

Summary notes

Painkalac Roundtable #2

27 March 2024

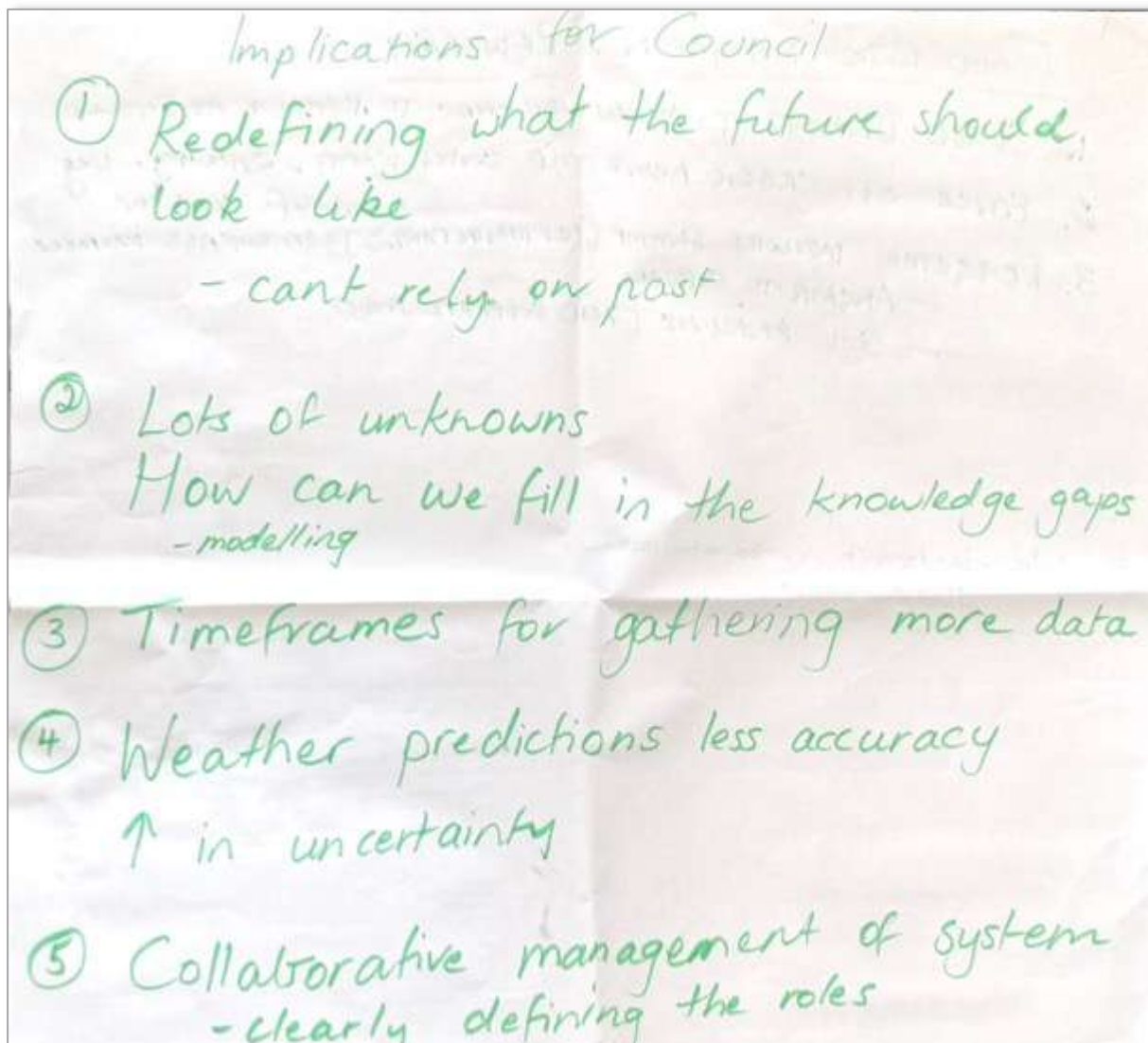
Aireys Inlet Hall



Common Objectives

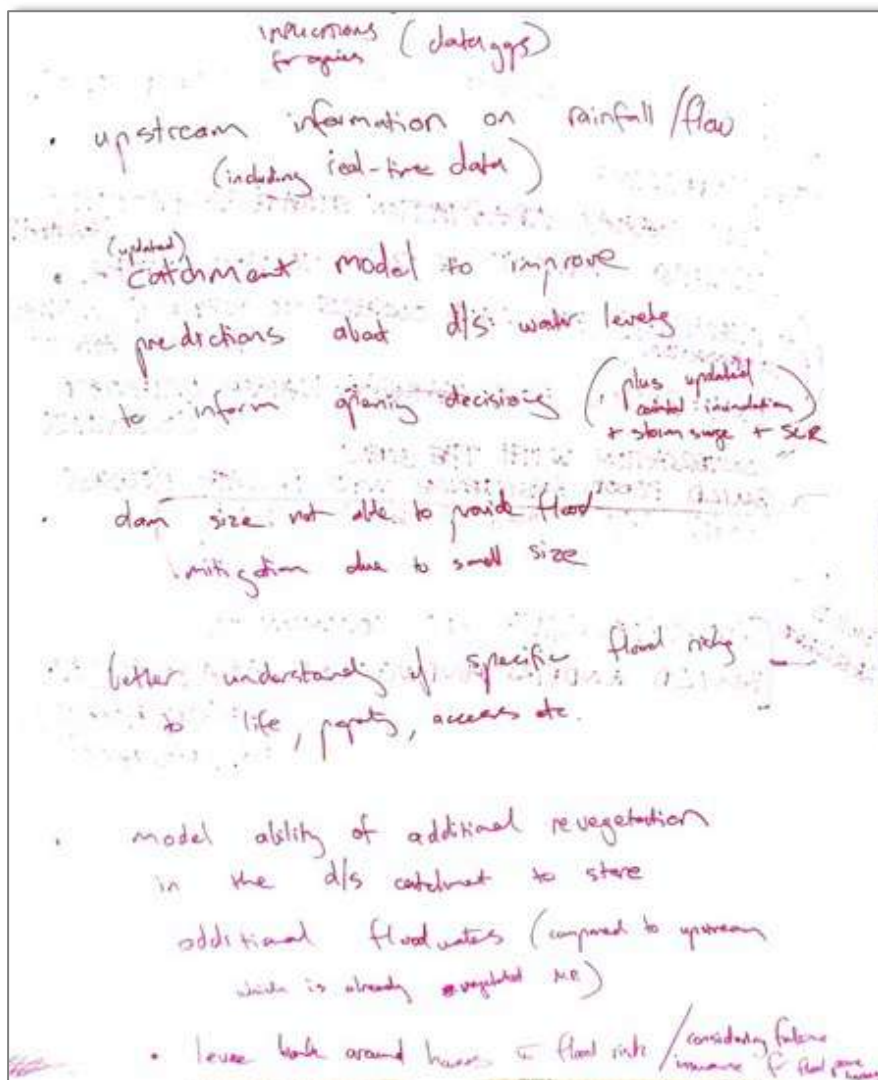
- 1. To better understand the ecology and hydrology of the Painkalac Creek, Estuary and Floodplain in relation to the impact of artificial estuary openings.**
- 2. To work towards developing a best practice management approach which protects both significant human assets and strengthens environmental values.**

