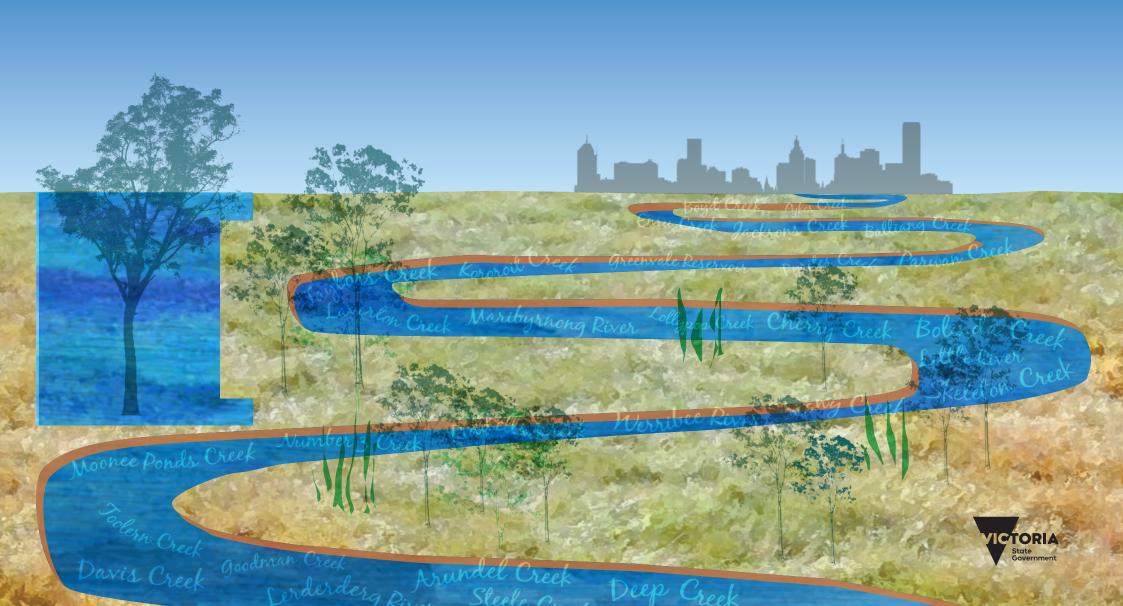
# **Protecting the Waterways of the West**

MINISTERIAL ADVISORY COMMITTEE FINAL REPORT



## **Wurundjeri Woi wurrung foreword**

Rich in resources, our Country sustained Woi wurrung clans for millennia. Much of our Country is defined by water, including the Werribee River to the west, Port Philip Bay and Mordialloc Creek to the south-east.

Our northern and north-eastern traditional boundaries are defined by mountains and mountain ranges; including Mount Baw Baw and the Great Dividing Range.<sup>1</sup>

Through time and continuous connection, our Ancestors developed and honed deep knowledges of these unique volcanic landscapes, local flora and fauna, seasons, and ancient waterways from their source to the sea.

Our western waterways are some of the oldest waterways on our Country, carved into existence several thousands of years prior the creation of the Birrarung (Yarra River). They are truly ancient places and identities. Our ancient cultural heritage, including our people's ancestral remains, are found here.

For a fleeting moment post European Settlement, our Woi wurrung clans and other members of the Kulin continued to gather as they had for countless of generations previously. They gathered for Tanderrum (Ceremony). These places are known to have included between the Moonee Ponds Creek and Maribyrnong River, as

well as on the higher grounds around the western side of the confluence of the Maribyrnong and the Birrarung. They were not only places of celebration, where our Ancestors feasted, laughed and played together, they were also places of trade and learning, where ideas were shared and decisions made, both large and small. Our western clans also worked hard to balance community and Country by employing sustainable agricultural practices. Terraced myrnong gardens were cultivated, with bright yellow blooms stretching for kilometres. These golden terraces were observed and remarked upon in the journals of early European settlers.

Oral history tells us of rock art, found along parts of the Maribyrnong River. Sadly, due to the disruptions of Country associated with the development of Melbourne, and the realignment of the Maribyrnong River, our rock art and the stories they shared have been lost, not only to us, but to all communities who now call the West home.

Today we honour the lost Western Woi wurrung clans by taking responsibility for this area of Country. This includes our commitment to wholly connect the surviving clan of the Woi wurrung – our Clan, with this Country and protecting and restoring its cultural values, both tangible and intangible. We are here for our Ancestors to make decisions about the health of Country.



<sup>1</sup> Acknowledging the Wurundjeri Woi wurrung people's consideration of Country, no Traditional Owner Group/s have yet been formally recognised by the State of Victoria for parts of this area (refer Appendix 1, for a map of Registered Aboriginal Parties Boundaries).



## **Wadawurrung foreword**

Granite plains provide an abundant food source, flour, everything you need. All created by Lowen our creator; he flew down from the north. Everywhere a feather landed, it turned into granite. Lowen lies to rest: we know his place; we visit him and thank him for his creation. You may see a mountain; allow me to see my uncle.

All our rivers are living sources from Bundjil — the *Karringalabul Murrup*, the Creator spirit. He created all you see.

Our waters were made for our survival, the survival of all things living.

My Country includes these waters from the west of the Little River (*Worrin-yaloke*) to the Werribee River (*Wirribi Yaluk*), up to Fiery Creek. My whole Country boundaries are defined by water, including Port Phillip Bay.

Important decisions were made on the banks of these very rivers by my Ancestors. They were important meeting places. Just as they are today.

The Wirribi Yuluk is where the Kulin nation came together in Baieer, a time of year. Exchange of commodities and knowledge concerning Country happened, based on the size of the moon.

You may have heard of connection to Country: I believe this very component is missing in our world. For Aboriginal people, this is a deep, emotional connection, which is very hard to explain. As a Wadawurrung women, I have up to four animal species to learn from, nurture, care for and protect in my lifetime. Imagine what the world could be if we all had that; if we were all concerned for a species that is connected to a part of the ecosystem where you live.

The west had it all: water, flour, meeting places. We need to understand the importance of the ancient significance of the area.

Imagine: close your eyes; the sound of running water; the laughter of the children playing; the crackle of the fire; the passing of an emu; the noises from a happy, living system.

This is not lost. It is in a different form now but just as beautiful and important.

If we all could stop and hear the very things, that were here before us. They have the answers: we just need to listen.

### **Melinda Kennedy**

Wadawurrung woman

## **Acknowledgement**

The Waterways of the West Ministerial Advisory Committee (MAC) acknowledges the Wurundjeri Woi wurrung and Wadawurrung peoples as the traditional custodians of the Waterways of the West region.

We pay our respects to their Ancestors and Elders, past and present. We recognise and respect their unique cultural heritage, beliefs and relationship to their traditional lands, which continue to be important to them today.

We recognise the intrinsic connection of the Wurundjeri Woi wurrung and Wadawurrung peoples to their traditional lands and value the contribution their Caring for Country makes to the management of the waterways and their lands.

We support the need for genuine and lasting partnerships with the Wurundjeri Woi wurrung and Wadawurrung peoples, to understand their culture and connections to Country in the way we plan for and manage the Waterways of the West. By integrating traditional knowledge with knowledge, we can deliver better environmental outcomes and make communities more liveable,

contemporary western ecological and community sustainable and inclusive.



#### About the artist

**Stephanie Skinner** is a Wadawurrung digital artist and illustrator. These artworks reflect the culture, the serene landscapes, and the value of our native wildlife and plants throughout the Waterways of the West region.





### **Contents**

A message from the Ministerial Advisory Committee 2

Executive Summary – Recommendations 4

#### 12

About this work 13

Where are the Waterways of the West? 13

Ministerial Advisory Committee members 14

A community focused approach 16

### The case for change 17

The Waterways of the West sustain communities and the environment 17

A growing population and changing climate are transforming the west 18

A business as usual approach will not be enough 19 Traditional Owners' connection to the Waterways of the West and their lands 22

### Community Vision 25

Vision for the region 25
Vision across our cities, suburbs and towns 26
Vision for agriculture and rural lands 26
Vision for natural places and forested areas 27

### **Directions 28**

Community and stakeholder views 30

**Recommendations** 33

### Glossary 53

### Appendices 56

Appendix 1 – Map of Registered Aboriginal Party Boundaries 56

Appendix 2 – Agencies invited to the Waterways of the West Reference Group 57

Appendix 3 – Roles and responsibilities of key agencies and organisations 58

Appendix 4 – Improving Stormwater Management Advisory Committee recommendations 60

Appendix 5 – 2070 Predicted sea level rise and storm tide for western Port Philip Bay 62



# A message from the Ministerial Advisory Committee

Healthy and thriving waterways and their lands are at the heart of Melbourne's identity as a vibrant and liveable city. The Waterways of the West region encompasses landscapes of diverse natural beauty supporting abundant plants and animals, major urban growth areas and some of Victoria's most productive food growing regions. The open space and amenity of these waterways, their lands and the coastal area underpin the region's vibrancy and the liveability of local neighbourhoods. They offer a place for people to connect with nature and each other.

The waterways and their surrounding lands hold history and sacred memories. The Maribyrnong (Mirrangbamurn) and Werribee (Wirribi yaluk) rivers feature strongly in the creation stories of the Wurundjeri Woi wurrung and Wadawurrung Traditional Owners. They reflect a deep cultural and spiritual connection that has existed for tens of thousands of years.

## The rivers, creeks and waters across the west are life-giving in every way.

For many Melbournians, their image of the west may be one of heavy industry, dense working-class suburbs and concrete-lined waterways like the Moonee Ponds Creek at the Tullamarine Freeway entrance at Flemington. But if this image was ever accurate in the past, it certainly is no longer. The west has always been a place of change and in the 21st century it is undergoing a substantial transformation.

The population of the region is growing rapidly and is predicted to double to over 1.9 million by 2040. This urban growth presents significant challenges, including increased stormwater, litter and pollution. As the population grows there will be more people living, working and playing in the region, placing increased demand on waterways and their lands to provide for the community. In addition, the warming and drying climate is already impacting the waterways and their lands. The effects are putting increased pressure on ecosystems and reducing the water available for consumptive uses, as well as for environmental and cultural needs.



We acknowledge the Victorian Government's existing strong policy base that provides guidance for the protection of waterways. In particular, Water for Victoria, Plan Melbourne, the Healthy Waterways Strategy and the Yarra River Action Plan Wilip-gin Birrarung murron (among others) emphasise the importance of liveable cities, of protecting waterways and of enhancing their associated parklands as well as the importance of embedding Traditional Owners and their values, knowledge and culture in decision making.

As part of our work, we oversaw the preparation of a Community Vision by a Community Assembly representing the diverse and vibrant community of the region. Their vision is for waterways that are a unique, interconnected living system; they implore the community to walk with the Wurundjeri Woi wurrung and Wadawurrung Traditional Owners in Caring for Country. The community's aspirations for the Waterways of the West were instrumental in guiding our recommendations.

We need to act urgently to protect the Waterways of the West and realise the Traditional Owner aspirations and community vision for this region. We present these 14 recommendations as essential actions to deliver the Victorian Government's policy objectives and realise the Waterways of the West Community Vision and Traditional Owner aspirations. They will facilitate the meaningful participation of the Traditional Owners and community in decision making about these waterways.

It has been a privilege to be entrusted with this task, working collaboratively with the community, agencies and each other. We have especially valued working together as Traditional Owner and non-Traditional Owner MAC members, respecting one another's expertise and unique perspectives.

The Waterways of the West provided a forum to reinstate Traditional Owner voices and values for water and Country — and for this expertise and connection to place to be brought into planning for the future of our waterways.

Our Wurundjeri Woi wurrung and Wadawurrung members have expressed the value of working together as part of the Kulin Nations, a process that supports the recapturing of the voices of the Ancestors.

We commend the Victorian Government for establishing the MAC to undertake this important initiative. Melbourne's west is one of the fastest growing regions in Australia. We believe there is a once in a lifetime opportunity to create a positive legacy for the waterways and their communities, for now and into the future.

We present this report to the Victorian Government with optimism.

## Waterways of the West Ministerial Advisory Committee

Chris Chesterfield, Chair Melinda Kennedy Aunty Di Kerr Aunty Alice Kolasa Shelley Penn Uncle Dave Wandin Lydia Wilson

# Visionary planning is critical to protect the Waterways of the West.

Our committee sought advice from subject matter experts, community and agency representatives. We considered the key issues and examined the existing institutional, legislative and regulatory arrangements for the Waterways of the West.

We present these 14 recommendations as essential actions to realise the Traditional Owners' aspirations, the Community Vision, and deliver the Victorian Government's policy objectives to protect these natural assets for future generations.

amendments and institutional reforms are essential to strengthen governance arrangements and to protect the Waterways of the West from both current and future pressures. This includes new planning controls and changes to the planning system framework to achieve stronger, more consistent controls for land use and development.

Our view is that legislative





### **Recommendation 1**

Embed Wurundjeri Woi wurrung and Wadawurrung Traditional Owners in planning for waterways and their lands through:

- establishing Wurundjeri Woi wurrung and Wadawurrung, the Traditional Owners, as the voice for the 'living entity' of the waterways and lands on their Country
- embedding cultural connections to Country, such as Country Plans, and collaboration with the Traditional Owners through appropriate legislation and policy
- formalising requirements to invite the Traditional Owners to partner in decision making, planning and management of waterways and their lands at both State and Local Government levels.

Provide recurrent and sustainable funding for the Traditional Owners as part of a whole of government approach to embedding the Traditional Owners' voices at government planning and decision–making tables.

Fund projects and management actions for the Waterways of the West including:

- Cultural practices
- Cultural flows assessments
- Cultural values mapping/studies
- Cultural awareness and education programs
- Cultural management on Country.

### **Recommendation 2**

Prepare enabling legislation for the protection of the Waterways of the West, with its own preamble and title in Wurundjeri Woi wurrung and Wadawurrung language, that enshrines in legislation:

- acknowledgement of the waterways, and the landscapes through which they flow, as 'living entities'
- the Traditional Owners as the voice for waterways and their lands on their Country
- mechanisms to give effect to the Traditional Owners' Country Plans
- mechanisms to give effect to the Community Vision
- the values and principles for managing the Waterways of the West
- clear ministerial and agency accountabilities for delivery of the legislative intent
- requirements for agencies to report on the implementation of the Community Vision, the Traditional Owners' aspirations and Country Plans, the conditions and values of the Waterways of the West, and the delivery of actions to protect the Waterways of the West.

