



Public Submission

NSW Government: Reconnecting River Country Landholder Negotiation Framework

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Yarkuwa Indigenous Knowledge Centre,
Murray Irrigation Limited, West Corurgan Irrigation, Speak Up Campaign (Inc),**

Southern Riverina Irrigators (Inc)

**Berriquin Irrigators Council, Deniboota Landholders Association, Denimein Landholders Association,
Wakool Landholders Association, West Berriquin Irrigators**

Submission supported by



BACKGROUND:

Murray Regional Strategy Group (MRSRG) stakeholders continue to express strong concerns that the Murray Darling Basin Plan urgently requires review and an adaptive approach to achieve environmental targets.

MRSRG encourages DPE to recognise existing social and economic impacts in the Murray Valley and why previous programs for implementing SDL Projects and Constraints Projects have failed in the past.

MRSRG is supportive of the statement below from the NSW Government and look forward to continued negotiations with DPE to make the necessary changes required to the Reconnecting River Country Landholder Negotiation Framework (LNF), in order to achieve broader landholder/community endorsed outcomes in a timely manner.

NSW Government states *“it has gone back to the drawing board, looked at the lessons learned from previous consultations and has designed a program focused on working collaboratively and extensively with the community to meet local needs, using the best available and most recent science and modelling”* (Reconnecting River Country website accessed 7.4.22)

Appendix A outlines the history of water reform, since the conception of the Murray Darling Basin Plan, in particular the concerns for riparian landholders who will suffer third party impacts due to changes in river management under a relaxed constraints model. These impacts have flow on ramifications to the broader community as a result of lost productivity.

Furthermore, **Appendix B** outlines the concerns our region has because of past experiences, a major concern being that many of the principals and concerns associated with the Constraints Management Strategy (CMS) are lingering in the Reconnecting Rivers Project, leaving communities to feel the distrust associated with past programs. Our hopes are for a collaborative co-design approach to resolve the multiple needs for all water users, to date the LNF lacks the co-design principals associated with building trust.

Communities in the NSW Murray have long identified the issues associated with the delivery of increased quantities of environmental water, and the subsequent ramifications changes in management of this resources will have on landholders and communities. As such, to support and aid environmental water managers to ensure ecological outcomes are achieved, MRSRG developed the **NSW Murray Adaptive Road Map (Appendix C)**. This document outlines options to alleviate third party impacts resulting from the relaxation of constraints, and an acceptable pathway forward to maximise water delivery and ecological outcomes where communities are part of the solution. The NSW Murray Adaptive Road Map has wide community support.

The Reconnecting River Country Program: Landholder Negotiation Framework notes the Department is seeking submissions from interested parties on:

1. How the Department can work with landholders to achieve an efficient and acceptable process for reaching agreements; and
2. How a Framework (incorporated into regulation) can assist to provide clarity on the process landholders can expect the Department to follow in negotiating agreements in good faith.

Organisations and stakeholders within MRSG along with broader organisations within the Riverina have already provided the Department with a community excepted **Co-Design Engagement Framework (Appendix D)**, which shows the willingness and desire from communities to work with Government to achieve acceptable outcomes. This document provides a framework acceptable to communities for moving forward with the Reconnecting River Program (RRC), and Natural Resource Management in general.

Please refer to the below a small selection of identified concerns and recommendations from MRSG in the table below:

<p>Reconnecting River Country Overview – the LFN will address physical, policy and operational barriers to the delivery of water for the environment (pg. 2 LNF)</p>	<ul style="list-style-type: none"> • NSW Government has been on public record stating there will be no compulsory acquisition of land to implement the Constraints Management Strategy – now badged as Reconnecting River Country and/or Mid Murray Anabranch Project • Yet the purchase of easements is a consideration for delivery of the project. <p>Recommendation: NSW have previously stated there would be no compulsory acquisition, but NSW LNF is suggestive of a compulsory process. It is not clear how NSW Government would apply this process to Victorian counterparts who share the Murray River, given Victoria has been very public about not heading down the path of compulsory acquisition.</p>
<p>The proposed Framework process would consist of the steps shown in Figure 1 (pg. 4)</p>	<ul style="list-style-type: none"> • At the end of the process outlined in the LNF the NSW Water Act 2018 liability exclusions would still apply <p>Recommendation: Full disclosure of the exclusions need to be made publicly available.</p>
<p>Step 1: Identify affected Landholders (pg. 4)</p>	<ul style="list-style-type: none"> • Landholders take a variety of forms, the LNF needs to clear define a Landholder, which must include Council owned land and landholdings owned/managed by First Nations people • MRSG have not had input into what defines a flood plain and what categories will be used to assess who will be identified as an impacted landholder • There is no information available on the data / research used to guide DPE’s assessment criteria <p>Recommendation: Full transparency of the data used to base definition of an impacted landholder / floodplain. Work with MRSG through co-design (Appendix D) principals to develop a definition of a landholder and the assessment criteria to define an impacted landholder.</p>
<p>Step 2: Assessment of impacts (pg. 4)</p>	<ul style="list-style-type: none"> • MRSG are concerned DPE do not have a full awareness of the broad range of impacts which landholders and (flowing onto) communities face under the RRC project • Communities / Landholders have not been included in identifying impacts which will be used in the assessment • MRSG do not support the exclusions applied to the assessment of impacted landholders

	<ul style="list-style-type: none"> Flow on and value adding agricultural business who are not landholders are currently not considered in the assessment criteria, but all impact by river management and operation <p>Recommendation: Using the co-design principals work with MRSNG to develop a set of agreed impacts, and the numerous industries and business which will be impacted.</p> <p>Impacts include – business management adjustments, changes to timing of operations (e.g., lambing), reduced productivity leading to reduced employment for local ag services / and flow on value adding, land not available for grazing / sowing.</p> <p>Impacts to water quality for town drinking supplies as a result of increased flows / river heights</p>
Step 5: Options where agreement is not reached (pg. 6)	<ul style="list-style-type: none"> MRSNG does not support Arbitration. Alternative options including progression of community endorsed solutions, flow options and strategic use of infrastructure should all be part of the process prior to Arbitration A change of Government could see Land Acquisition become a very real threat, even if this Government does not consider this avenue as a feasible means of resolving the issue. <p>Recommendation: Using co-design principals as outlined in Appendix D work with MRSNG to develop solutions which recognise the full risks enshrined in legislation (e.g., River or Dam operating protocols) and develop appropriate strategies to address them for long term protection.</p>
Step 6: Agreement on mitigation of impacts (pg. 7)	<ul style="list-style-type: none"> MRSNG are concerned an overarching Deed of Agreement being proposed when underlying steps covered by the Deed are being prepared while there are still unresolved issues within the LNF There is no information about the process or time frames for the Negotiation Assistance Package <p>Recommendation: Please see Appendix E for co-design alternative approach to ensure collaboration and accepted framework for mitigation of impacts</p>
Amendments to the Water Management Act 2018	<ul style="list-style-type: none"> MRSNG have concerns about inequities as a result of incorrect assumptions made by NSW DPE and Water NSW about elevated flooding risks. <p>Recommendation: DPE apply the co-design engagement principal as per Appendix D to identify potential inequities which may occur as a result of incorrect assumptions</p>
Just Terms	<ul style="list-style-type: none"> The LNF refers to the Just Terms Act for treating property owners fairly, yet there are specific exclusions resulting in some landholders being treated unfairly.
Practical Examples	<ul style="list-style-type: none"> The LNF only address loss of access due to increased river heights, but there are far more reaching impacts than property access. <p>Recommendation:</p> <ol style="list-style-type: none"> Using the Co-design engagement model (Appendix D) work with MRSNG to identify the multiple examples of impacts due to increased river heights.

