

MONTHLY STATUS REPORT ON THE
LICENSING ACTIVITIES AND REGULATORY DUTIES OF THE
UNITED STATES NUCLEAR REGULATORY COMMISSION

December 1999

Enclosure 1

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I. Implementing Risk-Informed Regulations

The staff continues to make progress on tasks in five general areas: Rulemaking and Generic Communications; Licensing Activities; Reactor Oversight (Inspection, Enforcement, and Licensee Performance Assessment); Events Assessment; and Probabilistic Risk Analysis Methods and Standards. Noteworthy accomplishments in the area of risk-informing regulations are summarized below:

Risk-informing NRC regulations applicable to nuclear power reactors was one of several subjects discussed during a December 16, 1999, Commission meeting with the NRC's external stakeholders. The meeting provided a forum for reactor licensees, public interest groups, and other NRC stakeholders to express their views, concerns, and recommendations regarding the use of risk-insights to NRC activities. These interactions and the insights from the various participants will be taken into consideration by the Commission and incorporated, as appropriate, into current NRC activities and plans.

As mentioned in our report for September 1999, the NRC has worked to revise its regulations to allow power reactor licensees to voluntarily adopt a revised source term for design basis accident analyses. In December 1999, the NRC issued the final rule change associated with the alternate source term. The alternative source term could reduce unnecessary or ineffective requirements in the facility design basis, thereby reducing unnecessary regulatory burden. It is believed that the final rule will result in an improvement in the allocation of resources both for the NRC and industry. Also, there is an expectation that many of the alternative source term applications may provide concomitant improvements in overall safety and in reduced occupational exposure, as well as economic benefits.

In December 1999, the staff issued its safety evaluation for a joint application report from the Combustion Engineering Owners Group to modify the technical specifications for the containment spray system. The proposed changes would allow an extension in the allowed outage time to 7 days for a single train of the containment spray system (a typical allowed outage time for the affected plants is currently 3 days). The approval of the proposed extension in allowed outage time for the containment spray system was based largely on the risk insights offered by the owners group and reduces the likelihood of unwarranted plant shutdowns. The review was performed in accordance with the NRC's standard review plan for risk-informed decision-making.

II. Revised Reactor Oversight Process

The staff has continued to meet on a biweekly basis with the Nuclear Energy Institute and other stakeholders to refine the proposed changes to its oversight processes. Recent activities include the following:

- With the completion of the pilot program at the end of November 1999, the Inspection Program Branch of the Office of Nuclear Reactor Regulation (NRR) staff is reviewing results of the revised reactor oversight process pilot program for lessons learned. The Inspection Program Branch staff attended the regional mid-cycle review meetings for all pilot plants. During these meetings the NRC staff reviewed the performance indicator data and plant issues matrix and made recommendations for future inspection activities in accordance with NRC's draft Inspection Manual Chapter 0305, "Operating Reactor Assessment Program."

