

American Nuclear Society
NFSC Minutes
June 25, 2007 • MIT Cambridge, MA

1. Welcome and Call to Order

The meeting was called to order and introductions were made.

2. Approval of November 2006 Meeting Minutes

The NFSC minutes from the November 13, 2006, meeting were approved as presented.

3. NFSC Reorganization

It was explained that the Standards Board was kept involved during the process to reorganize the subcommittees. The reorganization dissolved ANS-23 on Decommissioning and Site Remediation which was incorporated into ANS-24 and ANS-27. ANS-26 on Emergency Preparedness was dissolved with its projects being transfer among ANS-21, ANS-24, and ANS-25. Disagreement on dissolving ANS-26 was voiced by two members. The remaining subcommittee titles were modified to represent the standards in their purview and vice chairs were assigned to all. Additionally a new subcommittee was created for new initiatives. The reorganization prepared the committee structurally for the nuclear renaissance.

The current subcommittees were:

- ANS-21: Maintenance, Operations, Testing & Training
- ANS-22: Systems Design Criteria
- ANS-24, Modeling & Analysis
- ANS-25: Siting: Environmental & Emergency Preparedness
- ANS-27: Fuel Cycle, Waste Management & Decommissioning
- ANS-28: HTGR Design Criteria
- ANS-29: Advanced Initiatives (Gen III-A/IV, GNEP)

4. Action Items

Old action items were reviewed.

5. Standards Issues and Discussion

It was questioned why the meeting was held offsite as it was felt inconvenient. Others stated that they preferred the offsite location as they were not attending the ANS meeting and would not have to register. It was noted that there was not a meeting room large enough at the Boston Marriott Copley to accommodate the NFSC, and therefore the meeting was held offsite.

A. Process for Addressing Clarifications

A training program ASME was developing on the suite of PRA standards that would begin with their internal events standards but would also include the ANS standards on external events, low power shutdown, and fire was detailed. A portion of the funding for the training course was provided by the NRC. Concern about the training courses spawning clarifications/interpretations on the ANS PRA standards were discussed. It was felt that ANS should be involved in the training course to the extent possible.

The committee was reminded that the Standards Board had provided only a high level policy on clarification/interpretation. The policy designated the responsibility to the subcommittee chair in the absence of a working group chair and to the consensus committee chair in the absence of a subcommittee chair.

A member stated that ASME had similar difficulties with clarifications/interpretations particularly when a user had a case that did not clearly fit in the code but petitioned to use the code anyway.

As clarifications to historical standards posed the most difficulty due to a lack of active working group members, it was questioned whether a separate policy should be established for historical standards. The committee agreed that ANS had the responsibility to respond if at all possible. A group was formed to take a look at the issues on clarifications/interpretations and report suggestions back to the committee.

B. Process for Expediting PINS Approval

It was explained that there was no formal ANSI requirement for consensus body approval of PINS. The focus for review of PINS was to make sure the project was necessary. A draft process was summarized which entailed that the subcommittee chair provided the PINS to the standards administrator who would provide the PINS to the NFSC Chair and Standards Board Chair for review. The NFSC and Standards Board Chair would determine if the PINS required NFSC review or if it should be sent to ANSI. In cases where an NFSC review was deemed appropriate, comments would be requested without the formality of a vote. The goal was to get away from the balloting/comment process that took so long. Members expressed concern that we needed to make sure there was no overlap and felt that a broad based review was beneficial.

The sense of the committee was that the PINS should be distributed for comment only with non responses considered approved.

C. Emergency Management Standards Project Plan

An action item was assigned to review the list of emergency preparedness volunteers and attempt to form working groups to initiate reinvigorations to the withdrawn emergency preparedness standards.

D. Inquiries N18.1 (ANS-3.1), ANS-3.5 & ANS-56.8 (ANS-21)

There had been no progress on the inquiry received on N18.1-1971 (ANS-3.1), "Selection and Training of Nuclear Power Plant Personnel," as there were no active working group members and no past members available. A request was made to forward the inquiry on N18.1 (ANS-3.1) to the NFSC for review and possible response.

In regards to the inquiry on ANS-3.5-1985, "Nuclear Power Plant Simulators for Use in Operator Training," it was reported that the current ANS-3.5 Working Group had reviewed the inquiry and a response was in progress.

F. Inquiry & Errata ANS-58.2 (ANS-24)

The current inquiry on ANS-58.2-1988, "Design Basis for Protection of Light Water Nuclear Power Plants Against the Effects of Postulated Pipe Rupture," was possibly two years old and the working group was having difficulty reaching agreement on the errata from the previously issued clarification. The committee was reminded that ANS-58.2 received comments from the

ACRS. It was explained that the attention of most comments were more specific than the scope of the standard. A statement was needed to be issued responding that the standard had met the scope of the standard.

