



Australian Government
Productivity Commission

PRODUCTIVITY COMMISSION

**INQUIRY INTO THE FIVE YEAR ASSESSMENT OF THE EFFECTIVENESS OF
THE MURRAY – DARLING BASIN PLAN**

DR J DOOLAN, Commissioner
MR J MADDEN, Commissioner

TRANSCRIPT OF PROCEEDINGS

AT MERCURE HOTEL MILDURA
ON FRIDAY, 12 OCTOBER 2018 AT 9.04 AM

INDEX

	<u>Page</u>
MR BARRIE MacMILLAN	3-14
SOUTH WEST WATER USERS GROUP	15-26
MR ALAN WHYTE	
MS NERIDA HEALEY	
LOWER DARLING HORTICULTURE GROUP	26-33
MS RACHEL STRACHAN	
MILDURA RURAL CITY COUNCIL	34-42
MR MARK ECKEL	
MR MARTIN HAWSON	
MR MARK JENKINS	
MR JASON MODICA	
WENTWORTH SHIRE COUNCIL	43-48
MS JANE MacALLISTER	
MR LINDSAY LEAKE	48-51
MR BILL McCLUMPHA	51-58
BINDARA STATION	58-64
MR DAVID ARNOLD	
OPEN COMMENTS	64-69

COMMISSIONER DOOLAN: Okay, I think we'll start. Good morning everybody, and welcome to the first of the public hearings for the Productivity Commission inquiry into the five year assessment of the effectiveness of the Murray-Darling Basin Plan.

These hearings are following release of our draft report, which occurred in August, but before we start I'd like to begin by acknowledging the traditional owners of the land on which we meet and pay my respects to their elders past and present. My name is Jane Doolan and I'm a commissioner with the Productivity Commission. My fellow commissioner is John Madden, and we're leading this inquiry.

The purpose of this round of hearings is really to facilitate public feedback and comment on the recommendations and findings that we made in our draft report. Following this hearing in Mildura we'll be also having hearings in Murray Bridge, in Shepparton, planned hearings in Goondiwindi, Sydney, Dubbo, and Canberra, and then we'll be working to finalising the report and handing it to government just before Christmas this year, having considered all the evidence that's been presented at the hearings, and the submissions that we receive in relation to the draft report.

Everybody - participants here and everybody who has registered their interest in this - will be actually sent updates of how the inquiry is going and when it is handed to government, and when it's likely to be released, which can be up to 25 parliamentary sitting days after it's been handed to government, so just for people to understand that.

Now, we do like to conduct our hearings in a reasonably informal manner, but I do remind participants that a full transcript is being taken and will be available publicly, and so for that reason we can't take comments from the floor. But at the end of the day we'll provide a brief opportunity for people to actually make additional comments to us.

Participants are not required to take an oath, but we do ask that they are truthful in their remarks, and they're also welcome to raise issues that have been raised in other people's submissions along the way.

The transcript will be made available to participants and will be on the Commission's website in a few days, and all our submissions. Our closing date was Wednesday, and they are really starting to roll in, and they are all available on our website for people to look at as well.

We have got media today. There some general rules. No broadcasting of proceedings is allowed, no taping of hearings is - only with permission. Finally, in terms of the Commonwealth's Occupational Health and Safety requirements, in the event of an emergency we exit out the back, we turn right, and we assemble in the car park.

I think we're almost ready to start. Where we have participants, we'd ask that you spend five or ten minutes opening, and then there'll be some discussion as well. I'd like to welcome our first participant, Barrie MacMillan. Barry, if you wouldn't mind coming to the table, and if you would start by just giving us your name and any affiliation, and then that's just for the record.

MR MacMILLAN: Good morning. Thank you very much. Name is Barrie MacMillan, resident at Gol Gol, just over the river from Mildura. We also have a small recreation property on the Darling River north of - a bit north of Wentworth. I'm here as - purely as

an individual, not really associated with any - any group. My background is, I've been retired for some years and spent most of my working career with Mildura Co-operative Fruit Company, which was a grower's owned cooperative food processor, and - and also included in that was as a director of Australian Dried Fruit sales, which was later named Sunbeam Foods.

I was a director of that for 26 years, so there's association with the food processing and the - and marketing of the food product, both in domestic and export markets, again both in bulk and also consumer packs, and I've - since then I've - since retirement I've been on boards of regional water authorities, urban and rural, catchment management authorities in Victoria and New South Wales, and also on the board of Murray-Darling Wetlands Working Group, which I finished - my term finished last year, so - but I have no - none of those positions at the moment, and I don't intend to.

COMMISSIONER DOOLAN: Okay. All right, do you want to start with your remarks?

MR MacMILLAN: Yes. Well, I've - my submission is not finished yet. I've been granted an extension by the Commission to next Wednesday, one week, which I appreciate, but I've selected about five points that I'd - I'd like to discuss with the Commission. So, do you want me to start those now?

COMMISSIONER DOOLAN: Yes, absolutely.

MR MacMILLAN: Okay. I've scribbled a few notes here for each one. If I could start with those.

COMMISSIONER DOOLAN: Sure.

MR MacMILLAN: The first one relates to the significant practical progress outlined by the Commission, and where new arrangements - new management arrangements are in place in the Southern Basin where measuring in the form of appropriate water use, metering, and timely collection of water extractions are available for water management. So, there's good information available in the Southern Basin for, you know, the various managers to manage the river.

In the Northern Basin river regulation issues, measuring of water take, floodplain harvesting, and management of environmental water are far from satisfactory. This is causing increasing irrigator concern in our region here, and the future effect of reduced flows from the Darling and Murrumbidgee rivers, combining with flow constraints of the Barmah Choke, that will lead to increased risks of water shortages, and I'm requesting the Commission should consider qualifying their key point to, you know, take account of those - those conditions, certainly the Northern Basin, you know, lack of information in terms of metering, et cetera. Any questions?

COMMISSIONER MADDEN: I think make all the points, and then we'll come back and discuss.

COMMISSIONER DOOLAN: Yes, make all your points and we'll come back.

MR MacMILLAN: Righto, okay. The water resource - the next item was water resource plans, and I had the view that the water resource deadline should be extended beyond 2019, as the Commissioner said, in cases where plan quality is at risk. It is unacceptable for unsatisfactory old rules to be rolled into new plans. The Murray-Darling Basin Authority should not be seen to embracing weaknesses and issues as their own. This is particularly evident in the Northern Basin sustainable outcomes, in Northern Basin. Sustainable outcomes must be an absolute priority to expediency.

It should be required that the management of the water plans include the objective of ensuring the sustainability of basin waterways. That is a primary objective of the Water Act. Waterways are functioning systems, and more Basin States and the MDBA failed to openly convince the community that this objective is a priority, the more community confidence is undermined. I just find that the objects - in terms of the objects clearly stated in the Water Act, in my view don't clearly transmit to objectives in the - you know, in the likes of the plans or the Basin States activities, and I - you know, I can only look at things on the surface really, but has the Commission looked at the - you know, the application of the objectives of the Water Act into the review and the implementation of the plan so far?

COMMISSIONER DOOLAN: Our scope is really the plan as it stands.

MR MacMILLAN: Yes.

COMMISSIONER DOOLAN: So - and the water resource plans probably they stand, and currently there's not that many water resource plans to actually look at.

MR MacMILLAN: No. Okay.

COMMISSIONER MADDEN: Well, they're also not enforced, so that is something where we're coming back in terms of over time, ever five years.

MR MacMILLAN: Yes.

COMMISSIONER MADDEN: So, effectiveness and efficiency of implementation of the plan will obviously look at what the objectives of the plan are. So, intrinsically yes, but given the water resource plans, actually in force from 1 July next year. So we are, in a sense, judging the process and the development of those, which was the focus of our review.

MR MacMILLAN: Okay.

COMMISSIONER MADDEN: So I think we keep going through, and we'll come back to those discussion points.

MR MacMILLAN: Can I just extend a bit more on that?

COMMISSIONER MADDEN: Yes.

MR MacMILLAN: I would have thought, on the surface, that in terms of risk management the likes of the MDBA and the Basin States would have, in their governance, you know, reference to risk management, and I thought that, you know, the compliance with Australian law would have been a part of risk management, certainly if it's a very important part, in my view, of governance generally, that, you know, compliance with, you know, on legal matters is a risk. It risks, obviously, you know, transgressing the law and also risks reputational damage to the perpetrator. So, that - that's my own view on that.

COMMISSIONER DOOLAN: No, no, I take your point absolutely, but the process for water resource plan is to go through an accreditation process, which is - advice is provided by the Authority to the Minister, and that's still occurring. So there's, at this point in time, only one plan that's been completed and endorsed and accredited.

MR MacMILLAN: Yes. I understand that, but I was trying to make the point that the - you know, does that - in your review, say the MDBA's implementation activities, you know, do you look at that risk management issue in compliance with the Water Act? You know, I would have thought that in the MDBA's risk management would be an item called "Compliance with Australian law".

COMMISSIONER DOOLAN: Well, yes, they have a compliance unit.

MR MacMILLAN: Yes.

COMMISSIONER DOOLAN: And we believe that that is definitely considered within their processes, yes.

MR MacMILLAN: Okay. Right, okay, I won't - that's as much as I can say on that, yes.

COMMISSIONER DOOLAN: Sorry.

MR MacMILLAN: I guess this is - in my previous submissions to the - you know, the Commission and also the Royal Commission - - -

COMMISSIONER DOOLAN: Yes.

MR MacMILLAN: I suppose I've tried to highlight the need for compliance to the objects of the Water Act and also the - you know, the Basin Plan, and you're satisfied you've looked at the object, you know, the compliance of the object in the - - -

COMMISSIONER DOOLAN: We've concentrated fully on the Basin Plan.

MR MacMILLAN: Yes.

COMMISSIONER DOOLAN: Because it's a legal instrument under the Water Act.

MR MacMILLAN: Yes, I understand. I understand, yes.

COMMISSIONER DOOLAN: Yes.

MR MacMILLAN: Yes. I guess the water resources plan process, the total processing, yes, to be raises again the issue of jurisdiction, and I guess on of the observations I make is that one object of this review will be to - and it is; I'm sure it's built into it, you know, with the suggestions you've made, of making the focus on the jurisdiction of the basin away from the jurisdiction of the states, is one of the - the way I read part. You know, to get the - we'll talk of this later, but the - obtain a recommitment and review at high level, you know, COAG level or whatever it's called, at - to a - for the states to recommit to, you know, the objectives of the Basin Plan and the further implementation of it. Very good suggestion, I think.