- The NRC issued Regulatory Issue Summary 99-006, "Voluntary Submission of Performance Indicator Data," on December 1, 1999, to document the NRC's understanding that power reactor licensees would voluntarily submit to the NRC in January 2000, in electronic format, a historical report of selected reactor facility performance attributes, i.e., performance indicator data, for their reactor facilities. This voluntary exercise is a key element in preparing for initial implementation of the revised reactor oversight process at all reactor sites.
- As part of its ongoing effort to communicate with external stakeholders regarding the revised reactor oversight process, the NRC conducted roundtable public meetings conferences in the vicinity of two pilot plants in Nebraska (Ft. Calhoun and Cooper) on November 30, 1999, and December 1, 1999, respectively. At these meetings, the NRC staff discussed the new risk-informed oversight process with members of the local public and state and local officials and obtained their feedback on the process and the recently concluded pilot program. Roundtable conferences public meetings for the rest of the pilot plants will be completed by the end of January 2000.
- NRR managers and members of the Inspection Program Branch are continuing to interface with the NRC staff and stakeholders to discuss the revised reactor oversight process, answer questions, and obtain feedback. The NRC staff participated in the periodic Regional Division of Reactor Projects Directors' periodic meeting to discuss implementation issues with the oversight process pilot program, and other policy and program issues. The Chief of Inspection Program Branch attended the NRC and State Liaison Officers meeting on December 1, 1999, in Rockville, MD. At this meeting, the revised reactor oversight process and the results of the pilot program to the State representatives were discussed, and questions from participants were answered.
- The Technical Training Center conducted Revised Reactor Oversight Process Training sessions for NRC inspectors in Regions IV and III during the weeks of November 15, 1999, and December 6, 1999, respectively. The training will be completed for all inspectors in April 2000.
- The NRC's Pilot Program Evaluation Panel (PPEP) held its fourth meeting on December 8 and 9, 1999, to develop a report on its assessment of the pilot program and make its recommendation on going forward with initial implementation. The PPEP evaluated the pilot program results against preestablished pilot program success criteria. The results of the PPEP meeting including its report will be has been made available to the public.
- On November 22-23, 1999, headquarters and regional representatives conducted a feasibility review of the revised oversight event follow-up procedure/process including initial determination of agency response, analysis of the significance of identified issues, and identification of appropriate agency actions based on the action matrix. Recent events at several sites were selected for review. The staff's review indicated that the proposed revisions for risk informing the event follow-up procedure and process documents were adequate.
- Between November 15 and December 17, 1999, the Inspection Program Branch of NRR, assisted by regional inspectors, reviewed draft baseline inspection procedures used for the pilot program and revised them to appropriately incorporate comments received from the stakeholders.

III. Status of Issues in the Reactor Generic Issue Program

There are no changes in this area from the November 1999 report.

IV. Licensing Actions and Other Licensing Tasks

Licensing actions include requests for: license amendments, exemptions from regulations, relief from inspection or surveillance requirements, topical reports submitted on a plant-specific basis, notices of enforcement discretion, or other licensee requests requiring NRC review and approval before they can be implemented by the licensee. The FY 2000 NRC Performance Plan incorporates three output measures related to licensing actions. These are: size of the licensing action inventory, number of licensing action completions per year, and age of the licensing action inventory.

Other licensing tasks may be defined as: licensee responses to NRC requests for information through generic letters or bulletins, NRC responses to 2.206 petitions, NRC review of licensee topical reports, NRR responses to regional requests for assistance, and NRC review of licensee 10 CFR 50.59 analyses and Final Safety Analysis Report updates. The FY 2000 NRC Performance Plan incorporates one output measure related to other licensing tasks. This is: number of other licensing tasks completed.

