Planning Panels Victoria

Yarra Ranges Planning Scheme Amendment C217yran Erosion Management Overlay

Panel Report

Planning and Environment Act 1987

16 November 2023



How will this report be used?

This is a brief description of how this report will be used for the benefit of people unfamiliar with the planning system. If you have concerns about a specific issue you should seek independent advice.

The planning authority must consider this report before deciding whether or not to adopt the Amendment.

[section 27(1) of the Planning and Environment Act 1987 (the PE Act)]

For the Amendment to proceed, it must be adopted by the planning authority and then sent to the Minister for Planning for approval.

The planning authority is not obliged to follow the recommendations of the Panel, but it must give its reasons if it does not follow the recommendations. [section 31 (1) of the PE Act, and section 9 of the *Planning and Environment Regulations 2015*]

If approved by the Minister for Planning a formal change will be made to the planning scheme. Notice of approval of the Amendment will be published in the Government Gazette. [section 37 of the PE Act]

Planning Panels Victoria acknowledges the Wurundjeri Woi Wurrung People as the traditional custodians of the land on which our office is located. We pay our respects to their Elders past and present.

Planning and Environment Act 1987

Panel Report pursuant to section 25 of the PE Act

Yarra Ranges Planning Scheme Amendment C217yran

Erosion Management Overlay

16 November 2023

Alison McFarlane, Chair

Planning Panels Victoria

Contents

		Pa	ge		
Executive summary					
1	Intro	luction	8		
-	1.1	The Amendment			
	1.2	Background			
	1.3	The Panel's approach			
	1.4	Limitations			
2	Strate	egic issues	10		
	2.1	Planning context			
	2.2	Context	10		
	2.3	Strategic justification			
3	Issues	s raised in the submissions	14		
-	3.1	Mapping			
	3.2	Rebuilding damaged or destroyed buildings			
	3.3	Permit exemptions for fencing and retaining walls			
	3.4	Geotechnical practitioners			
4	Other	drafting issues	22		
-	4.1	Clause 2.0 Statement of risk			
	4.2	Water holding structures			
	4.3	Masonry fences			
	4.4	Vegetation removal			
	4.5	Repair and maintenance			
	4.6	Geotechnical and landslide risk assessment			
	4.7	Waiver of application requirements			
	4.8	Availability of documents			
Appe	ndix A	Document list	35		
Appe	ndix B	Exhibited changes to Erosion Management Overlay Schedule 1	36		
Appe	ndix C	Planning context	38		
	C:1	Planning policy framework			
	C:2	Other relevant planning strategies and policies	38		
	C:3	Planning scheme provisions	38		
	C:4	Ministerial Directions, Planning Practice Notes and guides			
Appe	Appendix D Panel preferred version of the Erosion Management Overlay Schedule 1 40				
Appe	ndix E	Panel preferred version of Clause 13.04-2L	43		

List of Tables

		Page
Table 1	Amendment C217yran chronology of events	
Table 2	Planning context	
Table 3	Benefits of exhibited changes to erosion management provisions	
Table 4	Exemptions for water holding structures	

List of Figures

Figure 1	Location plan 3 Johnston Parade and 4 Oberon Avenue, Ferny Creek	14
Figure 2	Landslip at Mount Evelyn on 5 October 2023	19
Figure 3	Mr Paul's masonry fence examples	27

Glossary and abbreviations

AGS 2007 Landslide Guidelines	Australian Geomechanics Society Practice Note Guidelines for Landslide Risk Management 2007
Amendment	Yarra Ranges Planning Scheme Amendment C217yran
Council	Yarra Ranges Shire Council
Current EMO	Erosion Management Overlay Schedule (current)
EMO	Erosion Management Overlay
EMO1	Erosion Management Overlay Schedule 1 (proposed)
Form and Content Direction	Ministerial Direction 1: The Form and Content of Planning Schemes
Golder Review	Erosion Management Overlay Basis for Schedule Amendment, WSP (Golder) Australia, May 2023
Planning Scheme	Yarra Ranges Planning Scheme
Practitioner's Guide	A Practitioner's Guide to Victorian Planning Schemes Version 1.5, April 2022

Page

Overview

Amendment summary		
The Amendment	Yarra Ranges Planning Scheme Amendment C217yran	
Common name	Erosion Management Overlay	
Brief description	Amend the form and content of the Erosion Management Overlay Schedule 1	
Subject land	Land subject to the Erosion Management Overlay	
Planning Authority	Yarra Ranges Shire Council	
Authorisation	22 May 2023	
Exhibition	22 June to 27 July 2023	
Submissions	Number of Submissions: 12	
	Greg Bourne	
	Leharna Black	
	Christopher Betts	
	Mario and Carlo Mazzella	
	Environment Protection Authority Victoria	
	Diego Caldarola	
	Warren Blair	
	Erin Myers Alexandra and Daniel Murcott	
	Julia Noel	
	Robert and Christine Dove	
	Ben Young	
	South East Water	

Panel process	
The Panel	Alison McFarlane, Chair
Directions Hearing	Video conference, 25 September 2023
Panel Hearing	Video conference, 23 October 2023
Parties to the Hearing	Yarra Ranges Shire Council represented by Katherine Baltas, Senior Strategic Planner and Alison Fowler, Executive Officer Strategic Planning who called expert evidence on engineering from Darren Paul of WSP Australia Pty Ltd
Citation	Yarra Ranges PSA C217yran [2023] PPV
Date of this report	16 November 2023

Executive summary

A significant storm event in Victoria in June 2021 resulted in the damage and destruction of dwellings in Yarra Ranges. Many of the affected properties were in the Dandenong Ranges and nearby areas, which are also susceptible to other natural hazards including bushfire and landslip. Following the storm event, Yarra Ranges Shire Council (Council) received grant funding of \$300,000 under the Commonwealth Government's *Preparing Australian Communities Program – Local*, to undertake a review of the current Erosion Management Overlay Schedule (current EMO) in the Yarra Ranges Planning Scheme. Council engaged an expert geotechnical consultant to undertake the review.

The review recommended the current EMO be revised to make it more streamlined and user friendly. Yarra Ranges Planning Scheme Amendment C217yran (the Amendment) proposes to amend the current EMO to:

- align it with the guidance provided in the Australian Geomechanics Society Practice Note Guidelines for Landslide Risk Management 2007
- simplify the structure
- introduce new permit exemptions.

The Amendment does not propose to revise the mapping of the current EMO. Detailed geotechnical investigations to refresh existing mapping are proposed to be undertaken as part of a future process.

Key issues raised in submissions were whether:

- the current EMO should be removed from 3 Johnston Parade and 4 Oberon Avenue, Ferny Creek
- an exemption should be provided to rebuild a damaged or destroyed buildings where there is evidence that land is stable
- the planning provisions are clear and practical.

The Panel concludes:

- It would be premature to take parcels out of the current EMO without detailed geotechnical investigations to inform revised mapping.
- It is appropriate that a planning permit is required to reconstruct damaged buildings to ensure landslide risks are properly assessed against current site conditions.
- Substantial redrafting of the proposed Erosion Management Overlay Schedule 1 is required to ensure provisions and clear and practical, and comply with *Ministerial Direction 1: The Form and Content of Planning Schemes* and the *Practitioner's guide to Victoria's planning schemes, Version 1.5,* April 2022.

Clause 13 (Environmental risks and amenity) provides the strategic foundation for the Amendment. It requires planning to identify, prevent and minimise risks to the environment, human health and amenity. The Amendment is consistent with this objective. Of note, the Amendment lowers Council's risk tolerance for residential development in landslip areas, consistent with guidance applied elsewhere in Victoria and across Australia.

Overall, the Panel is satisfied the Amendment is strategically justified and delivers net community benefit and sustainable development as required by Clause 71.02-3.

Recommendations

Based on the reasons set out in this Report, the Panel recommends that Yarra Ranges Planning Scheme Amendment C217yran be adopted as exhibited subject to the following:

- 1. Amend the labelling of the Erosion Management Overlay maps from 'EMO' to 'EMO1'.
- 2. Amend the Erosion Management Overlay Schedule 1 as shown in the Panel preferred version in Appendix D to:
 - a) Under Clause 2.0, delete policy guidance content
 - b) Under Clause 3:
 - include a permit requirement for a fence and exempt open masonry fencing and timber, wire and aluminium fencing
 - include a permit requirement for a rainwater tank and domestic swimming pool or spa
 - standardise the capacity of water holding structures not requiring a permit to 5,000 litres
 - delete the permit exemption for retaining walls constructed to provide support to existing unsafe earthworks
 - delete the permit exemptions for repair and routine maintenance
 - amend the permit exemption for vegetation removal to vegetation with a circumference of 0.5 metres measured at 1.3 metres above ground level
 - c) Under Clause 4.0:
 - consolidate application requirements for specific types of application
 - revise the application requirement waiver.
- 3. Insert a new local policy in Clause 13.04-2S (Erosion and landslip) as shown in the Panel preferred version in Appendix E
- 4. Amend Clause 72.02 Schedule (Documents Incorporated in this Planning Scheme) to include:
 - a) Guidelines for Landslide Susceptibility, Hazard and Risk Zoning for Land Use Planning, Journal of Australian Geomechanics Society, Volume 42: No 1, March 2007
 - b) Practice Note Guidelines for Landslide Risk Management 2007, Journal of Australian Geomechanics Society, Volume 42: No 1, March 2007.
- 5. Amend Clause 1.0 of the Incorporated Document 'Requirements for a Geotechnical Assessment, Landslide Risk Assessment or Landslide Hazard Assessment prepared in support of a planning permit application under the Erosion Management Overlay' to replace 'Registered Professional Engineer (RPEng)' with 'Registered Professional Engineer, Victoria registered under Part 2 of the Victorian Professional Engineers Registration Act 2019'.

