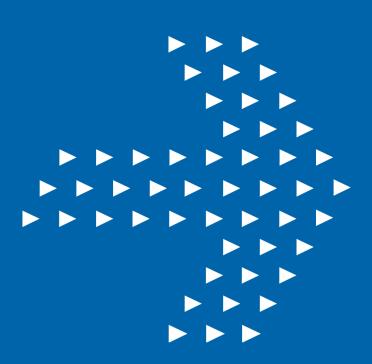


Acknowledgement of Traditional Owners Yarra Ranges Council acknowledges the Wurundjeri and other Kulin Nations as the Traditional Owners and Custodians of these lands and waterways.

We pay our respects to all Elders, past, present, and emerging, who have been, and always will be, integral to the story of our region.

We proudly share custodianship to care for Country together



This report has been prepared by Yarra Ranges Council.

This document is available on the Yarra Ranges Council website. To request a copy, email or phone our Customer Service Centre using the details below:

Email: mail@yarraranges.vic gov.au

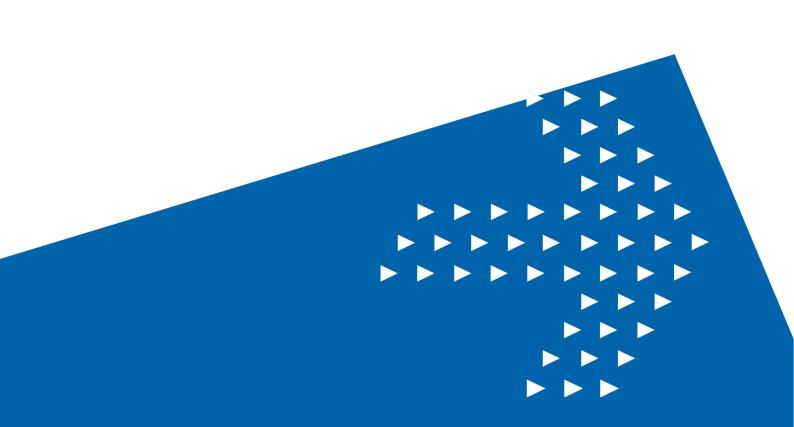
Phone: 1300 368 333

Project Background

Yarra Ranges Council has developed a draft Stormwater Policy and Stormwater Management Plan 2024-2034. These documents aim to manage flood risk and protect the natural water cycle and waterways' health from urban development impacts. They provide a framework and action plan for future growth and sustainable stormwater management within the municipality.

During the research and development phase, initial community and stakeholder engagement took place. This included targeted feedback from other councils, Melbourne Water, the Department of Energy, Environment and Climate Action (DEECA), development engineering consultants, and council departments.

The draft documents were released for community engagement from 12 June to 24 July 2024. During this six-week period, the community was encouraged to review and provide feedback on the proposed plans.



How We Engaged



Comprehensive information on the draft documents were made available on a The Shaping Yarra Ranges webpage. The webpage provided community members to:

- provide a written submission on the draft documents
- share their stories on flooding and drainage issues
- · register for "Meet the Stormwater Engineer Sessions"
- register for drop-in information session



Direct notification via email to announce the project and direct people to the project webpage were sent to:

- Community groups with an interest in stormwater management within the municipality
- Governement Agencies
- State/ Federal MPs
- Property Developers and consultants



A media release outlining the purpose of the project and encouraging participation.



Local newspaper advertisements appeared in all Mail Newspapers in Yarra Ranges to announce the project, with links to the project webpage.



Social media was used to promote the project and direct people to the project webpage



Drop-in information Session

Held on 3 July 2024, featuring representatives from the Council's Stormwater Engineering,
 Strategic and Statutory Planning, Risk, and Customer Liaison teams, as well as Project
 Consultant (RAIN), VICSES, Melbourne Water, and Windemere. This session aimed to
 provide a platform for community members to share their flooding experiences, understand
 the roles and responsibilities of various agencies, and enhance their understanding of
 stormwater management within Yarra Ranges.



"Meet the Stormwater Engineer" Sessions: Five sessions were conducted at each of the link offices:

Upwey: 19 June 2024
Monbulk: 25 June 2024
Lilydale: 27 June 2024
Healesville: 10 July 2024
Yarra Junction: 17 July 2024



The project team presented the draft plans to the Indigenous Advisory Committee (IAC) and the Sustainable Environment Advisory Committee (SEAC)



Hard copies of the Stormwater Management Plan Overview document were available at all Council community links and mailed upon request.