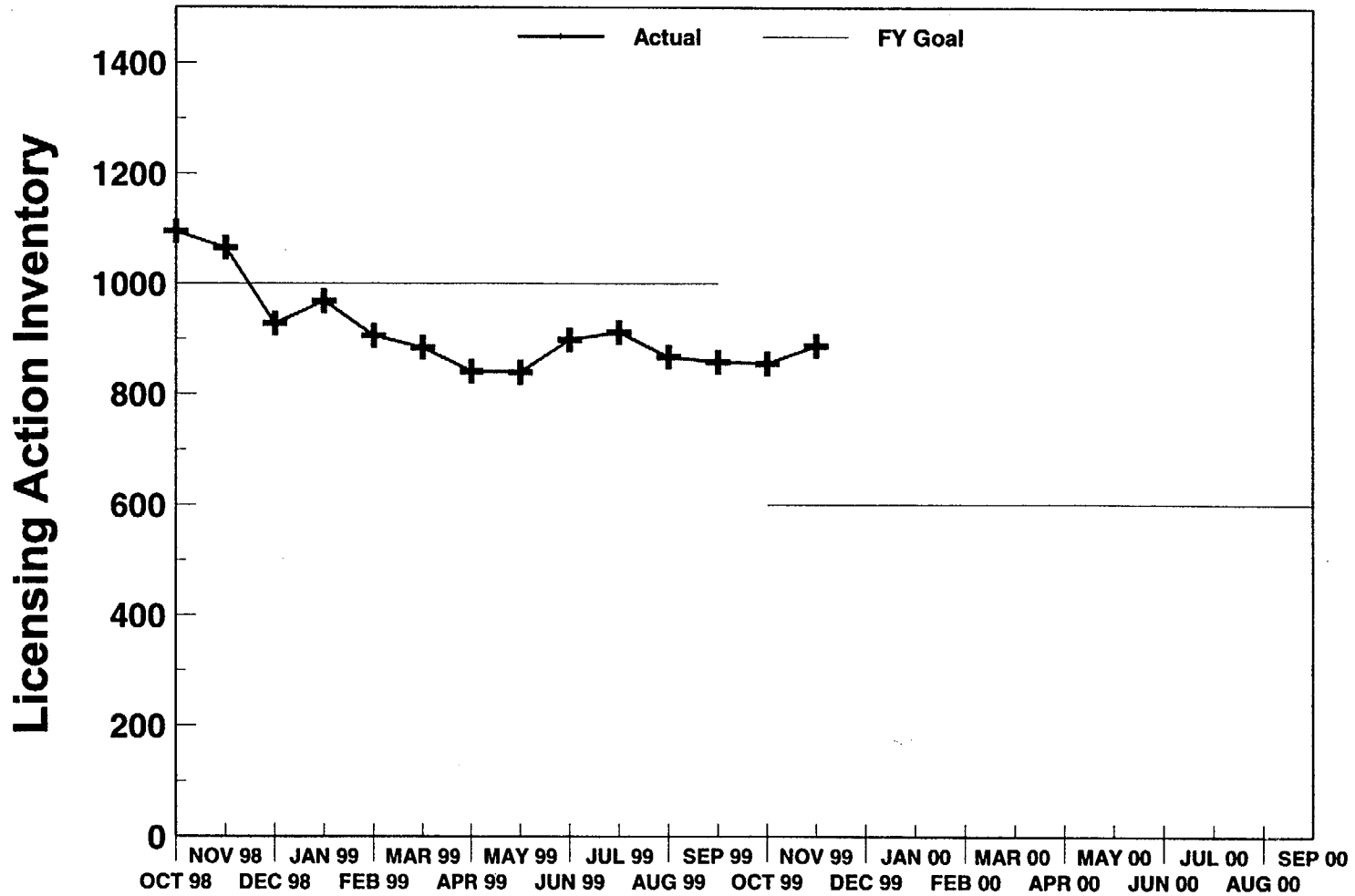
The actual FY 1998 and FY 1999 results, the FY 2000 goals and the actual FY 2000 results, through the end of November 1999, for the four NRC Performance Plan output measures for licensing actions and other licensing tasks are shown in the table below.

| PERFORMANCE PLAN | | | | |
|--------------------------------------|--|--|--|---|
| Output Measure | FY 1998 Actual | FY 1999 Actual | FY 2000 Goals | FY 2000 Actual (thru 11/31/99) |
| Licensing actions completed/year | 1425 | 1727 | 1500 | 212 |
| Size of licensing actions inventory | 1113 | 857 | 600 | 886 |
| Age of licensing action inventory | 65.6% ≤ 1 year; 86.0% ≤ 2 years; and 95.4% ≤ 3 years old | 86.2% ≤ 1 year; 100% ≤ 2 years; and 100% ≤ 3 years old | 95% ≤ 1 year and 100% ≤ 2 years old | 85.6% ≤ 1 year; 99.4% ≤ 2 years; and 100% ≤ 3 years old |
| Other licensing tasks completed/year | 1006 | 939 | 800 | 276 |

The following charts demonstrate NRC's progress in meeting the four licensing action and other licensing task output measure goals.

