



**NSW
Resources
Regulator**

GUIDE

NOTIFICATION OF LEAD RISK WORK IN RELATION TO A MINE OR PETROLEUM SITE



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1. Introduction

The Work Health and Safety Regulation 2017 provides for the notification to the NSW Resources Regulator of:

- lead risk work; and
- the removal of a worker from lead risk work.

A person conducting a business or undertaking (PCBU) at a workplace that is a mine or petroleum site, including the operator of a mine or petroleum site operator or a contractor, is required to ensure, so far as reasonably practicable, the health and safety of workers and others. Notifications of lead risk work and the removal of workers from lead risk work provide the Regulator with risk-based information that they can use to apply resources and target compliance and enforcement actions to areas of greatest risk to health and safety.

2. Scope

Lead risk work means work carried out in a lead process that is likely to cause the blood level of a worker carrying out the work to be more than:

<ul style="list-style-type: none"> ■ 10 µg/dL (0.48 µmol/L) for a female of reproductive capacity; or ■ 30 µg/dL (1.45 µmol/L) in any other case. 	For the period up to and including 30 June 2021
<ul style="list-style-type: none"> ■ 5 µg/dL (0.24 µmol/L) for a female of reproductive capacity; or ■ 20 µg/dL (0.97 µmol/L) in any other case. 	From 1 July 2021

The meaning of a lead process is set out in Regulation 392 and is set out in **Attachment 1**. Lead is defined in regulation 5 of the *WHS Act* as meaning ‘lead metal, lead alloys, inorganic lead compounds, and lead salts of organic kinds’.

Person conducting a business or undertaking (PCBU) is defined in section 5 of the *Work Health and Safety Act 2017*. A PCBU may be an individual, a body corporate, a government agency, a partnership or an unincorporated association

2.1. Assessment

A PCBU at a workplace that is a mine or petroleum site must assess each lead process carried out by the business or undertaking at the workplace to determine if lead risk work is carried out in the process.

If the PCBU is unable to determine whether lead risk work is carried out in a lead process at the mine or petroleum site, the process is taken to include lead risk work until the person determines that lead risk work is not carried out in the process.

The Regulator can decide that a process to be carried out at a workplace is a lead process. A decision that a process is a lead process is a reviewable decision.

2.2. Lead risk work

Notification is required when lead risk work is undertaken by the PCBU at a workplace that is a mine or petroleum site, after determining that the work is lead risk work.

Where work carried out to rescue a person or provide first aid to a person is determined by the emergency services organisation to be lead risk work, notification to the Regulator is also required.

2.3. Removal of worker from lead risk work

Part 7.2 of the WHS Regulation imposes obligations on the person conducting a business or undertaking to ensure health monitoring is provided to workers both before and after commencing lead risk work.

Notification to the Regulator is required if a worker is removed from carrying out lead risk work following health monitoring where:

<ul style="list-style-type: none">■ biological monitoring shows the worker's blood lead level is, or is more than:<ul style="list-style-type: none">□ 50 µg/dL (2.42 µmol/L) for females not of reproductive capacity and males, or□ 20 µg/dL (0.97 µmol/L) for females of reproductive capacity, or□ 15 µg/dL (0.72 µmol/L) for females who are pregnant or breastfeeding, or	Effective until 30 June 2021
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<ul style="list-style-type: none">■ biological monitoring shows the worker's blood lead level is, or is more than:<ul style="list-style-type: none">□ 30 µg/dL (1.45 µmol/L) for females not of reproductive capacity and males, or□ 10 µg/dL (0.48 µmol/L) for females of reproductive capacity	From 1 July 2021
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- the registered medical practitioner who supervised the health monitoring recommends that the worker be removed from carrying out lead risk work or
- there is an indication a risk control measure has failed and, as a result, the worker's blood lead level is likely to reach the relevant level for the worker to be removed from carrying out lead risk work.

The PCBU must also ensure that a worker removed from carrying out lead risk work does not return to carrying out lead risk work until the workers blood lead level is lower than the concentrations stipulated in clause 417 of the Work Health and Safety Regulation 2017.

3. What must be notified

The Regulator must be notified if a person conducting a business or undertaking at a mine or petroleum site has:

- determined or is unable to determine that the work at the workplace is lead risk work or
- removed a worker from carrying out lead risk work following health monitoring results.

If in the course of rescuing a person or providing first aid at a mine or petroleum site, an emergency service organisation determines that the work is lead risk work, then they must also notify the Regulator.

4. When to notify

4.1. Lead risk work

Notification to the Regulator is required within seven days of the determination that the work is lead risk work or if a determination is unable to be made.

Notification to the Regulator by an emergency service organisation is required as soon as practicable after determining that the work is lead risk work.

4.2. Removal or worker from lead risk work

Notification to the Regulator is required as soon as practicable if a worker is removed from carrying out lead risk work.

5. How to notify

To notify the Regulator of lead risk work, complete the *Notification of lead risk work in relation to a mine or petroleum site* form available on our website.