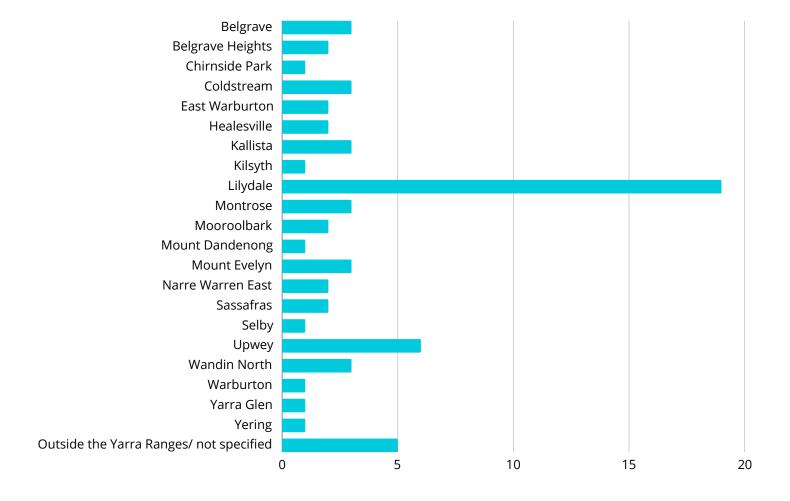
How We Heard from You

- The Engagement page attracted 718 visitors, with 28 people following the page
- A total of 30 people attended the drop-in information session
- A total of 17 people attended the "Meet the Stormwater Engineer" Sessions
- During the six-week engagement period, 38 comments were received.

Participant Demographics

Engagement Participants who made online submissions/ registered for the engagement sessions via the Shaping Yarra Ranges webpage were asked to volunteer information on where they live, which revealed the information shown below.

WHERE DO YOU LIVE?



Engagement Feedback

Home Insurance Premiums and Property Devaluation Concerns

There were 7 comments received regarding Home Insurance and Property Devaluation Concerns.

Feedback indicated that home insurance premiums have increased due to existing flooding, rendering some properties uninsurable. Additionally, there are concerns within the community around the impact of Flood Mapping on home insurance and property values.

Key pull out quotes:

"We have been flooded continuously when we have large downpours. Our insurance company would not cover any damage caused by the water issues, stating that it was poor maintenance on our behalf."

"We pulled 50L of water out of the carpet in one of the bedrooms with a water-sucking vacuum cleaner. The water ingress was due to seepage, so the damage is not covered on our insurance."

"My insurance premium has increased to \$8000 due to ongoing flooding issues"

"Why should the community accept your flood mappings that devalue property's that should not flood if the infrastructure was built or upgraded to match the additional capacity being added"

Officer Response:

The Australian insurance industry has been scrutinised over community expectations on responding to extreme weather events. It has been identified that Insurers should improve catastrophe planning to meet community expectations of operating in the Australian environment. Specifically, uplift is required on preparedness for, and stress testing against, extreme catastrophes.

The Yarra Ranges Flood Mapping Program will identify flood-prone areas across the municipality, serving as a crucial tool to inform Council's flood mitigation works planning.

Local Government is not in a position to comment directly on the impact of flood data on premiums. Anecdotally premiums may vary between insurers because each insurer has its own underwriting processes and business models. The Insurance Council of Australia, which monitors the market response to new data closely, has developed a <u>fact sheet</u> on premium changes and flood information.

The insurance industry has developed and licensed the National Flood Information Database (NFID) to determine the flood risk for individual properties. Using available information, insurers can gauge current annual average damages for specific catchments. This database includes claims histories for properties and flood mitigation works.

Following the development of the Draft Flood Map, Council will engage with the community to understand the impacts on properties and make updates to the draft flood maps accordingly (Refer to Implementation Plan Action - SWMP21).

Drainage Maintenance

There were 6 comments received regarding Drainage Maintenance.

Feedback suggested issues with drainage maintenance, particularly the need for timely responses to blocked stormwater drains. The importance of maintaining drainage hotspots to prevent future flooding was also emphasised.

Key pull out quotes:

"I would like to know about Maintenance of existing infrastructure and how often is it being conducted?"

"I regularly put in maintenance requests to Yarra Ranges Council. I have stormwater pits/pipes on my property that are often blocked."

