UNITED STATES
NUCLEAR REGULATORY COMMISSION
WASHINGTON, D.C. 20555-0001

SAFETY EVALUATION BY THE OFFICE OF NUCLEAR REACTOR REGULATION

LICENSEE RESPONSE TO GENERIC LETTER 96-05, "PERIODIC VERIFICATION OF DESIGN-BASIS CAPABILITY OF SAFETY-RELATED MOTOR-OPERATED VALVES,"

MILLSTONE NUCLEAR POWER STATION, UNIT NO. 2

DOCKET NUMBER 50-336

1.0 INTRODUCTION

Many fluid systems at nuclear power plants depend on the successful operation of motor-operated valves (MOVs) in performing their safety functions. Several years ago, MOV operating experience and testing, and research programs sponsored by the nuclear industry and the U.S. Nuclear Regulatory Commission (NRC), revealed weaknesses in a wide range of activities (including design, qualification, testing, and maintenance) associated with the performance of MOVs in nuclear power plants. For example, some engineering analyses used in sizing and setting MOVs did not adequately predict the thrust and torque required to operate valves under their design-basis conditions. In addition, inservice tests of valve stroke time under zero differential-pressure and flow conditions did not ensure that MOVs could perform their safety functions under design-basis conditions.

Upon identification of the weaknesses in MOV performance, significant industry and regulatory activities were initiated to verify the design-basis capability of safety-related MOVs in nuclear power plants. After completion of these activities, nuclear power plant licensees began establishing long-term programs to maintain the design-basis capability of their safety-related MOVs. This safety evaluation (SE) addresses the program developed by Northeast Nuclear Energy Company (licensee) to periodically verify the design-basis capability of safety-related MOVs at the Millstone Nuclear Power Station, Unit No. 2.

2.0 REGULATORY REQUIREMENTS

The NRC regulations require that MOVs important to safety be treated in a manner that provides assurance of their intended performance. Criterion 1 to Appendix A, "General Design Criteria for Nuclear Power Plants," to Part 50 of Title 10 of the *Code of Federal Regulations* (10 CFR 50) states, in part, that structures, systems, and components important to safety shall be designed, fabricated, erected, and tested to quality standards commensurate with the importance of the safety functions to be performed. The quality assurance program to be applied to safety-related components is described in Appendix B, "Quality Assurance Criteria for Nuclear Power Plants and Fuel Reprocessing Plants," to 10 CFR Part 50. In Section 50.55a of 10 CFR 50, the NRC requires licensees to establish inservice testing (IST) programs

Enclosure

in accordance with Section XI of the American Society of Mechanical Engineers (ASME) Boiler and Pressure Vessel Code.

In response to concerns regarding MOV performance, the NRC staff issued Generic Letter (GL) 89-10 (June 28, 1989), "Safety-Related Motor-Operated Valve Testing and Surveillance," which requested that nuclear power plant licensees and construction permit holders ensure the capability of MOVs in safety-related systems to perform their intended functions by reviewing MOV design bases, verifying MOV switch settings initially and periodically, testing MOVs under design-basis conditions where practicable, improving evaluations of MOV failures and necessary corrective action, and trending MOV problems. The staff requested that licensees complete the GL 89-10 program within approximately three refueling outages or 5 years from the issuance of the generic letter. Permit holders were requested to complete the GL 89-10 program before plant startup or in accordance with the above schedule, whichever was later.