	<p>2. Using Appendix C, work with MRSG to deliver ecological outcomes using alternative models rather than solely relying on the Murray River for water delivery</p> <p>The LNF has not considered loss of income due to inundation of land, for example if a grazier has no where for sheep to graze during the inundation period or is about to start lambing and the lambing paddock becomes inundated for 3 months.</p>
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IN SUMMARY

MRSG appreciate the opportunity to provide feedback on the Landholder Negotiation Framework. MRSG have the following concerns –

- Unrealistic time frames resulting in a rushed process which will led to incorrect assumptions and decisions resulting in further policy failings increasing distrust between Government and local communities
- Inaccurate assumptions and definitions leading inequality in the assessment and mitigation process
- Missed opportunities to demonstrate the positive outcomes (ecologically, socially, and economically) which can result when local knowledge and experience are used in the co-design process, with Government facilitating the development and implementation of long-term sustainable policy.
- The table above is a summary and example only, MRSG has not listed the full extent of concerns raised by group members. Specific issues are noted in the appendices below and will be submitted by individual groups.

Recommendations – MRSG urge DPE to continue to develop stronger relationships with representatives of our organisation. Through implementing co-design engagement principals, as outlined in Appendix D NSW and MRSG can lead the way forward in showing how partnerships are key to revolving conflict and developing workable options to achieve long term sustainable outcomes for all those reliant on efficient water management.

Additionally, MRSG would like to work with DPE to develop

- Definition of landholder
- Definition of flood plain
- Definition of impacted landholders
- Explore the numerous impacts which need to be included in the assessment of impacts

MRSG also urge DPE to review further the NSW Murray Adaptive Road Map (Attachment C) as an opportunity to implement a project within the SDLAM which has broad community support and will see communities gain confidence and trust in Government bureaucracy.

Appendix A

Murray Darling Basin Authority (MDBA): Murray Darling Basin Plan (2012):

- 2750GL established as the volume to be recovered from the consumptive pool for use as environmental flows
- Required Southern Basin to provide 2289GL of the 2750GL
 - Capacity for 650GL of Sustainable Diversion Adjustment Mechanism (SDL) project to offset buyback
 - SDL Projects had limited time for development/ preparation in 2016
 - SDL Projects timeframes for lodgement was extended to June 2017, but NSW Department of Primary Industries & Environment (DPE) was under restructure therefore, there was limited change to Sustainable Diversion Adjustment Mechanism (SDLs) projects re-submitted in 2017
- Required the Northern Basin to provide 390GL of the 2750GL
 - The MDBA's Northern Basin Review (2018) reduced water recovery in the Northern Basin from 390GL to 320GL.
 - Basin Plan environmental flow targets to Menindee Lakes were also reduced from 143GL to 41GL
- 2000 GL of water recovered is to be delivered to South Australia (3 year rolling average) with minimum of 650 GL per annum. This is in addition South Australia's minimum entitlement flow of 1850GL.
 - Basin Plan set a new flow target of 80GL (80,000 ML/d) at the South Australian border to be achieved by.
 - A Murray River flow target of 80GL (80,000 ML/day) at the South Australia border, but primarily relied on one River system to achieve that target.
 - 40,000 ML/d downstream of Hume Dam
 - 77,000 ML/d in the Mid Murray (downstream of Yarrawonga)
 - Flow rates proposed was seven times the natural bank capacity of the Mid Murray region
- In 2012, the Federal Government increased water recovery target by an additional 450GL (for South Australia)
 - The deal stated additional water recovery could only occur if socially & economically neutral
 - However, the definition of neutrality could be applied to an individual (assessment of benefit)
 - Neutrality test did not apply to private property owners/community interests, indigenous or recreation interests in NSW
 - MDBA advised Federal & State Governments that the extra 450GL would require 'constraints relaxation' to facilitate higher flows. This was incorrect!
 - MDBA advised Federal and State Governments that 'constraints' was not an issue within the 2750GL. Therefore 'Constraints Relaxation' is not a legislated requirement under the Basin Plan water recovery target of 2750GL.

- In 2016, however, the NSW Government lodged Hume to Yarrawonga and Yarrawonga to Wakool Junction SDL projects as means to 'offset' potential risks of irrigation water buyback

Basin Plan: Disproportional Social and Economic Impacts

- Social and Economic impacts are not consistent with the findings of the Murray Darling Basin Authority Regulatory Impact Statement (RIS) (2012) which assumed the impacts of the Plan would be relatively modest.

The RIS Statement did not factor in:

- Effects of cumulative impacts of water policy in the Southern Basin (pre and post Water Act 2007)
- Concentrated negative impacts to Indigenous employment and decline in future opportunities
- Loss of Irrigation reliability impacts to NSW Murray General Security entitlements from application of the Basin Plan in its current form
- Water Act 2007 and Basin Plan legacy costs on stranded assets in irrigation schemes and regions
- The impact of the Basin Plan on water trade prices and markets and consequential river system operation demands
- The SDL Constraints Projects were not factored into the MDBA's Regulatory Impact Statement (2012) at all

Appendix B

SDL Adjustment Mechanism Projects: Constraints Management Strategy / Reconnecting River Country & Mid Murray Anabranch projects

