Department of Sustainability and Environment

Potentially Contaminated Land

General Practice Note **June 2005**

This General Practice Note is designed to provide guidance for planners and applicants about:

- how to identify if land is potentially contaminated
- the appropriate level of assessment of contamination for a planning scheme amendment or planning permit application
- appropriate conditions on planning permits
- circumstances where the Environmental Audit Overlay should be applied or removed.

What is potentially contaminated land?

Potentially contaminated land is defined in *Ministerial Direction No. 1 – Potentially Contaminated Land*, as land used or known to have been used for industry, mining or the storage of chemicals, gas, wastes or liquid fuel (if not ancillary to another use of land). This practice note also deals with land that may have been contaminated by other means such as by ancillary activities, contamination from surrounding land, fill using contaminated soil or agricultural uses.

How is potentially contaminated land considered in the planning system?

The planning system is the primary means for regulating land use and approving development and is an important mechanism for triggering the consideration of potentially contaminated land.

The *Planning and Environment Act 1987* requires a **planning authority** when preparing a planning scheme or planning scheme amendment to *'take into account any significant effects which it considers the scheme or amendment might have on the environment or which it considers the environment might have on any use or development envisaged in the scheme or amendment'* (Section 12).

Ministerial Direction No. 1 – Potentially Contaminated Land (*Direction No. 1*) requires **planning authorities** when preparing planning scheme amendments, to satisfy themselves that the environmental conditions of land proposed to be used for a sensitive use (defined as residential, child-care centre, pre-school centre or primary school), agriculture or public open space are, or will be, suitable for that use.

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If the land is potentially contaminated and a sensitive use is proposed, *Direction No. 1* provides that a planning authority must satisfy itself that the land is suitable through an environmental audit.

Clause 15.06 of the *State Planning Policy Framework* contains State Planning Policy for soil contamination. Clause 15.06-2 refers to *Direction No. 1* and also states that in considering applications for use of land used or known to have been used for industry, mining or the storage of chemicals, gas, wastes or liquid fuel, responsible authorities should require applicants to provide adequate information on the potential for contamination to have adverse effects on the future land use.

The Environmental Audit Overlay (EAO) is a mechanism provided in the *Victoria Planning Provisions* and planning schemes to ensure the requirement for an environmental audit under *Direction No.1* is met before the commencement of the sensitive use or any buildings and works associated with that use. The application of the overlay, in appropriate circumstances, ensures the requirement will be met in the future but does not prevent the assessment and approval of a planning scheme amendment.

The Act also requires a **responsible authority**, before deciding on a planning permit application, to consider *'any significant effects which the responsible authority considers the use or development may have on the environment or which the responsible authority considers the environment may have on the use or development'* (Section 60).

What is an environmental audit?

The environmental audit system was introduced under the *Environment Protection Act 1970.* It aims to identify the environmental quality of a segment of the environment and any detriment to the beneficial uses of that segment. In the case of land, the beneficial uses are linked to land use.

A statutory environmental audit provides for an environmental auditor appointed under the *Environment Protection Act* 1970, to undertake an independent assessment of the condition of a site and form an opinion about its suitability for the proposed use. To form such an opinion, the auditor must gather and review sufficient information including site history information and the results of sampling and analysis of soil and possibly groundwater, surface water and air.

An audit of the condition of a site may result in the issue of either:

- a **Certificate** of Environmental Audit that indicates the auditor is of the opinion that the site is suitable for any beneficial use and that there is no restriction on use of the site due to its environmental condition; or
- a **Statement** of Environmental Audit that indicates that the auditor is of the opinion that there is, or may be, some restriction on use of the site due to its environmental condition. A Statement may include conditions that require remediation works to be undertaken or places ongoing requirements on the site. A Statement might also indicate that a site is not suitable for any use, in which case the EPA will usually issue a Notice to require clean up or management of that site.

An auditor must first consider whether a Certificate can be issued for the site. This is the desired outcome for all sites. However, if a Certificate cannot be issued then a Statement of Environmental Audit must be issued.

An environmental audit reflects the condition of the site at the date of issue of the Certificate or Statement. If the site condition changes, an additional assessment may be required.

Section 53 ZE of the *Environment Protection Act 1970* requires that an occupier provide to any person who proposes to become an occupier a copy of any Statement of Environmental Audit that has been issued for the site (unless a Certificate of Environmental Audit has been subsequently issued).