Implications for Council



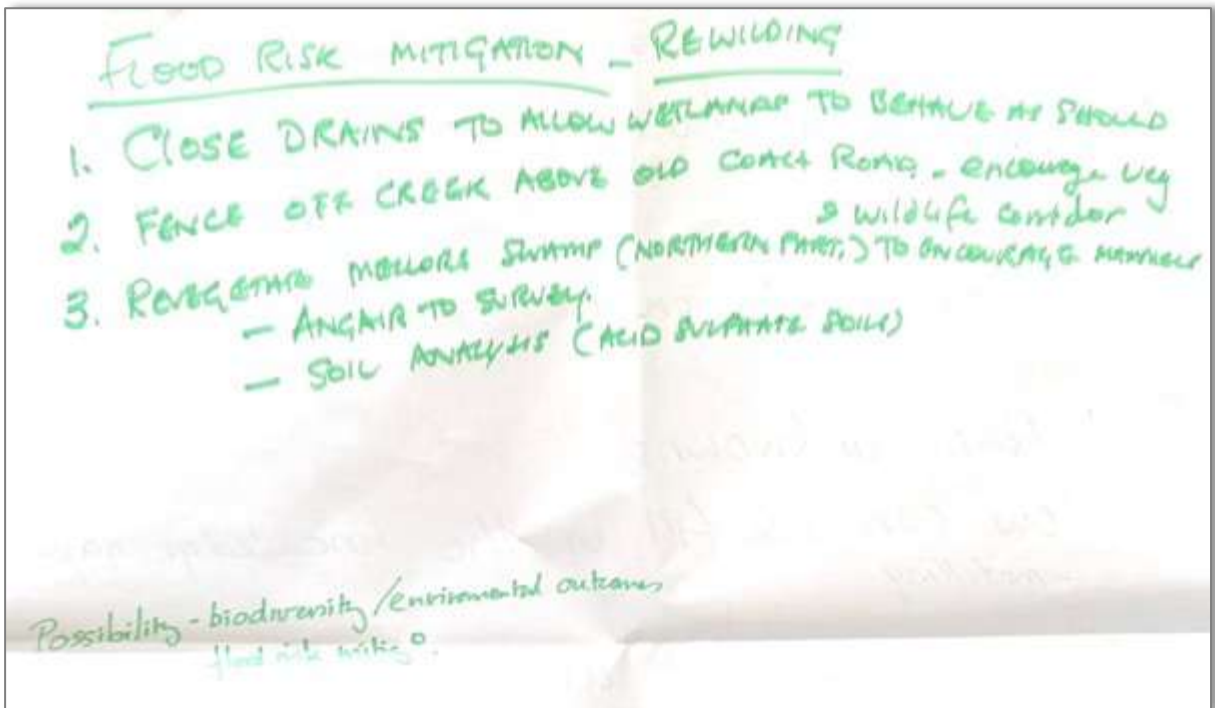
- Redefining what the future should look like. We can't rely on what has happened in the past.
- There are lots of unknowns. How can we fill in the knowledge gaps? Need for modelling.
- Timeframes for gathering more data.
- Weather predictions - less accuracy increase in uncertainty.
- Collaborative management of systems - clearly defining the roles.

Implications For Agencies



- There are data gaps.
- Upstream information on rainfall / flow including real time data updated catchment model to improve predictions about downstream water levels to inform opening decisions (plus updated coastal inundation, storm surge and SLR).
- Dam not able to provide flood mitigation due to small size.
- Better understanding of specific flood risk to life, property, access etc.
- Model ability of additional re-vegetation in the downstream catchment to store additional floodwaters compared to upstream which is already vegetated National Park.
- Levy bank around houses with flood risk.
- Considering future insurance for flood prone houses.