- The Sustainable Diversion Adjustment Mechanism (SDLs) projects has been plagued by restrictive timeframes and lack of flexibility in decisions. This has prevented due diligence in project design, failure to enable constructive and equitable consultation with affected parties and strong risk of project failures and budgetary blow outs
- Murray Regional Strategy Group (MRSRG) has long sought a review of NSW Murray SDL Projects to incorporate new information, amendments to existing projects, new or additional project opportunities, including complementary measures
- SDL Constraints Project need to apply social and economic impacts to riparian farming businesses (and the communities they support) if the NSW Government enforces flow regimes onto communities that can be mitigated against, compensated or where flow decisions or Murray River Objective and Outcomes Operations elevated flooding risks that are applied disproportionately to NSW Murray Valley communities
- Changes in Murray River operations (A larger proportion of water previously used for irrigation, is now owned by Commonwealth Environmental Water Holder. This will result in new water use patterns, e.g., higher use of environmental entitlements in Spring, with Lower flows in Autumn) and will have social, economic, and environmental impacts on baseline flows for smaller rivers and creek systems in the Mid Murray. This can lead to negative impacts on supply of stock and domestic water and/or irrigation supplies. There has been no recognition or assessments of such risks by the MDBA, Federal and State Governments.
- Changed use patterns of water to concentration in Spring (Environmental flows) has major risks for elevation of regional flooding risks
- MRSRG urges increased recognition by the NSW Government towards the community attitudes towards past MDBA and NSW Government process on Constraints Management issues, the ramification of such failures have eroded community trust.

Current Concerns

CASE STUDY PARTICIPANTS MITIGATION PRINCIPLES SURVEY FORM:

The draft mitigation principles provided to landholders involved in the Case Study explicitly preclude mitigation actions. This highlights there is still a top-down approach, rather than a collaborative co-design approach where communities are in the driver's seat, ingrained in the RRC project.

Examples of concerns include:

- DPE-W has not indicated it is sufficiently aware of the different impacts and/or risks factors affecting private landholders within different zones within the Murray Valley
- Mitigation actions will only apply to the different between current regulated flows and a future new flow regime

- Mitigation actions will not apply to elevated flooding risks that have been identified by community stakeholders in the Murray Valley that will occur due to changed river operations and the timing of release of environmental flows.
- The mitigation principles preclude recognition of elevated flooding risks, created by release of environmental flows in Spring and the timing of those releases with unregulated flows from the Ovens River (Victoria) - *piggybacking*
- Mitigation principles suggest a one size fits all parameter for mitigation, despite locally specific risks that will vary across the Murray Valley
- Clause 3.4 is considered damaging to future outcomes and relationships. This clause states that “Any landholder who delay or refuse to engage in the process will not be provided additional opportunities to negotiate outside the documented process”.
 - This can be interpreted as unfair coercion and limiting mitigation actions for landholders even if the landholder has genuine unresolved issues, or that the NSW Government or MDBA processes fail to provide relevant information or identify actions that will prevent identifiable risks
- Mitigation measures suggest program will be comprehensive in risks, but explicit exclusions apply
- Mitigation Principles do not acknowledge value and importance of inundated land to the broader business operations and any financial impacts of its loss. Clause 7.4.1 refers to negative effects of changed flow regimes causing reduced agricultural output and/or increased operating costs (reduced gross margins), but then refers to its impacts as a net loss to agricultural land -----but makes no reference to actual total business loss. Losses that would not be borne unless particular parcels of land are no longer accessible for agricultural production.
- Mitigation principles pose a one-off payment and proposals do not identify how future risks (land management, loss of earning capacity, weed control etc) will be addressed on an ongoing basis

Landholder Negotiation Framework

A major impediment to potential uptake by landholders is also the linking of the LNF to the NSW Water Act Amendment (2018) which removes the NSW Government from any ‘liability’ from the release of environmental flows once the LNF negotiations have been concluded.

The process description outlined in **Figure 1** highlights.

1. Assessment of impacts is limited
2. No meaningful negotiation and/or mediation can occur as the same exclusion of issues remains unresolved
3. The proposed Arbitration step still does not resolve core issues that have been excluded in the LNF
4. NSW Government then claims that it has demonstrated ‘good faith negotiations’ and then outlines liability exclusions as described in the NSW Water Act 2018 amendments.

Note: this can be deemed by landholders as ‘compulsory acquisition’.

Murray River - NSW and Victorian cross border landholders

DPE do not appear to have factored in how the LNF as devised within NSW, will apply to Victorian landholders on the Murray River system.

Questions:

- Does NSW LNF conditions apply to Victorian Landholders?
- Does NSW Water Act amendment (2018) to avoid liability from the release of environmental flows apply equally to Victorian and NSW landholders?
- If the Victorian Government is on public record as NOT supporting compulsory acquisition, how will different landholders be treated on either side of the Murray River?
- If the Murray Darling Basin Authority (MDBA) instruct NSW Government e.g., Water NSW (as Murray River operator) to release environmental flows in high risks scenarios (e.g., Barmah Millewa Forest is pre wet naturally or from earlier environmental flows), conditions of risk are not factored in, does the LNF in NSW and the NSW Water Act amendment (2018) prevent Victorian landholders taking legal action against the NSW Government?

LNF Preamble: (Page i; ii)

- DPE statements need review as they do not necessarily represent the natural or agronomic systems across the whole Murray Valley region
- DPE statement that “potential for improved agricultural productivity as a result of floodplain flows’ needs review
 - DPE is incorrectly assuming that agricultural output increases as a result of spring floods or the release of environmental flows in Spring/early summer in the Southern Basin
 - Agricultural – cropping/improved pastures in the southern Basin, if inundated by flood waters will die and it will take at least 12, 15 or 24 months to regain productive capacity of land impacted
- Improved Tourism
 - Environmental flows released in Late Winter or Spring currently leads to major closure of the Barmah Millewa Forest with the Millewa Forest National Park gates being permanently closed for months
 - Camping and access to Murray or Edward River systems also remain inaccessible with corresponding decline in tourism opportunities
- DPE state the LNF will apply to proposed flows under the Program and in future it may be extended to other flow regimes related to NSW Long Term Watering Plans
- DPE **does not categorically exclude** the LNF will not be used in future to deliver operational water for other purposes ‘e.g., to enhance irrigation supplies downstream’ of the Barmah choke

DPE LNF SIX STEPS (page i; ii)

- 1.** Identification of landholders
- 2.** Assessment of impacts
- 3.** Negotiation
- 4.** Mediation
- 5.** Agreement
- 6.** Exploration of options where agreement is not reached

While the 6 steps suggest a range of options, the LNF and draft Landholder Mitigation Principles have already identified matters of risk that will be excluded. This is not appropriate when beginning the process of rebuilding trust.

A major failing of the steps proposed is that there is no component or identified timeframe where Landholders receive financial support to seek independent information and/or legal support under 'Just Terms Acquisition'

Appendix C
NSW Murray Adaptive Road Map

MURRAY VALLEY ADAPTIVE ROAD MAP

MV Stakeholders Concept Plan

Basin People Connecting Our Rivers and Wetlands

Social-Ecological outcomes through efficient water use for people and nature.