And I think that the - what I hear about the preparation of the water resources plan, this constraint, even on the various regions with their plans, sharing plans, in even, you know, talking to - communicating with each other. So to me that's another, you know, breakdown in jurisdiction away from the need to focus on the jurisdiction of the Basin Plan, because the - you know, rivers don't have no borders. They don't know about borders, obviously.

So I think that's another - there's, you know - I think it's the recommendation of the structural change that the Commission has made is very good. In fact I think the whole - I should have mentioned at the start, I think the Commission is to be commended on the draft report for the comprehensive assessment, and also the comprehensive recommendations, one of which is - major one is the restructuring and the recommitment by the Basin States to, you know, better, more effective implementation.

The next one is the basin - (indistinct) the Basin Officials Committee to take on management and authority of the risks assessment process into the future. I'll just go back to my earlier remarks that, you know, obviously risk management is a top priority in good management, absolute top priority, and I really don't know much about the Basin Officials Committee, but I'm just giving my view, that the risk management, in the cases where - well, in this case, should be taken at the - should be taken to the highest level, whether it's COAG or whatever. It should - the highest level possible, because I think it's just such an important issue in any organisation, but particularly here, where I think we only have to look at the Matthews report and your own findings to see that there's plenty of indicators that would suggest the need for change and improvement. So I'm just making the view that, you know, this role of managing that be taken to the highest level of state and federal government.

COMMISSIONER DOOLAN: Okay. All right.

MR MacMILLAN: You mentioned, John, the - a further - is there a further five year review set for you to do after this one, or?

COMMISSIONER DOOLAN: Yes.

COMMISSIONER MADDEN: Yes there is. So - - -

COMMISSIONER DOOLAN: It's to occur on a five-yearly cycle.

MR MacMILLAN: Okay.

COMMISSIONER DOOLAN: So the next one in 2023.

MR MacMILLAN: Yes, which - I didn't - yes, I wasn't aware of that - should have been. My view, that it would be preferable to have another review in three to four years, because it's getting - you know, to go beyond that much is getting close to 2024 and '26. You know, I think the Commission's view of a stitch in time, that the - a measurement - in my view a measurement would be preferable, or at least to be considered. Now, I don't know whether your terms allow for that, that like - to make a recommendation when you're involved, but I would think it'd be far more appropriate to have it earlier than five years - well, it's pretty obviously really, isn't it - so as to allow an assessment, the measuring of it and evaluation, and some more time to - - -

COMMISSIONER MADDEN: So, just so you know, that's set in legislation. The very five years, it's set.

COMMISSIONER DOOLAN: It's in the Water Act.

COMMISSIONER MADDEN: It's actually in the Water Act, for that review to occur.

MR MacMILLAN: Is it? Righto.

COMMISSIONER MADDEN: So that's a significant change and not under our influence, or it's not our decision to do that.

MR MacMILLAN: Okay, I'm still - can I still have it recorded?

COMMISSIONER DOOLAN: Yes of course, naturally.

MR MacMILLAN: Yes, okay. Righto. I'd like it still recorded that I thought that was just generally, you know, good management.

COMMISSIONER DOOLAN: Yes.

COMMISSIONER MADDEN: Yes.

MR MacMILLAN: That it be held a bit, you know, halfway to 2024 or whatever.

COMMISSIONER DOOLAN: Just for your information, on the way the Murray-Darling Basin Authority will conduct some evaluations in the next - there's two before 2026. It's just - - -

MR MacMILLAN: You mean internally?

COMMISSIONER DOOLAN: Yes.

MR MacMILLAN: Yes, well, I think we see the value of an external independent review in the form that we've got now in the draft report. Yes.

COMMISSIONER DOOLAN: Fair enough. We note your comments.

MR MacMILLAN: I'm, yes, less than impressed, yes. The last one really is - which I've mentioned in previous submissions, is production and sustainable environmental conditions, and the fact that, you know, Australia has a very good clean and green reputation it's held for decades, really, in the, both domestic, but particularly on the export market.

I also notice in the Water Act there's this provision there that the - to maximise net economic returns from the use of water, and I'm associating that with - or I'm associating this with that in terms of the need - well, the market demand - increasing market demand for, you know, food grown - food and fodder grown in sustainable environmental conditions, and that increasingly is incorporating - the general environment is also looked at, not just the environment on the farm but the environment, you know, generally. There's a stewardship issue, really. That's becoming an increasing demand in world markets, and, you know, the sustainable rivers are very much a part of that, you know, the stewardship of the rivers, and, you know - yes, and I'll - - -

COMMISSIONER DOOLAN: Okay.

MR MacMILLAN: I'll also mention, in terms of support for that there's - I've come across a farewell speech by David Crombie, National Farmers' Federation, when he retired, and he mentioned those items in several points during his farewell address, and also the - even my own, in a minor way, I was, in my work time, back 1999, I think it was, the - I convened a letter to the Murray-Darling Basin Commission, as it was then, relating to the blue-green algae threat that was around that area. The threat to the marketplace of their - of those - you know, that food, processed food, the threat that your blue-green algae, you know, toxic bloom, which Commissioner Doolan would remember, being an authority at that time on blue-green algae, and the wineries and the food processors in our region were all prepared to sign that and send it to the Commission.

COMMISSIONER DOOLAN: Okay, so can I just follow up with a couple of questions?

COMMISSIONER MADDEN: Yes. Probably just so you - I'd be prepared - I'd like to talk a little bit about that governance in the MDBA a little bit more, and obviously a little bit about the compliance and water resource plans. So a few questions there.

COMMISSIONER DOOLAN: Yes.

COMMISSIONER MADDEN: Are they the areas that - - -

COMMISSIONER DOOLAN: Connectedness of water resource plans, yes.

COMMISSIONER MADDEN: Yes.

COMMISSIONER DOOLAN: Yes. So, just follow up a couple of your comments in terms of the water resource plans to start with, if that's okay. You mentioned that they're actually being undertaken and they're not actually connecting through. Is that right?

MR MacMILLAN: I'm just going on what I read, you know, various reports over recent times.

COMMISSIONER DOOLAN: Okay, yes.

MR MacMILLAN: That there - you know, there's a - seems to be a process of disconnection of those regions.

COMMISSIONER DOOLAN: Yes.

MR MacMILLAN: In not being able to - not, you know, being authorised to discuss amongst themselves on a - you know, matter of river health and, you know, extractions and so on, whereas, you know, the - obviously we all realise the river's a functioning thing and it needs to flow right through - right through its length.

COMMISSIONER DOOLAN: Yes.

MR MacMILLAN: And to have important plans have a component of that separation I think is against the - - -

COMMISSIONER DOOLAN: Okay.

MR MacMILLAN: Yes, that's - yes. The others here would know far more about those - preparation of those plans than me, but I'm just going on the - what I read.

COMMISSIONER DOOLAN: Okay.

COMMISSIONER MADDEN: We might hear a little bit about that later.

UNIDENTIFIED SPEAKER: Yes.

COMMISSIONER MADDEN: But from your perspective, is that then a matter of not having the forums inclusive and modelling available for people, or is it actually something in terms of the - - -

MR MacMILLAN: I don't know to that - I don't know to that depth. No. You're saying in - can you repeat that?

COMMISSIONER MADDEN: Again, we're looking for solutions and recommendations on these things.

MR MacMILLAN: Yes.

COMMISSIONER MADDEN: So, I know we have some people from the Lower Darling, which will probably talk about this issue, but I guess even in perspective on history on the Murray, how you actually deal with that issue, I mean, there's always, except for at the very bottom, someone further down. So, the Murrumbidgee flows into, obviously, the Murray. In the past have you known that there's been discussions when the Murrumbidgee are doing their plan, or what the impacts are? I'm just trying to think of what actually works in terms of (indistinct) information.

MR MacMILLAN: Yes, I'm not really aware of that, John. I'm just reacting to what I've read.

COMMISSIONER MADDEN: Yes.

MR MacMILLAN: Yes, and - - -

COMMISSIONER MADDEN: So, I guess I might just, before we go on to the more governance issues, just in terms of compliance, you mentioned the Murrumbidgee there as well and those risks. So, from your perspective, the recent announcements with compliance compact - I mean, you've not got - given that we've got, I think, about eight different reports that were done on compliance.

COMMISSIONER DOOLAN: Investigations.

COMMISSIONER MADDEN: And, in New South Wales, major reforms, is it a matter of - and in our report. We actually said, look, there's eight different reports going on. For us to go into this area would be - I don't think - well, we thought, not a useful expenditure of our effort, and we could come back in 2023 and look at the effectiveness of those processes.

Is there anything that's done to date that doesn't give you confidence that that is an issue that's actually being addressed in the north? Is there a weakness that you see, or is it - again, maybe it's the lack of independent assessment? I'm just wondering, again, over the next five years what you would actually like to see from the community down here to give assurance that there are changes.

MR MacMILLAN: I don't know enough about the process. I'm mainly reacting there to talking to people, and it's a widespread concern, in my view, in this region. I don't know enough about the various reports coming out and so on. I'm really reacting to the community.

COMMISSIONER MADDEN: Concern and about it, yes.

MR MacMILLAN: What I'm hearing, and it's quite widespread and strong, yes.

COMMISSIONER MADDEN: Yes.

COMMISSIONER DOOLAN: Yes, I suppose that's - governments have made a number of commitments in the last, probably, six to eight months, and from what we could tell talking to communities, if there was confidence those commitments were met, that would probably fix the problem, but the issue is, at the moment, whether they're going to be met or not, and - - -

MR MacMILLAN: That's clearly my view.

COMMISSIONER DOOLAN: Yes. Yes, okay. So, again, it's that message that we've received. All right.

COMMISSIONER MADDEN: Just to move on to governance.

COMMISSIONER DOOLAN: Go.

COMMISSIONER MADDEN: So, the Act and the setting up of the Murray-Darling Basin Authority in itself was meant to bring an independent regulator and a voice in terms of assessing water resource plans, so they have various roles - SDL compliance and the like - but then you've talked about the water resource plans and compliance, and a number of issues, I guess, with some trepidation, that that actually is in hand, and that risk are being managed. Then, supporting that, leading on to the governance reviews, what - in terms of that kind of governance area, is it separating out the regulator, I guess, what's concerning people as far as you know, and have talked with about how the Authority is positioned at the moment with its roles?

I mean, is it clear - I'm not trying to lead you too much, but I'm just wondering what the concerns you hear, and again a little bit more about why you would support that separation, and do you think that would actually assist with some of the concerns that, are risks being addressed?