G. Inquiry ANS-57.1 (ANS-27)

It was stated that the inquiry on ANSI/ANS-57.1-1992; R2005, "Design Requirements for Light Water Reactor Fuel Handling Systems," was reviewed and that a written response would be provided.

H. ANS-57.2/ANS-57.3 & Withdrawal of ANS-57.7 (ANS-27)

ANS-57.2, "Design Requirements for Light Water Reactor Spent Fuel Facilities at Nuclear Power Plants," and ANS-57.3, "Design Requirements for New Fuel Storage Facilities at LWR Plants," had stalled in 2002 in the middle of resolving ballot comments. The past working group chair resigned from the joint project when he took a position out of the country. Recent efforts to resolve comments had not made progress.

The committee was in favor of reinvigorating recently withdrawn standard ANSI/ANS-57.7-1988;R1997 (W2007), "Design Criteria for an Independent Spent Fuel Storage Installation (Water Pool Type)," and suggested to contact GNEP, AREVA, Energy Solutions, Westinghouse, Toshiba, and General Electric to put a working group together.

I. ANS-18.1 Status

Status of the revision to ANSI/ANS-18.1-1999, "Radioactive Source Term for Normal Operation for Light Water Reactors" was unknown. Action items had previously been assigned to contact the working group chair.

J. ANS-29 Subcommittee Meeting

It was reported that a Reprocessing Facility Technical Standards Committee meeting was held on June 25, 2007.

6. Management Reports

A. Chairman Report

Since the last NFSC Meeting in November of 2006, three standards had been reaffirmed. Eight ballots had been issued for approval of draft standards, current standards for reaffirmation, or PINS.

B. Standards Coordinator

The Hot List Report that included all NFSC standards within three years of being withdrawn was provided. In total, seven standards were reviewed. Two were in revision and three were involved in reaffirmations. Action Items already existed for the two remaining standards on the Hot List.

C. Secretary

Status, Delinquent, Activity, and a Staff report were presented to the committee.

The committee was updated on the status of the online volunteer database currently in works. Subcommittee chairs were requested to draft scopes for their subcommittees for use with the online database.

7. NFSC Subcommittee Reports

A. ANS-21 Maintenance, Operation, Testing & Training

The ANS-21 Subcommittee included 13 members comprised of working group chairs, co-chairs, and members at large. Updates were provided on working group chair changes. ANS-21 Subcommittee comments on ANS-3.5, "Nuclear Power Plant Simulators for Use in Operator Training and Examination," were resolved, and the draft of ANS-3.5 would be sent to the NFSC soon.

B. ANS-22 Systems Design Criteria

It was recognized that several standards under the subcommittee should be considered for reaffirmation and that the working group chairs should be contacted to begin a review. Other arrangements would be made to review standards without current working group chairs. It was reported that ANS-58.14, "Safety and Pressure Integrity Classification Criteria for Light Water Reactors," was making progress. The working group's main concern was that the historical standard was written more encompassing than Regulatory Guide 1.206 and that the goal was to acquire NRC endorsement. The committee was reminded that the NRC can take a few exceptions when endorsing a standard. Comment responses to the NFSC review of the PINS for ANS-58.16, "Safety and Pressure Integrity Classification Loads and Behavior Criteria for Nuclear Facilities Other Than Large Nuclear Reactors," were distributed and if responses acceptable, the PINS would be forwarded to the Standards Board.

C. ANS-24 Modeling & Analysis

An update on ANS-24 Subcommittee was provided. It was noted that new standard ANS-2.29, "Probabilistic Seismic Hazard Analysis," was currently out at ballot with the NFSC. The ANS-5.4 Working Group planned a meeting for June 27, 2007. The ANS-41.5 Working Group scheduled a meeting in August 2007 and would be revising the standard for re-ballot. It was reported that the ANS-3.8.5 Chair did not currently have the time to address the historical revision. It was noted that the ANS-58.2 Working Group Chair may have to be replaced due to lack of activity. Comments on the standard received from the ACRS remained unanswered.

The committee was informed that an inquirer from Japan was interested in information about a revision to ANS-56.11. Per old NFSC minutes, the project was slated for revision several years ago but a revision was never started and eventually dropped. It was confirmed that working group members to head this project were unable to be found. With brief discussion, the committee felt other standards had a higher priority for revision but that they would sponsor the activity if the inquirer would be interested in leading a revision.

D. ANS-25 Siting: Environmental & Emergency Preparedness

The committee was informed that a new working group for ANS-2.6, "Guidelines for Estimating Present & Forecasting Future Population Distributions Surrounding Nuclear Facility Sites," was forming and that the PINS was sent to the NFSC for review. Drafts were expected soon of ANS-2.17, "Evaluation of Radionuclide Transport in Ground Water for Nuclear Facilities," and ANS-2.22, "Environmental Radiological Monitoring at Nuclear Facilities." ANS-2.27, "Criteria for Investigations of Nuclear Facility Sites for Seismic Hazard Assessments," would be sent back to NFSC for a re-ballot. Many other projects remained active but had no new progress.