VISION

Socially and economically prosperous rural communities incorporating and enhancing major benefits for natural and modified environments through collaborative partnerships and investments in private infrastructure.

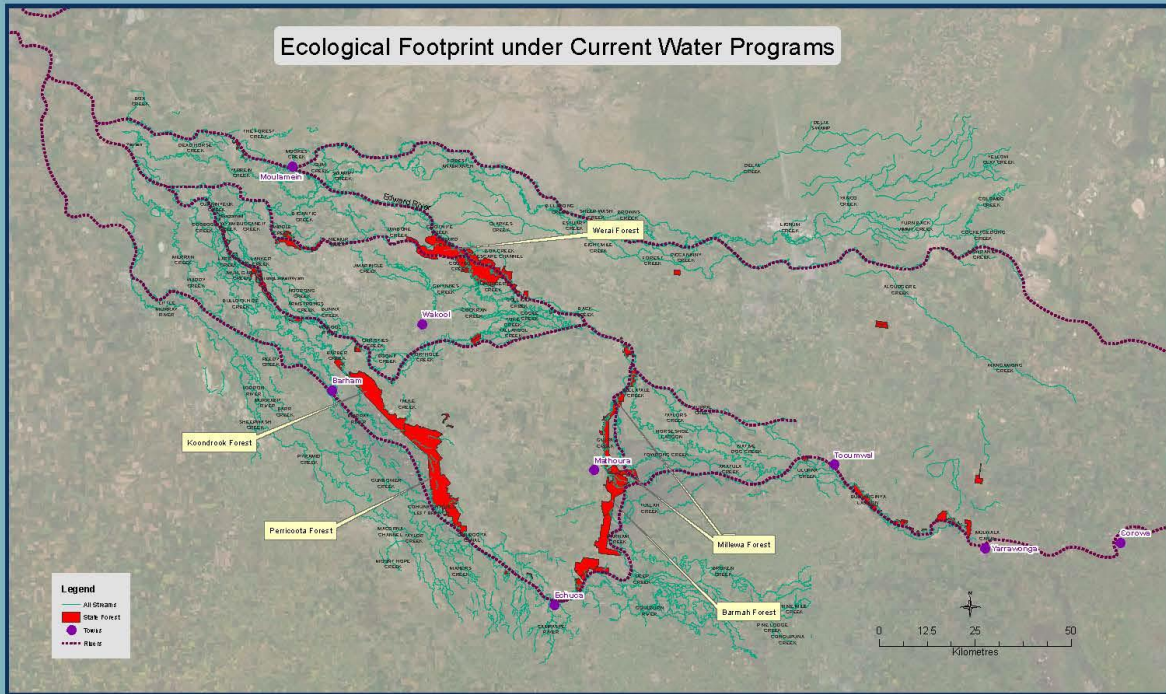
MISSION

Increase the ecological footprint of the Murray Valley, through community developed solutions to increase ecological connectivity and water efficiency while decreasing third party impacts.

GUIDING PRINCIPLES

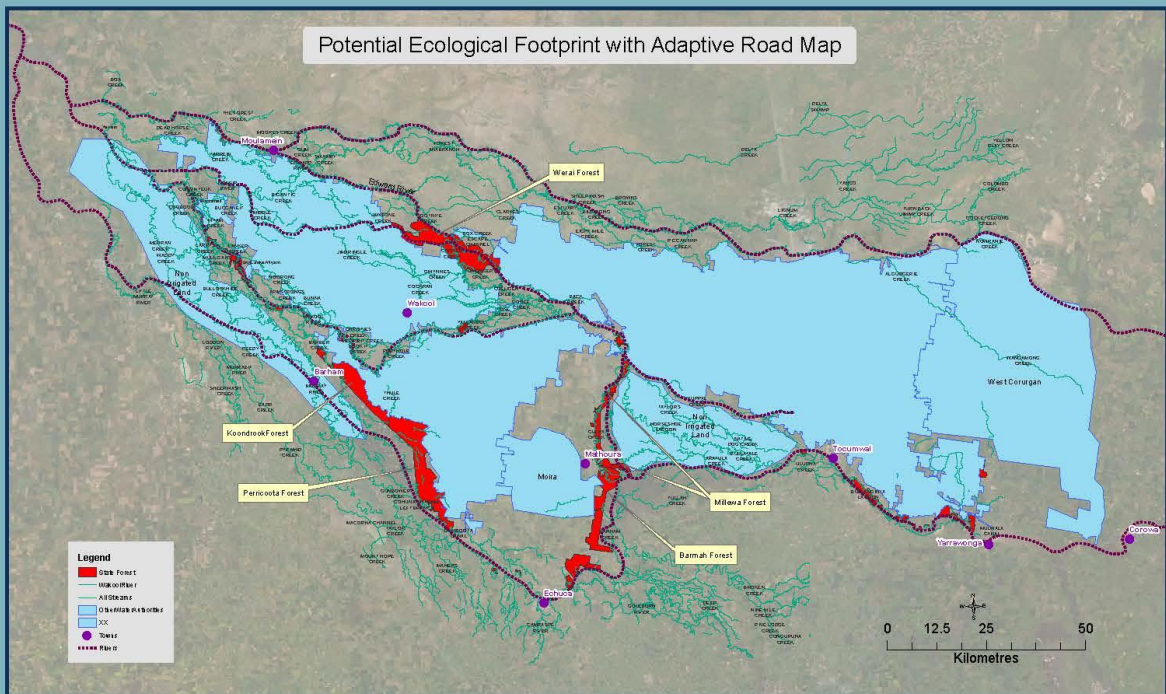
- The Murray Valley supported Aboriginal people for countless generations and continues to be their basis for cultural and economic well being. We acknowledge this cultural landscape now supports diverse communities across the region.
- A new focus on Community developed strategies, partnering with Governments to efficiently deliver operational and environmental water while maximising the Murray Valley's ecological footprint
- Broaden ecological outcomes and community engagement with environmental water via a new multiple methods approach for the 2750GL as part of the Sustainable Diversion Limit Adjustment Mechanism
- Recognising physical limitations of Murray, Goulburn and Edward (Kolety) River systems and interconnected flood risks
- Understanding the ecological role of consumptive water and private land in the region, and how system changes can negatively impact the ecology of the whole system
- Improved opportunities with Murray Valley's major ecological assets through positive interactive relationships with public/private landholders and local communities
- Work with local stakeholders and affected parties to achieve cooperative solutions for environmental and operational water in the Murray and Edward Rivers system limitations within known ecological and flood risks profiles
- Identifying regional solutions for circumstances when the Darling River is not providing connectivity flows
- Recognition of Murray Valley system limitations and risks of new irrigation demands downstream of the Barmah choke





Ecological footprint (highlighted in green) in the Murray Valley under the current objectives of the Murray Darling Basin Plan and Environmental Watering Programs.