1 Introduction

1.1 The Amendment

(i) Amendment description

Yarra Ranges Planning Scheme Amendment C217yran (the Amendment) proposes to revise planning controls in the Yarra Ranges Planning Scheme (Planning Scheme) for areas prone to landslip.

Specifically, the Amendment proposes to:

- revise the current Erosion Management Overlay Schedule (unnumbered) (current EMO) with a new Erosion Management Overlay Schedule 1 (EMO1)
- amend Clause 72.04 Schedule (Documents Incorporated in the Planning Scheme) to insert *Requirements for a Geotechnical Assessment, Landslide Risk Assessment or Landslide Hazard Assessment prepared in support of a planning permit application under the Erosion Management Overlay, Yarra Ranges Shire Council, March 2023* as an Incorporated Document
- amend Clause 72.04 Schedule (Background Documents) to insert *Erosion Management Overlay Basis for Schedule Amendment, WSP Australia, May 2023* (Golder Review).

1.2 Background

Yarra Range Shire Council (Council) provided a detailed background to the Amendment. The Panel has summarised this in Table 1.

Table 1 Amendment C217yran chronology of events			
Date	Event / Description		
Early 1990s	The former Shire of Lilydale first introduced planning provisions to manage erosion in response to property destruction caused by landslides through the 1980s and early 1990s.		
2000	Erosion Management Overlay introduced into the Planning Scheme based on topographic information largely derived from 1960s Melbourne Metropolitan Board of Works contour plans and aerial photography.		
December 2009	Amendment C40 approved to revise the EMO. Introduced application requirements for a geotechnical assessment prepared by an expert practitioner.		
June 2021	A significant storm event in Victoria resulted in the damage and destruction of many dwellings in Yarra Ranges. Council's Rebuilding Support Service reported the storms caused 71 properties to be uninhabitable and a further 51 properties were damaged but still habitable.		
2022	Council received grant funding of \$300,000 under the <i>Commonwealth</i> <i>Government's Preparing Australian Communities Program – Local</i> , to undertake a review of the current EMO. Council engaged an expert geotechnical consultant to undertake the review.		
May 2023	Council received report from geotechnical consultant WSP (the Golder Review).		

The Golder Review recommended the current EMO be amended to:

- simplify the structure
- increase the risk tolerance to 'moderate' for certain buildings consistent with the guidance provided in the Australian Geomechanics Society Practice Note Guidelines for Landslide Risk Management 2007 (AGS 2007 Landslide Guidelines)
- include new exemptions for minor buildings, fencing and vegetation removal (refer Appendix B).

1.3 The Panel's approach

Key issues raised in submissions were:

- whether the current EMO should be removed from 3 Johnston Parade and 4 Oberon Avenue, Ferny Creek
- an exemption should be provided to rebuild a damaged or destroyed buildings where there is evidence that land is stable
- the permit and application requirements are clear, practical and appropriate.

The Panel has assessed the Amendment against the principles of net community benefit and sustainable development, as set out in Clause 71.02-3 (Integrated decision making) of the Planning Scheme.

The Panel considered all written submissions made in response to the exhibition of the Amendment, and submissions, evidence and other material presented to it during the Hearing. The Panel has been selective in referring to the more relevant or determinative material in the Report. All submissions and materials have been considered by the Panel in reaching its conclusions, regardless of whether they are specifically mentioned in the Report.

This Report deals with the issues under the following headings:

- Strategic issues
- Issues raised in the submissions
- Other drafting issues.

1.4 Limitations

This report addresses submissions that requested changes to the Amendment. Submissions received in support of the Amendment from Submitters 6, 8 and South East Water are not discussed in the report.

Submitter 2 suggested Council should be doing more to require individual landowners to manage large trees at risk of falling. This is beyond the scope of Amendment and is not addressed further in this report.

Submitter 6 suggested Council undertake road and drainage works to complement the Amendment. This is also beyond the scope of the Amendment and is not addressed further in this report.

Council advised that it sought advice from its insurance provider regarding the Amendment, and it will consider that advice as part of the Amendment process. The Panel did not receive, and therefore not considered this advice.

2 Strategic issues

2.1 Planning context

This chapter identifies planning context relevant to the Amendment. Appendix C highlights key imperatives of relevant provisions and policies.

Table 2 Planning context	
Source	Relevant references
Victorian planning objectives	Section 4 of the PE Act
Municipal Planning Strategy	Clause 02.03-3 (Environment risks and amenity)
Planning Policy Framework	Clause 13.04-2S (Erosion and landslip) Clause 16.01-1L (Housing)
Other planning strategies and policies	Upper Yarra Valley and Dandenong Ranges Regional Strategy Plan
Planning scheme provisions	Clause 44.01 (Erosion Management Overlay) Clause 52.10 (Reconstruction after an emergency) Clause 63.10 (Damaged or destroyed buildings or works)
Ministerial directions	Ministerial Direction on the Form and Content of Planning Schemes Ministerial Direction 11 (Strategic Assessment of Amendments)
Planning practice notes	Planning Practice Note 46: Strategic Assessment Guidelines, September 2022
Other guidance	A Practitioner's Guide to Victorian Planning Schemes Version 1.5, April 2022

2.2 Context

The Golder Review explains:

- acceptable risk is a risk that requires no assessment or specific management
- tolerable risk is a risk that can be tolerated, subject to appropriate management
- under the current EMO 'low' or 'very low' risk is designated as tolerable, 'moderate' is not tolerable
- the AGS 2007 Landslide Guidelines suggests tolerable risk can be varied depending on the importance of the structure (where a public building is considered more important than a dwelling)
- where moderate risk has been assessed, a principle of 'As Low as Reasonably Practical' should apply and practical measures should be implemented to reduce risk if they are available
- a geotechnical assessment or landslide risk assessment undertaken by a geotechnical practitioner should provide recommendations to reduce risk to as low as reasonably practical
- implementation of the recommended measures should then become a condition of a planning permit.

2.3 Strategic justification

(i) Evidence and submissions

Council submitted:

- the current EMO requires all development to achieve a low or very low risk to property whether it be a garden shed or a hospital
- the Amendment increases the tolerable risk for certain types of development, like residential dwellings or farm sheds
- the tolerable risk for critical infrastructure such as a school or hospital will not change
- the proposed risk profile is consistent with AGS 2007 Landslide Guidelines and with other planning schemes, including Colac Otway
- the new approach will benefit the community who are facing difficulties rebuilding their homes after recent major storm events.

Darren Paul of WSP Australia Pty Ltd provided engineering evidence for Council. His evidence was:

The applicable regulatory authority (i.e., Yarra Ranges Council) is ultimately responsible for deciding what risk level is tolerable. Although there are guidelines to help inform the selection of a risk threshold, it is the responsible authority who must make this determination in line with societal expectations. For this Amendment, I provided a recommendation to Council to adopt the guidance set out in the AGS 2007 guidelines noting there is precedent from other Victorian LGA's (Local Government Authorities) that have adopted this guidance.

In response to questions from the Panel, Mr Paul confirmed:

- there is no standard for appropriate development in areas subject to erosion or landslip in Victoria
- local governments rarely have in-house specialists with technical expertise in erosion and landslip
- councils rely on technical advice from insured practitioners to inform permit decisions
- AGS 2007 Landslide Guidelines are generally applied as a standard across Australia.

On the drafting of the Amendment, Council submitted the updated provisions are streamlined and easier to use, consistent with State government reforms to simplify the planning process. This would offer the benefits summarised in Table 3.

Provision	Change	Benefit
EMO1 Schedule 2.0 (statement of risk)	Amend the tolerable risk criteria from low to medium for some structures such as houses and sheds.	Consistency with AGS 2007 Landslide Guidelines to provide a clear decision basis. Allows risk threshold requirements to be consistent with importance of structure.
EMO1 Clause 3.0 (permit requirements)	Expand exemptions for minor buildings and works and vegetation removal.	Revise exemptions for minor or essential development for which landslide risks are typically, low or where society benefit clearly outweighs landslide risk.

Table 3 Benefits of exhibited changes to erosion management provisions

Provision	Change	Benefit
	Introduction of exemption for development where community benefit outweighs landslide risk or where delaying works could be detrimental to slope stability.	Avoid delaying essential, beneficial work.
EMO1 Clause 4.0 (application requirements)	Developing separate requirements for subdivision applications compared to new buildings and works.	Allows appropriate information to be provided and better inform assessment of applications.
Incorporated Document	Simplification of the EMO1 by relocating technical content intended for use by geotechnical practitioners to an Incorporated Document.	Simplify the EMO1 by removing technical jargon.

Referring to a recent experience of obtaining a planning permit for an underground fire shelter, Submitter 1 stated the Amendment should be redrafted if it does not simplify and expedite the planning approvals process.

(ii) Discussion

Clause 13 (Environmental risks and amenity) provides the strategic foundation for the Amendment. It requires planning to identify, prevent and minimise risks to the environment, human health and amenity. Strategies to protect human health from landslip are provided at Clause 13.04-1, and include:

- identifying areas subject to instability in planning schemes
- preventing inappropriate development in unstable areas.

The Planning Scheme has identified areas susceptible to landslip for many decades through the application of the current EMO. The Amendment proposes to:

- alter the benchmark for 'appropriate' development for certain development types
- refine the overlay schedule to ensure it can be administered effectively.

The Panel notes:

- Council's proposed benchmark for appropriate development (that is tolerate risk) is informed by an industry standard that is recommended by experts
- this benchmark is referenced in the Colac Otway Planning Scheme.

