The Globally Harmonized System of Classification and Labelling of Chemicals (GHS) is an internationally agreed system of chemical classification and hazard communication. The GHS is published by the United Nations and has been mandated by NSW Work Health and Safety legislation, effective January 2017.

The GHS introduces new pictograms, hazard statements, signal words and precautionary statements that must be displayed on chemical labels and used in safety data sheets (SDS).

**NEW REQUIREMENTS**

1. **Supplier labels and SDS** – all new chemicals must be supplied with GHS compliant labels and safety data sheets. This is a supplier requirement, but we are not permitted to accept chemicals that are not labelled correctly.

2. **Workplace labels** – all the mixtures, solutions and chemicals synthesised as a part of University work must be classified and provided with a GHS compliant workplace label.

Chemicals already in the workplace, which have been labelled in accordance with the previous classification criteria, do not need to be relabelled.

**IMPLEMENTATION PLAN**

Organisational units that work with chemicals need to take action to facilitate implementation of the new requirements. The following actions are recommended to assist the transition.

**GENERAL GHS AWARENESS**

Ensure all staff and students in your area are aware of the GHS and understand GHS pictograms and hazard statements.

1. Download and display the Safe Work Australia [GHS poster](#) in work areas where chemicals are used.

2. Encourage key operational staff to watch the short video from SafeWork NSW ‘Are you GHS ready?’ and read the University's [Introduction to the GHS](#) and [Chemical Labelling guideline](#).

3. Ensure all staff and students that work with chemicals have completed the [Working with Chemicals Training](#).

4. Direct those staff and student who have already completed the Working with Chemical training, but would like a refresher on the GHS classification system to complete [free online GHS awareness training developed by Comcare](#).

**GHS LABELLING**

Develop an action plan to relabel those chemicals that do not meet compliance requirements. An action plan may include the following:

1. Ask suppliers to only deliver chemicals that have GHS compliant labels and SDS. Start now!

2. Dispose of older chemicals that are no longer required via the University hazardous waste program. This will minimise the requirement for relabelling.

3. Identify the ‘really old chemicals’ that you need to keep and may require relabelling. Identify these with an orange sticker dot (or a similar internal identification system).
4. Use the examples at the back of this info sheet to identify which items may require relabelling. In reality, this requirement should only apply to a small number of particularly rare or high value chemicals.

5. Apply a risk based approach to prioritise chemicals that may require relabelling and progressively relabel them using ChemAlert labels. Start with the chemicals that pose the greatest hazards.

6. If a ChemAlert label is not available you can create a GHS compliant label using the University's Chemical labelling tool.

Re-labelling activities can be carried out progressively over a period of time provided there is a clear plan of action. Remember – don't relabel anything you don't need. If in doubt – dispose.

SAFETY DATA SHEETS

1. Ensure that the Safety Data Sheets (SDS) you are referring to contain GHS hazard classes and hazard statements. Most ChemAlert reports have been updated to provide a GHS compliant version.

2. Use GHS terminology when documenting risk assessments involving hazardous chemicals.

CLASSIFICATION OF MIXTURES, SOLUTIONS AND SYNTHESISED CHEMICALS

Mixture and solutions prepared in the workplace may not currently have GHS compliant workplace labels. These will need to be progressively reclassified and relabelled. This is not a simple task and requires some additional training.

1. Review ChemAlert to check if there is a label for your particular mixture or solution.

2. Identify and nominate a key person within your area to attend GHS classification training (sessions planned for Q4 2016).

Those who are keen can …

1. Consult Safe Work Australia guidance to learn about the GHS translation process.

2. Use websites such as http://www.gischem.de/ghs/index.htm to determine label information.

Refer to the University's Chemical labelling guideline for information about the labelling of synthesised chemicals that may have unknown properties. The University's Chemical Labelling tool allow for the import of molecular structure to assist this type of labelling.
FURTHER REFERENCES

UNIVERSITY RESOURCES

- Introduction to the GHS
- Chemical Labelling
- GHS labelling tool
- ChemAlert

GOVERNMENT RESOURCES

Further information available on Safe Work Australia website: and SafeWork NSW at Chemical and the GHS
- SafeWork NSW video Are you GHS ready?
- Comcare on-line GHS Awareness training

Codes of practice
- SafeWork NSW Labelling of Workplace Hazardous Chemicals
- SafeWork NSW Managing risks of hazardous chemical in the workplace
- SafeWork NSW Preparation of Safety Data Sheets for Hazardous Chemicals

Guidance material
- Safe Work Australia Guidance on the Classification of Hazardous Chemicals under the WHS Regulations

Fact sheets
- Safe Work Australia Classifications and Labelling for Workplace Hazardous Chemicals (poster)
- Safe Work Australia Understanding Safety Data Sheets for Hazardous Chemicals
- Safe Work Australia Understanding Hazardous Chemical Labels
- SafeWork NSW GHS What you need to know

OTHER ONLINE RESOURCES AND TOOLS

These are available to assist in classifying workplace hazardous chemicals.
- Chemical suppliers' websites, ChemAlert
- Safe Work Australia Hazardous Chemical information list (HCIL)
- Online translation tools (e.g. http://www.gischem.de/ghs/index.htm or DHI R-phrase Translation Tool)
- eChemportal
- ECHA –European chemicals agency Chemical infocards
- OSHA CSI (Chemical Sampling Information)
How do I know what to relabel?

If an existing chemical reagent container currently in the workplace has a label with either of the following labels, it does not need to be relabelled.

**NOHSC Approved Criteria label**

- Chemical identifier
- Signal words such as WARNING, POISON, DANGEROUS POISON AND HAZARDOUS
- Risk and safety phrases
- Dangerous goods diamond or class number
- Subsidiary DG class
- First aid information
- Label is in English

**GHS label**

- Chemical identifier
- Signal words Danger or Warning
- GHS pictogram
- Hazard statements
- Precautionary statements based on prevention, response, storage and disposal
- Label is in English

Labels for smaller containers may have less information, for example prioritised precautionary statements, the GHS hazard pictogram or statement.