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August 21, 2006

U.S. Nuclear Regulatory Commission  
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One White Flint North  
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Rockville, MD 20855

Docket No. 50-059

Subject: Revised Reply to Notice of Violation

- References: (1) Letter Ho Nien to W. E. Burchill, "NRC Routine Inspection Report No. 50-059/2006-201 and Notice of Violation," June 29, 2006.
- (2) Letter W. E. Burchill to USNRC Document Control Desk, Docket No. 50-059, July 28, 2006.
- (3) E-mail K. Witt to W. E. Burchill, "Request for Extension to Reply to a Notice of Violation," August 1, 2006.
- (4) Letter W. E. Burchill to M. Mendonca, "Actions Relative to the AGN-201M Nuclear Reactor, License No. R-23," May 5, 2006.
- (5) Letter W. E. Burchill to M. Mendonca, "TAMU AGN Progress Summary and Plan," June 16, 2003.
- (6) NRC Administrative Letter 95-05, Revision 2, "Revisions to Staff Guidance for Implementing NRC Policy on Notice of Enforcement Discretion," July 27, 1999.

Gentlemen:

This letter provides a reply to the two violations stated in the Notice of Violation (NOV) (Ref. 1) within the extended response time requested in Ref. 2 as approved by Ref. 3.

JEOI

Violation A: Technical Specification Section 6.4.3 concerning audits of the facility by the Reactor Safety Board. The NOV states "no audits have been conducted since the reactor was last operable in 1999."

The reply to this violation was provided in Ref. 4. As stated in the NOV (Ref. 1), "The NRC has concluded that information regarding the reason for Violation A, the corrective actions taken and planned to correct the violations and prevent recurrence is already adequately addressed on the docket in a letter from you received by the NRC dated May 5, 2006 [Ref. 4]."

Further corrective action is the submittal to the NRC of a request, which is enclosed, for a Notice of Enforcement Discretion (NOED) relative to this and other specified Technical Specification sections. Full compliance will be achieved on a date to be determined according to the NRC response to this request.

Violation B: 10 CFR 50.54(q) concerning following and maintaining emergency plans, specifically the Texas A&M University AGN-201M Emergency Plan Section 10.1. The NOV states "the licensee stated that emergency drills [evacuation drills] had not been conducted annually. The licensee had not conducted an emergency drill [evacuation drill] since the reactor was last operated in 1999. The licensee also could not find documentation indicating that the required retraining and re-orientation of facility emergency response personnel was being completed. The licensee indicated that this training had not been conducted since the reactor was last operated in 1999."

The reply to this violation was partially provided in Ref. 4. As stated in the NOV (Ref. 1), "In that letter [Ref. 4], you also provided information regarding part of the reason for violation B." The remaining reply to Violation B is provided below.

(1) The reason for the violation: As stated in Ref. (4) "An annotated copy of the AGN reactor emergency plan found in the files of the former AGN Reactor Supervisor indicates that the AGN Reactor Supervisor deliberately suspended evacuation drills because the AGN reactor was not operable, i.e., it was shutdown and partially dismantled." This action was inappropriate without a supporting action to obtain approval from the NRC for suspension of these drills.

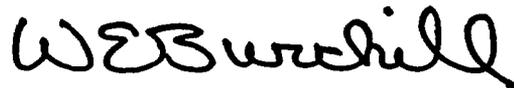
(2) Corrective steps taken and results achieved: Enclosed is a request for an NOED to suspend evacuation drills during the period of time that the AGN reactor is disassembled making the release of radioactivity or the increase of radiation levels that would necessitate evacuation physically impossible unless there were a passive structural failure. The attachment also includes a request for an NOED to suspend retraining and re-orientation of facility emergency response personnel during this same period of time.

(3) Corrective steps to be taken to avoid further violations: Following the period of suspension requested in the attachment, evacuation drills and associated retraining and re-orientation will be re-established according to the Texas A&M University AGN-201M Emergency Plan. These will be verified by periodic audits by the Reactor Safety Board as required by the reactor's Technical Specifications, Section 6.4.3 (b).

(4) Date when full compliance will be achieved: As stated in Ref. (4) "A revision to the AGN reactor upgrade plan (Ref. 5) is being prepared and will be submitted to you as soon as possible." This revised plan will determine the date when the AGN reactor will again be operable. Full compliance will be achieved on or before this date.

Enclosed is a request for an NOED relative to specified sections of the Technical Specifications and the Code of Federal Regulations prepared according to guidance provided in Ref. (6). Thank you for your consideration of this request. Please telephone me at (979) 845-1670 if you have questions.

Sincerely,



William E. Burchill  
Department Head and HRTI Professor  
Nuclear Engineering

Enclosure

xc: Kevin M. Witt, NRC Inspector  
William S. Charlton, Chair, NUEN Laboratory Management Committee  
I. S. Hamilton, Interim Reactor Supervisor  
Theresa A. Maldonado, Chair, TAMU Reactor Safety Board

REQUEST FOR A  
NOTICE OF ENFORCEMENT DISCRETION  
Docket No. 50-059  
August 11, 2006  
Revision 1, August 21, 2006

The licensee of the Texas A&M University AGN-201M Reactor (Serial #106), licensed to operate under License No. R-23, hereby requests a Notice of Enforcement Discretion (NOED) to suspend specified requirements of License No. R-23, Appendix A, Technical Specifications and other specified requirements of the Code of Federal Regulations relative to License No. R-23 for the limited period of time when the AGN reactor is dismantled and inoperable. This period of noncompliance will be temporary and nonrecurring. The noncompliances will not adversely affect public health and safety.