What does the SEPP (Prevention and Management of Contamination of Land) 2002 do?

The *State Environment Protection Policy (Prevention and Management of Contamination of Land) (SEPP)* was released in 2002 to bring together all matters relating to contamination of land, including responsibilities for prevention and management of contamination.

The SEPP confirms the requirements of *Direction No. 1.* It also outlines useful actions a responsible authority should take in the assessment of planning permit applications. The SEPP provides guidance to responsible authorities in Clauses 13 & 14 of the SEPP. The suggested actions are elaborated on in later sections of this practice note.

How is potentially contaminated land identified?

Contamination of land is often a result of current or historical activities that have taken place at a site, or adjacent to it.

To identify the potential for contamination, the following steps may assist:

- Inspect the site. Observations should be made regarding evidence of contamination or historical activities that may give rise to contamination (for example, fuel tanks).
- Identify whether an Environmental Audit Overlay (EAO) exists over the site.
- Review any Site Analysis presented in accordance with Clauses 54.01-1 (single dwellings) & 55.01-1 (two or more dwellings) of planning schemes (these clauses require issues of site contamination to be identified).
- Consider any available information about the site:
  - The current and previous zoning, ownership or activities carried out on the site (for example council, rail, other utility or defence). Council rate records are a useful record of this information.
  - Any previous investigations or site assessments conducted.
  - Any potential contamination from surrounding land uses (for example, an adjacent service station known to be causing off-site contamination).
- Review lists of Certificates and Statements of Environmental Audit held by council and EPA. Environmental auditors are required to provide a copy of any Certificate or Statement issued to both the relevant council and the EPA.
- Review the EPA Priority Sites Register for information about sites with a current EPA Notice (for example, clean-up notice or pollution abatement notice) via Landata (www.land.vic.gov.au , Tel: 8636 2456) or Anstat (www.anstat.com.au, Tel. 9278 1172).

What information is needed?

In most cases the relevant information should be available from council or EPA records.

Particular types of current or past land uses or activities on a site (see section below) can act as a 'trigger' for the collection of more information about the previous uses or activities. Zoning may indicate past land uses, but is not a substitute for a detailed review of the site history.

If this information is not available to council officers, the SEPP suggests that further information should be requested from the proponent or applicant.

A suitably qualified environmental professional may provide an opinion on whether land intended for a sensitive use, is potentially contaminated. To contact a suitably qualified contaminated land professional, go to either the EPA environmental auditors appointed in the category of contaminated land (www.epa.vic.gov.au/Industry/environmental_auditors.asp) or the Australian Contaminated Land Consultants Association (ACLCA) Victorian Branch, at www.aclca.asn.au or Ph: 9509 5949.

Where the applicant submits an environmental assessment of the land, the planning or responsible authority may require the applicant to contribute financially to an independent review of the information by a suitably qualified environmental professional.

What land uses or activities might indicate potential contamination?

An assessment of the current *or previous* land uses of a site is an important step in the identification of potentially contaminated land. Table 1 lists the types of land uses that may have potential for contaminating land.

Table 1 - Potential for contamination

High potential for contamination includes land used for:

- Abattoir
- Abrasive blasting
- Airport
- Asbestos production/disposal
- Asphalt manufacturing
- Automotive repair/engine works
- Battery manufacturing/recycling
- Bitumen manufacturing
- Boat building/maintenance
- Breweries/distilleries
- Brickworks
- Chemical manufacturing/storage/blending
- Cement manufacture
- Ceramic works
- Coke works
- Compost manufacturing
- Concrete batching
- Council works depot
- Defence works
- Drum re-conditioning facility
- Dry cleaning
- Electrical/electrical components manufacture
- Electricity generation/power station
- Electroplating
- Explosives industry
- Fibreglass reinforced plastic manufacture
- Foundry
- Fuel storage depot
- Gasworks
- Glass manufacture
- Iron and steel works
- Landfill sites/waste depots
- Lime works

- Metal coating
- Metal finishing and treatments
- Metal smelting/refining/finishing
- Mining and extractive industries
- Oil or gas production/refining
- Pest control depots
- Printing shops
- Pulp or paper works
- Railway yards
- Shooting or gun clubs
- Scrap metal recovery
- Service stations/fuel storage
- Sewage treatment plant
- Ship building/breaking yards
- Shipping facilities – bulk (rate <100 t/day)
- Stock dipping sites
- Spray painting
- Tannery (and associated trades)
- Textile operations
- Timber preserving/treatment
- Tyre manufacturing
- Underground storage tanks
- Utility depots
- Waste treatment/incineration/disposal
- Woolscouring

