

Radiation Health Committee

Meeting Minutes

Date 25 – 26 June 2025

Time 9:00 AM – 5:00 PM (25 June)

9:00 AM - 12:30 PM (26 June)

Location QIMR Berghofer, 300 Herston Rd, Herston QLD (25 June)

QLD Health, 15 Butterfield Street, Herston QLD (26 June)

Members Dr Joanna Wriedt (Chair), Dr Gillian Hirth (CEO of ARPANSA), Ms Fay Bellis, Mr

Tom Sullivan, Mr Stuart Parr, Dr Selim Mahbub (ACT), Mr Bradley Feldtman (NT), Mr Simon Critchley (QLD), Mr David Kruss (SA), Mr Nehal Ahmed (Tas),

Mr Glenn Riley (Vic), Ms Hazel Upton (WA)

Presenters Ms Jenni Stiffe (ARPANSA, Virtual, Item 2.1), Mr Rohan Mate (ARPANSA,

Recorded, Item 2.2), Dr Fiona Charalambous (ARPANSA, Virtual, Items 3.1 – 3.3), Mr Jim Scott (ARPANSA, Items 3.4, 3.5, 5.1), Dr Peter Thomas (ARPANSA, Virtual, Item 3.6), Dr Jane Canestra (RHSAC, Virtual, Item 5.2), Mr Andrew Yule/Mr Blake Orr/Dr Rick Tinker (ARPANSA, Virtual, Item 6), Ms Rhonda Brown (ARPANSA, Virtual, Item 7.1), Dr Cameron Lawrence (ARPANSA, Virtual, Item 7.2), Ms Anna Bedford (SA, Virtual, Item 8.2), Dr Martin Butson (NSW,

Virtual, Item 8.3), Dr Julia Carpenter (ARPANSA, Virtual, Item 9).

Observers Mr Len Potapof (NSW), Ms Anna Hunter (NPSRD), Mr James Abbott (DoHDaA),

Mr Ian Cunninghame (DoHDaA), Ms Paula Veevers (QLD), Ms Belinda Bartimote (DoHDaA, Virtual), Mr Patrick Morris (DoHDaA, Virtual), Dr Peter Thomas (ARPANSA, Virtual, Items 1-7.3), Ms Tone Doyle (ARPANSA, Virtual, Item 5.1), Mr Nathan Wahl (ARPANSA, Virtual, Item 5.1), Ms Bridget McCarron (QLD, Items 8-11), Ms Dominique Scott (QLD, Items 8-11), Ms Jessica Chorusch (QLD, Items 8-11), Ms Melissa Bell (NSW, Virtual, Item 8.2), Mr

Mark Carey (NSW, Virtual, Item 8.2)

Secretariat Dr Arne Biesiekierski, Mr James Wheaton.

1 - Meeting Open

The Chair acknowledged the Turrbal and Yuggera People as the Traditional Owners and Custodians of the land on which the meeting was held, paying respects to their Elders past and present. The Chair welcomed observers from the New South Wales (NSW) Environment Protection Authority (EPA), Queensland Health, the Commonwealth Department of Health, Disability and Ageing (DHDA), and Nuclear-Powered Submarine Regulatory Design (NPSRD).

1.1 - Housekeeping

The Radiation Health Committee (RHC) reviewed all outstanding tasks and current progress through the RHC 2025 workplan. The published March 2025 minutes were noted. Two items of outgoing correspondence were noted, and one potential conflict of interest was declared.

1.2 - Response Letter to ARPAB

The Chair discussed a reply to the Australasian Radiation Protection Accreditation Board (ARPAB) November 2024 letter regarding a review of its business and training standards. The reply thanked ARPAB and discussed the RHC's perspective and current work.

2 - CEO Update

ARPANSA's CEO provided an update on recent ARPANSA activities. This covered a range of items including: the outcomes of the recent Review meeting for the Joint Convention on the Safety of Spent Fuel Management and on the Safety of Radioactive Waste Management; a visit to the Okiluoto deep geological waste repository in Finland; recent regional international engagement; the meetings of the Radiation Health and Safety Advisory Council and Nuclear Safety Committee, including work previously referred from the RHC; the recent ARPANSA Licence Holder Forum and its keynote speech on Artificial Intelligence (AI) risks; updates to the National Diagnostic Reference Levels used to compare patient radiation doses; and the publication of both the World Health Organisation (WHO) systematic review on radiofrequency (RF) electromagnetic fields (EMF) and health, and the publication of the United Nations Scientific Committee on the Effects of Atomic Radiation (UNSCEAR) scientific annex on second primary cancers after radiotherapy.

2.1 - Media Enquiries

ARPANSA gave an update on recent media enquiries, trends, sentiment, and thematic analysis of the data. The number of enquiries was slightly reduced compared to the same period last year, with electromagnetic energy (EME) the most common enquiry, and ARPANSA most frequently mentioned in the media alongside the topic of nuclear power.