Unlike other risk based overlays in the Victoria Planning Provisions, development decisions under the EMO do not benefit from the input of an expert central agency, as is the case for bushfire (relevant fire authority), inundation and flooding (relevant floodplain management authority) and salinity (Secretary to the Department of Energy, Environment and Climate Action). The Panel notes the opinion of Mr Paul that local governments rarely have in-house engineering geologists, and decisions are informed by expert information accompanying an application. In this context, it is reasonable for Council to seek to set a benchmark for appropriate development, and to match that benchmark with an industry accepted standard that applies elsewhere in Victoria and Australia. The Panel is satisfied this approach is consistent with the strategic objective of the Planning Scheme to prevent inappropriate development. The importance of careful drafting of amendments is discussed in *A Practitioner's Guide to Victorian Planning Schemes Version 1.5, April 2022* (Practitioner's Guide). This states:

The efficiency and effectiveness of planning schemes is important to Victoria's economy and liveability. Each year the planning system processes around 55,000 planning permit applications, which represents around \$30 billion of future investment in Victoria.

Drafting is effective when it is clear and can be consistently understood by applicants and administered by decision makers. The Panel is not satisfied the exhibited Amendment will achieve its intended objective for administrative efficiency because drafting does not comply with *Ministerial Direction 1: The Form and Content of Planning Schemes* (Form and Content Direction) and the Practitioner's Guide. This is discussed in detail in Chapters 3 and 4. Notwithstanding, the Panel is satisfied drafting issues can be remedied by the planning authority through future stages of the Amendment process.

Subject to its recommended changes, the Panel is satisfied the Amendment delivers net community benefit and sustainable development as required by Clause 71.02-3.

(iii) Conclusions

For the reasons set out in this report, the Panel concludes that the Amendment:

- is supported by, and implements, the relevant sections of the Planning Policy Framework
- is well founded and strategically justified
- should proceed subject to addressing the more specific issues raised in submissions as discussed in the following chapters.

3 Issues raised in the submissions

3.1 Mapping

(i) The issue

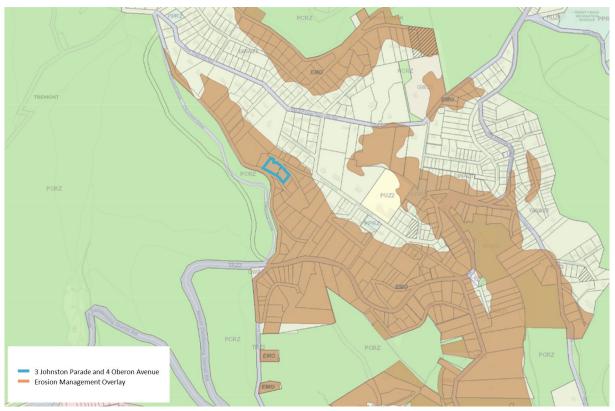
The issue is whether the current EMO should be removed from 3 Johnston Parade and 4 Oberon Avenue, Ferny Creek.

(ii) Background

The properties at 3 Johnston Parade and 4 Oberon Avenue, Ferny Creek are currently included in the EMO as shown in Figure 1. The Amendment does not propose to change the existing mapping, however proposes to modify the mapping reference in the EMO Schedule as follows:

Existing – Shown on the planning scheme map as **EMO** with a number (if shown) Proposed – Shown on the planning scheme map as **EMO1**.





(iii) Evidence and submissions

Submitter 7 requested the current EMO be removed from properties at 3 Johnston Parade and 4 Oberon Avenue because:

- the properties are not subject to erosion or landslip risk
- the soil is stable, as evidenced by the condition of vegetation
- water from local roads runs into private properties and poses risk to land stability
- Council should address drainage rather than pursue the Amendment.

Mr Pauls' evidence was:

- the properties were included in the EMO based on a 1999 geological study which indicated they were susceptible to landslide
- 'susceptibility' does not necessarily mean a landslide is known to have occurred on the site in the past, rather there is potential for a landslide to occur on the site in the future if adverse conditions prevail
- studies undertaken by the Geological Survey of Victoria confirm the site is underlain by a rock type (Ferny Creek Rhyodacite) which is known to be susceptible to landslide where it underlies slopes that are steeper than 30 percent
- there are many examples of landslides having occurred on sites with these attributes in the Ferny Creek and the broader Mount Dandenong areas
- landslides can be triggered by inappropriate earthworks, poor drainage or land clearance
- the purpose of the EMO is to prevent inappropriate development that could lead to a landslide. It is also intended to protect the properties from inappropriate development on adjacent sites
- any changes to the mapping of the EMO would require further investigation and consideration through a future separate planning scheme amendment.

Council noted a review of the current EMO mapping will be undertaken in the future. This review will consider light detection and ranging (LiDAR) information that was not available in 1999 when the current EMO maps were prepared.

(iv) Discussion

The Amendment does not propose to revise the mapping of the overlay. It would be premature to take parcels out of the current EMO without detailed geotechnical investigations. The observations of landowners cannot be relied upon to support a change in mapping.

The Panel notes that numbering the current EMO as 'EMO1' requires a consequential mapping change not exhibited as part of the Amendment. To rectify this drafting error all existing EMO maps require renumbering from 'EMO' to 'EMO1'.

(v) Conclusions

The Panel concludes:

- The Erosion Management Overlay should be retained over properties at 3 Johnston Parade and 4 Oberon Avenue, Ferny Creek.
- Numbering the current Erosion Management Overlay Schedule as Erosion Management Overlay Schedule 1 requires a consequential mapping change.

(vi) Recommendation

The Panel recommends:

Amend the labelling of the Erosion Management Overlay maps from 'EMO' to 'EMO1'.

3.2 Rebuilding damaged or destroyed buildings

(i) The issue

The issue is whether an exemption should be provided to rebuild a damaged or destroyed buildings where there is evidence that land is stable.

(ii) Background

Clause 52.10 (Reconstruction after an emergency) facilitates:

- reconstruction of buildings and works damaged or destroyed because of an emergency
- re-establishment of businesses and services after an emergency
- continued use of land for dwellings after an emergency.

Buildings and works facilitated by Clause 52.10 still need to comply with other requirements of the planning scheme, including the requirements of the EMO. In particular, Clause 63.10 (Damaged or destroyed buildings or works) provides:

If at least 50 percent of the gross floor area of a building or at least 50 percent of the area of any works is damaged or destroyed so that the use cannot continue without the building or works being reconstructed, the land must be used in conformity with this scheme, unless a permit is granted to continue the use, and to construct or carry out buildings or works.

(iii) Evidence and submissions

Submitter 3 stated planning provisions preventing the rebuilding of a damaged or destroyed dwelling may have serious negative financial implications. The submitter suggested the Amendment allow for the rebuilding of a destroyed or damaged dwelling where it can be demonstrated that landslip has not occurred for an extended period (for example over 50 years).

Mr Paul's evidence was:

- the primary intent of the EMO is to prevent inappropriate development such as poor earthworks, land clearance and drainage that could cause future landslides
- in a similar way to inappropriate development, a natural disaster in the Yarra Ranges is likely to change the landslide risk because it involves loss of vegetation (through tree fall or bushfire), loss of retaining structures, or damage or re-direction of drainage
- it is important that after a natural disaster a site and any new development is assessed to check whether the landslide risk has changed
- the current EMO and proposed EMO1 makes provision for this assessment.

Mr Paul also explained the soil mechanics of the Mount Dandenong area. He stated:

An often misunderstood aspect of soil mechanics relates to how slope stability changes over time. In the Mount Dandenong area, there are no natural soil slopes steeper than about 27° as measured from below the horizontal, which provides guidance about the steepest angle the soil can maintain over the long term, meaning over decades to centuries...The maximum long term stable slope angle of 27° is called the 'angle of repose'.

When excavation is undertaken which increases the slope angle above the angle of repose, for example a cutting to accommodate construction of a house, the excavation can potentially hold that steeper angle for decades or even centuries before the cutting eventually collapses back to the angle of repose. The stability of the cutting reduces over time, meaning that in effect the cutting ages, becoming more unstable with time. If there were two identical cuttings in identical soil and one had been there 5 years and the other 50 years, the cutting that had been there for 5 years would be more stable.

It is unfortunate that in the Yarra Ranges there are many earthworks undertaken prior to the implementation of the EMO in 2001 that are too steep and which form ground steeper than the natural angle of repose of the soils. These slopes present an ongoing hazard to homes and lives. It is challenging to rectify these hazards, however given our current knowledge of the geology and landslip processes within Yarra Ranges, inappropriate to ignore them. Some rebuilds in Yarra Ranges will inevitably attract additional costs associated with mitigating pre-existing landslip hazards. It is understood that this requirement places an unexpected burden on home owners who find themselves in a rebuild situation, and is compounded by other improvements that need to be made to comply with modern codes, including upgrading to meet bushfire attack level requirements, upgrading septic disposal to meet current EPA (Environment Protection Authority Victoria) requirements and removing and replacing hazardous materials such as asbestos. However, I consider the value of the reduction in risk to life and property effected by mitigating pre-existing landslide hazards will in the most part be worth the investment made during the rebuild.

Council submitted the Amendment supports Clause 52.10 (Reconstruction after an emergency), the purpose of which is to:

- facilitate the reconstruction of buildings and works damaged or destroyed as a result of an emergency
- facilitate the continued use of land for dwellings after an emergency.

(iv) Discussion

Clauses 52.10 and 63.10 are the State provisions relating to destroyed and damaged buildings. Both require planning permits to be obtained to develop land where an existing building is significantly damaged or destroyed.

The Panel gives significant weight to the opinion of Mr Paul that caution must be applied in a rebuild scenario to ensure risk to life and property is properly assessed against existing site conditions. The Panel agrees with Council that a permit exemption should not apply for rebuilding a destroyed building.

