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The Productivity Commission GPO Box 1428 Canberra City ACT 2601

Dear Commission

### MURRAY DARLING BASIN PLAN IMPLEMENTATION REVIEW

The National Parks Association of NSW (NPA) appreciates the opportunity to comment on the implementation review by the Productivity Commission on the Murray Darling Basin Plan

NPA's mission is to protect nature through community action. Our strengths include State-wide reach, deep local knowledge, evidence-based input to policy and planning processes, and over 65 years' commitment to advancing the NSW protected area network and its professional management. We also provide outstanding opportunities for experiencing and learning about nature through our unrivalled program of bushwalking, field surveys, bush regeneration and other outdoor activities.

#### **General comments**

The Murray–Darling Basin is the largest and most complex river system in Australia. The aim of the Murray–Darling Basin Plan is to bring the Basin back to a healthier and sustainable level of harvest. A cornerstone of the strategy for managing water resources in the Basin is **adaptive management** – 'learning as you go' by trialling techniques, monitoring, and making changes as needed. That is: water managers must be flexible and dynamic to achieve the best possible outcomes. A key theme underpinning the NPA's submission is that the overall environment within which the plan operates has changed since the APCC 2018 review and changes need to be made to adapt to this new situation. Moreover, our submission will identify where water managers have been recalcitrant rather than adaptive in order to highlight that time has been wasted, making the need for change more urgent.

Specifically, our submission seeks to address six key questions:



- 1. What needs to change to ensure water recovery targets are met and that supply and efficiency measures are delivered? What lessons can be learnt from past experiences?
- 2. Are the current arrangements for implementing the Murray-Darling Basin Plan operating effectively? How could the arrangements be improved?
- 3. Have the governance and institutional arrangements for the Plan including the arrangements for compliance and monitoring, evaluation and reporting proved effective? What changes would you recommend?
- 4. How well is the Plan responding to a changing climate? How should this be improved?
- 5. How well is the Plan addressing the interests of Aboriginal people?
- 6. How well has community consultation and engagement been conducted/ How can this be improved?

It is the NPA's understanding that the APCC is particularly interested in whether implementation of the Basin Plan has been effective and efficient, and in whether institutional and governance arrangements are fit for purpose. And that the Commission will also look to the future and consider how the framework could be simplified or otherwise improved, without undermining its key objectives.

## I. What needs to change to ensure water recovery targets are met and that supply and efficiency measures are delivered? What lessons can be learnt from past experiences?

A legacy of political decisions has rendered policy settings so narrow that they have made water recovery targets impossible to meet ahead of the 2024 deadline (Environment Victoria 2024). It has led to reliance on infrastructure projects to deliver both 'Bridging the Gap' water and the additional 450GL It means current mechanisms are slow, uncertain, expensive, have a higher private/public benefit ratio and are unlikely to deliver promised environmental outcomes.

After 11 years of effort, the MDBA found that sixteen key SDLAM projects were unlikely to be operable by 30 June 2024, and the Authority estimated a shortfall in water recovery of between 190 and 315 gigalitres. They are clearly an inefficient and ineffective approach.

Yet there is considerable research showing voluntary buy backs are a more effective and efficient way to <u>achieve Basin outcomes</u>. This means open tender, voluntary water purchases must be resumed as a key cost-effective and transparent mechanism for meeting water recovery targets across the Basin.

The narrowing of options needs to be reversed more broadly beyond just water recovery. The reliance on infrastructure projects, both on and off farm, to recover water must be reduced, as these projects are high cost and low return in terms of environmental outcomes. Instead, the scope of 'policy tool' options should be expanded to include a variety of property rights instruments so that the financial resources applied to realize Basin outcomes also achieve multiple objectives. For example, the acquisition of flood easements is another way to address constraints, but other similar instruments include various forms of options contracts, private land nature conservation, land acquisition and payments for ecosystem services to land managers, or leases and licensing arrangements for the supply of constraints relaxation as an ecosystem service. Basin state and territory governments should also consider how planning laws could be used to gazette flood zones for both natural floods and environmental flows.

The example of private nature conservation covenants mentioned above for flood prone lands would not only help address constraints but also extend the amount of wildlife corridors across the basin and help the Commonwealth to meet its obligations under the Kummings-Montreal agreement.

Given the overall situation the Commonwealth's finances, the likely impact of climate change on water availability in the Basin, and the delays that have occurred over last decade, it is critical that a more agnostic approach that allows limited financial resources available to realise multiple environmental outcomes must be applied.