### **Recommendation 3**

Establish a 'Caretaker of waterway amenity'. Designate Melbourne Water as the 'Caretaker of waterway amenity'. This will complement its existing role as 'Caretaker of waterway health' creating a coordinated governance, planning and management framework to protect and enhance the Waterways of the West and their lands as a single living entity, and is critical to give effect to Traditional Owners' aspirations and the Community Vision.

- Establish formalised requirements for Melbourne Water to invite the Traditional Owners (see also Recommendation 1), community (see also Recommendation 4), Local Government and appropriate agencies to partner/collaborate in the delivery of this function.
- Assign new accountability to Melbourne Water to support this function/ role so it:
  - becomes a recommending referral authority for protection of amenity values along the waterways in land use planning permits.
  - has reporting requirements for the delivery/achievement of waterway amenity actions, outcomes, values and conditions.

Require the 'Caretaker of waterway amenity', in partnership with the Traditional Owners, Local Government, community and appropriate agencies, to lead the development and implementation of an education and awareness strategy for the Waterways of the West.

Require development of a volunteer and community participation strategy for the Waterways of the West, which recognises and supports the invaluable contribution of volunteer groups. This is to be coordinated by the 'Caretaker of waterway amenity', in partnership with the Traditional Owners, Local Government, community groups and appropriate agencies.

### **Recommendation 4**

Embed Traditional Owner and community participation in the planning and management of waterways and surrounding lands through:

- requiring Melbourne Water to establish a Waterways of the West Advisory Committee (with Traditional Owner and community representation) to provide oversight and advice on waterway strategy development and implementation and to ensure these align with Traditional Owners' aspirations and Country Plans, and the Community Vision.
- supporting, empowering and resourcing local community groups (new and existing) to contribute to the delivery of the Community Vision for the Waterways of the West.



### **Recommendation 5**

Adopt a regional scale planning framework to establish and protect an interconnected network of blue (waterways) and green (land) corridors and the diverse landscape, cultural, biodiversity and community values they provide. This to be implemented via:

- development of a regional-scale strategy for blue-green corridors in partnership with the Traditional Owners, community and appropriate agencies that embodies the Community Vision intent
- inclusion of the Traditional Owners' Country Plans to guide the regional strategy and ensure cultural linkages are protected
- preparation of blue-green corridor plans to guide land use planning and decision making
- introduction of state-led planning controls (see also Recommendation 6 and 8)
- use of localised masterplanning in areas identified through the regional-scale strategy and blue-green corridor plans.

In addition, establish a biodiversity conservation planning process to inform planning and development of Precinct Structure Plans outside of the Melbourne Strategic Assessment area, ensuring landscape-scale biodiversity linkages are protected.

### **Recommendation 6**

Recognise the Werribee (*Wirribi Yaluk*) and Maribyrnong (*Mirrangbamurn*) Rivers as state and regionally significant rivers in the Planning Policy Framework.

These policies should give effect to the Traditional Owners' aspirations and the intent of the Community Vision and ensure the protection and enhancement of the landscape character and the cultural, biodiversity and community values of the waterways and their lands.



### **Recommendation 7**

Strengthen state-level policy and strategy to drive protection and planning of blue-green corridors including:

- finalising the Metropolitan Open Space Strategy (MOSS) and land use framework plans prepared under Plan Melbourne, ensuring they recognise the importance of blue-green corridors in the Waterways of the West region and the essential contribution they make to the open space network and landscape connectivity
- ensuring the Precinct Structure Planning (PSP) Guidelines (currently being updated) are consistent with state level policy in recognising the importance of protecting waterways as an interconnected network of blue-green corridors in urban growth areas
- including strategic policy intent to plan and manage blue-green corridors for biodiversity, cultural and community values within the Victorian Waterway Management Strategy update
- amending the Healthy Waterways Strategy Werribee (Wirribi Yaluk) and Maribyrnong (Mirrangbamurn) Catchment strategies to incorporate strategic policy intent for planning for blue-green corridors
- ensuring that relevant data from the Werribee (Wirribi Yaluk) and Maribyrnong (Mirrangbamurn) Catchment Scale Integrated Water Management Plans informs future implementation processes for the Waterways of the West and also that these plans, which are still being developed, incorporate actions to contribute to the realisation of blue-green corridors.

### **Recommendation 8**

Adopt state-led planning controls to strengthen planning policy and direction in relevant planning schemes to support the realisation of blue-green corridors and the protection of the environmental and landscape features of significant waterway lands. A consistent approach across municipal boundaries is required. These controls should be introduced on an interim basis as a matter of urgency, with permanent controls introduced as soon as possible (see also Recommendation 5 and 7).



### **Recommendation 9**

Implement urgent action to recover water for the environment and Country for the Werribee (*Wirribi Yaluk*) and Maribyrnong (*Mirranqbamurn*) Rivers through:

- investment in irrigation efficiency and modernisation
- use of alternative water sources for agriculture
- reasonable use requirements for Section 8 rights of the Water Act 1989
- short-term funded and deliverable actions within the relevant sustainable water strategy/s.



### **Recommendation 10**

Establish a continuous, connected coastal wetlands parkland across the western shoreline of Port Phillip Bay. This area should be acknowledged as a single and connected system, named appropriately and managed collaboratively with the Traditional Owners. The park should be formally designated by the Victorian Government over a defined timeframe to ensure that biodiversity, cultural and community values are protected in the context of projected sea level rise.



### **Recommendation 11**

Establish a collaborative Pollution Prevention Taskforce, led by the Environment Protection Authority Victoria (EPA), to support industry transition to the requirements of the amended environmental protection legislation, including the introduction of a general environmental duty. This taskforce is to determine appropriate funding mechanisms and lead the delivery of a program of initiatives to support pollution prevention and a changed business culture with the intent of improving water quality across the Waterways of the West.



### **Recommendation 12**

Melbourne Water to continue as the designated waterway manager and 'Caretaker of waterway health' for the Port Philip and Westernport region, but with a more clearly defined obligation to protect and manage the region's wetlands.



### **Recommendation 13**

To turn around the current declining trajectory of waterway values and conditions of the Waterways of the West, Melbourne Water must continue to lead the collaboration and be enabled by government to deliver the Healthy Waterways Strategy and achieve the ambitious targets within it as a matter of urgency.

### **Recommendation 14**

Implement the remaining recommendations made by the Improving Stormwater Management Advisory Committee – in particular, the place-based stormwater performance objectives.



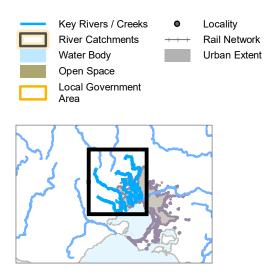




## **About this work**

# Where are the Waterways of the West?

In this report, 'Waterways of the West' describes the rivers, creeks, headwater streams and wetlands, and the surrounding lands within the Werribee (Wirribi Yaluk) and Maribyrnong (Mirrangbamurn) River catchments, and the Moonee Ponds (Moonee Moonee) Creek sub-catchment. This includes the Maribyrnong River (Mirrangbamurn), Werribee River (Wirribi Yaluk), Little River (Worrin-yaloke), Laverton Creek, Skeleton Creek and Kororoit Creek, their tributaries and headwaters, and wetlands and estuaries found within these catchments.





## **Ministerial Advisory Committee members**

The Ministerial Advisory Committee (MAC) is a group of independent individuals brought together to provide advice to government on how to protect and manage the Waterways of the West.

The Committee's members were appointed based on their skills and experience. They offer deep expertise in water management, local government, urban design and Aboriginal values of water, as well as strategic thinking and community engagement. The experts include representatives from both Registered Aboriginal Parties in the Waterways of the West region — the Wurundjeri Woi wurrung Cultural Heritage Aboriginal Corporation (the representative body for the Wurundjeri Woi wurrung people), and the Wathaurung Aboriginal Corporation (the representative body for the Wadawurrung people).

The Victorian Government established the Committee in late 2018 to provide independent advice to government and strengthen the voices of Traditional Owners and the community in the future of their waterways.

Chris Chesterfield, chairs the Ministerial Advisory Committee and is a nationally recognised leader in waterway and urban water management. He is Chairperson of the Victorian Environmental Water Holder, and a leading strategic thinker and research leader at the Cooperative Research Centre for Water Sensitive Cities. Chris chaired the advisory committee that led to the establishment of landmark reforms to protect the Yarra River (*Birrarung*) and now also chairs the Birrarung Council of Wurundjeri Woi Wurrung Elders and community, which acts as the 'voice of the river'.

**Aunty Doreen Garvey-Wandin, Aunty Diane Kerr, Uncle David Wandin** and **Aunty Alice Kolasa** have a shared membership on the Committee, consistent with the three-family governance model of the Wurundjeri Woi Wurrung Cultural Heritage Aboriginal Corporation.

**Aunty Doreen Garvey-Wandin** is a Wurundjeri Woi Wurrung Elder and Engagement Officer at the Wurundjeri Woi Wurrung Cultural Heritage Aboriginal Corporation (*MAC member October 2018 – April 2019*).

Melinda Kennedy is a Wadawurrung woman with extensive knowledge and experience in the field of traditional and contemporary land and water management. Melinda is a member of the Aboriginal Water Unit within the Department of Environment, Land, Water and Planning (DELWP). She is currently studying a Higher Degree by Research and practising in Architecture and Built Environment with Deakin University. Melinda is also on the Barwon Water Environmental Advisory Committee.



Chris Chesterfield – Chair



Aunty Doreen Garvey-Wandin



Melinda Kennedy



**Aunty Diane Kerr** 



**Aunty Alice Kolasa** 



**Shelley Penn** 



**Uncle Dave Wandin** 



Lydia Wilson

Aunty Diane Kerr OAM is a respected Wurundjeri Woi wurrung Elder. Aunty Di has made a life-long contribution to her community in the areas of health, welfare, education and land rights. She is a member (and former Director) of the Dandenong and District Aborigines Co-Operative and former Director of Narragol Housing (Koorie Housing Loans). In 2013, Aunty Di was appointed a Director of Native Title Services Victoria (now First Nations Legal and Research Services) and six months later became the Chairperson. In 2016, she was appointed by the then Minister for Aboriginal Affairs Natalie Hutchins to the Aboriginal Treaty Interim Working Group as a respected community Elder (not in her capacity as a Wurundjeri Woi Wurrung Elder) and has since stepped down. Aunty Di was inducted into the Victorian Aboriginal Honour Roll in 2017 by the Victorian Government. Aunty Di was awarded the Order of Australia Medal in the 2019 Australia Day honours for her contribution to the Victorian Aboriginal Community.

Aunty Alice Kolasa was one of three Wurundjeri Woi wurrung Elders to provide a cultural framework for the Yarra River Protection Ministerial Advisory Committee. On 22 June 2017, Aunty Alice addressed the Victorian Parliament while tabling the Yarra River Protection (Wilip-gin Birrarung Murron) Bill 2017. In addition to being a passionate advocate for Country, Aunty Alice is also active in promoting Wurundjeri Woi wurrung culture to the broader community. Aunty Alice is actively involved in organising Wurundjeri Woi wurrung events such as Wurundjeri Week and Moomba. Aunty Alice is also a current member of the Victorian NAIDOC Committee (2018 – current).

**Shelley Penn** is an independent architect and urbanist. She is currently the University Architect at Monash University and is an ongoing member of the Victorian, ACT, NSW and WA State design review panels. Shelley was formerly Chair of the National Capital Authority, Deputy Chair of the Heritage Council of Victoria and the Associate Victorian Government Architect.

**Uncle David Wandin** (MAC member April 2019 - current) was instrumental in establishing the Wurundjeri Woi wurrung Cultural Heritage Aboriginal Corporation's Narrap Team, a team of cultural land managers who provide commercial services for authorities and businesses with land and water management responsibilities. Uncle Dave is a recognised leader in promoting and executing cultural burns in Victoria. Currently, Uncle Dave and Wurundjeri Woi Wurrung Corporation's Water Unit are working on the development of the Yarra Strategic Plan, ensuring optimal outcomes for Wurundjeri Woi Wurrung culture and people alongside representatives of responsible public entities identified in the Yarra River Protection (Wilip-gin Birrarung Murron) Act 2017. Uncle Dave is also taking a key role in the rejuvenation of the Galeena Beek properties in Healesville.

**Lydia Wilson** is a senior executive with 25 years local government experience, including over 12 years as CEO of Macedon Ranges Shire Council, the Yarra City Council and the Manningham Council. In addition, she has extensive Board Directorship experience including having been Chair and Deputy Chair of Sustainability Victoria. Lydia is currently Chair of the Maribyrnong (*Mirrangbamurn*) Integrated Water Forum and a Director on the Board of Procurement Australasia.

# The role of the Ministerial Advisory Committee

The Ministerial Advisory Committee was asked to undertake the following work and report back to the Victorian Government.

- Oversee a dedicated process to develop a Community Vision for the Waterways of the West.
- Identify current and emerging issues affecting the social, environmental and cultural values of these waterways.
- Investigate current, and consider optimal institutional, legislative and regulatory arrangements for the management, promotion and protection of the Waterways of the West.
- Investigate additional arrangements to ensure the Traditional Owners and the community participate in waterway management decisions.
- Investigate land use planning and development controls and strategic policy that would mitigate risk to the Waterways of the West, and provide a net benefit to the communities of the region.
- Identify any interim land use planning arrangements that could be put in place immediately.
- Prioritise issues and opportunities and make recommendations for specific, cost-effective actions and any mandatory requirements for the protection of the waterways.

The Committee's complete Terms of Reference are available on request and on the Waterways of the West website, <a href="www.water.vic.gov.au/waterways-and-catchments/wow">www.water.vic.gov.au/waterways-and-catchments/wow</a>

### A community focused approach

From the beginning, the Waterways of the West initiative has been community focused. Community interest, passion and advocacy helped drive the Victorian Government's appointment of the Ministerial Advisory Committee. The Committee has adopted an ongoing consultative process with Traditional Owners, community and relevant agencies, including two formal public consultation periods. A Reference Group of relevant agencies was convened — a list of agencies invited is included in Appendix 2.