(v) Conclusion

The Panel concludes the Erosion Management Overlay Schedule 1 should not provide an exemption to rebuild damaged or destroyed buildings.

3.3 Permit exemptions for fencing and retaining walls

(i) Issue

The issue is whether the proposed permit exemptions for fencing and retaining walls are clear.

(ii) Background

Clause 3.0 (Permit requirements) of EMO1 provides:

A permit is not required to:

- Construct or carry out works associated with:
 - A masonry fence, if the height of the fence does not exceed one metre and the fence does not alter surface water drainage.
 - A fence of lightweight timber or wire construction, where the fence is permeable or the base of the fence is at least 50 mm above the ground surface and does not obstruct surface water flow.

• • •

• Construct a retaining wall that:

- Does not exceed 1 metre in height.
- Is not associated with other building construction works.
- Does not provide landslip protection for any adjoining land.
- Is constructed to provide support to existing unsafe earthworks.

(iii) Submissions

Submitter 9 sought clarification on the planning permit exemptions in the EMO1, particularly:

- if aluminium is an appropriate lightweight fencing material that should be specifically listed in the fencing exemptions
- if all four requirements (rather than any of the four) must be met for a retaining wall to be exempt from a planning permit.

In response, Council submitted it would be appropriate to:

- vary the proposed fencing exemption to include reference to aluminium or other lightweight material, where the fence is permeable, or the fence is at least 50 millimetres above the ground surface and does not obstruct surface water flow
- separate the new exemption related to retaining wall works to address existing hazards as the other three existing retaining wall exemptions apply to proposed or new development.

Council proposed the exhibited EMO1 be redrafted as follows:

A permit is not required to:

- Construct or carry out works associated with:
 - A masonry fence, if the height of the fence does not exceed one metre and the fence does not alter surface water drainage.
 - A fence of lightweight construction (for example timber, wire, aluminium or other lightweight material as approved by the responsible authority) timber or wire construction, where the fence is permeable or the base of the fence is at least 50 mm above the ground surface and does not obstruct surface water flow.

•••

- For new works Construct a retaining wall that:
 - Does not exceed 1 metre in height and
 - Is not associated with other building construction works and
 - Does not provide landslip protection for any adjoining land.
 - Is constructed to provide support to existing unsafe earthworks.
- Construct a retaining wall or provide slope retention which is specifically intended to provide support to and rectify existing unsafe earthworks.

Mr Paul's evidence stated the proposed exemption for retaining walls is intended to ease requirements by allowing development without a permit where needed to mitigate or reduce a pre-existing landslip hazard. He explained:

- prior to 1991 there were no planning controls for earthworks
- there is extensive development that does not represent good hillside construction practice and presents an ongoing hazard to life and property
- some earthworks have been undertaken without a permit since the introduction of planning controls
- Figure 2 (below, taken from his evidence) provides an example of earthworks undertaken prior to the introduction of the current EMO which have now resulted in an unsafe situation for the property owners
- the intent and justification for this exemption is to reduce landslip risk by encouraging remediation of existing hazardous earthworks

- new earthworks would still require a planning permit
- any retaining wall higher than 1 metre that benefits from this exemption would still require a building permit, including structural engineering design.

In response to questions from the Panel, Mr Paul advised rectifying a pre-existing landslip hazard was unlikely to have downstream consequences because the site cutting would already be in place. Additional earthworks or vegetation removal would still be subject to a permit.

Figure 2Landslip at Mount Evelyn on 5 October 2023



Source: Document 3

(iv) Discussion

Allowing the development of lightweight fencing that is permeable at ground level without a planning permit is consistent with the advice in the Golder Review. This states:

Fences generally do not change landslide risk unless:

- They are impermeable at ground surface and could cause disruption or redirection and concentration of surface water flow.
- They are heavy, for example masonry that could present a risk to life if they constructed on unstable ground and were to topple.

There is a basis to exempt permeable, lightweight fences. Freestanding masonry walls higher than 1 m and fences impermeable at ground level should not be exempt.

The Panel accepts the evidence of Mr Paul that the construction of lightweight fencing will not increase landscape risk or the risk to human life. The Panel is satisfied the proposed exemption should be broadened to accommodate aluminium fencing. The Panel does not support use of the term 'other lightweight fencing' because its lacks the specificity required for a permit exemption.

The Panel accepts Mr Paul's evidence that allowing the development of a retaining wall designed to mitigate or reduce a pre-existing landslip hazard will encourage remediation of existing hazardous earthworks. However, the Panel is not satisfied the drafting of the exemption is sufficiently clear to enable its consistent application. In particular, the exemption requires a decision maker to form an opinion about the meaning or extent of the term 'unsafe earthworks'.

If the intent is to allow the repair of damaged structures as shown in Figure 2, it is likely this could be achieved under general exemptions for repair and routine maintenance under Clause 62.02-2, negating the need for a specific exemption.

Chapter 4 contains further commentary on the drafting of permit exemptions for fencing having regard to guidance in the Practitioner's Guide.

(v) Conclusions

The Panel concludes:

- The proposed permit exemption for aluminium fencing is appropriate.
- The proposed permit exemption for retaining walls designed to remediate existing 'unsafe earthworks' does not provide statutory certainty.

(vi) Recommendation

The Panel recommends:

Amend the Erosion Management Overlay Schedule 1, Clause 3.0 to:

- a) exempt timber, wire and aluminium fencing
- b) delete the exemption for retaining walls constructed to provide support to existing unsafe earthworks.

as shown in the Panel preferred version in Appendix D.

3.4 Geotechnical practitioners

(i) Issues

The issues are whether the:

- list of geotechnical practitioners listed in the Incorporated Document should be expanded
- Yarra Ranges landslide inventory should be available to practitioners.

(ii) Background

Section 1 of the Incorporated Document provides:

The documentation described herein is to be prepared by a Geotechnical Practitioner, being an Engineer or Engineering Geologist who has experience in the management of slope stability problems and landslide risk management as a core competence, is degree qualified, and who has current professional status as a:

- Chartered Professional Engineer (CPEng); or
- Registered Professional Engineer (RPEng); or
- Chartered Professional Geologist (CPGeo); or
- Registered Professional Geologist (RPGeo).

(iii) Submissions

Submitter 11 considered the list of geotechnical practitioners listed in the Incorporated Document should be expanded to include Victorian Registered Engineers with suitable experience.

Mr Paul's evidence stated that a Victorian Registered Professional Engineer registered through the Victorian Business Licensing Authority would meet the requirement of the Incorporated Document. To make this clearer, the terminology in the Incorporated Document could be

amended from Registered Professional Engineer (RPEng) to Registered Professional Engineer, Victoria (meaning a person who is registered under Part 2 of the *Victorian Professional Engineers Registration Act 2019*) to clarify that the Victorian engineer's registration is an accepted qualification.

Council supported Mr Paul's recommendation.

Mr Paul also confirmed access to the Yarra Ranges landslip inventory is available to geotechnical practitioners. Access can be arranged through Council's Strategic Planning department.

(iv) Discussion

Mr Paul's recommendation changes to the professionals listed in the Incorporated Document improve clarity and warrant support.

The availability of the Yarra Ranges landslide inventory is not directly relevant to the Amendment, however it will support the preparation of technical information needed to fulfil the application requirements of the EMO1. It is appropriate that Council makes this information available to practitioners.

(v) Conclusion

The Panel concludes:

- The list of geotechnical practitioners should be expanded to include 'Registered Professional Engineer, Victoria'.
- The Yarra Ranges landslide inventory should be available to practitioners.

The Panel recommends:

Amend Clause 1.0 of the Incorporated Document 'Requirements for a Geotechnical Assessment, Landslide Risk Assessment or Landslide Hazard Assessment prepared in support of a planning permit application under the Erosion Management Overlay' to replace 'Registered Professional Engineer (RPEng)' with 'Registered Professional Engineer, Victoria registered under Part 2 of the Victorian Professional Engineers Registration Act 2019'.

4 Other drafting issues

The Panel's Directions (Document 1) required Council to respond to questions about the drafting of the Amendment. Chapters 4.1 to 4.8 relate to the specific drafting issues raised by the Panel.

4.1 Clause 2.0 Statement of risk

(i) Background

The exhibited provision provides:

Areas subject to landslip across the Yarra Ranges include the hillsides along the Yarra River valley, the mountains of the Dandenong Ranges and agricultural areas of Silvan, Monbulk and Seville.

The occurrence of landslips within the Yarra Ranges has historically caused damage to property and the environment and presents an ongoing risk to human life. Geotechnical studies have documented historical landslip occurrences and seek to identify areas susceptible to future landslide occurrence.

The control of environmental factors and development relating to vegetation cover, drainage, rock, earthworks, soil disturbance and effluent and stormwater disposal are all important in managing the risk of landslip.

Risk from landslip needs to achieve a Tolerable Risk level to be considered suitable for new development.

Tolerable Risk is a risk within a range that society can live with so as to secure certain net benefits. It is a range of risk that is regarded as non-negligible and requires ongoing review and reduction if possible. The maximum tolerable risk is defined as:

- For loss of life for the person(s) most at risk, it is taken as having a probability of no greater than 10⁻⁵ (1 in 100,000) per annum calculated in accordance with the Australian Geomechanics Society Practice Note Guidelines for Landslide Risk Management 2007.
- For property loss it is assessed qualitatively using the Australian Geomechanics Society Practice Note Guidelines for Landslide Risk Management 2007, specifically Appendix C to that document. and the tolerable risk level is selected depending on the new development type in accordance with Table 1.

The Panel asked Council to confirm the rationale for including the 'tolerable risk' policy statement under the Statement of Risk.

