess
13.*	Write estimate of projected off-site dose and estimated duration. Check new or unchanged. **If** unchanged from a previous notification, the information does not have to be repeated.	Rad Assess.
14.*	Provide meteorological data	Rad Assess.
-	Indicated appropriate recommended protective actions. • For Unusual Event, Alert, and Site Area Emergency, Mark box "A" • For General Emergency , mark and complete information for boxes B and C using RP/0/A/5000/005 (GE)	Rad Assess.
16.	Have Emergency Coordinator approve message.	Emer. Coord.

Termination Notification Completion

When the emergency/drill has been terminated, complete the ENF as described below.

NOTE:
1. When terminating from a General Emergency, "No Recommended Protective Action" HAS to be selected in the Electronic ENF Program.
2. Termination notifications are communicated **verbally**.
3. Termination notification is marked as a Follow-up.

Line Item #	Action	Source of Information TSC
1.	Check appropriate blocks NOTE: **Message #s are sequentially numbered** throughout the drill/emergency starting with the Control Room.	Off-site Communicators.
2.	Write in site and unit or units affected. NOTE: Reported by is communicator's name	Off-site Communicators
3.	Write confirmation phone number that states and counties may call back on. Transmittal time will be documented at the beginning of message transmission	Off-site Communicators
4.	Authentication will be completed while transmitting the notification to states and counties.	Off-site Communicators
5.	Check appropriate classification that is being terminated from.	Off-site Communicators
6.	Mark box "B" and write time and date of termination.	Off-site Communicators
7.- 15	No information required.	N/A
16.	Have TSC Emergency Coordinator approve message.	TSC Emergency Coordinator

1. Transmitting a Message

_____ 1.1 Review the following Selective Signal guideline if necessary to familiarize yourself with its operation.

NOTE:
1. Selective Signaling is an open line that is capable of connecting all agencies together at the same time. No special conferencing process is required to get all agencies on the line. The line is always active (i.e., no dial tone). ***5** may be used initially to contact county and state warning points/EOCs.
2. The handset has a "push to talk" button which must be pressed in order for the parties on the other end to hear you. To use the headset instead of the handset, set the switch on the headset controller to "headset" and **remove** the handset from the phone cradle. Then resume normal operation. There is no "push to talk" feature associated with the headset, however, the handset must be removed from the cradle when the headset is in use.

_____ 1.1.1 Pick up receiver (no dial tone will be heard). Dial * **5** and wait for agencies to answer. Verify that all agencies have answered. Note: **If** all agencies do not answer the group call, dial the agencies individually per step 2).

_____ 1.1.2 Alternately, the agencies may be contacted individually by dialing the three digit Selective Signal number for each agency. When they pick up, identify yourself and tell them to hold while you get the other agencies on the line. Dial the second agency's three-digit Selective Signal number. When they pick up, identify yourself and tell them to hold while you get the other agencies on the line.

513 York County (WP/EOC)
112 Gaston County (WP/EOC)
314 NC (WP/EOC)
116 Mecklenburg County (WP/EOC)
518 SC (WP/EOC)

_____ 1.1.3 Continue this process until all applicable agencies are on the line.

NOTE: If Selective Signal Communications fail, the following is the suggested priority for backup communications systems used to notify the states and counties.

1.2 **1st - Commercial Telephone (Bell Line) (Conference Call)**

1.2.1 Refer to the Emergency Response Telephone Directory, Enclosure 1.1, for instructions on the use of telephones in the TSC, conference call instructions, and individual bell line numbers.

1.3 **2nd - North Carolina and/or South Carolina Emergency Management Radio**

1.3.1 Refer to the Emergency Response Telephone Directory, Enclosure 1.6, for instructions on the use of the State Emergency Management Radios.

1.4 **3rd - Duke Power Radio Network (Low Band System)**

1.4.1 Refer to the Emergency Response Telephone Directory, Enclosure 1.7, for instructions on the use of Duke Power Low Band Radio system.

NOTE: Report any failures to the TSC Emergency Coordinator/Emergency Planner.

2. Message Transmission

2.1 For transmitting **Initial Notifications**, proceed to **Section 3.**

2.2 For transmitting **Follow-up Notifications**, proceed to **Section 4.**

3. Initial Notification Transmission

When you are prepared to transmit a message, contact the appropriate agencies using the established method.

SELECTIVE SIGNAL	BELL LINE	ROLL CALL
Individual Selective OR Signal # Dial *5: calls all state /county WP/EOC's simultaneously	Individual phone numbers OR One touch dial button	As each agency answers say: "This is Catawba Nuclear Station, please hold."
513 York County WP/EOC	803/329-1110	
116 Mecklenburg Co. WP/EOC	704-943-6200	
112 Gaston County WP/EOC	704/866-3300	
518 South Carolina WP/EOC	803/737-8500	
314 North Carolina WP/EOC	919/733-3300	

IF an off-site agency does not pick up, try dialing the Selective Signaling number again or get help to dial that agency on the Bell line and give the message separately. (Use radio if all other communication fails).

3.1 When all available agencies are connected, document the time on line 3 as transmittal time and read the following statement: "This is a drill or actual emergency (whichever applies). The following is Emergency Notification ENF Information."

3.2 **IF** this is the FIRST message from the TSC, inform the states and counties that the TSC has been activated and that you are taking over responsibility for communications from Catawba Nuclear Station. **This should be noted on Line 7 of the Emergency Notification Form (ENF).**

3.3 Authenticate and Transmit the Emergency Notification (ENF) message providing line by line information to the agencies. When you reach line 4, ask one of the agencies to provide a number from the authentication code word list (Enclosure 4.5). Then give them the corresponding codeword for that listed number. Fill in line 4 with the number and codeword. (Ref. Enclosure 4.6 for authentication instructions).

3.3.1 All **initial** notifications shall be communicated verbally. **Avoid using abbreviations or jargon likely to be unfamiliar to states and counties. If** any information is not available or not applicable, say "Not Available" or "Not Applicable". Do not abbreviate "N.A." because this is ambiguous.

3.4 Upon completion of the message transmission, obtain the names of the agency representatives and complete documentation on the back of the Emergency Notification Form (ENF).

NOTE: Date and time do not need to be filled in on back of form if all parties were on line at the time of message transmission.

3.5 Inform the agencies of the following,

- This concludes message # _____.
- They will be receiving a FAX copy of this message shortly.
- Are there any questions about the message?

3.6 **IF** question is outside of ENF information, do not answer question.

- Authenticate the request (if question is a return call).
- Have the request evaluated by the Emergency Coordinator.
- Document the question, answer, and the time the answer was transmitted in the Off-site Agency Communicator's Logbook.

3.7 Fax the front page of the Emergency Notification Form (ENF) to the agencies per Enclosure 4.4, Fax Communicator Checklist.

3.8 Repeat steps as needed to communicate other initial messages.

3.9 Provide copies of the transmitted message form to the list of individuals in Section 2, (Immediate Actions) step 2.2.

4. Follow-up Notification Transmission

NOTE:	Follow-up notifications are **not** required to be verbally transmitted. Follow-up messages may be faxed with phone verification of receipt. <u>This applies only if the message does not involve a change in the emergency classification or the protective action recommendations or a termination of the emergency</u>.

_____ 4.1 Verify that all sections have been completed and that the message has been approved.

_____ 4.2 Fax a copy of the form to the Off-site Agencies per Enclosure 4.4.

_____ 4.3 Call each Off-Site Agency.

_____ 4.4 When all parties are verified on the line, document this as the transmittal time.

_____ 4.5 Verify each agency has received the Notification Form.

_____ 4.6 Ask if there are any questions.

<u>IF</u> a question is outside of ENF information, do <u>not</u> answer question.

- Authenticate the request (if question is a return call) (callee gives number).
- Have the request evaluated by the TSC Emergency Coordinator
- Document the question, answer, and the time the answer was transmitted in the Off-Site Agency Communicator's Logbook.

_____ 4.7 Obtain the names of the agency representatives. Record the names on the back of the hard copy of the ENF.

_____ 4.8 Repeat the above steps as necessary to communicate other follow-up messages.

_____ 4.9 Provide copies of the transmitted message form to the list of individuals in Section 2, (Immediate Actions) step 2.2.

1. Faxing Process

1.1 This enclosure provides instruction for faxing the ENF to the primary WP/EOCs. Refer to the following sections of this enclosure for the desired method:

Section 2 - AT&T Enhanced Fax - Preprogrammed Button Method
Section 3 - AT&T Enhanced Fax - Dialing Method
Section 4 - Individually (Via Fax Machine)

2. AT&T Enhanced Fax - Preprogrammed Button Method

NOTE: 1. This process will fax to the following locations simultaneously:

York County	North Carolina	Technical Support Center (TSC)
Gaston County	South Carolina	Emergency Operations Facility (EOF)
Mecklenburg County	EnergyQuest	Joint Information Center (JIC)

2. If a problem is experienced using the AT&T Enhanced Fax Service, send the fax to the agencies individually utilizing one of the other faxing methods.

3. Process may be completed without waiting for the prompts.

_____ 2.1 Place the Notification Form face down in the Fax machine.

_____ 2.2 Using the AT&T Enhanced Fax Phone located by the Fax machine, take the phone off the hook by using the speaker phone option (SP-Phone button) or handset.

2.3 Perform the following:

_____ 2.3.1 Press the preprogrammed button labeled ***AT&T Enhanced Fax***.

_____ 2.3.2 Wait to hear: "***Welcome to AT&T Enhanced Fax ,***" then,

_____ 2.3.3 Press the preprogrammed button labeled ***Subscriber ID***, then

_____ 2.3.4 Press the preprogrammed button labeled ***Password*** (You will hear "***Logging in, please wait***")

_____ 2.3.5 Wait to hear: "***Login Successful***," then

_____ 2.3.6 Press **1**, then

_____ 2.3.7 Press * **5** (Recipient List), then

_____ 2.3.8 Press # (Own Private List), then

_____ 2.3.9 Press **1** # (List Name), then

_____ 2.3.10 Press * # (No other lists to add)

_____ 2.3.11 Press **START** on the Fax machine.

_____ 2.3.12 Hang up the phone. (The Fax Service will then fax the Notification Form to the designated facilities).

_____ 2.4 Verify the primary off-site agencies have received the Fax.

3. AT&T Enhanced Fax - Dialing Method

NOTE: 1. This process will fax to the following locations simultaneously:

York County	North Carolina	Technical Support Center (TSC)
Gaston County	South Carolina	Emergency Operations Facility (EOF)
Mecklenburg County	EnergyQuest	Joint Information Center (JIC)

2. If a problem is experienced using the AT&T Enhanced Fax Service, send the fax to the agencies individually utilizing one of the other faxing methods.

3. Process may be completed without waiting for the prompts.

_____ 3.1 Place the Notification Form face down in the Fax machine.

_____ 3.2 Using the AT&T Enhanced Fax Phone located by the Fax machine, take the phone off the hook by using the speaker phone option (SP-Phone button) or handset.

3.3 Perform the following:

_____ 3.3.1 Dial **1-800-232-9674**, then

_____ 3.3.2 Wait to hear: "***Welcome to AT&T Enhanced Fax***," then

_____ 3.3.3 Dial **5 3 0 9 1 2 8 #** (Subscriber ID), then

_____ 3.3.4 Dial **4 8 6 6 6 3 5 2 #** (Password) (You will hear "***Logging in, please wait***")

_____ 3.3.5 Wait to hear: "***Login Successful***," then

_____ 3.3.6 Press **1**, then

_____ 3.3.7 Press * **5** (Recipient List), then

_____ 3.3.8 Press # (Own Private List), then

_____ 3.3.9 Press **1 #** (List Name), then

_____ 3.3.10 Press * # (No other lists to add)

_____ 3.3.11 Press **START** on the Fax machine.

_____ 3.3.12 Hang up the phone (The fax service will then fax the Notification form to the designated facilities).

_____ 3.4 Ensure the primary off-site agencies have received the fax.

4. Individually (Via Fax Machine)

4.1 To send a fax to multiple locations using the one touch dialing or direct dialing:

_____ 4.1.1 Place the Fax you are transmitting face down into the Fax machine.

4.1.2 Press the preprogrammed one-touch speed dial numbers for the following:

	Press	Energy Quest
	Press	Joint Information Ctr (JIC)
	Press	York Co. WP/EOC
	Press	Gaston Co. WP/EOC
	Press	Meck Warning Pt.
	Press	S.C. WP/EOC
	Press	N.C. WP/EOC
	Press	EOF

_____ 4.1.3 Press **Start**.

4.2 To send a Fax to a **single** location using one-touch dialing or direct dialing:

_____ 4.2.1 Insert the document face down

4.2.2 Press the designated agency button labeled on the Fax machine one at a time.

	Press	Energy Quest	or dial	8-831-3415
	Press	Joint Information Ctr (JIC)	or dial	382-0069
	Press	York Co. WP/EOC	or dial	1-803-324-7420
	Press	Gaston Co. WP/EOC	or dial	1-704-866-7623
	Press	Meck Warning Pt.	or dial	1-704-943-6189
	Press	S.C. WP/EOC	or dial	1-803-737-8575
	Press	N.C. WP/EOC	or dial	1-919-733-7554
	Press	EOF	or dial	1-704-382-0722

_____ 4.2.3 Verify Fax was sent to the designated agency or agencies via the Fax report(s) or phone. Resend as appropriate.

5. AT&T Enhanced Fax Message Retrieval

5.1 **IF** a Fax is not delivered via the AT&T Enhanced Fax process or if there are problems experienced utilizing the AT&T Enhanced Fax process, the system will generate an ERROR MESSAGE. To retrieve messages from the AT&T Enhanced Fax Service, perform the following:

_____ 5.1.1 Place the Notification form in the Off-site Communicator Fax machine

_____ 5.1.2 Using the Fax telephone located next to the Off-site Communicator Fax machine perform the following:

_____ A. Press the preprogrammed button labeled **AT&T Enhanced Fax** (or dial 1-800-232-9674)

_____ B. Press the preprogrammed button labeled **Subscriber ID** (or dial 5 3 0 9 1 2 8 #)

_____ C. Press the preprogrammed button labeled **Password** (or dial 4 8 6 6 6 3 5 2 #) (*Logging in, Please Wait…*)

_____ D. When Login is verified Successful, **Press 2** (to receive a message)

_____ 5.1.3 Press Start on the Fax machine.

_____ 5.1.4 When prompted, hang up phone.

This page is left intentionally blank.

1. Placing A Call

When providing Emergency Notification Form (ENF) information to the Off-Site Agencies, the Communicator should:

1.1 Ask a State or County Representative to provide a number from the Authentication Codeword list.

1.2 Then give them the code word corresponding with the number from Enclosure 4.5, "Message Authentication Code List."

1.3 Write the number and code word on the Emergency Notification Form (ENF) (Line 4).

2. Receiving A Call

When receiving a call from off site and the identity of the party calling is not known, you should:

2.1 Provide a number from Enclosure 4.5, "Message Authentication Code List," to the caller.

2.2 The caller will then provide the word corresponding with the number of the Authentication Code List.

2.3 Document in Communicator's Logbook.

RULE OF THUMB:

Callee gives the number

Caller gives the word

EMERGENCY NOTIFICATION

1. [A] THIS IS A DRILL [B] ACTUAL EMERGENCY [ ] INITIAL [ ] FOLLOW-UP MESSAGE NUMBER _____

2. SITE: Catawba Nuclear Site UNIT: _____ REPORTED BY: _____

3. TRANSMITTAL TIME/DATE: _____ (Eastern) ____/____/____ mm dd yy CONFIRMATION PHONE NUMBER: (803) 831-7410 (TSC)

4. AUTHENTICATION (If Required): _____ (Number) _____ (Codeword)

5. EMERGENCY CLASSIFICATION:
[A] NOTIFICATION OF UNUSUAL EVENT [B] ALERT [C] SITE AREA EMERGENCY [D] GENERAL EMERGENCY

6. [A] Emergency Declaration At: [B] Termination At: TIME/DATE: _____ (Eastern) ____/____/____ mm dd yy (If B, go to Item 16.)

7. EMERGENCY DESCRIPTION/REMARKS: _____

8. PLANT CONDITION [A] IMPROVING [B] STABLE [C] DEGRADING

9. REACTOR STATUS: [A] SHUTDOWN: TIME/DATE: _____ (Eastern) ____/____/____ mm dd yy [B] ____% POWER

10. EMERGENCY RELEASE(S):
[A] NONE (Go to item 14.) [B] POTENTIAL (Go to item 14.) [C] IS OCCURRING [D] HAS OCCURRED

**11. TYPE OF RELEASE: [ ] ELEVATED [ ] GROUND LEVEL
[A] AIRBORNE: Started: _____ Time(Eastern) ____/____/____ Date Stopped: _____ Time(Eastern) ____/____/____ Date
[B] LIQUID: Started: _____ Time(Eastern) ____/____/____ Date Stopped: _____ Time(Eastern) ____/____/____ Date

**12. RELEASE MAGNITUDE: [ ] CURIES PER SEC. [ ] CURIES NORMAL OPERATING LIMITS: [ ] BELOW [ ] ABOVE
[A] NOBLE GASES _____ [B] IODINES _____
[C] PARTICULATES _____ [D] OTHER _____

**13. ESTIMATE OF PROJECTED OFFSITE DOSE:. [ ] NEW [ ] UNCHANGED PROJECTION TIME: _____ (Eastern)

	TEDE mrem	Thyroid CDE mrem
SITE BOUNDARY		
2 MILES		
5 MILES		
10 MILES		

ESTIMATED DURATION: _____HRS.

**14 METEOROLOGICAL DATA: [A] WIND DIRECTION (from) _____ ° [C] SPEED (MPH) _____
[B] STABILITY CLASS _____ [D] PRECIPITATION (type) _____

15. RECOMMENDED PROTECTIVE ACTIONS
[A] NO RECOMMENDED PROTECTIVE ACTIONS
[B] EVACUATE _____
[C] SHELTER IN-PLACE _____
[D] OTHER _____

16. APPROVED BY: _____ (Name) TSC Emergency Coordinator (Title) TIME/DATE: _____ (Eastern) ____/____/____ mm dd yy

* If items 8 - 14 have not changed, only items 1 - 7 and 15 - 16 are required to be completed.
** Information may not be available on Initial Notifications.

GOVERNMENT AGENCIES NOTIFIED

Record the name, date, time and agencies notified:

1. (name) York County
   (date) (time) (agency) Sel. Sig. 513 Bell Line (803) 325-2580
2. (name) Mecklenburg County
   (date) (time) (agency) Sel. Sig. 116 Bell Line (704) 943-6200
3. (name) Gaston County
   (date) (time) (agency) Sel. Sig. 112 Bell Line (704) 866-3300
4. (name) South Carolina WP/EOC
   (date) (time) (agency) Sel. Sig. 518 Bell Line (803) 734-8020
5. (name) North Carolina WP/EOC
   (date) (time) (agency) Sel. Sig. 314 Bell Line (919) 733-3942
6. (name)
   (date) (time) (agency)
7. (name)
   (date) (time) (agency)

Enclosure 4.8

TSC Lead Off-Site Agency Communicator Duties

- Sign in on the white board in the TSC Emergency Coordinator's area as the "Off-Site Agency Communicator." Also sign in and ensure that at least two TSC Off-Site Agency Communicators (EOACs) have signed in on the white board in our area.
- Ensure all EOACs have a copy of the correct procedure and that they know their duties.
- Ensure the EOACs are fit for duty prior to taking turnover from the site.
- Ensure 24 hour coverage if necessary.
- Keep the TSC Emergency Coordinator informed of our progress in preparing to take turnover from the site. Ensure that we promptly get copies of each site-issued Emergency Notification Form (ENF).
- Act as chief interface with the TSC Emergency Coordinator.
- Monitor completion of the other sections to assure time commitments are met. Contact the individual edit groups as appropriate to assure Notification Form is being completed.
- Check with Dose Assessment early and often to ensure that they don't delay a ENF. (It can take them 10 minutes to calculate doses, so be sure that they have a 15 minute warning before we need their data. **If** they aren't comfortable with their data or if they run low on time, get the Radiological Assessment Coordinator involved at once--*do not delay!*)

NOTE: Rad data is not required for initial notifications.

- Resolve any questions concerning EOAC procedure or actions (the Emergency Planner can help).
- Ensure all messages (ENFs) are accurate, complete, and are issued on time.
- Decide when to omit radiological data on the ENF (in the interest of timeliness).
- Keep up with events as they unfold for potential inclusion on the ENF. Ensure that events listed in Section 3.9 are reported and that later ENFs follow-up on those events and report their resolution ("close the loop").
- Proofread the ENF prior to giving it to the TSC Emergency Coordinator for approval. Give the TSC Emergency Coordinator sufficient time to review/change the ENF.
- Work with the Emergency Planner, Commodities and Facilities and/or Data Coordinators to fix any problems with the Fax machines, selective signaling, computers etc. Advise the TSC Emergency Coordinator of these problems.
- Take notes during the drill/event for topics that should be discussed in the critique. Participate in the critique.
- After the drill/event, tell the primary EOAC what role was filled by each EOAC and of any comments/questions concerning their actions in the drill/event.

