

12th Annual National Mining Association and Nuclear
Regulatory Commission Workshop, Denver, Colorado

*Health Physics Society's Legislative and
Regulatory Initiatives on LLW*

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Health Physics Society Mission

- The Health Physics Society (HPS) is a nonprofit scientific professional organization whose mission is to promote the practice of radiation safety. Since its formation in 1956, the Society has grown to approximately 6,000 scientists, physicians, engineers, lawyers, and other professionals representing academia, industry, government, national laboratories, the Department of Defense, and other organizations.
- Society activities include encouraging research in radiation science, developing standards, and disseminating radiation safety information. Society members are involved in understanding, evaluating, and controlling the potential risks from radiation relative to the benefits. (see <http://www.hps.org/>)

Recent Legislative and Regulatory Initiatives

A decorative graphic consisting of a horizontal bar with a color gradient from dark blue on the left to bright yellow on the right. To the right of the bar is a large, stylized arrow pointing to the right, filled with a brown-to-orange gradient.

- Senate Energy & Natural Resources Committee Hearing on LLW Oversight Testimony
- General Accountability Office Follow-up Report on LLW
- Organization of Agreement States (OAS) and HPS Joint Position Statement and Legislation Regarding Discrete Sources of NARM

Senate Testimony

- Senate Energy & Natural Resources Committee Holds Hearing on LLW Oversight on September 30, 2004
 - In response to GAO Report titled, *Low-Level Radioactive Waste, Disposal Availability Adequate in Short Term, but Oversight Needed to Identify any Future Shortfalls* (GAO-04-604), June 2004
 - GAO emphasis on Class B/C LLW should Barnwell prohibit access to non-compact member states in CY 2008
 - HPS presented written public witness testimony
 - Cal Rad Forum, DOE EM, NNSA and GAO presented written and oral testimony

Changes to LLWPA?

- Nation Needs Predictable Long-Term Disposal Options for Class B/C LLW after CY 2008
 - LLWPA unnecessarily restricted access to available disposal sites and impeded open development of additional sites
 - Suggested Committee seek out ways to more effectively implement, amend or replace the LLWPA

Safeguarding Orphan Sources

- Lack of Disposal Options May Impact Existing Federal Programs to Safeguard Sealed Sources
 - Orphaned sealed sources generated by high disposal cost and lack of disposal options
 - Prohibition for disposal of sealed sources at EOU
 - Increase in orphan sources expected in 36 states not belonging to Atlantic Compact after 2008

Lack of Competition

- Beneficial Uses of Nuclear Technologies Must Be Balanced Against Health Risk Posed by Waste Streams
 - High cost of disposal caused by limited disposal options impede beneficial uses of nuclear technologies
 - GAO addressed disposal availability but did not address cost due to limited competition
- Despite Long-Term Disposal Options for Class A LLW, Lack of Competition Results in Excessive Costs for Many Licensees
 - Suggested reexamination of waste classification based on risk, not origins or statutory definitions
 - NCRP Report 139, *Risk-Based Classification of Radioactive and Hazardous Chemical Wastes*, December 2002

Rulemakings

- Testimony Called Out Current Rulemaking Initiatives by EPA and NRC to Increase Disposal Options and Competition in the Market Place
 - Commensurate with risk posed by waste stream
- Informed Committee of Non-regulatory Alternative for Disposals of Non-11e.(2) By-product Materials
 - Candidate wastes must be radiologically, chemically and physically similar to 11e.(2) by-product material
 - Provisions of long-term custodial care in perpetuity, more protective than RCRA Subtitle C and Part 61 sites
 - Referenced NMA/FCFF “White Paper” suggesting liberalization of NRC current policy for disposal of non-11e.(2) by-product materials

Preparation of Next Report

- Committee Chartered GAO to Prepare Follow-up Report
- GAO Requests Support Needed for Next Report on LLW
 - HPS President Ray Guilmette discussed responses to GAO questions on January 19, 2005
 - HPS provided written responses on March 1, 2005
 - NMA/FCFF “White Paper” and documentation on high cost of waste disposal provided to GAO
- HPS Recommended Additional Actions to Safeguard High-Risk Sources and Ease Burden for Disposal of LLW

Preparation of Next Report (Continued)

- GAO Follow-up Report Scheduled to Be Issued in September 2005
 - National Academy of Science report on reclassification of LLW also expected to be issued in September 2005
- Senate Hearings Expected to Be Held in Late 2005