(ii) Evidence and submissions

Council submitted it would not support the use of a local policy to replicate the function of dot points 1 and 2. Council noted:

- this approach would be contrary to the Practitioners Guide which states that in most instances, specific (often numerical) requirements can be included in a schedule to a zone or overlay
- other approved EMO Schedules follow the same drafting approach, including EMO1 in the Colac Otway Planning Scheme.

(iii) Discussion

There is no definitive drafting guidance in the Practitioners Guide for preparing a 'Statement of Risk' for the EMO Schedule. The Panel relies on the guidance relevant to a 'Statements of significance' which provides:

Some schedules to overlays require a statement to be inserted. For example, the Environmental Significance Overlay requires 'a statement of environmental significance' and the Vegetation Protection Overlay requires 'a statement of the nature and significance of the vegetation to be protected'.

These statements are intended to summarise the essential elements that define the significance of the overlay area.

Where possible, the statement should be based on study findings that clearly demonstrate the values that make the area special, and show how those values relate to the purposes of the chosen overlay. For example, a landscape study might provide the analysis from which to draw the statement of significance for the schedule to the Significant Landscape Overlay. (Panel underline)

(Panel underline)

Council's proposed drafting of Clause 2.0 is much more than a Statement of Risk. It contains elements of a 'requirement' or a 'policy guideline' as defined in the Practitioners Guide as follows:

Requirement

Specifies the limits of a discretion or right under a provision or the conditions under which it must be exercised.

Policy guidelines indicate how an objective can be met and how a strategy can be implemented. A responsible authority must take a relevant policy guideline into account when it makes a decision, but is not required to give effect to it. If the responsible authority is satisfied that an alternative approach meets the policy objective, the alternative may be considered.

The exhibited drafting "*Risk from landslip needs to achieve a Tolerable Risk level to be considered suitable for new development*" seeks to set a limit on the discretion that might be exercised by a decision maker. This is beyond the operational scope of the EMO, and inconsistent with the Form and Content Direction which makes no provision to include 'requirements' or 'policy guidelines' in the schedule.

The alternative approach is to draft the policy elements of Clause 2.0 as a local policy following Clause 13.04-2S (Erosion and landslip). Contrary to Council's submission, this approach is consistent with the Practitioner's Guide. Policy guideline are the appropriate location for 'numeric' guidelines where there is no allowance for them within a zone or overlay schedule.

(iv) Conclusion

The Panel concludes that Clause 2.0 of the Erosion Management Overlay Schedule 1 contains policy guidelines that should be redrafted as a local policy following Clause 13.04-2S (Erosion and landslip).

(v) Recommendations

The Panel recommends:

Amend Erosion Management Overlay Schedule 1, Clause 2.0 to delete policy guidance content as shown in the Panel preferred version in Appendix D.

Insert a new local policy for under Clause 13.04-2S (Erosion and landslip) as shown in the Panel preferred version in Appendix E.

4.2 Water holding structures

(i) Background

The exhibited provisions provide:

A permit is not required to construct or carry out works associated with:

- A pond or open, impervious water holding structure with a capacity of less than 5,000 litres.
- Landscaping water features provided it does not entail ponding of more than 500 litres.
- A domestic rainwater tank with capacity of not more than 4,500 litres provided it is constructed at ground level or above.
- A spa and associated mechanical and safety equipment if the spa has a capacity not exceeding 5,000 litres and is constructed at or above ground level.

The Panel asked Council to confirm the provisions for water holding structures could be consolidated.

(ii) Evidence and submissions

Mr Paul explained water retaining developments fall into two categories. The first category relates to impervious structures specifically designed and manufactured or constructed to an Australian Standard or with suitably qualified engineering input and supervision. The second category relates to pervious structures. Mr Paul noted:

- a spa, rainwater tank or other engineer designed impervious water holding structure would typically be designed in accordance with the requirements of an Australian Standard
- the likelihood of a leak developing and causing concentrated wetting of the ground and therefore elevated landslip risk is lower compared to a non-engineered water retaining element, for example a garden pond
- it is reasonable to accept a higher water holding capacity for exemption where a water holding structure is designed for that specific purpose to the requirements of an Australian Standard or by a suitably qualified engineer.

Mr Paul advised the four exemptions could be consolidated into two, as follows:

- impervious water holding structures manufactured to an Australian Standard such as domestic rainwater tanks and spas or other engineer designed impervious water holding structures such as ponds with a capacity not exceeding 5,000 litres
- landscaping water features or other non-engineer designed or manufactured water retaining structure provided it does not entail ponding of more than 500 litres.

Council supported Mr Paul's recommendation to consolidate the exemptions.

(iii) Discussion

The EMO Schedule must be drafted in accordance with the Form and Content Direction and within the authority provided by the EMO parent provision.

For 'Buildings and works' the EMO provides:

A permit is required to construct a building or construct or carry out works, including:

- Roadworks (other than roadworks constructed or carried out by or on behalf of the Head Transport for Victoria),
- Buildings and works associated with a dependent person's unit.

• A domestic swimming pool or spa and associated mechanical and safety equipment if associated with one dwelling on a lot.

Any other matter specified in Clause 62.02-2 if specified in a schedule to this overlay. This does not apply if a schedule to this overlay specifically states that a permit is not required.

In order to 'switch on' a permit requirement for any matter listed in Clause 62.02-2 (with the exception of roadworks, a dependent person's unit or domestic swimming pool or spa), a specific requirement must be 'scheduled in' (included in) the EMO Schedule. Scheduling in a permit requirement is explained in the Practitioner's Guide as follows:

Some schedules create an additional permit requirement, where there was none before. This is sometimes referred to as 'scheduling in'. Such a requirement can add to the permit requirements of the other provisions applying to the land. It can also remove all or part of the exemptions from a permit for minor works set out in Clause 62.02-2. This ability is particularly relevant to environmental management overlays. If land has a particular character or significance that justifies the application of the overlay and is reflected in its objectives, then buildings or works that may not meet the overlay objectives should always require a permit.

The Panel accepts Mr Paul's advice that the exemptions for water holding structures largely fit into two risk categories based on the whether they have been engineered to an Australian Standard. The Panel does not support Mr Paul's proposed drafting *"manufactured to an Australian Standard"* unless a specific Australian Standard can be specified in the exemption.

The Panel supports equalising the allowable capacity of exempt water holding structures to 5,000 litres given each will have an equivalent risk profile.

Table 4 provides the Panel's recommended drafting of exemptions for water holding structure, having regard to:

- the Form and Content Direction
- the permit requirements in the EMO parent provision
- the exemptions provided in Clause 62.02-2.

Table 4 Exemptions for water holding structures

Proposed EMO1 exemption	Clause 62.02-2 exemption	Panel recommended drafting
A pond or open, impervious water holding structure with a capacity of less than 5,000 litres.	No equivalent.	Exempt: A permit is not required for the construction or carryout of works
Landscaping water features	No equivalent.	for:
provided it does not entail ponding of more than 500 litres.		 A pond or open, impervious water holding structure with a capacity of 5,000 litres or less
		 A landscaping water feature with a capacity of 500 litres or less
A domestic rainwater tank with	A rainwater tank with a capacity	Insert in Schedule:
capacity of not more than 4,500 litres provided it is constructed at ground level or above.	of not more than 10,000 litres.	A permit is required to construct a rainwater tank unless its capacity is 5,000 litres or less and it is constructed at or above

	Proposed EMO1 exemption	Clause 62.02-2 exemption	Panel recommended drafting
and safety equipment if the spa has a capacity not exceeding 5,000 litres and is constructed at or above ground level.			ground level.
has a capacity not exceeding 5,000 litres and is constructed at or above ground level. and safety equipment if associated with one dwelling on a lot.	•	01	Insert in Schedule:
	has a capacity not exceeding 5,000 litres and is constructed at	and safety equipment if associated with one dwelling on	a domestic swimming pool or spa associated mechanical and safety equipment unless its capacity is 5,000 litres or less and it is constructed at or above ground

(iv) Conclusion

The Panel concludes that the proposed permit exemptions for water holding structures are generally appropriate, subject to changes to:

- schedule in permit requirements that are otherwise exempt under Clause 62.02-2
- standardise the capacity of water holding structures not requiring a permit to 5,000 litres
- only require construction if a specific Australian Standard is applicable and can be referenced.

(v) Recommendation

The Panel recommends:

Amend the Erosion Management Overlay Schedule 1, Clause 3.0 to:

- a) insert permit requirements for a rainwater tank and domestic swimming pool or spa
- b) standardise the capacity of water holding structures not requiring a permit to 5,000 litres

as shown in the Panel preferred version shown in Appendix D.

4.3 Masonry fences

(i) Background

The exhibited provision provides:

A permit is not required to:

- Construct or carry out works associated with:
 - A masonry fence, if the height of the fence does not exceed one metre and the fence does not alter surface water drainage.

The Panel asked Council to provide an example of a masonry fence that does not alter surface water drainage.

(ii) Evidence and submissions

Mr Paul explained:

- masonry fences comprised predominantly of brick or stone can present a landslide hazard because they disrupt and then concentrate surface water flow
- high masonry fences also present a risk to life and property if they were to topple
- masonry fences higher than 1 metre warrant geotechnical assessment

- fences providing sufficient gap through the masonry elements of the fence will not cause significant disruption to surface water flow and are therefore unlikely to alter landslide risk and could be exempted
- examples of masonry fences that allow surface water to drain through include dry stone walls, gabion walls, latticed masonry and masonry composite fences (Figure 3).

Mr Paul did not recommend any changes to the exhibited provision. Council supported Mr Paul's position.