The NRC staff issued seven supplements to GL 89-10 that provided additional guidance and information on MOV program scope, design-basis reviews, switch settings, testing, periodic verification, trending, and schedule extensions. GL 89-10 and its supplements provided only limited guidance regarding MOV periodic verification and the measures appropriate to assure preservation of design-basis capability. Consequently, the staff determined that additional guidance on the periodic verification of MOV design-basis capability should be prepared. On September 18, 1996, the NRC staff issued GL 96-05, "Periodic Verification of Design-Basis Capability of Safety-Related Motor-Operated Valves," requesting each licensee establish a program, or ensure the effectiveness of its current program, to verify on a periodic basis that safety-related MOVs continue to be capable of performing their safety functions within the current licensing bases of the facility. In GL 96-05, the NRC staff summarized several industry and regulatory activities and programs related to maintaining long-term capability of safety-related MOVs. For example, GL 96-05 discussed non-mandatory ASME Code Case OMN-1, "Alternative Rules for Preservice and Inservice Testing of Certain Electric Motor Operated Valve Assemblies in LWR Power Plants, OM Code 1995 Edition; Subsection ISTC," which allows the replacement of ASME Code requirements for MOV quarterly stroke-time testing with exercising of safety-related MOVs at least once per operating cycle and periodic MOV diagnostic testing on a frequency to be determined on the basis of margin and degradation rate. In GL 96-05, the NRC staff stated that the method in OMN-1 meets the intent of the generic letter with certain limitations. The NRC staff also noted in GL 96-05 that licensees remain bound by the requirements in their code of record regarding MOV stroke-time testing, as supplemented by relief requests approved by the NRC staff.

In GL 96-05, licensees were requested to submit the following information to the NRC:

a. Within 60 days from the date of GL 96-05, a written response indicating whether or not the licensee would implement the requested actions; and

b. Within 180 days from the date of GL 96-05, or upon notification to the NRC of completion of GL 89-10 (whichever is later), a written summary description of the licensee's MOV periodic verification program.

The NRC staff is preparing an SE on the response of each licensee to GL 96-05. The NRC staff intends to rely to a significant extent on an industry initiative to identify valve age-related degradation which could adversely affect the design-basis capability of safety-related MOVs (described in Section 3.0) where a licensee commits to implement that industry program. The NRC staff will conduct inspections to verify the implementation of GL 96-05 programs at nuclear power plants as necessary.

3.0 JOINT OWNERS GROUP PROGRAM ON MOV PERIODIC VERIFICATION

In response to GL 96-05, the Boiling Water Reactor Owners Group (BWROG), Westinghouse Owners Group (WOG), and Combustion Engineering Owners Group (CEOG) jointly developed an MOV periodic verification program to obtain benefits from the sharing of information between licensees. The Joint Owners Group (JOG) Program on MOV Periodic Verification is described by the BWROG in its Licensing Topical Report NEDC-32719, "BWR Owners' Group Program on Motor-Operated Valve (MOV) Periodic Verification," and described by the WOG and the CEOG in their separately submitted Topical Report MPR-1807, "Joint BWR, Westinghouse and Combustion Engineering Owners' Group Program on Motor-Operated Valve (MOV) Periodic Verification." The stated objectives of the JOG program on MOV Periodic Verification are (1) to provide an approach for licensees to use immediately in their GL 96-05 programs; (2) to develop a basis for addressing the potential age-related increase in required thrust or torque under dynamic conditions; and (3) to use the developed basis to confirm, or if necessary to modify, the applied approach. The specific elements of the JOG program are (1) providing an "interim" MOV periodic verification program for applicable licensees to use in response to GL 96-05; (2) conducting a dynamic testing program over the next 5 years to identify potential age-related increases in required thrust or torque to operate gate, globe, and butterfly valves under dynamic conditions; and (3) evaluating the information from the dynamic testing program to confirm or modify the interim program assumptions.

