Managing Risks of Hazardous Chemicals - Minimum Standard

October, 2014

Contents

1 Executive Summary ................................................................. 2
2 More Information ................................................................. 2
3 Using this Standard ............................................................... 2
4 Standard Provisions ............................................................ 4
  4.1 Hazardous Chemicals .......................................................... 4
    4.1.1 Chemical Management System ........................................ 4
    4.1.2 Labelling and Safety Data Sheets ..................................... 4
    4.1.3 Register and Manifest of Hazardous Chemicals .................. 5
    4.1.4 Placards ........................................................................... 5
    4.1.5 Control of Risk ................................................................. 5
    4.1.6 Health Monitoring ............................................................ 6
    4.1.7 Induction, information, training and supervision .................. 6
    4.1.8 Prohibition, authorisation and restricted use ...................... 6
    4.1.9 Pipelines ........................................................................... 7
  4.2 Major Hazard Facilities (MHF) ............................................... 7
  4.3 Globally Harmonised System of Classification and Labelling of Chemicals (GHS) .... 7
  4.4 Poisons .................................................................................. 7
  4.5 Agricultural and Veterinary Chemicals .................................... 8
  4.6 Security-Sensitive Dangerous Substances .............................. 8
  4.7 Transportation of Dangerous Goods ....................................... 9
  4.8 Explosives ............................................................................ 9
  4.9 Import and Export of Controlled Substances .......................... 9
  5 Responsibilities ...................................................................... 9
  6 Glossary .................................................................................. 10
  7 Supporting Documentation .................................................... 11
  8 Appendices ............................................................................. 11
  9 Versioning .............................................................................. 11

Responsible Officer

Executive Director – Human Resources

Approved by

Executive Director – Human Resources

Approved and commenced

October, 2014

Review by

October, 2017
Executive Summary

The University of Tasmania is committed to identifying, assessing and controlling the risks associated with hazardous chemicals in the workplace.

More Information

For further information visit the University’s Hazardous Chemicals and Poisons webpage; or contact the Human Resources – Work Health and Safety (WHS) Unit:

Email health.safety@utas.edu.au

Using this Standard

This Minimum Standard has been developed to ensure compliance with the following Acts, Regulations and Codes of Practice.

Hazardous Chemicals

- Work Health and Safety Act 2012;
- Work Health and Safety Regulations 2012 (Sections 328-391).

The University shall comply with the following Codes of Practice, except where compliance can be achieved by following another method, such as a technical or an industry standard that provides an equivalent or higher standard of work health and safety than the Code of Practice.

- Managing Risks of Hazardous Chemicals in the Workplace Code of Practice;
- Labelling of Workplace Hazardous Chemicals Code of Practice;
- Preparation of Safety Data Sheets for Hazardous Chemicals Code of Practice;

Poisons
• **Poisons Act 1971;**

• **Poisons Regulations 2008;**

**Agricultural and Veterinary Chemicals**

• **Agricultural and Veterinary Chemicals (Control of Use) Act 1995**

• **Agricultural and Veterinary Chemicals (Control of Use) Regulations 2012**

**Security-sensitive Dangerous Substances (SSDS)**

• **Security-sensitive Dangerous Substances Act 2005**

• **Security-sensitive Dangerous Substances Regulations 2005**

**Transportation of Dangerous Goods**

• **Dangerous Goods (Road and Rail Transport) Act 2010**

• **Australian Code for the Transport of Dangerous Goods by Road and Rail (ADG Code)**

**Import and Export of Controlled Substances**

• **Customs (Prohibited Imports) Regulations 1956**

• **Customs (Prohibited Exports) Regulations 1958.**

**Explosives**

• **Explosives Act 2012**

• **Explosives Regulations 2012**

This Minimum Standard is to be read in conjunction with the University’s:

• **Chemical Management Procedure.**

• **Health Monitoring Minimum Standard**

• **Prohibited Carcinogens, Restricted Carcinogens and Restricted Hazardous Chemicals Procedure**

• **Security-Sensitive Dangerous Substances Procedure**

• **Hazardous Chemicals, Dangerous Goods and Explosives Storage and Transport Procedure**

• **Purchasing and Work Health Safety Procedure**

An exemption for any requirement in this Minimum Standard may only be approved by the Work Health and Safety (WHS) Unit, following completion of a risk assessment and consultation with the relevant Organisational Unit head(s).
4 Standard Provisions

4.1 Hazardous Chemicals

4.1.1 Chemical Management System

Hazardous chemicals at a University workplace are managed through the University's chemical management system as documented in the Chemical Management Procedure.