Medium potential for contamination can be identified by certain types of activities carried out on the land, which may be incidental to the main site activity. The nature of the products used or stored, the quantity stored, and the location of use or storage should be considered. Such activities might include:

- Chemical storage
- Fuel storage
- Underground storage tank (if recently installed and no evidence of leaks)
- Market gardens
- Waste disposal
- Filling (imported soil)
- Other industrial activities (such as warehousing of chemicals that may be spilt during loading or unloading)

Low potential for contamination is likely to exist if none of the identified uses or activities in the high and medium potential categories are known to have been carried out on the land.

What level of assessment is required?

The level of environmental assessment necessary for a planning scheme amendment or planning permit application will depend on the statutory requirements for the proposed land use and the potential for contamination.

Where land has been identified as being potentially contaminated, an assessment of the level of contamination is necessary before a decision is made about the future use or development of that land. Councils should consider whether further information or advice from an expert should be sought to assist in determining what level of assessment is required. This enables planning decisions to be made with the knowledge of the condition of the site and the most satisfactory site management strategies.

There are two forms of assessment that can be applied. These are:

Require an environmental audit: a statutory audit undertaken by an environmental auditor under the *Environment Protection Act 1970*. The outcome is either a Certificate of Environmental Audit or a Statement of Environmental Audit.

Require a site assessment: a preliminary review of the site history (including current and previous uses and activities) by a suitably qualified environmental professional.

The matrix in Table 2 indicates the appropriate assessment level, based on proposed land use and current or historic land uses or activities carried out on the land.

Table 2 – Assessment matrix

PROPOSED LAND-USE	POTENTIAL FOR CONTAMINATION (as indicated in Table 1)		
	High	*Medium*	*Low*
Sensitive Uses			
Child care centre, pre-school or primary school	*A*	*B*	*C*
Dwellings, residential buildings etc.	*A*	*B*	*C*
Other Uses			
Open space	*B*	*C*	*C*
Agriculture	*B*	*C*	*C*
Retail or office	*B*	*C*	*C*
Industry or warehouse	*B*	*C*	*C*

A: *Require an environmental audit as required by Ministerial Direction No. 1 or the Environmental Audit Overlay when a planning scheme amendment or planning permit application would allow a sensitive use to establish on potentially contaminated land.*

An environmental audit is also strongly recommended by the SEPP where a planning permit application would allow a sensitive use to be established on land with 'high potential' for contamination.

B: *Require a site assessment from a suitably qualified environmental professional if insufficient information is available to determine if an audit is appropriate. If advised that an audit is not required, default to C.*

C: *General duty under Section 12(2)(b) and Section 60(1)(a)(iii) of the Planning and Environment Act 1987.*

When is an environmental audit necessary for a planning scheme amendment?

For land that has been identified as potentially contaminated land and where a planning scheme amendment would have the effect of allowing that land to be used for a sensitive use, *Direction No. 1* requires a planning authority to satisfy itself that the land is suitable for the use by:

(a) A Certificate of Environmental Audit issued for the site; or

(b) A Statement of Environmental Audit issued by an environmental auditor stating that the environmental conditions of the site are suitable for the sensitive use (with or without conditions on the use of the site).

Direction No. 1 requires that this be done before notice of a planning scheme amendment is given. However, it may be appropriate to delay this requirement if testing of the land before a notice of the amendment is given is difficult or inappropriate. For instance, if the rezoning relates to a large strategic exercise or involves multiple sites in separate ownership. *Direction No. 1* provides for the requirement for an environmental audit to be included in the amendment. This can be done by applying the EAO. See the section 'When should an Environmental Audit Overlay be applied'.

For a proposal to redevelop potentially contaminated land for a use other than a sensitive use (for example, a retail premises or office use), a planning authority can require an environmental audit if it considers it appropriate.

Direction No. 1 provides for an exemption from the need to comply with the Direction. Such an exemption may be appropriate where:

- Potentially contaminated land is already used for a sensitive use, agriculture or open space.
- Prior industry use of the land was benign and unlikely to result in any contamination.
- If there is a regional strategy to manage contamination (for example former gold mining activities).

A planning authority may request an exemption from the Minister for Planning or the Deputy Secretary, Built Environment, Department of Sustainability and Environment. The Minister or Deputy Secretary must consult with the EPA before making a decision. The planning authority should consult with the EPA before requesting an exemption.

