



MISSISSIPPI POWER & LIGHT COMPANY

Helping Build Mississippi

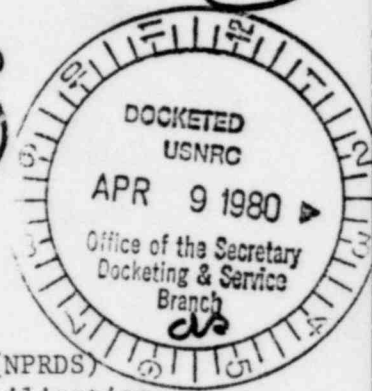
P. O. BOX 1640, JACKSON, MISSISSIPPI 39205

NORRIS L. STAMPLEY
VICE PRESIDENT

March 23, 1980

24

DOCKET NUMBER
PROPOSED BULL FR-50
(45 FR 6793)



Secretary of the Commission
U. S. Nuclear Regulatory Commission
Washington, DC 20555

Attention: Docketing and Service Branch

Gentlemen:

Re: Comments on Nuclear Plant Reliability Data System (NPRDS)
10 CFR 50 - Domestic Licensing of Production and Utilization
Facilities; Operational Data Gathering
(Federal Register Vol. 45, No. 21, Wednesday, 1/30/80)

Following are MP&L's comments on each of the 21 specific questions published in the referenced Federal Register regarding proposed rulemaking concerning NPRDS.

Mississippi Power & Light Company currently has under construction two 1250 MW Boiling Water Reactors at the Grand Gulf Nuclear Station near Port Gibson, Mississippi. Our commitment to the Nuclear Plant Reliability Data System (NPRDS) is based on expected realization of maximum plant safety, reliability and availability. We are developing a functional NPRDS program that will be used to achieve these goals. Our voluntary participation reflects a desire to provide our customers with the best assurance of minimizing their electric utility costs.

We feel that voluntary participation is the cornerstone to a successful, usable NPRDS program. We do not recommend any measures leading to mandatory participation and direct reportability by the utilities to the NRC. The current level of NPRDS funding by the NRC is adequate to allow them to express their concerns and desires. We welcome NRC recommendations as related to the use and function of the NPRDS and encourage the establishment of a data analysis group within the scope of the NPRDS coordinator.

In response to your request for comments and recommendations on specific considerations, we offer the following:

Question 1. How should NPRDS effort be apportioned between improving plant availability and improving plant safety? Where should the emphasis be?

Comment We believe that efforts to enhance plant availability will also result in improved plant safety. Using the NPRDS as the primary tool in identifying negative trends will enable us to plan corrective measures in advance of the threat of reduced plant safety or availability. The emphasis should be on timely analysis of plant data.

L-4-1/2/80

Acknowledged by card... 4-9-80

MISSISSIPPI POWER & LIGHT COMPANY

NRC Docketing and Service Branch
Comments on NPRDS
March 28, 1980
Page Two

Question 2. How should NPRDS data be used by industry, the public and the NRC to achieve this emphasis? What other uses, if any, should be made of NPRDS data?

Comment Part of the responsibility of the NPRDS coordinator should be data analysis. They have the complete data base from each participating utility. From it, they would be able to abstract significant information to be used by industry, the public and the NRC. As the program is set up now, special requests or uses by outside groups are available.

Question 3. How should NPRDS data be gathered and analyzed to facilitate recommended uses?

The current guidelines of the NPRDS Reporting Procedures Manual identify data gathering procedures. To facilitate recommended uses, establishment of a data analysis group within the NPRDS coordinator's scope should be undertaken. This analysis group would work with and provide data to the newly established Institute of Nuclear Power Operations (INPO) and Nuclear Safety Analysis Center (NSAC). Both INPO and NSAC are utility sponsored organizations and conduct activities specifically relating to data analysis.

Question 4. Who should alert appropriate persons concerning problems uncovered from analysis of NPRDS data? Who should initiate design, maintenance, or operating improvements?