## 2. Are the current arrangements for implementing the Murray-Darling Basin Plan operating effectively? How could the arrangements be improved?

The Water Act 2007 provides the legislative framework for the Murray–Darling Basin. The Act explicitly excludes structures managed by the Snowy Hydro scheme, which means the environmental, cultural and social outcomes for headwaters of the Murray, Murrumbidgee and Snowy sit outside the basin plan. Being at the top end of the catchment, this administrivia arrangement has impacts downstream.

Even allowing to the commercial importance of the snowy schemes, having the Act simply exclude structures by Snowy Hydro presents a clear risk to biodiversity in the basin given the infrastructure plans for Snowy 2.0. There must be some legislative requirement/obligation by Snow Hydro to account for its impact on the health aquatic native fauna in the Basin and to consider the MDBA native fish strategy.

The Basin Plan is a collection of sub-catchment plans. So, in terms of water resource plans, there also needs to be greater consistency between planning regions and states. Specifically, this would include:

- a common template for water resource plans that is applied across all state water resource plans.
- considerations of connectivity towards the whole. Water resource plans must be required to
  interact with adjacent plan areas. The connectivity includes plan areas that are side by side,
  overlapping groundwater and surface water plan areas, and upstream/downstream relationships
  such as end of system flow targets based on the environmental watering requirements of
  downstream catchments.
- clear and consistent terminology applied to water types across states and across water plans. That is, we create basin wide terminology for things such as planned environmental water.

# 3. Have the governance and institutional arrangements for the Plan – including the arrangements for compliance and monitoring, evaluation and reporting – proved effective? What changes would you recommend?

It is critical that Basin Plan implementation is robustly monitored and evaluated.

Current arrangements are somewhat convoluted. The Murray-Darling Basin Authority (MDBA), the Commonwealth Environmental Water Holder (CEWH), the Department of Agriculture and Basin states (the parties) have various reporting and evaluation requirements related to Basin plan implementation. In addition to the annual and five-yearly reporting requirements under Schedule 12 of the Basin Plan, Basin states have reporting obligations under the National Partnership Agreements (NPA) and the Murray-Darling Basin Plan Implementation Agreement (BPIA). The Productivity Commission also has responsibility for assessing the effectiveness of the implementation of the Basin Plan and associated WRPs every five years.

These arrangements are a reflection that Murray-Darling Basin spans multiple jurisdictions and is being managed simultaneously by six different governments.

Yet the extent of specific fit for purpose reviews are an indication there are gaps in the framework. Examples include the South Australian Royal Commission, the Northern Basin Commissioner, and the Inspector General water compliance. It is therefore critical that there is adequate cross-jurisdictional transparency and oversight of the resource so the need for continual 'add-ons' is reduced.

What changes are recommended? One overall issue is that a significant amount of work done or commissioned lacks independent peer reviewed creditability. First: transparency is often lacking in the underpinning data, equations and assumptions underpinning the modelling. This is particularly true for socio-economic studies. For example, reviews about some claims over the employment impacts of the Basin Plan have found there has been based on incomplete model specification (plus errors in analysis, data and assumptions) and erroneous conclusions. Second: when reporting on outcomes of Basin works, data is often provided or collected in different ways which inhibits cross-comparison between years and areas. A good example is the record of use by the CEWH across basins through the years.

This indicates monitoring and reporting needs to be enhanced, simplified and consolidated across state and Commonwealth agencies to better inform management and the public; and that such monitoring and reporting should subject to peer review.

In other situations, there lack of alignment between desired outcomes and operations. The result being practical realities make the Basin goal impossible to realize. For example, operational limits on water availability, delivery and other constraints, have resulted in a mismatch between Basin environmental watering priorities and what can be achieved in reality. The ban on buybacks has been influential in creating the situation. This situation is likely to worsen under climate change.

Being a multi-jurisdictional arrangement, it leads to some states favouring self-interest over collective good. For example, NSW has failed to co-operate with the implementation of the Basin Plan, dragged its heals over the submission of water resource plans, and has threatened, on various occasions, to pull out of the Plan. The 2018 Productivity Commission review of Basin Plan implementation commented on the same situation – stating there was a lack of co-operation between partner governments and their refusal to support basin plan outcomes in the national interest, preferring to advance their own sectoral interests. Given this has continued, there should be disincentives for states to act in this way. For example, sanctions or penalties for States could be imposed should they overdraw water in ways that are inconsistent with their commitments to reduce extraction.