2.2 - Public Enquiries

ARPANSA presented on recent public enquiries received through its Talk to a Scientist (TTAS) program. The number of enquiries were noted to be tracking as usual for this time of year and were again primarily regarding mobile phone base stations, powerlines, and ionising radiation. Within these, the prevalence of ionising radiation questions increased to be the most common category, driven by interest in medical X-rays and computed tomography (CT) scans. Voluntary postcode tracking of enquiries was now noted, but no obvious trends were observed.

3 - Radiation Protection Series (RPS) Updates

3.1 - Gauges Code and Standard

ARPANSA presented on the public consultation comments analysis and resolution for the draft *Code for Practice-Specific Requirements for Fixed and Portable Radiation Gauges*. Changes included the removal of explanatory text from the Code, to be retained for a future Guidance document, and the use of language more appropriate to the Australian context. The RHC discussed which feedback and changes would also be relevant to the draft *Code for Practice-Specific Requirements for Well-Logging with Sealed Radiation Sources*. The RHC noted the South Australia radiation safety regulator had ongoing direct discussions with gauge manufacturers and users, and discussed the benefits of direct engagement with these stakeholders in any jurisdiction to inform the Code drafting process.

Task: Jurisdictions to identify radiation gauge manufacturers for direct stakeholder engagement.

3.2 - Exemption and Clearance Guide

ARPANSA shared details of an upcoming stakeholder webinar set for 20 August 2025, on developing guidance for the exemption or exclusion of certain very low-dose or low-risk radioactive materials from regulation. The RHC discussed progress on drafting a guide including select examples which RHC nominated. The RHC also discussed how guidance could be implemented in jurisdictions without existing mechanisms for clearing radioactive material from regulation, and the intersection of this guidance with the current *Code for Radiation Protection in Planned Exposure Situations (2020), RPS C-1 (Rev.1)* and *Guide for Radiation Protection in Existing Exposure Situations (2017), RPS G-2*.

3.3 - Radioactive Waste Management Code

ARPANSA presented on work to draft a *Code of Practice for Radioactive Waste Management* as one of the cost-shared RPS projects agreed at the previous meeting. This covered the background, scope, and proposed drafting author arrangements. The RHC discussed broadly how this new code would interact with existing Australian standards and operators. ARPANSA expects to circulate a draft Project and Document Plan (PDP) for RHC approval out-of-session.

3.4 - Non-Medical Human Imaging Code

ARPANSA presented an update on the drafting of a *Non-Medical Human Imaging Code*, which is expected to be circulated out-of-session. The RHC also discussed the potential exposure of minors (such as visitors to correctional facilities or juvenile detainees), how to validate and track received doses more broadly, and the ethics around incidental detection of potential medical issues.

3.5 - X-Ray Equipment Code

ARPANSA presented the draft Project and Document Plan (PDP) for a revised *X-Ray Equipment Code* which will seek to revise and modernise Radiation Health Series (RHS) publications 9, 21, and 22. The RHC discussed matters such as guidance around use of airport baggage scanners, requirements for and validation of competence of users or servicing staff, and the degree of protection provided by mechanical interlocks. The RHC endorsed the PDP.

<u>Decision:</u> RHC endorsed the PDP for an X-ray Equipment Code to replace RHS 9, 21 and 22.

3.6 – Medical Radiation Exposure Safety Guides (RPS 14.1/2/3)

ARPANSA presented on the status of work to update the three Safety Guides associated with Medical Exposures, noting provisional membership of working groups for each Guide had been arranged, and these were expected to convene for their first meetings shortly. ARPANSA gave an expected timeline for the drafting work, with first drafts expected to be ready for RHC review by mid-2026.

ARPANSA also presented on the revised National Diagnostic Reference Levels (NDRLs), detailing national consultation, changes made, possible approaches to implementing the changes over time, and the upcoming publication of the revised NDRLs in the Australian Society of Medical Imaging and Radiation Therapy (ASMIRT)'s publication *Spectrum*.

4 - Member Representing the Interests of the General Public

The Member did not raise any issues at this meeting.

5 – Other Ongoing Items

5.1 - Import Permits

ARPANSA presented proposed changes to its administrative processes around import permits for radioactive material. These changes will seek to align these processes with Australian Border Force (ABF) policies including around the exemption of materials from regulation and post-import permit approvals. The RHC discussed individual jurisdictional approaches to the exemption of material from regulation, and Western Australia noted related regulatory updates in its jurisdiction, inviting input from ARPANSA.

5.2 - Competencies

ARPANSA recapped a recent meeting with the Commonwealth Department of Health, Disability and Ageing (DHDA), regarding the independent review led by Mark Cormack (*'Unleashing the Potential of our Health Workforce – Scope of Practice Review'*) that ARPANSA tabled for information at the November 2024 RHC meeting. DHDA noted that no work relating to the report's recommendations to review radiation safety legislation was scheduled for 2025.

The Chair of the Radiation Health and Safety Advisory Council (RHSAC), as lead of a joint RHC and RHSAC working group, presented on their considerations of national frameworks for ensuring the competency of people involved with radiation protection, providing background to current and historical frameworks and proposed Terms of Reference for the joint working group. The working group will consider a letter of advice to the CEO. The RHC decided not to endorse the ToRs as presented but instead chose to consider them further out of session.