### Waterways of the West timeline





## The case for change

# The Waterways of the West sustain communities and the environment

The health of communities and ecosystems depend on the Waterways of the West and their lands. They make local places unique and contribute to identity – adding to what it means to belong somewhere. These natural assets have special cultural significance for the Traditional Owners, with the Wurundjeri Woi wurrung and Wadawurrung being the Traditional Owners of much of the Waterways of the West region's waterways and lands.

The Wurundjeri Woi wurrung and Wadawurrung Traditional Owners have managed these areas for over a thousand generations. Through their associations and relationship with Country, the Traditional Owners continue to maintain unique tangible and intangible connections — cultural, spiritual and economic — to the Waterways of the West and their lands. This connection is formally acknowledged through their recognition as Registered Aboriginal Parties under the Aboriginal Heritage Act 2006.

Melbourne is renowned for its liveability and vibrancy. Its unique places underpin a sense of belonging and pride of place within local neighbourhoods. Its waterways and coastal region are an essential part of the city's character, offering open space and amenity, and supporting health and wellbeing for people who live, work and visit within the region.

The blue-green corridors of the Waterways of the West are some of the greatest natural assets of the west. They are cool, green places where people connect with nature and one another. They support abundant and biologically diverse plant and animal life.

The Waterways of the West encompass landscapes of diverse natural beauty made up of gorges, volcanic plains and river flats. These include nationally significant grasslands and woodlands along with internationally recognised coastal wetlands and estuarine ecosystems. In urban areas, they are frequently the most significant remaining natural areas, providing vital habitat and connections across the landscape.

Amenity is a term used broadly in this report to encompass those aspects that enhance community wellbeing. For people, waterways provide: a way of connecting with nature; an escape and place for reflection; interesting and enjoyable landscapes; a place for recreation and social interaction; opportunities to connect with culture and heritage and contribute to pride and belonging to place through connection with local character.

We have a once in a lifetime opportunity to rethink how we can best protect and manage the Waterways of the West, embracing their character as a special part of Melbourne's identity and creating a positive legacy for the region.



The region's waterways are also the source of water for agriculture, irrigating some of Victoria's most productive food growing regions. They provide drinking water for some rural towns and supply irrigation for maintaining public open spaces.

To continue contributing to the region's quality of life, the Waterways of the West must be sustainably managed. Only then can they continue to support their unique cultural, community, environmental and ecosystem values, now and into the future.



Change in average annual rainfall 2.4% decrease by 2040



Temperature increase 1.3°C by 2040

### A growing population and changing climate are transforming the west

Now is a profound period of transformative change for the Waterways of the West region. Population growth, urban development and climate change will increase pressure on the region's waterways and the values they provide.

The region's population is growing rapidly. It is predicted to double to over 1.9 million people by 2040. The area includes major urban growth corridors with significant greenfield residential developments, transforming large areas from farms into suburbs. Population density in existing urban areas is also increasing through urban renewal.

# Urban growth presents major challenges for the waterways, including more stormwater, litter and pollution.

More roofs, roads and paved areas means increased impervious surface area, which in turn leads to much more stormwater runoff. Conventional drainage engineering directs the increased stormwater, and the litter and pollution it carries, into drains and ultimately waterways and Port Philip Bay. This degrades the ecological health of the region's waterways. It pollutes downstream parks, open spaces, wetlands and beaches — making them less healthy for the animals that live in them and the people that visit them.

With more people living, working and playing in the region, its waterways will increasingly need to serve as quality open space in the rapidly changing landscape. It will mean an even greater demand on these waterways as more people seek out places for connection, relaxation and recreation along their banks.

# The warming and drying climate is already negatively impacting the Waterways of the West and their lands.

The decrease in surface water availability is placing pressure on ecosystems and on supply for consumptive uses as well as for environmental and cultural needs. We are likely to see longer and more frequent periods of no flow in seasonal, ephemeral waterways (common to the region) and increased frequency of wetland drying. These may change the natural ecology of these systems.

Climate change and urban development will exacerbate the urban heat island effect, especially in higher density suburbs. This then negatively impacts public health and wellbeing. In addition, coastal areas are vulnerable to rising sea levels and storm surges that will damage their landscapes and ecosystems, as well as changing how communities can use these areas.

### Population growth of the Werribee and Maribyrnong catchments

925,000 IN 2018 1,900,000 BY 2040





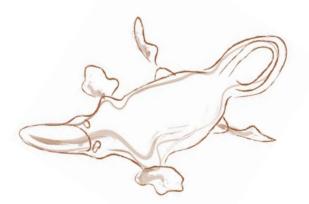
# A business as usual approach will not be enough

The Victorian Government has a strong policy base to protect waterways. Water for Victoria, Plan Melbourne, the Healthy Waterways Strategy and the Yarra River Action Plan Wilip—gin Birrarung murron (among others) emphasise the importance of liveable cities, of protecting waterways and of enhancing their associated parklands. They also highlight the imperative for embedding the Traditional Owners and their values, knowledge and culture in decision making.

Despite this, continuing with a business as usual approach to planning and managing the Waterways of the West will not achieve the Victorian Government's policy objectives. Water quality and waterway health are on a declining trajectory<sup>2</sup> for most waterways in the region. The *Healthy Waterways Strategy* (2018) predicts this decline will continue unless significant work is undertaken.

However, the rate and scale of urban development also provides opportunities to shape the future landscape. We have a once in a lifetime opportunity to rethink how we can best protect and manage the Waterways of the West – so that we can embrace their character as a special part of Melbourne's identity and create a positive legacy for the region.

A new approach to managing the Waterways of the West must start urgently.



<sup>2</sup> Healthy Waterways Strategy (2018), Co-designed Catchment Program for the Werribee Catchment Region (2018) and the Co-designed Catchment Program for the Maribyrnong Catchment Region (2018).

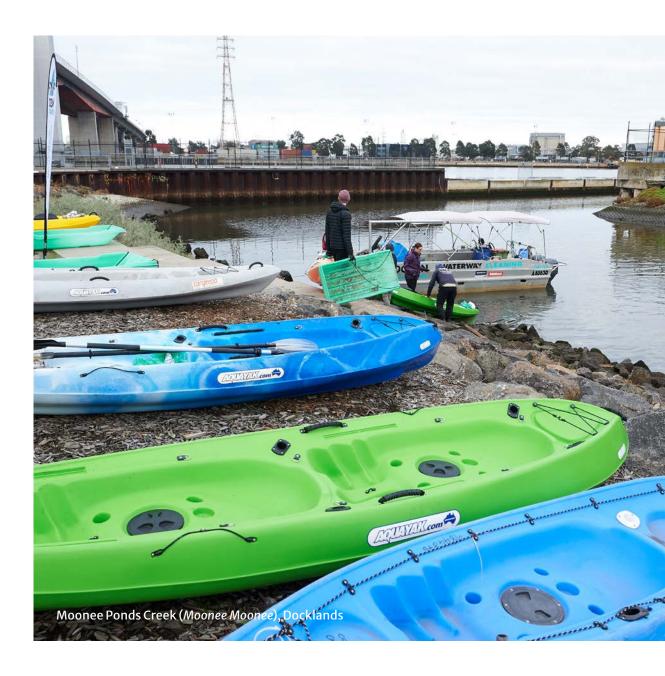
### **Problems we face**

To identify the key challenges and issues faced by the Waterways of the West, our Committee listened to sector experts, agency representatives and key community representatives from across the region. This covered the current planning and management frameworks and the existing governance, institutional, legislative and regulatory arrangements. Through examining this evidence, we identified these key issues and gaps, as outlined below.

- 1. Wurundjeri Woi wurrung and Wadawurrung people and their values, culture and voice are not consistently nor constructively involved in the planning and management of the Waterways of the West and their lands.
- 2. Water quality and waterway health are on a declining trajectory. This decline is driven by legacy issues from historic land and waterway use, ongoing regular pollution events, and chronic pressures such as increased urban development, stormwater and climate change.
- 3. Increasing demand for water as a result of population growth, combined with continued climate change and less rainfall, is resulting in shortfalls in surface water availability for the environment in the Werribee River (Wirribi Yaluk) and mid-to-upper Maribyrnong River (Mirrangbamurn) catchments. This is reducing the ability of these waterways to meet environmental needs. It could also potentially be impacting the cultural values of these waterways.
- 4. There is no lead agency or advocate to coordinate the whole–of–region planning, management and promotion of waterways and their lands as important components of Melbourne's public open space network. This results in missed opportunities to protect and activate waterways and their lands and to celebrate their ecological, cultural and social values.



- 5. Except for Traditional Owners and long running 'Friends of' groups, local communities have varying perceptions of, and connections to, the Waterways of the West. The unique qualities and beauty of this landscape are not broadly understood and recognised, or well celebrated, valued and protected.
- 6. The coastal wetlands and estuaries of the Waterways of the West region present an exceptional unrealised opportunity to create a world-class, nature-based destination that is accessible to Melbourne. The region's coastal wetlands and estuaries, and the environmental, cultural and amenity values they provide, are at high risk from the increasing pressures of climate change, rising sea levels and advancing urbanisation. While the western coastline of Port Philip Bay has numerous coastal reserves, they are not continuous or managed in an integrated way. The resulting gaps make this area vulnerable to inappropriate use and development.
- 7. The region's waterways and their lands are impacted by the frequently incremental and piecemeal approach to planning that results from limited coordination across development and municipal boundaries. There is a lack of regional–scale planning and the Waterways of the West are not considered as an interconnected system. This results in inconsistent outcomes and missed opportunities to protect and activate waterways and their lands to maximise and celebrate their ecological, cultural and recreational values.



### Traditional Owners' connection to the Waterways of the West and their lands

### Wurundjeri Woi wurrung community statement

The Wurundjeri Woi wurrung people have been Caring for Country since the beginning of time. Bunjil our Creator gifted us this Country. Our message is that Wurundjeri Woi wurrung people have a deep understanding and knowledge of Country as well as rights to Country, and that this should be valued and respected.

There is a deep cultural obligation and birthright to look after Country and keep it healthy. We honour the lost clans and families of the Woi wurrung that did not survive settler policies and practices: the Gunung-Willam-Balluk, Kurung-jang-Balluk and Marin Balluk.

Today our Country is shared with Victorians from many different backgrounds. We believe that Wurundjeri Woi wurrung people must be enabled to take a leading role in working with all state agents as well as communities on matters of Country.

As Traditional Owners, we seek to build solid working relationships and partnerships across our traditional Country to protect, manage and restore the land and water today and for future generations.

We have the right and the obligation to speak for Country.

The Wurundjeri Woi Wurrung Cultural Heritage Aboriginal Corporation is the Registered Aboriginal Party (RAP) for Wurundjeri Woi wurrung Country. It has statutory authority for the management of Aboriginal heritage values and culture under the Victorian Aboriginal Heritage Act 2006.

The Wurundjeri Woi wurrung people have an unbroken relationship with Country, caring for this land, its waterways, its plants and animals. Our Ancestral spirits and stories are part of this Country.



Water and smoking ceremony conducted by the Wurundjeri Woi wurrung Elders on the banks of the Maribyrnong (*Mirrangbamurn*) River.

### Wadawurrung community statement

We acknowledge our Ancestors and our Elders past and present.

We acknowledge that our Ancestors nurtured and cared for Wadawurrung Country for tens of thousands of years.

We acknowledge the hardships, the horror and the harm that they suffered following colonisation and the devastating impacts of that, which are still evident and felt today.

The fact that Wadawurrung people and culture have managed to survive and thrive demonstrates enormous strength, resilience and adaptability.

Wadawurrung people are determined to see their unique cultural heritage protected and respected. Wadawurrung aims to restore traditional knowledge and authority over the management of Wadawurrung Country for the betterment of those living on, prospering from and/or simply enjoying its land, waterways and coastal areas.

The Wathaurung Aboriginal Corporation, trading as Wadawurrung, is the Registered Aboriginal Party (RAP) for Wadawurrung Country. It has statutory authority for the management of Aboriginal heritage values and culture under the Victorian Aboriginal Heritage Act 2006.

In support of our above responsibilities, we provide a wide variety of services to organisations, assisting them to comply with the Aboriginal Heritage Act. We provide field representatives to assist with the discovery and repatriation of cultural heritage artefacts and ancestral remains. Our induction programs help to acquaint individuals and organisations with our heritage.

Wadawurrung people are the Traditional Owners of this land. Our family have looked after and cared for this Country for over a thousand generations and are still caring for it to this very day.





## **Community Vision**

People from across the west came together to create a Community Vision for the Waterways of the West and their lands for the next 50 years. It represents their aspirations and expectations for the protection of the waterways.

To develop the vision, we convened a community assembly of 45 residents representing the diverse and vibrant community of the region. As part of the process, they heard from each other, waterway health experts, representatives of cultural and linguistically diverse communities and primary school students.

The assembly told us they see the Waterways of the West as a unique, interconnected living system. They consider it essential that these living entities are protected, and that the community walk with the Wurundjeri Woi wurrung and Wadawurrung Traditional Owners in Caring for Country.

This vision was instrumental in guiding the MAC's recommendations and should play a role in future decision making.

### Vision for the region

Our vision is for healthy, diverse and sustainable waterways throughout our west. As a diverse community, we care for its interconnected rivers, creeks and landscapes.

Respectfully acknowledging and embracing the cultural values of the Wurundjeri Woi wurrung and Wadawurrung Peoples, we walk together to care for Country. The Wurundjeri Woi wurrung and Wadawurrung People cared for Country in many different ways and for all living things. Working collaboratively, the people of the west protect and celebrate these unique and interconnected waterways.

The Maribyrnong (Mirrangbamurn) and Werribee (Wirribi Yaluk) rivers, and their surrounding creeks and tributaries, run cleanly. They're filled with abundant life. Their banks teem with native plants and animals.

Crystal clear in the forested hills, the water flows through volcanic grassy-plains under big skies. It seeps into and sustains wetlands, travels down through farms, between homes and into internationally-recognised salt marshes, ending its journey in Port Phillip Bay.



Along these waters we see birds – like Reed Warblers and Rainbow Bee-eaters – nesting along the creek banks, migratory birds from as far as Alaska and Siberia stop and rest in the salt marshes. Tawny frogmouth chicks are spotted by passers-by and the air is filled with the chorus of Growling grass frogs and Pobblebonks.

We respect and value what the waters provide us: the food they help us grow; and the places that nurture our wellbeing, whose beauty we enjoy. It's where we meet and gather, reflect, run, walk and play.