E. ANS-27 Fuel Cycle, Waste Management & Decommissioning

An update was provided on the ANS-27 Subcommittee progress. It was noted that several working groups needed to be formed or completed. Additionally it was identified that a working

group should be formed to review ANSI/ANS-57.9-1992; R2000, "Design Criteria for an Independent Spent Fuel Storage Installation (Dry Type)," and consider for reaffirmation or revision. The committee was reminded that a revision to the historic standard ANS-40.37-1993;W2003, "Mobile Low-Level Radioactive Waste Processing Systems," was balloted by the NFSC earlier in the year. The ballot received numerous comments which were being reviewed.

F. ANS-28 HTGR Design Criteria

It was noted that ANS-53.1, "Nuclear Safety Criteria for the Design of Modular Helium-Cooled Reactor Plants," was moving forward in completion of a draft for the NFSC and would be considering additional lower-tiered projects. The group planned to meet for two days during the June 2007 ANS meeting.

G. ANS-29 Advanced Initiatives

It was noted that a meeting on reprocessing facilities was held the previous Sunday morning. The meeting focused on facilities, siting, and operations. Future meetings were anticipated. Committee input was requested for standards to be initiated under the new subcommittee.

8. Liaison Reports

A. ASME Report

No report provided.

B. ASME-NQA Report

The NQA Committee met in Orlando on April 16-18, 2007. The focus of the meeting included working sessions to facilitate NRC endorsement, strategic planning, and the potential role of the standard in the new generation pilot plants being considered by utilities. The merits of combining ANS-3.2 with ASME NQA-1 was discussed, but it was felt that the timing for both documents was not optimum.

C. NEI

It was reported that 23 regulatory guides were updated in fall of 2007 to support new plants. NEI coordinated industry review and issued comment letters on 19 of the drafts provided for public comment. Four regulatory guides were still under discussion with the NRC. NEI was also working on a separate comprehensive review program for RG 1.206. It was further reported that NEI coordinated industry review of technically complete versions of the Standards Review Plan as available and provided NRC feedback.

D. NRMCC

It was reported that ASME was moving towards getting the Integrated Standard completed. The Integrated Standard Working Group initially found challenges in incorporating the requirements from the ANS External Events Standard. The cooperative effort could prove very beneficial. The NRMCC would like to see IEEE involved as well.

E. ISO TC 85/SC-6

SC6 had not made much progress since their meeting in fall of 2006; however, the group was scheduled to meet in Boston on June 27, 2007. Previous New Work Item Proposals were not approved by member countries. A new membership list was finished recently. The SC6 approved a new chair. If progress was not shown, the U.S. would lose the secretariat of SC6 to the French. It was suggested to recommend ANSI/ANS-2.26-2004, "Categorization of Nuclear Facility Structures, Systems, and Components for Seismic Design," to SC6.

F. CSA

It was noted that a mandated was issued for Canadian nuclear standards to align themselves with best practices in the world. The association with ANS NFSC was very important to this goal. The committee was informed that they created an international task force that included IAEA, IEC, ISO, and RCCM. The RCCM was similar to ASME International. If the United States was planning for a nuclear renaissance, harmonization would be of benefit.

The committee questioned the process that this new task force used to achieve consensus and balance of interest. It was noted that they had a balanced membership and that negative ballots had to be addressed. The process was similar to the ANSI process. The committee was reminded that IAEA does not use a consensus process and that ANSI accredited standards developers must comply with specific requirements. It was agreed that the term of consensus standard was much more formal in the U.S.

9. New Business

A. ANS Strategic Plan

There was no update on the ANS Strategic Plan.

B. NFSC Tool Kit

The NFSC previously reviewed a revised toolkit and comments were incorporated. It was noted that the toolkit would be reviewed once more before finalizing.

C. NFSC Glossary

An update on the review of the existing NFSC glossary was provided. Several definitions were found to be missing. It was noted that the definitions in standards were for the users while the glossary was for standards writers. It was the responsibility of the standards writers to standardize the definitions.

10. Other Business

The committee was informed that the NRC was looking at operating the current fleet of nuclear power reactors past 60 years as they were not degrading as fast as initially anticipated. It was felt that this was a perfect opportunity for ANS to provide something for the future. The NRC was planning a public workshop next year.

The committee debated the role of consensus standards verses NEI guidance. As NEI guidance documents were not produced within the consensus process, NEI was able to expedite the drafting process with paid writers and skip the formal balloting and public review process. Several members stated that NEI filled an urgent industry need consensus standards could not. Additionally many felt it was ANS's responsibility to use what we had available and good planning to compete on a consensus standards level. It was recognized that both the NRC and NEI valued consensus standards, and the NFSC should take advantage of its liaison with NEI.

11. Review of New Action Items

Action items from the meeting were reviewed.

The meeting was adjourned at 5:15 pm.