

**NOTATION VOTE**

**RESPONSE SHEET**

TO: Annette Vietti-Cook, Secretary  
FROM: Chairman Gregory B. Jaczko  
SUBJECT: SECY-10-0043 – BLENDING OF LOW-LEVEL  
RADIOACTIVE WASTE

Approved  X  Disapproved  X  Abstain

Not Participating

COMMENTS: Below   Attached  X  None



SIGNATURE



DATE

Entered on "STARS" Yes  X  No

**Chairman Jaczko's Comments on SECY-10-0043**  
**"Blending of Low-Level Radioactive Waste"**

I agree with the staff that the clarity of the agency's blending positions could be improved, should be performance-based and risk-informed, and should be clearly specified in regulation and guidance. At this early stage, however, I cannot specifically approve or disapprove the concept of large scale blending of waste until staff has had the chance to evaluate the technical issues raised below. And in terms of the *process* for addressing this issue, I disapprove staff's recommendation to accomplish this by adding the blended waste issue to the ongoing rulemaking for unique waste streams that will partially revise 10 CFR Part 61.

I agree with the staff that the idea of "blending" should refer to mixing of higher and lower concentrations of contaminated material in a homogeneous mixture, not mixing with clean materials, as well as disposal in a licensed disposal site, not release to the general environment. Waste classified as Greater-Than-Class-C (GTCC) should not be included in the scope of this rulemaking; GTCC waste is a Federal responsibility and these volumes should not be made into a State responsibility, even if the waste has been blended into a lower classification.

The approaches for evaluating homogeneity and conducting performance assessments will both be essential to determining whether blended waste is acceptable for disposal. Large-scale blending should only be allowed for wastes that can be blended into a homogeneous mixture. Staff should develop a clear standard for determining homogeneity and should obtain stakeholder input on the approach. The staff should evaluate homogeneity in the context of the volumes of waste an intruder could encounter in reasonably foreseeable inadvertent intruder exposure scenarios, and also evaluate it in relation to mathematical averaging. Staff should also consider whether limits on mathematical averaging are appropriate.

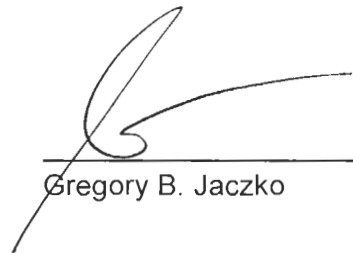
The agency staff has significant expertise in conducting and reviewing performance assessments. Staff should provide clear guidance indicating the approach that should be used in conducting performance assessments for this type of waste. Staff should also consider whether any performance assessment information, such as the period of performance, should be included as part of the rule instead of being contained in guidance.

Given that the staff has indicated that there may be a safety concern with disposal of large quantities of this waste, large-scale blending should not be performed by licensees or processors until a rulemaking has been completed. As a larger issue, I am concerned that we are addressing various important waste issues, each of which has safety implications, in a piecemeal fashion. In the Staff Requirements Memorandum for SECY-08-0147 on depleted uranium, the Commission directed the staff to undertake an initial step of partially revising Part 61 to require a site-specific analysis and to issue interim guidance so that waste would not be disposed of unsafely in the interim. Staff was also directed to budget for a comprehensive revision to risk-inform the 10 CFR 61 waste classification framework. Now, with respect to the

blending issue, staff is proposing to issue additional interim guidance and add blended waste to the unique waste stream rulemaking that is underway.

The unique waste stream rulemaking is not scheduled to be finalized until the end of 2012. I think it is likely that the rulemaking may take longer, especially if the controversial issue of blended waste is added to the rulemaking scope. Staff is also budgeting in FY11 and FY12 to begin the larger rulemaking to update Part 61. This is an inefficient and ineffective way to use our resources, as well as the resources of stakeholders. Therefore, staff should instead proceed to completely update Part 61 and its associated guidance, and include the issues of blending and unique waste streams in that effort.

Finally, I commend the staff for its excellent work on this issue. The paper was comprehensive and well written, and the outreach performed to stakeholders during its development was outstanding.

  
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Gregory B. Jaczko

8/11/10  
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Date