Figure 3 Mr Paul's masonry fence examples

Source: Document 3

(iii) Discussion

The Panel accepts Mr Paul's evidence that low masonry fences with openings to allow natural surface water flow should be exempt from requiring a permit.

The drafting of the exhibited provision requires review to make it explicit that the exemption applies to open, rather than solid, masonry fences. As with water holding structures, Clause 62.02-2 exempts a fence from requiring a permit, unless a specific requirement applies. The proposed exemption requires redrafting to schedule in a permit requirement for a fence.

(iv) Conclusion

The Panel concludes that the proposed permit exemption for masonry fences is generally appropriate, subject to changes to:

• schedule in a permit requirement for fencing

• make clear that the exemption only applies masonry fences that allow the passage of surface water.

(v) Recommendation

The Panel recommends:

Amend the Erosion Management Overlay Schedule 1, Clause 3.0 to:

- a) include a permit requirement for a fence
- b) exempt open masonry fencing from requiring a planning permit

as shown in the Panel preferred version shown in Appendix D.

4.4 Vegetation removal

(i) Background

The exhibited provision provides:

A permit is not required to:

- Remove, destroy or lop vegetation, either separately or as part of building works if any of the following apply:
 - The trunk circumference measured at a height of 1.3 metres above ground level is less than 0.16 metres (Equivalent to a circumference of less than 0.5 metres at breast height) and the natural ground surface is reinstated.
 - The vegetation is within 2 m of a building.
 - The vegetation is dead and the natural ground surface is reinstated.
 - The lopping is for pruning to improve a tree's health or structural stability in accordance with normal horticultural practice for the species involved.

The Panel asked Council to explain the rationale for the permit exemption for vegetation removal.

(ii) Evidence and submissions

Mr Paul stated vegetation reduces landslide risk by:

- promoting surface water runoff, thereby reducing the potential for water concentration and infiltration into the ground
- removes water from the soil, noting that landslips in the Yarra Ranges are in most cases caused by a build-up of water pressure or saturation of the soil in areas that are susceptible to landslip due to geology and slope
- binding the soil through the root system.

Mr Paul said it is difficult to determine the extent or size of vegetation removal that induces a hazardous level of increased landslide risk, because this is based on the vegetation species and the specific attributes of the site.

Mr Paul noted the exhibited exemption contained an error, and the "0.16 metre circumference" should read "0.16 metre diameter". This exemption, once corrected, is similar to the current EMO which exempts removal of vegetation with a trunk circumference of 0.5 metres at 1 metre above the ground from requiring a permit. This also aligns with the exemption in Significant Landscape Overlay Schedule 22, which is the 'least onerous' of the schedules to the Environmental Significance Overlay and Significant Landscape Overlay.

Mr Paul considered increasing the trunk circumference measurement distance from 1 metre to 1.3 metres above the ground has negligible practical impact, however it simplifies the Planning

Scheme by improving consistency across the exemption in different overlays that largely apply in combination with the current EMO.

Council supported Mr Paul's recommendation.

(iii) Discussion

With Mr Paul's recommended correction, the exemption would provide:

A permit is not required to:

- Remove, destroy or lop vegetation, either separately or as part of building works if any of the following apply:
 - The trunk diameter measured at a height of 1.3 metres above ground level is less than 0.16 metres (Equivalent to a circumference of less than 0.5 metres at breast height) and the natural ground surface is reinstated.

In order to measure the trunk diameter of a tree, an everyday landowner would either need to:

- access specialised measuring equipment
- perform a mathematical calculation once the circumference of the tree is known.

This is impractical. The drafting requires revision to ensure it can be consistently understood and easily applied by landowners and practitioners alike.

(iv) Conclusion

The Panel concludes that the proposed permit exemption for vegetation removal is generally appropriate, subject to changes to make the exemption clear so that it can be practically applied.

(v) Recommendation

The Panel recommends:

Amend the Erosion Management Overlay Schedule 1, Clause 3.0 to exempt vegetation with a circumference of 0.5 metres measured at 1.3 metres above ground level as shown in the Panel preferred version shown in Appendix D.

4.5 Repair and maintenance

(i) Background

The exhibited provisions provide:

A permit is not required to:

Construct or carry out repair or maintenance works undertaken by or on behalf of a
public authority relating to watercourse management, environmental improvements or
infrastructure services.

The Panel asked Council if the provisions duplicate exemptions in Clause 62.02-2.

(ii) Submissions

Council submitted Clause 62.02-2 is "not the definitive authority if permission is required under the EMO".

(iii) Discussion

As discussed in relation to water holding structures (Chapter 4.4), in order to 'switch on' a permit requirement for any matter listed in Clause 62.02-2 (with the exception of roadworks, a dependent person's unit or domestic swimming pool or spa), a specific requirement must be 'scheduled in' the EMO1.

It is unclear to the Panel if Council seeks to schedule in all repair and routine maintenance activities, except for those conducted by public authorities. Council and Mr Paul did not provide evidence or submissions that risk of landslip would be increased by undertaking repair and routine maintenance activities for existing buildings and works.

In any event, the Panel notes Clause 62.02-1 exempts extensive activities by municipalities and public authorities, which cannot be scheduled in by way of a local provision. This includes:

Emergency works undertaken by, or on behalf of, a municipality, public authority or utility service provider in the exercise of any power conferred on them under any Act.

Buildings or works with an estimated cost of \$1,000,000 or less carried out by or on behalf of a municipality.

Maintenance works carried out by a municipality or public authority to prevent or alleviate flood damage.

(iv) Conclusions

The Panel concludes:

- Repair and routine maintenance have not been demonstrated to increase the risk of landslip.
- Permit exemptions for repair and routine maintenance provided by Clause 62.02-2 should remain without local variation.

(v) Recommendation

The Panel recommends:

Amend the Erosion Management Overlay Schedule 1, Clause 3.0 to delete the exemption for repair and routine maintenance as shown in the Panel preferred version shown in Appendix D.

4.6 Geotechnical and landslide risk assessment

(i) Background

The exhibited provision provides:

The following application requirements apply to an application for a permit under Clause 44.01, in addition to those specified elsewhere in Clause 44.01 and elsewhere in the scheme, and must accompany an application, as appropriate, to the satisfaction of the responsible authority:

- For an application to construct a building or construct or carry out works, plans drawn to scale and dimensioned, showing as appropriate:
 - The proposed new development, including as appropriate a site plan, land contours, building elevations, access, cut and fill, retaining walls and effluent disposal system.
 - Any existing development, including buildings, water tanks and pools or dams on both the subject lot(s) and adjacent land.
 - Any existing earthworks and water infrastructure on the subject lot(s), including cut and fill, stormwater drainage, subsurface drainage, water supply pipelines, sewerage

pipelines or effluent disposal installations and pipelines and any otherwise identified geotechnical hazard.

- Details and location of existing vegetation, including any vegetation to be removed.
- For an application to subdivide land, plans drawn to scale and dimensioned, showing as appropriate:
 - The proposed subdivision layout and land contours.
 - Any existing development, including buildings, water tanks and pools or dams on both the subject lot(s) and adjacent land.
 - Any existing earthworks or water infrastructure on the subject lot(s), including cut and fill, stormwater drainage, subsurface drainage, water supply pipelines, sewerage pipelines or effluent disposal installations and pipelines and any otherwise identified geotechnical hazard.
 - Details and location of existing vegetation, including any vegetation to be removed.
- A geotechnical assessment, landslide hazard assessment or landslide risk assessment as required by and prepared in accordance with the Incorporated Document titled 'Requirements for a Geotechnical Assessment, Landslide Risk Assessment or Landslide Hazard Assessment prepared in support of a planning permit application under the Erosion Management Overlay (EMO), March 2023' and to the satisfaction of the responsible authority.

The Panel asked if the application requirement for a geotechnical assessment should be redrafted to make clear if it applies to buildings and works or subdivision (or both) without referring to the proposed Incorporated Document.

(ii) Evidence and submissions

Mr Paul explained the intention of this clause is that any geotechnical report, whether it be for new buildings and works or subdivision, should be prepared in accordance with the guidance set out in the Incorporated Document. To avoid doubt, the application requirement could be altered to:

<u>A Landslide Hazard Assessment (for subdivision), Geotechnical Assessment or Landslide</u> <u>Risk Assessment (for new buildings and works)</u> as required by and prepared in accordance with the Incorporated Document titled 'Requirements for a Geotechnical Assessment, Landslide Risk Assessment or Landslide Hazard Assessment prepared in support of a planning permit application under the Erosion Management Overlay (EMO), March 2023' and to the satisfaction of the responsible authority.

Council supported Mr Paul's recommendation.

(iii) Discussion

The Panel accepts Mr Paul's evidence that the application requirements can be drafted to make their intent more transparent.

The Panel's prefers that application requirements for a specific development type (buildings and works, and subdivision) are consolidated into a logical list so they can be easily understood by landowners and practitioners.

(iv) Conclusions

The Panel concludes that the proposed application requirements are generally appropriate, subject to changes to:

- Make clear which application requirements apply to buildings and works and subdivision.
- Consolidate application requirements for specific development types.

(v) Recommendation

The Panel recommends:

Amend the Erosion Management Overlay Schedule 1, Clause 4.0 to consolidate application requirements for specific types of application as shown in the Panel preferred version shown in Appendix D.

4.7 Waiver of application requirements

(i) Background

The exhibited provisions provide:

Where, in the opinion of the responsible authority, the application for a subdivision or development will not adversely increase the landslip risk to life or property affecting the subject lot(s) or adjoining or nearby land, a written geotechnical assessment, landslip hazard assessment or landslip risk assessment (as appropriate) is not required.

The Panel asked Council to provide an example of an application where a waiver of the application requirements would be warranted.