WoW – it's the emotion evoked by the Waterways of the West.



## Vision across our cities, suburbs and towns

From Sunshine to Spotswood, Melton to Werribee South, Macedon to Footscray, communities connect and flow through our water corridors.

In Footscray Park, Point Cook Coastal Park, Birmingham Reserve and many other parks along our waterways, we see families from different cultures gathering and celebrating. Communities are interacting in harmony with the natural environment, joggers, cyclists commuting to and from work. We hear people laughing together with the sounds of children splashing in the water, frogs croaking, birds singing and the hum of urban life.

Along waterways in our cities and towns, like Moonee Ponds (Moonee Moonee) Creek, cyclists pass protected natural areas with native vegetation and wildlife. Urban development is designed to protect and improve the health of the creek. Communities are proud of their contribution to restoring and growing landscapes that enhance the wellbeing of people and the environment.

We wander through hidden natural refuges, pockets of greenery, a place to escape from the city and along the way we are reminded of the layers of history and different lessons of the waterways.

# Vision for agriculture and rural lands

In the agricultural areas, sustainable farming is part of a thriving ecosystem of healthy waterways. Where Wurundjeri Woi wurrung and Wadawurrung Peoples knowledge and cultural practices have become a part of everyday sustainable farming. Where water is carefully managed, used and re-used rather than being taken out of the rivers and waterways.

The waterways in these rural areas are full and flowing, feeding the vital connections between the urban ecosystems and natural and forested environments. Flourishing green corridors co-exist and connect communities with the neighbouring prosperous and sustainable agricultural land.

It's an immense region outside of the urban growth boundary from Macedon to Ballan, all the way to the Werribee River as it flows through the Bacchus Marsh and Werribee irrigation districts, and Deep Creek in the upper Maribyrnong catchment. Its waterways continue to vary widely in colour and shape, through grasslands and set against the rugged beauty of places like the Werribee Gorge.

Collaboration is central to how we get things done. With the Traditional Owners – the Wurundjeri Woi wurrung and Wadawurrung, farmers, communities and all levels of government come together to protect and enhance our essential food bowl and so we all benefit from healthy, high quality food. It's an area that is both economically and ecologically sustainable.

## Vision for natural places and forested areas

From the wetlands to Macedon Ranges, the protected waterways of the west have natural headwaters and are pristine and healthy – supporting abundant, unique, flora and fauna from source to sea.

In the vast expanses of the Victorian volcanic grassland plains, people appreciate the wide horizons and gently undulating vistas. This environmentally significant landscape supports a wide variety of bird and insect life that is essential to maintaining a healthy ecology.

Cheetham Wetlands, other coastal wetlands and the thousands of inland wetlands are home to many indigenous and migratory birds – feeding and breeding – as well as spaces for people to walk and commune with nature.

In the forested areas, such as Wombat Forest and Macedon Ranges, visitors gather to enjoy the varied experiences offered by accessible natural areas with maintained facilities. They feel connected to nature through immersion in the smells, sights and sounds of rejuvenated bushland: a chorus of birdsong and buzzing insects, native wildlife foraging in eucalyptus forests, and healthy rivers sustaining life. It signals ecosystems in balance engendered through respect for Mother Earth.

Our communities respect the areas reserved as protected environments to preserve clean water catchments and native habitats for our wildlife. We have learnt from the experiences, cultural practices and the understanding of cultural values of the Traditional Owners of our land; the Wurundjeri Woi wurrung and Wadawurrung Peoples.

As the lungs of the west, our shared places bring health and wellbeing to our communities through the restorative power of spending time on Country.





## **Directions**

To realise the community vision and protect the Waterways of the West, we have identified seven pillars to guide actions, which we have called directions. These directions represent key aspirations on where we need to get to. The delivery of our recommendations will achieve the aspirational directions and ultimately realise the Community Vision.

These directions were presented in the *Waterways* of *West Discussion Paper* and tested through extensive consultation. We received strong support for all directions.

### **Direction 1**

## Embedding Traditional Owners, their values and culture in waterway planning and management

Wurundjeri Woi wurrung and Wadawurrung Traditional Owners and their values, culture and voices are embedded in waterway planning and management, with Registered Aboriginal Parties able to determine their level of involvement in waterway management and planning decisions. Traditional Owners' objectives to manage Country are recognised and access to Country is supported.

### **Direction 2**

### Protecting and enhancing water quality and waterway health

The water quality and waterway health of the Waterways of the West are improving, with this driven by:

- Improved stormwater management practices, including the delivery of large-scale integrated water management (IWM) projects and uptake of alternative water sources where feasible.
- Clear accountabilities for and resourcing of remediation works to address contemporary pollution events and legacy contamination.
- The active participation of Traditional Owner Registered Aboriginal Parties in waterway health policy, planning and management.
- A changed business and industry culture that supports the prevention of waste and pollution, in line with the introduction of general environmental duty obligations under the *Environment Protection Amendment Act* 2018.

### **Direction 3**

### **Providing water for the environment and Country**

Ecological and cultural waterway objectives are met in the Werribee River (*Wirribi Yaluk*) and mid-to-upper Maribyrnong River (*Mirrangbamurn*). This will require an increase in the environmental water reserve and potentially a rebalance of water use between consumptive, environmental and cultural water uses.

### **Direction 4**

## Enhancing and activating waterways and their lands as open space

The realisation and community awareness of a connected network of blue-green corridors across the Waterways of the West region, which celebrate the multiple environmental, landscape, social and cultural values of the region's waterways and their lands. The delivery of these open space assets is facilitated by a coordinated governance, planning and management framework that includes a voice for the community and the active participation of the Traditional Owners as a mechanism to improve cultural connection and cultural-ecological values.

### **Direction 5**

### Connecting, celebrating and valuing the landscape

Increased recognition, celebration and access to the Waterways of the West and their cultural, amenity, wellbeing and environmental values, with this enabling increased community connection to this unique and beautiful landscape. The value of, and sensitivity to, waterway environments is reflected in urban strategic planning, development and management.



### **Direction 6**

### Improving the resilience of wetlands and estuaries

There is a continuous, connected, blue–green corridor along the coastal areas of the western shoreline of Port Philip Bay. This reserve is a multi–use corridor celebrating the cultural, environmental, amenity and recreational values of the coast. These connected reserves support climate resilience planning for the coastal wetlands and estuaries along the shoreline. Traditional Owners, their values, culture and voice are embedded in the planning for and management of the coastal reserve, with the relevant Traditional Owners able to determine their level of involvement.

There are clear accountabilities and resourcing for the management and protection of all wetlands and coastal reserves (as with all types of waterways) across the region. Planning decisions acknowledge and protect the unique hydrology, biodiversity and character of wetlands across the region.

### **Direction 7**

### Integrating land and water planning and management

Regional–scale strategic planning for the Waterways of the West and their lands in a manner that protects the landscape character and the values it provides. This strategic planning also informs and guides local government land use and development planning decisions.

## Community and stakeholder views

Our Committee wanted to hear the many ideas and diverse voices of the people and organisations from across the Waterways of the West region.

Through the engagement process we heard from a broad range of stakeholders, groups and representatives including individuals of different ages, locations, histories and perspectives.

The Traditional Owner members of the Committee ensured meaningful partnership with Traditional Owner representative bodies. Key Community Champions were also engaged directly including the Werribee River Keeper and 'Friends Of groups,' as were representatives of the Vietnamese and emerging migrant communities and primary school students. We also consulted extensively with agency representatives including local councils, key state authorities and water corporations.

We facilitated four community workshops, four community drop-in sessions, agency and community meetings and two phases of community consultation through the Engage Victoria website. We received 264 online submissions.

The Waterways of the West region has a rich, diverse multicultural population. Targeted engagement of culturally and linguistically diverse (CALD) community members was important. Vietnamese and emerging migrant communities were invited to participate in focus groups to express how and why they interact with the Waterways of the West and their lands, and how agencies can continue to involve CALD communities in the future planning and management of these places.

The first phase of public consultation, alongside discussions held with key community representatives and stakeholders across relevant local government and agencies, informed our seven directions for future management of the Waterways of the West. These were outlined in the Waterways of the West Discussion Paper, and are summarised on p. 28–29 of this report. We invited comment on these directions in the second phase of broader public consultation. All key agencies and local councils responded, as well as many community organisations and individual community members.

"Healthy waterways and the ecosystems they are in provide the basis for healthy people and communities."





### What we heard

## The waterways of the west are highly valued by the community.

People in the region see the Waterways of the West as essential for the health and wellbeing of communities and therefore in vital need of protection for current and future generations to enjoy.

"Vital natural infrastructure that provide services we don't even know that we're getting."

Respondents were concerned for the Waterways of the West in urban growth areas, with calls for their protection against encroachment and harm from inappropriate development.

### There is strong support for all seven key directions.

Traditional Owners, community and agency sectors expressed their strong support for all seven directions throughout the extensive consultation period. They also reinforced the urgency to act.

"Provide educational opportunities to increase cultural awareness and connect communities with the Traditional Owners."

# There is unanimous support to embed Traditional Owners and their values and culture in waterway planning and management.

Respondents commented on the need for the structural inclusion of Traditional Owners in urban waterway management decision making. They also emphasised the importance of continuing to build Aboriginal cultural awareness, and respectful relationships with Traditional Owners. Education was suggested as a key mechanism to connect communities with our First People and enable a greater appreciation of their unique and enduring connection to Country.

"Anything that formalises Traditional Owner voice and leadership in waterway planning and management for the long term."

## There is an urgent need to strengthen planning controls.

A key theme we heard was for planning controls to better protect waterways from inappropriate urban development and ensure consistency across municipal boundaries

## Actions to prevent pollution events and improved stormwater management is critical.

The community and stakeholders expressed strong support for pollution prevention. They expressed a desire for more accountability and enforcement options to be placed on polluters. Increasing the implementation of water sensitive urban design was a common theme of submissions. This included both for new developments and the retrofit of existing industrial precincts.

# Community education, awareness and celebration is necessary for greater recognition and protection of the Waterways of the West.

Recognising the restorative work of private landholders and educating a new cohort on how to protect the Waterways of the West were suggestions the community made in their submissions. They also expressed a desire to build greater awareness on the value of water, the connection between the natural environment and our wellbeing, and how to reduce domestic and tourism damage to waterways and their surrounding parklands.









Visionary planning is critical to protect the Waterways of the West. It will drive collective action to meet community expectations and needs, now and into the future.

Our Committee sought advice from subject matter experts, community and agency representatives. After considering the key issues and examining the existing institutional, legislative and regulatory arrangements for the Waterways of the West, we present these 14 recommendations as essential actions to realise the Traditional Owners' aspirations and Community Vision and to deliver the Victorian Government's policy objectives to protect these natural assets for future generations.

Our view is that both legislative amendments and institutional reforms are essential to strengthen governance arrangements, and to protect the Waterways of the West from both current and future pressures. This includes new planning controls and changes to the planning system framework to achieve stronger, more consistent controls for land use and development.

We recognise that many challenges faced by the Waterways of the West are shared across the

broader Melbourne region. As such, several of these recommendations provide opportunity to be considered in a broader context.

The position expressed by the Traditional Owner members of the Ministerial Advisory Committee are those of the Wurundjeri Woi wurrung and Wadawurrung. In accordance with their cultural lore and protocols, the Wurundjeri Woi wurrung and Wadawurrung only speak for their people and their traditional Country.<sup>3</sup>

<sup>3</sup> Acknowledging the Wurundjeri Woi wurrung people's consideration of Country, no Traditional Owner Group/s have yet been formally recognised by the State of Victoria for parts of this area (refer Appendix 1 for a map of Registered Aboriginal Parties boundaries).

Embed Wurundjeri Woi wurrung and Wadawurrung Traditional Owners in planning for waterways and their lands through:

- establishing Wurundjeri Woi wurrung and Wadawurrung, the Traditional Owners, as the voice for the 'living entity' of the waterways and lands on their Country
- embedding cultural connections to Country, such as Country Plans, and collaboration with the Traditional Owners through appropriate legislation and policy
- formalising requirements to invite the Traditional Owners to partner in decision making, planning and management of waterways and their lands at both State and Local Government levels.

Provide recurrent and sustainable funding for the Traditional Owners as part of a whole of government approach to embedding the Traditional Owners' voices at government planning and decision—making tables.

Fund projects and management actions for the Waterways of the West including:

- Cultural practices
- Cultural flows assessments
- Cultural values mapping/studies
- Cultural awareness and education programs
- Cultural management on Country.

These waterways are considered as an interconnected living system, flowing from source to bay. As custodians of this landscape, Caring for Country is an integral responsibility.

Historically, the Wurundjeri Woi wurrung and Wadawurrung people and their values, culture and voice have been largely excluded from the planning and management of the Waterways of the West and their lands. In the absence of a formal role, or mandatory requirement for engagement with Traditional Owners in water and land use planning, the Wurundjeri Woi wurrung and Wadawurrung have experienced inconsistent opportunities for constructive participation.

Cultural values can be a combination of tangible and intangible connections.

Among other things, this can include physical expression of cultural heritage, and intangible elements such as relating to cultural, spiritual and/or economic relationships to Country, language, song lines, stories or sacred places.

Cultural values are determined by the Traditional Owners of the land and water and can be location and Traditional Owner group specific.

That said, we recognise that there have been recent, positive changes, and there is increasing recognition of the importance and need to include Traditional Owners and their values and culture in water policy, planning and management. The recent successful proclamation of the Water and Catchments Amendment Bill 2019 means there is now a legal requirement for greater recognition and involvement of Traditional Owners and Aboriginal Victorians in the management of waterways and catchments in Victoria. This legislation also requires Victoria's water resources and waterways to be managed in a way that considers Aboriginal cultural values.

We recommend enshrining in legislation that Wurundjeri Woi wurrung and Wadawurrung Traditional Owners be the voice for Waterways of the West that flow through their Country (see Recommendation 2).

#### Rationale and implementation detail

The Wurundjeri Woi wurrung and Wadawurrung people are the Traditional Owners of much of the lands through which the Waterways of the West flow. The sacred sites and resources, values and stories associated with places, as well as language and ceremonial practices, have been handed down by their Ancestors and Elders. They have maintained this connection to the lands of the Waterways of the West through their intrinsic relationship with Country.

We also recommend formalising requirements (and associated co-designed protocols) to ensure genuine opportunities for the Traditional Owners to partner in waterway planning decision making, and to embed cultural connection to Country.