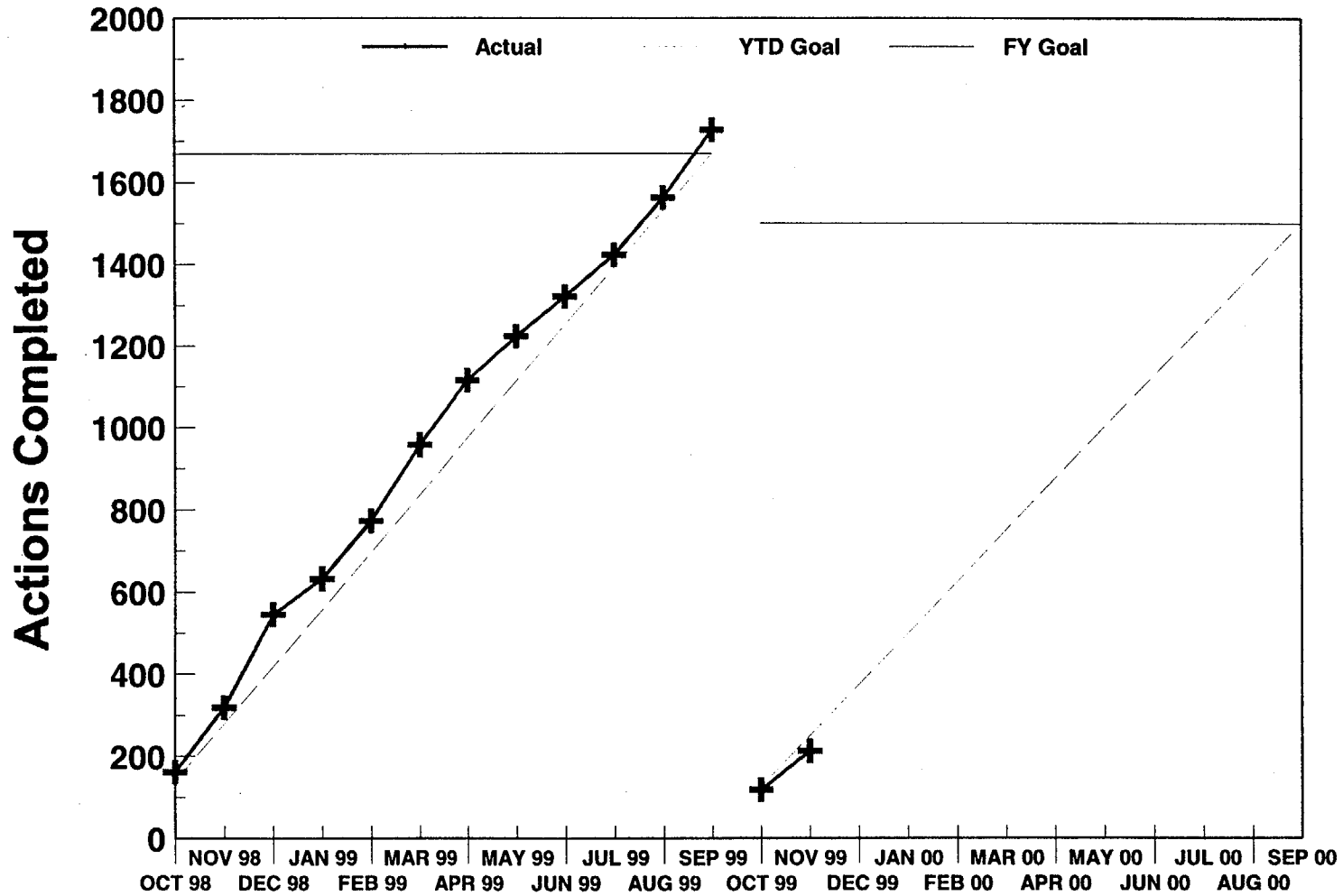
Nuclear Reactor Safety - Reactor Licensing

