

Model Work Health and Safety Regulations for Mining - Public Comment Response Form

Individual/Organisational name: Andrew Johnston	
Regulations Chapter 9: Mines	
Part 9.1	
Regulation	Comment
9.1.4 (1).(a).(viii)	<p>The inclusion of ionising radiation within this definition of 'principle mining hazard' is not justified.</p> <p>It is difficult to imagine any circumstance where a single exposure to ionising radiation associated with NORM as a result of an incident (or even a series of recurring incidents) could lead to multiple fatalities. The risks associated with exposure to radiation from NORM arise from long term, not acute, exposures.</p> <p>However, the chronic exposure risks (and acute risks) noted above are already subject to extensive State and Territory regulations based on a nationally agreed process, outlined in the <i>National Directory for Radiation Protection</i>; ARPANSA, July 2011. This nationally agreed regulatory approach includes adoption by all jurisdictions of Codes of Practice including the <i>Code of Practice on Radiation Protection and Radioactive Waste Management in Mining and Mineral Processing</i>, ARPANSA, August 2005.</p> <p>The creation of a parallel regulatory process for radiation hazards in mining via the Model Work Health and Safety Regulations for Mining would not be in the best interest of Safe Work Australia. It would be counter to the current Commonwealth and State attempts to achieve regulatory efficiencies and minimise regulatory burdens, and the implementation would create jurisdictional problems and result in confusion for both operators and existing regulators.</p> <p>It is suggested that the Model Work Health and Safety Regulations for Mining, should only reference the existing national regulatory process which include radiation hazards associated with mining</p>
Part 9.2	
Regulation	Comment
Schedule 9.2, Part 8.	<p>The wording of Schedule 9.2: Part 8, indicates a lack of understanding of the nature of radiation hazards and how they should be managed and is inconsistent with the proposed Code of Practice. For example, there is no indication of exemption or exclusion levels or the dose limits that might apply.</p> <p>As noted in the previous comment, the inclusion of ionising radiation in these regulations is not considered justified as a principal mining hazard and should be deleted.</p>

APPENDIX	
Regulation	Comment
Appendix	Should Safe Work Australia include radiation as a principal hazard in mining, the Appendix should include reference to the existing regulatory process for ionising radiation.
Other Comments	

Codes of Practice	
Managing Naturally Occurring Radioactive Materials in Mining	
Section/page number	Comment
General Comment on the Code	<p>The Foreword indicates a fundamental failing of the Code in that it was developed without reference to the existing State or Territory radiation regulatory processes.</p> <p>The 'Scope and Application' section of this proposed Code indicates that it attempts to align the WHS standards governing mining with the system or radiation protection as recommended by the IAEA, IAEA and ARPANSA. It then states the existing ARPANSA legislation will take precedence in the case of any conflict with this Code. However, it is not the ARPANSA legislation that applies radiation protection controls on mining within States and Territories. These uniform controls have been agreed via the adoption of the National Directory for Radiation Protection, national standards and adoption of various Codes of Practice, including the <i>Code of Practice on Radiation Protection and Radioactive Waste Management in Mining and Mineral Processing</i>, ARPANSA, August 2005.</p> <p>There are many drafting and technical errors in the Code itself that clearly indicate a lack of understanding of radiation protection. These have been documented in other submissions.</p> <p>There is no attempt to address the type of incident that would result in multiple fatalities arising from the principal hazard associated with exposure to radiation from NORM. (e.g. Page 5: how can drilling or exploration possibly result in fatalities from an incident involving a NORM radiation exposure?)</p> <p>The Code is not consistent with the existing approach to NORM management. For example, the Introduction states that 'If there is no principal mining hazard management plan for NORMS, it will be taken to signify that ionising radiation hazards have not been considered at all by the mining operation.' The nationally agreed approach recommended in the ARPANSA <i>Safety Guide for the Management of Naturally</i></p>

Occurring Radioactive Material (NORM) (2008) is one based on a graded approach and involving screening and possible exemption from regulation. That is, the lack of a management plan may just reflect the lack of any significant risk.

There is inconsistent use of the terms 'must' 'should' and 'may' leading to uncertainty in application. There are minor differences in terminology from that used existing radiation protection legislation (e.g. the use of the term 'as low as reasonably practicable (ALARP)' instead of ALARA) and errors in terminology (e.g. 'critical group' is a term that is no longer used and has been replaced by representative person).

In summary, the proposed Code of Practice serves no useful purpose as the management of radiation issues in mining including NORM is already the subject of existing State and Territory legislation based on a nationally agreed regulatory process.

To avoid potential confusion and jurisdictional problems, it is recommended that the Code be removed in favour of a Safe Work Australia reference to the existing regulatory processes via the National Directory, including the use of the existing *Code of Practice on Radiation Protection and Radioactive Waste Management in Mining and Mineral Processing*, ARPANSA, August 2005.