

UNITED STATES NUCLEAR WASTE TECHNICAL REVIEW BOARD

2300 Clarendon Boulevard, Suite 1300 Arlington, VA 22201

Agenda

1995 Fall Board Meeting

Strategic Concerns, Total System Performance Assessment

> Arlington Renaissance Hotel 950 N. Stafford Street Arlington, Virginia 22203 528-6000 Fax (703) 528-4386

(703)

Gallery

Ballroom October 17-18, 1995

Tuesday, October 17

STRATEGIC

CONCERNS

8:30 A.M. Welcome and introductory remarks

John Cantlon

Chair, Nuclear Waste Technical Review Board (NWTRB)

8:40 A.M. Office of Civilian Radioactive Waste Management (OCRWM) report

Daniel Dreyfus, Director

• Update on recent activities

• Fiscal year 1996 budget-based priorities

• Director's perspective on the future course of the program

9:10 A.M. Questions/discussion

9:25 A.M. Update on exploratory studies facility (ESF) progress

Richard Craun

Department of Energy (DOE)

9:45 A.M. Questions/discussion

Tuesday, October 17 (continued)

9:55 A.M. Update on scientific investigations

William Boyle, DOE

10:15 A.M. Ouestions/discussion

10:25 A.M. **BREAK (15 minutes)**

10:40 A.M. Discussion with congressional staff

Alex Flint — legislative assistant to Senator Pete Domenici (R-NM) Sam Fowler — senior minority counsel, Senate Committee on Energy &

Natural Resources

Sue Sheridan — minority counsel — House Committee on Commerce Troy Timmons — professional staff member, House Committee on

Commerce, Subcommittee on Energy and Power
• Perspectives on recent and upcoming legislation

11:40 A.M. National Academy of Sciences (NAS) report: Technical Bases For

Yucca Mountain Standards

Robert Fri, Chair, NAS committee

12:10 P.M. Questions/discussion

12:25 P.M. LUNCH (1 hour)

1:25 P.M. DOE reaction to NAS standards report

Stephan Brocoum, DOE

- Implications of different kinds of standards for the program
- Performance assessment insights

1:55 P.M. Questions/discussion

2:10 P.M. Electric Power Research Institute (EPRI) analysis of the different

standards using performance assessment

John Kessler, EPRI

- Two NAS standards report models
- HR-1020 standard
- Significant contributors to the different performance measures
- Problems and uncertainties in calculating the different performance measures
- Implications for site characterization, waste isolation strategy

2:30 P.M. Questions/discussion

Tuesday, October 17 (continued)

2:40 P.M. Waste isolation strategy update

Stephan Brocoum, DOE

Jean Younker, TRW Environmental Safety Systems (TRW)

Management and Operating Contractor (M&O)

- Report from the M&O
- New issues
- Critical assumptions
- Program implications
- Performance assessment backup of waste isolation strategy
- 3:20 P.M. Questions/discussion
- **3:40** P.M. BREAK (15 minutes)
- 3:55 P.M. Round-table discussion of major issues: NAS standards report, waste isolation strategy, and congressional staff perspectives
 - What are the strategic and tactical implications involved?
 - How can the viability of the geologic disposal program be maintained?
 - What are the resultant priorities? Moderator Jared Cohon, NWTRB

Participants: Daniel Dreyfus (OCRWM), Robert Fri (NAS), John Kessler (EPRI), Stephan Brocoum (DOE), Jean Younker (TRW-M&O), Margaret Federline (Nuclear Regulatory Commission), Robert Loux (state of Nevada), William Magavern (Public Citizen), Lawrence Weinstock (Environmental Protection Agency), Steven Kraft (Nuclear Energy Institute), Robert Williams, and Chris Whipple (IFC Kaiser).

- 5:10 P.M. Public comment
- 5:25 P.M. Session closing remarks

John Cantlon, NWTRB

5:30 P.M. Recess until 8:30 A.M., Wednesday, October 18

Wednesday, October 18

8:30 A.M. Session introduction

Donald Langmuir, NWTRB

TOTAL SYSTEM PERFORMANCE ASSESSMENT (TSPA) - 1995

8:35 A.M. Introduction

Abe Van Luik, DOE

8:45 A.M. Objectives/approach

Robert Andrews, INTERA (M&O)

9:05 A.M. Questions/discussion

9:15 A.M. Ambient and thermally perturbed flow in the unsaturated zone

Srikanta Mishra, INTERA (M&O)

9:45 A.M. Questions/discussion

9:55 A.M. **BREAK (15 minutes)**

10:10 A.M. Waste package degradation model and results

Joon Lee, INTERA (M&O)

10:40 A.M. Questions/discussion

10:50 A.M. Engineered barrier system release model and results

Jerry McNeish, INTERA (M&O)

11:20 A.M. Questions/discussion

11:30 A.M. LUNCH (1 hour)

12:30 P.M. Geosphere transport and release/dose

David Sevougian, INTERA (M&O)

1:15 P.M. Questions/discussion

Wednesday, October 18 (continued)

1:30 P.M. Volcanism effects and consequences

Bruce Crowe

Los Alamos National Laboratory

1:45 P.M. Questions/discussion

1:55 P.M. Summary and recommendations

Robert Andrews, INTERA (M&O)

• Key uncertainties

• Alternate system performance measures

• Implications for site and design

2:15 P.M. Questions/discussion

2:25 P.M. Concluding remarks

Eric Smistad, DOE

2:35 P.M. BREAK (15 minutes)

USING PERFORMANCE ASSESSMENT

2:50 P.M. Making use of performance assessment: lessons learned

Paul Davis

Sandia National Laboratories (SNL)

• Waste Isolation Pilot Plant, New Mexico

• Greater Confinement Disposal Program, Nevada

• Yucca Mountain, Nevada

3:20 P.M. Questions/discussion

3:30 P.M. BREAK (10 minutes)

3:40 P.M. Round-table discussion: the uses of TSPA

— Can TSPA be used to set priorities now?

— What are its limitations?

— How can it be made more useful?

— How valid are assessments of compliance?

— Can a simplified TSPA be developed and used effectively?

Moderator: Donald Langmuir, NWTRB

Participants: Abe Van Luik (DOE), Eric Smistad (DOE), Robert Andrews (INTERA-M&O), Paul Davis (SNL), John Kessler (EPRI), Ben Ross (Disposal Safety), Steve Frishman (state of Nevada), Norman Eisenberg (NRC), Chris Whipple (IFC Kaiser), and Robert Bernero.

Wednesday, October 18 (continued)

4:50 Р.М.	Public comment
5:20 P.M.	Session summary Donald Langmuir, NWTRB
5:25 P.M.	Closing remarks John Cantlon, Chair-NWTRB
5:30 P.M.	Adjourn