



Minerals Council of Australia (MCA) Uranium Forum – ARPANSA Dialogue

Meeting Minutes

Date: 03/11/2017
Location: Yallambie
Chair: Deputy CEO, ARPANSA
Attendees: MCA, Rio Tinto, Heathgate, Vimy (dialled in), ARPANSA

1. Implications of the new ICRP radon progeny dose coefficient

ARPANSA introduced a draft advisory note targeted at regulators, industry and the public, titled: *New dose coefficients for radon progeny: impact on workers and the public*. Participants provided feedback on the advisory note, which will be submitted to the Radiation Health Committee (RHC) for their input and approval prior to publication. Industry representatives noted that since most of the risk is associated with smoking and not radon, the advisory should differentiate between statistics that relate to radon-only effects, as opposed to radon and smoking effects. Whilst ARPANSA acknowledges that the risk for lung cancer is strongly enhanced by smoking, the advisory will need to reflect the current ICRP recommendations, which includes using one dose coefficient regardless of a person's smoking status.

ARPANSA aims to publish this advisory after the International Commission on Radiological Protection (ICRP) publish the Occupational Intakes of Radionuclides part 3 (OIR 3) that will contain the new dose coefficients for various radionuclides.

It was suggested that this advisory be targeted at regulators and industry who have a more advanced understanding of the physics concepts involved, with a separate advisory to be developed for the public.

2. ARPANSA's new website

At the previous meeting (March 2017), MCA identified an opportunity for ARPANSA to improve its communication regarding the review and publication of new documents on ARPANSA's draft codes and guides, as well as mechanisms for commenting on draft international documents.

ARPANSA has launched a new website platform this year that will better facilitate the document review process. The MCA has been placed on a user group to receive notifications via the 'Have your say' function on the website.

3. Status on the development of RPS codes and guides with a focus on planned and existing exposure situations

ARPANSA discussed the publication of the *Guide for Radiation Protection in Existing Exposure Situations* (RPS G-2) (September 2017), and the need to focus on the implementation of the guide by engaging with industry to ensure they are aware of how to apply the new guidelines.

4. ICRP update

ARPANSA provided a brief overview of the meetings of the ICRP held in Paris, France in October 2017 that were attended by the CEO and deputy CEO of ARPANSA.

Australia will host the fifth ICRP symposium in Adelaide in November 2019.

5. UNSCEAR update

ARPANSA provided an overview of the United Nations Scientific Committee on the Effects of Atomic Radiation (UNSCEAR) 2016 Report to the General Assembly. The topics relevant to the participants included the effects of radiation from electricity generation (nuclear fuel cycle, coal fire, oil and gas) and the biological effects of selected internal emitters, including uranium and tritium.

6. Non-human biota

ARPANSA discussed the journal article recently published (open access) in the *Journal of Environmental Radioactivity*, *Whole-organism concentration ratios in wildlife inhabiting Australian uranium mining environments (2017)*. The new Australian-specific parameters will aid in evaluating environmental impact assessments, remediation plans and ongoing operations at mining and waste sites in Australia.

7. NERA updates

ARPANSA announced the approval of funding from National Energy Resources Australia (NERA) for a joint project with ARPANSA, ANSTO, Heathgate Resources, Vimy Resources, BHP and others, to facilitate radiological risk assessments in arid environments. ARPANSA will announce its role in the project on its website shortly.

8. Federal guidelines and state implications

Participants discussed the inconsistency in guidance across Australian jurisdictions regarding the protection of non-human biota from radiological exposure. Although this topic is not currently covered in the National Directory for Radiation Protection (NDRP), the updated version of the NDRP is expected to include specific obligations for planned exposure situations, which now includes protection of the environment as a requirement.

9. Discussion of the US EPA document: Protective Action Questions & Answers for Radiological and Nuclear Emergencies

The [US EPA document](#) was briefly discussed and there was a positive consensus from the participants regarding the simple language and diagrams used to convey information on radiological and nuclear emergencies to the public. It was agreed that this communication style could be incorporated into an Australian context to support the upcoming publication of ARPANSA's Emergency Exposure Guide.

10. Other business

Item 10.1 Gap identified in Australian guidance

A discussion at the previous meeting identified the gap in Australian guidance for the closure, rehabilitation and handover of closed mine sites. Furthermore, a framework for 'clearance' is required in Australia for the removal of material from regulatory control when appropriate to do so.

Item 10.2 Non-uranium mines triggering nuclear action

Non-uranium mines are now automatically triggering a review to determine whether the operation is a 'nuclear action' according to the definition in the *EPBC Regulations 2000*. Industry representatives believe that this is likely contrary to the original intent of the Act. ARPANSA is currently discussing this matter with the Department of the Environment.