Comment Identification of a problem uncovered during analysis of data at the utility level would result in our in-house procedures initiating design, maintenance or operating improvements. Corrective actions and improvements should be strictly on the initiative of the utility except in cases involving public safety.

Additionally, INPO and NSAC have the Significant Event Evaluation and Information Network (SEEIN), which is used to alert utilities and the industry to the results of their analysis.

Question 5. What systematic analysis is conducted currently by licensees and the public? To what extent and for what purpose should each licensee, the NRC and the public analyze data?

Comment As we are not yet on-line no comment is offered for the first part. The purpose of data analysis is to improve safety, reliability and availability as a result of identification of negative trends or patterns. Other significant purposes are to optimize surveillance and testing schedules, improve spare parts management and reduce plant licensing times.

MISSISSIPPI POWER & LIGHT COMPANY

NRC Docketing and Service Branch
Comments on NPRDS
March 28, 1980
Page Three

Question 6. If NPRDS reporting is made mandatory, what form of NPRDS management (i.e. industry, NRC or joint industry/NRC) will best lead to fully responsive reporting and to meaningful analysis?

Comment (Combined response with Question 7.)

Question 7. To what extent, if any, should the NRC manage NPRDS reporting and data analysis?

Comment (6 & 7) Responsive reporting and meaningful analysis would be best achieved by industry management through the NPRDS coordinator. They would work with the recently established NRC Office for Analysis and Evaluation of Operational Data to establish guidelines for utility participation. The NRC is represented on the ANSI N18-20 Subcommittee which provides them a mechanism for constructive input to the NPRDS.

Question 8. If NPRDS reporting is made mandatory, how should the NRC inspect and enforce mandatory licensee participation? Should licensees be subject to enforcement penalties for noncompliance with NPRDS requirements?

Comment If made mandatory, the NRC could determine the extent of a utility's participation through inspection of the base data received by the NPRDS coordinator for that utility. If found insufficient, the utility could be notified. We do not wish to comment on the subject of enforcement penalties for noncompliance.

Question 9. What improvements should be made to the NPRDS Manual or other guiding vehicle to enhance uniformity of reportable scope, completeness and accuracy of reporting, and usability of the data?

Comment The current NPRDS Manual adequately describes reportable scope and the necessity for accuracy of reports. The editing service available to all participants by the NPRDS coordinator assures completeness by scanning mandatory entry data fields. Quarterly and annual reports could be restructured to provide summaries of accumulated data in a more usable manner. Identification of necessary improvements and additional fine-tuning of the Manual is an ongoing process.

Question 10. Any data-gathering system needs feedback to maintain and upgrade system capability in the face of changing events, methodological advances, and other factors. Feedback is particularly necessary to modify data-gathering activity upon which the whole analytical system rests. What feedback features, if any, should be addressed by rulemaking?

MISSISSIPPI POWER & LIGHT COMPANY

NRC Docking and Service Branch
Comments on NPRDS
March 28, 1980
Page Four

Comment Those feedback features currently in use between industry, the NRC, the utilities and the NPRDS coordinator are adequate. The rulemaking should be structured such that these features are made formal and mandatory.

Question 11. Should the NPRDS and LER Systems be restructured to avoid overlapping data-gathering requirements or should present system formats be retained?

Comment Yes, restructuring of the NPRDS and LER Systems should be undertaken. As stated in the Federal Register/Volume 45, No. 21, "The NRC (should) consider reducing LER reporting by eliminating the requirement for LER reports for most component failures or malfunctions covered by the NPRDS; the NRC would consider requiring equipment LER's only for those component failures or malfunctions that are of major safety significance . . ." Additionally, " . . . the NPRDS, which is designed to produce such reliability data, would perform this service."

Question 12. In the event you recommend eliminating duplication between LER and NPRDS reporting, how would you restructure each system's reporting requirements? Comment specifically on the idea expressed in summary paragraph 8 of limiting LER reporting to items of major safety significance. Should such restructuring be done simultaneously with making NPRDS reporting mandatory or should ongoing NPRDS and LER upgrading efforts continue separately?