The system utilises Chemwatch™ for Safety Data Sheet (SDS) information, hazardous chemical risk assessments, hazardous chemical registers, and labelling.

Additional information on the chemical management system and Chemwatch can be accessed through the University's Hazardous Chemicals and Poisons webpage.

Further information is available from Chemwatch at http://www.chemwatch.net/

4.1.2 Labelling and Safety Data Sheets

The University will comply with the Work Health and Safety Regulations 2012, PART 7.1 - HAZARDOUS CHEMICALS (Sections 329-345).

The Regulations include requirements for:

- Labelling of hazardous chemicals – general requirements, containers and pipe work;
- Safety data sheets - obtaining and giving access and changes.

See also the following Schedules contained in the Work Health and Safety Regulations 2012

- Schedule 6 Classification of Mixtures;
- Schedule 7 Safety Data Sheets;
- Schedule 8 Disclosure of Ingredients in Safety Data Sheets;
- Schedule 9 Classification Packaging and Labelling Requirements;

(i) Labelling of Workplace Hazardous Chemicals

The Labelling of Workplace Hazardous Chemicals Code of Practice provides practical guidance on how to correctly label hazardous chemicals used in the workplace.

(ii) Preparation of Safety Data Sheets for Hazardous Chemicals Code of Practice

The Preparation of Safety Data Sheets for Hazardous Chemicals Code of Practice provides practical guidance on how to prepare a safety data sheet for any hazardous chemical that is being manufactured or imported for use, handling or storage in a University workplace.

(iii) Managing Risks of Hazardous Chemicals in the Workplace

The Managing Risks of Hazardous Chemicals in the Workplace Code of Practice provides practical guidance on how to manage health and safety risks associated with hazardous chemicals used in the workplace.
This includes the University as a manufacturer, importer or supplier of hazardous chemicals, or where the University uses, handles, generates or stores hazardous chemicals at the workplace.

The Code applies to:

- substances, mixtures and articles used, handled, generated or stored at the workplace which are defined as hazardous chemicals under the Work Health and Safety Regulations 2012; and
- the generation of hazardous chemicals from work processes, for example toxic fumes released during welding.

Additional information on chemicals that have been classified as hazardous is available through Safe Work Australia’s Hazardous Substance Information System (HSIS).

4.1.3 Register and Manifest of Hazardous Chemicals

The University will comply with the Work Health and Safety Regulations 2012 DIVISION 3 - REGISTER AND MANIFEST OF HAZARDOUS CHEMICALS (Sections 346-348) with regard to:

- hazardous chemicals register;
- manifest of hazardous chemicals;
- notification if manifest quantities are exceeded.

The Managing Risks of Hazardous Chemicals in the Workplace Code of Practice provides practical guidance on hazardous chemicals registers and manifests. See also the following Schedules contained in the Regulations:

- Schedule 11 Placard and Manifest Quantities;
- Schedule 12 Manifest Requirements.

4.1.4 Placards

The University will comply with the Work Health and Safety Regulations 2012 DIVISION 4 – PLACARDS (Sections 349-350) with regard to placarding requirements. See also the following Schedule contained in the Regulations:

- Schedule 11 Placard and Manifest Quantities;
- Schedule 13 Placarding Requirements.

The Managing Risks of Hazardous Chemicals in the Workplace Code of Practice provides practical guidance on placards.

4.1.5 Control of Risk

The University will comply with the Work Health and Safety Regulations 2012 DIVISION 5 - CONTROL OF RISK – OBLIGATIONS OF PERSONS CONDUCTING BUSINESSES OR UNDERTAKINGS:

- Subdivision 1 - General obligations relating to management of risk (Sections 351-356);
• Subdivision 2 - Spills and damage (Sections 357-358);
• Subdivision 3 - Emergency plans and safety equipment (Sections 359-362);
• Subdivision 4 - Storage and handling systems (Sections 363-367).

The *Managing Risks of Hazardous Chemicals in the Workplace Code of Practice* provides practical guidance on control of risk.

A template from the code for assessment of risk is provided in Appendix 1.

**4.1.6 Health Monitoring**

The University will comply with the *Work Health and Safety Regulations 2012* DIVISION 6 - HEALTH MONITORING (Sections 368-378) with regard to health monitoring.