Outcomes: 550km² and limited public/private partnerships



By utilising private infrastructure broader ecological outcomes are significantly increased through partnership models for public/private land.

Outcomes: 11,913km² ecological footprint with reduced third party impacts and increased community participation and support.

MURRAY VALLEY ADAPTIVE ROAD MAP

Basin People Connecting Our Rivers and Wetlands

Social-Ecological outcomes through efficient water use for people and nature.

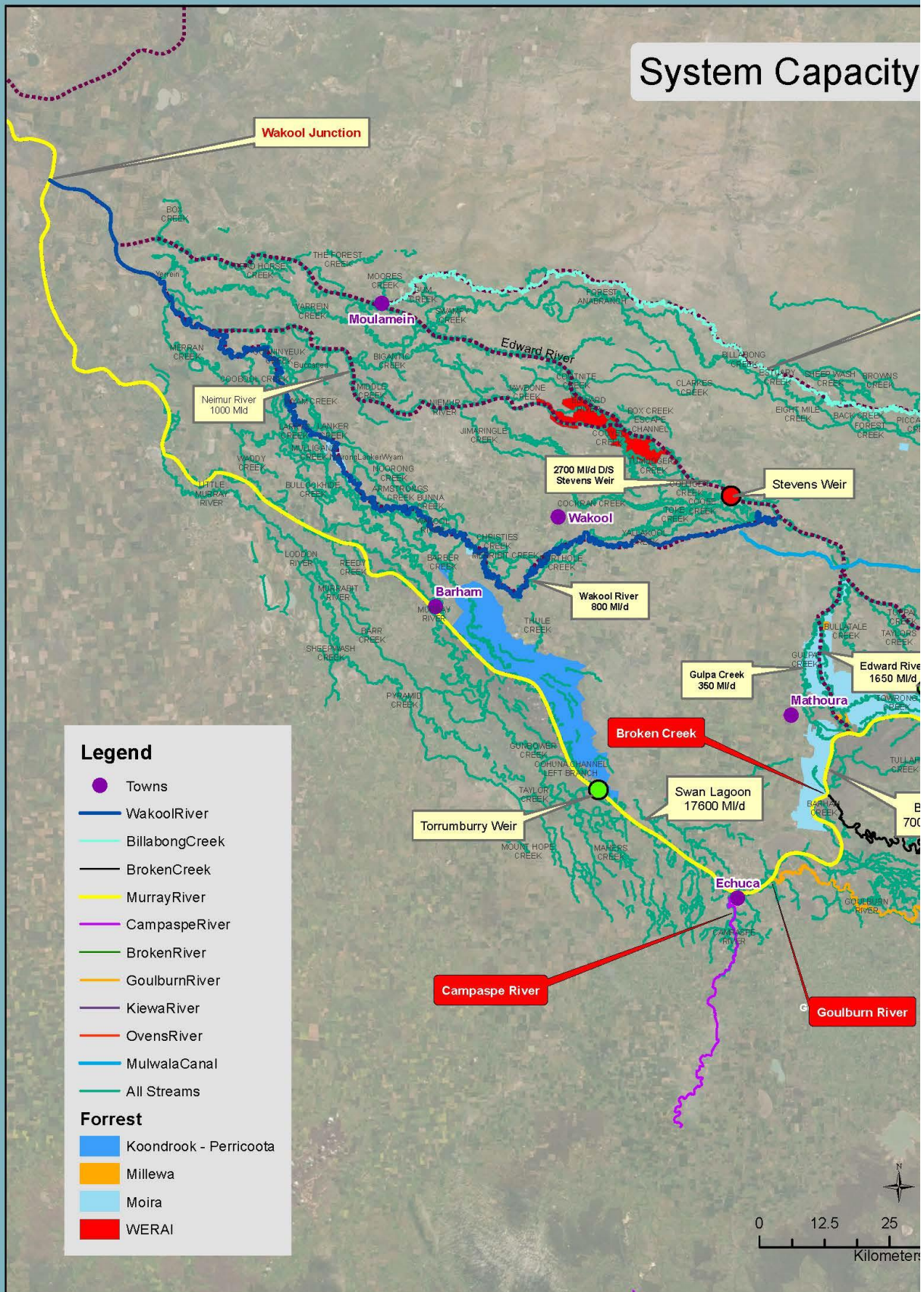
Partnerships for Pathways to Positive Water Outcomes:

- Review and improve existing water delivery options to maximise environmental and operational outcomes
- Community led partnerships to identify relevant risks and opportunities within the maximum flow limits, identified in the Yarrawonga to Wakool Junction Constraints Management Strategy Business Case (up to 25,000 ML/d)
- Increase opportunities for enhancing and expanding the ecological footprint; delivery of environmental and operational water using private and public infrastructure
- Enabling *Positive Pathways* for Murray Valley people working towards broader ecological goals
- Recognition of the social, cultural, economic and ecological importance of maintenance of base flows and connectivity (native refugia, stock and domestic/irrigation surety)
- Increased partnerships for Government/private monitoring of environmental outcomes.

Outcomes:

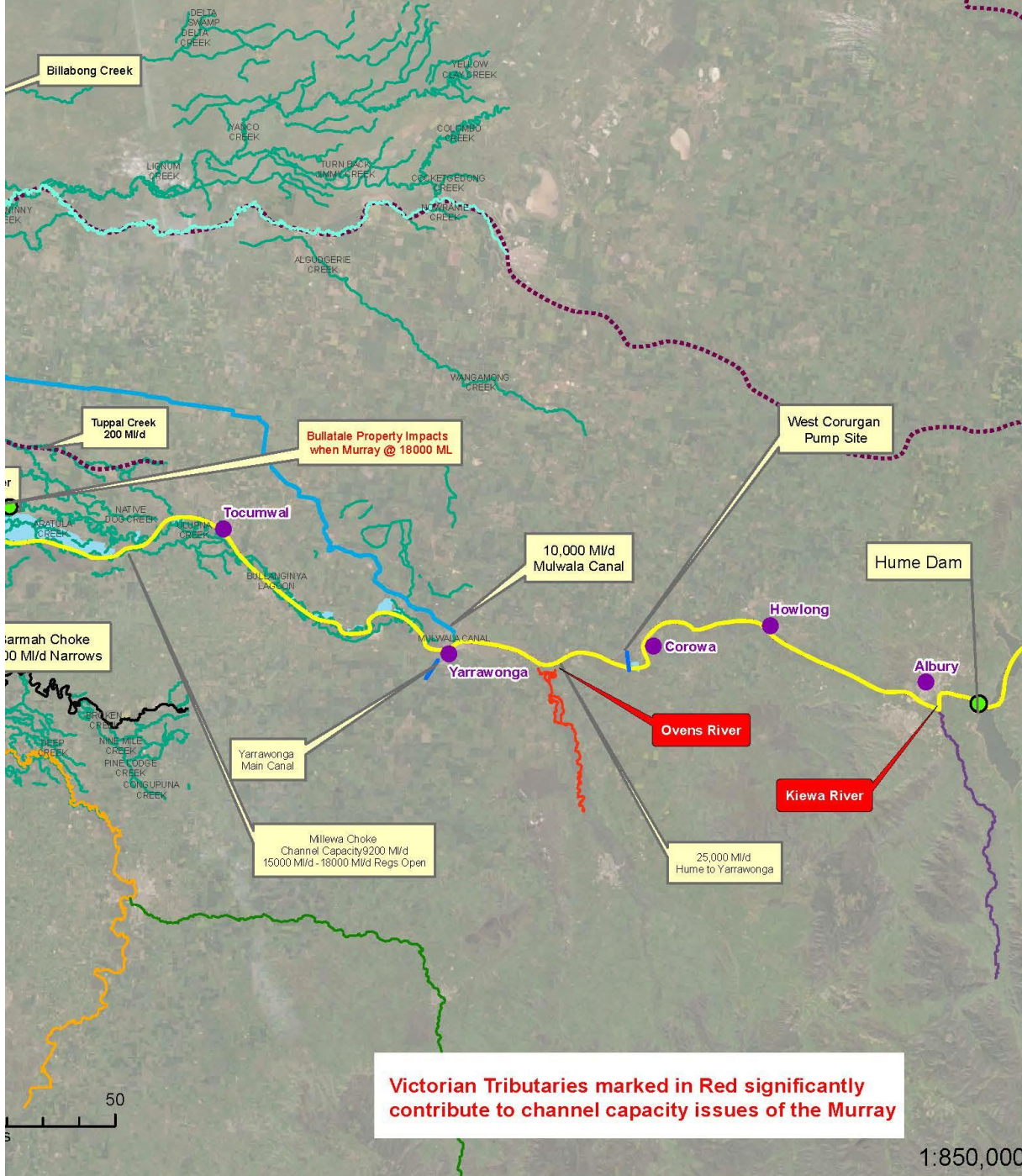
- Increased ecological footprint through waterway and wetland connectivity throughout the Murray Valley and beyond
- Increased efficiencies for delivery of environmental water on private and public lands using irrigation and private infrastructure, including Murray Valley natural creeks
- Delivering existing operational and consumptive water to address system limitations with reduced losses. Enables increased delivery flexibility and multiple timing potential within diverse delivery systems
- Investments will enable increased flexibility and multiple timing options for delivery of existing operational and environmental water with significantly reduced losses
- Building on established models for success; Governments, communities and landholders working together to achieve ecological outcomes
- Murray River Objective and Outcomes Operational Rules must address increased flood risks from Basin Plan flow objectives and limits of the Central Murray Floodplain Plan. This includes timing, frequency and duration of environmental flows.
- Significant cost benefits to Australian Taxpayers through explicit co-designed and agreed measures with affected parties
- Enhancing cultural outcomes through partnerships and holistic water management
- Strengthened regional economic outcomes for the Murray Valley, riparian landholders, General Security irrigators and Tourism operators
- Plan is consistent with Living Murray objectives that identified infrastructure investments as an effective mechanism to deliver environmental with reduce flooding risks.

System Capacity



Limits

By utilising natural waterways, irrigation infrastructure both private and public throughout the NSW Murray Footprint we can increase the ecological footprint dramatically



Victorian Tributaries marked in Red significantly contribute to channel capacity issues of the Murray

1:850,000



Environmental and Operational Flows – Murray Valley

Multiple natural capacity limits exist in the Murray, Goulburn, Edward/Wakool River systems. Building Community/Government partnerships, valuing local knowledge, recognising risk thresholds and need for adaptive management, is essential to achieving environmental and operational benefits through and within the Murray Valley.

Defining operational and environmental flows is required to avoid third party impacts such as riparian landholders, elevated flooding risks, reliability of Murray General Security entitlement holders, and to appropriately apportion system losses downstream of the Barmah Choke associated with exceeding natural capacities.

- Zone 1 – Hume to Yarrawonga
- Zone 2
 - Murray, Goulburn - Yarrawonga to Torrumbarry
 - Edward River (kolety) offtake - to Stevens Weir
- Zone 3 – Stevens Weir to Wakool Junction



Regional Flood Risks

Major floods occur from multiple scenarios, including singular or combined sources. Managing zonal flood risks is a critical component for managing environmental flows and achieving community participation. The Murray Valley is subject to unique flood risks through -

- Dartmouth and/or Hume Dam releases
- Victorian catchments conditions, e.g. Ovens River (Vic) unregulated flows merging with the Murray River
- Victorian catchment conditions - Goulburn River (Vic) merging with the Murray downstream of Yarrawonga Weir (if Goulburn and Murray Rivers are in major flood, Murray River flows are naturally directed into Edward/Wakool system via Deniliquin), with overflows also impacting the Wakool and Neimur systems
- Barmah/Millewa and Perricoota/Koondrook forest systems antecedent conditions have the potential to elevate major flood events following environmental watering events, if subsequent significant rainfall occurs, in mountain catchments
- Murray River (Barham capacity limits) – higher or flood flows naturally move north across the floodplain into Edward/Wakool system once channel capacity is exceeded, including flooding of the Koondrook/Perricoota Forest



Environmental Flow Scenarios

Managing environmental flows in zones 1, 2 and 3 – potential options for community acceptance

- Maintenance of all commercial and base operational flows within existing capacity limits/Barmah Choke rules and natural river bank limitations except where agreement is reached that utilises existing infrastructure.
- Environmental flows and MDBA Pre-requisite Policy Measures (piggy-backing), must be subject to capacity limitations, infrastructure limitations and avoidance of additional flood risks, all conditions required to achieve broad community acceptance
- Zone 1: Hume to Yarrawonga regulated conditions (25,000 ML/d)
- Zone 2:
 - 1) Yarrawonga to Barmah Millewa retain current regulated conditions (15,000 ML/d)
 - 2) Investigate additional flow options for Yarrawonga to Stevens Weir – Murray/Edward/Wakool system for environmental purposes only, not exceeding a combined total Mid Murray flow operational footprint of 25,000 ML/d (operational & environmental)
 - 3) Additional flows above 15,000 ML/d are restricted for environmental flow purposes only and protected to the Murray Mouth (SA)
 - Murray Irrigation offtake – investigate options to deliver environmental flows within channels subject to capacity availability and downstream flow impacts (Edward/Wakool)
 - Yarrawonga -Stevens Weir (Zone 2) – utilise private and in forest infrastructure opportunities to maximise environmental outcomes, subject to all third-party impacts being fully investigated, addressed and flood risk prevention strategies included in all operational requirements including Murray River operating rules and enacted prior to the event being initiated.
- Stevens Weir – Wakool Junction (Zone 3) recognition of restricted flow capacity within zone 3 for Wakool River (800 ML/d), and downstream of Stevens Weir (2,700 ML/d) and Colligen/Niemur River (1,000 ML/d). Investigation of additional infrastructure to maximise environmental flows.



