

**Reactor Oversight Process Enhancement Project**  
**Baseline Inspection Program**  
**Special Topic – Independent Spent Fuel Storage Installation**

**Background**

The baseline inspection program related to dry cask storage activities are part of the Reactor Oversight Process (ROP) under Appendix C of Inspection Manual Chapter (IMC) 2515, "Light-Water Reactor Inspection Program Operations Phase." The dry cask storage operations are generally performed by the same personnel that operate the Part 50 facility and use the same established support programs, such as, radiation protection, fire protection, emergency preparedness, and corrective action programs.

**Analysis**

The staff used the inspection areas and associated procedures to analyze the baseline inspection program related to dry cask storage activities. The staff used analysis completed by inspection procedure owners, information and knowledge from inspectors, special groups and reports, lessons learned, and recent events and inspections. The staff noted that dry cask storage activities impacted facilities licensed under Title 10 of the *Code of Federal Regulations* (10 CFR) Part 50, "Domestic Licensing of Production and Utilization Facilities," and 10 CFR Part 72, "Licensing Requirements for the Independent Storage of Spent Nuclear Fuel, High-Level Radioactive Waste, and Reactor-Related Greater than Class C Waste," systems, structures, and components. However, these activities did not include all aspects of the dry cask operations in the ROP. The staff noted that the Part 72 findings lack a significance determination process for screening performance issues and did not include a venue to assign potential cross-cutting issues to these performance issues. At this time, inspectors use traditional enforcement to disposition Part 72 associated findings. The staff determined that by not including all aspects of dry cask storage operations in the ROP, it would not allow for the inspection program to fully assess licensee's performance within the ROP Action Matrix. The staff determined that Inspection Manual Chapter 2515, Appendix C, "Special and Infrequently Performed Inspections," should be revised to allow inspectors to perform inspections without needing regional administrator approval. Therefore, inspection activities for construction and operation of an Independent Spent Fuel Storage Installation (ISFSI) would be integrated fully into the ROP.

**Recommendations**

(Note: Recommendations in this subject area will require additional development before they can be implemented.)

The staff determined that Part 72 issues lacked a significance determination process for screening performance issues within the ROP program. The development of a screening process would allow full assessment of licensee's performance. Below are the specific recommendations:

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Enclosure 18

- Include all aspects of the ISFSI operations into the ROP through the development of a new appendix to IMC 0609, "Significance Determination Process," associated with the construction and operation of an ISFSI.
- Develop a screening process that uses a series of logic questions to determine the level of safety significance of a finding. This will allow for all performance deficiencies to be assessed for cross-cutting issues.
- Develop a mechanism that would allow performance of inspections without needing regional administrator approval as currently required by Appendix C inspections.