

Nuclear Industry Groundwater Protection Initiative

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One Year Ago

- **Detection of releases into groundwater at nuclear plant sites highlighted the issue**
- **Industry and NRC response was technically focused**
- **Potential for public interest and concern not initially recognized and addressed**

Industry Actions

- **Established executive task force to provide direction and oversight for industry actions**
- **Unanimously adopted an industry initiative on groundwater protection**
- **Agreed to a voluntary submittal of baseline data to the NRC**

Industry Initiative Objectives

- **Improve prevention, detection and management of inadvertent liquid radiological releases**
- **Prevent migration of licensed radioactive materials offsite**
- **Enhance openness and transparency**

Industry Guidance on Groundwater Protection Initiative

- **Provides details on objectives, format, and content of action plans**
- **Establishes criteria for industrywide communications protocol**
- **Issued publicly on June 21, 2006**

Action Plans

- **Define project management structure, plan, and schedule for implementing actions under the initiative**
- **Action plan elements**
 - Implement communications protocol
 - Assess sources and pathways
 - Assess site operating history
 - Assess site geo-hydrology
 - Assess and adjust site programs prevention, detection, and response for inadvertent liquid releases
- **Long term follow-up actions will be site-specific using EPRI technical guidelines**

Communication Protocol

NRC Requirements*

- 1. Releases greater than NRC limits (30 days)**
- 2. Required GW samples >license criteria (30 days)**
- 3. Required GW samples (annual)**

*To NRC Only

**To NRC and State/Local Officials

Industry Initiative**

- 1. All inadvertent releases (Next business day & annual)**
- 2. All GW samples >license criteria (Next bus. day, 30 days, & annual)**
- 3. All GW samples (annual)**

Voluntary Data Submittal

- **To supplement the industry initiative**
- **Voluntary submittal on the docket to establish a publicly available baseline**
- **Scope:**
 - **Methods for detecting inadvertent releases**
 - **Groundwater monitoring program**
 - **Summary of documented releases – 10 CFR 50.75(g)**
 - **Groundwater radioactivity levels > USEPA MCL**
 - **Remediation undertaken or planned**

Schedule

- **Initiative & interim guidance issued – May 2006**
- **Initiative implemented industry-wide – July 2006**
- **Voluntary data submitted to NRC – July 2006**
- **Action Plan peer review – Nov 2006**
- **Communication Plan peer review – Feb 2007**
- **Lessons-learned workshop – Feb 2007**
- **Issue final industry guidance – May 2007**
- **Adjust programs to meet final guidance – TBD**
- **EPRI technical guidelines (under development) – Nov 2007**
- **Implement on-going peer review process - 2008**

Summary

- **Industry is committed to groundwater protection –much accomplished in 1 year**
- **Remains a work in progress**
 - Adjustments to initiative guidance and development of technical guidelines will help improve clarity and alignment in implementation
- **“Life-of plant” program**
 - Through decommissioning/license termination
 - Lessons-learned for new plant design and operations

Conclusion

- **Releases have not posed a risk to public health and safety**
 - **Give rise to uncertainty and concern**
- **We are responsible for maintaining the trust and confidence of our stakeholders**
- **We're committed to groundwater protection and part of our environmental stewardship**
 - **Based on prevention, timely detection and effective response –with timely and open communication**