MR MacMILLAN: I wouldn't - in terms of - there's a lot of distrust in the parts of the community, you know, particularly with the Northern Basin area, and I know we look - we have to look, you know, Basin-wide here. Could I just go back to the - there's recommendations by the Commission to - get - you know, get the Basin States to reconnect to, you know, supporting the plan implementation - better implementation of the plan, and then to - and another one, is to separate - because of the conflict of interest is to separate the implementation - this is the Murray-Darling Basin, I'm sorry.

COMMISSIONER MADDEN: Yes.

MR MacMILLAN: The implementation away from the regulation side of it, which is fair enough - no, very good, not fair enough - as a principle. I suppose one concern, and this would be more mine than what I'm hearing from the community, is that the - I guess five

years of implementation, it creates a culture in any organisation, and the separation of the regulatory side of it leads - obviously leads the - I presume this is what you have in mind. Anyhow, it leaves the implementation with the Authority, and what measures - I know the Commission is only - recommend - I presume the Commission would only recommend the structural side of it, but then I'm going, you know, what sort of assurance would the community have that the ongoing implementation practices of the MDBA are coming under, what will we say, scrutiny or - yes, scrutiny, so as to pick up on the recommendations that the Commission has made, for better, you know - you've come out and said words like "There's a need to resort to good management". You know, that's really strong stuff, and totally agree.

COMMISSIONER DOOLAN: Yes. So really - - -

MR MacMILLAN: So how do we sustain good management if the implementation is, you know, obviously still there - it needs to be still there.

COMMISSIONER DOOLAN: Yes.

MR MacMILLAN: But in terms of monitoring it.

COMMISSIONER DOOLAN: So it's the checks and balances.

MR MacMILLAN: Of managing that.

COMMISSIONER DOOLAN: Yes.

MR MacMILLAN: And I guess that should come down from the - as COAG or something, shouldn't it, should like - - -

COMMISSIONER DOOLAN: The Ministerial Council, absolutely.

MR MacMILLAN: The Ministerial Council, yes. Yes.

COMMISSIONER DOOLAN: Yes, with the regulator actually keeping regular.

MR MacMILLAN: Yes.

COMMISSIONER DOOLAN: And transparent and open public tabs on what's happening.

MR MacMILLAN: Yes.

COMMISSIONER DOOLAN: Yes.

MR MacMILLAN: I haven't quite answered your question, John, but I - it's really a personal - that's a personal - I haven't sort of gathered it around the community. Do you want to ask - - -

COMMISSIONER MADDEN: Well, I guess - and a couple of your comments about calling for that independent review, and this is something we've seen - recognised with - as you can tell by our draft recommendation about this. It's not just a conflict, it's the dual roles that the Authority has that they're implementing, and then some cases checking, but then having to be a partner with some people, but then having to check. So with supply of projects, for example. So, just some of your comments, I guess, maybe betrayed a concern that the Authority isn't able to do an independent review of water resource plans and the like.

MR MacMILLAN: Well just on principle. Yes, I think it's conflicted, isn't it?

COMMISSIONER DOOLAN: Well, we believe so, yes.

MR MacMILLAN: And I think there's enough - I - you know, to me there's enough indicators in the likes of the, you know, the Matthews report, and certainly yours, which is, you know, far more comprehensive, you know, to indicate that there's a lot of rectification needed. So, you know, that even more, if you like, needs an independent - yes, sort, you know, overview.

COMMISSIONER DOOLAN: Okay.

COMMISSIONER MADDEN: Okay.

COMMISSIONER DOOLAN: Okay.

MR MacMILLAN: Does that cover it?

COMMISSIONER DOOLAN: Yes. No, no, that's clear. No, that's quite clear. I think that's us, really. Are there any more points?

MR MacMILLAN: No, that's fine, thank you.

COMMISSIONER DOOLAN: Okay. Well, thank you very much, Barrie.

MR MacMILLAN: Thank you for the opportunity. Thanks for coming to Mildura.

COMMISSIONER DOOLAN: No, thank you. We look forward to your submissions. Probably call on the next group, which is Mr Alan Whyte and Nerida Healy from South West Water Users group. So if you wouldn't mind just, again, your name and affiliation for the record, please.

MS HEALY: Nerida Healy, South West Water Users.

MR WHYTE: Yes. My name is Alan Whyte. I've got a property on the Darling River about halfway between Wentworth and Pooncarie. I come here today wearing a hat as chair of South West Water users, which is the local water user group downstream of Menindee

on the New South Wales side of the Murray. I should also note that I am frequently running into problems of wearing multiple hats, and both Ned and myself and involved with the Lower Darling Horticulture Group, which is Rachel's address after us. The simplest thing when you wear multiple hats is to be upfront about it first, so - to do that. Thank you for the opportunity to be here.

COMMISSIONER DOOLAN: Okay. Well, would you like to give us some introductory remarks and - - -

MR WHYTE: I might just go through the list of things.

MS HEALY: Yes.

MR WHYTE: And Ned in particular has some fairly direct issues.

COMMISSIONER DOOLAN: Sure.

MR WHYTE: Some of you will probably find some of the things she'll be handing you a little confronting, but it will, I think, indicate the extent of the mess that we have.

COMMISSIONER DOOLAN: Okay.

MR WHYTE: We have put a submission in, which I think has been received. Four issues - you've touched on some of them already: Some fairly major issues around water sharing plans, water resource plans; the Menindee Lakes project has a very large supply measure under the Basin Plan; water quality, which Ned has far more direct experience with than I do, and a more generic issue about the impacts of the Basin Plan on water reliability. In our submission we've gone through those things. I don't see any point reading it - going through it word for word.

COMMISSIONER DOOLAN: Sure.

MR WHYTE: And I imagine you guys have read it.

COMMISSIONER DOOLAN: Yes.

MR WHYTE: And some of the discussions with Barrie - I think we'll probably follow on from there.

COMMISSIONER DOOLAN: Okay.

MR WHYTE: Ned.

MS HEALY: Yes. So I'm from a grazing property north of - between Menindee and Pooncarie. We have - we also have a section of table grapes on that property. Since the implantation of the Murray-Darling Basin Plan my life and that of my family has been negatively impacted in almost every way possible. The health of my children has been

significantly impacted. Our table grape business has been decimated, and our environment has been sacrificed, all the things that the Basin Plan was supposed to protect.

My children can no longer run under a sprinkler in the heat of summer. They can't - I worry, when they go fishing I - it's never-ending for me at the moment. We've relied on - I built my house in 2009 and until 2015 we relied on our household water being delivered via the Lower Darling. Since 2015 - in 2015/16 and now again in 2018, we're relying on the Wentworth Shire to cart potable water to our house for use.

I feel that the Murray-Darling Basin Authority, the Federal Government, and the New South Wales Government have shown no regard to the impact that it's actually having on people's lives, and I have a concern that there is no targets or plan in place to improve or tackle the water quality in the Lower Darling. If I can pass you - I have put some notes there, so I won't read it word for word, but in 2015 my children, with the low flows happening down the Darling River, contracted a staph infection. We ended up in Broken Hill Hospital for five days following a week of in and out of town, and that in and out of town for me, or in and out of doctors and hospitals, is actually either 165 kilometres one way or 250 kilometres the other way to get to Broken Hill. So those pictures will show you what the impact was on my child.

I also had - you can see - I switched to a different - my second son, Mark, he suffered repeated infections for five months, and I - until the point where he became resistant to the antibiotics, and the advice from the doctors was that he would not - they would not start a new antibiotic until I got clean water, because there was no point, and that was the first trigger for getting carted water in 2015.

Upon getting carted water we did a full sterilisation of our house, and I mean I cleaned the walls, the couches, the entire lot with clean water, and the entire family went on a course of antibiotics to try and break the infections. That did, that fixed it, until my children played under a hose outside, and we hadn't - getting carted water, you get the carted water inside the house and you treat it like gold. Outside, where it goes on the garden, we use the river, and - which then again prompted a trip to town on the advice of the Flying Doctors and a full course for the family to prevent it happening - prevent such an outbreak, and we now - everything with inside our yard now has to be either from our emergency boar that we but down, or from carted water from town.

Carted water is not this easy, everyday solution. It actually requires you to have brand new tanks that are clean, so it came at a significant cost. Just the tanks alone cost me \$7,500 to bath the kids. There has never been - plus new pressure pumps and things like that. I have a new house, so I didn't have to change my plumbing, but for others that's been a cost too. There has never been an acknowledgement or any offer of assistance in any way.

There's other children in the area this year who have ended up with Giardia infections, so similar to a severe gastro. They did have the water tested at the time and it was confirmed that that was the source of the infection. I still have problems with - skin problems with my son, Mark, who suffers hypopigmentation, although we've been sort of given three possibilities: that that is a fungal infection from the water now, apparently; a leftover

residual effect from having so much staph infections when he was younger; or it's just a genetic thing in his body, and we haven't had that - no one's been able to confirm that as such.

It's our - as I said earlier - our table grape property which we'll actual - we'll cover with Lower Darling Horticultural Group. Our business has been pretty much strangled, and as I say, we now end up with just little puddles of water in our environment, and if you were to look at the water that sits out the front of my house at the moment I can guarantee you wouldn't be touching it. There's also cases where it's becoming a problem for workers - people who have workers, because you can get carted water to your house at a significant cost to yourself, but how can you justify putting - setting up that infrastructure in the likes of a shearer's quarters or things like that? So, it's happened in 2015/16, and now again in 2018 that people actually pay their workers to travel to Pooncarie to have a shower because they don't want the risk of infection.

There's a family across the river from us who have had to - who wanted a volunteer teacher to help with School of the Air but had to pull out of it because she said to me "How can I expect someone else to shower in that water, especially a volunteer?" So yes, I have - as I said before, I have ongoing concerns that the Murray-Darling Basin Plan is not achieving and not looking to achieve quality of water in the Lower Darling.

COMMISSIONER DOOLAN: So, can we follow up then? The instrument that's meant to deal with these issues is the water sharing plan - the Water Resource Plan. What's happening with those plans, from your perspective?

MR WHYTE: I guess just a little bit of background to start with, with the structures of those things.

COMMISSIONER DOOLAN: Yes.

MR WHYTE: The water sharing plans in New South Wales are very localised. There'll be one - you know, one for the Gywdir, there'll be one for the Border Rivers, there's one for the Namoi, there's one for the Barwon-Darling and so on, and there's one for the Lower Darling. As is mentioned in the submission, and probably noted in your comments to Barrie previously, there's a fundamental problem there, that those groups are literally now allowed to even talk to each other, and the current state in New South Wales is that there is a categorical refusal to have any concept of a whole of river approach to managing the Darling River.

