

Pre-Application Review Meeting with Toshiba Corporation on Long-Life Metallic Fuel for the 4S Reactor Design

Donald E. Carlson
Office of New Reactors

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Toshiba 4S Pre-Application Review Meeting on Long-Life Metallic Fuel

Formalities

- Category 1 public meeting protocol
- Sign-in sheets
- Visitor escort policy
- Use Microphones
 - Teleconference
 - Video Recording
- Agenda
- Opportunity for public comment
- Feedback forms
- Introductions



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Background (1 of 2)

- NRC Advanced Reactor Policy Statement calls for preapplication interactions to provide for:
 - Early identification of regulatory requirements
 - Timely, independent assessment of safety and security characteristics
- Pre-Application Objectives
 - Familiarize NRC staff with design, safety case, and technology base
 - Provide feedback to pre-applicant on:
 - key safety, design, and licensing issues
 - technology development program plans
 - Inform the development of NRC's technical infrastructure: knowledge, analysis tools, data
 - Identify any policy issues



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Background (2 of 2)

4S Design Approval Pre-Application Activities proposed by Toshiba at meeting on 10/23/2007

- Proposed Licensing Approach
 - Phase 1: Familiarization meetings
 - 1. Overview of 4S design, safety, and regulatory conformance 10/23/07
 - 2. Long-life metallic fuel, System and safety design overview Today
 - 3. Seismic isolation, Regulatory conformance -
 - 4. PIRT (Phenomena Identification and Ranking Tables) review -
 - Phase 2: Technical report reviews
 - 1. Seismic isolation
 - 2. Long-life metallic fuel: Analysis methodology, fuel performance
 - 3. Safety analysis: Analysis methodology, analysis results
 - 4. Level 1 PRA (Probabilistic Risk Assessment)
 - 5. PIRT and test program



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Backup Slide



Licensing Process - 10 CFR Part 52

- A. Early Site Permits
- B. Standard Design Certifications
- C. Combined Licenses
- D. (reserved)
- E. Standard Design Approvals
- F. Manufacturing Licenses
- G. (reserved)
- H. Enforcement

ITAAC: Inspections, Tests, Analysis & Acceptance Criteria