Comment In the event that NPRDS is made mandatory the LER should be structured to eliminate duplication of NPRDS reporting except as related to significant items. Separate upgrading efforts should be discontinued to avoid duplication. See comments to Question 11.

Question 13. Do you agree with the summary paragraph 2 estimate of a minimum of 3500 components as an appropriate scope? Assuming a reportable scope of 3500 components, how many NPRDS failure reports should be expected per month per operating plant?

Comment After a more thorough review of plants of similar type and vintage, a better estimate of minimum number of components could be established. We anticipate a data base of between 4,000 and 5,000 components for each of our nuclear units. We have not yet estimated the expected NPRDS failure reports per month per plant.

MISSISSIPPI POWER & LIGHT COMPANY

NRC Docketing and Service Branch
Comments on NPRDS
March 28, 1980
Page Five

Question 14. Should the scope of systems and components presently summarized by the NPRDS Manual be expanded or contracted and, if so, in what areas?

Comment The current scope of systems and components is more than adequate; however, discussions involving submittal of significant Balance of Plant (BOP) components have been undertaken with the NPRDS coordinator.

Question 15. Do the costs of preparing and submitting failure reports differ between the LER and NPRDS Systems? What do you estimate these costs to be?

Comment We have not yet finalized our anticipated costs for these reports.

Question 16. Are the per-plant figures of \$75,000 to \$200,000 for one-time development of NPRDS engineering data and \$50,000 for annual NPRDS reporting considered valid or are these figures understated or overstated?

Comment Our experience with the cost of development of NPRDS engineering data has shown that the \$200,000 figure is understated. We also believe that the annual reporting cost is slightly understated. The figures given are probably valid for the plants they were taken from, at the time they were taken.

Question 17. What alternatives to mandatory reporting would provide the data necessary for complete and accurate reliability analysis and at what level of assurance?

Comment This question makes the assumption that only mandatory reporting will provide complete and accurate reliability analysis. It is in the best interest of the utility and the industry to accumulate, analyze and distribute data that will have a direct impact on minimizing their operating cost. Adopting this philosophy is incumbent on each utility. It cannot effectively be realized through mandatory participation.

Question 18. Do the benefits to the utility and the public of improved availability and increased reactor safety warrant the cost of NPRDS or is there a less costly way to realize equivalent benefits in regulatory action?

MISSISSIPPI POWER & LIGHT COMPANY

NRC Docketing and Service Branch
Comments on NPRDS
March 28, 1980
Page Six

Comment Our current estimate of the cost of a one day forced outage exceeds, by a large margin, the cost of development and annual reporting of the NPRDS. This means that the NPRDS will have more than paid for itself by identifying potential trends that, if not foreseen and corrected, would lead to a forced outage. This, in turn, enhances availability and minimizes our customers' cost. Regulatory action would not provide less costly benefits.

Question 19. How should the NPRDS be funded? Should industry fund fully or should the NRC contribute funds to support the industry system?

Comment Current funding by the utilities, the NRC and other concerns guarantees continued success and improvement of the NPRDS. Partial funding by the NRC is appropriate and assures them some degree of control over NPRDS Operations.

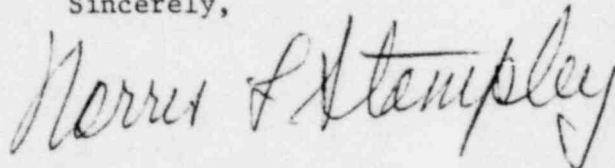
Question 20. Should the six early-design plants, excluded when the NPRDS commenced, continue to be excluded or should all plants be required to participate?

Comment We have no comment on their situation as specific circumstances led to each of their non-inclusions.

Question 21. Certain operator errors must now be reported within the scope of the LER System. Furthermore, NPRDS reports sometimes include corresponding human error information. To what extent, if any, should an improved NPRDS collect man-machine interface data and perform reliability analyses which consider human factors.

Comment We welcome an effort designed to incorporate the effects of man-machine interface on reliability analyses. As noted, the NPRDS does allow for this type of data in a limited format.

Sincerely,



NLS/JPM/RAA:dp