Now, in terms of the water quality issues that Ned's referring to, and I suspect you probably found some of those photos fairly stark, it doesn't rate a mention. One of the horrible things that's been obvious in the last few years is that there's no one anywhere who has to be held responsible for water quality issues, and the New South Wales Department of Industry brackets water, which is their - it's not our problem. You'd think it might be the EPA. No, not their problem. MDBA? No, not their problem. No one anywhere takes these issues seriously.

Now, I would have thought that, as a basic assumption, the Basin Plan should have been thinking about things like this, but unfortunately, when you read into the fine detail of these things, it doesn't actually require anything to be done about it at all. There's an interesting little bit of jargon where things have to be "had regard to, and you may have noticed that, and then you read the fine print on the paperwork from within the MDBA, that there's actually three categories of "have regard to", A, B, and C, and the things related to water quality, the things related to river connectivity, the things related to Aboriginal cultural, you know, water and value as a river, they're all A class "have regards to", and the Basin Plan wording effectively says all they've got to do is turn up, make it look as if their eyes are open when someone's talking, and that's it.

Now, that's a fundamental flaw in the structure of the Basin Plan. The key issues around the mess in the bottom of the Darling River, connectivity along the river, water quality, the Aboriginal guys who've got absolutely valid concerns about what's happening, they're all in the lowest priority, and there is no requirement under the Basin Plan for anything to be done about them at all, other than to allow people to come and talk to - about them, and then all you've got to really do is make it look as if your eyes are open. Now, that's the mess we're in. That's why Ned's kids are like that - they've got those problems.

And the problem that I see in terms of the water sharing plans and the water resource plans, where you'd think these things would be covered, there is still within New South Wales a categorical refusal for - to have any whole of river concept, and the reality is, the Murray-Darling Basin Authority is not going to do anything different. You know, there's been no sign at all that they have any intention of tackling these issues, and again, indeed, when you word - go into the fine print of the Basin Plan, the MDBA actually can't overrule state water sharing plan as long as the states submit it. They can submit something which is a joke, and that's where we're headed to now, but as long as they submit it, it's effectively got to be accepted.

Now, again, it's not the perception, but when you start looking into the - to the details and the structures here, nothing is happening about these things, because when you read the fine print no one has to do anything about it, and I would have thought that's fundamentally wrong.

COMMISSIONER DOOLAN: So again, I just - the water sharing plans and the Water Resource Plan, the - as you say, the structures under the Basin Plan, they are required to have a water quality plan as part of them. I understand that "have regard to" - I agree that's what they have to do. Nevertheless, each water resource plan does have to produce a water quality plan as part of it. Have you been involved? Has the New South Wales Government set up anything to help develop that?

MR WHYTE: I've heard verbal reference to it. In terms of the structures around the water sharing plan process in New South Wales, there are a group called the SAPs - Stakeholder Advisory Panels. From the Lower Darling, Rachel Strachan is the main delegate. I'm the alternate, which means Rachel tends to go to all the things; I go to some of them. So I've had exposure to those things.

The issues around water quality, and I'd suggest also the extreme event policy, get very brief verbal mentions. But realistically, if you're going to achieve anything on those you actually have to have the rules and the operating system structured in to what will become the Water Resource Plan, which is supposed to cover the whole river, and to do that you need those concepts incorporated into what are initially water sharing plans.

Now, the unfortunate reality is that in New South Wales there is a categorical refusal to do that. Now, I see that direct in the face - Rachel does too - and why does that happen? I hate to have to say it, but I'm going to suggest that the principle determinate of water policy in New South Wales is corporate cotton upstream. That's what the cause is. They have influence - far more influence than Ned has, with the problems with her kids. That's what determines the New South Wales Government approach, and they really like a system where they don't have to worry about anything downstream. They just take the water out upstream. Realistically that's what's happening. It's sad, it's sickening.

I shouldn't have to be here in 2018. Ned shouldn't have to be here in 2018, making comments like that, but that's the reality. It's what Rachel sees, it's what I see when we go to those forums. Effectively the guys up north really like a system where they don't have to worry about anything downstream, and they get away with it, and there's every indication the MDBA is going to let them get away with it too.

COMMISSIONER MADDEN: At the forum that we had - and I know you've got a long history in water sharing plan development.

MR WHYTE: Yes.

COMMISSIONER MADDEN: And that's the key instrument to me. The Water Resource Plan goes over the top, but it's still, as you say, got to be given effect in New South Wales through the water sharing plans. We've heard that New South Wales has a more open approach et cetera, but my view - I mean, you talk about the whole of river concept and the like, but for me the fundamentals are consultation, modelling, robust discussion of outcomes.

MR WHYTE: Absolutely.

COMMISSIONER MADDEN: Ability to actually interrogate over time. I mean, from New South Wales' perspective and the Authority, we've heard that New South Wales has changed its approach, but I just want to get into what are actual - the deficiencies in that approach are. So, we've got a broad recommendation, these need to be done correctly and given time, and by that we mean six months, a year, not five years of putting it off. For our recommendation in a sense, and what I think you're asking, is to be stronger in this area on things to be considered, but it's also how they're considered.

So I'm just wondering what the key changes that you would like to see over the next year or so - because we can talk about the outcomes and that it's failing, but it's also - given your history, it would be good to have on record what are the steps that should be expected, and maximise the ability to resolve it.

MR WHYTE: The absolutely key outcome - the key outcome in terms of, if we're going to tackle seriously the issues that Ned's, you know, very well described and all of the issues that the Aboriginal guys have about how their river is being run, all of which are valid, the fundamental need is for the rule systems and the structures to be there to be on a whole of river basis.

Now, if you went to any other river in the basin you don't have a series of sectionalised silos that don't talk to each other, yet that's exactly what is the case currently today in New South Wales, so that if you're going to make the progress that I would have thought everyone here probably thinks should be made, we have to break down those sectionalised silos and we have to have an approach to running the river as a whole river.

You did make mention earlier of the Murrumbidgee as an example. The Murrumbidgee has operating rules under its water sharing plans that link into the Murray, and those rules, like all of the rules, aren't perfect, but at least there's a structure and there's a system. That is completely lacking on the Darling River. It starts in Queensland and finishes at Wentworth, and there isn't anywhere a rule system that goes along the whole river. Now, why on earth have I got to make comments like that in 2018? I can't explain it, and I would have thought that, if we're going to make progress on that, that's the key issue. Get that principle right, then the detail will fall into place.

Now, in terms of what's New South - what is New South Wales doing about extreme events or water quality stuff, all I've heard to date is very simplistic rhetoric. I've yet to see any sign of any commitment to do anything at all on any of them. As an example, and I'd suggest that the water quality and the extreme event policies are inevitably going to be interrelated in terms of how they work, the most recent meeting of the Stakeholder Assessment Panel, which was at the Coomealla Golf Club about two months ago - I attended; Rachel did as well - they made some reference "Oh, we might have a bucket of water to be able to start the river again after it's dried up". Now, that's a mighty fine idea, but how is that linked into where the water comes from, which is upstream, and the answer is "No, it isn't, and it's not going to happen, and - but we'll still have a tag for something here".

Those sort of concepts can be sound as a concept, but only if you actually factor it in to the whole river. Now, that's - that was two months ago in Coomealla, which is just the other side of the river here. So, in terms of what have we seen so far from the New South Wales Government, it's a little bit of rhetoric occasionally and absolutely no substance at all.

COMMISSIONER DOOLAN: Are there any expectations and timelines where you would see something?

MR WHYTE: We're sort of running out of time. I mean, the water sharing plans have to be converted to water resource plans I think end of June next year. We're fast approaching the silly season where everything's going to shut down. We've got elections, State and Federal, and quite likely the homework has not been done now. Now, given that the deficiencies I'm talking about are structural and major, they're not just a little thing over

there that should be tweaked, realistically this isn't going to be fixed by the time the water resource plans are created end of June next year. So, I don't think they can do it, and at the moment I'm not sure there's even a will to do it.

COMMISSIONER MADDEN: So, a couple of questions. I'm just going to ask about the SAPs process, and then the Coomealla meeting. The Murray-Darling Basin Authority, are they at those meetings, and what kind of role will they play in discussions, if any?

MR WHYTE: The MDBA? I think the answer is yes, they would have someone there. Certainly the Commonwealth Environmental Water Holder has people there. It's a probably a question where Rachel would know more detail than I would.

COMMISSIONER MADDEN: Okay.

MR WHYTE: They're there. Realistically, do they understand the extent of these issues? No, they don't. You know, it's - you know, things look very simple when you're sitting in Canberra looking at a piece of paper. The real world is rather ugly by comparison, and I don't think - - -

COMMISSIONER MADDEN: I'm just trying to - and maybe it's a preparation for Rachel when you get up.

MR WHYTE: Yes.

COMMISSIONER MADDEN: But it's just I'm trying to look at that interaction between what you say it's doing and then the Authority coming in and accrediting plans later, and what they're - who's providing information.

MR WHYTE: Yes, one of the fundamental problems we have is that - and it's mentioned briefly in the submission, and this is where the MDBA becomes a bit conflicted at times - is that the Lower Darling River becomes treated, and the Menindee becomes treated, as a milk cow to supply water in other places. You'll have a - you have large volumes of water licences which have been bought, effectively, by CEWH and also by a few other organisations. (Indistinct) come from the Murray and from the Goulburn. "Oh dear, we can't get the water through the choke", which is a physical (indistinct). "Oh, we'll pull it out of Menindee", and they do that, and that's one of the contributors to the sort of - the mess that's there.

Now, that's I would suggest, a fundamental example of a very great conflict for the MDBA and for the CEWH in that they have obligations to meet flow targets as part of the Basin Plan. The Basin Plan is remarkably silent on the Lower Darling River. It hardly rates a mention, but they view it as a source of water, and it's not constrained by the Murray Choke, you know, or Barmah Choke as it's commonly referred to, so they pull water out of Menindee.

We've got the SDL project at Menindee which is an interesting example of how never to do anything, but that's generated by the Basin Plan, and they're going to come up with 106

SDL offsets. It's going to kill the Lower Darling River. It's going to be the exact opposite of what you want for the fish and the ecology. The Aboriginal guys will get cranky, Ned's kids will get crook, back whacky doo, they get 106 SDLs, and that's part of the Basin Plan. You sort of - they're trying to - it's a fundamental conflict of interest in terms of how they're approaching things.

MS HEALY: I think the community going forward see the complete lack of procedural policy in place that is actually going to protect that going - I think it's - the community are just seeing that this is going to repeat, and repeat, and repeat. As soon as we get water, the Murray-Darling, they'll be a call to take it out, and we're left with no benefit whatsoever, and in actual fact it's the complete opposite for us; it harms us so significantly.