Rewilding and Revegetation

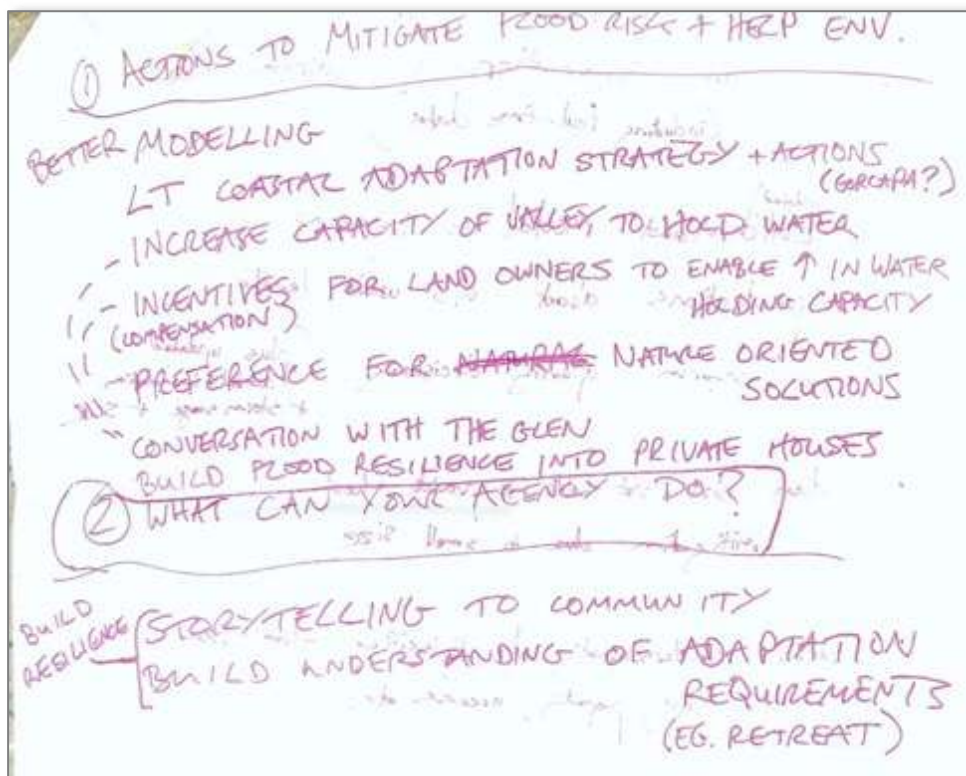


Sought to subvert the see saw paradigm – ie flood risk mitigation or the environment. We sought to provide for biodiversity and environmental outcomes as well as reducing flood risk.

3 actions that were identified:-

1. Closing the drains that direct water directly off the land into the Painkalac Creek – acknowledging that this may require cooperation from others.
2. Fencing off the Creek above Old Coach Rd. There is good vegetation there but free access for cattle and stock isn't helpful. The CCMA and other management authorities to continue to work with land owners to try and protect those riparian edges which is important.
3. The Painkalac Creek Nature Reserve - which is 30 acres immediately north of the bridge across the Great Ocean Road - is unfortunately a biodiversity/fauna dead zone and we need to do a bit of investigation in that area engaging for example ANGAIR along with conducting a fauna survey and possibly soil analytics to investigate if acid sulphate soils are an issue.

Hydrology and Flood Risk



There was strong support for nature oriented solutions to flood risk management.

Better modelling is required. A long term coastal adaptation strategy is needed with identified actions (what is GORCAPA's role?). The proposition of a long term coastal adaptation strategy and set of actions is a potential vehicle that will need to feature modelling as an element of it.

In the frame of nature oriented solutions - increase the capacity of the valley to hold water. How can you create financial incentives (compensation) and mechanisms for private land owners to enable greater holding capacity within their landholdings.

Can you build greater flood resilience into private homes that are threatened with flooding? There were some good ideas around the group where this has been practised elsewhere, some of them quite low tech, low cost. Some more significant and high tech but not all require houses to be lifted up.

Build resilience - There is a growing awareness of the implications of the changing climate and we need to mature the discussion around retreat, build that understanding and awareness and the role of various agencies to tell those stories. This is going to be a critical contextual piece no matter what actions are taken to mitigate flood risk.