Discrete Sources of NARM: Joint Position Statement and Legislation

Background Information

- Legislation Proposed in 108th Congress (S. 1043) to Reclassify Certain Sources of NARM Under the Atomic Energy Act of 1954 (AEA)
 - Legislation intended to fulfill international commitments to safeguard “high-risk” sources of ^{226}Ra
 - Legislation excluded disposal options thus potentially generating new “orphan sources”
- Senator Clinton Prepares Stand-alone Legislation (S. 2763) in the 108th Congress to Reclassify Discrete Source of NARM Under AEA

Joint Position Statement and Legislation (Background Information)

- September 16, 2004, NRC Issues Proposed Import/Export Rulemaking to Safeguard High-Risk Sources (10 CFR Part 110)
 - Intended to implement IAEA *Code of Conduct*
 - Includes both bulk materials shipment, as well as sealed sources
 - Rulemaking notes the Commission's statutory limitations to regulate sources of ^{226}Ra

Joint Position Statement and Legislation

- Joint Position Statement and Draft Legislation for Discrete Sources of NARM Approved by HPS and OAS in January 2005
 - Position Statement titled *Congressional Action is Needed to Ensure Uniform Safety & Security Regulations for Certain Radioactive Materials*
 - Position Statement and legislation proposed specific safety, security and disposal provisions
 - Fulfills international obligations and institutes uniform regulations needed to address transboundary issues across all 50 states
 - Submitted to key Congressional stakeholders, Commissioners, EPA, DOE and State Radiation Control Program Directors on January 14, 2005

Provisions of Proposed Legislation

- Empowers Federal Governmental Agencies With the Necessary Authority to Protect Public Health
 - Removes statutory impediments preventing agencies from fulfilling their delegated authority
- Uniform Regulations Common Mission by HPS, OAS and CRCPD to Remedy Transboundary Issues
- Discrete Sources of NARM Defined in Rulemaking, Not Legislation
 - Anticipate varying thresholds to include high-risk sealed sources, those posing public health concerns, and levels allowing exclusion consistent with international recommendations
 - Allows stakeholder involvement

Provisions of Proposed Legislation *(Continued)*

- Intended to Remove Statutory Impediment
Currently Curtailing a Wide Variety of Disposal
Options
 - Waste not defined as LLW under the LLWPA
 - Allows disposals at RCRA Subtitle C facilities
 - Equivalent to 11e.(2) By-product materials to allow
disposal in uranium mill tailing impoundments
 - Consistent with CRCPD Part N Suggested State Regulations
(SSRs)
 - Consistent with regulating waste based on risk, not
origin or statutory definition

NRC Proposed NARM Legislation

- HPS and OAS Discuss Provision of Proposed Legislation
NRC
 - Teleconference with State and Tribal Programs, Office of General Counsel, and Decommissioning/Waste Management staff in February 2005
 - Teleconference with Commissioners' staff in March 2005
- NRC Proposes Draft Legislation to Regulate Discrete Sources of NARM Under the AEA on March 30, 2005
 - See NRC Letter to Congress that would amend the AEA, dated March 30, 2005 (ADAMS Accession No. ML050900405)

Comparison of Proposed Legislation

HPS/OAS Legislation

- Addresses security, safety and waste disposal options
- Applicable to discrete sources of Radium, NORM and accelerator-produced radioactive materials
- Specifically requires defining discrete sources in rulemaking
- Allows disposal at sites regulated by NRC
- Waste not defined as LLW under LLWPA
- Allows disposal at RCRA Subtitle C facilities
- Equivalent to 11e.(2) By-product materials
- Proposed one-year transition period

NRC Legislation

- Addresses security, safety and waste disposal options
- Applicable to discrete sources of ^{226}Ra , NORM and accelerator-produced radioactive materials
- Silent on rulemakings, but implies exemptions based on categories, not risk
- Allows disposal at sites regulated by NRC
- Waste not defined as LLW under LLWPA
- Allows disposal at RCRA Subtitle C facilities
- Silent on disposals as 11e.(2) By-product materials
- Proposed four-year transition period

What Happens Next?

- Legislation Proposed by NRC and HPS/OAS Serve to Promote Uniform Safety and Security Regulations for Discrete Sources of NARM
 - Both proposals go a long way to fill a longstanding hole in the AEA
- Senator Hillary Clinton and Congressman Edward Markey Currently Drafting Legislation That Would Amend the AEA to Include NARM
 - Draft legislation contains language very similar to HPS/OAS proposed legislation
 - May contain provisions to adopt State Consensus Standards (i.e., CRCPD's Part N SSRs) to ensure uniformity
 - *Dirty Bomb Prevention Act of 2005* expected to be introduced to committee with next few weeks
- Senate Environment and Public Works Committee is studying NARM Reclassification Issue Contained in the Markey/Clinton Legislation