The Inspector-General plays an important role in monitoring the basin plan. The roles hold governments to account for their decisions and ensure laws and rules are being complied with in the Basin. Yet at a Senate Estimates hearing in May 2023, the Inspector General of Water Basin Compliance Troy Grant said: *"The legislation has got more 'get out of jail' clauses and opportunities than a Monopoly board. It needs review."* Clearly a systematic process for assessing compliance with water resource plans should be developed as part of the Inspector General's regulatory policy.

Finally, it is the NPA's view that the National Water Commission needs to be reinstated so that independent research and oversight of national water reform is undertaken with a consistent, transparent and scientific approach. The National Water Initiative (NWI) gave states guidelines and linked funding to progress on objectives, this has not been a feature of the MDBA plan where the lack of federal incentivized accountability in the Plan design and execution is at least a partial explanation for failure to finalise State water resource plans.

#### 4. How well is the Plan responding to a changing climate? How should this be improved?

The Murray Darling Basin is an extremely diverse region that makes a significant contribution to Australia's economic growth and food security. It also supports many different terrestrial and aquatic environments including forests, woodlands, shrublands and grasslands as well as in river and wetland systems.

The impact of climate change is already evident in the basin. Climate change since the 1990s has drastically reduced the amount of water available in the southern part of the basin. For example, the height of the Murrumbidgee River — the third longest in Australia and highly valued for irrigation and hydro-electricity — has dropped by about 30% during the growing season (Speers et al 2020).

The Basin will continue to change. The BOM submission to the APCC states that the future is likely to be warmer, drier and include more frequent droughts and extreme weather events. This means there is likely to be a projected long-term decline in water supply, making water more precious in future. Yet under s 64 of the Cwlth Water Act, a water resource plan has a lifespan of 10 years at which time the plan can be extended by the Minister with no requirement for a review. This not a very 'adaptive' approach given the current rate of change.

The implications are profoundly disturbing, because it means the economic, social and ecological sustainability of many of our river catchment is at stake and our approach is not agile.

#### So, what are the implications?

Almost all biodiversity will be affected by climate change in the Murray Darling Basin. However, some areas will be more affected than others. Alpine areas, coastal fringing habitats including wetlands, and

freshwater systems are probably the most vulnerable. Increased temperatures may also affect the survival and breeding of certain groups of animals. For example, some species of native fish have very specific temperature requirements. Amphibians are also highly vulnerable to climate change. Drought and warmer-than-average temperatures are key factors causing the <u>deaths of the snow gum forests</u> (Eucalyptus pauciflora), within Kosciuszko National Park

There is also the movement of species to consider. Predicting how our populations, species and communities will respond to climate change is challenging as each ecosystem is likely to react differently. Some species will probably broaden their range while others will contract. Species with very specific living requirements may have to live in small pockets of suitable habitat (refugia). This makes them vulnerable to extinction from many factors including fires and storms. A good example is the <u>Macquarie</u> <u>Perch</u> and we will need to consider new approaches to conserve threatened species- such as ensuring there are 'back-up' or 'fail safe' populations of species when local area extinction happen.

For birds, animals and insects to successfully relocate they require both: i) a safe pathway (i.e., native vegetation through which they can safely travel that has sufficient food and habitat and is predator-free); and ii) a suitable new home.

Unfortunately, the Basin Plan does not seem to adequately consider this context. This is because the Basin plan is reliant on several sub-catchment plans developed by the various states under the agreement. It widely acknowledged that least four of the NSW's 13 water-sharing plans did not take the Millennium Drought into consideration when calculating water availability. In 2014 the NSW water minister pushed through an amendment to the laws to only consider droughts up to 2004 in assessing the worst drought on record. This caused over-allocation and serious deficiencies in water security during an intense drought, particularly in the Northern Basin River systems.

The South Australian Royal Commission also noted that there had not been an assessment of the climate risks to the Basin in developing the plan, or since its implementation. The Royal Commission therefore recommended that the MDBA, or another appropriately funded body, conduct a review on climate risks to the Basin. The MDBA and BOM is now providing new knowledge and information about the situation in the hope that the results will allow state and local governments, industry sectors and individuals to modify how they use water to ensure the long-term sustainability. However, it would seem the water sharing plans, and least for NSW, are not being audited. The Baron darling is a good example. There are many others and it would appear in some cases the recommendations from any reviews are ignored. It would seem the multiple jurisdictions that span the Basin are not always listening (or at worse choosing to ignore) to each other.