(R08-97)

Duke Power Company
PROCEDURE PROCESS RECORD

(1)ID No. RP/0/A/5000/007
Revision No. 019

PREPARATION

(2) Station Catawba Nuclear Station

(3) Procedure Title Natural Disaster and Earthquake

(4) Prepared By E. T. Bradley Date 7/19/00

(5) Requires 10CFR50.59 evaluation?
- ☒ Yes (New procedure or reissue with major changes)
- ☐ No (Revision with minor changes)
- ☐ No (To incorporate previously approved changes)

(6) Reviewed By D. R. Lott (QR) Date 7/20/00

Cross-Disciplinary Review By L. Baumgarner (QR) NA ____ Date 7/20/00

Reactivity Mgmt. Review By ____ (QR) NA ISIS Date 7/20/00

(7) Additional Reviews

Reviewed By ____ Date ____

Reviewed By ____ Date ____

(8) Temporary Approval *(if necessary)*

By ____ (SRO/QR) Date ____

By ____ (QR) Date ____

(9) APPROVED BY Richard L. Swingart Date 7/20/00

PERFORMANCE (Compare with control copy at least once every 14 calendar days while work is being performed)

(10) Compared with Control Copy ____ Date ____

Compared with Control Copy ____ Date ____

Compared with Control Copy ____ Date ____

(11) Dates(s) Performed ____

Work Order Number (W/O #) ____

COMPLETION

(12) Procedure Completion Verification

- ☐ Yes ☐ N/A Check lists and/or blanks properly initialed, signed, dated, or filled in NA, as appropriate?
- ☐ Yes ☐ N/A Listed enclosures attached?
- ☐ Yes ☐ N/A Data sheets attached, completed, dated and signed?
- ☐ Yes ☐ N/A Charts, graphs, etc. attached and properly dated, identified and marked?
- ☐ Yes ☐ N/A Procedure requirements met?

Verified By ____ Date ____

(13) Procedure Completion Approved ____ Date ____

(14) Remarks *(attach additional pages, if necessary)*

Duke Power Company Catawba Nuclear Station **Natural Disaster and Earthquake** **Multiple Use**	Procedure No. RP/**0**/A/5000/007 Revision No. 019 Electronic Reference No. CN005GNT

Natural Disaster and Earthquake

1. Symptoms

NOTE:	The Duke Power Company System Coordinator will notify the Control Room for all severe weather warnings issued for York County. The Control Room is also provided with a NOAA radio.

1.1 Tornado watch issued for York County

1.2 Tornado warning issued for York County **OR** tornado on-site

1.3 Hurricane winds are expected on-site within 12 hours

1.4 Earthquake is detected by instrumentation or felt in plant

1.4.1 Seismic event alarm SMA-3 on 1MC8

1.4.2 OBE EXCEEDED alarm on 1AD-4, B/8

1.4.3 Light on Peak Shock Annunciator PSA-1575 on 1MC8

1.4.4 Effects of an earthquake are seen, felt or heard.

1.5 Flooding due to high lake level (lake elevation > 593.5 Mean Sea Level (MSL)) or seiche (lake tidal wave).

1.6 Low lake level (lake elevation < 557.5 Ft. MSL)

2. Immediate Actions

None.

3. Initial Actions

3.1 **IF** a tornado watch has been issued for York County, perform Enclosure 5.1.

3.2 **IF** a tornado warning has been issued for York County **OR** tornado on-site, perform Enclosure 5.2.

3.3 **IF** Hurricane winds are expected on-site within 12 hours, perform Enclosure 5.3.

3.4 **IF** an Earthquake is detected by instrumentation **OR** felt in plant, perform Enclosure 5.4.

3.5 **IF** flooding due to high lake level (lake elevation > 593.5 MSL) or seiche (lake tidal wave), perform Enclosure 5.5.

3.6 **IF** low lake level (lake elevation < 557.5 Ft. MSL), perform Enclosure 5.6.

4. Subsequent Actions

4.1 **IF** communications are lost or communications trouble is encountered, refer to the Emergency Response Telephone Directory.

4.2 Contact the Catawba Nuclear Site NRC Resident Inspector (duty person) anytime this procedure is entered.

5. Enclosures

5.1 Tornado Watch Issued For York County

5.2 Tornado Warning Issued For York County **OR** Tornado On-site

5.3 Hurricane Winds Are Expected On-site Within 12 Hours

5.4 Earthquake

5.5 Flooding Due to High Lake Level (Lake Elevation > 593.5 MSL) **OR** Seiche (Lake Tidal Wave

5.6 Low Lake Level (Lake Elevation < 557.5 Ft. MSL)

1. Initial Actions

NOTE: 1. A tornado watch indicates conditions are favorable for a tornado to occur.

2. Wind speed information > 90 mph shall be obtained from the National Weather Service located in Greenville/Spartanburg, S.C. at 1-800-268-7785 or 1-864-879-1085 (unpublished).

3. Initial Actions may be performed simultaneously.

1.1 Announce the following over the PA System:

"Attention all plant personnel. Attention all plant personnel. This is the Operations Shift Manager. A tornado watch has been issued for York County. Be prepared to take shelter should a tornado develop on site. Further updates will be provided as conditions warrant."

NOTE: Further determination should be made for system(s) required to be shut down by this response procedure but required to be operating by a compensatory action item.

1.2 Refer to the Open Compensatory Action Items and review for applicability.

1.3 Evaluate implementation of the following:

_____ 1.3.1 Contact Security and verify that exterior doors are being closed per Security procedures.

_____ 1.3.2 **IF** a personnel safety hazard does not exist due to lightning or high winds, the Shift Work Manager will utilize appropriate personnel to lower crane booms.

_____ 1.3.3 Notify RP/Radwaste Chemistry to minimize all handling of radioactive materials and releases of radioactive waste to the environment for the duration of the tornado watch.

_____ 1.3.4 **IF** RN swapover to the Standby Nuclear Service Water Pond has **NOT** occurred automatically on low low lake level of 557.5 ft. MSL, refer to AP/0/A/5500/020 (Loss of Nuclear Service Water).

1.4 **IF** any of the following activities are in progress **OR** are scheduled to begin within the time frame of the tornado watch, terminate the activity {PIP C99-03215}:

_____ • NS pump tests

_____ • NS heat exchanger tests

_____ • FWST makeup to the Spent Fuel Pool

2. Subsequent Actions

2.1 Severe Weather Information/Forecast

To obtain the latest severe weather information/forecast for York County, consult the National Weather Service located in Greenville/Spartanburg, S.C. at 1-800-268-7785 or 1-864-879-1085 (unpublished).

2.2 Meteorological Conditions

As a backup to the Catawba site meteorological system (i.e., wind speed, wind direction, etc.), consult the National Weather Service located in Greenville/Spartanburg, S.C., at 1-800-268-7785 or 1-864-879-1085 (unpublished).

2.3 This procedure remains in effect until one of the following conditions are met:

- Termination of tornado watch for York County by National Weather Service

OR

- Duke Power Meteorological Group (704-594-0341) verifies that a tornado threat to the Catawba Nuclear Site no longer exists.

Tornado Warning Issued For York County OR Tornado On-Site

1. Initial Actions

NOTE:
1. Tornado warning indicates that an actual tornado has been reported to the National Weather Service (NWS) or has been sighted on radar.
2. Wind speed information > 90 mph shall be obtained from the NWS located in Greenville/Spartanburg, S.C., at 1-800-268-7785 or 1-864-879-1085 (unpublished).
3. Initial Actions may be performed simultaneously.

_____ 1.1 Should the sustained winds, lasting 15 minutes, in excess of 95 mph develop on site which jeopardize the safe operation of the reactor, take the unit(s) to Hot Standby (Mode 3). For the initiation of any unit shutdown, carry out the reporting provisions of RP/0/B/5000/013 (NRC Notification Requirements).

_____ 1.2 Classify the emergency as appropriate per RP/0/A/5000/001 (Classification of Emergency).

_____ 1.3 Commence notification and other protective measures as directed by appropriate Emergency Response Procedure.

_____ 1.4 Announce the following over the PA System:

_____ 1.4.1 Tornado is not expected to pass over the site

"Attention all plant personnel. Attention all plant personnel. This is the Operations Shift Manager. A tornado warning has been issued for York County from _____ to _____ hours. Be prepared to take shelter should a tornado develop on site. Further updates will be provided as conditions warrant."

_____ 1.4.2 Tornado is expected to pass over the site

"Attention all plant personnel. Attention all plant personnel. This is the Operations Shift Manager. A tornado warning has been issued for York County. Take shelter immediately. Do not take shelter in temporary buildings or trailers. Further updates will be provided as conditions warrant."

NOTE:	Further determination should be made for system(s) required to be shut down by this response procedure but required to be operating by a compensatory action item.

_____ 1.5 Refer to the Open Compensatory Action Items and review for applicability. Expedite the restoration of important plant systems and components.

_____ 1.6 Review AP/1(2)/A/5500/007 (Loss of Normal Power), EP/1(2)/A/5000/ECA-0.0 (Loss of All AC Power), and OP/0/B/6100/013 (Standby Shutdown Facility Operation). Take the necessary actions to ensure equipment required for station blackout response is available.

1.7 Perform **OR** verify the following steps have been performed:

_____ 1.7.1 Notify Security to perform the following actions per Security procedures:

- _____ Close all exterior doors
- _____ Close and latch tornado door S303A (access to SPA, 574 elevation, Auxiliary Service Building) (mod CE-61506)

1.7.2 **IF** any of the following activities are in progress **OR** are scheduled to begin within the time frame of the tornado warning, terminate the activity {PIP C99-03215}:

- _____ NS pump tests
- _____ NS heat exchanger tests
- _____ FWST makeup to the Spent Fuel Pool

_____ 1.7.3 **IF** a personnel safety hazard does not exist due to lightning or high winds, the Shift Work Manager will utilize appropriate personnel to lower crane booms.

_____ 1.7.4 Determine the status of the alternate AC sources (SSF Diesel) and take necessary actions to ensure its availability.

_____ 1.7.5 Coordinate with Chemistry to increase CACST, UST and hotwell inventories.

_____ 1.7.6 Coordinate with IAE to return to service any available out of service battery chargers.

_____ 1.7.7 Notify RP/Radwaste Chemistry to stop all handling of radioactive materials and releases of radioactive waste to the environment for the duration of the tornado warning.

_____ 1.7.8 **IF** RN swapover to the Standby Nuclear Service Water Pond has **NOT** occurred automatically on low low lake level of 557.5 ft. MSL, refer to AP/0/A/5500/020 (Loss of Nuclear Service Water).

1.7.9 Ventilation Systems shall be aligned as follows:

_____ A. Ensure the VF Systems are shutdown per OP/1(2)/A/6450/004 (Fuel Pool Ventilation System).

B. Ensure the following ventilation systems are shut down:

_____ • VQ per OP/1(2)/A/6450/017 (Containment Air Release and Addition System)

_____ • VP per OP/1(2)/A/6450/015 (Containment Purge System)

_____ • VE per OP/1(2)/A/6450/002 (Annulus Ventilation System)

_____ 1.7.10 Notify the responsible System Engineer on duty that all ventilation systems are being shut down, and they need to consider the possibility of condensation.

_____ 1.7.11 Ensure fuel handling operations are stopped.

1.8 **IF** a tornado is reported on site property, perform the following steps:

_____ 1.8.1 Ensure all VA System fans are off.

NOTE:	The action taken in the next step causes the VA System to be inoperable. TS 3.0.3 is applicable on both units.

——— 1.8.2 Depress the "INITIATE" pushbuttons on "TORNADO ISOL TRN A(B)" on 1MC-5 and 2MC-5 ensuring all automatic functions occur as expected.

_____ 1.8.3 **IF** an emergency classification has not been declared, notify York County 911 of the event. {PIP 0-C00-01689}

_____ 1.8.4 **IF** York County is notified of the event, notify the NRC of this notification to another government agency using, RP/0/B/5000/013, "NRC Notification Requirements."

2. Subsequent Actions

2.1 Severe Weather Information/Forecast

To obtain the latest severe weather information/forecast for York County, consult the National Weather Service located in Greenville/Spartanburg, S.C. at 1-800-268-7785 or 1-864-879-1085 (unpublished).

2.2 Meteorological Conditions

As a backup to the Catawba site meteorological system (i.e., wind speed, wind direction, etc.), consult the National Weather Service located in Greenville/Spartanburg, S.C. at 1-800-268-7785 or 1-864-879-1085 (unpublished).

2.3 **WHEN** conditions permit, coordinate a survey of plant structures and equipment (similar to normal daily rounds) to determine the extent of damage as follows:

_____ 2.3.1 Notify personnel from IAE and Mechanical Maintenance to assist Operations in the evaluation of weather induced damage as necessary.

_____ 2.3.2 Notify Radiation Protection personnel to survey the Reactor, Auxiliary and Fuel Pool Buildings to ensure shielding integrity.

_____ 2.3.3 Notify Chemistry personnel to survey areas where damage may release dangerous chemicals (e.g. Sulfuric Acid Storage).

_____ 2.3.4 Record the findings of the survey in the associated unit's Nuclear Shift Supervisor Log.

2.4 **IF** the survey identifies plant damage, perform the following:

_____ 2.4.1 Determine the emergency classification for current plant conditions.

_____ 2.4.2 Make required notifications

_____ 2.4.3 Notify management of plant status and any potential for a unit shutdown.

_____ 2.5 Restore affected plant systems to normal operation per applicable site procedures.

NOTE: Permission for unit startup is required from FEMA/NRC after a plant shutdown due to a natural disaster that affects both the plant and the local government emergency response capability.

_____ 2.6 **IF** a unit restart is desired, consult site management for unit startup criteria.

2.7 This procedure remains in effect until one of the following conditions are met:

_____ • Termination of tornado watch for York County by National Weather Service

OR

_____ • Duke Power Meteorological Group (704-594-0341) verifies that a tornado threat to the Catawba Nuclear Site no longer exists.

1. Initial Actions

NOTE:
1. Wind speed information > 90 mph shall be obtained from the National Weather Service (NWS) located in Greenville/Spartanburg, S.C. at 1-800-268-7785 or 1-864-879-1085 (unpublished).
2. Initial Actions may be performed simultaneously.
3. Tornadoes often develop in the northeast quadrant of a hurricane.

_____ 1.1 Announce the following over the PA System:

"Attention all plant personnel. Attention all plant personnel. This is the Operations Shift Manager. Hurricane force winds are projected to be on site within 12 hours. Be prepared to take shelter should the hurricane force winds develop on site. Further updates will be provided as conditions warrant."

NOTE: Further determination should be made for system(s) required to be shut down by this response procedure but required to be operating by a compensatory action item.

_____ 1.2 Refer to the Open Compensatory Action Items and review for applicability. Expedite the restoration of important plant systems and components.

_____ 1.3 Review AP/1(2)/A/5500/007, (Loss of Normal Power), EP/1(2)/A/5000/ECA-0.0, (Loss of All AC Power) and OP/0/B/6100/013, (Standby Shutdown Facility Operation). Take the necessary actions to ensure equipment required for station blackout response is available.

NOTE:
1. Sustained winds (lasting 15 minutes) in excess of 73 mph is used as the indicator of the arrival of the hurricane on-site. As the hurricane moves across the site wind speeds could exceed the design basis wind speed of 95 mph.
2. The Station Blackout rule applies when hurricanes affect nuclear stations and requires the units to be placed in Mode 3, two hours prior to the arrival of hurricane force winds on site.

_____ 1.4 Discuss with site management the timing and method for shutting down the plant so as to be in Hot Standby (Mode 3), two hours before the anticipated hurricane arrival at the site.

NOTE: Travel to the site could be restricted or prohibited based on the intensity and path of the storm.

_____ 1.5 Discuss with site management the potential for on-site 24-hour staffing for shift relief and Emergency Response Organization (ERO).

_____ 1.6 Determine the status of the alternate AC sources (SSF Diesel) and take necessary actions to ensure its availability.

_____ 1.7 Coordinate with Chemistry to increase CACST, UST and hotwell inventories.

_____ 1.8 Coordinate with IAE to return to service any available out of service battery chargers.

_____ 1.9 **IF** a personnel safety hazard does not exist due to lightning or high winds, the Shift Work Manager will utilize appropriate personnel to lower crane booms.

_____ 1.10 Evaluate running the Diesel Generators based on previous run history prior to the arrival of hurricane force winds on site.

_____ 1.11 **IF** any of the following activities are in progress **OR** are scheduled to begin, terminate the activity {PIP C99-03215}:

- NS pump tests
- NS heat exchanger tests
- FWST makeup to the Spent Fuel Pool

2. Subsequent Actions

_____ 2.1 Shut down the unit(s) to be in Hot Standby (Mode 3) two hours prior to the arrival of hurricane force winds (sustained wind speeds, lasting 15 minutes, in excess of 73 mph). For the initiation of any unit shutdown, carry out the reporting provisions of RP/0/B/5000/013, (NRC Notification Requirements).

2.2 Complete the following steps prior to the arrival of hurricane force winds on site:

_____ 2.2.1 Notify RP/Radwaste Chemistry to stop all handling of radioactive materials and releases of radioactive waste to the environment for the duration of the hurricane.

_____ 2.2.2 **IF** RN swapover to the Standby Nuclear Service Water Pond has **NOT** occurred automatically on low low lake level of 557.5 ft. MSL, refer to AP/0/A/5500/020 (Loss of RN System)

2.2.3 Ventilation Systems shall be aligned as follows:

_____ A. Minimize releases from VQ System while controlling containment pressure throughout the emergency per OP/1(2)/A/6450/017 (Containment Air Release and Addition System).

B. Ensure the following ventilation systems are shut down:

_____ • VF per OP/1(2)/A/6450/004 (Fuel Pool Ventilation System)

_____ • VP per OP/1(2)/A/6450/015 (Containment Purge System)

_____ • VE per OP/1(2)/A/6450/002 (Annulus Ventilation System)

_____ 2.2.4 Notify the responsible System Engineer on duty that VF, VP, and VE ventilation systems are being shut down, and they need to consider the possibility of condensation.

_____ 2.2.5 Ensure fuel handling operations are stopped.

2.3 **IF** hurricane force winds are on site, perform the following steps:

_____ 2.3.1 Ensure all VA fans are off.

NOTE:	The action taken in the next step causes the VA system to be inoperable. TS 3.0.3 is applicable on both units

_____ 2.3.2 Depress the "INITIATE" pushbuttons on "TORNADO ISOL TRN A(B)" on 1MC-5 and 2MC-5 ensuring all automatic functions occur as expected.

2.4 Classify the emergency as appropriate per RP/0/A/5000/001, (Classification of Emergency), and commence notification and other protective measures as directed by appropriate Emergency Response Procedure.

2.5 Severe Weather Information/Forecast

To obtain the latest severe weather information/forecast for York County, consult the National Weather Service located in Greenville/Spartanburg, S.C. at 1-800-268-7785 or 1-864-879-1085 (unpublished).

2.6 Meteorological Conditions

As a backup to the Catawba site meteorological system (i.e. wind speed, wind direction, etc.), consult the National Weather Service located in Greenville/Spartanburg, S.C. at 1-800-268-7785 or 1-864-879-1085 (unpublished).

2.7 **WHEN** conditions permit, coordinate a survey of plant structures and equipment to determine the extent of damage as follows:

_____ 2.7.1 Notify personnel from IAE and Mechanical Maintenance to assist Operations in the evaluation of weather induced damage as necessary.

_____ 2.7.2 Notify Radiation Protection personnel to survey the Reactor, Auxiliary and Fuel Pool Buildings to ensure shielding integrity.

_____ 2.7.3 Notify Chemistry personnel to survey areas where damage may release dangerous chemicals (e.g. Sulfuric Acid Storage).

_____ 2.7.4 Record the findings of the survey in the associated unit's Nuclear Shift Supervisor log.

2.8 IF the survey identifies plant damage, perform the following:

_____ 2.8.1 Determine the emergency classification for current plant conditions.

_____ 2.8.2 Make required notifications

_____ 2.9 Restore affected plant systems to normal operation per applicable site procedures.

NOTE: Permission for unit startup is required from FEMA/NRC after a plant shutdown due to a natural disaster that affects both the plant and the local government emergency response capability.

2.10 IF a unit restart is desired, consult site management for unit startup criteria.

2.11 This procedure remains in effect until the Duke Power Meteorological Group (704-594-0341) verifies that the threat of hurricane force winds to the Catawba Nuclear Site no longer exists.

1. Initial Actions

NOTE:
1. Initial Actions may be performed simultaneously.
2. The four Reactor Coolant Leakage Detection Systems are not seismically qualified and must be assumed to be inoperable following any seismic event. EMF38(L) and EMF39(L) can be verified to be operable based on power availability and sample pump operation.
3. Reactor Coolant Leakage Detection Systems are not required to be operable during Cold Shutdown.
4. An OAC Alarm at point CID 2252 indicates that there has been a recording of an event by seismic instrumentation. This alarm is in addition to an event indicator and initiation by starter unit MIMT 5090.