Performance Plan Target: Licensing Action Inventory



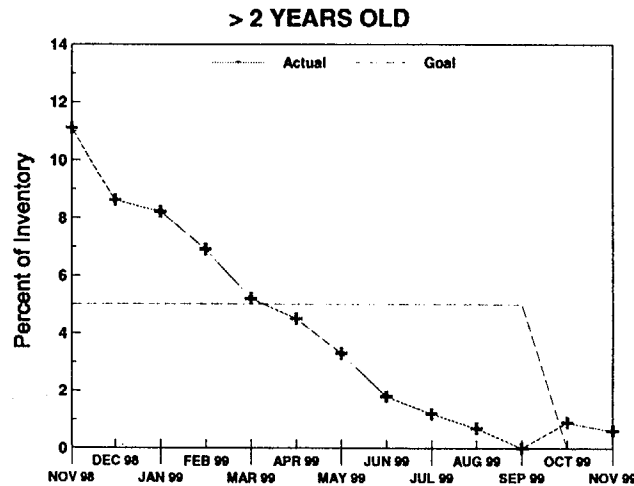
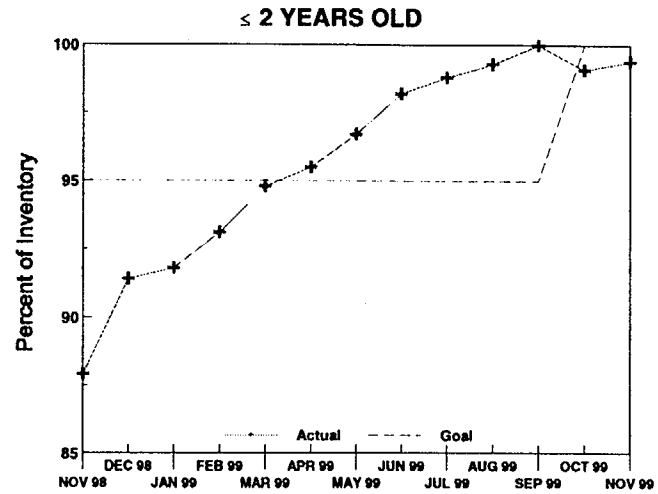
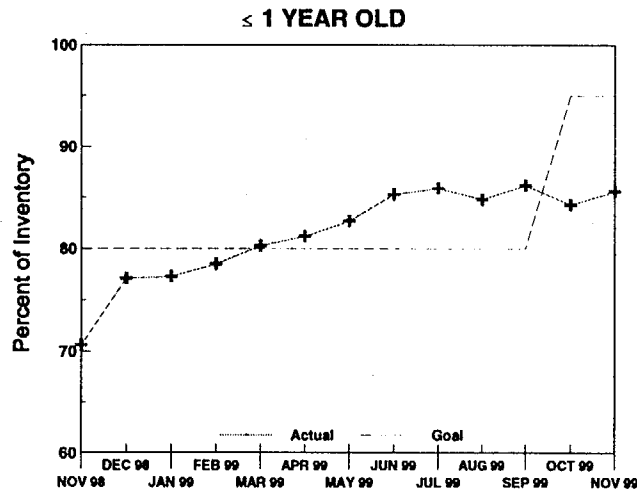
Nuclear Reactor Safety - Reactor Licensing