COMMISSIONER MADDEN: So just on that procedure and operational type rule change, has there been any discussion and communication with New South Wales department about - that that is changed, that the takeout of Menindee Lakes has fundamentally changed and therefore affecting your reliability over time? Like, I'm just wondering if there's any interaction, because obviously if you - - -

MR WHYTE: The easy answer is very specific. Communication to date is zero.

COMMISSIONER MADDEN: Yes.

MR WHYTE: Not one word written or spoken. The people on the Lower Darling are caught in the middle. There is, I think, an intention in two or three weeks' time for a guy called Jock Laurie, who you may have come across, who is, I think, going to attempt to start the discussion locally on the Menindee Lakes project basin plan stuff, but that's the start of it. You know, consultation or involvement with anyone locally on this stuff is zero.

MS HEALY: I think the consultation that has occurred in the minds of the community has been completely dishonest consultation anyway, and has only come about because of - out of frustration and pressure put on them, and the - yes, the minimal communication that they've given the community is completely distrusted by the community, and for good reason.

MR WHYTE: I can give you a very specific example of that, and Ned's skirted around it, and we were both there at the time. The MDBA, as part of the plan and the SDL components, had to be able to tick a box that they had consulted with people along the river, and it'd be a year, 18 months ago?

MS HEALY: A year.

MR WHYTE: About a year.

MS HEALY: It was when that Matthews report was released.

MR WHYTE: Yes, it's about a year ago. So they ran a bit of a road show along the Murray and they did come to Pooncarie. They were in Mildura as well. The biggest SDL

project - the biggest single physical project in the entire South Basin is the Menindee Lakes project, and that's the elephant in the room for everyone currently reliant on the Menindee. The meeting was held so that you could discuss the SDL process. It sounds very good. You tick the box, and the MDBA tick the box.

There was a categorical refusal to discuss SDL projects. They started the meeting saying they weren't going to discuss anything. That's the sort of standard that's there. Now, it actually gets worse than that because the Menindee Lakes business case had gone through MINCo in June that year, which was a couple of meeting - couple of months prior to this, and the - we had the meeting chaired by the Chair of the Murray-Darling Basin Authority, Neil Andrews. He categorically stated there had been no homework done, or blessed, or even started on anything around Menindee at all, and that obviously they would come and talk to people before anything even started.

Now, I actually had a copy of the Menindee Lake business case sitting in the folder as he was saying that. What that literally is the case, is the Chair of the Murray-Darling Basin Authority was intentionally lying to us, because he goes to the MINCo meetings. Now, that's what we're dealing with, and I would have thought that's pretty serious stuff, but it's Menindee and Lower Darling, so no one gives a toss.

MS HEALY: I think at - if I can use another example, at a meeting held in 2015, where Gavin Hanlon was - held the meeting in Pooncarie, there was an outright refusal to give out minutes to the meeting when, at the start of - and everyone was gathered there, on behalf of other government departments, the Rural Mental Health Team were actually the team, you know, assigned to taking the notes, and the community was left - we were told everyone had to submit their email addresses. We were told we would get communication, and there was an outright refusal to release any meeting notes, minutes, or anything like that. So I think the consulting that's been in place for the community of the Lower Darling has been, you know, minimal and dishonest at best.

COMMISSIONER MADDEN: So just, I guess, a follow up, which is about that information going forward - not too much detail in terms of every little technical detail, but I just want to also (indistinct) that process, and then interaction with above Menindee. Are you - - -

MR WHYTE: There isn't any.

COMMISSIONER MADDEN: The common process is that there's no coming into that process even at a New South Wales-wide level, and again I might have to as you - - -

MR WHYTE: Again, probably - better to ask Rachel, but I can predict the answer: there is no communication at all, and it's not allowed, despite numerous requests for it. Now, I can't understand how you could possibly have a series of operating rules along a large river system where there is literally a current refusal to allow those silos to interact with each other. It's obscene, but it's what's happening.

COMMISSIONER MADDEN: Yes. So, there is a comment that they do interact, because there's always an end of - existing kind of target.

MR WHYTE: No there isn't. That's not correct.

COMMISSIONER MADDEN: Sorry, sorry.

MR WHYTE: Sorry, there isn't.

COMMISSIONER MADDEN: I'm talking about Macquarie and others like that.

MR WHYTE: Yes, look Macquarie, Murrumbidgee, Murray.

COMMISSIONER MADDEN: Where you've got a regulated system. So, the question is, how do you make them interact better and take that into account? Now, I would have thought, and I agree with you, that the bear minimum is being able to see what's happening above and interacting with that. So I'm not disagreeing, I'm just saying that there are processes, and the same with the Murray, and operational rules of things that the public and people on the Murrumbidgee can understand how the things interact and rules changes occur.

So, it is strange to me that we have a WSP process that you go and kind of touch on things lightly, and not actually have that process along the river, and actually more importantly, why is it just in WSP processes and not public, so anyone can actually see what's going on? This is not something we've looked at in detail, but it is a very different process to the water sharing plans done in the past, which were a very public process and a very information rich kind of process. So, even if you weren't at meetings you knew and you could find out what was going on.

MR WHYTE: I think there's a combination of issues that lead to that problem, and maybe some fairly straightforward ways to rectify it. In terms of the first part of your question, of how - you know, what do you actually do to get around these sort of issues, I'd suggest that historically there's been a reliance on modelling, but unfortunately the modelling is not accurate in low flow years, and it's the dry years that matter. In a wet year there's plenty of water around; it's what happens in the dry years that's the problem.

I'd suggest that that focus on modelling should change, and it should change to a series of deliverable outcomes that trigger things under water sharing plans or water resource plans.

COMMISSIONER MADDEN: So more the event-based.

MR WHYTE: Yes.

COMMISSIONER MADDEN: Yes.

MR WHYTE: Every event, particularly in dry years, if difficult. It's not easy to guess what's going to happen before it happens. Now, if you want to have a guess at what's going

to happen in a wet year, yes, you can do that fairly well. In a dry year it simply doesn't work. So I would suggest a mindset of deliverable outcomes, which include fresh water to the bottom of the river, because it's only fresh water that'll fix the sort of issues that Ned and her family have gone through, and having a rule system based on deliverable outcomes rather than 120 year model is, I think, going to be one of the key ways to make this process better.

Now, it's true that each of the individual water sharing plans in the sections of the river do have deliverable outcomes and systems in their own area. What they don't have is the connection into the next one and unfortunately the bottom of the river is what cops the consequences most, so that building in a series of deliverable outcomes on a whole river basis into the rule structures around the - what are now individual water sharing plans is the way to actually do it. Unfortunately to date there's a refusal to do that.

COMMISSIONER MADDEN: Yes, and probably impossible to do in - - -

MR WHYTE: Not by next - - -

COMMISSIONER MADDEN: Nine months.

MR WHYTE: Yes. In terms of the question about why those things are happening, the political influence of guys up north is far greater than the problems Ned's had with her kids. That's the rather ugly reality. I'm sorry to have to say it.

COMMISSIONER DOOLAN: Look, just before we let you go as well, in terms of the Menindee project, or that you said you're expecting it to kick off in two or three weeks' time.

MR WHYTE: Maybe.

COMMISSIONER DOOLAN: Maybe, but what would be good consultation from your perspective?

MR WHYTE: Well, certainly what we haven't seen.

COMMISSIONER DOOLAN: So, not perhaps what you've experienced to date, but what you would be happy to be involved with.

MR WHYTE: I think the fundamental issue about consultation is it's got to be two way, and it's got to start early, and there used to be people within departmental structures who had the ability to sit down in a meeting at Pooncarie and have a two way discussion, and there was historically a huge amount of respect going both ways there. Unfortunately all of that ability within the New South Wales department didn't survive sundry restructures, and so the people who are there now don't - simply don't have the ability to sit down in a room, you know, meeting at Pooncarie, which is as polite a place as you'll ever find to have a meeting, and have an intelligent discussion on anything.

The restructures within departments mean that none of the people who have been appointed to current positions have that skill or ability. It makes it rather difficult. It's probably why Jock Laurie has been asked to chair the sessions that are being flagged for the next couple of weeks, I think just before the end of this month. It's all rather difficult to actually now take the consultation seriously when the Menindee Lakes project has been through MINCo twice. It's the basis of 106 of the 605 SDL offsets that were not disallowed by the Senate - I'll get the terminology right - back in May, and yet that's based, effectively, on storing a lot less water at Menindee and using it quicker, which means Ned runs into that problem more.

Now, there's a fundamental conflict there. Myself and I think one or two other people here were at a meeting last night in Mildura, and there is a fundamental conflict around the issues at Menindee and the Basin Plan, because what's proposed at Menindee is a component of the Basin Plan. It's the biggest single SDL, you know, physical project in that component, and lots of people wax lyrical about "We have to have a plan", and "The plan's great and we've got to have it". Well, the plan's about killing Menindee.

The alternative to doing the Menindee project is the New South Wales Government buys 106 gigs of cap equivalent water so they get 110, 120 gigs of high security, or perhaps two and a half times that of general security, four or five figures, in Griffith and Deniliquin. I don't think they're going to do that, but the Darling, Menindee, and people along it become expendable to avoid having to do that. How do you have an intelligent consultation process when that's the mess we're in now? I haven't got a simple answer. I wish I did.

COMMISSIONER MADDEN: Upfront discussion can at least start it.

MR WHYTE: It would be a good place to start. Yes.

COMMISSIONER MADDEN: No, thank you.

COMMISSIONER DOOLAN: All right, thank you. Okay. We'll actually now move to Rachel Strachan from the Lower Darling Horticulture Group. Just introduce yourself, Rachel, for the record.

MS STRACHAN: Thank you. I'm Rachel Strachan from the Lower Darling Horticulture Group. I live halfway between Wentworth and Pooncarie on the Lower Darling River. I'm a member of South West Water Users. I represent the Lower Darling on the WaterNSW Customer Service Advisory Group, and I'm also part of - the Lower Darling representative on that - New South Wales Murray-Darling - sorry, yes - Murray-Darling section of the water resource sharing plan, on their advisory panel. I've just got an opening statement.

COMMISSIONER DOOLAN: Sure. Please.

MS STRACHAN: Thank you for the opportunity today to appear before the MDBA Productivity Commission. I am here today on behalf of irrigators on the Lower Darling River, downstream of Menindee Lakes, and particularly the ten families who irrigate permanent plantings that produce high quality citrus, stone fruit, wine grapes and table

grapes. We're all farming family who have been in the region for generations and would like to remain in the region and continue to farm for generations to come.