1.1 Following any earthquake that is felt in the plant or is recorded on instrumentation, including earthquakes smaller than OBE, declare all four Reactor Coolant Leakage Detection Systems (listed below) are inoperable:

_____ 1.1.1 Containment Floor and Equipment Sump Level and Flow Monitoring System

_____ 1.1.2 VUCDT Level Monitoring System)

_____ 1.1.3 EMF38(L)

_____ 1.1.4 EMF39(L)

1.2 Determine the operable status of 1(2)EMF38(L) and 1(2)EMF39(L) by the following methods and apply the appropriate action statement for Technical Specification 3.4.15.

_____ A. Perform a source check from the Control Room to verify that power to 1(2)EMF38(L) and 1(2)EMF39(L) is available.

_____ B. Visually verify that 1(2)EMF38(L) and 1(2)EMF39(L) sample pump is operational

NOTE:

1. Decision on Shutdown **IF** the OBE has been exceeded **OR** significant damage is found during operator walkdowns, the plant should be shutdown in an orderly manner for more detailed inspections. **IF** the plant has tripped under conditions which would warrant shutdown, the plant should remain shutdown for detailed inspections.

2. Pre-Shutdown Inspections Following a decision to shutdown the plant, but prior to initiating shutdown, visual inspections of essential safe shutdown equipment should be performed to determine its readiness. Other factors outside of the control of the plant that could affect the timing of the shutdown (e.g. availability/reliability of off site power), should also be evaluated at this time.

3. Normal Shutdown **WHEN** plant capability to safely shutdown has been verified, normal shutdown would proceed. Under all circumstances the method and pace at which the Reactor is brought to a safe condition should continue to be based upon all instrumentation indications and the operator's judgment.

_____ 1.3 **IF** the Operational Bases Earthquake (OBE) Exceeded Alarm 1AD-4, B/8, is received **AND** the effects of an earthquake are felt, immediately take the Unit(s) to Hot Standby (Mode 3). For the initiation of any unit shutdown, carry out the reporting provisions of RP/0/B/5000/013, (NRC Notification Requirements).

_____ 1.4 **IF** the Operational Bases Earthquake (OBE) Exceeded Alarm 1AD-4, B/8, is received **AND** the effects of an earthquake are felt, swap RN to the Standby Nuclear Service Water Pond in accordance with OP/0/A/6400/006C (Nuclear Service Water System).

_____ 1.5 Classify the emergency as appropriate per RP/0/A/5000/001, (Classification of Emergency), and commence notification and other protective measures as directed by appropriate Emergency Response Procedure.

_____ 1.6 **IF** the FWST level is decreasing, verify valves 1(2)FW33A and 1(2)FW49B are closed.

_____ 1.7 **WHEN** appropriate, announce the impending condition over the plant PA System.

2. Subsequent Actions

_____ 2.1 Notify IAE to remove the magnetic tapes from the SMA-3 recorder to evaluate and verify the magnitude of the earthquake according to AM/0/B/5100/010, "Kinemetrics Seismic Monitoring System Data Collection." Section 3.0 of this enclosure is provided as a reference for seismic monitoring instrument locations.

_____ 2.2 **IF** the earthquake intensity is >0.15g horizontal **OR** >0.1g vertical (> Safe Shutdown Earthquake) as measured by 1MIMT 5070 (provided by IAE from step 2.1), shut down the unit(s) to Cold Shutdown (Mode 5). For the initiation of any unit shutdown, carry out the reporting provisions of RP/0/B/5000/013, (NRC Notification Requirements).

2.3 Seismic verification may be obtained by calling the National Earthquake Information Service at 1-800-525-7848 or 1-303- 273-8500.

_____ 2.4 All records made by accelerographs and recorders shall be evaluated to verify the extent of the earthquake.

_____ 2.5 **IF** the earthquake was determined to be >OBE, Regulatory Compliance shall make a report to NRC Region II within 24 hours via telephone. (10CFR 50.72)

_____ 2.6 **IF** the earthquake was determined to be <OBE but recorded on seismic instrumentation, Regulatory Compliance shall prepare and submit a special report to the NRC as defined in Selected Licensee Commitments (SLC) Section 16.7-2, Seismic Instrumentation, Testing Requirements, b.

_____ 2.7 **WHEN** conditions permit, coordinate a survey of plant structures and equipment (similar to normal daily rounds) to determine the extent of damage, as follows:

_____ 2.7.1 Notify personnel from IAE and Mechanical Maintenance to assist Operations in the evaluation of damage as necessary.

_____ 2.7.2 Notify Radiation Protection personnel to survey the Reactor, Auxiliary and Fuel Pool Buildings to ensure shielding integrity.

_____ 2.7.3 Notify Chemistry personnel to survey areas where damage may release dangerous chemicals (e.g. Sulfuric Acid Storage).

_____ 2.7.4 Record the findings of the survey in the associated unit's Nuclear Shift Supervisor Log.

2.8 **IF** the earthquake exceeds OBE **AND** the survey identifies plant damage, perform the following:

2.8.1 Evaluate overall plant conditions and consider emergency classifications based on Emergency Coordinator's judgement.

2.8.2 Make required notifications.

2.9 Restore affected plant systems to normal operation per applicable site procedures.

NOTE:	Permission for unit startup is required from FEMA/NRC after a plant shutdown due to a natural disaster that affects both the plant and the local government emergency response capability.

2.10 **IF** a unit restart is desired, consult site management for unit startup criteria.

3. Station Seismic Monitoring Instruments

Instrument #	Name	Location
1MIMT-5010	Peak Accelerograph	Cold Leg Accumulator 1A
1MIMT-5020	Peak Accelerograph	NC Pipe at PZR Surge Line
1MIMT-5030	Peak Accelerograph	NI Pump 1A

NOTE: 1MIMT-5040 also provides input to Peak Shock Annunciator (PSA1575)

1MIMT-5040	Spectrum Recorder	RB Basement 0°
1MIMT-5050	Spectrum Recorder	PZR Lower Support
1MIMT-5060	Spectrum Recorder	Aux Bldg. 577 EL (PP-56)

NOTE: 1MIMT-5000 provides indication of OBE Exceeded on 1AD-4, B/8 in Control Room

1MIMT-5000	Seismic Switch	RB Basement 0°
1MIMT-5070	Strong Motion Accelerograph	RB Basement 0°
1MIMT-5080	Strong Motion Accelerograph	Annulus 619 EL 0°
1MIMT-5090	Starter Unit for SMA-3	RB Basement 0°

Seismic Instrumentation System Information

Seismic switch 1MIMT-5000 provides a Control Room Annunciator 1AD4/B8 for indication of OBE exceeded. 1MIMT 5070/5080 receive a start signal from 1MIMT-5090. 1MIMT 5070/5080 provide magnetic tape recordings which must be played back on SMP-1 to get a recording of the data to be analyzed.

1MIMT-5040 provides Control Room indication of greater than 70% OBE (amber light) or greater than 100% OBE (red light) for certain frequencies between 2 and 25.4 Hz.

1MIMT-5010/5020/5030/5040/5050/5060 contain removable scratch plates. These scratch plates provide indication of peak accelerations.

Enclosure 5.5

Flooding Due to High Lake Level (Lake Elevation > 593.5 MSL) or Seiche (Lake Tidal Wave)

1. Initial Actions

NOTE:	1. Seiche is same as High Lake Level. 2. Initial Actions may be performed simultaneously.

_____ 1.1 Should the lake level exceed 593.5 Ft MSL **AND** jeopardize the safe operation of the reactor, shut down the unit(s) to Hot Standby (Mode 3). For the initiation of any unit shutdown, carry out the reporting provisions of RP/0/B/5000/013, (NRC Notification Requirements).

_____ 1.2 Contact SPOC to close the Auxiliary Service Building rolling doors AR2 (Hot Tool Crib) and AR5 (Waste Shipping Area). **IF** the rolling doors are damaged to the extent they cannot be closed, ensure a suitable 7½" barrier is installed across the door opening above the 594+0 Floor Slab until the door(s) can be repaired.

_____ 1.3 Classify the emergency as appropriate per RP/0/A/5000/001, (Classification of Emergency), and commence notification and other protective measures as directed by appropriate Emergency Response Procedure.

_____ 1.4 **WHEN** appropriate, announce the impending condition over the plant PA System.

2. Subsequent Actions

2.1 **WHEN** conditions permit, coordinate a survey of plant structures and equipment to determine the extent of damage as follows:

_____ 2.1.1 Notify personnel from IAE and Mechanical Maintenance to assist Operations in the evaluation of weather induced damage as necessary.

_____ 2.1.2 Notify Radiation Protection personnel to survey the Reactor, Auxiliary and Fuel Pool Buildings to ensure shielding integrity.

_____ 2.1.3 Notify Chemistry personnel to survey areas where damage may release dangerous chemicals (e.g. Sulfuric Acid Storage).

_____ 2.1.4 Record the findings of the survey in the associated unit's Nuclear Shift Supervisor Log.

2.2 **IF** the survey identifies plant damage, perform the following:

_____ 2.2.1 Evaluate the overall plant condition and consider emergency classifications based on Emergency Coordinator's judgement.

_____ 2.2.2 Make required notifications.

2.3 Restore affected plant systems to normal operation per applicable site procedures.

NOTE: Permission for unit startup is required from FEMA/NRC after a plant shutdown due to a natural disaster that affects both the plant and the local government emergency response capability.

2.4 **IF** a unit restart is desired, consult site management for unit startup criteria.

Enclosure 5.6

Low Lake Level
(Lake Elevation < 557.5 Ft. MSL)

1. Initial Actions

NOTE:	Initial Actions may be performed simultaneously.

_____ 1.1 Classify the emergency as appropriate per RP/0/A/5000/001 (Classification of Emergency), and commence notification and other protective measures as directed by appropriate Emergency Response Procedure.

_____ 1.2 Lake level elevations below 557.5 FT. MSL shall be obtained from the Duke Power Company System Coordinator on the Control Room System Coordinator phone or at 8-382-4413.

_____ 1.3 Should the lake level decrease below 550.4 Ft MSL **AND** jeopardize the safe operation of the reactor, shut down the unit(s) to Hot Standby (Mode 3). For the initiation of any unit shutdown, carry out the reporting provisions of RP/0/B/5000/013 (NRC Notification Requirements).

_____ 1.4 **WHEN** appropriate, announce the impending condition over the plant PA System.

2. Subsequent Actions

2.1 **IF** applicable and **WHEN** conditions permit, coordinate a survey of plant structures and equipment to determine the extent of damage as follows:

_____ 2.1.1 Notify personnel from IAE and Mechanical Maintenance to assist Operations in the evaluation of weather induced damage as necessary.

_____ 2.1.2 Notify Radiation Protection personnel to survey the Reactor, Auxiliary and Fuel Pool Buildings to ensure shielding integrity.

_____ 2.1.3 Notify Chemistry personnel to survey areas where damage may release dangerous chemicals (e.g. Sulfuric Acid Storage).

_____ 2.1.4 Record the findings of the survey in the associated unit's Nuclear Shift Supervisor Log.

2.2 **IF** the survey identifies plant damage, perform the following:

_____ 2.2.1 Evaluate the overall plant condition and consider emergency classifications based on the Emergency Coordinator's judgement.

_____ 2.2.2 Make required notifications.

2.3 Restore affected plant systems to normal operation per applicable site procedures.

(R08-97)

Duke Power Company
PROCEDURE PROCESS RECORD

(1)ID No. RP/0/B/5000/013
Revision No. 025

PREPARATION

Station Catawba Nuclear Station

(3) Procedure Title NRC Notification Requirements

(4) Prepared By E. J. Bradley Date 7/17/00

(5) Requires 10CFR50.59 evaluation?
- [X] Yes (New procedure or reissue with major changes)
- [ ] No (Revision with minor changes)
- [ ] No (To incorporate previously approved changes)

(6) Reviewed By GARY L MITCHELL (QR) Date 7/18/00

Cross-Disciplinary Review By _____ (QR) NA GLM Date 7/18/00

Reactivity Mgmt. Review By _____ (QR) NA GLM Date 7/18/00

(7) Additional Reviews

Reviewed By _____ Date _____

Reviewed By _____ Date _____

(8) Temporary Approval *(if necessary)*

By _____ (SRO/QR) Date _____

By _____ (QR) Date _____

(9) APPROVED BY Richard L Swingle Date 7/18/00

PERFORMANCE (Compare with control copy at least once every 14 calendar days while work is being performed)

(10) Compared with Control Copy _____ Date _____

Compared with Control Copy _____ Date _____

Compared with Control Copy _____ Date _____

(11) Dates(s) Performed _____

Work Order Number (W/O #) _____

COMPLETION

(12) Procedure Completion Verification

- [ ] Yes [ ] N/A Check lists and/or blanks properly initialed, signed, dated, or filled in NA, as appropriate?
- [ ] Yes [ ] N/A Listed enclosures attached?
- [ ] Yes [ ] N/A Data sheets attached, completed, dated and signed?
- [ ] Yes [ ] N/A Charts, graphs, etc. attached and properly dated, identified and marked?
- [ ] Yes [ ] N/A Procedure requirements met?

Verified By _____ Date _____

13) Procedure Completion Approved _____ Date _____

(, Remarks *(attach additional pages, if necessary)*

Duke Power Company Catawba Nuclear Station **NRC Notification Requirements** **Multiple Use**	Procedure No. RP/**0**/B/5000/013 Revision No. 025 Electronic Reference No. CN005GO5

1. Symptoms

NOTE: Unless otherwise noted, the terms Tech Spec or Technical Specifications refer to both Unit 1 and Unit 2 Technical Specifications.

1.1 Plant conditions requiring Immediate, 1-hour, 4-hour, 24-hour **OR** 30 day NRC notification in accordance with the following:

1.1.1 10CFR20.1906

1.1.2 10CFR20.2202

1.1.3 10CFR26.73

1.1.4 10CFR50.36

1.1.5 10CFR50.72

1.1.6 10CFR70.52

1.1.7 10CFR73.71

1.1.8 Declaration of any emergency classification

1.1.9 Security or Safeguards Event

1.2 All non-emergency notifications to the NRC (1.1.1 through 1.1.7 and 1.1.9) where no other notification is required, shall be made to the state and county emergency preparedness management agencies as courtesy notifications. EnergyQuest/On-site Public Affairs shall be notified of all "courtesy" notifications to the states and counties. (PIP 0-C00-01689)

2. Immediate Actions

2.1 Complete one of the following enclosures:

2.1.1 Enclosure 4.8 "Safeguards ENS Event Report"

OR

2.1.2 Enclosure 4.9 "Event Notification Report"

2.1.2.1 If the Event Notification Report is being completed for a non-emergency event, mark the "NOTIFICATIONS" blocks at the bottom of page 1 of 2 as "WILL BE" for both states (NC, SC) and all three counties.

2.1.2.2 If the Event Notification Report is being completed for a declared emergency, mark the "NOTIFICATIONS" blocks at the bottom of page 1 of 2 as "YES" for both states (NC, SC) and all three counties.

2.2 Notify the NRC Operations Center by one of the following means:

2.2.1 **Primary**: Emergency Notification System (ENS) Phone 301-816-5100

OR

2.2.2 **Alternate**: Commercial Telephones:

- 1-301-816-5100
- 1-301-951-0550
- 1-301-415-0550
- 1-301-415-0553

AND

2.2.3 **Facsimile**: 1-301-816-5151

2.3 **IF** additional explanation/determination of appropriate notification requirement(s) is required, refer to:

2.3.1 Enclosure 4.1, "Events Requiring Immediate NRC Notification"

2.3.2 Enclosure 4.2, "Events Requiring 1-Hour NRC Notification"

2.3.3 Enclosure 4.3, "Events Requiring 4-Hour NRC Notification"

2.3.4 Enclosure 4.4, "Events Requiring 24-Hour NRC Notification"

2.3.5 Enclosure 4.5, "Events Requiring 30- Day NRC Notification"

2.3.6 Enclosure 4.6, "List of ESF Actuations for Catawba"

2.3.7 NSD 201, "Reporting Requirements"

2.3.8 NSD 202, "Reportability"

NOTE: Notification of state and county emergency preparedness management agencies using this procedure is a "courtesy" notification.

2.4 **IF** the NRC is being notified of a plant condition, **and** an emergency has **not** been declared, **and** there is **not** another requirement to notify the state and county emergency preparedness management agencies, then notify them and EnergyQuest by referring to Enclosure 4.7. (PIP 0-C00-01689)

3. Subsequent Actions

3.1 Maintain continuous communications with the NRC Operations Center upon request by the NRC.

3.2 Notify the following individuals:

3.2.1 Duty Regulatory Compliance Representative (see current station duty list)

3.2.2 Duty NRC Resident Inspector (see current station duty list)

3.2.3 Duty Station Manager (see current station duty list)

3.2.4 Duty Safety Professional (see current duty list) for the following events:

3.2.4.1 On-Site Fatality

3.2.4.2 Admission of an employee to the hospital

3.2.5 Duty Emergency Planner (see current duty list)

3.3 Forward a copy of the completed procedure to the Emergency Planning Group.

3.4 Forward the original signed completed procedure to Document Management.

4. Enclosures

4.1 Events Requiring Immediate NRC Notification
4.2 Events Requiring 1-Hour NRC Notification
4.3 Events Requiring 4-Hour NRC Notification
4.4 Events Requiring 24-Hour NRC Notification
4.5 Events Requiring 30-Day NRC Notification or 30 Day NRC Report
4.6 List of ESF Actuations for Catawba
4.7 Courtesy Notification to States and Counties of Non-emergency Plant Conditions
4.8 Safeguards ENS Event Report
4.9 Event Notification Report

Events Requiring IMMEDIATE NRC Notification

Complete the reporting requirements for the following events as soon as practical after the occurrence becomes known to the licensee:

10CFR Section	Event Description	Reporting Requirement
10CFR20.1906 **Transportation events involving receiving and opening packages**	Events involving receiving and opening packages when removable radioactive surface contamination of the package (as determined by Radiation Protection) exceeds the limits of 10CFR71.87(i) or when external radiation levels (as determined by Radiation Protection) exceed the limits of 10CFR71.47	Notify the final delivery carrier. Notify the Region II Administrator at 404-562-4400. An Emergency Notification System (ENS) phone call does not need to be made unless specified by Region II. There is not an enclosure for reporting to Region II pursuant to 10CFR20.1906(d).
10CFR20.2201a(i) **Material/Exposure events involving theft or loss of stolen licensed material**	Events involving any lost, stolen, or missing licensed material in an aggregate quantity equal to or greater than 1,000 times the quantity specified in Appendix C to 10CFR20.1001 - 20.2401 (as determined by Radiation Protection) under such circumstances that it appears that an exposure could result to persons in unrestricted areas.	Notify the NRC Operations Center
10CFR20.2202 **Material/Exposure events involving radiological exposure**	Any event involving byproduct, source, or special nuclear material that may have caused or threatens to cause an individual to receive any of the following: • A total effective dose equivalent of 25 rems or more • An eye dose equivalent of 75 rems or more • A shallow-dose equivalent to the skin or extremities of 250 rads or more • May have caused or threatens to cause the release of radioactive material, inside or outside of a restricted area, so that, had an individual been present for 24 hours, the individual could have received an intake five times the occupational annual limit on intake (does not apply to locations where personnel are not normally stationed during routine operations).	Notify the NRC Operations Center

Events Requiring IMMEDIATE NRC Notification

Complete the reporting requirements for the following events as soon as practical after the occurrence becomes known to the licensee

10CFR Section	Event Description	Reporting Requirement
10CFR50.72 **Emergency Classification Notifications**	• Declared emergency classification as specified in RP/0/A/5000/001, "Classification of Emergency". • Change from one emergency classification to another • Termination of an emergency classification • Any further degradation in the level of safety of the plant or other worsening plant conditions, including those that require the declaration of any of the emergency classes, if such a declaration has not been previously made • The results of ensuing evaluations or assessments of plant conditions • The effectiveness of response or protective measures taken. • Information related to plant behavior that is not understood • As a courtesy in situations deemed necessary.	Notify the NRC Operations Center immediately after notification of the appropriate state or local agencies and not later than 1 hour after the time one of the emergency classes is declared. Activate the Emergency Response Data System (ERDS) as soon as possible but not later than one hour after declaring an Alert or higher emergency classification.