The JOG interim MOV periodic verification program includes (1) continuation of MOV stroke-time testing required by the ASME Code IST program; and (2) performance of MOV static diagnostic testing on a frequency based on functional capability (age-related degradation margin over and above margin for GL 89-10 evaluated parameters) and safety significance. In implementing the interim MOV static diagnostic test program, licensees will rank MOVs within the scope of the JOG program according to their safety significance. The JOG program specifies that licensees need to justify their approach for risk ranking MOVs. In Topical Report NEDC 32264, "Application of Probabilistic Safety Assessment to Generic Letter 89-10 Implementation," the BWROG described a methodology to rank MOVs in GL 89-10 programs with respect to their relative importance to core-damage frequency and other considerations to be added by an expert panel. In an SE dated February 27, 1996, the NRC staff accepted the BWROG methodology for risk ranking MOVs in boiling water reactor nuclear plants with certain conditions and limitations. In the NRC's SE (dated October 30, 1997) on the JOG Program on MOV Periodic Verification, the NRC staff indicated its view that the BWROG methodology for MOV risk ranking is appropriate for use in response to GL 96-05. With respect to Westinghouse-designed pressurized water reactor nuclear plants, the WOG prepared Engineering Report V-EC-1658, "Risk Ranking Approach for Motor-Operated Valves in Response to Generic Letter 96-05." On April 14, 1998, the NRC staff issued an SE accepting with certain conditions and limitations the WOG approach for ranking MOVs based on their risk

significance. Licensees not applicable to the BWROG or WOG methodologies need to justify their MOV risk-ranking approach individually.

The objectives of the JOG dynamic test program are to determine degradation trends in dynamic thrust and torque, and to use dynamic test results to adjust the test frequency and method specified in the interim program if warranted. The JOG dynamic testing program includes (1) identification of conditions and features which could potentially lead to MOV degradation; (2) definition and assignment of valves for dynamic testing; (3) testing valves three times over a 5-year interval with at least a 1-year interval between valve-specific tests according to a standard test specification, (4) evaluation of results of each test; and (5) evaluation of collective test results.

In the last phase of its program, the JOG will evaluate the test results to validate the assumptions in the interim program to establish a long-term MOV periodic verification program to be implemented by licensees. A feedback mechanism will be established to ensure timely sharing of MOV test results among licensees and to prompt individual licensees to adjust their own MOV periodic verification program, as appropriate.

Following consideration of NRC staff comments, the BWROG submitted Licensing Topical Report NEDC-32719 (Revision 2) describing the JOG program on July 30, 1997. Similarly, the CEOG and the WOG submitted Topical Report MPR-1807 (Revision 2) describing the JOG program on August 6 and 12, 1997, respectively. On October 30, 1997, the NRC staff issued an SE accepting the JOG program with certain conditions and limitations as an acceptable industry-wide response to GL 96-05 for valve age-related degradation.

4.0 MILLSTONE UNIT 2 GL 96-05 PROGRAM

On November 15, 1996, the licencee submitted a 60-day response to GL 96-05 notifying the NRC that it would implement the requested MOV periodic verification program at Millstone Unit 2. On March 17, 1997, the licensee submitted a 180-day response to GL 96-05 providing a summary description of the MOV periodic verification program. In a letter dated February 11, 1999, the licensee informed the NRC of its revision of commitments previously submitted in response to GL 96-05. On May 24, 1999, the licensee updated its commitment to GL 96-05, and provided a response to a request for additional information regarding GL 96-05 forwarded by the NRC staff on March 23, 1999. In a telephone conference with the NRC staff on August 2, 1999, the licensee clarified several aspects of its GL 96-05 program.

In its letter dated March 17, 1997, the licensee described its MOV periodic verification program, including scope, testing, and implementation of the JOG program at Millstone Unit 2. In its letter dated February 11, 1999, the licensee revised several GL 96-05 commitments to (1) establish a degradation rate for operating requirements and actuator output by Refueling Outage (RFO) 13 scheduled for Fall 2000; (2) develop a detailed tracking and trending program for all GL 96-05 MOVs by RFO 13; (3) evaluate test data to support MOV test frequencies beyond 5 years by RFO 13; and (4) rely on Electric Power Research Institute (EPRI) MOV Performance Prediction Methodology (PPM) (rather than another methodology) in sizing and setting gate valves. In its letter dated May 24, 1999, the licensee committed to continue its participation in the JOG MOV Periodic Verification Program as a member of the CEOG and to

implement the program elements described in the Topical Report MPR-1807 (Revision 2) with two exceptions (discussed in Section 5.4 of this SE). The licensee stated that adjustments would be made to its GL 96-05 program based on the test results and recommendations from the JOG testing program. In a telephone conference with the NRC staff on August 2, 1999, the licensee stated that it would notify the NRC of, and justify, any significant deviations from the JOG program.