The irrigation of permanent plantings is a significant component of our agricultural enterprises and underpins our family businesses. We've always needed a plan for water management in the basin that makes sure the rivers continue to be healthy and productive. However, production of permanent plantings is becoming increasingly difficult because of reduced security of water supply to Menindee Lakes. This is not the result of drought, which we've coped with on and off for decades. Increased releases of environmental water, such as what occurred in the summer of 2016/17, now draw water down from the Menindee Lakes quicker than ever before, reducing water availability to the Lower Darling. This has already made the viability of horticulture and viticulture marginal.

The proposed Menindee Lakes project will further reduce the security of water supply to the Lower Darling that will make our irrigation businesses unviable. The New South Wales Government and MDBA have told us absolutely that there is no future for permanent plantings in the Lower Darling. While we could accept a structural adjustment package for horticulture and viticulture on the Lower Darling, any changes to water availability and water supply in the Lower Darling must consider the needs for town water supply, domestic needs of properties that draw water from the river, and the environmental needs of the Lower Darling should not be sacrificed for environmental outcomes further downstream in South Australia.

We would like the Productivity Commission to recognise those impacts and the impacts on our lives, and we believe they are not understood by governments. If we are going to be sacrificial lambs for the Basin Plan then we need to be compensated the loss of our businesses. We would prefer to have a guaranteed supply of water, but it seems highly unlikely.

COMMISSIONER MADDEN: I guess there's a couple of things. The very first thing, maybe just to tie off some of the water resource plan, and then go on to the future, whatever that entails, just because of your role in the discussion we had, do you want to say anything regards the SAP process to date?

MS STRACHAN: Yes.

COMMISSIONER MADDEN: And that kind of interaction with water resource plans, and then we'd like to move on to, obviously, how to progress a kind of a wicked problem that's - - -

MS STRACHAN: It is.

COMMISSIONER MADDEN: I think it's facing governments as well. We've got to give that, that I think some of the uncertainty around 200 people is the uncertainty from government's perspective. This is a trade-off, and I think they're well aware of that, because there are impacts, and I think we can say there's got to be impacts once you change rules and operations, not just (indistinct).

MS STRACHAN: And there's two things at the moment. They haven't - they're not addressing the issues of third party impacts that have already been felt by - especially changes to all the development of the Barwon-Darling water resource sharing plan, which - we've never had any of that articulated to us, or the transparency of it has been zilch.

COMMISSIONER MADDEN: Yes.

MS STRACHAN: In this process moving forward we've asked to actually participate in the development of the Barwon-Darling resource sharing plan. I had an email; this morning again saying that, "No, that will not be possible", and - - -

COMMISSIONER MADDEN: Sorry, is there any reason given?

MS STRACHAN: They took it to their advisory panel and requested it, and the comment come back with - that they would prefer to deal with those upstream, the SAPs, who are going to have an influence on the Barwon-Darling one, but there's no consideration for us, being downstream of the Barwon-Darling, and that's - - -

COMMISSIONER MADDEN: Sorry, so - - -

MS STRACHAN: So New South Wales - - -

COMMISSIONER MADDEN: So they asked the advisory panel to advise them whether you should be involved this year?

MS STRACHAN: Rather than a government having two resource plans articulate to each other the needs of each other. The example I used to them when I request it was that the Murrumbidgee Water Resource Plan is linked with the Murray-Darling - Murray and Lower Darling Resource Plan, in that especially that when general security licences on the Murray are below 60 per cent there can be no supplementary water allocated in - or no event can be permitted in the Murrumbidgee if it can be, like, reregulated to Lake Victoria.

COMMISSIONER MADDEN: Yes.

MS STRACHAN: So there's a whole connection that considers the downstream needs of the - - -

COMMISSIONER MADDEN: And redirection and the - - -

MS STRACHAN: The Murray and a lot of the Victorian ones also have downstream considerations in their water resource sharing plans, because they have to consider South Australia. We're the only one that sits high and dry, that there is actually no connectivity, and there's no preparedness of the government that I can see that will let the north and the south have that unity, which is one of the biggest things that I thought was sold to us as a community.

Whether you were a city person, a farming person, someone in the local towns, we were sold on the whole idea of - that we were going to have the Murray-Darling Basin come in, we were going to have instreamed - instream health returned to the rivers, we'd have connectivity. The catch cries were amazing. We all agreed with them and thought "Wow, this is perfect", because while we have healthy rivers and just that basic river health, our communities thrive, our businesses thrive, and the local ecology thrives, so how can it go wrong? However, we don't have - seem to have the will of the government, I don't think either federally, in the MDBA, or in the state, who will need to stand up to some of the industry that feel that they may be impacted, yet there's other industries that have been hugely impacted.

COMMISSIONER MADDEN: I assume you kind of agree with the event-based management type discussion, and we've had that - I'm sorry, I'm struggling a little bit, but just thinking about the SDLs setting how they are actually holdings in the various different valleys in the north from the environmental perspective. I know some of them are used at Macquarie Marshes and things like that.

MS STRACHAN: So we - - -

COMMISSIONER MADDEN: You just wonder, will that have an impact in the long run? With the changes and the event, you know, the shepherding from last year - no, sorry, earlier this year, actually make a difference. Do you think some of those things are at least headed in the right way? We've got some recommendations around, we call it, the Northern Basin Environmental Coordinating, kind of, Committee, to have some integration from an environmental water perspective, but you're obviously asking for that to be more operational as well, in terms of integration.

MS STRACHAN: However, that was Rhondda Dickson and Craig Knowles, I think it was, had actually, when they sold that to the Northern Basin, assured the Northern Basin that all water recovered would be used for benefits of - for the Northern Basin, within the Northern Basin. So the only time you're going to get benefit is in an uncontrolled flood event. So, they may put it in their report that they've contributed to the Southern Basin, but it'll only be in those really large events that - in those small to medium flows, in the dry years, when it's critical to have that instream health maintained and that connectivity of small flows, that's not covered off in the Basin Plan at all.

So, we're going to continue to see absurd third world water quality issues from Bourke down, and unless they actually have the will to start protecting some of those first flush events and that to actually get outcomes to - at - basically Wentworth, is has to be, because you can't have the Darling River just cut off at Wilcannia.

COMMISSIONER MADDEN: I know this is a difficult question, but I just see that we've got two main issues here. Obviously there's the plans above, not allowing enough water or trading and take levels taking water out of the system, which you would think over time would show up in the SDL accounts and things, notwithstanding measuring issues. So obviously that's one threat, if we're talking about risk management approaches. The other is obviously the operation of Menindee and how water is taken out. Is there any

process that's looking at what the fundamental issue is for the Lower Darling, that you're aware of?

MS STRACHAN: Yes. So, we haven't seen any of the proposed operational rules under the considered SDL that they're proposing there. However, we are currently living in the way that the plan will be living its life out at Menindee, in that, as Alan touched on, with the PPMs, which is the - they can have a preferred lake, or preferred water storage that they pull water out of. It's easy apples out at Menindee, so it's quicker and simpler to pull it out of there than (indistinct). We're going to have constraints there that actually block off the natural anabranch channel, and then they drain the lakes quicker at 14,000 meg a day, which will also deplete our supplies at a far quicker rate.

Alan touched on that a lot of the - the water recovery at Menindee is minimal. There's been substantial water recovery in the Murray and the Goulburn. Quite often that water is actually transferred up to Menindee and then delivered out of Menindee, rather than delivering it from where it originated in the Murray and the Goulburn system. So, all - everything is just putting more and more pressure on the Menindee Lake system to do all these deliverables which, at the moment under just a drought and the reduced inflows from up north, without the Basin Plan, we're getting by, but by the skin of our teeth because of those reduced inflows. The Basin Plan just pushes us completely over the edge, because you can't have less coming in and more coming out, and having us be able to be sustainable where we are.

COMMISSIONER DOOLAN: Okay. Effectively a perfect storm for the Lower Darling.

MS STRACHAN: Ok, it is, and I really, really think the Government would just like us to go away and let them achieve their 106 SDLs, and it would make their life easier. They've achieved outcomes, so they're not going to be hurting the electorates further to the east, or pulling water out of other communities. We're a small community that - there's 50 family farms there that appear to be easy collateral damage.

COMMISSIONER DOOLAN: So given it is an area of significant trade-off, then it is critical to get the process, the information, consultation, for these right. So what do you want to see?

MS STRACHAN: We'd like to see transparency.

COMMISSIONER DOOLAN: Yes.

MS STRACHAN: We'd like people to actually come out and speak to us about what they're proposing to do in our area. We haven't seen one benefit to any one person in the Lower Darling, whether you're a cod, whether you're a Yellowbelly, whether you're the shop owner, whether you're a farmer; there's not one benefit. It's just basically raping the whole area of everything.

COMMISSIONER DOOLAN: So it's not - nobody's looking at this as a trade-off, nobody's actually putting in place "How do we manage this? What's the outcome we can all live with?"

MS STRACHAN: Our preferred outcome?

COMMISSIONER DOOLAN: Yes.

MS STRACHAN: Is to go back to having a reliable supply of water which, while we have a reliable supply of water, we have a healthy river system, so our ecology is healthy; it's an amazing area that is isolated and protected. It's got one of the most amazing - or the best cod - natural cod population in the Basin. It's the highway hatchery of industry and flows that come from the north and come through the Menindee system for hatchery or the Yellowbelly, so ecologically I don't know how they can really wipe it out.

When all that's happening, out town of Pooncarie thrives, and we have every grey nomad and fisherman from Mildura heading up there and putting money into the local economy. Our events are all well - without water in the river it's pointless having the school there and a bitumen road and that, because no one's going to go out to, yes, a few dead gum trees along the river, and our businesses, if we don't have water 365 days of the year we don't have a business. We can't water our sheep. We've grown citrus. They're on the Lower Darling since the 1920s.

In 1943 Hipsleys carted water from holes in a horse and cart for, I think it was about eight weeks, to get their small trees to continue growing. We never saw another dry riverbed until 2003, and when we saw that there were some major issues that had occurred, that Government had pulled the Lakes down really, really quickly to save the Murray, because they were in dire straits, and we never thought we'd see that again, and I thought it'd be something I'd be telling my grandkids that I'd lived through, but it wasn't going to happen continually.

COMMISSIONER DOOLAN: Okay. So, from your perspective, given our brief, what would you like to see us recommend?

MS STRACHAN: I think the Basin Plan has to go ahead, and we have to have a healthy river system. If they're going to get the objectives they are out of Menindee they have to take care of those negative impacts that they're causing. If that means that we can't grow viticulture and horticulture there, so be it, but you've also got to take care of the stock and domestic issues, and you can't kill the Lower Darling. Like, I thought the Basin Plan was actually there because irrigation and that had taken over, and we'd forgotten about the health of the rivers.

