Tennessee Valley Authority, 1101 Market Street, Chattanooga, Tennessee 37402-2801

December 13, 2002

11/22/02
67 FR 70468
(4)

U.S. Nuclear Regulatory Commission
ATTN: Mr. Michael T. Lesar, Chief
Rules and Directives Branch
Mail Stop T6-D59
Washington, D.C. 20555-0001

Dear Mr. Lesar:

FEDERAL REGISTER (FR) NOTICE SOLICITATION OF PUBLIC COMMENTS ON THE THIRD YEAR OF IMPLEMENTATION OF THE REACTOR OVERSIGHT PROCESS (ROP) (67 *FR* 70468)

TVA appreciates the opportunity to provide comments on the third year of implementation of the ROP. In general, TVA has found that the ROP has led to improved performance. The ROP also provides for more objective performance assessments, as documented in the inspection reports and annual assessment summary. Most importantly, TVA notes that NRC's implementation of the ROP exhibits the key elements of a continuous learning organization. TVA notes that there are some opportunities for additional ROP improvements that warrant action and has provided specific comments in the enclosure to this letter. The comments are formatted in response to the specific questions provided in the *FR* notice. TVA also recognizes that there will be additional issues to address from the lessons learned from the Davis-Besse problems. TVA will continue to monitor developments in this area and provide any comments or suggestions through the Nuclear Energy Institute's ROP task force.

Sincerely,

Mark J. Burzynski

Mark J. Burzynski
Manager
Nuclear Licensing

Enclosure
cc: See page 2

Template = ADM-013

E-RIDS = ADM-03
Cod = M. Manley (MSM3)

cc (Enclosure):
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ENCLOSURE

TVA Comments on 3rd Year of the Reactor Oversight Process

Questions Related to Specific Reactor Oversight Process (ROP) Program Areas

1. Does the Performance Indicator (PI) Program minimize the potential for licensees to take actions that adversely impact plant safety?

   Yes. The PI Program motivates licensees to improve performance in the cornerstone areas. In fact, it has led to improved performance in all strategic areas. Specifically, improving trends for the industry are evident for the following performance indicators:

   - Unplanned Power Changes (Initiating Events Cornerstone)
   - High Pressure Coolant Injection Safety System Unavailability (Mitigating Systems Cornerstone)
   - Reactor Core Isolation Cooling Safety System Unavailability (Mitigating Systems Cornerstone)
   - Safety System Functional Failures (Mitigating Systems Cornerstone)
   - Emergency Response Organization Drill Participation (Emergency Preparedness Cornerstone)
   - Alert Notification System Reliability (Emergency Preparedness Cornerstone)
   - Occupational Exposure Control Effectiveness (Occupation Radiation Safety Cornerstone)
   - Protected Area Security Equipment Index (Physical Protection Cornerstone)

   One area to consider for improvement based on lessons learned from Davis-Besse is the Reactor Coolant System Leakage PI. It might be more useful to have the indicator based on unidentified leakage rather than identified leakage.

2. Does appropriate overlap exist between the PI Program and the Inspection Program?

   Yes. Appropriate overlap exists between the PI Program and the Inspection Program.

3. Do reporting conflicts exist, or is there unnecessary overlap between reporting requirements of the ROP and those associated with the Institute of Nuclear Power Operations (INPO), the World Association of Nuclear Operations (WANO), or the Maintenance Rule?

   There is duplication in the reporting to ROP and INPO/WANO that will be partially remedied with the introduction of the Consolidated Data Entry system being developed by INPO. There are differences in the reporting criteria between the different reporting systems. The differences in the Safety System Unavailability reporting criteria have created some interpretation problems. The use of the fault exposure time element in the NRC's PIs has led to some unnecessary supplemental inspections. The Mitigating System PIs that are currently being tested will remedy these regulatory problems. However, TVA remains concerned that the new indicators may result in additional burden associated with the risk analysis support for the new indicator methodology.

4. Does NEI 99–02, "Regulatory Assessment Performance Indicator Guideline" provide clear guidance regarding Performance Indicators?

   In general, NEI 99–02 provides clear guidance. The Frequently Asked Questions (FAQ) process is useful to get clarification when necessary. The efficiency of the FAQ process could be improved by having both NRC and NEI use a minimum threshold for FAQs to be processed to ensure that inappropriate FAQs are screened out before significant effort is invested in discussions. It would also be useful for NRC to establish a timeliness goal for FAQ resolution to monitor performance.

5. Is the information in the inspection reports useful to you?

   Yes. TVA finds that the quarterly report format used by Region II is more efficient. Effective application of finding threshold criteria minimizes ensures that the reports focus on significant issues. The use of the objective writing style has eliminated the search for the "hidden message" that was an element of the earlier oversight process.

   TVA suggests that NRC consider including a summary of the direct and indirect man-hours expended for each inspection module in the inspection reports. This information would help utilities budget for future inspection costs.