See also the following Schedule contained in the Regulations:

- Schedule 14 Requirement for health Monitoring.

The *Managing Risks of Hazardous Chemicals in the Workplace Code of Practice* provides practical guidance on health monitoring.

Organisational Units that use, handle or store hazardous chemicals should also refer to the University's *Health Monitoring in the Workplace Minimum Standard*.

**4.1.7 Induction, information, training and supervision**

The University will comply with the *Work Health and Safety Regulations 2012* DIVISION 7 - INDUCTION, INFORMATION, TRAINING AND SUPERVISION (Section 379) with regard to the duty to provide supervision.

The *Managing Risks of Hazardous Chemicals in the Workplace Code of Practice* provides practical guidance on induction, information, training and supervision.

**4.1.8 Prohibition, authorisation and restricted use**

The University will comply with the *Work Health and Safety Regulations 2012* DIVISION 8 - PROHIBITION, AUTHORISATION AND RESTRICTED USE (Sections 380-388) with regard to prohibited and restricted carcinogens and restricted hazardous chemicals.

The requirements for carcinogens and restricted chemicals are contained in Schedule 10 of the Work Health and Safety Regulations 2012 as follows:

- Table 10.1 – Prohibited carcinogens
- Table 10.2 – Restricted carcinogens
- Table 10.3 – Restricted hazardous chemicals

University requirements are contained in the *Prohibited Carcinogens, Restricted Carcinogens and Restricted Hazardous Chemicals Procedure*.

The *Managing Risks of Hazardous Chemicals in the Workplace Code of Practice* provides practical guidance on the prohibition, authorisation and restricted use of chemicals.
4.1.9 Pipelines

The University will comply with the *Work Health and Safety Regulations 2012* DIVISION 9 – PIPELINES (Sections 389-391) with regard to pipelines.

The *Managing Risks of Hazardous Chemicals in the Workplace Code of Practice* provides practical guidance on pipelines.

4.2 Major Hazard Facilities (MHF)

The University must notify Workplace Standards where the quantities of hazardous chemicals present, or likely to be present, exceed 10% of their threshold quantity in accordance with the *Work Health Safety Regulations 2012* (536 – 549) and Schedule 15 of the *Work Health and Safety Regulations 2012*.

The University has applied a risk management approach to ensure that the quantities of hazardous chemicals present or likely to be present at the workplace do not exceed 10% of their threshold quantity and do not meet the requirements for a Major Hazard Facility.

If hazardous chemicals are used, handled or stored at or above the prescribed threshold quantities, then the Duties of Operators of Determined Major Hazard Facilities (550 – 608) must be complied with.

Additional information is available in:

- *Major Hazard Facilities Guides* available through [Worksafe Tasmania](#)
- *Guide For Major Hazard Facilities – Notification and Determination* available through [Safe Work Australia](#)

University requirements are contained in the *Hazardous Chemicals, Dangerous Goods and Explosives Storage and Transport Procedure*.

4.3 Globally Harmonised System of Classification and Labelling of Chemicals (GHS)

The *Work Health and Safety Regulations 2012* implement a system of chemical hazard classification, labelling and safety data sheets (SDS) requirements based on the Globally Harmonised System of Classification and Labelling of Chemicals (GHS).

Transition to the GHS will occur over a 5 year period from 1 January 2012 until 31 December 2016.

Information on the GHS is available through [Safe Work Australia](#)

Further information including a copy of the *Globally Harmonised System of Classification and Labelling of Chemicals (GHS)* is available through the United Nations Economic Commission For Europe (UNECE) [United Nations Economic Commission For Europe (UNECE)](#) website.

4.4 Poisons

Each Organisational Unit is responsible for ensuring compliance with the *Poisons Act 1971* and the *Poisons Regulations 2008*.

Further information, including the Poisons List and the Poisons (Declared Restricted Substances) List, is available from the Department of Health and Human Services, Tasmania - [Pharmaceutical Services Branch](#) website.
4.5 Agricultural and Veterinary Chemicals

Users of agricultural and veterinary chemicals have a responsibility to ensure that they implement good practices to prevent off-site movement.

Organisational units are to ensure compliance with the requirements of the *Agricultural and Veterinary Chemicals (Control of Use) Act 1995* and the *Agricultural and Veterinary Chemicals (Control of Use) Regulations 2012*.