The NPA's conclusion from the above is:

- Water planning in the basin has been nobbled in NSW due to political decisions that have limited the scope of considerations about climate change.
- While the information about the impact and extent of climate change in the basin is becoming more apparent, current processes in water planning are not risk adverse or forward thinking.
- There appears to be little adaptive management implemented for some areas as the feedback (auditing and evaluation) loop is not maintained or well resourced.
- The ecological impacts on our wildlife due to climate change are highly likely to be profound and this will be compounded by our modification of the natural environment. Conservation efforts need to become risk adverse or forward thinking including:
  - providing better corridors and pathways (such as fishways/fish ladders that facilitate movement both up and down in waterways, and the removal of floodplain structures that inhibit the movement of fish during flood)
  - providing and maintaining suitable homes (such protected riparian environments that have water allocations).

This situation must be acknowledged in the review of the Basin Plan in 2026 and rectified in Basin Plan 2

#### 5. How well is the Plan addressing the interests of Aboriginal people?

The independence and views of the numerous Aboriginal Nations with a connection to the Basin and its water should not be compromised. Water carries great cultural, spiritual, environmental, social and economic significance to these people (Williams et al 2019).

Despite the National Native Title Council (2014) stating it believed the Water Act was failing in its management objectives for Aboriginal people some ten years ago, not much has changed. Back then the NNTC recommended there should be amendments to ensure:

- there is a framework which ensures the allocation and licensing of water rights for Aboriginal people; and
- Indigenous communities participate fully in water planning and management.

Yet it is clear Indigenous needs for water in over-allocated catchments are still not accounted for in water planning by the states, and gaps remain in the actual provision of water to Indigenous people to be managed by them.

The evidence to support this assertion includes:

- Many of the water resource plans created by the states only giving scant reference to Indigenous peoples' water. The introductory section to many of these plans also clearly shows several of the States have given inadequate provision (time, breadth and resources) to ensure consistent engagement with Indigenous people. This was borne out by the very few Indigenous people who participated in the water resource planning processes.
- Research by Hartwig, Jackson and Osborne (2020) found that Aboriginal entities hold just 0.2 % of all available surface water in the NSW part of the Murray Darling Basin, yet they make up 9.3% of the population.
- Across the basin the picture is similar: Indigenous surface water holdings constitute no more than 0.17% of the equivalent permitted take across the entire Basin. Groundwater entitlements held by Indigenous entities constitute 0.02% of all available groundwater. The approximate market value of these water entitlements is A\$19.2 million in 2015–16 terms, which equates to 0.12% of the total \$16.5 billion market value. In contrast, 5.3% of the Murray-Darling Basin population is Indigenous,
- In 2018, the Federal government committed \$40 million for water for First Nations people for economic and cultural purposes. No water has been bought with this money so far (MILDRIN 2020).

First Nations have called for redistribution of water rights for many years. The Echuca Declaration states 'Cultural Flows' are water entitlements that are legally and beneficially owned by the Indigenous Nations of a sufficient and adequate quantity and quality to improve the spiritual, cultural, environmental, social and economic conditions of those Indigenous Nations. This is our inherent right". So clearly there is an aspiration amongst the indigenous community to have greater water rights. Yet the above data points to a legacy of government inaction.

What might be the cause of the discrepancy? Hartwig, Jackson and Osborne (2020) also found water holdings by indigenous groups declined by at least 17.2 %, coinciding with water market expansion and that Aboriginal water holdings remain vulnerable to neoliberal policies. It seems several Aboriginal- held licences had short lifespans. This is unlike most NSW statutory licenses which are treated effectively as perpetual entitlements. Another factor was forced water sales that occurred via liquidation and insolvency processes. The insolvency being attributable to poor organisational management or governance. This, in turn, may indicate the need for some of the Commonwealth's financial resources devoted to securing water not only focus on purchasing the water as an entity, but also acknowledging healthy local community governance structures underpin ongoing water management.

All of the above indicates there has been an absence of government commitment to genuinely restore water rights to Indigenous communities (see <u>Conversation</u>). Government decision making still does not fully consider how important water is for indigenous people and their 'country' (MILDRIN 2020) The separation of land and water rights has precipitated a dispossession of the idea of 'country' as a 'whole'.

The NPA's view is the environment under which the plan will operate in the near future will have to change not only on 'just' terms as outlined above, but also because: i) government commitments have changed and ii) or predictions about climate change have become more accurate. Specifically:

- The Basin is changing, and the future is likely to be warmer, drier and include more frequent droughts and extreme weather events. There is a likely projected long-term decline in water supply making water more precious.
- The Australian Government has committed to protecting 30% of Australia's land and sea by 2030 and the various States have agreed to this commitment with the Commonwealth. Research by both the <u>RMIT</u> and Charles Sturt University shows meeting much of this commitment with require agreements via, Indigenous Protected Areas. Protecting and ensuring these environments remain healthy will require specific water allocations.