Ecology / EPBC

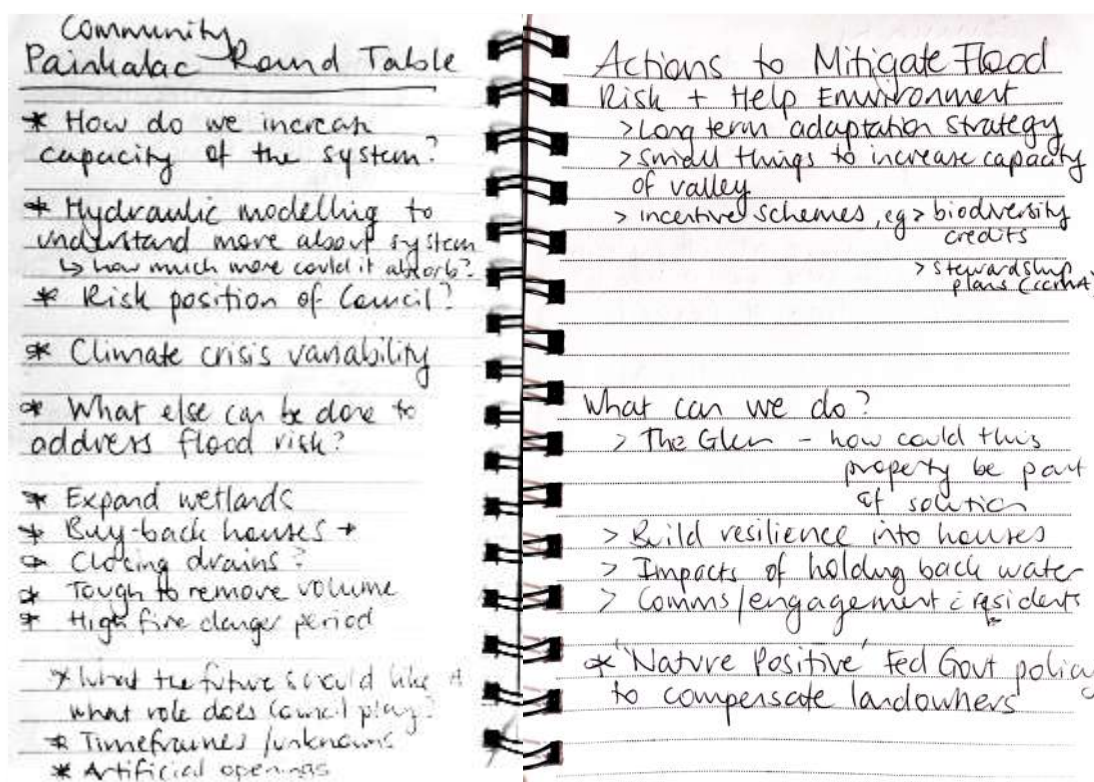


What is required in this space is monitoring. We need to utilise all the different techniques such as:-

- eDNA.
- Trapping.
- Radio tracking camera (which has already been started this can continue).
- acoustics recording/identification for bats and birds - is an efficient methodology.

- Discussions have been held with Surf Coast Shire earlier in the year about re-doing the quadrats¹ which were done in the 1990s to see if the habitat has actually changed.
- Discussion regarding climate impacts and what sort of modelling we would need to do. Changes pre / post, refuge management.
- nature based solutions - the new federal policy of “Nature Positive” definitely relevant and is definitely something we should be looking at.

Community



- How do we increase [water holding] capacity of the system?
- Hydraulic modelling to understand more about the system - how much more [water] could it absorb?
- Risk position of Council?
- Climate crisis variability.

¹ A quadrat is a square frame used in ecology and biology to isolate a standard unit of area for study of the distribution of an organisms over a larger area. Sampling is undertaken without removing the organisms from their natural habitat. Organisms are usually counted by hand.

- What else can be done to address flood risk?
 - Expand wetlands
 - Buyback houses
 - Closing off drains
 - Tough to remove volume
 - High fire danger.
- What the future should look like and what role does council play timeframes/unknowns
- Artificial openings

Actions to mitigate flood risk and help the environment

- Long term adaptation strategy
- Small things [can be done] to increase capacity of the valley
- Incentive schemes e.g., biodiversity credits, stewardship plans (CCMA)
- What can we do?
- The Glen - how could this property be part of the solution?
- Build resilience into houses
- Impacts of holding back water
- Comms/engagement with residents
- Nature Positive federal government policy to compensate land owners

Possible actions and ways forward

Nature oriented solutions are key.

Explore low cost flood measures for houses (examples from overseas).

What is the capacity of the valley (and potentially private properties) to temporarily store or retard water or in replicating the outcomes of work at Lot 2.

Discussion around the need for a plan with actions (including responsible agency, costing etc) to then be able to attract funding for specific actions. Surf Coast Shire CEO indicated she would initiate a meeting with other agencies including Barwon Water and CCMA to discuss.

Surf Coast CEO also recognised the need to consider expanding capacity to better consider mitigation options which might go beyond the remit of Community Safety or Community Emergency Management Teams.

The community can mobilise volunteers and this is an incredible resource for collaborative projects.

Recently a new networking group has formed called the Painkalac Valley Network. The group has met 4 times.