Performance Plan Target: Completed Licensing Actions



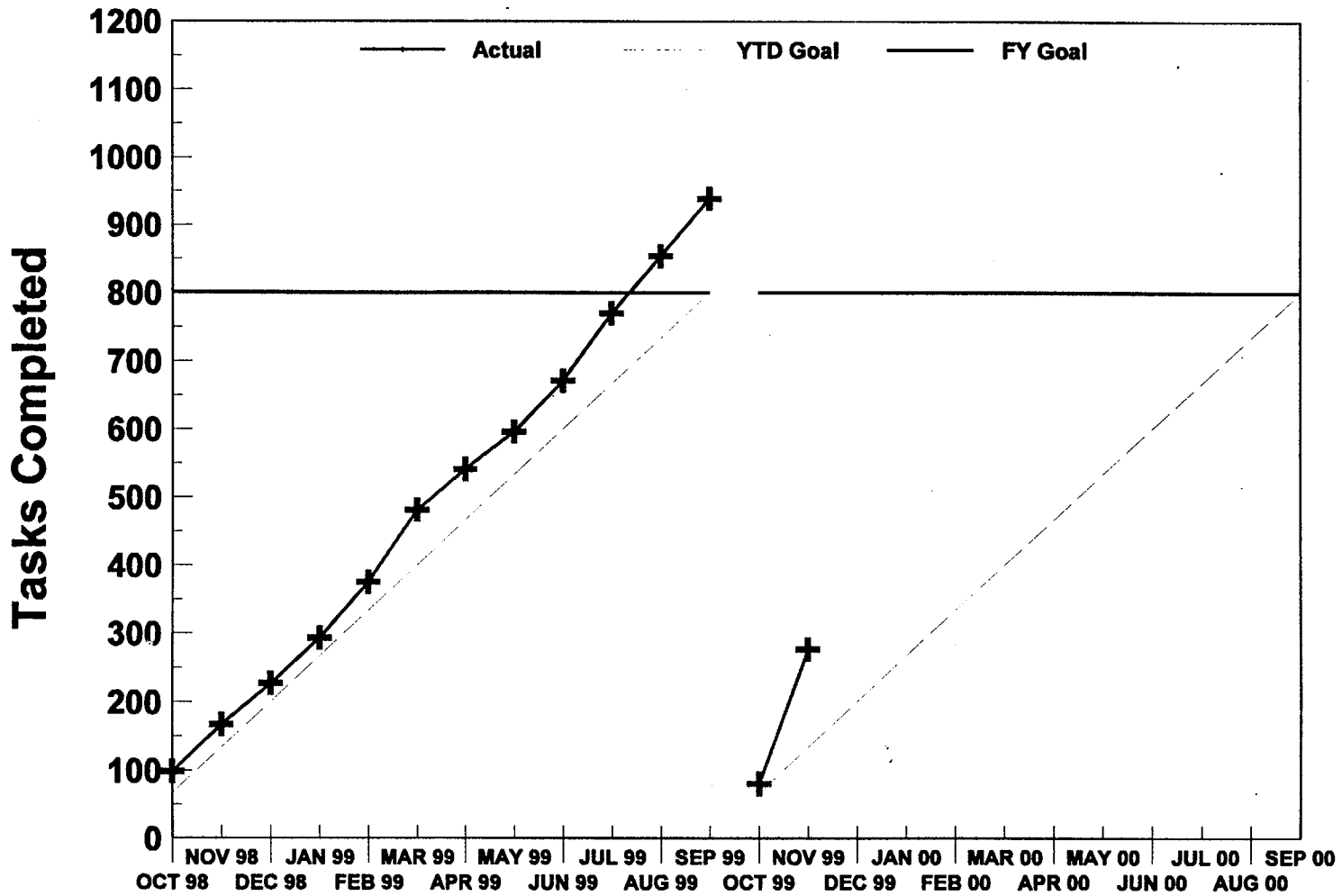
Nuclear Reactor Safety - Reactor Licensing

Performance Plan Target: Age of Licensing Action Inventory



Nuclear Reactor Safety - Reactor Licensing

Performance Plan Target: Completed Other Licensing Tasks



V. Status of Calvert Cliffs License Renewal Application

All activities associated with the review of the Calvert Cliffs license renewal application are on schedule. The NRC staff issued the final safety evaluation report (SER) on November 16, 1999, finding that there are no safety concerns preventing the NRC from extending the Calvert Cliffs licenses. On December 2, 1999, the staff and Baltimore Gas & Electric (BGE) representatives briefed the ACRS Full Committee regarding resolution of the open and confirmatory items. On December 10, 1999, the ACRS issued its recommendation to the Commission regarding the renewal of the Calvert Cliffs license based on its review of the license renewal application and SER, "Report on the Safety Aspects of the License Renewal Application for Calvert Cliffs Nuclear Power Plant Units 1 and 2." In its report (included in Chapter 5 of NUREG-1705), the ACRS stated that, on the basis of its review of the BGE license renewal application, the final SER, and the resolution of the open and confirmatory items identified in the SER, it concluded that BGE has properly identified the SSCs that are subject to aging management programs. Furthermore, the ACRS concluded that the programs instituted to manage aging-related degradation of the identified SSCs are appropriate and provide reasonable assurance that Calvert Cliffs Units 1 and 2 can be operated in accordance with its current licensing basis for the period of the extended license without undue risk to the health and safety of the public.

Similarly, the staff found in the final supplemental environmental impact statement issued on October 5, 1999, that the environmental impacts from renewal were not so adverse as to preclude renewing the Calvert Cliffs licenses.