1. The TS or other license conditions that will be violated.

TS 6.3 Training

TS 6.4.3 Audits

10 CFR 50.54(q) relative only to conduct of an annual evacuation drill under the Texas A&M University AGN-201M Emergency Plan Section 10.1 and to retraining and re-orientation of facility emergency response personnel within the annual AGN-201M requalification program for reactor operators

2. The circumstances surrounding the situation

The AGN reactor was last operated August 25, 1999. Since that time it has been shutdown for upgrades. It is currently partially dismantled; however, the fuel (except for the control rods) is secure in the reactor vessel and shielding. Under these conditions it is not possible to conduct training as required by TS 6.3. As described in Ref. (1) appropriate cognizance of the AGN reactor by the Texas A&M University Reactor Safety Board (RSB) is being maintained in lieu of compliance with TS 6.4.3 because of the current dismantled state of the reactor. The physical state of the reactor makes the release of radioactivity or the increase of radiation levels that would necessitate evacuation physically impossible unless there were a passive structural failure thus eliminating the necessity to conduct an annual evacuation drill and associated retraining and re-orientation.

3. The safety basis for the request

The safety basis for the request is that the physical state of the AGN reactor makes the release of radioactivity or the increase of radiation levels physically impossible unless there were a passive structural failure. The AGN reactor can not be made critical in its current dismantled state. In addition, the Texas A&M University Radiation Safety Office (RSO) conducts a radiation protection program for the AGN reactor which includes regular, periodic radiation surveys and other activities which satisfy all regulatory requirements. This request is consistent with TS 4.0,

Surveillance Requirements, which states "Actions specified in this section are not required to be performed if during the specified surveillance period the reactor has not been brought critical or is maintained in a shutdown condition extending beyond the specified surveillance period."

#### 4. Basis for conclusion of no public health and safety detriment and no significant hazard

The AGN reactor can not be made critical in its current dismantled state. The physical state of the AGN reactor makes the release of radioactivity or the increase of radiation levels physically impossible unless there were a passive structural failure. Regular, periodic surveys of radiation levels surrounding the AGN reactor are being conducted by the RSO.

#### 5. Basis for conclusion of no adverse consequences to the environment

The AGN reactor can not be made critical in its current dismantled state. The physical state of the AGN reactor makes the release of radioactivity or the increase of radiation levels physically impossible unless there were a passive structural failure. Regular, periodic surveys of radiation levels surrounding the AGN reactor are being conducted by the RSO.

#### 6. Any proposed compensatory measure(s)

Relative to TS 6.3: As committed in Ref. (1), the licensee will conduct a new operator training class for the AGN reactor. The licensee has identified potential candidates for this new operator training class including (1) two faculty members, (2) two staff members, and (3) several students. The remaining licensed AGN reactor operator will assist in developing and conducting this class while simultaneously re-establishing his requalification training. Materials from the formerly conducted requalification training program will be applied. Required reactivity manipulations will be conducted using the Texas A&M University TRIGA reactor prior to the AGN reactor being operable. The AGN reactor will remain shutdown and inoperable until a sufficient number of candidates have passed their AGN reactor operator license examination.

Relative to TS 6.4.3: As described in Ref. (1), cognizance of the AGN reactor has been maintained by the RSB. The RSB meets at least annually, and descriptions of specific actions taken by the RSB are provided in Ref. (1). These practices will continue.

Relative to 10 CFR 50.54(q): Evacuation drills and associated retraining and re-orientation will be conducted under the new operator training class described above.

#### 7. Justification for the duration of the noncompliance

As stated in Ref. (1), the AGN reactor is currently partially dismantled; however, the fuel (except for the control rods) is secure in the reactor vessel and shielding. A reactor upgrade was initiated in early 2001 following receipt of a U.S. Department of Energy (DOE) University Reactor Instrumentation Grant. The upgrade involves five phases: (1) remove old equipment, (2) design new circuits and systems, (3) build new control and instrumentation subassemblies, (4) test subassemblies, and (5) reassemble and test the integrated system. Phases 1 and 2 were completed and phase 3, partially completed in 2002 when work was suspended due to

insufficient funds. Work was reinitiated in early 2003 using department funding. Phase 3 was completed and phase 4, partially completed in 2004 when work was again suspended due to personnel unavailability. Work remains suspended at this time. A revision to the AGN reactor upgrade plan is being prepared and will be submitted to you as soon as possible. That plan will define and limit the duration of noncompliance.

8. Statement that request has been approved by facility safety review organization

The request was reviewed and approved by the RSB on August 18, 2006.

9. NOED criteria for appropriate plant conditions

The AGN reactor is in a shutdown condition (NOED Situation 2, Ref. 2, Sect. 2.0). The NOED is intended to provide temporary relief from actions that are unnecessary, and may be inappropriate, for the AGN reactor conditions in that these actions do not provide an overall benefit to safety in the shutdown and dismantled condition of the AGN reactor.

10. Follow-up license amendment

No follow-up license amendment will be submitted.

References

- (1) Letter W. E. Burchill to M. Mendonca, "Actions Relative to the AGN-201M Nuclear Reactor, License No. R-23," May 5, 2006.
- (2) NRC Administrative Letter 95-05, Revision 2, "Revisions to Staff Guidance for Implementing NRC Policy on Notice of Enforcement Discretion," July 27, 1999.