(ii) Evidence and submissions

Mr Paul explained landslip risk can be increased by development that makes a landslip more likely to occur (for example, earthworks) or development that increases the consequences should a landslip occur (for example, new habitable space in a landslip prone area). He stated:

The list of exemptions seeks to nominate development that will not significantly increase the landslip risk. However, experience has shown that whilst the list of exemptions in the schedule captures most proposed development that will not significantly increase landslip risk, some form of development is occasionally proposed which warrants an exemption but is not otherwise listed in the schedule. These are rare development types and could be development types that are not prevalent today, but may be in the future. Examples might include a flagpole, a memorial or historical marker or some elements of utility supplies.

Council concurred with Mr Paul's advice.

(iii) Discussion

Various zones and overlays in the Victoria Planning Provisions contain a general waiver for application requirements. These are commonly expressed as:

If in the opinion of the responsible authority an application requirement is not relevant to the evaluation of an application, the responsible authority may waive or reduce the requirement.

The Panel prefers the generic Victorian Planning Provisions wording for the proposed waiver provision to maintain consistently across the Planning Scheme.

Given the EMO manages a potential risk to life and property, it is unlikely that the application requirements would be waived very often. The Panel notes that of Mr Paul's three development examples that might warrant a waiver of the application requirements:

- a flagpole benefits from the permit exemption under Clause 62.02-2 and a permit requirement is not proposed to be scheduled in EMO1
- buildings and works associated with a minor utility installation benefit from the permit exemption under Clause 62.01-1 and a permit requirement cannot be scheduled in EMO1

• a memorial or historical marker may fall within the definition of a sign or art work, each which benefit from permit exemptions in Clause 62.02-2.

(iv) Conclusion

The Panel concludes that the proposed application requirement wavier is generally appropriate, subject to replacing the exhibited text with the standard waiver used in the Victoria Planning Provisions.

(v) Recommendation

The Panel recommends:

Amend the Erosion Management Overlay Schedule 1, Clause 4.0 to revise the application requirement waiver as shown in the Panel preferred version shown in Appendix D.

4.8 Availability of documents

(i) Background

The application requirements of EMO1 Clause 4.0 require risk assessments to be prepared in accordance with the proposed Incorporated Document. In turn, the Incorporated Document requires:

- a Landslide Risk Assessment (for buildings and works) to be prepared in accordance with the methodology set out in the AGS 2007 Landslide Guidelines
- a Landslide Hazard Assessment (for subdivision) to prepared in accordance with the Australian Geomechanics Society Guidelines for Landslide Susceptibility, Hazard and Risk Zoning for Land Use Planning 2007.

These documents, and associated commentaries, are listed as reference documents in the Incorporated Document as follows:

Guidelines for Landslide Susceptibility, Hazard and Risk Zoning for Land Use Planning, Journal of Australian Geomechanics Society, Vol. 42: No 1, March 2007. Commentary on Guidelines for Landslide Susceptibility, Hazard and Risk Zoning for Land Use Planning, Journal of Australian Geomechanics Society, Vol. 42: No 1, March 2007. Practice Note Guidelines for Landslide Risk Management 2007, Journal of Australian Geomechanics Society, Vol. 42: No 1, March 2007.

Commentary on Practice Note Guidelines for Landslide Risk Management 2007, Journal of Australian Geomechanics Society, Vol. 42: No 1, March 2007.

The Panel asked Council to confirm if the reference documents:

- are publicly available
- should be listed as Incorporated Documents or Background Documents.

(ii) Evidence and submissions

Council submitted:

- the reference documents are publicly available on the Australian Geomechanics Society website at www.australiangeomechnics.org
- the reference documents set out a method for undertaking risk assessments
- this is similar to Australian Standards which are generally not listed as Incorporated or Background Documents in planning schemes

- the documents have not been incorporated into the Colac Otway Planning Scheme which contains similar provisions
- consistency should prevail in this matter.

(iii) Discussion

The Practitioner's Guide states:

Where possible, avoid incorporating documents. This keeps the scheme self-contained and makes it easier to use. It is always preferable to extract the specific planning requirements from a document and state them directly in the scheme.

The decision to incorporate a document should only be considered when there is no suitable alternative in the scheme to achieve the required outcome. For example, a document should not be incorporated to specify requirements where an existing provision of the scheme enables requirements to be specified.

A document should be incorporated if the document is:

- Essential to the administration or enforcement of the planning scheme, that is, without the document the scheme cannot be properly understood.
- ...

In this instance the application requirements of EMO1 require risk assessments to be prepared in accordance with reference documents listed in the Incorporated Document. The application requirements cannot be properly understood without the reference documents. The reference documents are therefore examples of external documents that are essential to the administration of the Planning Scheme. On this basis, they should be incorporated into the Planning Scheme.

(iv) Conclusion

The Panel concludes the documents referred to the Incorporated Document that provide essential information for the administration of the Planning Scheme should be incorporated at Clause 72.02 Schedule (Documents Incorporated in this Planning Scheme).

(v) Recommendation

The Panel recommends:

Amend the Clause 72.02 Schedule (Documents Incorporated in this Planning Scheme) to include:

- a) Guidelines for Landslide Susceptibility, Hazard and Risk Zoning for Land Use Planning, Journal of Australian Geomechanics Society, Volume 42: No 1, March 2007
- b) Practice Note Guidelines for Landslide Risk Management 2007, Journal of Australian Geomechanics Society, Volume 42: No 1, March 2007.

Appendix A Document list

No.	Date	Description	Provided by
1	27 Sep 23	Panel Directions and Timetable (version 1)	Planning Panels Victoria (PPV)
2	20 Oct 23	Council Part A submission with attachments	Council
		1. WSP basis for Amendment Report May 2023	
		2. C217yran Explanatory Report	
		3. C217yran Instruction Sheet	
		4. C217yran Strategic Assessment Guidelines Checklist	
		5. Existing Erosion Management Overlay Schedule	
		6. C217yran Exhibited Clauses	
		7. C217yran Incorporated Document	
		8. Post exhibition changes Erosion Management Overlay	
		9. Post exhibition changes Incorporated Document	
		10.1 Report to Council 9 May 2023	
		10.1.1 Council Minutes 9 May 2023	
		10.2 Report to Council 12 September 2023	
		10.2.1 Council Minutes 12 September 2023	
3	20 Oct 23	Evidence Statement, Darren Paul WSP	Council
4	23 Oct 23	1. Joyce v Yarra Ranges SC [2017] VCAT 1250 (14 August 2017)	Council
		 MAP Building Consultant Services v Yarra Ranges SC [2011] VCAT 2122 (8 November 2011) 	
		3. Harvey v Yarra Ranges CC [2011] VCAT 1600 (19 August 2011)	
		4. Key v Yarra Ranges SC [2009] VCAT 937 (25 May 2009)	
		5. Ewen v Yarra Ranges SC [2023] VCAT 1017 (31 August 2023)	

Appendix B Exhibited changes to Erosion Management Overlay Schedule 1

Development type	Existing exemption	Proposed exemption
Earthworks	Cut and fill less than 0.6 metres in height or depth and no change is made to constructed drainage or fixed irrigation system.	Modified ground surface is not more than 1 metre above or below ground level and does not allow water ponding.
Vegetation removal	 Trunk circumference less than 0.5 metres at 1 metre above the ground; or within 2 metres of a building; or dead and the roots below the ground are retained. 	 Remove, destroy or lop the following vegetation: The trunk circumference measured at a height of 1.3 metres above ground level at less than 0.16 metres and the natural ground surface is reinstated. The vegetation is within 2 m of a building. The vegetation is dead and the natural ground surface is reinstated. The lopping is for pruning to improve a tree's health or structural stability in accordance with normal horticultural practice for the species involved.
	To improve health of vegetation.	As above.
Fencing	 Post and wire; or Palings, supported by post and rails where the fence is at least 0.075metres above the ground. 	 Masonry fence not more than 1 metre and does not alter surface water drainage. Fence of lightweight timber or wire construction that is permeable or the base is at least 0.05 metres above the ground.
Buildings	Extensions or internal alterations:	Extend a building or carry out works if:
	 if the land is unsewered, approval to alter or install a wastewater system has been granted; and increase in ground surface area covered by roofed buildings is less than 20 square metres; and 	 gross ground floor area not increased by more than 20 square metres; and stormwater drained to a legal point of discharge; and there are no existing earthworks higher than 1 metre within 5 metres of
	stormwater drained to a legal point of discharge.	the extension.
	 Non-habitable structures if: lightweight and flexible materials (not brick or concrete blocks); and ground surface area 40 square metres or less; and stormwater drained to a legal point of discharge. 	 Add: there are no existing earthworks higher than 1 metre within 5 metres of the extension.

Development type	Existing exemption	Proposed exemption
	 Deck slope of land within 20 metres of land is 20 percent or less; and 	Deleted.
	• ground surf area covered by the deck 20 square metres or less	
	 Agricultural buildings, if: lightweight and flexible materials (not brick or concrete blocks); and ground surface area 40 square metres or less; and slope of land within 20 metres of land is 20 percent or less; and 	 Agricultural buildings, if: lightweight and flexible materials (not brick or concrete blocks); and no more than two such buildings on the property stormwater drained to a legal point of discharge.
	 stormwater drained to a legal point of discharge. Rainwater tank of not more than 4,500 litres and constructed at ground level. 	No change.
	Temporary building used for storage of construction equipment not exceeding 10 square metres.	Increased to 20 square metres.
	Retaining wall	Add:
	not more than 1 metre	 Provides support to existing unsafe earthworks.
	 not associated with other building construction work 	
	 does not provide landslip protection of adjoining land. 	
	Landscaping	No change
	water feature of not more than 500 litres.	_
	Not included.	Pond of open, impervious water holding structure with capacity of less than 5,000 litres
	Not included.	Spa and associated mechanical and safety equipment not exceeding 5,000 litres constructed at or above ground.
	Not included.	Repair or maintenance works undertaken by or on behalf of a public authorit relating to watercourse management, environmental improvements or infrastructure services.