The Department of Primary Industries, Parks, Water and Environment’s Biosecurity AgVet Chemicals website contains information on the safe, responsible and effective use of agricultural and veterinary chemicals.

4.6 Security-Sensitive Dangerous Substances

The purpose of the *Security-sensitive Dangerous Substances Act 2005* is to “restrict and regulate access to certain dangerous substances whose deliberate misuse would constitute an especial threat to State security and public safety, to regulate and monitor, and improve the security of, commercial, industrial and other activities carried out in connection with such dangerous substances and for related purposes”.

A security-sensitive dangerous substance (“SSDS”) is a substance specified in Part 2 of Schedule 1 of the *SSDS Act* and includes:

1. ammonium nitrate with a specified UN number and which is not an explosive;
2. ammonium nitrate emulsion that contains more than 45% ammonium nitrate, does not have a UN number and is not an explosive;
3. ammonium nitrate mixture that contains more than 45% ammonium nitrate, does not have a UN number and is not an explosive;
4. blasting explosive within the meaning of the *Australian Code for the Transport of Dangerous Goods by Road and Rail (ADG Code)*;
5. blasting explosive within the meaning of AS 2187.0 published by Standards Australia;
6. Type 3 firework within the meaning of the regulations made under the *Explosives Act 2012*;
7. propellant within the meaning of the ADG Code in powder form and in a quantity greater than 5 kilograms.

A restricted activity in relation to an SSDS means manufacturing, importing, exporting, buying, selling, supplying, storing, using or disposing of an SSDS as defined in the Act.

It is an offence to carry out a restricted activity in relation to an SSDS unless the person is authorised to carry out the restricted activity by an SSDS permit and complies with the conditions of the SSDS permit in carrying out the restricted activity.

The Department of Primary Industries, Parks, Water and Environment's Biosecurity website provides further information on Security-Sensitive Ammonium Nitrate.

The University’s *Security-Sensitive Dangerous Substances Procedure* documents the requirements for the management of Security-Sensitive Dangerous Substances at a University workplace.
4.7 Transportation of Dangerous Goods

The University and each Organisational Unit has a responsibility under WHS law to manage the risks from all hazardous chemicals, including those that are dangerous goods in accordance with the Dangerous Goods (Road and Rail Transport) Act 2010.

Most substances and mixtures that are dangerous goods under the ADG Code are also hazardous chemicals.

Transportation of dangerous goods is subject to State and Territory laws based on the requirements under the Australian Code for the Transport of Dangerous Goods by Road and Rail (ADG Code).

Where quantities of dangerous goods transported by road exceed:

- 500 litres or kilograms for a container Class 2-9
- 3000 litres for an IBC (Intermediate Bulk Container for Class 2-9 where not filled or emptied on the vehicle)
- risk category 2 of the Australian Explosives Code for Class 1 (Explosives)

Both the driver and the vehicle must be licensed to transport Dangerous Goods.

Further information is available from Workplace Standards Tasmania at http://workplacestandards.tas.gov.au/licensing/dangerous_goods_transport_licensing

University requirements are contained in the Hazardous Chemicals Storage and Transport Procedure.

4.8 Explosives

Organisational units are to ensure compliance with the requirements of the Explosives Act 2012 and the Explosives Regulations 2012.

The Workplace Standards Tasmania (WST) website contains information on explosives safety.

University requirements are contained in the Hazardous Chemicals Storage and Transport Procedure.

4.9 Import and Export of Controlled Substances

The Office of Chemical Safety (OCS) is responsible for granting permits and licenses that authorise the import and export of certain narcotic drugs, psychotropic substances, precursor chemicals, antibiotics and androgenic/anabolic substances controlled under the Customs (Prohibited Imports) Regulations 1956 and Customs (Prohibited Exports) Regulations 1958.


5 Responsibilities

| Hazardous Chemicals Coordinator | Each Organisational Unit is to nominate a hazardous chemicals coordinator responsible for the co-ordination of hazardous chemical information within that Organisational |
Managers/Supervisors are to ensure:

- risk assessments are carried out and recorded for all hazardous chemicals used or produced in their area of responsibility;
- all workers, for whom they are responsible are informed regarding the risks of hazardous chemicals in the workplace;
- workers are trained in the correct handling and use of hazardous chemicals and associated equipment, and that appropriate equipment and information is available;
- supervision is provided as is reasonably practicable to ensure the workers' health and safety when using or producing hazardous chemicals.