To notify the Regulator of a worker being removed from lead risk work, complete the *Notification of a worker removed from lead risk work in relation to a mine or petroleum site* form available on our website.

5.1. Fees

There is no fee for a notification of lead risk work or the notification of the removal of a worker from lead risk work.

6. What information does the Regulator require?

6.1. Lead risk work

The written notification of lead risk work must state the kind of lead process being carried out that includes the lead risk work.

The Regulator also requires the written notification of lead risk work to include the following information:

- whether the notification is for a new notification or for change of information
- name and contact details of the PCBU, or the name and contact details of the emergency service organisation

- address of the mine or petroleum site at which the lead risk work is being carried out (including location of lead risk work, such as laboratory, treatment plant, underground work area etc)
- risk control measures to minimise worker exposure
- date of commencement of the lead risk work and proposed completion date if the work is short term, such as abrasive blasting of lead paint from a structure
- date when the workers carrying out the lead risk work were last tested for blood lead levels and the results of those tests
- name of the registered medical practitioner who conducted medical examinations and biological monitoring of the workers carrying out lead risk work
- address and contact details of the medical practitioner's practice.

6.2. Worker removed from lead risk work

The Regulator requires written notification of the removal of a worker from lead risk work to include the following information:

- name and contact details of the PCBU, if applicable, and ABN
- the date on which the lead risk work notification was made. If a notification of the lead risk work was not made, the information required for lead risk work notifications must be provided (refer above) and
- the reason for removal of the worker:
 - if removal was the result of increased blood lead levels, the provision of the worker's blood lead results, age and sex;
 - if removal was at the recommendation of a registered medical practitioner, a brief description of the reason;
 - if removal was due to the failure of a risk control measure, a description of the failure and the new risk control measure(s).

7. PCBU obligations

7.1. Changes to information

Under clause 404 (1) of the WHS Regulation, a PCBU at a workplace where the work is lead risk work must advise the Regulator in writing of any changes to the information provided in a notification of lead risk work before the change occurs or as soon as practicable after the PCBU becomes aware of the change.

7.2. Copy of notice

Under clause 404 (2) of the WHS Regulation, the PCBU at a workplace where lead risk work is carried out must:

- keep a copy of the notice or changes to the notice given to the Regulator for the period that the lead risk work is carried out at the workplace and
- ensure a copy of the notice or changes to the notice are readily accessible to a worker who is likely to be exposed to lead, and the worker's health and safety representative(s).

7.3. Health monitoring

A PCBU at a workplace that carries out lead risk work must arrange for biological monitoring of each worker who carries out lead risk work at the times prescribed in clause 407 (1) of the WHS Regulation, or at the frequency determined by the Regulator under clause 407 (3) of the WHS Regulation.

Attachment 2 to this Guide sets out clause 407 of the WHS Regulation.

A determination of a different frequency for biological monitoring is a reviewable decision.

Under clause 407 (2) of the WHS Regulation, the PCBU at a workplace that carries out lead risk work must increase the frequency of biological monitoring of a worker if the activity is likely to significantly change the nature or increase the duration or the frequency of the worker's lead exposure.

7.4. Internal review

An application for internal review allows the Regulator's decision to be reviewed and possibly changed by a person who was not involved in the original decision. A written application for the internal review of a reviewable decision is made using the application form provided by the Regulator. The application must be lodged with 28 days of the day on which the decision first came to the eligible person's notice or such longer period as the Regulator allows, as provided by clause 678(1) of the WHS Regulation.

Under clause 680(2) of the WHS Regulation, the internal reviewer may:

- confirm or vary the reviewable decision or
- set aside the reviewable decision and substitute another decision that the internal reviewer considers appropriate.

The internal reviewer will review the reviewable decision and make a decision as soon as practicable and within 21 days after the application for internal review or request for additional information is received.

If the reviewable decision is not varied or set aside within the 21-day period, the reviewable decision is taken to have been confirmed by the internal reviewer under clause 680(6) of the WHS Regulation.

The Regulator will give the applicant written notice of the decision on the internal review and reasons for the decision within 14 days of making the decision.

An application for an internal review does not affect the operation of the original reviewable decision or prevent the taking of any lawful action to implement or enforce the decision, though once the decision on internal review is made if a new decision is substituted then that new decision takes effect.

8. External review

If the applicant is not satisfied with the decision on internal review, they can apply to the NSW Civil and Administrative Tribunal.