Appendix C Planning context

C:1 Planning policy framework

Council submitted that the Amendment is supported by various clauses in the Planning Policy Framework, which the Panel has summarised below.

Victorian planning objectives

The Amendment will assist in implementing State policy objectives set out in Section 4 of the PE Act by applying appropriate planning controls to areas which are at risk of landslip to protect life and property.

Clause 2 (Municipal Planning Strategy)

The Amendment is consistent within Clause 02.03-3 (Environmental risks and amenity) by facilitating appropriate development within areas of landslip risk to minimise the potential risk to life and property.

Clause 13 (Environmental risks and amenity)

The Amendment is consistent with the objective of Clause 13.04-2S which is to "protect areas prone to erosion, landslip or other land degradation processes."

C:2 Other relevant planning strategies and policies

i) Upper Yarra Valley and Dandenong Ranges Regional Strategy Plan

The *Upper Yarra Valley and Dandenong Ranges Regional Strategy Plan* applies to all land within the Shire of Yarra Ranges. The Amendment is consistent with Section 3.07 (Policies for development in Township Policy Areas) of this plan, which states areas subject to development constraints (such as landslip) must be protected from inappropriate residential and urban development.

C:3 Planning scheme provisions

i) Erosion Management Overlay

The purposes of the EMO are:

To implement the Municipal Planning Strategy and the Planning Policy Framework.

To protect areas prone to erosion, landslip, other land degradation or coastal processes by minimising land disturbance and inappropriate development.

ii) Other provisions

Relevant particular provisions include:

- 52.10 Reconstruction after an emergency
- 63.10 Damaged or destroyed buildings or works.

C:4 Ministerial Directions, Planning Practice Notes and guides

Ministerial Directions and Planning Practice Notes

The Explanatory Report discusses how the Amendment meets the relevant requirements of Ministerial Direction 11 (Strategic Assessment of Amendments) and *Planning Practice Note 46: Strategic Assessment Guidelines,* August 2018 (PPN46). That discussion is not repeated here.

Planning authorities must comply with the Form and Content Direction, issued under Section 7(5) of the *Planning and Environment Act 1987*. The direction applies to planning scheme layout and mandatory information in a planning scheme. It applies also to amendments to planning schemes and should be read together with the Victoria Planning Provisions.

Practitioner's Guide

The Practitioner's Guide sets out key guidance to assist practitioners when preparing planning scheme provisions. The guidance seeks to ensure:

- the intended outcome is within scope of the objectives and power of the *Planning and Environment Act 1987* and has a sound basis in strategic planning policy
- a provision is necessary and proportional to the intended outcome and applies the Victorian Planning Provisions in a proper manner
- a provision is clear, unambiguous and effective in achieving the intended outcome.

Appendix DPanel preferred version of the ErosionManagement Overlay Schedule 1

SCHEDULE 1 TO CLAUSE 44.01 EROSION MANAGEMENT OVERLAY

Shown on the planning scheme map as **EMO1**.

1.0 Erosion management objectives to be achieved

To ensure that development can be undertaken at a tolerable risk to human life and property from landslip.

2.0 Statement of risk

Areas subject to landslip across the Yarra Ranges include the hillsides along the Yarra River valley, the mountains of the Dandenong Ranges and agricultural areas of Silvan, Monbulk and Seville.

The occurrence of landslips within the Yarra Ranges has historically caused damage to property and the environment and presents an ongoing risk to human life. Geotechnical studies have documented historical landslip occurrences and seek to identify areas susceptible to future landslide occurrence.

The control of environmental factors and development relating to vegetation cover, drainage, rock, earthworks, soil disturbance and effluent and stormwater disposal are all important in managing the risk of landslip.

3.0 Permit requirement

A permit is required to construct or carrying out works for:

- A rainwater tank unless its capacity is 5,000 litres or less and it is constructed at or above ground level.
- A domestic swimming pool or spa associated mechanical and safety equipment unless its capacity is 5,000 litres or less and it is constructed at or above ground level.
- A fence, unless it is one of the following:
 - A masonry fence of 1 metre or less with openings to maintain natural surface water flow.
 - A timber, wire, aluminium fence with openings to maintain natural surface water flow or the base of the fence is at least 50 millimetres above ground level.
- A temporary shed or temporary structure for construction purposes unless the floor area is 20 square metres or less.

A permit is not required to construct or carry out works for:

- A pond or open, impervious water holding structure with a capacity of 5,000 litres or less.
- A landscaping water features with a capacity of 500 litres or less.
 - An alteration or extension to an existing building provided all of the following are met:
 - the floor area of the alteration or extension is not more than 20 square metres
 - the alteration is connected to a legal point of discharge
 - there are no existing earthworks higher than 1 metre within 5 metres of the alternation or addition
- An outbuilding ancillary to a dwelling provided all of the following are met:
 - the building is not used for accommodation
 - the building is constructed with aluminium, steel or timber

- the total area of outbuildings on the lot is 40 square metres or less
- the building is connected to a legal point of discharge
- there are no existing earthworks higher than 1 metre within 5 metres of the building.
- A building used for agriculture, provided all of the following are met
 - the building is constructed with aluminium, steel or timber
 - there are no more than two agricultural buildings on the lot
 - the building is connected to a legal point of discharge
 - there are no existing earthworks higher than 1 metre within 5 metres of the building.
- A retaining wall that is not more than 1 metre above ground level and does not provide landslip protection for any adjoining land.
- Earthworks less than 1 metre above or below the ground level that do not allow water ponding.

A permit is not required to remove, destroy or lop the any of the following vegetation:

- A tree with a trunk circumference of 0.5 metres or less measured above ground level
- Vegetation within 2 metres of a building.
- Dead vegetation where the ground surface is reinstated.
- Lopping necessary to improve the health or structural stability of a tree.

4.0 Application requirements

The following application requirements apply to an application for a permit under Clause 44.01, in addition to those specified elsewhere in Clause 44.01 and elsewhere in the scheme, and must accompany an application, as appropriate, to the satisfaction of the responsible authority:

- For an application to construct a building or construct or carry out works:
 - · Plans drawn to scale and dimensioned, showing as appropriate:
 - The proposed new development, including as appropriate a site plan, land contours, building elevations, access, cut and fill, retaining walls and effluent disposal system.
 - Any existing development, including buildings, water tanks and pools or dams on both the subject lot(s) and adjacent land.
 - Any existing earthworks and water infrastructure on the subject lot(s), including cut and fill, stormwater drainage, subsurface drainage, water supply pipelines, sewerage pipelines or effluent disposal installations and pipelines and any otherwise identified geotechnical hazard.
 - Details and location of existing vegetation, including any vegetation to be removed.
 - Geotechnical Assessment or Landslide Risk Assessment in accordance with the Incorporated Document 'Requirements for a Geotechnical Assessment, Landslide Risk Assessment or Landslide Hazard Assessment prepared in support of a planning permit application under the Erosion Management Overlay (EMO), March 2023'.
 - For an application to subdivide land:
 - Plans drawn to scale and dimensioned, showing as appropriate:
 - The proposed subdivision layout and land contours.
 - Any existing development, including buildings, water tanks and pools or dams on both the subject lot(s) and adjacent land.
 - Any existing earthworks or water infrastructure on the subject lot(s), including cut and fill, stormwater drainage, subsurface drainage, water supply pipelines, sewerage pipelines or effluent disposal installations and pipelines and any otherwise identified geotechnical hazard.

- Details and location of existing vegetation, including any vegetation to be removed.
- Landside Hazard Assessment in accordance with the Incorporated Document 'Requirements for a Geotechnical Assessment, Landslide Risk Assessment or Landslide Hazard Assessment prepared in support of a planning permit application under the Erosion Management Overlay (EMO), March 2023'.

If in the opinion of the responsible authority an application requirement is not relevant to the evaluation of an application, the responsible authority may waive or reduce the requirement.

5.0 Decision guidelines

The following decision guidelines apply to an application for a permit under Clause 44.01, in addition to those specified elsewhere in Clause 44.01 and elsewhere in the scheme must be considered, as appropriate, by the responsible authority:

- The recommendations of the Geotechnical Assessment, Geotechnical Hazard assessment or any Landslide Risk Assessment.
- The need for any ongoing monitoring and maintenance for mitigation measures.

Appendix E Panel preferred version of Clause 13.04-2L

13.04-2L Erosion and landslip

.

Policy guidelines

Consider as relevant:

- Avoid development that cannot achieve a maximum tolerable risk, where tolerable risk is assessed as:
 - For loss of life for the person(s) most at risk, a probability of no greater than 1 in 100,000 per annum calculated in accordance with the *Australian Geomechanics Society Practice Note Guidelines for Landslide Risk Management 2007.*
 - For property loss, assessed qualitatively using the *Australian Geomechanics Society Practice Note Guidelines for Landslide Risk Management 2007*, Appendix C, where the tolerable risk level complies with Table 1.

Table 1 Maximum tolerable risk to policy

New development type	Maximum qualitative tolerable risk
Panel note – amend development types for consistency with Land Use Terms at Clause 73.03	Low
Essential facilities, including hospitals, medical and surgery facilities, emergency services facilities, designated emergency shelters and facilities, buildings and facilities containing toxic or explosive materials in sufficient quantity capable of causing hazardous conditions that extend beyond property boundaries.	
All other development	Moderate