Task: RHC to provide feedback on the draft working group Terms of Reference by 9 July 2025.

5.3 - Tasmanian Medical Radiation Practitioners

The radiation safety regulator from the Tasmanian Department of Health presented on the results of a recent licence holder survey, which sought to map training and competency arrangements for Medical Radiation Practitioners.

5.4 - Collariums

[Item deferred to later in Agenda]

6 - Iran-Israel Conflict Radiological Emergency Coordination Centre Dial-In

The RHC dialled into ARPANSA's Radiological Emergency Coordination Centre (RECC) to receive an update on the ongoing conflict in the Middle East, including examples of general advice for possible radiological incident scenarios. ARPANSA described the RECC structure and scheduling, and it was noted that there was no detected release of radioactive material in the region.

7 - New Items

7.1 - ACDS Audits

ARPANSA presented on the outcomes of its participation in the recent Second Biennial Technical Meeting of the IAEA Dosimetry Audit Network, including a panel discussion on the establishment of a Dosimetry Audit Network Charter similar to that of the Secondary Standard Dosimetry Laboratories Network. ARPANSA also presented on a recent audit used as a case study.

5.4 - Collariums

[Item deferred from earlier in Agenda]

The working group established to propose a modification to the National Directory for Radiation Protection 2nd Edition around the use of collariums presented a draft revision to the clause on the prohibition of commercial application of tanning units. The RHC discussed the matter and agreed to circulate a revised proposal for further consideration out-of-session.

<u>Task:</u> Working Group to revise the proposed modification and circulate it to RHC for consideration out-of-session.

7.2 – Review of the ANRDR Advisory Board

ARPANSA presented on a recent review into the governance structure of the Australian National Radiation Dose Register (ANRDR), with the aim to improve visibility of the ANRDR's work and seek technical input during a period of technology upgrades to the ANRDR platform. ARPANSA noted it would seek RHC feedback on proposed governance changes out-of-session.

7.3 – Guidance Statement on the Wearing of Personal Dosimetry

The RHC discussed the need for guidance on the wearing of personal dosimetry. It noted there is already a requirement in the existing *Standard for Radiation Dosimetry Service Providers (RPS S-3)* for dosimetry service providers (DSPs) to give relevant wearing instructions for each unique type of dosemeter supplied, and that specific types of doses correspond to measurements at certain locations, which means that a single national piece of guidance may be unnecessary. However, the RHC noted international examples of guidance do exist and should be reviewed.

Task: The RHC to consider international examples of guidance on wearing personal dosimetry.

8 - Regulatory Knowledge Sharing

Queensland Health presented on its regulatory structure and activities, and the considerations necessary to operate effectively in this jurisdiction.

EPA SA presented remotely on the mapping of the radiation risks within their jurisdiction. The RHC broadly discussed the assessment of radiation risk for the purposes of regulation, including the possibility of producing a national radiation risk matrix. To assist in understanding related approaches to risk, the representative of the Nuclear Safety Committee offered to present on how to undertake a nuclear probabilistic safety assessment at the next meeting. ARPANSA and NSW also committed to investigate and contribute to further considerations of a national approach to risk assessment.

NSW presented remotely on their recent study into the efficacy of radiation shielding at a number of medical radiation facilities. This presentation outlined the scope and design of the study, as well as the observed results. A key finding was that no premises exposed members of the public to doses above regulatory limits. NSW indicated this study may also be repeated at dental facilities in the future.

EPA SA also presented on the reporting of radiation incidents within their jurisdiction and lessons learned. The RHC discussed the various jurisdictional and organisational approaches to incident reporting, including the handling of near-misses and the importance of positive reporting cultures. ARPANSA committed to providing an update at the next meeting. ARPANSA noted that it will investigate national approaches to radiation risk management.

<u>Task:</u> NSC-RHC Crossover member to present at next meeting on conducting a nuclear PSA. <u>Decision:</u> RHC to request an update on radiation incident reporting for its next meeting.

9 - Environmental Framework and Recreational Water Guidelines

ARPANSA presented remotely on the recent publication of the *Monitoring and Assessment of Radiation in the Australian Environment* environmental framework. The RHC discussed possible collaborations in monitoring programs. ARPANSA also presented on the proposed implementation of guideline screening values for recreational uses of water, seeking RHC input on three possible

options for these guideline values. ARPANSA noted a technical report would be circulated out-of-session once it is finalised.

<u>Task:</u> RHC members to comment to ARPANSA on preferred Recreational Water guideline activity values by **14 July 2025.**

10 - Australian Delegation to Finland Waste Repository

The CEO of ARPANSA presented on the recent visit of an Australian Government delegation to the Onkalo Spent Nuclear Fuel Repository in Okiluoto, Finland, the world's first near-operational deep geological radioactive waste repository. The presentation and discussion discussed design, methodology and timelines of the construction and operation. The repository is in the final stages of commissioning.

11 - Other Business and Housekeeping

The meeting was closed with no other issues noted.

The next meeting noted as scheduled for 25-26 November 2025 in Sydney, alongside the Radiation Health and Safety Advisory Council meeting.