9. Further information

SafeWork Australia has a range of guidance materials in relation to health monitoring. See:

- [Health monitoring for persons conducting a business or undertaking guide](#)
- [Health monitoring when you work with hazardous chemicals guide](#)
- [Health monitoring for registered medical practitioners guide](#)
- [Hazardous chemicals requiring health monitoring](#)

Attachment 1: WHS Regulation (2017) cl 392 Meaning of “lead process”

392 Meaning of “lead process”

In this Part, a *lead process* consists of any of the following carried out at a workplace—

- (a) work that exposes a person to lead dust or lead fumes arising from the manufacture or handling of dry lead compounds,
- (b) work in connection with the manufacture, assembly, handling or repair of, or parts of, batteries containing lead that involves the manipulation of dry lead compounds, or pasting or casting lead,
- (c) breaking up or dismantling batteries containing lead, or sorting, packing and handling plates or other parts containing lead that are removed or recovered from the batteries,
- (d) spraying molten lead metal or alloys containing more than 5% by weight of lead metal,
- (e) melting or casting lead alloys containing more than 5% by weight of lead metal in which the temperature of the molten material exceeds 450°C,
- (f) recovering lead from its ores, oxides or other compounds by thermal reduction process,
- (g) dry machine grinding, discing, buffing or cutting by power tools alloys containing more than 5% by weight of lead metal,
- (h) machine sanding or buffing surfaces coated with paint containing more than 1% by dry weight of lead,
- (i) a process by which electric arc, oxyacetylene, oxy gas, plasma arc or a flame is applied for welding, cutting or cleaning, to the surface of metal coated with lead or paint containing more than 1% by dry weight of lead metal,
- (j) radiator repairs that may cause exposure to lead dust or lead fumes,
- (k) fire assays if lead, lead compounds or lead alloys are used,
- (l) hand grinding and finishing lead or alloys containing more than 50% by dry weight of lead,
- (m) spray painting with lead paint containing more than 1% by dry weight of lead,
- (n) melting lead metal or alloys containing more than 50% by weight of lead metal if the exposed surface area of the molten material exceeds 0.1 square metre and the temperature of the molten material does not exceed 450°C,
- (o) using a power tool, including abrasive blasting and high pressure water jets, to remove a surface coated with paint containing more than 1% by dry weight of lead and handling waste containing lead resulting from the removal,
- (p) a process that exposes a person to lead dust or lead fumes arising from manufacturing or testing detonators or other explosives that contain lead,
- (q) a process that exposes a person to lead dust or lead fumes arising from firing weapons at an indoor firing range,
- (r) foundry processes involving—
 - (i) melting or casting lead alloys containing more than 1% by weight of lead metal in which the temperature of the molten material exceeds 450°C, or
 - (ii) dry machine grinding, discing, buffing or cutting by power tools lead alloys containing more than 1% by weight of lead metal,
- (s) a process decided by the regulator to be a lead process under clause 393.

Attachment 2: WHS Regulation (2017) cl 407 Frequency of biological monitoring

407 Frequency of biological monitoring

- (1) A person conducting a business or undertaking at a workplace must arrange for biological monitoring of each worker who carries out lead risk work for the person to be carried out at the following times—
 - (a) for females not of reproductive capacity and males—
 - (i) if the last monitoring shows a blood lead level of less than 10µg/dL (0.48µmol/L)—6 months after the last biological monitoring of the worker, or
 - (ii) if the last monitoring shows a blood lead level of 10µg/dL (0.48µmol/L) or more but less than 20µg/dL (0.97µmol/L)—3 months after the last biological monitoring of the worker, or
 - (iii) if the last monitoring shows a blood lead level of 20µg/dL (0.97µmol/L) or more—6 weeks after the last biological monitoring of the worker,
 - (b) for females of reproductive capacity—
 - (i) if the last monitoring shows a blood lead level of less than 5µg/dL (0.24µmol/L)—3 months after the last biological monitoring of the worker, or
 - (ii) if the last monitoring shows a blood lead level of 5µg/dL (0.24µmol/L) or more but less than 10µg/dL (0.48µmol/L)—6 weeks after the last biological monitoring of the worker.

Maximum penalty—

- (a) in the case of an individual—70 penalty units, or
 - (b) in the case of a body corporate—345 penalty units.
- (2) The person must increase the frequency of biological monitoring of a worker who carries out lead risk work if the worker carries out an activity that is likely to significantly change the nature or increase the duration or frequency of the worker's lead exposure.

Maximum penalty—

- (a) in the case of an individual—70 penalty units, or
 - (b) in the case of a body corporate—345 penalty units.
- (3) The regulator may determine a different frequency for biological monitoring of workers at a workplace, or a class of workers, carrying out lead risk work having regard to—
 - (a) the nature of the work and the likely duration and frequency of the workers' lead exposure, and
 - (b) the likelihood that the blood lead level of the workers will significantly increase.

- (4) The regulator must give a person conducting a business or undertaking written notice of a determination under subclause (3) within 14 days after making the determination.
- (5) The person conducting a business or undertaking at the workplace must arrange for biological monitoring to be carried out at the frequency stated in a determination notified to the person under subclause (4).

Maximum penalty—

- (a) in the case of an individual—70 penalty units, or
- (b) in the case of a body corporate—345 penalty units.

Note—

A determination of a different frequency for biological monitoring is a reviewable decision (see clause 676).