So, I think it's a bit ironic to be killing off a whole section of the river to possibly, maybe, save something down in the Lower Murray, or dilute the Southern Ocean, or whatever it is that they're trying to do, which - I won't get onto that, because I'm sure you'll get told all about, yes, (indistinct) flowing in the wrong direction or whatever, but it's - I don't believe we should be sacrificing such an important part of our ecology in Australia's natural - it's just -

it's beyond words that in 2008, when Alan and I first really started to raise concerns, the many changes in policy that have gradually led to the demise of the Menindee Lakes, the Basin Plan will just completely push it over its - over the edge as far as we can see.

COMMISSIONER DOOLAN: Okay.

MS STRACHAN: But right up until now, and probably only the last couple of years - well, until 2014, "So you've got nothing to worry about. The Lower Darling is too important. We have to supply Broken Hill with water, so we've got to have a certain amount of water come through from the north, into Menindee, and that will always maintain a connectivity through to Wentworth because - so your high security irrigation and your permanent plantings will never be without water." We were just continually made assurances that have just proven incorrect.

Now we've got a government - oh, 2014, New South Wales Government actually came to us and said "Under the Menindee Lakes water savings project we can't see a viable future for permanent plantings. We think you should look at a compensation package." So they came to us to start with four years ago, and they've still got us handing out to dry at the moment, that we can't make productive decisions because our ten-year business plans went out the window with that advice from Government, yet we've been left there without any assistance or any guidance as to what our future is going to be, except that all we can see is Broken Hill's water supply has been taken care of, as a pipeline from the Murray. Tandou, the one big corporate, who was on a general security irrigation licence with an opportunistic crop of - they'd only plant it if there was water there - they've had a compensation - a complete capital adjustment package that actually paid out their irrigation infrastructure as well as their water and whatnot. So it's like, well, why would an opportunistic cropper be taken care of prior to permanent plantings that require constant water? It just doesn't - we can't make sense of it, and it doesn't seem to matter where we go.

We get sympathetic shoulders wherever we go, but there's not one person prepared to make a decision and actually go "This is the facts. This is what we're living with in this day and age. For us to achieve this, these are the outcomes that we're going to have to address", and they need to be done now, not in 2022, '26, whatever. Like, we'll be gone by then. Like, Ned's kids, they can't live through that. I refuse to use and Darling water in our house at all for many years, and it's just - it's not good enough. Like, you live in Australia. We're not living over in Africa somewhere where we're some third world country. It's just crazy.

COMMISSIONER MADDEN: Maybe a more mundane - it's not mundane, but it's about the people out in the area. You said there were 50 farmers, and obviously they're the most impacted.

MS STRACHAN: There's 50 farms. There's probably about 70-odd families.

COMMISSIONER MADDEN: Yes, I was going to say, so the first impact, I guess, would be permanent plantings, and people are using for irrigation. But that process in kind of looking forward, and if it's well designed, unless, you know, one of the options is, you

know, restructure, all those kind of things, how long do you think that group would take to, you know, get together, work out what is the future, what are the options, work through a process? I know you're about to start it with Jock Laurie, but I'm -has the group thought it through about how they would actually work together to address that one way or the other?

MS STRACHAN: We started this four years ago.

COMMISSIONER MADDEN: Yes.

MS STRACHAN: And when New South Wales come to us we formed the Lower Darling Horticulture Group, which is every viticulture and horticulture property below Weir 32. So we weren't prepared to leave someone behind. It was like either, if you're going to go and compensate us, don't pick one or two of us out; you do the whole lot or don't do it at all. You give us a security supply of water. So we've been on the front foot back then when we were given the advice. We went out, we were looking at alternatives, options and that. After four years that does your head in, that you get to a certain point when you're looking in an alternative industry and then it's like you take the next step or you don't. Yes.

We've got lots of ideas, but at the moment we've really got to concentrate on keeping our places viable in the capacity that they are, because Government doesn't seem to be moving quickly at all, and we can't ignore what we have there now that is very viable. We have citrus, easy peel, seedless, that goes over the China. The wine grape industry is starting to really boom again. Like, we're making substantial income off what we have there. The one ingredient that we're lacking is a reliable supply of water, which historically we had.

So, we're looking at - there was a property in Victoria just a month ago that - a group came in and bought it for \$50,000 an acre to clear and then plant it up to table grapes. We've got hundreds of acres on our property that is perfect sandy loam soil that is probably worth \$25 an acre because we no longer have access to development - or that reliable supply of water. We were going to continue to develop, but this Basin Plan has devalued our property to probably a tenth of what it's actually valued at because we haven't got that reliable supply of water, and people want us to be supportive of it, and that's like, I can be supportive of the rhetoric of it, but the reality of it is just killing us.

COMMISSIONER DOOLAN: All right. I think that's - thank you very much for that. Points well made. We would now take a short morning tea break and we'll reconvene at 11 o'clock. Okay.

ADJOURNED

[10.40 am]

RESUMED

COMMISSIONER DOOLAN: All right, we'll just now resume our hearings. The next

participant is the Mildura Rural City Council and we have a delegation, with Mark Eckel, the mayor; Martin Hawson, the general manager; Mark Jenkins, the Community Futures; and Jason Modica, a councillor. So if you wouldn't mind again just introducing yourselves for the transcript and then some opening remarks. Thank you.

MR ECKEL: Yes, thank you Chair. Counsellor Mark Eckel, the Mayor of Mildura. I'll open the proceedings from our perspective.

MR HAWSON: Martin Hawson, General Manager, Community with Council.

MR JENKINS: And Mark Jenkins, Manager, Community Futures with Council.

MR ECKEL: First up, a very warm welcome to our beautiful city, great to have you here, and we welcome the opportunity to have input into this very important report that you're putting together. We see our role as advocating for what we see as important, if not the most important issue, to our future and I'd like to refer to it as water is the heart of our community. We have provided comments to two previous inquiries into the Murray-Darling Basin Plan and the key themes that we've covered have been governance, transparency, reporting and security of water. Interestingly, these themes are evident in the Productivity Commission's report and Mildura City Council, being the oldest irrigation colony settlement in Australia and as a major service centre for surrounding towns and communities, including areas across the border into New South Wales, I'll just touch on in a moment, but the agriculture, tourism, retail and service sector are key components to our local economy and water security is crucial for our community's economic and social future.

We believe that local government could play an increased role in the development, implementation and management of environmental water projects. Local government is intimately connected with all aspects in its local area and well equipped to balance the complex and often competing social, economic and environmental needs across the municipalities.

I think a little bit is going to be said about the millennium drought in our proposal and can I say that let's go back a few years to those years and can I tell you from a community perspective, I've been a counsellor for 18 years so through that time, through that very difficult time of the millennium drought I don't think it's realised outside our country communities and communities like Mildura, that the devastating effect that reduction of water, to be able to provide water for the grassed areas in our community, like our magnificent Deakin Avenue, we went through a period there where it was only getting water once a week and it was dying. Where our elderly community, and as you well know most of Australia, particularly in the country areas, there's an ageing population, and the stress that that puts on the elderly not to be able to water their gardens, you know when you get those restrictive times, it's a real issue within our community during that time. And I don't know whether you've heard, but our friends across the river, up the reaches of the Darling River, what is happening to our Aboriginal community, and they're coming down here to live in our area for the reasons that Murray River is, you know, a flowing river, because the Darling River is just devastated. And you know, I really call it genocidal

geographical issues because what's happening up there with the people, the Aboriginal people taking their lives, is absolutely devastating, to such an extent where authorities are going around chopping the limbs of trees down to prevent people taking their lives. Because that's the life - the river is their life. As far as a parallel is concerned, it's probably as distant as you want to make it when people are taking their lives because their river, their way of life has been taken from them and communities like Mildura where we need the water to be able to keep the social life and activity of our community going. So I just thought I'd - thank you, and then I'll pass on to Mr Hawson.

MR HAWSON: Thanks Mr Mayor. So what we've done we've provided our written response and that's all been submitted, so what we thought we'd do is just pick up on those key points in response to your - to the recommendations from the report and, I guess, and the mere mention that we've done a number of, I guess, submissions to different inquiries, they seem to be quite frequent the inquiries into the Murray-Darling Basin Plan, and so we've drawn on those submissions, which was been to Council and Council has talked about those issues and then correlated it with the recommendations and the points you're covering.

Some of the key issues I guess, in general Council supports any improvement to the transparency and accountability regarding the recovery of water, which was clear in your document. We also in support in general targeting assistance for those communities who experience adverse effects following water recovery. And I guess the mayor just gave a few of those anecdotal examples there that you guys have picked up as well. The supply and measurement tool kit we thought was very important. In principal, Council supports the proposed improvement to measure - that measures transparency, accountability and governance relating to the supply projects. The continued readjustment to the plan makes it difficult for the Basin communities to justify their support or activate resistance. Governance, transparency and accountability measures need to be in place to consider these effects of supply projects on all Basin communities. In our submission we have highlighted two supply projects that have a negative effect impacts on the areas of the Basin, in particular the negative environmental effects. And probably because we see it firsthand and we can visually see rivers drying up and so forth, that that's very pertinent.

The water trading rules. Ongoing expansion of the irrigation, agricultural upstream and the recent changes to the New South Wales policy regarding leaseholder land is a major concern for our community. Existing water trading rules, for example the water trading rules from the Barmah Choke are manageable during normal conditions, but during a heatwave or drought created environment where the large irrigators with financial capacity, i.e. who can afford it, will survive, whilst smaller irrigators who can't afford it will suffer the hardships and decline. As a consequence, other drought would further weaken, destabilise the social and economic fabric of our community. And during that 2011 period there was a lot of information that we had to trawl through that highlights the impact of that. And we talk about that in our submission but we've got a lot of evidence in regard to what the impact was across all fronts; financial, social and environmental. Council would support the improved trading rules that would provide benefit and confidence to our local community so there is security of water which would be imperative, because for us, if we don't have water we don't survive, basically.

Compliance and reporting, monitoring and evaluation. Council generally supports any guidelines, improvements in compliance reporting, monitoring and evaluation of the Basin Plan. We would welcome an independent water ombudsman that would provide independent scrutiny of all aspects of the plan. Would consider the best interests of all parties and ensure transparency and compliance with the existing legislation and agreements. We would also like to see an increased level of public reporting on the evaluation and outcomes of water use. The reporting needs need to be transparent and readily available to the community that knows where the water is being used, how much is being used and the environmental/economic benefits. Mildura City Council has firsthand experience of the impact of low water allocations during the 2007/9 drought and evidence suggests that if it were to occur again impacts could be even more devastating and far reaching. In general we welcome the Productivity's review of the Murray-Darling Basin Plan and applaud to the Government's response to the recommendations made in this document.

