



U.S.NRC
UNITED STATES NUCLEAR REGULATORY COMMISSION

Protecting People and the Environment

Options to Revise Radiation Protection Regulations Further Considerations

*2010 ISOE North American ALARA Symposium/
EPRI Radiation Protection Conference
January 14, 2010*

Donald A. Cool, Ph.D.

Office of Federal and State Materials and Environmental Management Programs

Background

- NRC staff presented to the ISOE ALARA Conference in January, 2009
- Commission approved staff recommendation to engage stakeholders and initiate development of technical basis materials on April 2, 2009



Objective

- Objective is to explore implications, as appropriate and where scientifically justified, of greater alignment with ICRP Publication 103.
- Given adequate protection, discussion is to focus on discerning the benefits and burdens associated with revising the radiation protection regulatory framework



Outreach Activities

- Web Site publically available
- FRN published inviting inputs (72 FR 32198)
- Dedicated web address for comments
- FSME Newsletter (No. 09-1)
- Press Release (No. 09-078)
- All State Letter (FSME-09-025)



Outreach Activities

- Presentations to CRCPD, OAS, SNM, HPS, FCXT, ACNP, National SLO Conference, NEI, ASNC, ACMUI, AAPM, FL HPS/AAPM Fall Joint Meeting, NASA, 5th Asian Conference on the Evolution of the System of Radiation Protection.



Future Plans

- Looking to engage industrial radiography community, other industry segments, and public citizen groups
- Scheduled presentations to:
 - RIC, March, 2010
 - CRCPD, April, 2010
- Planning started for facilitated round tables in the spring, 2010



What Have We Heard?

- Wide range of views on major topics
- General support for increasing alignment with international recommendations and other national regulations to improve consistency and trans-boundary considerations
- General agreement that scientific information should be updated



What Have We Heard?

- **Effective Dose**
 - Supportive of update
 - Questions on application of current rule
 - Impact of methodology on ability to comply with options for dose limits
- **Numerical Values**
 - Supportive of update
 - Recognition of schedule



What Have We Heard?

- **Occupational Dose Limits**
 - Many want limit to stay at 50 mSv/yr (5 rem)
 - A few comments to reduce limit
 - Certain groups of licensees continue to have individuals above 20 mSv/yr (2 rem)
 - Preference by some stakeholders to keep higher limit as legal boundary, and increase ALARA and perhaps constraints to reduce doses



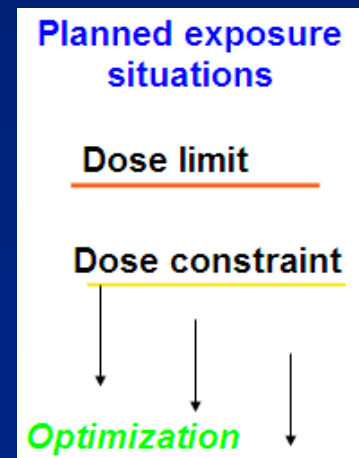
What Have We Heard?

- **Dose Limits for Embryo/Fetus**
 - Mixed feedback
 - Lack of data
 - Some options challenge limits of detection for monitoring
 - Nuclear Medicine labs prefer current limit for operational reasons



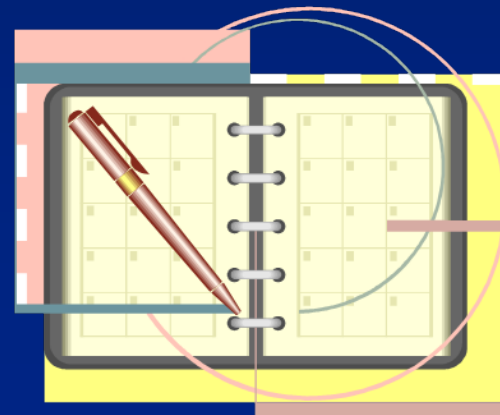
What Have We Heard?

- **Use of Constraints for ALARA planning**
 - Constraints not well understood
 - Questions on inspection, compliance, reporting
 - Detail of how a requirement might be constructed is critical to understanding impacts
 - Consideration of what justifications would be appropriate for exceeding a constraint, and what actions would be needed
 - Some stakeholders leaning to endorsement of constraint, and setting a value, to provide flexibility



Schedule

- **2010: Initiate detailed discussions, including possible workshops, on options and impacts**
- **Technical Basis support for data needs**
- **Ongoing interactions with Federal Agencies and State Agencies**
- **Monitoring of international developments**



Moving Forward

- **NRC staff is looking to engage stakeholders on the technical issues and options for resolution**
 - What are YOUR thoughts on the technical issues?
 - What are the impacts of different options?
 - Are there other options that should be considered?
 - What other issues need to be put on the table?
 - What information is needed to make decisions?



Questions ?

- Web pages

<http://www.nrc.gov/about-nrc/regulatory/rulemaking/opt-revise.html>

- Email Address: regs4rp@nrc.gov