Officers have a duty to ensure this standard is implemented within their areas of responsibility, including ensuring that:

- the University has and uses appropriate resources and processes to eliminate or minimise risks that arise from hazardous chemicals;
- suitable equipment is available for the safe handling, production and use of hazardous chemicals;
- information and training is provided regarding hazardous chemicals;
- a hazardous chemicals co-ordinator(s) is appointed.

Workers have a duty to take reasonable care for their own health and safety and to ensure that they do not adversely affect the health and safety of other persons. Workers must comply with any reasonable instruction and cooperate with any reasonable policy or procedure relating to health and safety at the workplace including this minimum standard.

The WHS Committee is to ensure the University provides WHS policies, procedures and guidance including this minimum standard and that the effectiveness of this minimum standard is reviewed.

The WHS Unit is to oversee the University's compliance with this minimum standard, provide advice and guidance to Organisational Units and approve any exemptions to meeting minimum standard requirements.

### Glossary

<table>
<thead>
<tr>
<th>Term/Acronym</th>
<th>Definition</th>
</tr>
</thead>
<tbody>
<tr>
<td>ADG Code</td>
<td>Australian Code for the Transport of Dangerous Goods by Road and Rail, 7th edition, approved by the Australian Transport Council</td>
</tr>
<tr>
<td>Chemwatch™</td>
<td>Chemwatch provides software solutions and services for SDS management, chemical risk assessments and emergency response</td>
</tr>
</tbody>
</table>
GHS  Globally Harmonised System of Classification and Labelling of Chemicals
MHF  Major Hazard Facility
Manager/Supervisor An individual, who assumes responsibility for the health or welfare of any other person in a workplace by providing instruction, direction, assistance, advice or service, (including those with responsibility for students).
Risk control Taking action to first eliminate health and safety risks so far as is reasonably practicable, and if that is not possible, minimising the risks so far as is reasonably practicable. Eliminating a hazard will also eliminate any risks associated with that hazard.
SDS  Safety Data Sheet
SSDS  Security Sensitive Dangerous Substance
Worker A University staff member, contractor, volunteer or student gaining work experience.

7  Supporting Documentation
   • Chemical Management Procedure
   • Hazardous Chemical Risk Assessment Checklist
   • Hazardous Chemicals, Dangerous Goods and Explosives Storage and Transport Procedure
   • Labelling of Workplace Hazardous Chemicals Code of Practice
   • Managing Risks of Hazardous Chemicals Code of Practice
   • Preparation of Safety Data Sheets for Hazardous Chemicals Code of Practice
   • Prohibited Carcinogens Restricted Carcinogens and Restricted Hazardous Procedure
   • Security Sensitive Dangerous Substances Procedure
   • Work Health and Safety Policy

8  Appendices

9  Versioning

<table>
<thead>
<tr>
<th>Former Version</th>
<th>Current Version</th>
<th>Hazardous Substances Policy and Procedures Approved 29 March 1999 by the OH&amp;S Committee; revoked by the WHS Committee, 27 August 2013</th>
<th>Managing Risks of Hazardous Chemicals Minimum Standard (current document) ; approved October,2014</th>
</tr>
</thead>
</table>
APPENDIX 1 – OVERVIEW OF A RISK ASSESSMENT PROCESS

An overview of the process for the assessment of health risks arising from the use of hazardous chemicals in the workplace is provided below.

Does a risk assessment need to be carried out?

Decide who will carry out the assessment

Obtain information on the hazardous chemicals. Check the following:
• Label and SDS of the product
• Placards, manifest, hazardous chemical register
• Previous risk assessments, incident records etc

Conduct a walk-through of the workplace, consult with workers and/or health safety representatives

Assess the risks associated with working with hazardous chemicals at the workplace:
• Determine how workers interact with hazardous chemicals (including the use of equipment, plant, etc)
• Assess if workers are or potentially exposed to health and physicochemical hazards associated with working with hazardous chemicals (consider route of entry)
• Consider the effectiveness of the control measures in controlling hazards in the workplace
• Is air monitoring or health monitoring required for any chemicals?

Is there a risk?

No

Record risk assessment

Review risk assessment

Yes

Need professional advice?

No

Are additional control measures required?

No

Record risk assessment

Review risk assessment

Yes

Implement additional controls

Yes

Review risk assessment

No

Record risk assessment