A Commission decision on the issuance of the renewed licenses is scheduled for April 2000. On November 12, 1999, the United States Court of Appeals for the District of Columbia Circuit issued a decision remanding the Calvert Cliffs proceeding to the Commission for further action. However, on November 23, 1999, the court vacated its earlier judgement and accompanying majority opinion. In an order dated December 7, 1999, the court scheduled oral arguments to be heard on January 26, 2000.

VI. Status of Review of Private Fuel Storage, L.L.C.'s Application for a License to Operate an Independent Spent Fuel Storage Installation

During this reporting period, staff from the Spent Fuel Project Office held several meetings related to the ongoing review of the Private Fuel Storage (PFS), Limited Liability Corporation's license application. Three meetings were held in Utah. The Spent Fuel Project Office staff held a noticed public meeting with representatives of PFS, Limited Liability Corporation to discuss open issues associated with the staff's safety evaluation. The Spent Fuel Project Office staff also met with representatives of the Department of Interior's Bureau of Land Management and Bureau of Indian Affairs, and the Department of Transportation's Surface Transportation Board. The former two agencies are cooperating federal agencies in the development of the Environmental Impact Statement for this project. The latter agency is in the process of developing a memorandum of understanding with the staff, making it the third cooperating federal agency. The Surface Transportation Board approves construction of new rail lines. PFS is proposing the creation of a new rail line to transport spent fuel shipments from the existing mainline to the proposed site of the PFS Facility on the Reservation of the Skull Valley Band of Goshute Indians. The third meeting in Utah was between staff from the Spent Fuel Project Office

and the Director of the Air Force's Utah Test and Training Range and his staff at Hill Air Force Base in Ogden, Utah. In carrying out flight operations which utilize the Utah Test and Training Range, the Air Force uses military operating areas which include skies above Skull Valley, Utah and the reservation of the Skull Valley Band of Goshute Indians. The meeting concerned the amount and kinds of military air activity which might impact the proposed PFS Facility.

The Spent Fuel Project Office has completed the site-related Safety Evaluation Report (SER) for the PFS Facility. This SER addresses only those matters related to the site; it does not include the evaluation of the cask-specific or cask-dependent aspects of the Facility. The site SER identified open site-related items on seismicity and aircraft crash probability. The evaluation of these issues could not be completed because PFS did not provide sufficient information to resolve these issues to the staff's satisfaction prior to publication. The Spent Fuel Project Office staff will address current open items after all required information has been submitted and reviewed. The staff expects to issue a final SER in the fall of this year.

In its application, PFS, Limited Liability Corporation has proposed to use either (or both) of two new dual-purpose cask systems at its proposed facility. Neither of these cask systems is currently fully certified for use by NRC. When one of the cask designs has been fully certified, the application will have to be amended to include the approved cask design. Before the final SER for the Facility is issued, PFS, Limited Liability Corporation will have to demonstrate that this cask system is acceptable for use at the Facility under the site-specific license provisions of 10 CFR Part 72. This ensures that final SER and licensing basis for the Facility will include consideration of, at least, one certified dual-purpose cask system.

Litigation in the adjudicatory proceeding on the PFS, Limited Liability Corporation application continued during this reporting period. Hearings on the physical protection plan are scheduled for March 14-15, 2000. Hearings on safety issues will commence in June 2000, and hearings on environmental issues will be held in the year 2001.

VII. Summary of Reactor Enforcement by Region

| | | Reactor Enforcement Actions* | | | | |
|------------------|-------------|------------------------------|-----------|------------|-----------|-------|
| | | Region I | Region II | Region III | Region IV | TOTAL |
| Severity Level I | Nov.99 | 0 | 0 | 0 | 0 | 0 |
| | FY 2000 YTD | 0 | 0 | 0 | 0 | 0 |
| | FY 99 Total | 0 | 0 | 0 | 0 | 0 |
| | FY 98 Total | 0 | 0 | 0 | 0 | 0 |