6. Does the Significance Determination Process (SDP) yield equivalent results for issues of similar significance in all ROP cornerstones?

   No. The non-green end points in the SDP logic for Emergency Preparedness, Occupation Radiation Safety, Public Radiation Safety, and Physical Protection Cornerstones are not consistent with the risk thresholds for the Initiating Events, Mitigating Systems, and Barrier Integrity Cornerstones. In general, they represent a deterministic escalation for various types of regulatory noncompliance. The yellow and red points are likely not comparable from a public risk (health and safety perceptive) than the risk-based thresholds. In general, TVA believes that the non-green thresholds overstate the significance of findings for Emergency Preparedness, Occupation Radiation Safety, Public Radiation Safety, and Physical Protection Cornerstones when compared to the thresholds for the Initiating Events, Mitigating Systems, and Barrier Integrity Cornerstones.

7. Does the NRC take appropriate actions to address performance issues for those licensees outside of the Licensee Response Column of the Action Matrix?

   TVA has found that NRC takes appropriate actions to address performance issues for those licensees outside of the Licensee Response Column of the Action Matrix. TVA also believes that the Action Matrix has sufficient flexibility to address issues in the necessary manner (e.g., Davis-Besse problems and Point Beach red finding).

   TVA suggests that NRC change the action level criteria from 2 to 3 white inputs in a cornerstone for a Degraded Cornerstone. This threshold for increased NRC involvement would be consistent with SDP rule to aggregate 3 adjacent scenarios to next higher color. Changing this threshold will eliminate unwanted effects of resistance to identification and/or over-analysis of a single white input.

8. Is the information contained in assessment reports relevant, useful, and written in plain English?

   The new format is brief and focused on objective performance measures. TVA has found the reports to be relevant, useful, and written in plain English. On the other hand, TVA has found the annual

meetings, as currently conducted and attended, to be of little value. TVA suggests that the annual meetings be eliminated for plants that are 'all green' if the current format is retained. As a separate thought, NRC should consider using the public meetings associated with the annual assessment reports as an opportunity to do more outreach/education work on the ROP. This approach would require a new format and better advertisement to increase public attendance.

Questions Related to the Efficacy of the Overall ROP

9. Are the ROP oversight activities predictable (*i.e.*, controlled by the process) and objective (*i.e.*, based on supported facts, rather than relying on subjective judgment)?

   TVA has found that inspection planning and schedule performance has continued to improve. Good performance in this area allows for better utility planning and resource utilization. Effective application of finding threshold criteria ensures that the reports focus on significant issues, which minimizes conflicts and promotes better resource utilization. The use of the objective writing style has eliminated the search for the "hidden message" that was an element of the earlier oversight process.

10. Is the ROP risk-informed, in that the NRC's actions are graduated on the basis of increased significance?

    The PI and SDP processes for the Initiating Events, Mitigating Systems, and Barrier Integrity Cornerstones are risk-informed. The PI and SDP processes for Emergency Preparedness, Occupation Radiation Safety, Public Radiation Safety, and Physical Protection Cornerstones are not based on similar risk thresholds. Instead, they are based on a deterministic escalation for various types of regulatory noncompliance. The yellow and red points are likely not comparable from a public risk (health and safety perceptive) than the risk-based thresholds. In general, TVA believes that the non-green thresholds overstate the significance of findings for Emergency Preparedness, Occupation Radiation Safety, Public Radiation Safety, and Physical Protection Cornerstones when compared to the thresholds for the Initiating Events, Mitigating Systems, and Barrier Integrity Cornerstones.

11. Is the ROP understandable and are the processes, procedures and products clear and written in plain English?

    Yes. The ROP is understandable and the processes, procedures, and products are clear and written in plain English. It is recognized that some of the SDP information does require a technical background to understand.

12. Does the ROP provide adequate assurance that plants are being operated and maintained safely?

    TVA believes that the ROP provides adequate assurance that nuclear plants are being operated and maintained safely. In particular, the ROP system provides incentives to improve performance, as evidenced by the improving trends for the PIs noted in response to Question 1. The ROP also provides for escalated NRC involvement, as outlined in the Action Matrix. The data on the NRC web site indicates that escalated involvement has occurred for several plants, when warranted, to ensure that appropriate actions are being taken to correct performance deficiencies. The ROP system provides the necessary flexibility to allow NRC to take the necessary actions to address unusual situations like the problems found at Davis-Besse.

13. Does the ROP improve the efficiency, effectiveness, and realism of the regulatory process?

The ROP is effective in improving performance in all strategic areas, as measured by the PIs. It is also effective at providing constructive escalation of NRC engagement in response to defined performance deficiencies. The ROP has made the oversight process more efficient by using the SDP to ensure that inspection findings focus on significant issues. Effective communication on inspection findings has minimized conflicts and allowed better utilization of NRC and utility resources. The new format reports are objective and present a realistic measure of performance. TVA has found the reports to be relevant, useful, and written in plain English. The use of the objective writing style has eliminated the search for the "hidden message" that was an element of confusion in the earlier process.