Events Requiring 1-HOUR NRC Notification

Complete the reporting requirements for the following events as soon as practical and in all cases within 1 hour after the occurrence becomes known to the licensee:

10CFR Section	Event Description	Reporting Requirement
10CFR50.72(b)(1)(i)(A) **Initiation of any plant shutdown required by Technical Specifications**	• Initiation of a shutdown is defined as: "A reduction in power required by an Action statement of Technical Specifications to enter Mode 3." • Shutdown is defined (for reporting requirements) as: "Mode 3 and below from Mode 1 or Mode 2." • Cooldown to comply with an Action statement of Technical Specifications does not constitute "Shutdown initiation of any plant shutdown." reporting requirements. Example: If the unit is already shut down and a cooldown is required to comply with a Technical Specification ACTION statement, no further reporting requirements apply because of the cooldown	Notify the NRC Operations Center

Complete the reporting requirements for the following events as soon as practical and in all cases within 1 hour after the occurrence becomes known to the licensee:

10CFR50.72(b)(1)(i)(B) **TS Deviation (10CFR50.54(x) Declarations)**	• Reasonable action that departs from a license condition or a technical specification may be taken in an emergency when this action is immediately needed to protect the health and safety of the public and no action consistent with the license condition or technical specification that can provide adequate or equivalent protection is immediately apparent. • Deviation from the intent of an emergency procedure constitutes a 10CFR50.54(x) action. • Actions taken per 10CFR50.54(x) shall be approved, as a minimum, by a Licensed Senior Reactor Operator prior to taking such action. • 10CFR50.54(x) decisions shall be documented in the Reactor Operators Logbook and the TSC Logbook. • If not reported as a declaration of an emergency classification, the NRC shall be notified as soon as practical but always within one hour of the occurrence of a 10CFR50.54(x) action. {PIP 2-C96-0273}	Notify the NRC Operations Center

Events Requiring 1-HOUR NRC Notification

Complete the reporting requirements for the following events as soon as practical and in all cases within 1 hour after the occurrence becomes known to the licensee:

10CFR Section	Event Description	Reporting Requirement
10CFR50.72(b)(1)(ii) **Plant Operation Degraded**	Any event or condition during operation that results in the condition of the plant, including its principal safety barriers, being seriously degraded or results in the plant being in: • an unanalyzed condition significantly compromising plant safety, • a condition outside the plant's design basis, or • a condition not covered by the plant's operating and emergency procedures	Notify the NRC Operations Center
10CFR50.72(b)(1)(ii) **Degraded Condition** **Technical Specification safety limit violation**	Events involving a Technical Specification safety limit violation.	Notify the NRC Operations Center.
10CFR50.72(b)(1)(iii) **Natural phenomenon or other external condition**	Any natural phenomenon or other external condition that poses an actual threat to the safety of the plant or significantly hampers site personnel in the performance of duties necessary for safe plant operation. This section applies only to acts of nature (e.g., tornadoes, earthquakes, external fires, hurricanes, floods) and external hazards (e.g., industrial and transportation accidents). Events of this type include external toxic substance releases, severe weather conditions, civil disturbances, extensive fires, or major traffic accidents that could prevent the arrival of personnel on site for the purpose of shift turnover for a reasonable period of time (e.g., greater than four hours) beyond the normal turnover time.	Notify the NRC Operations Center

Events Requiring 1-HOUR NRC Notification

Complete the reporting requirements for the following events as soon as practical and in all cases within 1 hour after the occurrence becomes known to the licensee:

10CFR Section	Event Description	Reporting Requirement
10CFR50.72(b)(1)(iv) **ECCS discharge into the Reactor Coolant System**	Any event that results or should have resulted in ECCS discharge into the reactor coolant system as a result of a valid signal • Valid signal refers to those signals automatically initiated by measurement of an actual physical system parameter that was within the established setpoint band of the sensor that provides the signal to the protection system logic, or manually initiated in response to plant conditions. Valid signals also include passive system actuations that occur as a function of system conditions like differential pressure (i.e., cold leg accumulators) whereby no SSPS or other electrical signal is involved. The validity of an ECCS signal may not be determined within 1 hour; ECCS signals that result or should have resulted in injections should be considered valid until firm evidence proves otherwise. • Invalid ECCS injections are still considered ESF actuations and therefore require a 4-hour NRC notification (unless a 1-hour notification was made per this section) and LER. **(Refer to Enclosure 4.6 for guidance as to what constitutes an ESF actuation.)**	Notify the NRC Operations Center

Complete the reporting requirements for the following events as soon as practical and in all cases within 1 hour after the occurrence becomes known to the licensee:

10CFR Section	Event Description	Reporting Requirement
10CFR50.72(b)(1)(v) **Major loss of emergency assessment capability or communications capability**	Any event that results in a major loss of emergency assessment capability or communications capability (e.g., significant portion of control room indication, Emergency Notification System (ENS), Health Physics Network (HPN), unavailability of TSC or off-site notification system (i.e., loss of 22 (25%) or more of the plant's Emergency Planning Zone sirens for more than one hour) • Should either or both of the emergency communications subsystems (ENS and HPN fail, the NRC Operations Center should be so informed over normal commercial telephone lines. When notifying the NRC Operations Center, licensees should use the backup commercial telephone numbers provided. • <u>If the NRC Operations Center notifies the licensee</u> that an ENS or HPN line is inoperable, a report is not required. The Operations Center contacts the appropriate repair organization.	Notify the NRC Operations Center

Complete the reporting requirements for the following events as soon as practical and in all cases within 1 hour after the occurrence becomes known to the licensee:

10CFR Section	Event Description	Reporting Requirement
10CFR50.72(b)(1)(vi) **Fire, Toxic Gas Radiological Releases or any other event that poses an actual threat to plant safety or significantly hampers site personnel in the performance of duties**	• This section pertains to threats internal to the station. Fires, toxic gas releases, and radioactive releases are not the only threats that may require reporting under this section. Events of this type include any abnormal conditions or occurrences on site which could prevent personnel from establishing control of shutdown systems from local stations (even if not needed) for greater than two hours. • Examples include high radiation level, steam line break, physical barrier, excessive heat, fire protection discharge, or other internal hindrance preventing access to safety related equipment or areas (e.g., inadvertent CO2 discharge in diesel generator room or steam line break within the CA pump room preventing access to the turbine control panel for an extended period of time). • The greater than two hour criterion for establishing local control of shutdown systems is based on the initiating criteria for an "Alert" condition. If the control room is unavailable and local controls are not able to be established in fifteen minutes, a "Site Area Emergency" should be declared. If some phenomenon in the plant prohibits use of the local shutdown controls (examples below), yet the control room is still functioning normally, an emergency condition may not exist, but notification under this section is called for. Since the control room is still available, the time period has been somewhat arbitrarily set longer than fifteen minutes and at a limit of two hours. • Examples of phenomenon in the plant that prohibits the use of the local shutdown controls include: MG set room, auxiliary shutdown panels or auxiliary feedwater pump turbine control panel, S/G PORVs in the doghouses, emergency borate valves, diesel generator rooms, standby shutdown facility, VI panel, auxiliary electric boiler panels, main turbine front standard, main feedwater pump turbine front standard, NV-188A and 189B, NV-252A and 253B, NI-9A and 10B, ETA/ETB room CPCS control cabinets, primary sample room, VC/YC local panels, and VA local panels	Notify the NRC Operations Center

Events Requiring 1-HOUR NRC Notification

Complete the reporting requirements for the following events as soon as practical and in all cases within 1 hour after the occurrence becomes known to the licensee:

10CFR Section	Event Description	Reporting Requirement
10CFR70.52 **Accidental criticality or loss or theft or attempted theft of special nuclear material**	Events involving accidental criticality or loss or theft or attempted theft of special nuclear material • Any case of accidental criticality or any loss, other than normal operating loss, of special nuclear material • Any loss or theft or unlawful diversion of special nuclear material or any incident in which an attempt has been made or is believed to have been made to commit a theft or unlawful diversion of such material	Notify the NRC Operations Center
10CFR73.71 **Physical protection of plant and materials**	Events involving physical protection of plant and materials • The loss of any shipment of special nuclear material or spent fuel (also notify the NRC Operations Center within 1 hour after recovery of or accounting for such lost shipment) • Safeguards events as determined by Security personnel	Notify the NRC Operations Center. Notify the NRC Operations Center of significant supplemental information which becomes available.

Events Requiring 4-HOUR NRC Notification

Complete the reporting requirements for the following events as soon as practical and in all cases within 4 hours after the occurrence becomes known to the licensee:

10CFR Section	Event Description	Reporting Requirement
10CFR50.72(b)(2)(i) **Reactor is shut down**	Any event found while the reactor is shut down, that, had it been found while the reactor was in operation, would have resulted in the plant, including its principal safety barriers, being seriously degraded or in an unanalyzed condition that significantly compromises plant safety.	Notify the NRC Operations Center
(10CFR50.72(b)(2)(ii) **ESF Actuation**	Any event or condition that results in manual or automatic actuation of any ESF, including the RPS. Actuation of an ESF, including the RPS, that results from and is part of a pre-planned sequence during testing or operation **need not be reported**. Also an actuation **need not be reported** if it is invalid and any of the following occur: • The actuation occurs while the system is properly removed from service • The actuation occurs after the safety function has been already completed • The actuation involves only the following specific ESFs: (a) Control Room ventilation system (b) Reactor Building ventilation system (c) Fuel Building ventilation system (d) Auxiliary Building ventilation system **(Refer to Enclosure 4.6 for guidance as to what constitutes an ESF actuation.)**	Notify the NRC Operations Center

Complete the reporting requirements for the following events as soon as practical and in all cases within 4 hours after the occurrence becomes known to the licensee:

10CFR50.72(b)(2)(iii) **Safety Function Prevented From Functioning**	Any event or condition that alone could have prevented the fulfillment of the safety function of structures or systems needed to: • shut down the reactor and maintain it in a safe shutdown condition, • remove residual heat, • control the release of radioactive material, or • mitigate the consequences of an accident	Notify the NRC Operations Center
(10CFR50.72(b)(2)(iv) **Airborne or Liquid Release**	Any airborne radioactive release that exceeds 20 times the applicable concentration specified in Appendix B to 10CFR20.1001-20.2401, Table 2, Column 1 of Part 20 of this chapter in unrestricted areas, when averaged over a time period of 1 hour **OR** Any liquid effluent release that exceeds 20 times the applicable concentration specified in Appendix B to 10CFR20.1001-20.2401, Table 2, Column 2, of Part 20 of this chapter, at the point of entry into the receiving water (i.e., unrestricted area) for all radionuclides except tritium and dissolved noble gases, when averaged over a time period of 1 hour	Notify the NRC Operations Center
10CFR50.72(b)(2)(v) **Offsite Medical (Contaminated Injury)**	Any event requiring the transport of a radioactively contaminated person to an off-site medical facility for treatment	Notify the NRC Operations Center
10CFR50.72(b)(2)(vi) **Offsite Notification (News Release)**	Any event or situation, related to the health and safety of the public or on-site personnel, or protection of the environment, for which a news release is planned or notification to other government agencies has been or will be made. Such an event may include an on-site fatality or inadvertent release of radioactively contaminated materials	Notify the NRC Operations Center

Events Requiring 4-HOUR NRC Notification

Complete the reporting requirements for the following events as soon as practical and in all cases within 4 hours after the occurrence becomes known to the licensee:

10CFR50.72(b)(2)(vii) **Spent Fuel Storage Defect/Reduction in Effectiveness**	Any instance of: • A defect in any spent fuel storage cask structure, system, or component which is important to safety or • A significant reduction in the effectiveness of any spent fuel storage cask confinement system during use of the storage cask under a general license issued under 10CFR72.210.	Notify the NRC Operations Center
S/G Tube Integrity Technical Specification	Notify the NRC of Steam Generator Tube Plugging in accordance with Technical Specifications 5.5.9, Table 5.5.2.	Notify the NRC Operations Center

Events Requiring 24-HOUR NRC Notification

Complete the reporting requirements for the following events as soon as practical and in all cases within 24 hours after the occurrence becomes known to the licensee:

10CFR Section	Event Description	Reporting Requirement
10CFR20.2202 **Radiological Exposure**	Any event involving loss of control of licensed material that may have caused, or threatens to cause an individual to receive, in a period of 24 hours • A total effective dose equivalent exceeding 5 rems, or • An eye dose equivalent exceeding 15 rems, or • A shallow-dose equivalent to the skin or extremities exceeding 50 rems Or that may have caused, or threatens to cause the release of radioactive material, inside or outside of a restricted area, so that, had an individual been present for 24 hours, the individual could have received an intake in excess of one occupational annual limit on intake (does not apply to locations where personnel are not normally stationed during routine operations).	Notify the NRC Operations Center

Complete the reporting requirements for the following events as soon as practical and in all cases within 24 hours after the occurrence becomes known to the licensee:

10CFR26.73
 	
Fitness For Duty
	Significant Fitness For Duty events including:
	
	• Sale, use, or possession of illegal drugs within the protected area and
	
	• Any acts by any person licensed under 10CFR55 to operate a power reactor or by any supervisory personnel assigned to perform duties within the scope of this Part
	
	  • Involving the sale, use, or possession of a controlled substance,
	
	  • Resulting in confirmed positive tests on such persons,
	
	  • Involving use of alcohol within the protected area, or
	
	  • Resulting in a determination of unfitness for scheduled work due to the consumption of alcohol
		Notify the NRC Operations Center

Events Requiring 24-HOUR NRC Notification

Complete the reporting requirements for the following events as soon as practical and in all cases within 24 hours after the occurrence becomes known to the licensee:

Operating License Condition Deviations	Operating license condition deviations requiring a 24-hour report • Catawba must implement and maintain in effect all provisions of the approved fire protection program as described in the UFSAR and the SLC's. Violations of this program are potentially reportable as a 24-hour notification. Regulatory Compliance should always be notified concerning potentially reportable fire protection events. • Duke Power Company, Catawba Nuclear Site, is authorized to operate the facility at reactor core power levels not in excess of 3411 megawatts thermal (100% power) in accordance with the conditions specified in the License. Exceeding actual 100% power level is potentially a 24-hour notification as required by the Facility Operating License. Regulatory Compliance should be consulted to help determine the reportability when power level exceeds 100%.	Notify the NRC Operations Center

Events Requiring 30 DAY NRC NOTIFICATION OR 30 DAY NRC REPORT

Complete the reporting requirements for the following events as soon as practical and in all cases within 30 days after the occurrence becomes known to the licensee:

10CFR Section	Event Description	Reporting Requirement
10CFR20.2201 **Theft, Loss or Missing Licensed Material**	All licensed material in a quantity greater than ten times the quantity specified in Appendix C to 10CFR20.1001 - 20.2401 (as determined by Radiation Protection) that is still missing at this time	Notify the NRC Operations Center via the Emergency Notification System
Licensee Event Report (LER)	Any event which requires the preparation of a Licensee Event Report (the event may or may not be reportable under 10CFR50.72).	Notify the Duty Regulatory Compliance Engineer The Shift Work Manager shall ensure a Problem Investigation Process (PIP) report for a more significant event (MSE) is generated and forwarded to the Safety Review Group to accurately reflect the condition. LER submitted to NRC.

1. Any reactor trip (P-4)

2. Safety injection (UFSAR 6.3.1, 6.3.2)

   A. NV charging path

   B. NI charging path

   C. ND charging path

   D. CLA injection

   E. D/G sequencer activation

   F. Reactor trip signal

   G. FWST - containment sump ND suction swap
   - If a second NV pump is manually started in order to maintain NC inventory, this is also an ESF actuation.

3. Containment spray (UFSAR 6.2.2)

   A. NS pump start/valve alignment

   B. Actual spraydown of containment

4. Containment isolation (UFSAR 6.2.4)

   A. Phase A (St)

   B. Phase B (Sp)

   C. An ESF actuation on containment air release and addition system (VQ) is reportable when:

      (i) Closure of the VQ valves is caused by a safety injection signal, <u>manual</u> phase A, or <u>manual</u> phase B, and the VQ system is operating in either the containment purge or addition mode. (This is regardless of whether the signal is actual or spurious.)

      (ii) Closure of the VQ valves as a result of a high radiation signal from EMF-38, 39, or 40 to terminate the release (when the VQ system is in the normal operating mode, purging containment air through the unit vent to the atmosphere) <u>does not</u> constitute an ESF actuation.

   D. Closure of the VP valves upon receipt of a high radiation signal from EMF-38, 39, or 40 <u>does not</u> constitute a reportable ESF actuation during any mode.

   E. NW system injection

5. Steam line isolation (UFSAR 10.3.2)
   A. Individual steam line valve closure*

   B. System isolation

   C. Actuation of P-12 to close steam dumps is **NOT** an ESF actuation

6. Feedwater isolation (UFSAR 10.4.7.2)
   A. Main feedwater control valve closure*

   B. Main feedwater control bypass valve closure*

   C. Main feedwater containment isolation valve closure*

   D. Main feedwater containment bypass valve closure*

   E. Auxiliary feedwater tempering valve closure*

7. Turbine trip (UFSAR 10.2.1) caused by:
   A. Manual actuation (required because of b - e and no automatic trip)

   B. Safety injection signal

   C. S/G hi hi water level (P-14)

   D. Reactor trip (P-4)

   E. Trip of both main feedwater pumps

8. Auxiliary feedwater system

   A. Auxiliary feedwater pump start, automatic or manual, unless the start was the expected result of a controlled (documented) test or procedure.

      Example: A feedwater transient is in progress with S/G levels decreasing toward the reactor trip setpoint. If the operator starts a CA pump(s) to supplement CF flow and prevent the trip, the start is reportable under the 4-hour NRC notification criterion.

   B. Pump suction swap to RN

9. Loss of power (UFSAR 8.3.1.1.2)
   A. Actuation of undervoltage relays on loss of voltage to essential busses

   B. Actuation of undervoltage relays on grid degraded voltage

   C. D/G sequencer activation

10. Control room area ventilation (VC) operation (UFSAR 9.4.1)
    A. Simultaneous operation of A and B trains. The only ESF function of the VC system is for the non-operating train of VC to start up upon receipt of a safety injection signal or a blackout signal.

    B. The actuation of EMF-43A/B, chlorine or smoke detectors closing the VC intakes does not constitute an ESF actuation.

11. Containment air return and hydrogen skimmer (VX) operation (UFSAR 6.2.5.2)

    A. Any unanticipated system operation

12. Annulus ventilation (VE) operation (UFSAR 9.4.9, 6.2.3)

    A. Any unanticipated system operation

13. Auxiliary building filtered ventilation exhaust (VA) operation (UFSAR 9.4.3.1)

    A. Filtered mode of operation in conjunction with isolation of all auxiliary building areas, except ECCS pump rooms

       The operation of VA in the filtered mode constitutes an ESF actuation only when initiated by receipt of a LOCA signal from the SSPS whereby the isolation dampers close, shutting off the air flow from all areas of the Auxiliary Building except for the rooms which contain ECCS safety-related pumps.
       Transfer of the VA System from the unfiltered mode to the filtered mode of operations (via EMF-41) does not constitute an ESF actuation.

14. Ice condenser lower inlet door opening as a result of unplanned mass or energy release into containment

    A. Door openings resulting from planned evolutions such as containment ventilation fan starts, personnel entries into containment, etc., **do not** constitute ESF actuations.

NOTE: Items 15, 16, and 17 (Hydrogen Mitigation System) can only be manually initiated.

15. Hydrogen Recombiners (UFSAR 6.2.5)

16. Hydrogen Purge (UFSAR 6.2.5)

17. Hydrogen Igniters (UFSAR 6.2.5)

* Individual component activation due to component failure not reportable per this requirement

Courtesy Notification to States and Counties for a Non-emergency Plant Event

NOTES: 1. This enclosure provides instruction for notifying state and county emergency preparedness management agencies (primary WP/EOCs) and EnergyQuest of **non-emergency** plant events by faxing the Event Notification Report (Enclosure 4.9) to each agency and verifying its receipt with a follow-up phone call. (PIP 0-C00-01689)

2. Step 1 sends a group fax and step 2 sends the fax to agencies individually.

1. Notification by Group Fax

1.1 Notify the states and county agencies (primary WP/EOCs) of a **non-emergency** plant event(s) with the completed Event Notification Report (Enclosure 4.9) used to notify the NRC, as follows:

NOTE: Performing steps 1.1.1 through 1.1.3 sends the Event Notification Report (Enclosure 4.9) to multiple locations in sequence.

1.1.1 Place both pages of the completed Report (Enclosure 4.9) face down into the fax machine.

1.1.2 Press the pre-programmed one-touch speed dial pushbutton for each of the of the following agencies:

- ☐ York Co WP/EOC
- ☐ Gaston Co. WP/EOC
- ☐ Meck Co. WP
- ☐ NC WP/EOC
- ☐ SC WP/EOC
- ☐ EnergyQuest

1.1.3 Press START

1.2 Verify by one of the following means that the Report (Enclosure 4.9) was received by each of the agencies:

- ☐ Selective Signal (Enclosure 1.5, Emergency Response Telephone Directory)
- ☐ Duke or Commercial Telephone (Enclosures 1.12 – 1.16, Emergency Response Telephone Directory)

1.3 Notify EnergyQuest duty person of courtesy notification fax transmittal (Enclosure 1.20, Emergency Response Telephone Directory).

1.4 **IF** any agency did not receive the group fax, then make the courtesy notification to the agency(s) by performing step 2.

1.5 Fax a copy of Enclosure 4.9 to Emergency Planning at 831-3151.

1.6 Report any communications equipment failures to the duty Emergency Planner.

2. Notification by Individual Fax

2.1 Notify the states and county agencies (primary WP/EOCs) of a **non-emergency** plant event(s) with the completed Event Notification Report (Encl 4.9) used to notify the NRC, as follows:

NOTE:	Performing steps 2.1.1 through 2.1.3 sends the Event Notification Report (Enclosure 4.9) to individual agencies one at a time.