5.0 NRC STAFF EVALUATION

The NRC staff has reviewed the information provided in the licensee's submittals describing the program to periodically verify the design-basis capability of safety-related MOVs at Millstone Unit 2 in response to GL 96-05. NRC Inspection Report 50-336/98-04 (IR 98-04) provided the results of inspections to evaluate the licensee's program to verify the design-basis capability of safety-related MOVs in response to GL 89-10. The staff closed the review of the GL 89-10 program at Millstone Unit 2 in IR 98-04 based on verification of the design-basis capability of safety-related MOVs at Millstone Unit 2 and several specific actions planned by the licensee. The staff's evaluation of the licensee's response to GL 96-05 is described below.

5.1 MOV Program Scope

In GL 96-05, the NRC staff indicated that all safety-related MOVs covered by the GL 89-10 program should be considered in the development of the MOV periodic verification program. The staff noted that the program should consider safety-related MOVs that are assumed to be capable of returning to their safety position when placed in a position that prevents their safety system (or train) from performing its safety function; and the system (or train) is not declared inoperable when the MOVs are in their nonsafety position.

In its letter dated November 15, 1996, the licensee committed to implement the requested MOV periodic verification program at Millstone Unit 2 in response to GL 96-05 and did not take exception to the scope of the generic letter. The staff considers the licensee to have made adequate commitments regarding the scope of its MOV program. The licensee will be responsible for justifying any deviations from the recommended scope of GL 96-05 at Millstone Unit 2.

5.2 MOV Assumptions and Methodologies

The NRC staff expects licensees to maintain the assumptions and methodologies used in the development of its MOV programs for the life of the plant (a concept commonly described as a "living program"). For example, the design basis of safety-related MOVs will need to be maintained up to date, including consideration of any plant modifications or power uprate conditions.

In IR 98-04, the NRC staff reviewed the licensee's justification for the assumptions and methodologies used in the MOV program in response to GL 89-10 at Millstone Unit 2. With certain long-term items discussed in the following section, the staff determined that the licensee had adequately justified the assumptions and methodologies used in its MOV program.

The licensee's letter dated May 24, 1999, indicated ongoing activities, such as review of motor actuator output, to update its MOV program assumptions and methodologies. The staff considers the licensee to have adequate processes in place to maintain the assumptions and methodologies used in its MOV program, including the design basis of its safety-related MOVs.

5.3 GL 89-10 Long-Term Items

When evaluating the GL 89-10 program at Millstone Unit 2, the NRC staff discussed in IR 98-04 several items to be addressed by the licensee's MOV program. In its letter dated May 24, 1999, the licensee reported on the status of those long-term GL 89-10 aspects. The licensee stated that it has (1) statically tested MOVs 2-FW-38A and 2-FW-42A/B and verified that their static stem coefficients of friction were less than assumed in thrust calculations; (2) dynamically tested 2-FW-44 and verified that test results bounded the assumptions made in the design calculation; (3) revised the dynamic test evaluation forms used for gate and globe valves to require that load sensitive behavior and stem friction coefficient analyses be updated when in-plant dynamic tests are performed; (4) dynamically tested 2-MS-464 but could not measure valve factor because of a sensor malfunction; and (5) reevaluated the need to dynamically test valves 2-MS-201 and 2-MS-202 and determined that dynamic testing is not required following modifications to increase their capability to meet EPRI MOV PPM predicted thrusts. The licensee stated that it plans to (1) reevaluate the ability to dynamically test 2-MS-65A/B under blowdown conditions and determine an alternative plan if this testing is not practicable, (2) dynamically retest 2-MS-464 in order to obtain the actual valve factor; and (3) work with industry to determine the appropriate modeling approach for gate valves with inverted guides and to validate the sliding coefficient of friction use for certain types of Stellite.