Adaptive Road Map - Concept Plan is an initiative of the Murray Regional Strategy Group - A coalition of water users including: Murray Valley Private Diverters, West Cororgan Private Irrigation, Eagle Creek Pumping Syndicate, Southern Riverina Irrigators, Ricegrowers Association Australia, Murray Irrigation Limited, Yarkuwa, Speak Up Campaign. The Murray Valley Adaptive Road Map Concept Plan is supported by Murray River Action Group.

Community Supported Environmental Flow Options: Mid-Murray

CURRENT: Murray River Regulated flow conditions: Yarrawonga to Barmah Choke 15, 000 ML/d release from Yarrawonga is managed within Millewa and Barmah choke limitations by operating NSW & Vic in-forest regulators

This flow threshold also achieves connectivity within the system for river channels, creeks and low lying wetlands and providing breeding opportunities for biota, and limits risks of third party impacts.

- Further infrastructure investments can increase connectivity between main river channel and low-lying wetlands and off-channel habitats (e.g. Millewa/Gulpa Koondrook/Perricoota, Werai), provide breeding opportunities for instream and wetland biota and encourage dispersal, and establishment of permanent wetlands.
- Utilise public & private infrastructure to enhance options for priority and disconnected wetlands, fish passage and to utilise connectivity between main channels and smaller creeks (e.g regulated creeks and ephemeral systems).

Late Winter/Spring releases frequency as required – system maintenance.

OPTION 15,000 – 18,000 ML/d additional environmental release from Yarrawonga managed within Millewa and Barmah Forests by operating NSW & Vic in-forest regulators and through additional infrastructure on public and private land

Flow threshold aimed at a spring pulse to stimulate breeding and dispersal in river and wetland biota, (e.g. flow specialist fish). Pulse event to stimulate breeding of flow dependent fish species and increase connectivity to forest wetlands and reconnection events for low lying wetlands.

- Infrastructure investment required such as, maintaining property access, functions of farm fixtures (e.g. pumps, roads etc).
- Use private infrastructure to maximise river channel connectivity to Edward River and/or creeks and wetlands and encourage biota breeding and dispersal.

Late Winter/Spring releases; Non annual and to be negotiated.

OPTION: 18,000 - 25,000ML/d an environmental release from Yarrawonga to achieve significant ecological benefits in Barmah/Millewa, Perricoota/Koondrook, Werai forests and associated wetlands within the system, initially done in 2000ML/day increments from 18000ML/day to assess flooding and associated third party impacts. Investigation for any additional short pulsed environmental flows to a maximum of 25,000 ML/d, is conditional on Governments recognition of antecedent flooding risk conditions to private property, Murray, Edward/Wakool System. Governments must ensure flood risk avoidance to prevent private property impacts in the Murray, Edward/Wakool system

Flows are aimed at watering of off-channel habitats including key large forest wetland sites (Millewa, Koondrook/Perricoota, Werai,). Regional Flooding risks are significantly increased and must be recognised and prevented, including direct engagement with effected parties.

- Increase connectivity between river channels and forest wetlands, enhance breeding opportunities for river and wetland biota (e.g. wetland fish colonial nesting birds).
- Investigation of additional in-forest infrastructure to maximise environmental outcomes.
- Infrastructure investment required such as, maintaining property access, functions of farm fixtures (e.g. pumps, roads etc).
- Zone 2 & 3 impacts need to be carefully considered and negotiated with relevant parties.

Late Winter/Spring; Non annual event and to be negotiated.

Non-irrigation Winter Base Flows in main river channels

These flows are aimed at maintaining connectivity in the larger river channels (e.g. Murray, Edward) within the drying phase period for river banks and wetlands. Encourage breeding of winter active biota (e.g. Murray Crayfish). Consultation with community on timing, duration and frequency to open system infrastructure to allow flowing environments and translucent flows to occur.

Appendix D

Co-design Engagement Framework

MRSG CO-DESIGN ENGAGEMENT FRAMEWORK

Background

In the recent **NSW Water Management Regulation** (yet to be proclaimed), which is aimed at “a scheme to facilitate consultation and negotiations with owners and occupiers of land” sits 3 key pillars

1. No flooding without landowners’ consent
2. No compulsory land acquisitions, flood easements or works
3. Co-design of third-party impact mitigation

This need for co-design has again been reiterated and strengthened by the NSW Water Minister Melinda Pavey clearly articulating through media the need for working with local stakeholders to produce social-ecological acceptable outcomes.

Definition of Co-design

Co-design is a design-led process that uses participatory methods to actively involve and empower all stakeholders in the design process of projects to help ensure the result meets their needs and is usable.

Underlying the principles of co-design is the idea that a collaborative, cooperative and community-centred approach leads to more efficient and effective outcomes.

Localism is a key aspect of co-design where strengthening the capacity for joint action requires power and resources to be delegated and devolved to the lowest capable level.

Principles and our commitment to Co-design

Co-design means decision-making with, not on or for, local people. MRSG invite and will work with governments and other groups to embrace the leadership and contributions of people who are most impacted by their decisions; locals.

These four principles help to shape how people can see themselves and others differently and to make co-design a reality:

Principle 1 Prioritising Relationships - *Co-design is founded on relationships, social connection, respect and trust*

Principle 2. Sharing Power - *Co-design requires power and resources to be redistributed to local on-ground sources*

Principle 3. Localism - *Co-design promotes local history, culture, identity, capacity, and jobs*

Principle 4. Participatory Action - *Co-design requires local people to be accepted as partners in everything.*

Engagement Levels and Co-design

Appropriate engagement levels within a co-design process are essential. The IAP2 Public Participation model is a universally accepted and published engagement power level model (Figure 1). Co-design moves directly beyond low levels of engagement such as Inform, Consult and Involve levels, to Collaborate and Empower Levels.

