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Vice President

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December 20, 2000

Document Control Desk
Nuclear Regulatory Commission
Washington, DC 20555

Subject: McGuire Nuclear Station
Docket Nos. 50-369 and 50-370
Supplement For Addition of Independent Spent Fuel
Storage Installation (ISFSI) Emergency Action Levels

On September 7, 2000 proposed revisions to the McGuire Nuclear Station Emergency Plan and the emergency classification procedure were sent to the NRC for review. Duke was proposing to add Emergency Action Levels (EALs) to these documents due to the addition of an Independent Spent Fuel Storage Installation (ISFSI). Pursuant to 10 CFR Part 50 Appendix E (B) Duke was requesting NRC approval prior to implementation of these Emergency Action Levels.

As part of this change EAL 4.7.U.1-6 was included in the Emergency Plan and emergency classification procedure to address an ISFSI Cask that was tipped over or dropped greater than 18 inches (See Attachment A). During review it was determined that the 50.59 safety evaluation erroneously stated the allowable maximum transport height of the cask as 18 inches as discussed in the TN-32 Safety Analysis Review. This value was found to be inconsistent with the design calculations. To be consistent with the McGuire calculations the drop distance in this EAL should be 12 inches instead of the 18-inch value originally submitted. Based on this information the drop value in EAL 4.7.U.1-6 has been revised to be 12 inches (See Attachment B).

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Duke would request that the review of this supplemental information be included in the ongoing review of the proposed ISFSI EAL additions.

Please contact Steve Mooneyhan at (704) 875-4646 or Kay Crane at (704) 875-4306 for questions concerning this proposal.

Sincerely,

 for

H. B. Barron
Site VP
McGuire Nuclear Station

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xc: w/attachments (2 copies)

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ENCLOSURE 4.7
NATURAL DISASTERS, HAZARDS AND OTHER CONDITIONS
AFFECTING PLANT SAFETY

UNUSUAL EVENT

4.7.U.1 Natural and Destructive Phenomena Affecting the Protected Area.

OPERATING MODE APPLICABILITY: All

EMERGENCY ACTION LEVELS:

- 4.7.U.1-1** Tremor felt and valid alarm on the "strong motion accelerograph".
- 4.7.U.1-2** Tremor felt and valid alarm on the "Peak shock annunciator".
- 4.7.U.1-3** Report by plant personnel of tornado striking within protected area boundary, including the ISFSI.
- 4.7.U.1-4** Vehicle crash into plant structures or systems within protected area boundary, including the ISFSI.
- 4.7.U.1-5** Report of turbine failure resulting in casing penetration or damage to turbine or generator seals.
- 4.7.U.1-6** ISFSI cask tipped over or dropped greater than 18 inches.
- 4.7.U.1-7** Uncontrolled flooding in the ISFSI area.
- 4.7.U.1-8** Tornado generated missile(s) impacting the ISFSI.

BASIS:

The protected area boundary is typically that part within the security isolation zone and is defined in the site security plan.

EALs 1&2: Damage may be caused to some portions of the site, but should not affect ability of safety functions to operate. Method of detection can be based on instrumentation, validated by a reliable source, or operator assessment. As defined in the EPRI-sponsored "Guidelines for Nuclear Plant Response to an Earthquake", dated October 1989, a "felt earthquake" is:

ATTACHMENT A
ADDITIONAL EAL DEVELOPMENT INFORMATION

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Enclosure 4.7

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Natural Disasters, Hazards, And Other Conditions Affecting Plant Safety

UNUSUAL EVENT

ALERT

SITE AREA EMERGENCY

GENERAL EMERGENCY

4.7.U.1-6 Independent Spent Fuel Cask tipped over or dropped greater than 18 inches.

4.7.U.1-7 Uncontrolled flooding in the ISFSI area.

4.7.U.1-8 Tornado generated missile(s) impacting the ISFSI.

4.7.U.2 **Release of Toxic or Flammable Gases Deemed Detrimental to Safe Operation of the Plant.**

OPERATING MODE: ALL

4.7.U.2-1 Report or detection of toxic or flammable gases that could enter within the site area boundary in amounts that can affect safe operation of the plant.

4.7.U.2-2 Report by Local, County or State Officials for potential evacuation of site personnel based on offsite event.

(Continued)

4.7.A.1-3 Turbine failure generated missiles, vehicle crashes or other catastrophic events causing visible structural damage on any of the following plant structures:

- Reactor Building
- Auxiliary Building
- FWST
- Diesel Generator Rooms
- Control Room
- Standby Shutdown Facility
- Doghouses
- CAS
- SAS
- Ultimate heat sink (Standby Nuclear Service Water Pond Dam and Dikes and Cowan's Ford Dam and associated Dikes).

(Continued)

4.7.S.2 **Other Conditions Existing Which in the Judgement of the Emergency Coordinator/EOF Director Warrant Declaration of Site Area Emergency.**

OPERATING MODE: ALL

4.7.S.2-1 Other conditions exist which in the Judgement of the Emergency Coordinator/EOF Director indicate actual or likely major failures of plant functions needed for protection of the public.

END

ENCLOSURE 4.7
NATURAL DISASTERS, HAZARDS AND OTHER CONDITIONS
AFFECTING PLANT SAFETY

UNUSUAL EVENT

4.7.U.1 Natural and Destructive Phenomena Affecting the Protected Area.

OPERATING MODE APPLICABILITY: All

EMERGENCY ACTION LEVELS:

- 4.7.U.1-1** Tremor felt and valid alarm on the "strong motion accelerograph".
- 4.7.U.1-2** Tremor felt and valid alarm on the "Peak shock annunciator".
- 4.7.U.1-3** Report by plant personnel of tornado striking within protected area boundary, including the ISFSI.
- 4.7.U.1-4** Vehicle crash into plant structures or systems within protected area boundary, including the ISFSI.
- 4.7.U.1-5** Report of turbine failure resulting in casing penetration or damage to turbine or generator seals.
- 4.7.U.1-6** ISFSI cask tipped over or dropped greater than 12 inches.
- 4.7.U.1-7** Uncontrolled flooding in the ISFSI area.
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BASIS:

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ATTACHMENT B
SUPPLEMENTAL EAL DEVELOPMENT INFORMATION

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Enclosure 4.7

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Natural Disasters, Hazards, And Other Conditions Affecting Plant Safety

UNUSUAL EVENT

ALERT

SITE AREA EMERGENCY

GENERAL EMERGENCY

4.7.U.1-6 Independent Spent Fuel Cask tipped over or dropped greater than 12 inches.
[REDACTED]

4.7.U.1-7 Uncontrolled flooding in the ISFSI area.

4.7.U.1-8 Tornado generated missile(s) impacting the ISFSI.

4.7.U.2 **Release of Toxic or Flammable Gases Deemed Detrimental to Safe Operation of the Plant.**

OPERATING MODE: ALL

4.7.U.2-1 Report or detection of toxic or flammable gases that could enter within the site area boundary in amounts that can affect safe operation of the plant.

4.7.U.2-2 Report by Local, County or State Officials for potential evacuation of site personnel based on offsite event.

(Continued)

4.7.A.1-3 Turbine failure generated missiles, vehicle crashes or other catastrophic events causing visible structural damage on any of the following plant structures:

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(Continued)

4.7.S.2 **Other Conditions Existing Which in the Judgement of the Emergency Coordinator/EOF Director Warrant Declaration of Site Area Emergency.**

OPERATING MODE: ALL

4.7.S.2-1 Other conditions exist which in the Judgement of the Emergency Coordinator/EOF Director indicate actual or likely major failures of plant functions needed for protection of the public.

END