Thus, need for the wider community to depend on local indigenous communities to provide ecosystems services and conservation going forward when competition for access to the water resource will become more acute.

It is therefore imperative that governments: i) take account of the needs of the indigenous populations: listen to and learn from the ways they wish to manage water; ii) provide a framework for indigenous people that de-constructs the imperialistic neo-liberal perspective that continues to segregate water licences (such as cultural' purposes precluding economic activity), and iii) recognise that the security of long term indigenous water management may require some form of support to ensure the governance mechanisms around indigenous water use remain healthy and vibrant.

## 6. How well has community consultation and engagement been conducted/ How can this be improved?

Many people in the community feel over-consulted and under-heard. A key component that contributes to this assertion is the multi-jurisdictional nature of the Plan (see subheading 3 above). The complexity of the plan also contributes to this assertion. This situation undermines trust and allows unsubstantiated views to gain wide acceptance and power, including the perverse belief that Eddie McGuire and other celebrities holds substantial water rights

The phenomenon also leads to the propagation of other myths which are more believable because they resonate local farming communities. For example, both the NSW and Victorian governments and the MDBA have claimed that the irrigation industry has done the 'heavy lifting' in Basin Plan implementation. This resonates because it acknowledges change can be difficult, yet it conveniently ignores the fact that irrigators profited with a windfall gain when land and water lights were separated, nor that this separation was a necessary precursor to address overallocation which was damaging both the environment and the irrigation industry itself.

Thus, NPA acknowledges the operating environment for community consultation is difficult.

However, it is also clear the current approach to community consultation in the Plan is contributing. Community consultation processes by the MDBA are not professional (aka. 'Do what you say you will do when you say you will do it') nor best practice. Public engagement strategies can assume a variety of formats and they can run for varying lengths of time. However, IAP2 Australasia is the peak body for the community and stakeholder engagement sector. It has developed and recommends organisations apply the IAP2 spectrum because it provides clear definitions for particular approaches and requires an organisation to make a specific set of values transparent to the public. This spectrum is widely adopted across various levels of government and across various organisations in Australia. The MDBA has failed to implement this approach- the result being the community does not know whether one particular process is for information, to give legitimacy to a change, or whether the MDBA will consider and modify a proposal to include the public's views.

In other words, the community feel over-consulted and under-heard because there is no systematic or consistent process of community engagement over Basin issues. This creates an additional and unnecessary level of uncertainty.

Evidence to support this view includes:

- The authority promoting 'involvement' for a range of programs that clearly are not 'involvement' as per the IAP2. It also clearly creates confusion as MDBA's 'involvement' program includes a variety of possible relationships with the community.
- Regional community forums being used to give legitimacy to a change and asked to be propaganda to promote the organisation's 'good work' to the wider community. Rather than to "to hear from people about their stretch of the river, and their local region and community."
- Lack of transparency or criteria of how 'peak organisations' get selected onto that committee.
- When consultation does occur or when feedback is provided to the Authority there is no response published about whether that feedback resulted in change, no change, or was outside the scope etc.

Better community engagement would include clearer and simpler messages about what's at stake, who is involved, and the power relationship between the Authority and the public for the particular proposal (i.e., is it simply for information or will you implement what the public recommends?) Improved and consistent terminology about: informing, consulting, involving, collaborating, and empowering mean will lead to people being able to choose whether they do want to participate rather than feel over-consulted and under-heard.

#### **References:**

Hartwig,L.D., Jackson, S., and Osborne, N (2020) Trends in Aboriginal water ownership in New South Wales, Australia: The continuities between colonial and neoliberal forms of dispossession, *Land Use Policy*, 99, <u>https://doi.org/10.1016/j.landusepol.2020.104869</u>.

MILDRIN (2020) Research into how much water is held by First Nations in and Traditional Owner Organisations in the Murray-Darling Basin 2020: A First Nations Summary.

Speer, M.S., Leslie, L.M., MacNamara, S. et al. From the 1990s climate change has decreased cool season catchment precipitation reducing river heights in Australia's southern Murray-Darling Basin. Sci Rep 11, 16136 (2021). https://doi.org/10.1038/s41598-021-95531-4

Williams, D., Connolly, D & Williams, A (2019) The recognition of cultural water requirements in the montane rivers of the Snowy Mountains, Australia, *Australasian Journal of Environmental Management*, 26:3, 255-272

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Yours sincerely

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protecting nature through community action