2.1.1 Place both pages of the completed Report (Enclosure 4.9) face down into the fax machine.

NOTE:	SC WP/EOC and EnergyQuest list two fax numbers. Use the fax number for sending Emergency Notifications.

2.1.2 Enter the individual fax phone number (Enclosures 1.12 through 1.16 in the Emergency Response Phone Book) for the desired individual agency (WP/EOC). EnergyQuest fax number is listed in Enclosure 1.19, Emergency Response Telephone Directory.

2.1.3 Press START.

2.1.4 Repeat steps 2.1.1 through 2.1.3 until all of the desired agencies have been faxed the Report (Enclosure 4.9).

2.2 Verify by one of the following means that the faxed Report (Enclosure 4.9) was received by the agency(s):

- ☐ Selective Signal (Encl 1.5, Emergency Response Telephone Directory)
- ☐ Duke or Commercial Telephone (Enclosures 1.12 – 1.16, Emergency Response Telephone Directory)

2.3 Notify EnergyQuest/On-site Public Affairs duty person of courtesy notification fax transmittal (Enclosure 1.20, Emergency Response Telephone Directory).

2.4 Fax a copy of Enclosure 4.9 to Emergency Planning at 831-3151.

2.5 Report any communications equipment failures to the duty Emergency Planner.

Enclosure 4.8

Safeguards ENS Event Report

Date/Time of Notification _____

NRC Person Notified _____

State the following to the NRC Operations Center:

"This notification is made in accordance with 10CFR73.71. This is Duke Power Company's Catawba Nuclear Station in NRC Region II making the notification. "

My Name is: _____ My title is: _____

I can be reached at _____

"Your Name Please" _____

1. *Date of occurrence: _____

2. *Time of occurrence: _____

3. *Power level of units:

   Unit 1 _____ Unit 2 _____

*If date and time of occurrence are not known, indicate the date and time of discovery.

4. Description of event: _____

   _____

   _____

   _____

   _____

   _____

5. Security response/compensatory measures established:

   _____

   _____

   _____

6. LLEA (Local Law Enforcement Agency) Notified? YES ____ NO ____

   (If yes, name of organization and telephone number) _____

   _____

7. NRC Region II notified? YES ____ NO ____

   (If yes, name of person notified) _____

8. Who to contact for more information:

   _____

9. Consequences at plant:

   Description of Equipment Systems Affected _____

   _____

   _____

   _____

   _____

   _____

   _____

NOTE:	After verbal transmission of this Enclosure, a copy should be sent by FAX to: NRC Operations Center - 1-301-816-5151

APPROVED BY: _____ **TIME/DATE:** _____

OPERATIONS SHIFT MANAGER OR EMERGENCY COORDINATOR

Enclosure 4.9

Event Notification Report

USE: "THIS IS THE CATAWBA NUCLEAR SITE IN NRC REGION 2 MAKING AN EVENT NOTIFICATION REPORT"

NOTIFICATION TIME/DATE	UNIT	CALLER'S NAME	CALLBACK TELEPHONE #: ENS 700-256-9914 or 803-831-2674	NRC OPERATIONS OFFICER CONTACTED / NRC Report Number:

EVENT TIME &ZONE	EVENT DATE	POWER/MODE BEFORE	POWER/MODE AFTER
_____ Region II (time) (zone)			

EVENT CLASSIFICATIONS	1-HR NON-EMERGENCY 10CFR5072(b)(1)	4-HR NON-EMERGENCY 10CFR50.72(b)(2)
☐ GENERAL EMERGENCY	☐ (i)(A) TS Required S/D	☐ (i) Degrade While S/D
☐ SITE AREA EMERGENCY	☐ (i)(B) TS Deviation	☐ (ii) RPS Actuation (scram)
☐ ALERT	☐ (ii) Degraded Condition	☐ (ii) ESF Actuation
☐ UNUSUAL EVENT	☐ (ii)(A) Unanalyzed Condition	☐ (iii)(A) Safe S/D Capability
☐ 50.72 NON-EMERGENCY (see next columns)	☐ (ii)(B) Outside Design Basis	☐ (iii)(B) RHR Capability
☐ PHYSICAL SECURITY (73.71)	☐ (ii)(C) Not Covered by OPs/EPs	☐ (iii)(C) Control of Rad Release
☐ TRANSPORTATION (10 CFR 20)	☐ (iii) Earthquake	☐ (iii)(D) Accident Mitigation
☐ MATERIAL/EXPOSURE (10 CFR 20)	☐ (iii) Flood	☐ (iv)(A) Air Release > 20X App B
☐ OTHER	☐ (iii) Hurricane	☐ (iv)(B) Liq Release > 20X App B
	☐ (iii) Ice/Hail	☐ (v) Offsite Medical
	☐ (iii) Lightning	☐ (vi) Offsite Notification
	☐ (iii) Tornado	
	☐ (iii) Other Natural Phenomenon	**24 HOUR NON EMERGENCY**
	☐ (iv) ECCS Discharge to RCS	☐ Radiological Exposure 10CFR20.2202
	☐ (v) Lost ENS	☐ Fitness For Duty 10CFR26.73
	☐ (v) Lost Emergency Assessment	☐ Operating License Deviation
	☐ (v) Lost Offsite Comms.	
	☐ (v) Emergency Siren Inoperable	
	☐ (vi) Fire	
	☐ (vi) Toxic Gas	
	☐ (vi) Rad Releases	
	☐ (vi) Other Hampering Safe Operation	

EVENT DESCRIPTION (Include: Systems affected, actuations & their initiating signals, causes, effect of event on plant, actions taken or planned, PARs etc.)

CATEGORY **INITIATION SIGNAL**

_____ REACTOR TRIP _____

_____ ESF ACTUATION _____

_____ ECCS ACTUATION _____

_____ SI FLOW _____

_____ LCO _____

SYSTEM _____

COMPONENT _____

CAUSE: ___ MECHANICAL ____ ELECTRICAL

___ PERSONNEL ERROR ____ OTHER

Continue on Enclosure 4.9 page 2 of 2 if necessary.

NOTIFICATIONS	YES	NO	WILL BE
NRC RESIDENT			
STATE(s) NC / SC			
AL York County / Gaston County / Mecklenburg County			
OTHER GOV AGENCIES			
MEDIA/PRESS RELEASE			

ANYTHING UNUSUAL OR NOT UNDERSTOOD? ☐ YES ☐ NO (Explain above)

DID ALL SYSTEMS FUNCTION AS REQUIRED? ☐ YES ☐ NO (Explain above)

MODE OF OPERATION UNTIL CORRECTED:

ESTIMATED RESTART DATE :

Enclosure 4.9

Event Notification Report

DIOLOGICAL RELEASES: CHECK OR FILL IN APPLICABLE ITEMS (specific details/explanations should be covered in event description)

LIQUID RELEASE		GASEOUS RELEASE		UNPLANNED RELEASE	PLANNED RELEASE	ONGOING	TERMINATED
MONITORED		UNMONITORED		OFFSITE RELEASE	T.S. EXCEEDED	RM ALARMS	AREAS EVACUATED
PERSONNEL EXPOSED OR CONTAMINATED				OFFSITE PROTECTIVE ACTIONS RECOMMENDED		State release path in description	

NOTE: Contact Radiation Protection Shift to obtain the following release information.
IF the notification is due and the information is not available, mark "Not Available" and complete the notification.

	Releases Rate (Ci/sec)	% T.S. LIMIT	HOO GUIDE	Total Activity (Ci)	% T.S. LIMIT	HOO GUIDE
Noble Gas			0.1 Ci/sec			1000 Ci
Iodine			10 uCi/sec			0.01 Ci
Particulate			1 uCi/sec			1 mCi
Liquid (excluding tritium & dissolved noble gases)			10 uCi/min			0.1 Ci
Liquid (tritium)			0.2 Ci/min			5 Ci
Total Activity						

CIRCLE RAD MONITORS IN ALARM	PLANT STACK (EMF 35, 36, 37)	CONDENSER/ AIR EJECTOR (EMF 33)	MAIN STEAM LINE (UNIT 1-EMF 26,27,28,29 UNIT 2-EMF 10, 11, 12,13)	SG BLOWDOWN (EMF 34)	OTHER
RAD MONITOR READINGS					
ALARM SETPOINTS: TRIP II					
% T.S. LIMIT (If applicable)		NOT APPLICABLE		NOT APPLICABLE	

RCS OR SG TUBE LEAKS: CHECK OR FILL IN APPLICABLE ITEMS (specific details/explanations should be covered in event description)

LOCATION OF THE LEAK (e.g. SG#, valve, pipe, etc.):

LEAK RATE: gpm/gpd | T.S. LIMITS EXCEEDED: | SUDDEN OR LONG TERM DEVELOPMENT:

LEAK START DATE: TIME

COOLANT ACTIVITY(Last Sample): PRIMARY SECONDARY

Xe eq_____mci/mi Xe eq_____mci/mi

I eq. _____mci/mi I eq. _____mci/mi

LIST OF SAFETY RELATED EQUIPMENT NOT OPERATIONAL:

EVENT DESCRIPTION (Continued from Enclosure 4.9 Page 1 of 2)

ADDITIONAL INFORMATION MAY BE ATTACHED.

APPROVED BY: _____ **TIME/DATE:** _____ ____/____/____

Operations Shift Manager/Emergency Coordinator (eastern) **mm dd yy**

(R08-97)

Duke Power Company
PROCEDURE PROCESS RECORD

(1)ID No. RP/0/A/5000/020
Revision No. 013

PREPARATION

(2) Station Catawba Nuclear Station

(3) Procedure Title Technical Support Center (TSC) Activation Procedure

(4) Prepared By Gary L Mitchell Date 7/19/00

(5) Requires 10CFR50.59 evaluation?
- [X] Yes (New procedure or reissue with major changes)
- [ ] No (Revision with minor changes)
- [ ] No (To incorporate previously approved changes)

(6) Reviewed By B. R. (QR) Date 7/20/00

Cross-Disciplinary Review By _____ (QR) NA BRS Date 7/20/00

Reactivity Mgmt. Review By _____ (QR) NA BRS Date 7/20/00

(7) Additional Reviews

Reviewed By _____ Date _____

Reviewed By _____ Date _____

(8) Temporary Approval *(if necessary)*

By _____ (SRO/QR) Date _____

By _____ (QR) Date _____

(9) APPROVED BY Richard L Swingart Date 7/20/00

PERFORMANCE (Compare with control copy at least once every 14 calendar days while work is being performed)

(10) Compared with Control Copy _____ Date _____

Compared with Control Copy _____ Date _____

Compared with Control Copy _____ Date _____

(11) Dates(s) Performed _____

Work Order Number (W/O #) _____

COMPLETION

(12) Procedure Completion Verification

- [ ] Yes [ ] N/A Check lists and/or blanks properly initialed, signed, dated, or filled in NA, as appropriate?
- [ ] Yes [ ] N/A Listed enclosures attached?
- [ ] Yes [ ] N/A Data sheets attached, completed, dated and signed?
- [ ] Yes [ ] N/A Charts, graphs, etc. attached and properly dated, identified and marked?
- [ ] Yes [ ] N/A Procedure requirements met?

Verified By _____ Date _____

(13) Procedure Completion Approved _____ Date _____

(14) Remarks *(attach additional pages, if necessary)*

Duke Power Company Catawba Nuclear Station	Procedure No. RP/**0**/A/5000/020
Technical Support Center (TSC) Activation Procedure	Revision No. 013
Reference Use	Electronic Reference No. CN005GNZ

1. Symptoms

Conditions exist where events are in progress or have occurred which indicate a potential degradation of the level of safety of the plant and activation of the Emergency Response Organization (ERO) has been initiated.

2. Immediate Actions

NOTE:
1. The TSC must be "ACTIVATED" within 75 minutes of the emergency classification time.
2. This procedure is not required to be followed in step-by-step sequence. Sections of the procedure are to be implemented as the applicable action becomes necessary.
3. Specific telephone numbers are not provided in this procedure. Telephone numbers are located in the Emergency Response Telephone Directory. A hard copy of the Emergency Response Telephone Directory is located in the TSC. An electronic version of the Emergency Response Telephone Directory is available on the Catawba Nuclear Site Emergency Planning Web Page.

2.1 Upon notification to activate the TSC, Emergency Response Organization (ERO) personnel assigned to the TSC shall report to the TSC.

2.2 The Emergency Coordinator may initially report to the Control Room to discuss plant status with the Operations Shift Manager.

3. Subsequent Actions

3.1 Each represented group is responsible for ensuring their appropriate Checklist is completed (Enclosures 4.1 through 4.16) and for reviewing their Responsibilities.

3.2 The following definitions are applicable to the Emergency Notification Form:

3.2.1 IMPROVING - Emergency conditions are improving in the direction of a lower classification or termination of the event.

3.2.2 STABLE - The emergency situation is under control. Emergency core cooling systems, equipment, plant, etc. are operating as designed.

3.2.3 DEGRADING - Given current and projected plant conditions/equipment status, recovery efforts are not expected to prevent entry into a higher emergency classification or the need to upgrade off-site protective action recommendations.

3.2.4 CRITICAL TASK – A task that must be completed as soon as possible and normally becomes the number one priority task. The Assessment and repair Team is dispatched immediately from the OSC. Examples include: SSF Startup, Fire Response, MERT or any task vital to protection of the reactor core.

3.2.5 ESSENTIAL PERSONNEL - Any personnel required to assist in the performance of assigned emergency response tasks. These personnel would not evacuate in the event of Site Evacuation

3.2.6 RELEASE - Any unplanned and quantifiable discharge to the environment of radioactive effluent attributable to a declared emergency event. Base determinations on information such as EMF readings, containment pressure and other instrument indications, field monitoring results, and knowledge of the event and its impact on system operation and resultant release pathways. A release is considered to be in progress if the following occurs:

A. Reactor Building EMF monitors (38, 39 or 40) reading indicates an increase in activity

OR

EMF monitors 53A or 53B read greater than 1.5 R/hr

AND

Pressure inside the containment building is greater than Tech. Specs.

OR

An actual containment breach is determined.

B. Increase in activity monitored by unit vent EMF monitors 35, 36, or 37

C. Steam generator tube leak monitored by EMF 33.

3.3 The following SDS Group Displays have been established for emergency response use. To access these group displays type, GD (space) Group Display Name, in the white box at the upper right portion of the screen.

	Group Display Name	Group Display Description
3.3.1	EROCONT	Selected values associated with Containment
3.3.2	EROCORE1	Incore temperature values
3.3.3	EROCORE2	Additional Incore temperature values
3.3.4	EROCORE3	Additional Incore temperature values
3.3.5	EROEMF	Selected EMF instantaneous values
3.3.6	EROEMF15	Selected EMF 15 minute average values
3.3.7	EROENV	Selected Meteorological values
3.3.8	EROINJCT	Selected Letdown/Charging values
3.3.9	EROPLEAK	Selected Primary to Containment Leakage Values
3.3.10	EROPRIM	Selected Primary system values
3.3.11	ERORD5	Selected Raddose V Dose Assessment Points
3.3.12	EROSAMG	Selected SAMG values
3.3.13	EROSECND	Selected Secondary system values
3.3.14	EROSLEAK	Selected Primary to Secondary Leakage Values
3.3.15	ERORXG	Selected values for the Reactor Engineer

3.3.16	ERDS1	ERDS Group 1
3.3.17	ERDS2	ERDS Group 2

3.4 Personnel with training deficiencies must be approved by the Emergency Coordinator prior to participating as an ERO member. This approval shall be documented in the TSC Log.

3.5 RP/0/B/5000/022, "Evacuation Coordinator Procedure," shall be used as the controlling procedure for the Evacuation Coordinator position.

3.6 Contact the TSC Data Coordinator for resolution of any computer hardware/software problems, or the OSC Commodities and Facilities Manager for resolution of other equipment problems.

4. Enclosures

4.1 Emergency Coordinator

4.2 TSC Dose Assessor

4.3 TSC Off-Site Agency Communicator

4.4 NRC Communicator

4.5 Operations Superintendent

4.6 Operations Engineer

4.7 Assistant Operations Engineer

4.8 Engineering Manager

4.9 Reactor Engineer

4.10 System Support Engineer

4.11 TSC Emergency Planner

4.12 TSC Logkeeper

4.13 Regulatory Compliance

4.14 TSC Data Coordinator

4.15 RP Support

4.16 Security Manager

4.17 TSC Operational Checklist

4.18 Assistant Emergency Coordinator

4.19 Commitments for RP/0/A/5000/020

Initial

_____ Establish the TSC/OSC as Operational (minimally staffed and functional) by completing the following steps.

A. Print name and time arrived on TSC sign-in board.

B. Sign TSC Roster located in the TSC sign-in board area.

C. Obtain self-reading dosimeter from the TSC sign-in board area and complete applicable portion of a dose card using SRWP #33.

D. Verify that Enclosure 4.17, "TSC Operational Checklist", has been completed. The TSC Emergency Planner is normally assigned the responsibility for completing Enclosure 4.17. **IF** the TSC Emergency Planner is not present in the TSC, assign the completion of Enclosure 4.17 to a TSC Off-Site Agency Communicator.

E. TSC Operational as of _____ hours.

_____ Establish the TSC/OSC as Activated (Emergency Coordinator responsibilities have been assumed from the OSM) by completing the following steps.

A. Receive turnover from Operations Shift Manager using the "Emergency Coordinator Turnover Form."

B. Verify with OSC Coordinator that OSC is staffed and operational.

OSC Coordinator: _____

C. Conduct pre-activation conference with designated TSC personnel, OSC Coordinator (via video conference) and Operations Shift Manager (via phone) to confirm readiness for transfer of Emergency Coordinator responsibilities from Control Room to TSC.

D. Read the definitions for the following terms contained in Step 3.2 in the body of this procedure:

- Improving
- Degrading
- Stable
- Release

NOTE: The TSC Emergency Coordinator is responsible for tracking Emergency Classifications and approving Off-Site Agency Emergency Notification Forms after the TSC and OSC are activated. This responsibility remains with the TSC Emergency Coordinator and shall not be delegated until the EOF is activated.

E. TSC and OSC Activated as of _____ hours.

Initial

_____ Announce the following information using the Plant Public Address System.

Emergency (Drill) Message :

"Attention all station personnel. This is a(n) emergency (drill) message. This is a(n) emergency (drill) message.

This is __(Name of EC)___ and as of _____ hours the TSC has been activated and I have assumed Emergency Coordinator responsibilities from the Operations Shift Manager.

A(n) (Emergency Classification) has been declared. The following is a summary of plant status...

Please remain at your site assembly location until you receive further instructions. Information will be provided to you as conditions change."

Drill Message for Standing Down from Site Assembly:

"Attention all station personnel. This is the Emergency Coordinator. This is a drill. This is a drill.

You have been assembled as part of an emergency exercise. If this was a real emergency, you would be asked to remain assembled waiting on further information, or given instructions to leave the site in accordance with our site evacuation plan. You may now return to your normal work assignments. I repeat you may now return to your normal work assignments.

Thank you for your participation."

_____ Immediately inform the OSC Coordinator anytime a Critical Task (as defined in Step 3.2) is identified.

_____ Discuss with the TSC Dose Assessor any radiological release or off-site radiological concerns.

NOTE: 1. Site Evacuation is required at General Emergency.

2. Site Evacuation decisions are based on plant conditions at alert and Site Area Emergency.

_____ Evaluate with Radiation Protection Manager and appropriate TSC personnel the need to relocate personnel on-site due to radiological hazards or conduct site evacuation of non-essential personnel.

_____ Inform the EOF Director anytime personnel are relocated due to radiological hazards or site evacuation is initiated.

Initial

_____ **IF** a Site Evacuation is conducted, inform the EOF Director of the approximate number of personnel that will be evacuated

_____ **IF** RP determines that eating and drinking can be allowed in the TSC and OSC, make the following announcement using the TSC/OSC Public Address system:

"This is the Emergency Coordinator. Eating and drinking are now allowed in the TSC and OSC."

_____ **IF** the RP Manager issues a Blanket Dose Extension for the event, make the following announcement using the TSC/OSC Public Address System:

"Attention in the TSC and OSC. This is a(n) emergency (drill) message. This is a(n) emergency (drill) message. The RP Manager has approved a Blanket Dose Extension for this event. If you have any questions concerning your dose limit, please contact RP in the OSC."