When is an environmental audit necessary for a planning permit application?

For land that has been identified as potentially contaminated land and where a planning permit application may allow potentially contaminated land to be used for a sensitive use, the SEPP requires that the responsible authority seek a Certificate of Environmental Audit or a Statement of Environmental Audit indicating that the site is suitable for the proposed use.

An environmental audit should be required unless the proponent can demonstrate to the satisfaction of the responsible authority that the site has never been used for a potentially contaminating activity, or that other strategies or programs are in place to effectively manage any contamination.

Uses such as open space, agriculture and outdoor playgrounds associated with other uses are not sensitive uses but include an element of risk to the public. Careful consideration should be given to the likelihood of contamination and the need for an environmental audit.

If an environmental audit is required because an EAO is applied over the land, a Certificate or Statement of Environmental Audit must be issued before the sensitive use or buildings and works associated with the sensitive use can commence. If an EAO has been applied, the planning authority has already made an assessment that the land is potentially contaminated and that it is unlikely to be suitable for a sensitive use without further assessment and remediation works or management.

There may be other circumstances where the land is known to be contaminated and it would be appropriate for the level of contamination to be fully assessed as part of the application process.

Generally an environmental audit should be provided as early as possible in the planning process. This may not always be possible or reasonable and requiring an environmental audit as a condition of permit may be acceptable if the responsible authority is satisfied that the level of contamination will not prevent the use of the site.

Environmental audit works

The EAO is not a permit trigger and does not prevent works or activities being undertaken that are associated with an environmental audit (such as soil sampling).

Remediation works

Works that are associated with a development and that might also be remediation works (such as excavation or basement construction) should not commence before the completion of an environmental audit if a planning permit has not been issued for the development.

Where a permit has been issued for a development and a requirement for an environmental audit is a condition of permit, the responsible authority should consider carefully wording the permit conditions to allow early building works that facilitate remediation of the site.

When should a site assessment be sought?

A planning or responsible authority should seek (or require a proponent to seek) a site assessment by a suitably qualified environmental professional for proposals in category B, as shown in Table 2.

A site assessment should include:

- The nature of the previous land use or activities on the site
- How long did the activity take place?
- What is known about contamination?
- How much is present?
- How is it distributed?

An environmental professional may also assist in assessing information contained in any site assessment and advising further on the need for an audit on all or part of the site. The planning or responsible authority may require the applicant to include an independent assessment of the information, as part of the assessment of the permit application.

What if there are ongoing conditions of management?

Statement of Environmental Audit available at time of decision

A Statement of Environmental Audit usually contains one or more conditions that must be implemented for the site to be suitable for the proposed use.

The planning or responsible authority must consider any conditions in a Statement and:

- include provisions in a planning scheme amendment or conditions in a planning permit that reflect the requirements of the conditions of the Statement
- require the applicant to demonstrate that the conditions included in the Statement have been or will be met before the use commences
- liaise with other agencies of appropriate jurisdiction where the nature of the conditions means that they are more properly considered by that agency (for example, liaise with the EPA about conditions requiring ongoing management of groundwater).

It is appropriate for a Section 173 agreement under the *Planning and Environment Act 1987* to be required where:

- the conditions on a Statement of Environmental Audit will be ongoing in nature and require maintenance or monitoring such as regular groundwater or waterway testing
- other parties, such as the EPA or a water authority are involved with conditions of an ongoing nature.

The agreement should also provide for periodic reporting.

Other conditions, such as maintenance of a clay barrier are suitable to include as a planning permit condition.

If the conditions of a Statement of Environmental Audit are impractical or inappropriate to include as planning permit conditions, the environmental auditor should be asked to either re-issue the Statement or to confirm that the intent of the Statement conditions are adequately captured in the proposed planning permit conditions.

Where conditions on a Statement of Environmental Audit can be most effectively implemented by another agency, the planning or responsible authority should liaise with that agency and reach agreement about responsibilities and actions. Most commonly this would involve EPA, but on occasions may involve other agencies such as water authorities (for example where conditions requiring ongoing monitoring and management of polluted groundwater are to be imposed).

Requirements where an environmental audit is a condition of permit

Where an environmental audit is to be completed in response to a condition of a planning permit, it is necessary to carefully word planning permit conditions to not only require a Certificate or Statement of Environmental Audit but to also address the implementation of Statement conditions.

