



## Health and Safety Bulletin No. 12

### Asbestos containing flooring materials

#### Background

WorkSafe is aware of at least eight known asbestos exposure incidents, which occurred between June 2020 and April 2023. These directly related to asbestos containing flooring materials.

These incidents were related to:

- installation of new floor covering disturbing existing asbestos containing flooring
- maintenance workers disturbing asbestos containing flooring
- Class B asbestos removalists unknowingly removing friable asbestos containing flooring materials.

Asbestos containing materials have historically been used in a range of floor coverings and flooring materials. These include a mixture of friable and non-friable products, such as:

- vinyl sheeting, including paper backed vinyl
- vinyl tiles
- adhesives, such as 'blackjack'
- fibre cement or compressed cement sheeting.

Paper backed sheet vinyl is friable in nature, as the backing can be pulverised or crumbled by hand pressure. Vinyl tiles and adhesives are generally non-friable, however, the removal method may make the material friable, for example grinding. If grinding is required to remove the flooring, a Class A asbestos removal licence holder must be used.



Asbestos vinyl tile under newer vinyl tile.

## Summary of hazard

Workers are potentially exposing themselves and others at the workplace to asbestos fibres by unknowingly disturbing asbestos containing materials through work activities, such as installation, maintenance or removal of floor coverings.

When asbestos is disturbed, the fibres can become airborne.

Inhaling these fibres can cause several diseases, including:

- mesothelioma, a fast-growing cancer associated with asbestos exposure
- asbestosis, scar tissue forming in the lungs
- pleural plaques, thickening of the lining of the lungs.

When undertaking any work where asbestos containing materials may be present, a person conducting a business or undertaking (PCBU) and other duty holders must ensure that they determine if the flooring contains asbestos. This can be done by:

- checking the asbestos register to identify whether asbestos is present
- undertaking sampling and analysis by a NATA accredited laboratory of the suspected asbestos containing materials to determine its presence, or assuming the material contains asbestos and treating it as such
- ensuring sampling of asbestos containing flooring is representative; samples should be collected for each different colour or pattern of material, and potentially multiple samples from the same type of flooring due to the non-homogenous consistency of asbestos fibre presence in vinyl tiles and adhesives
- reviewing and amending the asbestos register if it is not adequate prior to demolition or refurbishment; this may include a competent person undertaking intrusive inspection and sampling to identify all asbestos so far as is reasonably practicable.

## Contributory factors

In the eight exposure incidents, the factors that contributed to exposure varied, but included PCBUs and other duty holders failing to:

- identify flooring that contained friable asbestos or incorrectly treating friable asbestos as non-friable (bonded) material
- implement suitable controls to manage the risks when undertaking maintenance or asbestos removal work as the presence of asbestos was not identified
- undertake intrusive inspections prior to demolition or refurbishment work and identifying hidden floor coverings that contained asbestos materials
- provide workers with asbestos awareness training
- request or review workplace asbestos registers to identify the presence of asbestos.

## Actions required

- The presence of asbestos containing flooring materials must be identified prior to work being undertaken, with the friability of asbestos containing flooring material determined.
- Workers must be provided with information and instruction on the hazards, risks, and control measures relating to asbestos prior to conducting flooring installation, maintenance or removal work. This should include training on identification, handling and management of asbestos containing materials.

- To eliminate the risk of exposure, asbestos containing flooring materials should be removed in instances where it will be disturbed during installation of new flooring.
- When conducting work in buildings constructed prior to 31 December 2003, the asbestos register should be reviewed to identify whether asbestos is present.
- Workers must be suitably licensed for asbestos flooring removal work:
  - Class A can remove any quantity of friable or non-friable asbestos
  - Class B can remove any quantity of non-friable asbestos only.
- Removal of asbestos flooring must be undertaken in accordance with WHS legislation and associated codes of practice.

If it is uncertain whether asbestos is present, representative samples must be collected from the materials and analysed by a NATA accredited laboratory, or the material assumed to contain asbestos and suitable control measures put in place.

## References and further information

### Department of Mines, Industry Regulation and Safety

- [How to manage and control asbestos in the workplace](#): Code of practice
- [How to safely remove asbestos](#): Code of practice
- [Asbestos safety for trades and construction workers](#): Pamphlet

### NSW Asbestos Coordination Committee

- [Vinyl floor tiles and covering](#)

### Workplace Health and Safety Queensland

- [Asbestos flooring fact sheet](#)
- [Asbestos products gallery](#)

### Asbestos Safety and Eradication Agency

- [Asbestos health risks](#)

### NATA

- [Search accredited organisations](#)