_____ **IF** at any time there is a complete loss of RN, work with Operations to ensure off-site power is protected.

_____ Ensure that 10CFR50.54(x) actions are approved prior to performing the action. Reasonable actions that depart from a license condition or technical specification may be performed in an emergency, per 10CFR50.54(x), when this action is immediately needed to protect the health and safety of the public and no action consistent with the license condition or technical specification that can provide adequate or equivalent protection is immediately apparent. Deviation from the intent of an Emergency Procedure constitutes a 10CFR50.54(x) action. Actions taken per 10CFR50.54(x) shall be:

A. Approved, as a minimum, by a Licensed Senior Reactor Operator prior to taking such action
B. Documented in the Reactor Operators Logbook
C. Documented in the TSC Logbook
D. Reported to the NRC within one hour using RP/0/B/5000/013, "NRC Notification Requirements" {1}

Initial

_____ Perform the following as necessary throughout the event:

A. Assess plant conditions
B. Establish priorities
C. Make decisions concerning:
   - Alternate strategies (outside of procedures) as plant conditions change
   - Emergency classifications
   - Mitigation strategies
   - Contingency plans
   - Protective actions for plant personnel and the general public
   - Staffing of the TSC/OSC to ensure that the personnel necessary to effectively assess and mitigate the emergency condition are available
D. Establish and maintain communications with Federal, State and Local authorities at county warning points or Emergency Operations Centers until the EOF is activated. Immediately notify these off-site agencies of any protective actions recommended by the TSC
E. Provide periodic updates to the EOF Director concerning plant status
F. Review and approve any NRC notifications required by RP/0/B/5000/013, "NRC Notification Requirements."
G. Conduct Update Conferences with the TSC staff approximately every thirty (30) minutes to obtain current plant status. Ensure the OSC Coordinator and EOF Director are aware of when Update Conferences will take place.
H. Announce the emergency classification, plant status, and priorities via the Public Address System following TSC staff Update Conferences. Information for the Public Address System announcements will be prepared by the Assistant Emergency Coordinator representative or designee.
I. Approve Emergency Notification Forms as required.
J. Announce Fitness For Duty expectations to the TSC and OSC after each shift turnover. The fitness for duty announcement is located in Enclosure 4.17.
K. Authorize emergency worker doses that are expected to exceed the blanket dose extension limits using RP/0/A/5000/018, "Emergency Worker Dose Extension."
L. Serve as Lead Decision-maker upon entry into Severe Accident Management Guidelines

NOTE:
1. After the EOF is activated, the Emergency Coordinator is not authorized to approve Off-Site Agency Emergency Notification Forms.
2. After the EOF is activated, the EOF Director is responsible for tracking Emergency Classifications.

_____ Complete or delegate the completion of the "EOF Director Turnover Form."

_____ Fax a copy of the completed "EOF Director Turnover Form" to the EOF Director.

Initial

_____ Conduct turnover to EOF Director using the "EOF Director Turnover Form".

EOF Director: _____

EOF Activation Time: _____

_____ Announce the following using the TSC/OSC Public Address System:

"Attention in the TSC and OSC. This is a(n) emergency (drill) message. This is a(n) emergency (drill) message. This is the Emergency Coordinator and as of _____ hours the EOF has been activated."

_____ Request TSC NRC Communicator to notify the NRC over ENS that the EOF is activated.

_____ Print the name of 24 Hour Staffing relief for your position on the TSC sign-in board.

_____ Provide the TSC Emergency Planner with a listing of essential personnel associated with your position that would not leave the site should a site evacuation be necessary.

_____ **IF** the Control Room enters SACRG–1 **OR** SACRG-2 make the following announcement:

"Attention in the TSC and OSC. This is a(n) emergency (drill) message. This is a(n) emergency (drill) message. This is the Emergency Coordinator and as of _____ hours the Control Room has entered SCRG-1(2). I will be the Lead Decisionmaker. Begin evaluating plant conditions using the SAMG Diagnostic Flow Chart and the Severe Challenge Status Tree."

_____ Verify that the TSC Emergency Planner has completed the 24 Hour Staffing/Essential Personnel Logs. **IF** the TSC Emergency Planner is not present in the TSC, assign this function to the TSC Off-Site Agency Communicator. The logs are located in Enclosure 4.11, "TSC Emergency Planner."

_____ **IF** video communications with the OSC become inoperable, delegate someone to fill the role of TSC/OSC Communicator.

_____ **IF** video communications with the EOF become inoperable, establish communications using telephones.

_____ **IF** the TSC is not habitable or becomes not habitable, relocate to the Control Room or other location appropriate for plant and radiological conditions. The Emergency Coordinator will decide which TSC staff personnel are relocated to the alternate TSC.

_____ **IF** any of the following has occurred **OR** is occurring, contact Environmental Management:

A. Diesel Generator has run or is running in a malfunctioning mode for more than one hour.
B. Steam release to the environment.
C. Anytime Environmental Management resources are needed.

Initial

_____ Refer to the "Emergency Classification Downgrade/Termination Criteria," contained in this enclosure, to determine if termination or downgrade of the event is appropriate and if Recovery Operations are required to be established. **IF** Recovery Operations are required, establish a Recovery Organization using RP/0/B/5000/025, "Recovery and Reentry Procedure."

_____ Announce over the TSC/OSC PA System that all completed procedures and copies of logs are to be provided to Emergency Planning upon deactivation of the TSC/OSC.

Emergency Coordinator Turnover Form

1. Plant Status:

   Unit 1: _____

   _____

   Unit 2: _____

   _____

2. Emergency Classification: _____

   Time Declared: _____

3. Off-Site Agency Notifications Turnover to TSC Complete? _____(Y/N)
4. Time Next Notification Due: _____
5. Significant Events:

   _____ Radioactive Release
   Y/N

   _____ Injured Personnel
   Y/N

   _____ Other (Specify __)
   Y/N

6. Protective Actions in Progress:

   _____ Site Assembly (Time Initiated _____)
   Y/N

   _____ Off-Site Protective Actions Recommended
   Y/N (List)_____

   _____ Other (Specify __)
   Y/N

7. Response Procedure In Progress: _____

   RP _____ RP _____ RP _____

8. Actions in Progress:

   _____

   _____

   _____

EOF Director Turnover Form

PLANT CONDITIONS

Time _____ Date _____ Plant and Unit Affected _____

Status of Unaffected Unit _____

Reactor Power Level (or operating mode of shutdown): Unit 1: _____ Unit 2: _____

Emergency Classification: _____

List the problems ongoing at this time: _____

_____

_____

Availability of off-site and on-site power supplies (including diesels): YES/NO

D/G A _____ SATA _____ BUSS Line A _____

D/G B _____ SATB _____ BUSS Line B _____

RADIOLOGICAL STATUS

On-site and off-site radiological status is as follows: (i.e., release in progress? Any other radiological hazards?)

_____

_____

_____

Site Assembly conducted: Yes _____ No _____

Site Evacuation: Yes _____ No _____ Time of Evacuation _____

Evacuation Location:

Number field monitoring teams assembled _____

Number field monitoring teams deployed _____

Protective Action Recommendations provided to states/counties:

- Evacuate _____
- Shelter _____

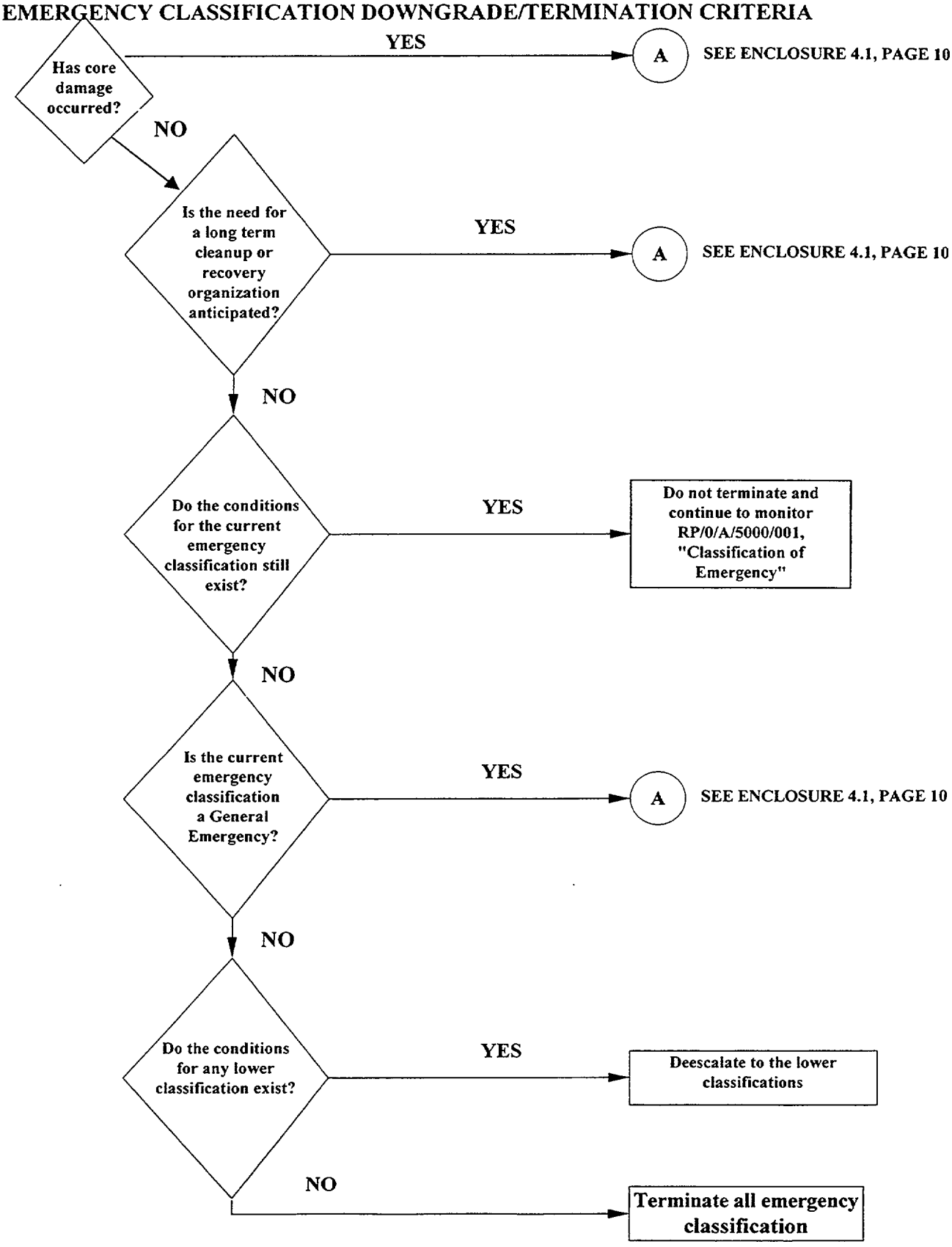
OFFSITE COMMUNICATIONS

Off-Site Communicators' next Emergency Notification Form Due: _____
(Time)

EOF communications checks completed to off-site agencies and ready for turnover (Yes/No)

EOF Activation Time/Date: _____/_____

EMERGENCY CLASSIFICATION DOWNGRADE/TERMINATION CRITERIA



EMERGENCY CLASSIFICATION DOWNGRADE/TERMINATION CRITERIA

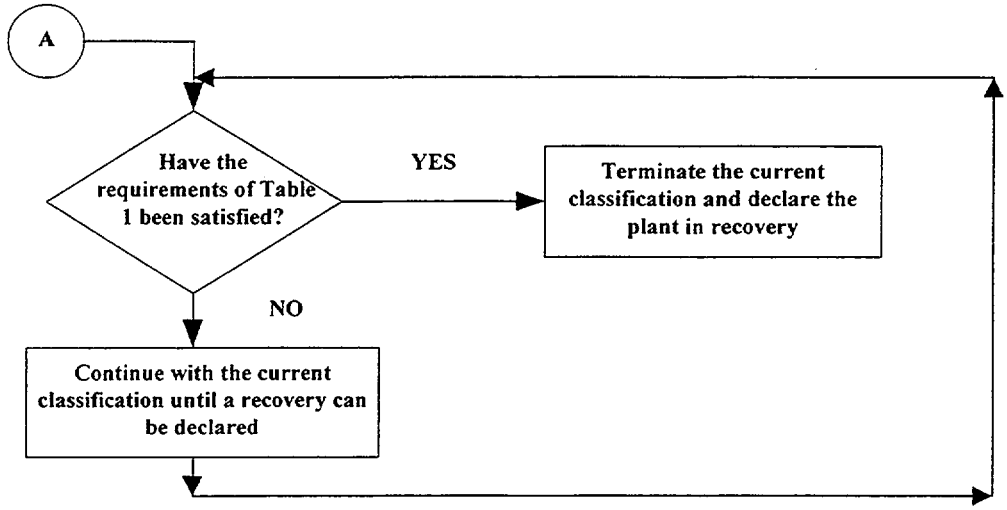


TABLE 1

Recovery Conditions

_____ No new evacuation or sheltering protective actions are anticipated.

_____ Containment pressure is less than design pressure

_____ Decay heat rejection to the ultimate heat sink has been establish and either :

Injection and heat removal have redundancy available (2 trains of injection/DHR or a train of DHR and S/G cooling),

OR

No additional fission product release or fission product barrier challenges would be expected for at least 2 hours following interruption of injection.

_____ The risks from recriticality are acceptably low

_____ Radiation Protection is monitoring access to radiologically hazardous areas

_____ Off-site conditions do not limit plant access

_____ The Public Information Coordinator, NRC officials, and State representatives have been consulted to determine the effects of termination on their activities.

_____ The recovery organization is ready to assume control of recovery operations:

- Catawba - RP/0/B/5000/025
- McGuire - RP/0/A/5700/024

Initial

NOTE:
1. You are only required to complete Enclosure 4.21, Fitness for Duty Questionnaire, when reporting to the facility outside of your normal work hours.
2. Off-site Agency Communicators will be contacting Dose Assessment to provide information for the Electronic Emergency Notification Form.
3. Procedure steps may be completed out of sequence at the discretion of the person performing this enclosure.

☐ Upon arrival in the TSC, perform the following:

- Sign in on the TSC Roster
- Obtain self-reading dosimeter and dose card (SRWP #33)
- Sign in on staffing board
- Obtain and put on position badge

☐ Establish a TSC Dose Assessor position log of activities (e.g., evolutions impacting this position, decisions made by this position, communications to/from other groups).

☐ Perform the following to start the TSC air monitoring:

EMF 55A	EMF55B
☐ A. IF ON, press STOP button.	☐ A. IF ON, press STOP button.
☐ B. Acknowledge any alarms by pressing the ACKNOWLEDGE button.	☐ B. Acknowledge any alarms by pressing the ACKNOWLEDGE button.
☐ C. Wait 30 seconds before proceeding to start monitors.	☐ C. Wait 30 seconds before proceeding to start monitors.
☐ D. Start monitor by pressing start.	☐ D. Start monitor by pressing start.
☐ E. Acknowledge any alarms.	☐ E. Acknowledge any alarms.
☐ F. Wait 30 seconds.	☐ F. Wait 30 seconds.
☐ G IF the alarm or monitor fails to start, repeat steps A thru F.	☐ G. IF the alarm or monitor fails to start, repeat steps A thru F.
☐ H. IF the EMF monitor fails to operate properly, request that TSC RP support initiate manual air sampling of the TSC.	☐ H. IF the EMF monitor fails to operate properly, request that TSC RP support initiate manual air sampling of the TSC.
☐ I. IF necessary, initiate a work request for inspection/repair of EMF monitor.	☐ I. IF necessary, initiate a work request for inspection/repair of EMF monitor.

☐ Evaluate any protective actions that have been recommended.

☐ Power up both the Dose Assessment and Electronic Notification Form computers and LOGON to the Network per the following:

User Name: **CNSEP2**
Password: **CNSEP2**
Domain: **POWER**

☐ Initiate the following emergency response procedures, as necessary:

- SH/0/B/2005/001, "Emergency Response Offsite Dose Projections"
- HP/0/B/1009/014, "Radiation Protection Actions Following an Uncontrolled Release of Liquid Radioactive Material"
- HP/0/B/1009/006, "Alternative Method for Determining Dose Rate within the Reactor Building"

☐ Prepare to complete the Dose Assessment portion of the Electronic Notification Form by obtaining a copy of the TS Dose Assessors Electronic Notification Form Instructions located in the TSC Dose Assessors Notebook.

☐ Ensure the NRC Health Physics Network (HPN) is activated.

NOTE: 1. EMF isolation or loss of sample flow can indicate invalid EMF readings.

2. Be aware of the effects of loss of power on critical EMFs.

☐ Calculate off-site dose projections approximately every fifteen minutes or at frequency intervals appropriate to plant conditions.

☐ **IF** necessary, contact OSC RP Supervisor to request radiation surveys inside the Protected Area fence.

☐ Establish communications with EOF Dose Assessment Team via the Dose Assessment bridge line

☐ Perform the following as needed: **(Refer to the CNS Bridge Lines and Wireless Phones instructions located in the TSC Dose Assessor Notebook.)**

- Provide computer off-site dose projection results
- Coordinate turnover to the EOF
- Provide support to the EOF team after EOF activation as needed.
- Be prepared to resume dose assessment activities if EOF functions are transferred back to the TSC.

☐ Provide the following staffing information to the Emergency Planner when requested:

- Provide 24-Hour Staffing relief for your position
- Provide a listing of essential personnel for your position that should not leave the site during a site evacuation.

☐ Consider the following items that may be applicable in order to provide the latest status to the Emergency Coordinator staff and ERO during TSC Update Conferences:

- Any potential release or release in progress (especially at the site boundary).
- Specific areas where off-site dose rates increasing
- Meteorological Data (wind speed and wind direction, measured Δ temperature, stability class, and precipitation)
- Dose projections based on changes in meteorological status
- Dose projections at site boundary
- Off-site dose projections that may be above or below normal operating limits
- Any release in progress, including dose rates
- Field Team Status/Data
- Analyzed source term
- Source Term Mitigation Strategies
- Special evaluation for off-site dose consequences in such cases as a containment loss of integrity or steam generator tube rupture
- Projected or changing plant conditions
- Increase or decrease of release path EMF readings
- Significant changes in radiological conditions
- On-site radiological concerns
- Radiological EAL criteria per RP/0/A/5000/001

NOTE:
1. Radiological dose projection information is not required for Emergency Notification Forms that are sent as initial notification of an emergency classification or initial notification of a change to the emergency classification.
2. Off-site dose assessment results, including projections, are to immediately follow the initial notifications.
3. The primary method of providing dose information to the Off-site Agency Communicators is via the Electronic Notification Form program, however, situations may dictate the use of the hard copy Emergency Notification Forms.

☐ Provide Off-site Agency Communicators with dose assessment information and other pertinent radiological information as requested utilizing the Electronic Notification Form program.

☐ Recommend off-site and on-site protective actions to the Emergency Coordinator (until TSC/EOF dose assessor turnover occurs and the EOF is activated).

☐ Perform the following to stop the TSC air monitoring upon securing from TSC activation:

EMF 55A	EMF55B
☐ A. **IF** ON, press **STOP** button.	☐ A. **IF** ON, press **STOP** button.
☐ B. Acknowledge any alarms by pressing the **ACKNOWLEDGE** button.	☐ B. Acknowledge any alarms by pressing the **ACKNOWLEDGE** button.
☐ C. Verify monitors are **OFF** by confirming the **ON** light goes out and that the acknowledge and alarm lights are **ON.**	☐ C. Verify monitors are **OFF** by confirming the **ON** light goes out and that the acknowledge and alarm lights are **ON.**
☐ D. Repeat steps A, B and C as necessary.	☐ D. Repeat steps A, B and C as necessary.
☐ E. **IF** necessary, initiate a work request for inspection/repair of EMF monitor.	☐ E. **IF** necessary, initiate a work request for inspection/repair of EMF monitor.

☐ Restore dose assessor work area and all equipment to a ready state condition after a drill or event is terminated.

☐ Provide all completed paperwork to Emergency Planning upon deactivation of the TSC.

Initial

_____ Print name and time arrived on TSC sign-in board.

_____ Sign TSC Roster located at the TSC sign-in board.

_____ Obtain self reading dosimeter from the TSC sign-in board area and complete applicable portion of a dose card using SRWP #33.

_____ Establish a TSC Off-Site Agency Communicator position log that captures as a minimum:

A. Evolutions impacting this position
B. Decisions made by this position
C. Communication to/from other work groups

_____ Obtain a copy of RP/O/A/5000/006B, "Notifications to the State and Counties from the Technical Support Center."

_____ Execute RP/O/A/5000/006B, "Notifications to the State and Counties from the Technical Support Center."

_____ Verify all TSC clocks are synchronized with the Control Room satellite clock.

_____ Ensure off-site agency communicators in the EOF are aware of information effecting off-site agencies even after turnover has occurred (e.g., fire in the motor control center has been put out).

_____ Print the name of 24 Hour Staffing relief for your position on the TSC sign-in board.

_____ Provide the TSC Emergency Planner with a listing of essential personnel associated with your position that would not leave the site should a site evacuation be necessary.

_____ Provide all completed paperwork to Emergency Planning upon deactivation of the TSC.

NOTE: The NRC Communicator position is initially filled by shift personnel in the Control Room. This position transfers to the TSC upon TSC activation.

Initial

_____ Print name and time arrived on TSC sign-in board.

_____ Sign TSC Roster located at the TSC sign-in board.

_____ Obtain self-reading dosimeter from the TSC sign-in board area and complete applicable portion of a dose card using SRWP #33.