An example of conditions that might be placed on a planning permit is provided below:

1. Prior to the commencement of the use or buildings and works associated with the use (or the certification or issue of a statement of compliance under the *Subdivision Act 1988*) the applicant must provide:
   (a) A Certificate of Environmental Audit in accordance with Section 53Y of the *Environment Protection Act 1970*; or
   (b) A Statement of Environmental Audit under Section 53Z of the *Environment Protection Act 1970*. A Statement must state that the site is suitable for the use and development allowed by this permit.
2. All the conditions of the Statement of Environmental Audit must be complied with to the satisfaction of the responsible authority, prior to commencement of use of the site. Written confirmation of compliance must be provided by a suitably qualified environmental professional or other suitable person acceptable to the responsible authority. In addition, sign off must be in accordance with any requirements in the Statement conditions regarding verification of works.

Where there are conditions on a Statement of Environmental Audit that require significant ongoing maintenance and/or monitoring, the following condition might also be used:

3. The applicant must enter into a Section 173 Agreement under the *Planning and Environment Act* 1987. The Agreement must be executed on title prior to the commencement of the use and prior to the issue of a Statement of Compliance under the Subdivision Act 1987. The applicant must meet all costs associated with drafting and execution of the Agreement, including those incurred by the responsible authority.

How are environmental audit conditions enforced?

Where a responsible authority becomes aware that an occupier is failing to comply with requirements set out in the planning scheme or planning permit, enforcement procedures under the *Planning and Environment Act* 1987 are available. These may include planning infringement notices, enforcement orders or prosecution through the Magistrates Court.

Where the failure to comply with Statement conditions results in a site not being suitable for its current use, EPA may issue a Clean-up Notice under the *Environment Protection Act 1970*. This also applies where the non-compliance results in pollution or a likelihood of pollution of another segment of the environment.

Depending on the nature of the conditions, other agencies may also have a role in enforcement.

When should an Environmental Audit Overlay be applied?

The Environmental Audit Overlay (EAO) is a mechanism provided in *the Victoria Planning Provisions* and planning schemes to defer the requirements of *Direction No. 1* for an environmental audit until the site is to be developed for a sensitive use.

By applying the overlay, the planning authority has made an assessment that the land is potentially contaminated land, and is unlikely to be suitable for a sensitive use without more detailed assessment and remediation works or management. The steps set out in *'How* is potentially contaminated land identified?*'* should be used to make this assessment.

The planning authority is also determining that the requirements of *Direction No. 1* may be deferred. The EAO is a statutory mechanism to provide for that deferment. The EAO is not simply a means of identifying land that is or might be contaminated and should not be used for that purpose. Previous zoning is not sufficient reason in itself to justify application of an EAO.

The Explanatory Statement to *Direction No. 1* suggests that it may only be appropriate to defer the audit requirement if testing of the land before a notice of amendment is given is difficult or inappropriate. An example might be where the rezoning relates to a large strategic exercise or involves multiple sites in separate ownership.

Planning authorities should be careful in applying the overlay. All buildings and works associated with a sensitive use (irrespective of how minor) will trigger the need to undertake an environmental audit.

Where sensitive uses already exist on a site the planning authority, before applying an EAO, should satisfy itself that these sites are potentially contaminated (through site history records). If there is no evidence of potentially contaminated land it may not be appropriate to apply the EAO to these sites.

When should an Environmental Audit Overlay be removed?

The planning authority should remove the EAO if:

- it determines that the land is not potentially contaminated land. The steps set out in 'How is potentially contaminated land identified?' will assist this decision; or
- the site is given a Certificate of Environmental Audit.

In some circumstances where a Statement of Environmental Audit is issued, it may also be possible to remove the EAO (for example, where there are minimum restrictions or conditions on the use of the site, or the conditions have been complied with). The timely removal of an EAO will avoid costly and time-consuming requirements for all parties.

References

- *Ministerial Direction No. 1 – Potentially Contaminated Land* 1989.
- *Victoria Planning Provisions*, particularly Clauses 15.06, 45.03, 54.01, 55.01 and 65.
- *State Environment Protection Policy (Prevention and Management of Contamination of Land)* June 2002.
- *Environmental Auditing of Contaminated Land* (EPA Publication 860, July 2002)).
- *Environmental Auditor (Contaminated Land) Guidelines for Issue of Certificates and Statements of Environmental Audit* (EPA Publication 759b, October 2002.

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