Officer Response:

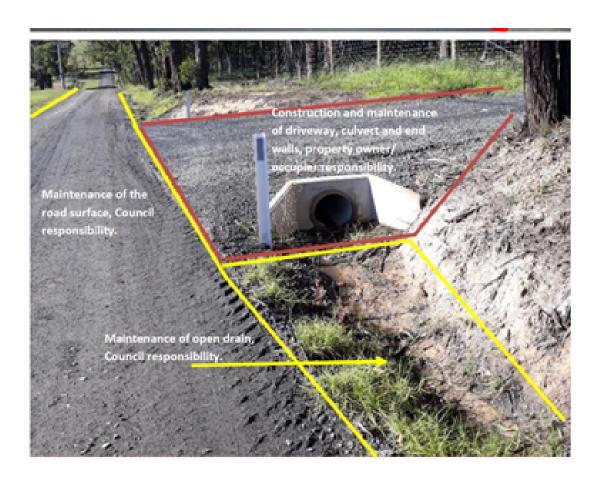
In line with the Council's Road Management Plan, the Council undertakes maintenance of all Council Drainage assets upon request. If there is a blocked stormwater drain, a maintenance request can be lodged through the Yarra Ranges Council's Customer Service Team at 1300 368 333.

Additionally, the Council conducts proactive inspections of known drainage hotspots. These hotspots have been identified based on past records of flooding issues and are considered to have an increased risk of failure.

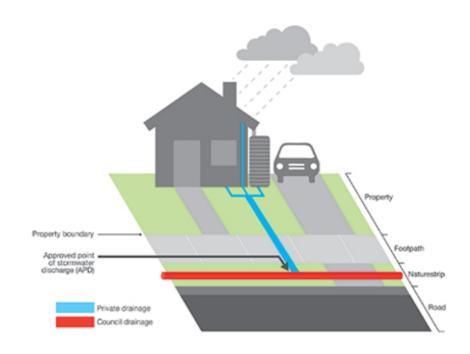
It is important to note that maintenance of drainage within private property and the clearing of crossover (driveway) culverts are the responsibility of the property owner (refer to Figures below).

The Yarra Ranges Flood Mapping Program includes conducting blockage analysis via computer modelling to identify critical infrastructure and support a proactive maintenance program. This information is then to be verified in the field by officers and ensures the drainage system operates at optimal capacity and addresses any issues promptly. Within the SWMP Implementation Plan, SWMP23 has been updated to include proactive maintenance. The updated description is as follows:

SWMP23 - Incorporate key findings from the catchment flood mapping projects into the Municipal Flood Management Plan and include critical infrastructure identified through the blockage analysis in the Proactive Maintenance Program.



Council's responsibilities within the road reserve



Private Draiange vs Council Drainage

Drainage issues associated with Unsealed Roads

There were 3 comments received regarding Drainage issues associated with Unsealed Roads.

Feedback raised concerns about gravel runoff and blockages on the municipality's unsealed roads, which affect local drainage systems. They stressed the need for improved management and maintenance of these roads.

Key pull out quotes:

"More needs to be done in the outer area. Those areas without proper drains but "ditches". These become clogged & then flooding occurs to private property. Regular maintenance & clearing would help"

"Gravel run off from unsealed roads upstream ends up in our homes and in the waterways"

Officer Response:

Within the Yarra Ranges, there are approximately 715 km of unsealed roads. These roads and its associated drainage systems are maintained in accordance with the Council's Road Management Plan.

The Road for Community Initiative was a critical infrastructure funding opportunity aimed at sealing roads across the municipality and simultaneously addressing localised drainage issues. Unfortunately, the Federal Government's decision to withdraw its support has significantly impacted Council's ability to deliver the projects.

In response to this funding cut, the Council is reviewing its approach to Unsealed Road Management. This review encompasses an approach to future road construction, taking into account factors such as abuttal density, maintenance issues, the Council's Special Charge Scheme policy, and the availability of capital budgets for upgrading Council assets across the municipality. A report on Unsealed Road Management will be presented to the Council in early September 2024.

The Stormwater Management Plan (SWMP) Implementation Plan includes an action to consider drainage infrastructure for new unsealed road upgrade programs (SWMP8).

Drainage issues due to Increased development

There were 4 comments received regarding Drainage issues due to Increased Development.

Feedback outlined the impact of increased in-fill development on drainage systems and the adequacy of current guidelines to manage future growth. The community wants assurance that new developments will not exacerbate flooding issues.