_____ Establish an NRC Communicator position log that captures as a minimum:

A. Evolutions impacting this position
B. Decisions made by this position
C. Communication to/from other work groups

NOTE: RP/0/B/5000/013, "NRC Notification Requirements," provides primary and alternate phone numbers for the NRC Operations Center.

_____ Establish continuous communications with the NRC Operations Center upon request by the NRC.

_____ Perform the following activities as necessary throughput the event:

A. Inform the NRC of TSC/EOF activation/deactivation.
B. Inform the NRC of plant conditions at all times.
C. Inform the TSC Regulatory Compliance representative of planned NRC activities.

NOTE: Instructions for use of the OPS bridge line are provided in the Emergency Response Telephone Directory.

_____ To listen in on the Operations communication loop, dial the OPS bridge line. Be sure the phone/headset is on mute.

_____ Print the name of 24 Hour Staffing relief for your position on the TSC sign-in board.

_____ Provide the TSC Emergency Planner with a listing of essential personnel associated with your position that would not leave the site should a site evacuation be necessary.

_____ Provide all completed paperwork to Emergency Planning upon deactivation of the TSC.

Initial

_____ Print name and time arrived on TSC sign-in board.

_____ Sign TSC Roster located at the TSC sign-in board.

_____ Obtain self reading dosimeter from the TSC sign-in board area and complete applicable portion of a dose card using SRWP #33.

_____ Establish an Operations Superintendent position log that captures as a minimum:

A. Evolutions impacting this position
B. Decisions made by this position
C. Communication to/from other work groups

NOTE:	Instructions for use of the Ericsson phone and OPS bridge line are provided at phone location and in the Emergency Response Telephone Directory.

_____ Establish communications with the Control Room, OSC and EOF with the Ericsson phone/headset via the OPS bridge line.

_____ Perform the following as necessary throughout the event:

A. Provide technical expertise regarding solutions to operational problems to the TSC, Control Room, OSC and other members of the ERO as required.

B. Advise Emergency Coordinator on the anticipated course of the event.

C. Assist in making decisions on emergency classifications, mitigation strategies, and contingency plans.

D. Ensure each operating shift is staffed with adequate personnel to support all emergency situations, augmenting with additional resources as necessary.

E. Assist the TSC Off-Site Agency Communicators in completion of the Emergency Notification Forms using Step 3.2 for definitions associated with Emergency Notification Form.

Initial

_____ Establish direct communications with OSM for the following conditions:

A. During all 10CFR50.54x discussions.
B. Anytime it is required to back-track in procedures.
C. Anytime the TSC recommends skipping procedure steps.
D. During all discussion of significant troubleshooting plans.
E. Anytime confusion, misunderstanding or disagreement exists between the Control Room and the TSC.

NOTE: The "Emergency Coordinator Worksheet" of this enclosure may be used to note status information.

A. Provide the status of the following items as applicable to the Emergency Coordinator staff during Update Conferences.
   - Current Emergency Classification
   - Basis for Current Emergency Classification/Anticipated Changes to Emergency Classification
   - Current Mode
   - NC Temperature
   - NC Pressure
   - S/G Level
   - Current Plant Condition (Improving/Stable/Degrading)
   - Basis for Current Plant Condition
   - Key Problem Area/Recommended Priorities
B. Evaluate and prioritize requests for information from the TSC staff, EOF staff, NRC and others.
C. Evaluate and consult with Control Room personnel on suggested mitigation strategies.

_____ Assist Emergency Coordinator as a Decision-maker upon entry into Severe Accident Management Guidelines.

_____ Print the name of 24 Hour Staffing relief for your position on the TSC sign-in board.

_____ Provide the TSC Emergency Planner with a listing of essential personnel associated with your position that would not leave the site should a site evacuation be necessary.

_____ Provide all completed paperwork to Emergency Planning upon deactivation of the TSC.

Emergency Coordinator Update Worksheet

Current Emergency Classification: _____

Basis for Emergency Classification/Anticipated Changes in Emergency Classification: _____

_____

_____

_____

Current Plant Parameters:

NC Temp.: _____ Trend: __Up __ Down __ Stable
NC Press.: _____ Trend: __Up __ Down __ Stable

S/G Level: A _____ Trend: __Up __ Down __ Stable
S/G Level: B _____ Trend: __Up __ Down __ Stable
S/G Level: C _____ Trend: __Up __ Down __ Stable
S/G Level: D _____ Trend: __Up __ Down __ Stable

NC Pumps: A __On __ Off
NC Pumps: B __On __ Off
NC Pumps: C __On __ Off
NC Pumps: D __On __ Off

Current Plant Condition:

Improving _____ Stable _____ Degrading _____

Key Problem Areas/Recommended Priorities:

_____

_____

_____

_____

_____

_____

_____

_____

Initial

_____ Print name and time arrived on TSC sign-in board

_____ Sign TSC Roster located at the TSC sign-in board.

_____ Obtain self reading dosimeter from the TSC sign-in board area and complete applicable portion of a dose card using SRWP #33.

_____ Establish an Operations Engineer position log that captures as a minimum:

A. Evolutions impacting this position
B. Decisions made by this position
C. Communication to/from other work groups

NOTE: Instructions for use of the Ericsson phone and OPS bridge line are provided at phone location and in the Emergency Response Telephone Directory.

_____ Establish communications with the Control Room, OSC and EOF with the Ericsson phone/headset via the OPS bridge line.

_____ Perform the following as necessary throughout the event:

A. Follow Response Procedures (RPs) and ensure completion of appropriate steps.
B. Maintain contact with Operations personnel in the Control Room, OSC and EOF.
C. Provide recommends to the Operations Superintendent for emergency classification and protective action recommendation changes based on plant conditions.
D. Consult the EOF for possible solutions if procedural adequacy becomes a concern.
E. Provide information to Off-site Agency Communicator and the NRC Communicator as requested regarding changes in plant conditions and protective action recommendations due to plant conditions using Step 3.2 for definitions associated with the Emergency Notification Form.

_____ Serve as Lead Evaluator upon entry into Severe Accident Management Guidelines

_____ Print the name of 24 Hour Staffing relief for your position on the TSC sign-in board.

_____ Provide the TSC Emergency Planner with a listing of essential personnel associated with your position that would not leave the site should a site evacuation be necessary.

_____ Provide all completed paperwork to Emergency Planning upon TSC deactivation.

_____ Notify the shift SSA to restore the Operations TSC procedure files upon TSC deactivation.

Initial

_____ Print name and time arrived on TSC sign-in board

_____ Sign TSC Roster located at the TSC sign-in board.

_____ Obtain self reading dosimeter from the TSC sign-in board area and complete applicable portion of a dose card using SRWP #33.

_____ Establish an Assistant Operations Engineer position log that captures as a minimum:

A. Evolutions impacting this position
B. Decisions made by this position
C. Communication to/from other work groups

_____ Obtain a copy of RP/O/A/5000/001," Classification of Emergency," from the procedure cabinet.

_____ Obtain a copy of the current classification procedure and any applicable EOP.

NOTE: Instructions for use of the Ericsson phone and OPS bridge line are provided at phone location and in the Emergency Response Telephone Directory.

_____ Establish communications with the Control Room, OSC and EOF with the Ericsson phone/headset via the OPS bridge line.

_____ Perform the following as necessary throughout the event:

A. Support Control Room and TSC with EOPs and RPs.
B. Provide recommends to the Operations Superintendent for emergency classification and protective action recommendation changes based on plant conditions.
C. Assist the Operation Engineer in following Response Procedures (RPs) and ensure completion of appropriate steps.
D. Assist the Operations Engineer in providing back-up service to Control Room personnel ensuring the correct procedural flowpath is followed.
E. Assist the Operations Engineer in preparing Control Room personnel of possible difficult points in the procedures by a look ahead.
F. Assist Operations Engineer in development of Severe Accident Management Guidelines Strategies.

_____ Print the name of 24 Hour Staffing relief for your position on the TSC sign-in board.

_____ Provide the TSC Emergency Planner with a listing of essential personnel associated with your position that would not leave the site should a site evacuation be necessary.

_____ Provide all completed paperwork to Emergency Planning upon deactivation of the TSC.

Initial

_____ Print name and time arrived on TSC sign-in board

_____ Sign TSC Roster located at the TSC sign-in board.

_____ Obtain self reading dosimeter from the TSC sign-in board area and complete applicable portion of a dose card using SRWP #33.

NOTE: The Engineering Manager's OAC computer screen is normally displayed on the large screen to the left of the TSC Emergency Coordinator.

_____ Ensure Engineering Manager PC is on and displaying plant status.

_____ Establish an Engineer Manager position log that captures as a minimum:

A. Evolutions impacting this position
B. Decisions made by this position
C. Communication to/from other work groups

NOTE: Instructions for use of the Ericsson phone and OPS bridge line are provided at phone location and in the Emergency Response Telephone Directory.

_____ Establish communications with the Control Room, OSC and EOF with the Ericsson phone/headset via the OPS bridge line.

_____ Confirm that the System Support Engineer has verified the Technical Support Center Ventilation System to be operable (capable of operating in filter mode).

_____ Confirm that the System Engineer has verified the proper response of TSC computers (information displayed matches plant conditions).

_____ Obtain the following information from the System Support Engineer

A. System Initiating Event
B. System Fault
C. Equipment Out Of Service

_____ Establish verbal communications with TSC Dose Assessment personnel.

_____ Establish communications with OSC Equipment Engineer.

OSC Equipment Engineer Contacted:_____

_____ Establish communications with the Accident Assessment Manager in the EOF.

EOF Accident Assessment Manager Contacted:_____

Initial

_____ Perform the following as necessary throughout the event:

A. Continually assess plant conditions and inform the TSC Emergency Coordinator of potential for changing conditions.

B. Provide the status of the following items to the Emergency Coordinator staff during Update Conferences (Update Conferences are conducted at approximately 30 minute intervals). The following page provides a sheet that may be used to note status information.
   - Known system fault(s)
   - Level of Core Damage
   - Estimated time to core uncovery/core damage
   - Shutdown Margin
   - Subcooling Margin
   - ECCS Status (injection flow rates, proper ECCS response) (Primary heat removal capability)
   - Aux Feed Status (feedwater flows, proper CA response) (Secondary heat removal capability)
   - Reactor Vessel Integrity Status
   - Manage overall site engineering effort and ensure adequate levels of engineering resources are available to support the TSC and OSC.
   - Serve as point of contact for TSC Reactor Engineer, TSC Systems Support Engineer and OSC Equipment Engineer.

_____ Print the name of 24-Hour Staffing relief for your position on the TSC sign-in board.

_____ Provide the TSC Emergency Planner with a listing of essential personnel associated with your position that would not leave the site should a site evacuation be necessary.

_____ Provide all completed paperwork to Emergency Planning upon deactivation of the TSC.

Engineering Manager Status Information

1. **Known system fault(s)**

2. **Level of Core Damage**

3. **Estimated time to core uncovery/core damage**

4. **Shutdown Margin (TIME/MARGIN)**

/	/	/	/	/	/
/	/	/	/	/	/
/	/	/	/	/	/

5. **Subcooling Margin (TIME/MARGIN)**

/	/	/	/	/	/
/	/	/	/	/	/
/	/	/	/	/	/

6. **ECCS Status (injection flow rates, proper ECCS response) (Primary heat removal capability)**

7. **Aux Feed Status (feedwater flows, proper CA response) (Secondary heat removal capability)**

8. **Reactor Vessel Integrity Status**

9. **Containment Integrity Status**

Initial

_____ Print name and time arrived on TSC sign-in board.

_____ Sign TSC Roster located at the TSC sign-in board.

_____ Obtain self reading dosimeter from the TSC sign-in board area and complete applicable portion of a dose card using SRWP #33.

_____ Turn on Reactor Engineer computer, log on LAN under ID with write privilege for NE-LIB and verify software.

_____ Establish a Reactor Engineer position log that captures as a minimum:
A. Evolutions impacting this position
B. Decisions made by this position
C. Communication to/from other work groups

_____ **IF** applicable, obtain a copy of and execute RP/0/A/5000/015, "Core Damage Assessment".

_____ To listen in on the Operations communication loop, dial the OPS bridge line. Be sure that the phone/headset is on mute.

_____ Perform the following as necessary throughout the event:
A. Evaluate plant and reactor performance using available data in terms of:
- Level of core damage.
- Estimated time to core uncovery/core damage
- Shutdown margin
- Subcooling margin
- Trend appropriate parameters to monitor recovery

NOTE:	The "TSC Engineering Manager Update Worksheet" of this enclosure may be used to maintain data to be provided to the TSC Engineering Manager.

B. Provide TSC Engineering Manager and/or TSC Operations Superintendent with information concerning any abnormal core conditions.
C. Ensure control and accountability of Special Nuclear Materials.
D. Exchange information with EOF Accident Assessment Group as requested.

_____ Print the name of 24-Hour Staffing relief for your position on the TSC sign-in board.

_____ Provide the TSC Emergency Planner with a listing of essential personnel associated with your position that would not leave the site should a site evacuation be necessary.

_____ Provide all completed paperwork to Emergency Planning upon deactivation of the TSC.

TSC Engineering Manager Update Worksheet

Shutdown Margin

		MINIMUM TEMPERATURE FOR SHUTDOWN	
TIME	ESTIMATED BORON CONCENTRATION	WITH XENON	WITHOUT XENON

Core Status

TIME	CORE EXIT T/C 5 (HIGHEST) °F	PZR LEVEL	RVLIS LEVEL	SUBCOOLING MARGIN	EMF 53	CONTAINED H_2

Initial

_____ Print name and time arrived on TSC sign-in board.

_____ Sign TSC Roster located at the TSC sign-in board.

_____ Obtain self reading dosimeter from the TSC sign-in board area and complete applicable portion of a dose card using SRWP #33.

_____ Establish a System Support Engineer position log that captures as a minimum:

A. Evolutions impacting this position
B. Decisions made by this position
C. Communication to/from other work groups

_____ Verify the proper response of TSC computers (information displayed matches plant conditions).

_____ Verify that the Technical Support Center Ventilation System is operable (capable of operating in filter mode).

_____ Provide the following information to the TSC Engineering Manager:

A. Initiating Event:

B. Primary Systems Equipment OOS:

C. Primary Systems Faults:

D. Secondary Systems Equipment OOS:

E. Secondary Systems Faults:

F. Electrical Systems Equipment OOS:

G. Electrical Systems Faults:

Initial

_____ Perform the following as necessary throughout the event:

NOTE:	The "TSC Engineering Manager Update Worksheet" of this enclosure may be used to maintain data to be provided to the TSC Engineering Manager.

A. Provide TSC Engineering Manager and/or TSC Operations Superintendent with the following information:
   - Known system fault(s)
   - ECCS Status (injection flow rates, proper ECCS response, Primary heat removal capability)
   - Aux Feed Status (feedwater flows, proper CA response, Secondary heat removal capability)
   - Trend appropriate parameters to monitor recovery.

B. Advise TSC Engineering Manager on current systems status and accident mitigation strategies.

C. Exchange information with EOF Accident Assessment Group.

_____ Print the name of 24-Hour Staffing relief for your position on the TSC sign-in board.

_____ Provide the TSC Emergency Planner with a listing of essential personnel associated with your position that would not leave the site should a site evacuation be necessary.

_____ Provide all completed paperwork to Emergency Planning upon deactivation of the TSC.

TSC Engineering Manager Update Worksheet

TIME: _____

Known system fault(s): _____

ECCS Status (injection flow rates, proper ECCS response, Primary heat removal capability): _____

Aux Feed Status (feedwater flows, proper CA response, Secondary heat removal capability):

Trend appropriate parameters to monitor recovery: _____

Initial

_____ Print name and time arrived on TSC sign-in board.

_____ Sign TSC Roster located at the TSC sign-in board.

_____ Obtain self reading dosimeter from the TSC sign-in board area and complete applicable portion of a dose card using SRWP #33.

_____ Complete Enclosure 4.17, "TSC Operational Checklist," and provide completed enclosure to Emergency Coordinator for approval.

_____ Obtain a current copy of the qualified Catawba Nuclear Site Emergency Response Organization.

_____ Verify that all TSC and OSC positions are staffed by qualified Catawba Nuclear Site Emergency Response Organization personnel.

_____ Perform the following as necessary throughout the event:

A. Directly support the Emergency Coordinator providing:
   - Support for activation and operation of the TSC.
   - Emergency Plan information
   - Interface with NRC
   - Interface with state and county agencies
   - Any other support as requested by the Emergency Coordinator

B. Facilitate the operation of the TSC.

C. Assist Off-Site Agency Communicators in preparation of emergency notification forms.

D. Act as site evacuation point of contact for Emergency Coordinator **AND** serve as interface between Security Manager, Evacuation Coordinator and the Radiation Protection Manager for evacuation purposes.

_____ Establish communications with the EOF Emergency Planner on the Emergency Planning bridge

_____ Establish communications with the Evacuation Coordinator and keep Evacuation Coordinator informed of site evacuation status.

_____ Assist the NRC Resident in setting up listen only communication on the OPS bridge line.

_____ Compile 24-Hour Staffing/Essential Personnel Logs for all TSC positions.

_____ Collect Provide all completed paperwork to Emergency Planning upon deactivation of the TSC.

TSC 24 HOUR STAFFING LOG

	PRIMARY		RELIEF	
POSITION	NAME (Last, First, MI)	SHIFT SCHEDULE	NAME (Last, First, MI)	SHIFT SCHEDULE
Emergency Coordinator				
Asst. Emergency Coordinator				
TSC Off-Site Agency Communicator				
TSC Off-Site Agency Communicator				
TSC Dose Assessor				
Reactor Engineer				
NRC Communicator				
Operations Superintendent				
Operations Engineer				
Asst. Operations Engineer				
Regulatory Compliance				
TSC Emergency Planner				
Engineering Manager				
Systems Support Engineer				
Radiation Protection Support				
TSC Data Coordinator				
TSC Data Coordinator				
TSC Logkeeper				
CR/TSC Communicator				

TSC ESSENTIAL PERSONNEL LOG

(List all Primary/Relief Personnel that are considered essential and will remain or arrive on site to support the emergency)

	PRIMARY		RELIEF	
Position	Name (Last, First, MI)	Shift Schedule	Name (Last, First, MI)	Shift Schedule

TSC Facility Post Event Checklist

Initial

_____ Obtain printed copy of TSC Log

_____ Retrieve:
- _____ Video Tapes
- _____ Completed Procedures
- _____ Notes

_____ Turn off:
- _____ Copier
- _____ Computers
- _____ PA System (Used for Critique)
- _____ OSC Video Conferencing System (Leave EOF Video Conference computer on)
- _____ Video Monitors
- _____ Telephone Black Boxes

_____ Perform:
- _____ Supply Cabinet Inventory (PT/0/B/4600/004) Checklist
- _____ Clean Tables Off
- _____ Put all Trash In Containers
- _____ Erase Status Boards
- _____ Procedure Inventory

RP/0/A/5000/001	3 copies
RP/0/A/5000/002	3 copies
RP/0/A/5000/003	3 copies
RP/0/A/5000/004	3 copies
RP/0/A/5000/005	3 copies
RP/0/A/5000/006B	2 copies
RP/0/A/5000/007	2 copies
RP/0/B/5000/008	2 copies
RP/0/A/5000/009	2 copies
RP/0/A/5000/010	2 copies
RP/0/B/5000/013	2 copies
RP/0/A/5000/015	2 copies
RP/0/A/5000/018	2 copies

TSC Facility Post Event Checklist

Initial

___ RP/0/A/5000/020 2 copies

NOTE:	RP/0/A/5000/020 enclosure copies shall be attached to Procedure Process Record and main body of RP/0/A/5000/020

___ Enclosure 4.1 1 copy
___ Enclosure 4.2 1 copy
___ Enclosure 4.3 1 copy
___ Enclosure 4.4 1 copy
___ Enclosure 4.5 1 copy
___ Enclosure 4.6 1 copy
___ Enclosure 4.7 1 copy
___ Enclosure 4.8 1 copy
___ Enclosure 4.9 1 copy
___ Enclosure 4.10 1 copy
___ Enclosure 4.11 1 copy
___ Enclosure 4.12 1 copy
___ Enclosure 4.13 1 copy
___ Enclosure 4.14 1 copy
___ Enclosure 4.15 1 copy
___ Enclosure 4.16 1 copy
___ Enclosure 4.17 1 copy
___ Enclosure 4.18 1 copy (This enclosure shall also include a copy of Enclosure 4.1)

___ RP/0/B/5000/022 2 copies
___ RP/0/B/5000/025 2 copies
___ RP/0/B/5000/026 2 copies
___ HP/0/B/1009/001 2 copies
___ HP/0/B/1009/003 2 copies
___ HP/0/B/1009/004 2 copies
___ HP/0/B/1009/007 2 copies
___ HP/0/B/1009/009 2 copies
___ HP/0/B/1009/014 2 copies
___ HP/0/B/1009/016 2 copies
___ HP/0/B/1009/019 2 copies
___ HP/0/B/1009/024 2 copies
___ HP/0/B/1009/026 2 copies
___ SH/0/B/2005/001 5 copies