The integration of Country Plans in relevant legislation and policy, for example the Victorian Planning system, provides one avenue to embed cultural connections to Country. Traditional Owners prepare Country Plans that articulate their priorities and aspirations for looking after Country. They can be strategic plans that include physical and spiritual concepts of Country. They can provide a strategic basis for partnerships, identify management actions and economic opportunities.

The Wurundjeri Woi wurrung Country Plan articulates perspectives and aspirations for the management of Country. The Country Plan is a working document and Wurundjeri Woi wurrung are currently producing the second full iteration, with substantial restructuring to meet the developing needs of the organisation. The Country Plan expresses Wurundjeri Woi wurrung community values through direct consultation with Elders and community members. It is built around the principle of Traditional Owner sovereignty and retaining rights over knowledge and associated data.

The Wadawurrung Country Plan is a living document developed in conjunction with Wadawurrung people. It embeds knowledge and directional vision to planning, working and living on Country. Our Wadawurrung culture is core to healthy Country.

As a result of colonisation, much knowledge of Aboriginal cultural values specific to the Waterways of the West was lost. The rebuilding of Traditional Owner knowledge of the current state of Country is essential for Traditional Owners to be able to incorporate this cultural knowledge into current decision making. This includes relating to cultural values, cultural practices and cultural flows for the Waterways of the West. The resourcing of Traditional Owner Registered Aboriginal Parties is critical to enable meaningful participation in waterway planning and management. We recommend the provision of recurrent and sustainable funding.



Country Plans are prepared by the Traditional Owners and are often written in the context of Western land use and access practices

They are tools for articulating Traditional Owner priorities and aspirations for looking after Country to third parties. They can be strategic plans that encompass physical and spiritual concepts of Country, provide a strategic basis for partnerships, and identify management actions and economic opportunities.

Prepare enabling legislation for the protection of the Waterways of the West, with its own preamble and title in Wurundjeri Woi wurrung and Wadawurrung language, that enshrines in legislation:

- acknowledgement of the waterways, and the landscapes through which they flow, as 'living entities'
- the Traditional Owners as the voice for waterways and their lands on their Country
- mechanisms to give effect to the Traditional Owners' Country Plans

- mechanisms to give effect to the Community Vision
- the values and principles for managing the Waterways of the West
- clear ministerial and agency accountabilities for delivery of the legislative intent
- requirements for agencies to report on the implementation of the Community Vision, the Traditional Owners' aspirations and Country Plans, the conditions and values of the Waterways of the West, and the delivery of actions to protect the Waterways of the West.

The objectives sought through legislative protections for the Waterways of the West go beyond the scope of the Yarra River Protection (Wilip-gin Birrarung murron) Act 2017, with a focus on how stronger legislation can lead to the protection of all waterways and their lands as interconnected living systems.

We explored the merits of both new place-based legislation, and amendments to existing legislation such as the *Water Act 1989* and *Planning and Environment Act 1987*. Ultimately, our recommendation focuses on the objectives and outcomes that we are seeking from the legislative protection, as opposed to the specific legislative mechanism.

We recommend that any legislation to protect the Waterways of the West be prepared and enacted in partnership with the Traditional Owners. The legislation should include the Traditional Owners' language and have a preamble, or preambles, that recognises past and ongoing Traditional Owners' stewardship of and connection to the Waterways of the West.

#### Rationale and implementation detail

Strong legislative protection is essential to effectively realise the Waterways of the West Community Vision. Traditional Owner members of the Committee feel the weight of their Ancestors and recognise their responsibility to protect these waterways and their lands for future generations.

Legislative change, that is undertaken in partnership with Traditional Owners, will be an enduring legacy of protection for the Waterways of the West. It provides a mechanism to recognise waterways as interconnected 'living entities' with the Traditional Owners, the original custodians of the land through which they flow, as the voice for waterways and lands on their Country.

Legislation can also embed the values and principles to be used to guide the planning and management of the Waterways of the West, strengthening accountabilities of agencies to incorporate these principles in their relevant policies and decision making.

Legislation can mandate and regulate reporting obligations and is required to establish accountability for agencies and their respective ministers to report on the implementation of the Community Vision and Traditional Owner aspirations, the conditions and values of the Waterways of the West, and actions undertaken to protect them.



Establish a 'Caretaker of waterway amenity'.

Designate Melbourne Water as the 'Caretaker of waterway amenity'. This will complement its existing role as 'Caretaker of waterway health' creating a coordinated governance, planning and management framework to protect and enhance the Waterways of the West and their lands as a single living entity, and is critical to give effect to the Traditional Owners' aspirations and the Community Vision.

- Establish formalised requirements for Melbourne Water to invite the Traditional Owners (see also Recommendation 1), community (see also Recommendation 4), Local Government and appropriate agencies to partner/collaborate in the delivery of this function.
- Assign new accountability to Melbourne Water to support this function/role so it:

- becomes a recommending referral authority for protection of amenity values along the waterway in land use planning permits.
- has reporting requirements for the delivery/ achievement of waterway amenity actions, outcomes, values and conditions.

Require the 'Caretaker of waterway amenity', in partnership with the Traditional Owners, Local Government, community and appropriate agencies, to lead the development and implementation of an education and awareness strategy for the Waterways of the West.

Require development of a volunteer and community participation strategy for the Waterways of the West, which recognises and supports the invaluable contribution of volunteer groups. This is to be coordinated by the 'Caretaker of waterway amenity', in partnership with the Traditional Owners, Local Government, community groups and appropriate agencies.

#### Rationale and implementation detail

The institutional arrangements for planning and managing waterways and their lands are currently separated<sup>4</sup>. There is no lead agency or advocate to coordinate the planning, management and promotion of the amenity of waterways and their associated lands.

We conclude that despite the conscientious work by many organisations and agencies, this institutional gap hinders holistic, efficient and cost-effective planning and management for waterways in a way that maximises the diversity of values they provide – amenity, open space, cultural and environmental. It limits strategic and integrated decision-making



<sup>4</sup> There are numerous agencies and organisations involved in planning and managing the Waterways of the West and their lands. Appendix 3 outlines the roles and responsibilities of key agencies and organisations.

for the entire waterway corridor and the setting of clear goals for waterway corridor amenity values. This results in fragmented service provision and uncoordinated investment.

We recommend that a 'Caretaker of waterway amenity' is established, creating a lead agency to advocate and coordinate planning for amenity of the waterways and their lands. This will support recent amendments to the *Water Act 2019*<sup>5</sup>, which established a legal requirement for Victoria's waterways to be managed in a way that considers the social and recreational uses and values of waterways.

In developing this recommendation, we considered two options. The first is to create a new statutory authority to manage both waterways and open space (parklands). The second is to embed this function within an existing agency. We are of the view that while a new dedicated authority would provide coordinated planning for open space and amenity across the region, it would likely result in long implementation delays and high establishment costs.

We consider that the optimal institutional arrangement is that the role of 'Caretaker of waterway amenity' be assigned to an existing agency, and that Melbourne Water is best placed to take on this function. This new role would align and build on their existing waterway management functions to facilitate holistic management for waterway and health and amenity. It would establish clearer roles, and create a coordinated governance, planning and management framework with clearer

accountabilities. This is critical to protect and enhance the Waterways of the West and their lands, and could be applied across the whole of Melbourne Water's waterway management district.

Melbourne Water's internal capabilities, business systems and existing resourcing would ensure this institutional reform is implemented in a timely manner.

Establishing Melbourne Water as a recommending referral authority (within Victoria's planning system) for protection of amenity values of the waterway landscape will strengthen the links between land use planning and waterway management. With this function they can positively influence development proposals, ensuring community expectations for amenity values, both within and interfacing with the waterway corridor, are considered.

We also recommend, that as part of Melbourne Water's role as 'Caretaker of waterway amenity' they should prepare and implement both an education and awareness strategy, and a volunteer and community participation strategy. This will strengthen community connection with waterways and encourage greater involvement in the management of these natural assets.

To implement this recommendation:

 the Minster for Water to assign the new 'Caretaker of waterway amenity' function to Melbourne Water, and amend its Statement of Obligations

- consider an amendment to Part 10 of the Water Act to introduce the function of 'Caretaker of waterway amenity', and enable the Minister to delegate this function (with Part 10 responsibilities) to an authority such as Melbourne Water
- establish Melbourne Water as a recommending referral authority for protection of amenity values along the waterway lands in the Victorian Planning Provision
- establish new mandatory reporting requirements on the delivery of waterway amenity actions, outcomes, values and conditions.

Amenity values are dependent on:

- the health and naturalness of the river and the abundance of plants and animals
- infrastructure such as trails, signage and other facilities
- the cleanliness of the waterway and surrounding landscape (appearance, odour, litter etc.)
- ability to access the waterway; and the quality and extent of open space.

<sup>5</sup> The Water and Catchments Legislation Amendment Bill 2019 was successfully proclaimed in 2019.

Embed Traditional Owner and community participation in the planning and management of waterways and surrounding lands through:

- requiring Melbourne Water to establish a
   Waterways of the West Advisory Committee
   (with Traditional Owner and community
   representation) to provide oversight and
   advice on waterway strategy development
   and implementation and to ensure these
   align with Traditional Owners' aspirations and
   Country Plans, and the Community Vision
- supporting, empowering and resourcing local community groups (new and existing) to contribute to the delivery of the Community Vision for the Waterways of the West.

#### Rationale and implementation detail

Community advocates and groups have consistently championed for the protection and investment in the Waterways of the West. The role of 'Caretaker of waterway health', currently assigned to Melbourne Water, involves taking care of the waterways on behalf of the broader community. This requires engaging with the community to understand their expectations and providing opportunities for them to participate in decision making and management activities.

Community participation is a critical continuation of the Waterways of the West initiative's community focused approach and will provide an avenue for community

advice and oversight for the delivery of the Waterways of the West Community Vision.

We recommend the establishment of an ongoing community advisory committee to provide oversight and advice for the planning of the Waterways of the West, and formalised reporting requirements to ensure transparency and accountability. We consider Melbourne Water, as the 'Caretaker of waterway health', and 'Caretaker of waterway amenity' (as outlined in Recommendation 3), to be the most appropriate agency to convene this advisory committee.

This advisory committee will enable the perspectives, local knowledge, expertise and values of people who live, work and play across

the Waterways of the West region to be shared and incorporated into decision making about their region. We recommend that this advisory committee includes the Traditional Owners, and representatives from a range of community locations and interests.

Effective community collaboration involves two-way communication, mutual trust and a genuine ability to input into decision making. This process will build community and organisation knowledge and capacity in waterway planning and management — empowering community groups to contribute to the delivery of the Community Vision for the Waterways of the West.



Adopt a regional scale planning framework to establish and protect an interconnected network of blue (waterways) and green (land) corridors and the diverse landscape, cultural, biodiversity and community values they provide. This to be implemented via:

- development of a regional-scale strategy for blue-green corridors in partnership with the Traditional Owners, community and appropriate agencies that embodies the Community Vision intent
- inclusion of the Traditional Owners' Country Plans to guide the regional strategy and ensure cultural linkages are protected
- preparation of blue-green corridor plans to guide land use planning and decision making
- introduction of state-led planning controls (see also Recommendation 6 and 8)
- use of localised masterplanning in areas identified through the regional-scale strategy and blue-green corridor plans.

In addition, establish a biodiversity conservation planning process to inform planning and development of Precinct Structure Plans outside of the Melbourne Strategic Assessment area, ensuring landscape–scale biodiversity linkages are protected.

#### **Recommendation 6**

Recognise the Werribee (*Wirribi Yaluk*) and Maribyrnong (*Mirrangbamurn*) Rivers as state and regionally significant rivers in the Planning Policy Framework. These policies should give effect to the Traditional Owners' aspirations and the intent of the Community Vision and ensure the protection and enhancement of the landscape character and the cultural, biodiversity and community values of the waterways and their lands.

#### **Recommendation 7**

Strengthen state-level policy and strategy to drive protection and planning of blue-green corridors including:

- finalising the Metropolitan Open Space Strategy (MOSS) and land use framework plans prepared under Plan Melbourne, ensuring they recognise the importance of blue-green corridors in the Waterways of the West region, and the essential contribution they make to the open space network and landscape connectivity
- ensuring the Precinct Structure Planning (PSP) Guidelines (currently being updated) are consistent with state level policy in recognising the importance of protecting waterways as an interconnected network of blue-green corridors in urban growth areas

- including strategic policy intent to plan and manage blue-green corridors for biodiversity, cultural and community values within the Victorian Waterway Management Strategy update
- amending the Healthy Waterways Strategy Werribee (Wirribi Yaluk) and Maribyrnong (Mirrangbamurn) Catchment strategies to incorporate strategic policy intent for planning for blue-green corridors
- ensuring that relevant data from the Werribee (Wirribi Yaluk) and Maribyrnong (Mirrangbamurn) Catchment Scale Integrated Water Management Plans informs future implementation processes for the Waterways of the West and also that these plans, which are still being developed, incorporate actions to contribute to the realisation of blue-green corridors.



Adopt state-led planning controls to strengthen planning policy and direction in relevant planning schemes to support the realisation of blue-green corridors and the protection of the environmental and landscape features of significant waterway lands. A consistent approach across municipal boundaries is required. These controls should be introduced on an interim basis as a matter of urgency, with permanent controls introduced as soon as possible (see also Recommendation 5 and 7).

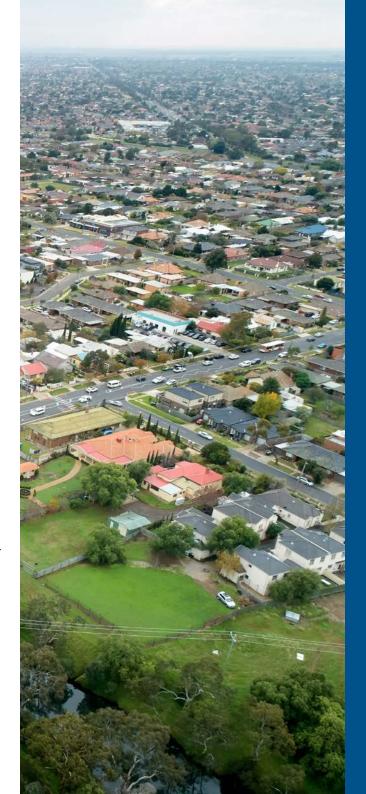


#### Rationale and implementation detail

We received submissions from councils and other stakeholders expressing strong support for the establishment and protection of blue (water) – green (land) corridors along the Waterways of the West.