The NRC staff completed the review of the licensee's actions in response to GL 95-07, "Pressure Locking and Thermal Binding of Safety-Related Power-Operated Gate Valves," in an SE dated January 13, 1998.

NRC Inspection Report 50-423/98-82 for Millstone Unit 3 provided the results of the inspection to evaluate the Unit 3 MOV tracking and trending program. During the inspection, the staff concluded that MOV Program PI-16, "MOV Periodic Testing, Periodic Verification, and Tracking and Trending Program," included appropriate guidance for the development of a detailed tracking and trending program, such as key parameters (e.g., unseating thrust/torque, running load, and motor current) to be monitored for assessing MOV performance. MOV Program PI-16 is also applicable to Millstone Unit 2 and in its submittal dated February 11, 1999, the licensee stated that the development of a detailed tracking and trending program would be completed by RFO 13. In its submittal dated May 24, 1999, the licensee provided information on its trending of performance parameters to evaluate motor actuator capabilities. Motor current and stem factor are examples of MOV parameters that are trended. The licensee will be expected to provide trending of qualitative and quantitative MOV performance parameters.

With the licensee's ongoing MOV activities and trending program, no outstanding issues regarding the licensee's GL 89-10 program remain at Millstone Unit 2.

5.4 JOG Program on MOV Periodic Verification

In its letter dated May 24, 1999, the licensee updated its commitment to implement the JOG Program on MOV Periodic Verification as described in Topical Report MPR-1807 (Revision 2) with two exceptions. The licensee's first exception to Topical Report MPR-1807 involves the classification of high margin valves when using the EPRI MOV PPM to size and setup actuators. The licensee used the EPRI MOV PPM for some MOVs as "best available" information, although it was not fully applicable. The NRC staff views this to be a clarification of the topical report in lieu of an exception, and considers that this clarification is acceptable in instances where the EPRI MOV PPM provides the "best available" information and plans are in place to resolve the applicability question. In the May 24, 1999, letter, the licensee stated that it has an action plan in place to validate the "best available" data assumptions used in Millstone Unit 2 design-basis calculations. In its second exception to the JOG program, the licensee stated that it will initially follow the interim static test frequency established by the JOG program, but may increase or decrease the static test frequencies as necessary based on the information obtained from Millstone static test data combined with information obtained from the JOG program. The NRC staff is not accepting this exception. In the telephone conference with the NRC staff on August 2, 1999, the licensee stated that it would notify the NRC of, and justify, any significant deviations from the JOG program.

In an SE dated October 30, 1997, the NRC staff accepted the JOG program as an industry-wide response to GL 96-05 with certain conditions and limitations. The commitment to implement the JOG program includes (1) the JOG interim static diagnostic test program; (2) the JOG 5-year dynamic test program; and (3) the JOG long-term periodic test program. The staff considers the commitments by the licensee to implement the JOG program at Millstone Unit 2 to be an acceptable response to GL 96-05 for valve age-related degradation. The staff considers the licensee's commitment to include all three phases of the JOG program. The licensee is responsible for reviewing and implementing the conditions and limitations discussed in the NRC's SE dated October 30, 1997, in applying the JOG program at Millstone Unit 2. If the licensee proposes to implement an approach at Millstone Unit 2 different from the JOG program (for example, a different interim static test program), the NRC staff will evaluate the proposed alternative approach.