	Inform	Consult	Involve	Collaborate (Co-design)	Empower (Co-design)
Goal	To provide the public with balanced and objective information to assist them in understanding the problems, alternatives, opportunities and/or solutions.	To obtain public feedback on analysis, alternatives and/or decisions.	To work directly with the public throughout the process to ensure that public concerns and aspirations are consistently understood and considered.	To partner with the public in each aspect of the decision including the development of alternatives and the identification of the preferred solution.	To place final decision-making in the hands of the public.
Promise	We will keep you informed.	We will keep you informed, listen to and acknowledge concerns and provide feedback on how public input influenced the decision.	We will work with you to ensure your concerns and aspirations are directly reflected in the alternatives developed and provide feedback on how public input influenced the decision.	We will look to you for direct advice and innovation in formulating solutions and incorporate your advice and recommendations into the decisions to the maximum extent possible.	We will implement what you decide.
Techniques	Fact sheets Web sites Open houses	Public comment Focus groups Surveys Public meetings	Workshops Deliberate polling	Citizen Advisory Committees Consensus building Participatory decision-making	Citizen juries Ballots Delegated decisions

Conditions for Co-design

A number of conditions are needed for Co-design to occur. They include:

1. Support and Sponsorship
2. Time and Money
3. Culture and Climate
4. Commitments

1. Support and Sponsorship	3. Culture and Climate
<p>We need people to endorse and reinforce the approach we're taking and the outcomes we want to achieve. Funders and supporters help to build commitment, remove obstacles and overcome resistance as and when it arises.</p>	<p>Supportive culture and climate includes:</p> <ul style="list-style-type: none"> • Authorising environments from formal and informal leaders • A focus on learning not control • Connective tissue to share learning, failure, success • Support to adopt the mindsets, especially when we regress to old ways of being • Support to develop the skillsets for co-design • Accountability to the people we engage through co-design (they can call us out)
2. Time and Money	4. Commitments
<p>To do co-design we need time and money for:</p> <ul style="list-style-type: none"> • Facilitation and convening (co-design is not free) • Paying people with lived experience for their time and for any expenses • Investing in approaches (after they have been co-designed) • Supporting lived experience capability and leadership • Prototyping, testing and learning (prior to implementation) • Communicating the work throughout to build commitment 	<p>Commitment to co-design looks like:</p> <ul style="list-style-type: none"> • Focusing on outcomes (value) over outputs (busyness) • Following through into implementation • Staying committed to elevating the voice and contribution of lived experience • Practising cultural intelligence and widening inclusion • Partnering, not parenting • Sharing decision making, power and attribution • Value and reciprocity with co-designers

Co-design Project Process

Co-design follows a series of defined steps for partners to follow which involve:

1. Defining the **Problem**
2. Understanding the **Context**
3. Expressing the **Needs**
4. Proposing the **Options**
5. Agreeing on the **Solution-s**

Co-design Success for MRSG and Partners

These are the standards by which we will judge value and reciprocity:

Aspects of decision-making	Co-design Success	No co-design process
Defining the PROBLEM	<ul style="list-style-type: none"> • problems are social and political constructions • problems can be re-framed through collaboration • professional and lived experience are equally considered • power is named, challenged and negotiated 	<ul style="list-style-type: none"> • problems are environmental constructions • problems are fixed or too narrowly defined • insensitivity to local peoples' problem perceptions and experiences • power and resources are tightly held
Understanding the CONTEXT	<ul style="list-style-type: none"> • honesty in answering "Why is this situation a mess?" • all values, attitudes, beliefs and views are respected and considered • a range of scales is considered, and a balance is accepted 	<ul style="list-style-type: none"> • past failings and learnings are ignored • key assumptions remain untested • national interest is not tempered by equity and fairness at a local level
Expressing the NEEDS	<ul style="list-style-type: none"> • slowing down to listen, connect and learn from local people • needs are representative of the whole of the affected community • people most impacted are placed at the heart 	<ul style="list-style-type: none"> • local people not heard directly or without interpretation from consultants or staff • powerful lobby groups and highly articulate people get what they want • seeing marginalised people as a burden
Proposing OPTIONS	<ul style="list-style-type: none"> • focus placed on answering "Are there any potentially bridgeable gaps?" • ideas are created from nothing within a safe, inclusive and independently facilitated space • information from diverse sources is accessible and is used to create new public knowledge 	<ul style="list-style-type: none"> • pre-determined options that lack transparency, inclusivity and fairness • having workshops to ask people's opinions but exclude them from critical decision making • having different meetings with various groups of people and making decisions across them
Agreeing the SOLUTION	<ul style="list-style-type: none"> • the agreed solution is the product of deliberative engagement and has super majority (80%) support • the decision maker clearly communicates which recommendations they will and won't adopt, and why • prototyping, testing and learning prior to full scale implementation • decisions that significantly increase trust and build long term commitment to collaboration 	<ul style="list-style-type: none"> • rushing to a one-sided, pre-defined or a one size fit's all solution • impacted people are unable to see how they influenced the final decision, or the agreed solution is not implemented • destructive focus on control and completion • decisions that further erode trust and lead to activism or apathy

References

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Appendix E

Alternative steps for Landholder Negotiation Framework

MRSO LNF PROPOSED ALTERNATE STEPS:

1. Ensure LNF is established on fair and equitable basis (remove 'exclusion' of risks and/or issues as defined by DPE)
2. LNF outlines Financial Support measures, upfront payments/procedures necessary for landholder to receive legal, financial, independent assessment of risks, impact options for mitigation under Just Terms Acquisitions. This is essential for landholders' preparation and engagement in fair negotiations
3. DPE /MDBA to provide all relevant and necessary information to support Landholder's capacity to make informed decisions
4. Identification of landholders
5. Assessment of all impacts
6. Negotiation on options
7. Mediation (1) Financial package for landholders to engage independent mediator to act on their behalf (2) Government appointed mediator – both parties act on behalf of their respective parties
8. Potential Agreements, & how agreement is determined, e.g., easement, other, compensation,
9. Exploration of additional or alternate options – negotiated outcome including additional supporting information

NOTE MRSO does not support Arbitration. MRSO encourages DPE to more appropriately consider community concerns and work to resolve in a collaborative manner

Reconnecting River Country Overview (Page 1)

- DPE needs to define the term Floodplain, how broad? Differences between Floodplain and Floodway.
- DPE incorrectly assumes that Reconnecting River Country will provide benefits to all landholders. DPE exclusions and thus disbenefits are not described.
- DPE should recognise that assumptions on Northern Basin Floodplain inundation does not equate to broader situations in the Southern Basin. Inundation in spring in cropping and improved pastures in the Southern Basin kills grass/pastures
- DPE needs to include negative impacts to tourism from overbank flows with potential for major forests systems to be closed for extended periods due to inundation.