Current government policy settings and planning system arrangements do not best support the planning for, and delivery of, an interconnected network of blue–green corridors because:

- there is no overarching regional-scale strategy to guide planning for waterways as an integrated environmental and social asset across jurisdictional boundaries
- there is no agency with the defined function or responsibility for regional-scale planning for waterways and their lands as an integrated social and environmental asset
- there are no spatially explicit blue-green corridor plans of nominated waterways with enough detail to guide land use planning to optimise environmental, social and cultural values
- planning controls to protect waterways and their lands are inconsistently applied across municipal boundaries, leading to potentially inconsistent and detrimental outcomes.



We propose establishing a regional–scale planning framework to deliver on community expectations for the protection and enhancement of Waterways of the West, and associated open space, as blue–green corridors. This framework should be developed in partnership with Traditional Owners, the community and relevant agencies, and give effect to the Waterways of the West Community Vision. It should give effect to the Traditional Owners' Country Plans to ensure cultural linkages are protected.

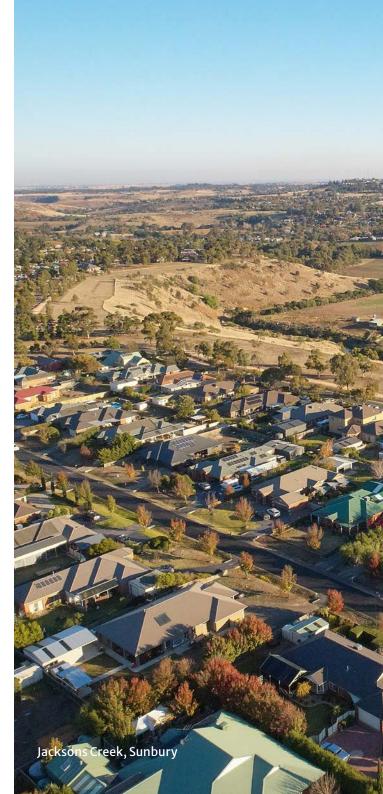
Additionally, we recommend reviewing existing strategies to ensure alignment with the new bluegreen corridor strategy. The review should include, but not be limited to:

- the Metropolitan Open Space Strategy (currently being prepared)
- the Precinct Structure Planning Guidelines<sup>6</sup> (currently being reviewed)
- the Healthy Waterways Strategy (specifically the co-designed catchment programs for the Werribee (Wirribi Yaluk) catchment region and the Maribyrnong (Mirrangbamurn) catchment region)
- the Werribee (Wirribi Yaluk) and Maribyrnong (Mirrangbamurn) catchments integrated water management planning.

Spatially explicit blue-green corridor plans would map and articulate the three-dimensional physical, environmental, social and cultural characteristics and values of water and landscape spaces within the greater network of the Waterways of the West region.

They would identify objectives and priorities for their protection and enrichment and include adequate detail to clearly identify where development can occur, and any requirements relating to its function, spatial extent and quality.





<sup>6</sup> The Precinct Structure Planning Guidelines provide step-by-step guidance for the preparation of PSPs in new greenfield urban areas.



To promote the significance of the Waterways of the West, and support the proposed regional-scale planning framework, we recommend amending the Victoria Planning Provisions (VPP) to recognise the Werribee River (Wirribi Yaluk) and Maribyrnong River (Mirrangbamurn) as state and regionally significant rivers. The VPP are the state-wide statutory reference that all planning schemes are based upon. We believe this amendment will provide clarity and strength for the conservation and enhancement of these waterways.

We recommend introducing consistent planning controls to protect environmental and landscape values along waterway corridors across local government boundaries. In support of feedback received, we believe that a consistent, state-led suite of updated planning controls should be introduced. These will provide clear direction for the protection of landscape and vegetation values, and the siting and design of any new development along waterway corridors. Where required, site-specific planning controls to manage acute land use and development pressures should also be implemented.

To increase protection of landscape–scale biodiversity linkages, we recommend strengthening the biodiversity conservation planning process for new greenfield urban development areas. We acknowledge that for areas subject to the Melbourne Strategic Assessment there is an existing Biodiversity Conservation Strategy (BCS).

This strategy outlines conservation measures that must be implemented to mitigate impacts to matters of national and state environmental significance<sup>7</sup>, associated with urban development. However, a strategic, regional–scale approach for planning biodiversity conservation in those Precinct Structure Plans (PSP), that are outside the Melbourne Strategic Assessment Area, is required.



<sup>7</sup> Maters of National Environmental Significance are recognised under Australia's federal environment legislation, the *Environment Protection and Biodiversity Conservation Act 1999* (EPBC Act) and includes, among others, listed threatened species and ecological community and Ramsar wetlands.

Implement urgent action to recover water for the environment and Country for the Werribee (*Wirribi Yaluk*) and Maribyrnong (*Mirrangbamurn*) Rivers through:

- investment in irrigation efficiency and modernisation
- use of alternative water sources for agriculture
- reasonable use requirements for Section 8 rights of the Water Act 1989
- short-term funded and deliverable actions within the relevant sustainable water strategy/s.

#### Rationale and implementation detail

The long-term health of the Werribee River (*Wirribi Yaluk*) and Maribyrnong River (*Mirrangbamurn*) is not sustainable if existing levels of water extraction continue while inflows decline, as predicted due to climate change. Iconic and culturally important species such as the platypus, and threatened species such as Yarra pygmy perch and Australian grayling, will suffer if there are shortfalls in water for the environment in these waterways, as will streamforming processes and streamside vegetation.

Natural flows and water regimes of the Waterways of the West have been greatly altered since European settlement. Reservoirs, water extraction and diversions for consumptive uses have reduced the natural flow in the Werribee River (Wirribi Yaluk) and the mid-to-upper Maribyrnong River (Mirrangbamurn) catchment. The Long-term Water Resource Assessment<sup>8</sup> determined there has been a substantial decline of surface water availability in both catchments. There has also been a disproportionate impact to the environment as water availability has reduced over the last 15 years. A doubling of the region's population over the next 50 years, and a changing climate, are forecast to further reduce surface water availability in these catchments.

Access to safe, affordable water – for households, businesses, agriculture and other users, and to keep our open spaces green – is essential to our vibrant and growing region. Equally, we must ensure our waterways receive the water they need to support environmental and cultural values.

Aboriginal cultural flows are different to environmental flows. While cultural flows can support the outcomes of environmental flows, they also have economic uses and spiritual and cultural purposes with connection to Traditional Owner cultures, identities, prosperity and physical wellbeing. Cultural flows are legally and beneficially owned by the Traditional Owners and are of an adequate quantity and quality to meet the Cultural flow outcomes, as defined by the Traditional Owners.

<sup>8</sup> Long-Term Water Resource Assessment for Southern Victoria: Overview Report DRAFT (2019). This assessment indicates that average water availability has declined by 17 per cent and 18 per cent for the Maribyrnong and Werribee catchments respectively, for the current climate period (1975 – current) compared to historical water availability.





The Healthy Waterways Strategy estimates that to meet the future ecological requirements under a climate change future, an extra 7 GL of water is needed in the Werribee River (Wirribi Yaluk) system and 5 GL in the Maribyrnong River (Mirrangbamurn) system. A cultural flows assessment for the Werribee River (Wirribi Yaluk) and Maribyrnong River (Mirrangbamurn) is required to inform the magnitude of existing shortfalls of water for Country (see also Recommendation 1).

We consider there is great opportunity to reduce pressure on the health of waterways by making better use of alternative water for agriculture. Abundant and increasing volumes of underutilised recycled water in the region could support a thriving irrigated agriculture industry in the west — acknowledging that seasonality, storage and quality issues remain.

We also recommend investment in irrigation efficiency and modernisation, to better use existing water resources.

A sustainable water strategy is the main policy mechanism for balancing the water needs of the environment and consumptive users in the Maribyrnong River (*Mirranburnum*) and Werribee River (*Wirribi Yaluk*). This strategy is scheduled for review, with completion expected by late 2022.

Wurundjeri Woi wurrung and Wadawurrung people are participating in this process for the first time. We recommend that short-term funded and deliverable actions to recover water for the environment must be provided within this strategy as a matter of urgency. This could include investment in recycled water supplies to substitute for consumptive use of water from rivers.

We also recommend the introduction of reasonable use guidelines for stock and domestic water use. Section 8 of the *Water Act 1989* allows private waterway frontage holders to pump water directly from the waterway, including into dams, for stock and domestic use. However, there are currently no enforceable guidelines to identify what 'reasonable use' is. These guidelines must be established urgently, with environmental health as a priority.



Establish a continuous, connected coastal wetlands parkland across the western shoreline of Port Phillip Bay. This area should be acknowledged as a single and connected system, named appropriately and managed collaboratively with the Traditional Owners. The park should be formally designated by the Victorian Government over a defined timeframe to ensure that biodiversity, cultural and community values are protected in the context of projected sea level rise.

#### Rationale and implementation detail

The western shoreline of Port Philip Bay presents a significant opportunity to establish a world-class coastal wetland park. This area of unique natural beauty includes:

- wetlands of international significance recognised for biodiversity values
- the last remaining unmodified estuaries flowing into Port Philip Bay (the Werribee – Wirribi Yaluk, and Little River – Worrin-yaluke)
- existing parklands highly valued and used by the community.

This natural area is extraordinary in the context of Port Philip Bay's highly developed perimeter and needs to be protected.

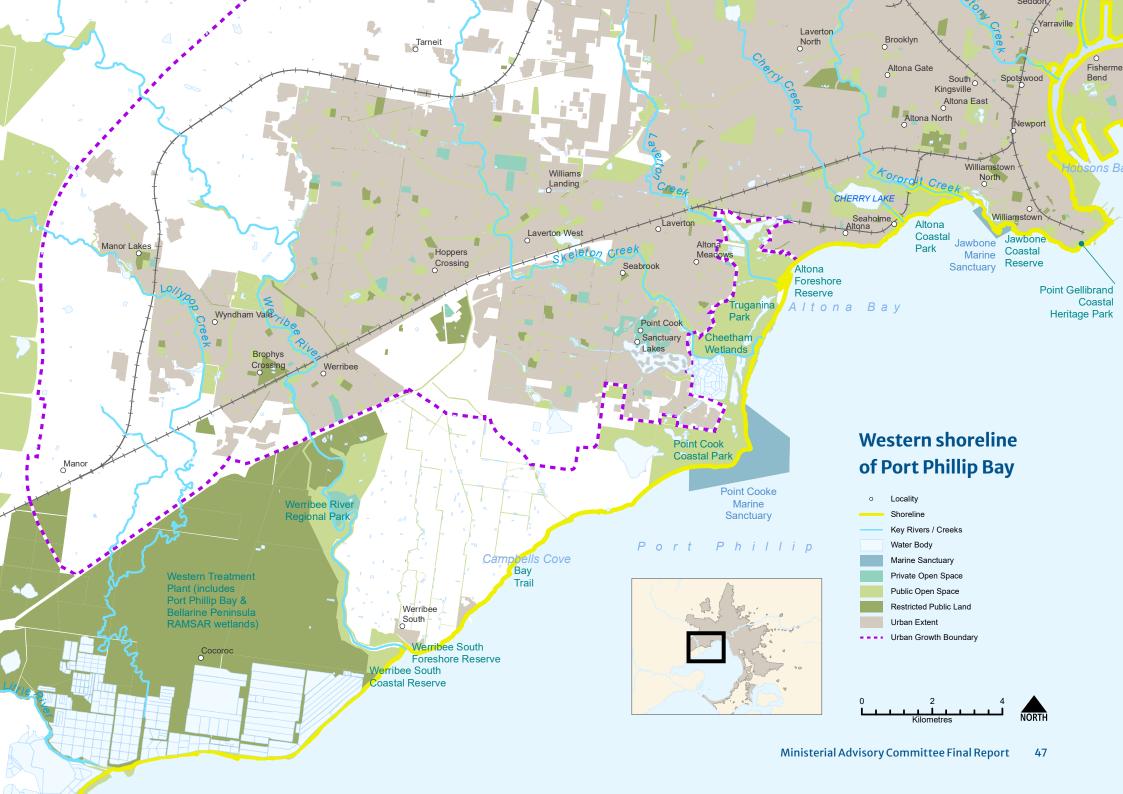
With the combined threats of climate change, consequent sea level rise<sup>9</sup> and advancing urbanisation, we must consider coastal resilience planning at a whole of system scale.

While there are existing coastal reserves between Altona and Point Wilson, there are significant gaps in public access and open space. Establishing a continuous parkland will recognise and celebrate the importance of this area and allow regional scale and consistent strategic planning for this important asset. A shoreline park of this scale and type, close to Melbourne, will provide significant environmental and amenity values. It will also contribute to a wider appreciation of the landscape and be a natural tourism asset – making a major contribution to Melbourne's identity and reputation.

This parkland would support the reconnection of the Traditional Owners with sea and coastal Country. We recommend the naming of the coastal wetland parkland be undertaken in partnership with the Traditional Owners.

<sup>9</sup> A need to plan for rising sea levels of not less than 0.8 meters by 2100 is identified in the *Victorian Coastal Strategy 2014* to allow for the combined effects of tides, storm surges, coastal processes and local conditions. See Appendix 5 for a map showing predicted sea level rise and storm tide for western Port Philip Bay.





Establish a collaborative Pollution Prevention Taskforce, led by the Environment Protection Authority Victoria (EPA), to support industry transition to the requirements of the amended environmental protection legislation, including the introduction of a general environmental duty. This taskforce is to determine appropriate funding mechanisms and lead the delivery of a program of initiatives to support pollution prevention and a changed business culture with the intent of improving water quality across the Waterways of the West.

#### Rationale and implementation detail

We conclude that a continued and increased focus on pollution prevention is required to protect water quality, waterway amenity and human health across the Waterways of the West. Despite extensive effort from multiple agencies, there continues to be significant pollution events from industrial and commercial properties, which are expensive to respond to and often result in legacy impacts. There is intense community concern and anger about these pollution issues. The image of the west, and perceptions of liveability of the region, are significantly affected by these pollution issues. There is a need for significant improvement in industry practice, underpinned by a change in culture and behaviour.