In its letter dated March 17, 1997, the licensee noted that the interim MOV static diagnostic testing under the JOG program would be performed on a test frequency based on the safety significance and functional capability of each GL 96-05 MOV. In the May 24, 1999, letter, the licensee indicated that the current MOV ranking method at Millstone Unit 2 is based on the same qualitative criteria that had been applied to valves in the GL 89-10 program. The licensee stated that it planned to revise the MOV ranking method and apply the MOV risk-ranking approach and results presented in the WOG Engineering Report V-EC-1658-A by June 30, 2000. The licensee indicated that high-risk MOVs in other Combustion Engineering- designed plants would be used for comparison when determining the Millstone Unit 2 high-risk MOVs and that input from an expert panel needs to be incorporated into the updated method to evaluate risk significance. The license is responsible for reviewing and implementing the conditions and limitations discussed in the NRC's SE dated April 14, 1998, on the WOG methodology for ranking MOVs by their safety significance. Based on the licensee's plans, the staff considers the licensee's approach to updating its risk ranking MOVs at Millstone Unit 2 to be acceptable.

In its letter dated May 24, 1999, the licensee stated that, in the long term, it plans to use diagnostic methods that acquire data from the motor control center (MCC) when stroking an MOV under static conditions and will confirm the adequacy of motor power analysis by comparing it with simultaneously obtained strain gauge test results. If results are successful, the licensee may solely use motor power analysis during future static diagnostic testing. The NRC staff considers that the application of test data obtained from the MCC to its GL 96-05 program is acceptable provided that the licensee is able to address the following issues as applicable to its use of MCC test data: (1) the correlation between new MCC test data and existing direct MOV data measurements; (2) the relationship between changes in MCC test data and MOV thrust and torque performance; (3) system accuracies and sensitivities to MOV degradation for both outputs and operating performance requirements; and (4) validation of MOV operability using MCC testing.

The JOG program is intended to address most gate, globe, and butterfly valves used in safety-related applications in the nuclear power plants of participating licensees. The JOG indicates that each licensee is responsible for addressing any MOVs outside the scope of applicability of the JOG program. In the NRC's SE dated October 30, 1997, the NRC staff specifies that licensees implementing the JOG program must determine any MOVs outside the scope of the JOG program (including service conditions) and justify a separate program for periodic verification of the design-basis capability of those MOVs. The NRC staff recognizes that the JOG has selected a broad range of MOVs and conditions for the dynamic testing program. Consequently, the NRC staff expects significant information to be obtained on the performance and potential degradation of safety-related MOVs during the interim static diagnostic test program and the JOG dynamic test program. As the test results are evaluated, the JOG might include or exclude additional MOVs with respect to the scope of its program. Although the test information from the MOVs in the JOG dynamic test program might not be adequate to establish a long-term periodic verification program for each MOV outside the scope of the JOG program, sufficient information should be obtained from the JOG dynamic test program to identify any immediate safety concern for potential valve age-related degradation during the interim period of the JOG program. Therefore, the NRC staff considers it acceptable for the licensee to apply its interim static diagnostic test program to GL 96-05 MOVs that currently might be outside the scope of the JOG program with the feedback of information from the JOG dynamic test program to those MOVs. Upon completion of the JOG dynamic test program and development of the JOG long-term MOV periodic verification criteria, the licensee will be expected to establish a long-term MOV periodic verification program for those MOVs outside the scope of the JOG program by applying information from the JOG program or additional dynamic tests, as necessary.

5.5 Motor Actuator Output

The JOG program focuses on the potential age-related increase in the thrust or torque required to operate valves under their design-basis conditions. In the NRC's SE dated October 30, 1997, on the JOG program, the NRC staff specifies that licensees are responsible for addressing the thrust or torque delivered by the MOV motor actuator and its potential degradation. Although the JOG does not plan to evaluate degradation of motor actuator output, significant information on the output of motor actuators will be obtained through the interim MOV static diagnostic test program and the JOG dynamic test program.