14. Does the ROP enhance public confidence?

The use of objective PIs and consistent application of finding threshold criteria serves to provide a consistent message to the public about nuclear plant performance. The objective writing style has eliminated the inconsistent messages that were evident in the earlier oversight process. NRC should consider using the public meetings associated with the annual assessment reports as an opportunity to do more outreach/education work on the reactor oversight process, as noted in response to Question 8.

The SDP information presents a special challenge when communicating with the public, since it does require a technical background for a full understanding. NRC has compounded the problem with the practice of assigning overly conservative preliminary finding colors to non-green findings. This practice seems to be particularly evident in Region III. The practice, while timely, only creates confusion in the public's mind. The preliminary colors can create an unwarranted level of concern about the operation of the nuclear plant. Any subsequent change in color provides critics with an opportunity to challenge the integrity of the oversight process and create doubt in the public's mind. NRC should reconsider the practice of issuing preliminary colors to findings when the risk analyses are not complete.

15. Has the public been afforded adequate opportunity to participate in the ROP and to provide inputs and comments?

TVA has found that NRC is open to stakeholder input to improve the ROP process and agency performance. In particular, TVA has had the opportunity to present its views and suggestions for improvement at several NRC-sponsored or NRC-attended events:

- NEI Licensing Forum on November 6, 2002
- Utility/NRC Interface Workshop in Region II on April 23, 2002
- RII ROP Lesson Learned Meeting on November 16, 2000
- NRC Region II ROP Pilot Feedback Session on October 25, 1999
- American Society for Quality 1999 Energy Conference on October 6, 1999
- Region II Licensing Counterparts Meeting on September 28, 1999

TVA has also participated in the NRC/NEI stakeholder meetings for the ROP since the initial pilot program. TVA was a participant on the Independent Performance Evaluation Panel convened to offer advice on the lessons learned from the ROP pilot program.

16. Has the NRC been responsive to public inputs and comments on the ROP?

TVA has found that NRC is open to stakeholder input and takes reasonable actions to improve the ROP process and agency performance. As noted above, TVA has participated in numerous forums to provide comments on the ROP. TVA has found that NRC has acted on a number of suggestions made in these various forums.

17. Has the NRC implemented the ROP as defined by program documents?

TVA agrees with Commissioner McGaffigan's assessment of the SDP implementation in Region III as described in COMEXM-01-0001. The practice of issuing preliminary non-green colors without completion of the phase 3 risk evaluation is not consistent with TVA's understanding of the relevant program documents. This practice has unintended consequences as described in response to Question 19. It also has a negative impact on public confidence as described in response to Question 14. NRC should reconsider the practice of issuing preliminary colors to findings when the risk analyses are not complete.

18. Does the ROP reduce unnecessary regulatory burden on licensees?

TVA has found that improvements in inspection planning and schedule performance allows for better utility planning and resource utilization. Effective application of finding threshold criteria ensures that the reports focus on significant issues, which minimizes conflicts and promotes better resource utilization.

19. Does the ROP result in unintended consequences?

The NRC practice of assigning overly conservative preliminary finding colors to non-green findings has unintended consequences. The practice creates confusion in the public's mind, including an unwarranted level of concern about the operation of the nuclear plant. Any subsequent change in color provides critics with an opportunity to challenge the integrity of the oversight process and create doubt in the public's mind. The preliminary non-green findings can also create unwarranted concerns in the financial markets, which can result in inappropriate financial costs to the utility. NRC should reconsider the practice of issuing preliminary colors to findings when the risk analyses are not complete.

The current action matrix criteria (2 white inputs) for a Degraded Cornerstone can have unintended consequences that result in resistance to identification and/or over-analysis of a single white input. TVA suggests that NRC change the action level criteria from 2 to 3 white inputs in a cornerstone for a Degraded Cornerstone.

20. Please provide any additional information or comments on other program areas related to the ROP.

TVA suggests that NRC continue its efforts to refine inspection scope, inspection frequency, and inspector-hour commitments based on experience. In particular, TVA supports efforts to integrate radiological controls inspections, improve coordination with outage activities, and adjust inspection hours expended. Because team inspections during outages can create a significant support burden due to assignment of key personnel to outage assignments, TVA suggests that outage inspections minimize program review elements and focus only on outage-related activities. TVA would also suggest that NRC look for additional ways to conduct single inspections for utility programs that are common to multiple sites (e.g., access authorization, fitness for duty, and environmental monitoring).

NRC needs better coordination of the improvement and validation efforts for the SDP phase 2 worksheet (round 2 validation), the SDP task force review, and the SPAR model validation efforts. NRC should develop an integrated improvement plan before too many resources are expended on these overlapping initiatives.

NRC should use the large base of experience with the Fire Protection SDP to make major simplifications. TVA suggests that NRC consider a simple scheme for the SDP: It is a green finding unless the problem involves high combustible loading and no sprinkler capability.