We support the Victorian Government's increased focus on pollution prevention, including reforms such as the recent *Environment Protection Amendment Act 2018* due to come into effect mid-2020. The Act introduces a general environmental duty that requires all Victorians to take reasonably practicable steps to eliminate, or otherwise reduce risks of, harm to human health and the environment from their activities. This shifts the focus to pollution prevention rather than managing pollution impacts after the event. We acknowledge the extensive work being undertaken by the Environment Protection Authority (EPA) in preparation for the new legislation to come into effect, with this recommendation reinforcing the existing government reforms.

To support businesses transition to the general environmental duty, and the changed compliance and enforcement program, we recommend establishing a Pollution Prevention Taskforce. A collaborative multi-agency governance approach – led by the EPA and including Melbourne Water, local councils and industry representatives – is proposed to capitalise on the combined capabilities and strength of these bodies. This would be similar to the Victorian. Stormwater Action Program, a highly successful partnership between the EPA, Melbourne Water, the Municipal Association Victoria and local councils that ran from the late 1990s to mid-2000s. This program drove innovative practice change and improvements in urban stormwater management across the Port Philip and Westernport catchments.

We consider that the Pollution Prevention
Taskforce would be responsible for leading the
delivery of a program of initiatives, including
enforcement of the 'general environmental duty'.
The taskforce's collaborative governance model
will facilitate coordination between agencies,
and active participation by industry. We support
the development and implementation of pilot
programs in the west, providing a model for the
rest of Melbourne and Victoria. Adequate funding
is required to successfully deliver these programs
and meet community expectations. We consider
that a critical role of the taskforce is to determine
alternative funding mechanisms, and we believe
that the 'polluter pays' principle needs to be upheld.



Melbourne Water to continue as the designated waterway manager and 'Caretaker of waterway health' for the Port Philip and Westernport region, but with a more clearly defined obligation to protect and manage the region's wetlands.

#### **Recommendation 13**

To turn around the current declining trajectory of waterway values and conditions of the Waterways of the West, Melbourne Water must continue to lead the collaboration and be enabled by government to deliver the Healthy Waterways Strategy and achieve the ambitious targets within it as a matter of urgency.

#### Rationale and implementation detail

Melbourne Water is the designated waterway manager and 'Caretaker of waterway health' for all waterways in the Port Phillip and Westernport region, managing them on behalf of the community. This role has been expanded in scope and geographic area over many decades — the west of Melbourne was only fully included in Melbourne Water's operating area for waterways, floodplain management and drainage in 2008.

The Health Waterways Strategy was developed by Melbourne Water in collaboration with agencies and local government, and engagement with Traditional Owners and community. The Waterways and Drainage Charge, paid by property owners across the Port Philip and Westernport region, provides a dedicated revenue stream that funds most of Melbourne Water's substantial waterway programs. 10 Other partners also invest in the delivery of the Healthy Waterways Strategy. This arrangement for managing waterways in the Port Phillip and Westernport region is widely regarded as world leading and we should ensure that it continues to be so.

Despite extensive effort and investment in waterway programs, the *Healthy Waterways Strategy* indicates that with current business as usual approaches, key values across most of the waterways within the Waterways of the West will worsen.

Many natural wetlands throughout the Waterways of the West region are susceptible to degradation and loss of biological values, resulting from urban development and climate change. As an example, three priority wetlands identified in the *Healthy Waterways Strategy* in the Waterways of the West region have effectively been lost since 2018 through the direct impacts of urban development. We identify that a perceived lack of clarity of Melbourne Water's responsibility to protect and manage these wetlands is contributing to their vulnerability.

Waterway values is a term used to describe the range of benefits that waterways provide and includes aspects across environmental, social, cultural and economic values.

The Healthy Waterways Strategy uses a subset of nine representative measures, termed 'key values' to represent the range of environmental and social values. These include birds, fish, frogs, macroinvertebrates, platypus, vegetation, amenity, community connection and recreation.

We consider that Melbourne Water is best placed to continue in the role of 'Caretaker of waterway health'. This will capitalise on their extensive experience and technical expertise in delivering waterway health programs, strong partnerships with other agencies and the community, and access to ongoing funding to deliver these programs. However, we recommend establishing a more clearly defined obligation for Melbourne Water to protect the region's wetlands on both public and private land. This will provide a strengthened remit for the advocacy and resourcing of wetland protection.

<sup>10</sup> The Waterways and Drainage Investment Plan: 2016–2021 outlines Melbourne Water's program of works.

Achieving the Healthy Waterways Strategy's ambitious targets of maintaining and, where possible, improving waterway condition across the Waterways of the West region will require collaboration between Melbourne Water, state and local government, the Traditional Owners, community, other land managers and the land development sector. We recommend that as part of Melbourne Water's role as 'Caretaker of waterway health', it continues to lead the collaboration for the implementation of the Healthy Waterways Strategy. However, without adequate funding – including revenue from the Waterways and Drainage charge – Melbourne Water and other partners will be limited in their ability to deliver the required programs, placing significant risk to the waterways and meeting the community's expectations. It is essential that the government policy and priorities enable the collaboration and delivery of the Healthy Waterways Strategy.





Implement the remaining recommendations made by the Improving Stormwater Management Advisory Committee – in particular, the place-based stormwater performance objectives as articulated in Recommendation 10.

#### Rationale and implementation detail

Increased stormwater volume, generated from urban growth across the Waterways of the West region, presents a major threat to waterway health. Changes to waterway flow regimes as a result of additional stormwater discharge degrades waterway ecology, water quality and impacts riverbank erosion. Pollutants and litter carried by stormwater also negatively affects water quality and amenity.

Waterway health will continue to decline if existing standards for stormwater management are applied in future subdivisional developments, even if they meet current environmental performance objectives for stormwater.

The Victorian Government has committed to improving stormwater management for greener environments and healthier waterways, with this expressed in Water for Victoria, Plan Melbourne 2017–2050 and Yarra River Action Plan Wilip-qin Birrarung

murron and the Port Phillip Bay Environmental Management Plan 2017–2027.

In line with policy direction, the Victorian Government established the Improving Stormwater Management Advisory Committee in 2018 to provide advice to government on measures to improve stormwater management. Their recommendations encompass planning system reforms, future policy directions and actions to support these practice changes including tools, training and capacity building.<sup>11</sup>

We recognise the substantial work being undertaken to implement the Improving Stormwater Management Advisory Committee recommendations. Some have been implemented in full, including the introduction of new provisions under the Victoria Planning Provisions. These new provisions expanded stormwater management requirements to commercial, multi-dwelling and industrial subdivisions and developments. Work on the other recommendations is ongoing.

We recommend implementing the remaining Stormwater Management Advisory Committee recommendations, particularly place-based stormwater performance objectives. These would ensure locally specific waterway values and vulnerabilities are better protected from future urban development. For the rapidly transforming west, these place-based objectives would provide a clear basis to inform where interventions could have the greatest benefit – such as including more

stringent planning controls or investment in large scale stormwater harvesting or other integrated water management initiatives.

The importance of place-based objectives was also identified in *Water for Victoria* (2018) and the *Healthy Waterways Strategy*, which set ambitious flow-based objectives including in stormwater management priority areas in both the Maribyrnong River (*Mirranburnum*) and Werribee River (*Wirribi Yaluk*) catchments. A review of the current EPA stormwater performance objectives is currently underway – flow reduction objectives are being considered.





## **Glossary**

Amenity: Amenity encompasses all aspects that enhance community wellbeing. This can include landscape and environmental features, the quality and extent of open space and recreation infrastructure, opportunities to connect with culture and heritage, and the particular characteristic of place that are meaningful for communities.

**Biodiversity:** The number and variety of plants, animals and other living beings (including microorganisms) across our land, rivers and oceans. It includes the diversity of their genetic information, the habitats and ecosystems in which they live, and their connections with other life forms.

**Biodiversity Conservation Strategy (BCS):** The BCS is the Victorian Government's overarching strategy for protecting biodiversity in the state's growth corridors. It outlines matters of national and state environmental significance, including individual plant and animal species and vegetation communities (among others), and outlines the conservation measures that must be implemented to mitigate impacts to these matters resulting from urban development.

**Blue-green corridors:** Blue-green corridors are a conceptual framework for considering the waterway (blue) and adjacent lands (green) as a single, interconnected natural infrastructure corridor.

Caring for Country: Traditional Owners have tangible and intangible connections to their Country. This cultural, spiritual and physical connection is simultaneously intertwined with identity, traditions, unique knowledge, rights and responsibilities, family, language and wellbeing. Traditional Owners have a deep cultural obligation to care for and look after Country.

**Catchment:** An area of land where run-off from rainfall goes into one river system.

Catchment Management Authorities: Catchment Management Authorities are responsible for the integrated planning and coordination of land, water and biodiversity management in each catchment and land protection regions.

**Community:** Includes individuals, public and private landholders, community groups and business owners.

**Country:** Amongst other things, Aboriginal culture includes relationships to the lands, waters, Ancestral beings, family, flora and fauna of geographically defined areas. To Traditional Owners, Country is a part of identity and is deeply personal. Traditional Owners have unique rights, responsibilities and obligations to Country.

**Country Plans:** Country Plans are prepared by the Traditional Owners and are often written in the context of Western land use and access practices. They are tools for articulating Traditional Owner priorities and aspirations for looking after Country to third parties. They can be strategic plans that encompass physical and spiritual concepts of Country, provide a strategic basis for partnerships, and identify management actions and economic opportunities.

**Cultural flows:** While Cultural flows can support the outcomes of environmental flows, they also have spiritual, cultural, social and economic purposes with connection to Traditional Owner cultures, identities, prosperity and physical wellbeing. Cultural flows are legally and beneficially owned by the Traditional Owners and are of an adequate quantity and quality to meet the Cultural flow outcomes, as defined by the Traditional Owners.

**Cultural values:** Can be a combination of tangible and intangible connections. Among other things, this can include physical expression of cultural heritage, and intangible elements such as relating to cultural, spiritual and/or economic relationships to Country, language, song lines, stories or sacred places. Cultural values are determined by the Traditional Owners of the land and water and can be location and Traditional Owner group specific.

**Ecosystem:** A dynamic complex of plant, animal, fungal and microorganism communities and the associated non-living environment interacting as an ecological unit.

#### **Environmental Water Entitlement:** An

environmental water entitlement is a legal right to access a share of water available at a particular location or locations, subject to certain rules and conditions. Environmental water entitlements provide a right to water that can be actively managed to benefit the environment.

**Ephemeral waterway:** A stream that flows only briefly during and following a period of rainfall in the immediate locality.

**Estuaries:** The zone where a waterway meets the sea, influenced by waterway flows and tides and characterised by a gradient from fresh to salt water.

**Greenfield land:** Undeveloped land identified for residential or industrial/commercial development, generally on the fringe of metropolitan Melbourne.

Gigalitre (GL): One billion (1,000,000,000) litres.

**Healthy Waterways Strategy (HWS) 2018:** A shared strategy across Melbourne Water, state and local government, water corporations and the community. The strategy provides strategic direction towards a regional vision for the health of rivers, estuaries and wetlands in the Port Phillip and Westernport region.

#### Melbourne Strategic Assessment (MSA) program:

A Victorian Government program to manage the impact of urban development on significant

vegetation community and plants and animals in Melbourne's growth areas. The MSA program applies to areas within Melbourne's 2010 defined urban growth boundary, however it does not cover those areas which were subsequently incorporated when the urban growth boundary was expanded in 2012. The MSA program included a strategic assessment, made under the Commonwealth Environment Protection and Biodiversity Conservation Act 1999, of impacts to nationally listed species and vegetation communities within Melbourne's growth areas.

**Planning controls:** Are a suite of statutory tools within planning schemes used to control land use and development. Planning controls explain the standards and restrictions for new development and may apply to a location (suburb, street or single lot), types of development (dwellings, villas), or a component of the development (provision of car parking, control of stormwater).

Precinct Structure Plans (PSPs): PSPs are high-level masterplans, or 'blueprints', prepared at the precinct scale for new urban areas, and are used extensively in greenfield development areas. They detail future land use and urban layout including roads, drainage systems, shopping centre, schools, parks, housing, employment and connections to transport. They seek to resolve the complex issues of biodiversity, cultural heritage and infrastructure provision. Precinct structure planning is coordinated by the Victorian Planning Authority, in partnership with other agencies and local councils. Once PSPs are approved by the Minister for Planning, they are incorporated into local planning schemes to guide the use and development of land in those precincts.

Ramsar wetlands: Wetlands of international significance designated under the International Convention on Wetlands of International Importance (Ramsar Convention). Ramsar wetlands are recognised for being either representative, rare or unique or important for conserving biological diversity.

Registered Aboriginal Parties (RAP): Are Traditional Owner groups, legally recognised under the Aboriginal Heritage Act 2006. Under this Act, RAPs are recognised as the primary guardians, keepers and knowledge holders of Aboriginal cultural heritage. They have important roles and functions in managing and protecting Aboriginal cultural heritage in Victoria.

**Riparian:** Land or vegetation that adjoins a river, creek, estuary, wetland or lake.

**Stormwater:** Surface run-off from rain and storm events that enters the drainage system. Urban areas, with extensive impervious surfaces such as roofs and roads, results in increased stormwater run-off.

**Traditional Knowledge:** Knowledge unique to Traditional Owners of Country, that is (a) not necessarily known to the general public, (b) may not be intended to be made known to the general public, and (c) not always known to every person within a Traditional Owner community (e.g. rites of passage and lore).

**Traditional Owners:** People who through membership of a descent group or clan, are responsible for caring for particular Country. Traditional Owners are authorised to speak for Country, its resources and stories. They have unique rights, responsibilities and knowledges.

**Tributaries:** A freshwater stream that feeds into a larger stream or river. The point where a tributary meets the mainstem is called the confluence. Tributaries do not flow directly into the ocean.

**Urban growth areas:** These are locations on the fringe of metropolitan Melbourne designated in planning schemes for large scale transformation over many years, from greenfield land to urban uses.

**Urban growth boundary (UGB):** The geographic limit, or boundary, for the future urban area of greater Melbourne. It includes both established urban areas and greenfield urban growth areas.

**Urban heat island effect:** When the built environment absorbs, traps, and in some cases directly emits heat, causing urban areas to be significantly warmer than surrounding non-urban areas.