In its letter dated May 24, 1999, the licensee indicated that it plans to ensure adequate actuator output capability for safety-related MOVs at Millstone Unit 2 to perform their design-basis functions by a combination of MOV activities. First, the licensee will monitor stem friction coefficient changes through the use of as-found static and dynamic diagnostic testing. This testing is used to trend MOV performance parameters to allow assurance of acceptable margins. Second, the licensee will monitor actuator gearbox efficiency degradation by torque input and output measurements. Third, the licensee will sample gearbox grease to evaluate the condition of the actuator internals and to determine appropriate actuator overhaul cycles. The staff notes that several parameters can be obtained during MOV static and dynamic diagnostic testing to help identify motor actuator output degradation when opening and closing the valve including, as applicable, capability margin, thrust and torque at control switch trip, stem friction coefficient, load sensitive behavior, and motor current.

In Technical Update 98-01 and its Supplement 1, Limitorque Corporation provided updated guidance for predicting the torque output of its ac-powered motor actuators. In IR 98-04, the NRC staff reported on the actions by the licensee to respond to the Limitorque technical update. The licensee was already using actuator pullout efficiency and a 0.9 application factor and, therefore, focused on motor actuator configurations identified in the technical update as needing special attention. The inspectors did not identify any concerns with the licensee's approach. In its letter dated May 24, 1999, the licensee reported that it has dynamometer-tested all of the ac motors that were identified in the technical update as possibly not providing their full name plate rated output torque. These test results were incorporated into the actuator output calculations to conservatively estimate actuator output capability. The NRC staff notes that the licensee is responsible for resolving any MOV operability concerns in accordance with regulatory and plant-specific requirements.

In its letter dated July 17, 1998, forwarding Technical Update 98-01, Limitorque indicated that a future technical update will be issued to address the application of dc-powered MOVs. In the telephone conference with the NRC staff on August 2, 1999, the licensee stated that there was one dc-powered motor actuator in the Millstone Unit 2 GL 96-05 program and that its output has been calculated using pullout efficiency, nameplate rated motor torque output, and a 0.9 application factor. The licensee is also following an industry effort to evaluate dc-powered MOV performance and will address any new guidance for predicting dc-powered MOV output.

The NRC staff considers the licensee to be establishing sufficient means to monitor MOV motor actuator output and its potential degradation.

6.0 CONCLUSION

On the basis of this evaluation, the staff finds that the licensee has established an acceptable program to verify periodically the design-basis capability of the safety-related MOVs at Millstone Unit 2. Therefore, the staff concludes that the licensee has adequately addressed the actions requested in GL 96-05. The staff may conduct inspections to verify that the implementation of the MOV periodic verification program is in accordance with the licensee's commitments; this NRC SE; the NRC's SE dated October 30, 1997, on the JOG Program on MOV Periodic Verification; and (as applied by the licensee for this Combustion Engineering-design plant) the NRC's SE dated April 14, 1998, on the WOG methodology for ranking MOVs by their safety significance.

Principal Contributors: T. Scarbrough, NRR
S. Tingen, NRR

Date: August 30, 1999

the actions requested in GL 96-05. The NRC staff may conduct inspections at Millstone Unit 2 to verify the implementation of the MOV periodic verification program is in accordance with the licensee's commitments.

This completes the NRC staff efforts and closes TAC No. M97068.

Sincerely,

ORIGINAL SIGNED BY:

Ronald B. Eaton, Sr. Project Manager, Section 2
Project Directorate I
Division of Licensing Project Management
Office of Nuclear Reactor Regulation

Docket No. 50-336

Enclosure: As stated

cc w/encl: See next page

DISTRIBUTION:

Docket File	PDI-2 /rf	T.Clark	REaton
J. Clifford	PUBLIC	RScholl (RFS)	OGC
ACRS	JLinville. RI		

Document Name: G:\PDI-2\Millstone2\m97068.wpd

OFC	PM/PDI-2	LA/PDI-2	OGC	SC/PDI-2
NAME	REaton/eh	TClark		JClifford
DATE	8/30/99	8/30/99	/99	8/30/99
COPY	YES/NO	YES/NO	YES/NO	YES/NO

OFFICIAL RECORD COPY