| | | Reactor Enforcement Actions* | | | | |
|-----------------------------|-------------|------------------------------|-----|-----|-----|------|
| Severity Level II | Nov.99 | 0 | 1 | 0 | 0 | 1 |
| | FY 2000 YTD | 0 | 1 | 0 | 0 | 1 |
| | FY 99 Total | 5 | 0 | 2 | 0 | 7 |
| | FY 98 Total | 3 | 1 | 1 | 1 | 6 |
| Severity Level III | Nov.99 | 0 | 0 | 0 | 0 | 0 |
| | FY 2000 YTD | 1 | 0 | 1 | 1 | 3 |
| | FY 99 Total | 9 | 2 | 7 | 8 | 26 |
| | FY 98 Total | 46 | 11 | 15 | 19 | 91 |
| Severity Level IV | Nov.99 | 0 | 1 | 0 | 0 | 1 |
| | FY 2000 YTD | 0 | 1 | 0 | 0 | 1 |
| | FY 99 Total | 52 | 42 | 57 | 60 | 211 |
| | FY 98 Total | 383 | 271 | 392 | 261 | 1307 |
| Non-Cited Severity Level IV | Nov.99 | 35 | 13 | 32 | 44 | 124 |
| | FY 2000 YTD | 55 | 27 | 74 | 68 | 224 |
| | FY 99 Total | 343 | 267 | 334 | 305 | 1249 |
| | FY 98 Total | 372 | 240 | 307 | 214 | 1133 |

*Numbers of violations are based on enforcement action tracking (EATS) system data that may be subject to minor changes following verification. The number of Severity Level I, II, III listed refers to the number of Severity Level I, II, III violations or problems. The monthly totals generally lag by 30 days due to inspection report and enforcement development.

Description of Significant Actions (Severity Level I, II, III) taken in November 1999

**Commonwealth Edison Company, Zion Generating Station
Supplement VII (EA 98-518)**

A Notice of Violation and Proposed imposition of Civil Penalties in the amount of \$110,000 was issued for a Severity Level II violation on November 3, 1999. The violation involved employment discrimination in violation of the Commission's requirements in 10 CFR 50.7 (Employee Protection) by a Shift Operations Supervisor (SOS) against a Senior Reactor Operator (SRO)

who raised nuclear safety concerns. Specifically, as a result of the SRO's having recommended that a component cooling water pump be removed from service for troubleshooting because of an oil leak and raising a concern about the performance of a safety-related, diesel generator load sequencing timer, the SOS deferred the SRO's participation in the shift manager qualification process (which he had previously been instructed to begin by a prior SOS) and lowered the SRO's performance appraisal which had been prepared by the SRO's shift manager. At a pre-decisional enforcement conference, Commonwealth Edison (ComEd) representatives, including the SOS, presented information indicating that during 1997, ComEd management recognized a need to raise performance standards of the operating employees at the Zion Station and contended that the SRO was not ready to enter the shift manager development program and that the SRO exhibited performance problems. They also asserted that the SRO did not follow-up to obtain answers to his questions about the load sequencing timer. While ComEd representatives asserted that the actions taken against the SRO were for legitimate business reasons, the examples of the SRO's performance weaknesses cited by ComEd as the basis for the employment actions were related to the raising of nuclear safety concerns and were, therefore, protected. The NRC did not agree with ComEd that the SRO's handling of these safety-related concerns demonstrated the performance weaknesses asserted by ComEd. Because the Zion Station was the subject of escalated enforcement actions within the two years preceding this violation, the NRC considered whether credit was warranted for Identification and Corrective Action in accordance with the Enforcement Policy. Credit was not warranted for the Identification or Corrective Action factors because the NRC identified the violation and no corrective actions had been proposed to date.

VIII. Power Reactor Security Regulations

The NRC staff is continuing to work to risk-inform 10 CFR 73.55, "Requirements for physical protection of licensed activities in nuclear power reactors against radiological sabotage," and associated power reactor security regulations. The NRC staff transmitted a rulemaking plan to the Commission on October 5, 1999. On November 22, 1999, the Commission issued a Staff Requirement Memorandum (SRM) and approved the staff's rulemaking plan. The SRM also requires certain other actions by the staff. To accomplish the rulemaking and tasks required by the SRM, the staff held a public meeting on December 22, 1999, and will continue to hold public meetings with the stakeholders on a periodic basis. At the same time, the staff is working with the Nuclear Energy Institute on a voluntary industry program that will be conducted while the new regulation is being written.