Key pull out quotes:

"Is the existing aging drainage infrastructure being assessed to ensure it is functional and compatible with new developments?"

"My property is being impacted due to increased development upstream, pipe through the easement cannot handle the increased flows"

Officer Response:

Recognising the need to plan appropriately for future growth and the impact of increased in-fill development across the municipality, the SWMP Implementation Plan includes an action to update the Development Engineering Guidelines (SWMP2).

The development of flood maps within the municipality (SWMP4) will ensure that new developments appropriately consider flood events and impacts. This will help ensure that any necessary drainage upgrades are implemented as part of the development.

Additionally, fact sheets will be developed as part of the implementation of the SWMP to detail how the Council manages new developments in respect to flooding (SWMP18).

<u>Issues with Development Approval Process</u>

There were 3 comments received regarding issues with Development Approval Process.

The feedback pointed out problems with the current development approval process, emphasising the need for clearer guidelines to ensure the developers know the Council requirements upfront. They also called for better management of Water Sensitive Urban Design (WSUD) options in new developments.

Key pull out quotes:

"Council are asking developers to install new infrastructure, and replace aging infrastructure, deal with blocked drains which cause flooding, all at the developer's expense."

"The market currently offers limited treatment options to achieve what council is currently requesting, noting other councils are open to discussions without providing a blanket rule that requires all developments to meet regardless of site conditions."

"Water tanks are the backbone of WSUD in infill developments, accepted by council and developers, but they provide only a limited amount of treatment on site."

"The achievement of 100% best practice on-site for infill development sites is neither practical nor contemplated by the planning scheme."

"The best method to achieve 100% best practice is to contribute to off-site stormwater management in lieu of providing an on-site stormwater management system"

Officer Response:

The SWMP Implementation Plan outlines several critical actions:

Updating Development Engineering Guidelines (SWMP2): This involves revising existing guidelines to ensure they are aligned with current best practices and standards.

Reviewing and Improving the Development Approval Process (SWMP3): This action aims to enhance the efficiency and effectiveness of development approvals.

Developing Water Sensitive Urban Design (WSUD) Guidelines (SWMP10): These guidelines will provide practical options for implementing on-lot WSUD assets, promoting sustainable and environmentally friendly design.

Investigating a Council Stormwater Offsets Program (SWMP9): The current Stormwater Offset Program requires developers to make financial contributions to Melbourne Water, which allocates funds to councils based on project priorities. However, a Council Offset Program would allow the municipality to receive financial contributions directly for local projects. This program would enable the Council to prioritize and fund stormwater management projects that align with local needs and strategic goals.

Funds collected through the offsets program could be used for large-scale stormwater management infrastructure, such as wetland construction, waterway restoration projects, and enhanced flood control measures. This approach ensures that the impact of new developments on the stormwater system is managed, even when site-specific constraints prevent the full implementation of WSUD measures.

The stormwater offsets program encourages sustainable urban development by providing a flexible and effective means for developers to fulfill their stormwater management obligations.

Flood impacts from neighbouring properties

There were 3 submissions received regarding Flood Impacts from Neighbouring Properties.

Feedback outlined stormwater nuisances from neighbouring properties. They highlighted the need for clear information on how these issues can be addressed.

Key pull out quotes:

"The water is clearly coming from my neighbour's property. I have spent thousands replacing gravel and repairing my driveway only to see it washed out on to the road. Surely the council can help"

"Our problem is that the pits and drains are not maintained as they are in private properties and the residents often don't keep them clear or if new residents don't even know they exist"

"I believe residents should be prompted by the council to maintain them."

Officer Response:

Stormwater nuisances from adjoining land are regulated under the Water Act 1989. The Council is not designated under this legislation to enforce nuisance flooding compliance between two private properties and cannot request an adjoining owner to comply with this Act. This has been stated in both the Stormwater Policy and the Stormwater Management Plan.

The SWMP Implementation Plan includes an action to develop fact sheets to outline this information (SWMP19).

Flood Impacts and Lack of Coordination Among Drainage Authorities

There were 6 submissions received regarding Flood Impacts and Lack of Coordination Among Drainage Authorities.

The feedback highlighted issues with coordination among different drainage authorities, leading to ineffective management of drainage assets. They stressed the need for joint efforts to manage local, regional, and major road drainage systems.

