

Your Ref: CEO1428/15 Our Ref: F-AA-11918 D-AA-15/248991 Contact: Vic Andrich

GS Environmental Risk Assessment Framework Strategy and Reform Department of Environment Regulation Locked Bag 33 CLOISTERS SQUARE WA 6850

Dear Sir/Madam

DRAFT GUIDANCE STATEMENT ON ENVIRONMENTAL RISK ASSESSMENT FRAMEWORK

Thank you for the opportunity for the Department of Health (DOH) to provide a submission on the abovementioned guidance statement.

The DOH provides the following comments:

Overview

The Guidance Statement should acknowledge the limitations of the environmental impact (EIA) assessment process when referring to the protection of public health. The processes outlined within the scope of the *Environmental Protection Act 1986* do not include reference to 'health risk assessment' and although public health emission standards may be quoted, following the EIA process does not necessarily indicate that all public health impacts have been addressed.

Air Quality

The DOH has previously been in extensive consultation with the Department of Environment Regulation (DER) in developing the '*Industry Regulation Emissions and Discharges Assessment Framework – Annex 1: Assessing emissions to air*'. This Guidance Statement has been reviewed in that context and features of the above framework should be included in this document.

Shortcomings of the current document:

- All guidance on how to use the air quality guidelines listed in the document has been removed.
 - Multiple air-quality guideline values were provided for annexe 1 for specific purposes i.e.: 1-hr guidelines were considered for modelling purposes – the context for providing these has now been removed.
 - Certain air-quality values need to be considered together so that public health is protected, this guidance has now been removed.

- A number of carcinogenic compounds have been incorrectly classified (DER officers have been advised).
- DOH is not listed as an agency to consult in relation to public health even though public health is referenced throughout the document.
- Page 6 The consequence-table lists public health consequences that are vague and subject to being incorrectly interpreted. i.e.:
 - References to 'large population' and 'small population' is unclear as to meaning
 - o Reference to 'health criteria significantly exceeded'
 - this is not a consequence
 - the term 'significant' is subjective and potentially problematic in this context – how is significance determined?

Page 22 – Appendix 4A - Air Guideline Values (AGV) Overall: The document lists airguideline values derived from various methods; the majority of 1-hr values from NSW/Victoria are mathematically derived from Occupational Health and Safety (OHS) values and most have not been assessed by DOH. However the derivation method employed by NSW/Victoria is accepted by DOH as a legitimate method for determining guideline values until a more thorough assessment can be undertaken.

Conclusion:

- DOH has not assessed the evidence in detail for the majority of the 1-hr values sourced from NSW/Victoria however acknowledges that the method used to derive a 1-hr value is legitimate and typically employed for modelling purposes.
- The majority of the 1-hr values are derived for modelling purposes and are not based on critical health end points therefore certain substances must not be assessed on 1-hr values alone; to do so may place public health at risk.
 - o guidance on how to apply the air-guideline values should be provided.
- The Consequence table lists public health consequences that are subjective and therefore open to interpretation.

Recommendations (Air Quality):

- 1. DOH does not support listing the AGV's in this document without appropriate supporting guidance on how to use the AGV's for assessing public safety.
- 2. The consequence criteria provide a more objective measure of consequence.
- 3. DOH is to be listed as an 'interested agency'.

Appendix 2

- A reference from the Australian Bureau of Statistic (ABS) on what is considered a large/small population could be useful for applicants to determine the public health consequence of Risk Assessment Matrix and Criteria
- NHMRC and ARMCANZ (2006) Australian Guidelines for Water Recycling Managing Health and Environmental Risk and the WA Guidelines for Biosolids Management (2012) should be included in the list of Health and Ecosystem Criteria.

Appendix 5

- Page 3, Table 3 Land Criteria contaminant loading limit for heavy metals has different criteria than the WA *Guidelines for Biosolids Management* (Tables 1, 7, A2 and A9). This Guidance Statement is to be amended to include the same criteria.
- Biosolids microbiological criteria are to be included in the tables.

Consultation Paper

Figure 1: The DOH is to be listed as one of the agencies directly interested in the referral of applications.

DOH reaffirms its commitment to working closely with the DER in the development of consistent standards between our departments however retains authority for determining safeguards for public health.

Should you have queries or require further information please contact Vic Andrich on

Yours sincerely

or



24 February 2016