Initial

___	SAMG Drill Strategy Sheets	5 copies
___	SAMG Emergency Strategy Sheets	5 copies
___	EG/1/A/CSAM/SACRG1	2 copies
___	EG/1/A/CSAM/SACRG2	2 copies
___	EG/2/A/CSAM/SACRG1	2 copies
___	EG/2/A/CSAM/SACRG2	2 copies
___	EG/0/A/CSAM/DFC	5 copies
___	EG/0/A/CSAM/SAG-1	5 copies
___	EG/0/A/CSAM/SAG-2	5 copies
___	EG/0/A/CSAM/SAG-3	5 copies
___	EG/0/A/CSAM/SAG-4	5 copies
___	EG/0/A/CSAM/SAG-5	5 copies
___	EG/0/A/CSAM/SAG-6	5 copies
___	EG/0/A/CSAM/SAG-7	5 copies
___	EG/0/A/CSAM/SCST	5 copies
___	EG/0/A/CSAM/SCG-1	5 copies
___	EG/0/A/CSAM/SCG-2	5 copies
___	EG/0/A/CSAM/SCG-3	5 copies
___	EG/0/A/CSAM/SCG-4	5 copies
___	EG/0/A/CSAM/SAEG-1	5 copies
___	EG/0/A/CSAM/SAEG-2	5 copies
___	SAAG File No: 428 - CA-1 through CA-7	5 sets

___ Copy of Qualified ERO Listing (TSC & OSC only) for procedure cabinet

_____ Replenish:
- _____ Procedure cabinet
- _____ Supplies as necessary (Reseal Cabinets)

_____ Call:
- _____ Cleaning Crew
- _____ Southern Food (If items need to be picked up)

_____ Turn in to Emergency Planning:
- _____ Logs
- _____ Completed Procedures
- _____ Notes
- _____ Video Tapes
- _____ Supply Inventory Checklist

OSC Facility Post Event Checklist

Initial

_____ Print:
- _____ Copy of OSC Log
- _____ Team Task Sheets

_____ Retrieve:
- _____ Video Tapes
- _____ Completed Procedures
- _____ Notes

_____ Turn off:
- _____ Copier
- _____ Computers
- _____ PA System
- _____ Video Conferencing System
- _____ Video Monitors
- _____ Telephone Black Boxes

_____ Perform:
- _____ Supply Cabinet Inventory If Tamper Seal Is Broken (PT/0/B/4600/04) Checklist
- _____ Clean Tables Off
- _____ Put all Trash In Containers
- _____ Erase Status Boards
- ___ Procedure Inventory
  - _____ RP/0/A/5000/024 1 copy
  - _____ HP/0/B/1000/006 2 copies
  - _____ HP/0/B/1009/001 2 copies
  - _____ HP/0/B/1009/003 2 copies
  - _____ HP/0/B/1009/005 2 copies
  - _____ HP/0/B/1009/006 2 copies
  - _____ HP/0/B/1009/007 2 copies
  - _____ HP/0/B/1009/008 2 copies
  - _____ HP/0/B/1009/009 4 copies
  - _____ HP/0/B/1009/014 2 copies
  - _____ HP/0/B/1009/016 2 copies
  - _____ HP/0/B/1009/017 2 copies

Initial

_____ Replace: RP/0/A/5000/024 Enclosures - 1 copy each
- _ Equipment Engineer
- _ Mechanical Maintenance Manager
- _ IAE Manager
- _ Radiation Protection Manager/Supervisor
- _ Chemistry Manager
- _ Safety Manager
- _ OSC Coordinator
- _ Operations Supervisor
- _ OSC Log/Status Keeper
- _ Procedure Cabinet

_____ Replenish:
- _____ Procedures
- _____ Supplies as necessary (Reseal Cabinets)

_____ Call:
- _____ Cleaning Crew
- _____ Southern Foods if items need to be picked up

_____ Turn in to Emergency Planning
- _____ Logs
- _____ Team Task Sheets
- _____ Completed Procedures
- _____ Notes
- _____ Video Tapes
- _____ Supply Inventory Checklist

Enclosure 4.12

TSC Logkeeper Checklist

Initial

_____ Print name and time arrived on TSC sign-in board.

_____ Sign TSC Roster located at the TSC sign-in board.

_____ Obtain self reading dosimeter from the TSC sign-in board area and complete applicable portion of a dose card using SRWP #33.

NOTE: The TSC Log is normally displayed on the large screen to the right of the TSC Emergency Coordinator.

_____ Startup TSC Logkeeper Computer.

NOTE: Instructions for operating the electronic message board are displayed on the back of the electronic message board remote control.

_____ Verify that current Emergency Classification is displayed on electronic message board.

_____ Perform the following as necessary throughout the event:

NOTE: Incorrect log entries are corrected by a new entry in the log.

1. Provide logkeeping of the event for the Emergency Coordinator.
2. **IF** Autolog becomes inoperable, maintain log manually.
3. Ensure the electronic event classification status board is maintained with current emergency classification.
4. Coordinate data displays as requested by the Emergency Coordinator.
5. Ensure that emergency declaration time stated in the TSC Log are consistent with the emergency declaration times stated on the applicable Emergency Notification Form.

_____ Print the name of 24-Hour Staffing relief for your position on the TSC sign-in board.

_____ Provide the TSC Emergency Planner with a listing of essential personnel associated with your position that would not leave the site should a site evacuation be necessary.

_____ Provide a printed copy of the final TSC Log to Emergency Planning upon deactivation of the TSC.

Initial

_____ Print name and time arrived on TSC sign-in board.

_____ Sign TSC Roster located at the TSC sign-in board.

_____ Obtain self-reading dosimeter from the TSC sign-in board area and complete applicable portion of a dose card using SRWP #33.

_____ Establish a Regulatory Compliance position log that captures as a minimum:

A. Evolutions impacting this position
B. Decisions made by this position
C. Communication to/from other work groups

_____ Perform the following as necessary throughout the event:

A. Serve as NRC interface in the TSC.
B. Provide Technical Specification and other regulatory interpretations support to the TSC.
C. Record and maintain a chronology of significant events on the status board (e.g. Plant status, list of priorities, Protective Action Recommendations, etc.).
D. Prepare briefing for NRC team upon arrival.

_____ Print the name of 24-Hour Staffing relief for your position on the TSC sign-in board.

_____ Provide the TSC Emergency Planner with a listing of essential personnel associated with your position that would not leave the site should a site evacuation be necessary.

_____ Provide all completed paperwork to Emergency Planning upon deactivation of the TSC.

Enclosure 4.14

TSC Data Coordinator Checklist

Initial

_____ Ensure TLD has been obtained.

_____ Print name and time arrived on TSC sign-in board.

_____ Sign TSC Roster located at the TSC sign-in board.

_____ Obtain self reading dosimeter from the TSC sign-in board area and complete applicable portion of a dose card using SRWP #33.

_____ Obtain a copy of the Data Coordinator's Reference Manual located in the OAC Area of the TSC.

NOTE:
1. Emergency Response Data System (ERDS) transmission to the NRC is required to be initiated within one hour of declaring an actual Alert or higher Emergency Classification.
2. The Control Room normally initiates ERDS transmission.
3. ERDS transmission is simulated for drills/exercises.

_____ **IF** classification is Alert or higher, verify ERDS data transmission to the NRC has been established by the Control Room.

_____ **IF** ERDS data transmission has not been established, troubleshoot as necessary and initiate ERDS data transmission per Data Coordinator's Reference Manual.

_____ Perform the following as necessary throughout the event:

A. Verify that TSC and OSC electronic equipment is operating properly per the Data Coordinator's Reference Manual.
B. Establish contact with EOF Data Coordinator.
C. Ensure data is available in the TSC and OSC for use in accident mitigation.
D. Manage data gathering and dissemination by:
   - Maintaining IT hardware/software in the TSC and OSC.
   - Ensuring necessary software graphics and displays operate and meet the needs of the TSC and OSC.
   - Providing TSC and OSC hardware/software oversight.
   - Maintain ERDS transmission to the NRC.

_____ Print the name of 24-Hour Staffing relief for your position on the TSC sign-in board.

_____ Provide the TSC Emergency Planner with a listing of essential personnel associated with your position that would not leave the site should a site evacuation be necessary.

_____ Provide all completed paperwork to Emergency Planning upon deactivation of the TSC.

Initial

_____ Print name and time arrived on TSC sign-in board.

_____ Sign TSC Roster located at the TSC sign-in board.

_____ Obtain self reading dosimeter from the TSC sign-in board area and complete applicable portion of a dose card using SRWP #33.

_____ Print the name of 24-Hour Staffing relief for your position on the TSC sign-in board.

_____ Establish an RP Support position log that captures as a minimum:
A. Evolutions impacting this position
B. Decisions made by this position
C. Communication to/from other work groups

Perform the following actions upon arrival at the TSC:
A. Open TSC Emergency Kit
B. Place portable instruments into service.
C. Provide TSC personnel Self Reading Dosimeters (SRDs) as necessary; (e.g., Pocket Dosimeters).
D. Provide Dose Cards to TSC personnel, as necessary.
E. Monitor TSC dose rates, as necessary.
F. Initiate contamination control requirements, as appropriate
G. Inform Emergency Coordinator when eating and drinking is permitted in the TSC and OSC.

_____ Set up personnel monitoring equipment based on contamination levels and site conditions; (e.g., TSC Portal Monitor, and frisker, as necessary).
A. Initiate personnel monitoring contamination control requirements, as necessary.
B. Establish a travel path for personnel entering the TSC, as necessary.
C. Establish a travel path for personnel exiting the TSC, as necessary.
D. Ensure personnel monitoring equipment is used by personnel in the TSC.

_____ Activate Field Monitoring Team (FMT) organization based on information from dose assessors and potential radiological releases.

NOTE: Notify RP Supervisor and TSC Dose Assessor of any field teams assigned prior to OSC activation.

A. Contact OSC RP Management (RP Supervisor or RP Duty Shift) for FMT support.
B. Request FMT support based on number of RP personnel available in OSC.
C. Request FMT support based on current meteorological conditions.
D. Request additional FMTs per notification by TSC Dose Assessor or EOF Field Monitor Coordinator, as appropriate.

Initial

_____ Contact Field Monitor Team members in OSC or Emergency Equipment Storage Room, as appropriate.
A. Determine personnel assignment to Field Monitor Teams.
B. Initiate HP/0/B/1009/019, "Emergency Radio System Operation Maintenance, and Communication"

_____ Update FMT personnel on plant radiological status.
A. Update FMT personnel on any previous or current off-site releases; (e.g., plume of radioactive material, liquid or gaseous activity that has been released).
B. Update FMT personnel on potential off-site release; (e.g., plume of radioactive material, liquid or gaseous activity that may be released).

_____ Obtain current meteorological information.
A. Assess initial plume movement based on meteorological information.

_____ Dispatch one or more Field Monitor Teams as follows:

Call Sign	Members	Transportation
Sample Van 1	2	Emergency Van
Sample Van 2	2	Emergency Van
Alpha	2	Land Vehicle
Bravo	2	Land Vehicle (as necessary)
Charlie	2	Land Vehicle (as necessary)
Delta	2	Land Vehicle (as necessary)

_____ Dispatch Field Monitor Teams based on stability class, wind direction, wind speed, and time of release, as follows:
A. Sample Van 1 to left side of the plume.
B. Sample Van 2 to right side of the plume.
C. Alpha Survey Team to the 0.5 mile site radius to traverse the plume at its estimated arc.
D. Bravo Survey Team in an attempt to intersect the leading edge of the plume.
E. Charlie and Delta Survey Teams to assist in defining any affected areas.

_____ Request field team to assess potential offsite radiological conditions; (e.g., dose rates from gaseous or liquid release).

_____ Instruct Emergency Sample Vans to obtain environmental samples as necessary per HP/0/B/1009/004, "Environmental Monitoring for Emergency Conditions Within the Ten Mile Radius of Catawba Nuclear Station".

Initial

NOTE:
1. Changes in meteorological conditions may affect assembly points.
2. On site survey teams, inside the protected area, dispatched from OSC (e.g., Foxtrot Team) should report survey results to OSC RP Supervision.
3. TSC RP Support or EOF Field Monitor Coordinator are to be notified of on site survey results using telephone or radio, as appropriate.

_____ Direct a Field Monitor Team to survey Assembly Areas outside of the Protected Area Fence, as necessary.

A. Provide guidance for Field Team surveys based on current radiological conditions; (e.g., Catawba Training Center or Administration Building Assembly Areas may be downwind of a plume).

_____ Notify RPM and TSC Dose Assessor of plume directional movement as determined by field team surveys.

A. Communicate significant meteorological changes to RPM and TSC Dose Assessor.

_____ Monitor dose rates in TSC.

A. Initiate discussion with RPM on the need to evacuate TSC if General Area dose rate approaches 5 mrem/hr and dose rate is expected to continue.
B. Initiate discussions with RPM regarding need to provide dose extensions for Field Monitoring team members, when appropriate.

_____ Inform RPM and TSC Dose Assessor of any on-site or near site hazards.

A. Notify RPM of vehicle accidents.
B. Notify RPM of personnel accidents.
C. Notify RPM of safety incidents reported by the FMTs

_____ Maintain a 10 mile radius map in the TSC.

A. Confirm approximate plume shape and location using accumulated field team information.
B. Illustrate approximate plume shape and location on the map using accumulated field data.
C. Post current FMT locations.
D. Post latest instrument survey results for each field monitoring location.

_____ Continue field-monitoring strategies for plume assessment.

A. Review plant radiological status.
B. Review field data and meteorological information approximately every fifteen minutes for any changes, which might affect field monitoring.
C. Advise FMTs on public protective actions.
D. Advise FMTs on conditions that they should be aware of while in a plume area.

Initial

_____ Advise TSC Dose Assessor of field monitoring results.
A. Initiate discussions with RPM and the TSC Dose Assessor regarding need to issue KI tablets to Field Teams if offsite Radioiodine dose rates approach 10 rem/hr.

_____ Issue re-zeroed pocket dosimeters to TSC personnel when necessary.
A. Issue dose cards to TSC personnel when necessary.

_____ Maintain an organized file of sample results/data generated from FMT activities.

_____ Acquire FMT equipment and RP supplies including protective clothing, as necessary.

_____ Coordinate radiological monitoring of food items supplied to the TSC with Commodities and Facilities and Emergency Planning representatives.

_____ Provide turnover information to Field Monitor Coordinator (FMC) at EOF, as necessary.

NOTE TSC RP Support becomes functionally responsible to OSC RPM upon EOF activation.

_____ Restore RP Emergency Response Kit equipment to a ready state condition after a drill or event is terminated.

_____ Provide the TSC Emergency Planner with a listing of essential personnel associated with your position that would not leave the site should a site evacuation be necessary.

_____ Provide all completed paperwork to Emergency Planning upon deactivation of the TSC.

Enclosure 4.16

Security Manager Checklist

Initial

_____ Print name and time arrived on TSC sign-in board.

_____ Sign TSC Roster located at the TSC sign-in board.

_____ Obtain self reading dosimeter and complete applicable portion of a dose card using SRWP #33.

_____ Provide OSC Radiation Protection Manager with the names and location of Security personnel not located at a designated site assembly.

> **NOTE:** Security has the lead role for locating unaccounted personnel identified during a Site Assembly.

_____ Establish a Security Manager position log that captures as a minimum:
A. Evolutions impacting this position
B. Decisions made by this position
C. Communication to/from other work groups

_____ Provide site assembly status information to the Emergency Coordinator.
A. Number of unaccounted personnel inside the protected area
B. Evaluate the number of unaccounted personnel to determine if making an announcement by name for these personnel to re-swipe their badge in a site assembly card reader is feasible
C. Approximate number of personnel assembled inside and outside the protected area

_____ Serve as Security point of contact for:
A. Site Assembly Accountability
B. Site Evacuation
C. MERT Support
D. Security Plan Implementation

_____ Coordinate evacuation with Evacuation Coordinator and Emergency Planner.
A. Provide Emergency Coordinator with approximate number of site evacuees.
B. Ensure RP is preparing for appropriate evacuation site.
C. Inform the Emergency Coordinator when site evacuation has been completed.

_____ Print the name of 24-Hour Staffing relief for your position on the TSC sign-in board.

_____ Provide the TSC Emergency Planner with a listing of essential personnel associated with your position that would not leave the site should a site evacuation be necessary.

_____ Provide all completed paperwork to Emergency Planning upon deactivation of the TSC.

Enclosure 4.17

TSC Operational Checklist

Initial

_____ Verify that personnel qualified to perform the following functions are present in the TSC. These personnel are required to be present within 45 minutes of the Emergency Declaration.

_____ TSC Dose Assessor

_____ Time arrived in TSC

NOTE:	NRC Communicator position is filled by shift personnel. This position is initially located in the Control Room and transfers to the TSC upon TSC activation.

_____ Verify that personnel qualified to perform the following functions are present in the TSC. These personnel are required to be present within 75 minutes of the Emergency Declaration.

_____ Emergency Coordinator

_____ Time arrived in TSC

_____ TSC Off-Site Agency Communicator (2)

_____ Time arrived in TSC

_____ Time arrived in TSC

_____ Reactor Engineer (Core/Thermal Hydraulics)

_____ Time arrived in TSC

_____ Announce the following using the TSC/OSC Public Address:

A. "Anyone who has consumed alcohol within the past five (5) hours, notify either the Emergency Coordinator or the OSC Coordinator."

B. "All personnel in the TSC and OSC must have on a TLD and a self-reading dosimeter. Assume areas are contaminated until surveyed by RP."

C. "No eating or drinking until the TSC and OSC are cleared by RP."

_____ Contact Corporate Security at 382-1234 to ensure that they have been notified to unlock the EOF.

Initial

_____ Verify that the Engineering Manager has confirmed that the TSC Ventilation (pressurization and filter) System is operable.

_____ **IF** the TSC Ventilation System is inoperable, determine the following and inform the Emergency Coordinator.

A. Reason for inoperability _____

_____

B. Expected time duration for return service_____

C. Radiological hazard to TSC personnel _____

_____

_____ Verify that the TSC Off-Site Agency Communicator is prepared to take over contact with state and local agencies:

A. Emergency Notification Forms are available.

B. Selective Signaling phone or outside lines are functional.

_____ TSC Operational Checklist complete at _____
(Time)

Initial

_____ Print name and time arrived on TSC sign-in board.

_____ Sign TSC Roster located in the TSC sign-in board area.

_____ Obtain self reading dosimeter and complete applicable portion of a dose card using SRWP #33.

_____ Establish an Assistant Emergency Coordinator position log that captures as a minimum:

A. Evolutions impacting this position
B. Decisions made by this position
C. Communication to/from other work groups

_____ Obtain several copies of "Emergency Coordinator Update Form" for use as the event progresses.

_____ Review Enclosure 4.1, "Emergency Coordinator Checklist" and "Emergency Coordinator Responsibilities."

_____ Perform the following as necessary throughout the event:

A. Assist the Emergency Coordinator in activation of the Technical Support Center
B. Assist the TSC Off-Site Agency Communicator prepare Emergency Notification Forms
C. Prepare routine updates for Emergency Coordinator using the "Emergency Coordinator Update Form."
D. Fax a copy of each completed "Emergency Coordinator Update Form" to the EOF Director.
E. Assist the Emergency Coordinator in turnover to the EOF
   - Complete the "EOF Director Turnover From" from Enclosure 4.1.
   - Review the completed "EOF Director Turnover Form" with the Emergency Coordinator.
   - Fax the "EOF Director Turnover Form" to the EOF for use by the EOF Director during turnover.
F. Act as a receiver of information when the Emergency Coordinator is unavailable and relay the information to the Emergency Coordinator in a timely manner.
G. Proactively seek information when the Emergency Coordinator is in a reactive mode.
H. Make face-to-face confirmation of information provided when the Emergency Coordinator is unavailable.
I. Serve as the Emergency Coordinator when needed.
J. Assist in making decisions on emergency classifications, mitigation strategies, contingency plans and protective actions for plant personnel and the general public.

_____ Print the name of 24 hour staffing relief for your position on the TSC sign-in board.

_____ Provide all completed paperwork to Emergency Planning upon deactivation of the TSC.

Enclosure 4.18

Assistant Emergency Coordinator Checklist

Emergency Coordinator Update

Message # _____ Time: _____

☐ DRILL (State "This is a drill. This is a drill." prior to and following the update) ☐ EVENT

"This is the Emergency Coordinator. May I have your attention please."

"The status of the **DRILL/EVENT** as of _____ hours is as follows:

Unit _____ **IS/REMAINS** in an _____ as a result of

_____

NC Temp: °F _____ Containment Pressure: _____ psig

RVLIS level: _____% NCS Pressure: _____ psig

NCS Subcooling: _____ °F

Additional Information:

_____

_____

_____

_____

_____

_____

_____

_____

_____

_____

_____

_____

_____

_____

_____

This is the Emergency Coordinator. We will update you again as conditions change."

Enclosure 4.19

Commitments for RP/0/A/5000/020

{1} PIP 2-296-0273