Key pull out quotes:

"One glaring oversight in all this though is that council's plan need to include a powerful and ongoing advocacy with Vicroads. The lack of flooding and stormwater management of the major roads through the shire by Vicroads is appalling and adds incredibly to the council's task with the minor roads."

"It is also good to see that alternative sources of funding are being explored, besides raising rates."

"There have been several instances of water flooding across the intersection. A large channel drain alongside our office cannot handle the volume of water and overflows at the front and rear of the building. Small amounts of water have previously entered the building. In the first week of January this year, with the intense rain, our office was flooded with water coming in the front door and going out the back door and flooded again in the same week but to a lesser extent. Floor coverings, files, some furniture were damaged. We were fortunate to be referred to a specialist salvage company. They came on short notice, removed the carpets and installed heaters and dehumidifiers which were left going continuously for two weeks. Business was disrupted, but carpets etc. have now been replaced. It will happen again if the drainage is not rectified."

Officer Response:

The drainage network within the Yarra Ranges is managed by various drainage authorities. The Council manages the local drainage network, Melbourne Water manages waterways and regional drains, and the Department of Transport and Planning manages the drainage assets along the major road network.

Strengthening collaborations with key agencies will be crucial for implementing joint stormwater projects.

The plan also explores various funding mechanisms, including grants, developer contributions, and stormwater offsets, to support its initiatives. Securing diverse funding sources ensures the sustainability of the program and enables the municipality to carry out the necessary actions to achieve its stormwater management goals.

Landslip Risk

There were 2 responses received regarding Landslip Risks.

Concerns were raised about the risk of landslips due to concentrated stormwater flows in EMO areas. The community emphasised the need for better flood mapping and prioritisation of drainage upgrades to reduce this risk.

Key pull out quotes:

"I live in the foothills of Mt Dandenong, in areas close to landslide overlays. We have experienced trouble with stormwater (overland flows, blocked drains, erosion issues etc), which have led to small landslides, damage to infrastructure and on-going maintenance issues for the Council.I value that the Stormwater Management Plan details (at a high level) the Council's proposed approach to identifying and prioritising upgrades to stormwater infrastructure, but I'm concerned that the current catchment/flood mapping analyses are not necessarily capturing the true extent of stormwater/flooding issues in the Council."

Officer Response:

Concentrated stormwater flows and run-off within EMO areas can increase the likelihood of, and trigger landslips. The development of flood maps will assist in understanding where these concentrated flows occur, helping to identify and prioritise necessary drainage upgrades.

To further clarify this item, SWMP7 has been updated as follows:

SWMP7 – Develop and prioritise a program of drainage upgrade works focused on reducing risk to properties. Critical areas will be determined via a combination of flood modelling (SWMP4) and hazard categorisation assessment (flood depth, flood velocity, and overlays such as EMOs).

Advisory Committee Feedback

A summary of the feedback received from the Sustainable Environment Advisory Committee (SEAC) include:

- The Stormwater Management Plan document to too technical in the language it uses to convey its purpose
- There is an overly urban focus on the plan's actions, whereas we are concerned our rural landscapes are being overlooked
- Insurance impacts to the community

A summary of the feedback received from the Indigenous Advisory Committee (IAC) include:

- The impact of colonisation on natural water flow paths, causing flooding and degradation needs to be highlighted
- There is a need to identify natural flow paths to prevent future flooding.
- We need to work with the natural elements of Country to ensure sustainable outcomes and the ongoing health of Country, especially with the growing impact of climate change.
- Highly effective land management such as traditional cultural fire practices and innovation need to be incorporated.

Officer Response:

In response to feedback from the SEAC regarding the Stormwater Management Plan being too technical, we have revised the language to make it more accessible to the community. Additionally, an overview document has been created to highlight key information from the SWMP.

One of the primary objectives of the SWMP is to maintain healthy and valued rural landscapes. The plan aims to protect the environmental values and physical characteristics of these landscapes from degradation by stormwater.

Incorporating feedback from the IAC, we have added a new section titled "Indigenous Water Knowledge" to the Stormwater Management Plan document.

Conclusion

Feedback received during the six-week community engagement period has significantly enhanced our understanding of the stormwater issues impacting residents. We have updated the documents to incorporate these valuable insights.

The revised documents will be presented to the Council for adoption at the meeting on 27 August 2024.



DRAFT Stormwater Management Plan 2024-2034 - Engagement Feedback Report - JULY 2024 / 16