**Wastewater:** Water derived from industrial, domestic, agricultural or commercial activities.

Waterway health (waterway condition): Waterway health (or waterway condition) is an umbrella term for the overall state of key features and processes that underpin functioning waterway ecosystems. This includes species and communities, habitat, connectivity, water quality, riparian vegetation, physical form, and ecosystem processes such as nutrient cycling and carbon storage.

**Waterway management district:** This term is used in the *Water Act 1989* to delineate an area of operation and responsibility for a water authority, such as Melbourne Water.

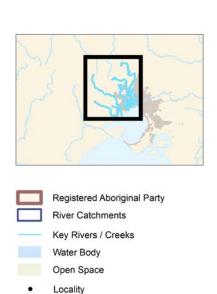
Waterway values: This term is used to describe the range of benefits that waterways provide – covering environmental, social, cultural and economic values. The Healthy Waterways Strategy uses a subset of nine representative measures, termed 'key values' to represent the range of environmental and social values. These include birds, fish, frogs, macroinvertebrates, platypus, vegetation, amenity, community connection and recreation.

**Waterways:** Rivers and streams, their associated estuaries and floodplains (including floodplain wetlands) and non-riverine wetlands.

Waterways of the West: Refers to all waterways and their surrounding lands within the Werribee River (Wirribi Yaluk) and Maribyrnong (Mirrangbamurn) River catchments and the Moonee Ponds (Moonee Moonee) Creek sub-catchment — as described in the Healthy Waterways Strategy. It encompasses the main waterway stem, their tributaries and wetlands within these catchments.

**Wetlands:** Wetlands are areas, whether natural, modified or artificial, that hold static or very slowmoving water and develop — or have the potential to develop, biota adapted to inundation and the aquatic environment. Wetlands may be fresh or saline and may hold water permanently or have dry periods.

## Appendix 1 – Map of Registered Aboriginal Party Boundaries



Rail Network

Urban Extent

Local Government Area



## Appendix 2 – Agencies invited to the Waterways of the West Reference Group

Brimbank City Council	Moorabool Shire Council	
Bunurong Land Council Aboriginal Corporation	Moreland City Council	
City of Melbourne	Parks Victoria	
City West Water	Port Philip and Westernport Catchment	
Environment Protection Authority Victoria	Management Authority	
	Southern Rural Water	
Hobsons Bay City Council	VicRoads  Victorian Fisheries Authority	
Hume City Council		
LeadWest	Victorian Planning Authority	
Macedon Ranges Shire Council		
	Western Water	
Maribyrnong City Council	Wyndham City Council	
Melbourne Water		
	Yarra Valley Water	
Melton City Council		
Moonee Valley City Council		

# Appendix 3 – Roles and responsibilities of key agencies and organisations in planning for and managing the Waterways of the West and their lands

	Institution	Roles and responsibilities
	Local councils	Councils are established by the Local Government Act 1989 and have responsibilities for land use planning and management including open space under the Planning and Environment Act 1987. They develop local planning frameworks, govern planning approvals for the use or development of private land and issue and enforce planning permits; and they have public health and emergency management roles. They also provide stormwater drainage services to areas of less than 60 ha and manage Crown land as committees of management.
		Local councils in the Waterways of the West region include Wyndham, Hobsons Bay, Moorabool, Macedon Ranges, Hume, Maribyrnong, Brimbank, Moonee Valley, Melbourne, Melton and Moreland.
	Department of Environment, Land, Water and Planning (DELWP)	DELWP is a Victorian Government department that develops and implements statewide policy for waterway health, flood management, urban water and planning. It manages Crown water frontages and other Crown land reserves, protects biodiversity, oversees the water allocation framework and is responsible for the planning and delivery of key open space projects in the region. It also administers the Parks and Reserves Trust Account.
Water	City West Water	City West Water is a retail water company that provides drinking water, sewerage, trade waste and recycled water services to the inner and western suburbs.
	Melbourne Water	Melbourne Water is a wholesale water company that provides bulk water and sewerage services to water corporations in the metropolitan area, provides stormwater drainage and waterway management services and manages diversion licences in the Yarra River catchemt, lower Maribyrnong River ( <i>Mirrangbamurn</i> ) and some western tributaries. It also collects the waterways and drainage charge.
	Southern Rural Water	Southern Rural Water is a rural water corporation that manages the Bacchus Marsh and Werribee irrigation districts, reservoirs (such as Pykes Creek, Melton Merrimu and Rosslynne reservoirs) and water diversion licences in the Werribee River ( <i>Wirribi Yaluk</i> ) and upper Maribyrnong River ( <i>Mirrangbamurn</i> ) catchments, as well as groundwater licences.
	Western Water	Western Water is a regional water corporation responsible for delivering water (including recycled water) and sewerage services north-west of Melbourne.
	Barwon Water	Barwon Water is a regional water corporation responsible for delivering water, sewerage and drainage services to the Geelong region. It manages some small reservoirs in the headwaters of the Little River ( <i>Worrin-yaloke</i> ) catchment.
	Victorian Environmental Water Holder	The Victorian Environmental Water Holder is an independent statutory authority under the <i>Water Act 1989</i> that manages environmental water entitlements.

	Institution	Roles and responsibilities
Environment	Environment Protection Authority Victoria (EPA)	Environment Protection Authority Victoria is an independent statutory authority under the <i>Environment Protection Act 2017</i> that protects human health and the environment from the harmful effects of pollution and waste.
	Parks Victoria	Parks Victoria manages public land including some waterway lands for conservation, recreation, leisure, tourism and water transport, and it manages land used for public purposes.
	Port Phillip and Westernport Catchment Management Authority (CMA)	The Port Phillip and Westernport CMA develops and coordinates the implementation of its <i>Regional Catchment Strategy</i> , focusing mostly on land and terrestrial biodiversity management issues.
	Committees of management	$Committees\ of\ management\ manage\ Crown\ land\ reserves\ set\ a side\ for\ the\ benefit\ of\ the\ Victorian\ community.$
Cultural	Registered Aboriginal Parties (RAPs)	RAPs are established under the <i>Aboriginal Heritage Act 2006</i> and manage and protect Traditional Owners' cultural heritage in Victoria. There are two RAPs in the Waterways of the West region: the Wurundjeri Woi wurrung Cultural Heritage Aboriginal Corporation and the Wathaurung Aboriginal Corporation.
Planning	Victorian Planning Authority (VPA)	The VPA is a state government statutory authority that undertakes strategic planning and coordinates infrastructure for strategically important precincts, so Victorians have equitable access to employment, public transport, public open space and affordable housing.
	Development Victoria	Development Victoria develops and revitalises public buildings and land. It works to increase the diversity of housing near jobs, transport and services and to revitalise major activity centres and urban precincts, to stimulate economic activity and create jobs.
	Precincts, suburbs and regions (Department of Jobs, Precincts and Regions)	Precincts, suburbs and regions partners across government and with community, industry and research organisations to unlock the potential of priority precincts and suburbs across Melbourne.  It works to develop distinctive, innovative geographic areas — be they precincts or suburbs — where Victorians can work, live and play.
Economic regulation	Essential Services Commission (ESC)	The ESC assesses and approves water prices, specifies service standards and reports on the performance of water corporations and local governments.

## **Appendix 4 – Improving Stormwater Management Advisory Committee Recommendations**

Recommendations 1 and 3 have been implemented in full.

#### **Planning reforms**

**Recommendation 1 – Expand the stormwater planning provisions (phase 1):** That the Victorian Government amend the VPPs to expand the current stormwater management requirements to:

- commercial subdivisions and developments
- industrial subdivisions and developments
- public-use developments
- multi-dwelling residential subdivisions and developments.

Recommendation 2 – Expand the stormwater planning provisions (phase 2): That, subject to further consultation, the development of deemed-to-satisfy solutions (rec. 12), adequate guidance and tools (recs 13, 14 and 15) and offset processes (rec. 5), the Victorian Government amend the VPPs to expand the current stormwater management requirements to:

- single-dwelling developments
- extensions over 50 m<sup>2</sup>.

Recommendation 3 – Insert an IWM clause into the Planning Policy Framework (PPF): That the Victorian Government amend the PPF to embed the concepts of IWM objectives and strategies.

#### **Future policy directions**

**Recommendation 4 – Amend the building and plumbing controls:** That DELWP progress, through a regulatory impact statement, amendments to the Victorian variation to the Building Code of Australia and supporting regulations, to ensure that consistent stormwater requirements are applied to all development types.

**Recommendation 5 – Establish effective offsetting arrangements:** That DELWP investigate establishing voluntary stormwater quality offset schemes across Victoria in major metropolitan and regional centres that:

- allow developers and owners to meet stormwater quality obligations off-site rather than on-site
- enable local governments, Melbourne Water and other water corporations to provide off-site stormwater solutions
- establish cost-effective arrangements that achieve statewide and local benefits
- tie payments to off-site stormwater management infrastructure that delivers the same or better environmental outcomes than on-site infrastructure.

**Recommendation 6 – Clarify local governments' roles and responsibilities:** That DELWP investigate opportunities to clarify councils' stormwater management functions in legislation (such as in the *Local Government Act 1989* or the *Water Act 1989*).

**Recommendation 7 – Strengthen compliance requirements:** That the Victorian Government examine using the provisions of the *Environment Protection Act 2018* to establish clear, enforceable obligations on land and infrastructure (such as roads) managers.

Recommendation 8 – Determine funding sources for public stormwater infrastructure: That DELWP work with councils, Melbourne Water and the Victorian Planning Authority to determine appropriate funding sources for managing and maintaining stormwater infrastructure.

**Recommendation 9 – Link water management** with urban planning: That DELWP consider amending the VPPs to include linkages with IWM plans (when developed), to ensure new developments within these plans are designed to deliver IWM–servicing solutions.

**Recommendation 10 – Set stronger, place-based BPEM stormwater performance objectives:** That the EPA consider place-based, and flow, stormwater performance objectives as part of its current review of the BPEM, to protect the ecological health of sensitive downstream waterways and bays, enhance amenity and recreational values and reduce flooding.

## **Supporting actions**

## Recommendation 11 – Strengthen enforcement of stormwater construction requirements: That:

- the EPA, DELWP and local governments work together to develop an effective enforcement program to lift the standard of construction site management in Victoria
- the EPA and Melbourne Water review their guidance about construction techniques for sediment and pollution control for larger developments, to make them up-to-date and enforceable.

**Recommendation 12 – Prepare deemed-to-satisfy solutions:** That DELWP prepare deemed-to-satisfy solutions for typical development types.

**Recommendation 13 – Review the STORM and MUSIC tools:** That DELWP review current funding and governance arrangements for the STORM and MUSIC modelling tools to ensure adequate investment in updating and maintaining the tools to meet industry needs in Victoria.

#### Recommendation 14 – Build technical expertise:

That the Victorian Government support the development and provision of training to build the capacity of councils and stakeholders to implement the recommended changes to the VPPs.

#### Recommendation 15 - Improve guidance:

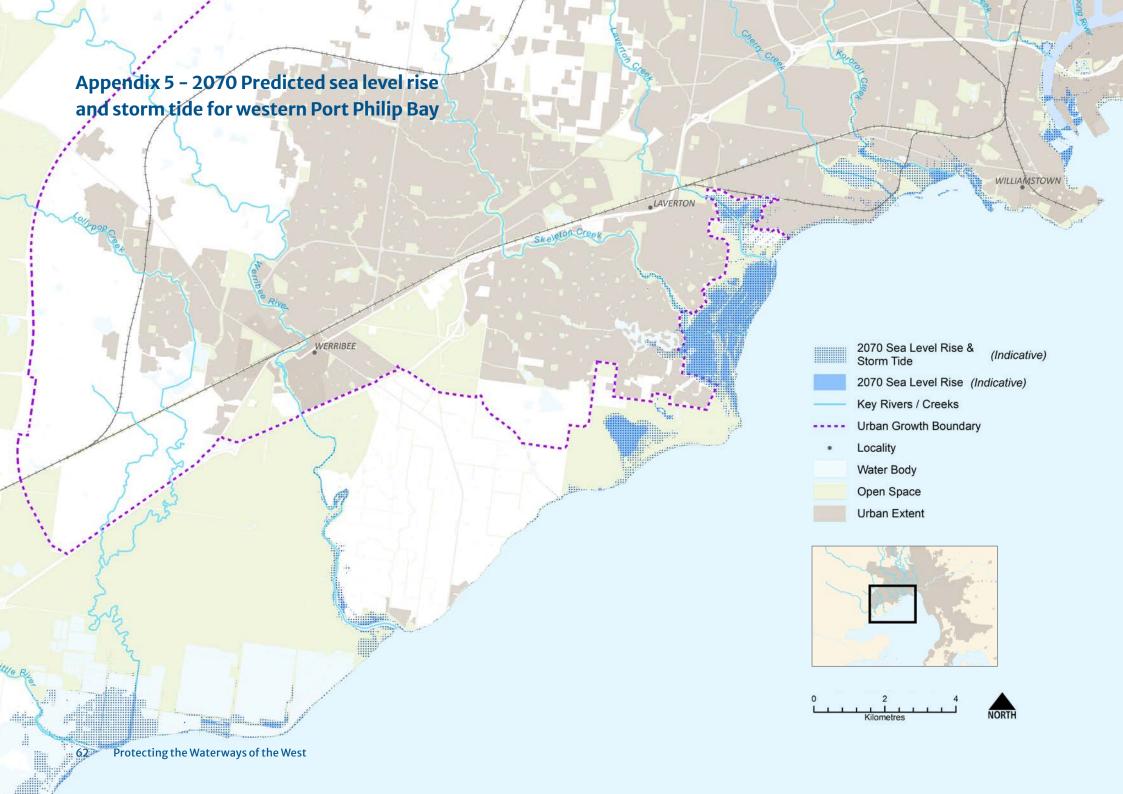
That DELWP revise guidance material about IWM to support implementation of the recommended changes to the VPPs.

**Recommendation 16 – Improve awareness of the VPP changes:** That DELWP promote awareness of changes to the VPPs to the general public and the building and development industries.

# Recommendation 17 – Investigate options for rainwater tank maintenance and operation:

That DELWP investigate options for improving the maintenance and operation of rainwater tanks.

**Recommendation 18 – Broaden rating systems to include IWM:** That DELWP examine broadening the Victorian Energy Efficiency Scorecard or other building and development rating systems to include IWM elements (such as stormwater management and water efficiency).



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