We then go on to sort of highlight, I guess, the discussion points that we sort of want to further explore and the report that you've put forward does highlight a few of the other issues that we think we could be more involved in or have more evidence for. However, it probably hasn't been discussed at Council level for us to put those forward but they're certainly points for consideration. Especially around your recommendations in Chapter 14 around the governance arrangements and your proposal of different bodies to - or separating the bodies that are looking after the plan. So there is a bit more of a redundancy in the decision-making that doesn't seem to be there at the moment, and that might assist with the conversations with communities, so all the issues that are happening, there is more of a robust sort of mechanism behind what is actually coming out, so we certainly welcome further development of that.

Clearly reporting on the actual implementation in project or otherwise. It's very difficult to understand if a plan is going to work unless we have a really rigorous understanding of what actions and the level of actions that have been implemented, which seem to be problematic in finding that out, so we can't - it's hard to know if it's working and, anecdotally, there are a lot of issues stemming from that and whether they're a result of the plan being implemented or not being implemented it's sort of difficult to say.

Yes, some of the other aspects in terms of what the importance is of the flow on instruments of the plan and how they have a direct impact on our community, there needs to be far more reporting on those impacts. Any social impacts and so forth tend to be two years away from when they actually happened, as opposed to the outcomes that they actually occurred, and we see that as a real problem, so any of those transparency mechanisms that you're talking about in reporting would certainly - certainly help.

So I'll just open it up to the other councillors and Mark, who's the author of our report basically, for comment.

MR MODICA: I just think it's - we've been lucky enough to go through the process of having, as Martin said, quite a lot of commissions or investigations into what's gone on in

our region, and particularly the focus on the Darling. The deeper concerns are that how we look at the river system without the border between Victoria and New South Wales. Taking up what Alan said before, how do we get to the point where we know what's going on, and as Martin referred to, how we get a decent result out of all this money being spent, \$13 billion on a Basin Plan and we have such a disastrous situation across the river from us and the eventual pressure that it will put on our region. I think in 2007 and 8 irrigators here were only receiving 30 per cent of their water allocation, from 100, and it took a very long time for people to come back from that. And I believe there's, you know, 40 to 50 per cent more plantations have gone in from then until now so, I believe it was said before, it seems like a little bit of a perfect storm in regard to what the municipal council will have to deal with, the State Government and the Federal Government if this does descend into a disaster like it was here in 2008 and 9.

There's a lot of really good information around, there's a lot of really well-educated people on how the system works. There does seem to be a little bit of dominance from large irrigation and large horticulture through lobbying. It's a natural part of our economy and our business life at the moment but there probably needs to be, maybe through an ombudsman, an opportunity for community to push back, to have an equivalent point of power within that relationship in regard to how water is distributed and how this very, very complex system works.

MR JENKINS: I might just add, Martin did mention about the separation of the Authority, which Council hasn't considered, but that was - when you read the document it doesn't make sense that when separation, where someone else, a section of the Government makes the rules and enforces the rules, then the Basin (indistinct) responsible to work together to comply and make it happen, but I think now the current model is difficult to make that work properly.

The other thing I think, when you read this and other documents we've been through previously, is that the Basin Plan relies on collaboration rather than like a strong enforcement mechanism, which I think it needs more of that rather than - because collaboration I don't think has delivered the goods in total. So you can't rely on it. If people are supposed to get together and they don't, well you need to take a different technique and that's probably - in this model here they're proposing is that the Australian Government takes that role. That's the way I take it when you read this document. This has been suggested.

COMMISSIONER DOOLAN: Our draft recommendation is that we would separate the two key functions of the Murray-Darling Basin Authority; the regulatory function and the function that actually assists governments to collaborate and keep those separate.

Look, thank you for that. I suppose I'm a little interested in key areas where you support the recommendations. It's good to hear, but there's others where it would be interesting - your idea of the ombudsman or - what is the actual, I suppose, problem that is - you're seeing with the current arrangements, and I just wonder, if our draft recommendation of the regulator might fulfil that need. So, you know, are we seeing the same problem? So if you wouldn't mind just thinking about that.

MR JENKINS: Well the ombudsman was written at a time previous to reading this, of course, so obviously if that aligns with that I think you'd probably think that was a good idea.

COMMISSIONER DOOLAN: Yes, okay.

MR HAWSON: We just felt there needs to be some sort of better governance and mechanisms in place that are controlling the administration of the plan and deployment. As soon as you find that you've got one hat and you're doing two functions, local government often finds itself in that space, it can be problematic in terms of implementing something that's so important. So I guess the principle of what you were saying with your change in the model was similar to what we were saying in terms of an ombudsman or a -
--

COMMISSIONER DOOLAN: Yes. The problem you were trying to solve was sort of a similar problem.

MR HAWSON: Yes.

COMMISSIONER DOOLAN: Yes, okay.

COMMISSIONER MADDEN: So just on that, the leasehold land trading that was raised there in New South Wales, I'm not aware of that. I'm just wondering what that issue is and

MR ECKEL: I think in the original work we did for the Basin, it was the South Australian Royal Commission, was that land that previously wasn't irrigated being opened up for irrigation. Meanwhile, other land that was irrigated is being, I suppose, shut down. But Council's main concern I suppose comes around upstream development basically on greenfield sites. And that actual article came - that was actually an article that was - it was published that article about, you know, western lands which is lease land coming on line and potentially taking water, it's basically greenfield site.

MR HAWSON: And that was the Commissioner for the South Australian Royal Commission, was very interested in the fact of the rules and governance that was around the opening up of large irrigation areas and what the planning controls were at a local level in terms of what is in place. And when we talked through that he was, I guess not alarmed but he did show a fair bit of concern that there's more - less controls on that than there is to build a shed in someone's backyard, in terms of what control we have over those types of things, which obviously if they're reducing the supply chain in terms of how the water can get here, and that's the Darling issue and the Barmah Choke issue and all that issues that result, and you're opening up large scale irrigation, where is the pressure point going to come in local communities that rely on that high security water that could be either not available through supply or not available because they can't afford it. So obviously it's creating a double issue.

COMMISSIONER MADDEN: So there's been recent announcements about using the Mulwala Canal and things like that. But has there been, as far as you know, I guess a structured discussion around this issue with the authority, with the States? Like what avenues - I mean obviously you've mentioned the Royal Commission and we've heard it multiple times, but where do you go to actually get this addressed in a structured way?

MR MODICA: Could I say something for this one. I think it's indicative in the report that 4,500 hectares were planted last winter and 1,550 projected in the next five years. That's in Mildura's municipality alone. That's while water's getting squeezed everywhere. So that reflects back on what you're saying; where is the regulated point of how much land can be opened up in relation to how much water can be delivered. And I think that's a very, very topical decision to be made because the call for a lot of people in politics is that, you know, the market will sort it out, but in the end if the market sorts it out it will be large corporations buying up every drop of water and utilising every inch of land to suit themselves. So I'm very concerned about how we implement some form of regulation into water, because there's that much land out there it's not funny, it's the water to get to it, so it probably needs to be discussed greatly.

MR ECKEL: And I think a salient point that Councillor Modica brought up earlier on was the 30 per cent allocation that we had during the Millenium Drought. Now, you know, we're talking about a Millenium Drought. We're talking about not a drought that was mentioned by Mr Hawson over a couple of years; really it went for 14 years. There was ten years, then there was a little break, but it was - so we're expecting this to happen again. It will happen again. If we go back to 30 per cent allocation right now, the whole industry, the whole horticulture or the whole farming industry is devastated in this area. Bottom line. We just cannot afford for that to happen now. And the opening up of land and licensing, there's got to be some sort of control; whether it's State, Federal, whatever, there's got to be some sort of control over the future licensing regulations and taking into account what the river can provide, for goodness sake. You know it's not a never ending river, is it?

COMMISSIONER MADDEN: Yes, so I guess, and this is the question coming back to trading because I know even in the Lower Murray water footprint, 30 per cent of land is not used. So there is actually plenty of developed land even to trade water in, and that was with your organisation plan trying to be encouraged to bring water there. So, you know, it's not just new development. I guess the question is to me, we've seen a response very recently around deliverability, that someone in authority is looking at options to try to improve deliverability down to the issue, into this area, across the system, which is different to a 30 per cent, you know, from an entitlement. But again the question is, well, where is that addressed in a structural way? I thought Mildura would've been involved in this discussion through some forums.

MR HAWSON: Well that's the problem. There is advocacy groups that you can sort of talk, but there's no sort of - you don't have any decision-making power or, you know, process, I guess, around that. And so it's relying on, I guess, informal networks to actually advocate. The issue that you do have that for all those people to come together, even then you have, because it's such a large area, you have competing demands within the advocacy of the issue, so the issues that are faced up river and so forth it's difficult to get common

ground because you're almost in a competition in regards to the retention, and that's how the big players are managing the situation. They're just doing it purely in a market, whereas obviously we don't have the - we can't do that. So it is you're honing in on a critical point, what is the mechanism? And that's why we come back to the governments. And when we're talking about governments it's about hearing the unheard in terms of creating the policy settings that are going to - we're relying on government to look after us in a lot of ways because we don't necessarily have as strong a voice or we don't have a mechanism to voice our concerns, and that's why we're sort of talking to these various Commissions and so forth that come up.

COMMISSIONER DOOLAN: I suppose I'd like just tease the question of at the height of the Millenium Drought, a high reliability on occasions here were 30 per cent, and there's been a lot of development since then. The fact is though that will happen again and the Basin Plan doesn't change the fact droughts happen. Is there enough on drought planning going along, sort of rather than a - people have to be aware of that when they do build their businesses. Is there enough information out there, so that people are getting enough information to plan for those times when they come?

MR HAWSON: Well basically it's really an individual's decision at the moment - - -

COMMISSIONER DOOLAN: Sure.

MR HAWSON: To make the business decision that they are going to invest and I guess that's why in some ways we're seeing less of development within the traditional older irrigation areas, but we're seeing big development in people that have cashed up enough to take the risk in terms of those issues that you're raising. And their capacity to deal with the issue, i.e. buy more water, have a high licence, have a high, I guess, capacity within their allocation to cope when those things do absorb. The fact that that's going to be very difficult for the smaller growers that are either thinking of selling their water in temporary trading to keep the operations running, that's their decision-making processes at the moment, which it's difficult to know exactly if they are making those decisions based on the fact that there will be a drought and this will happen and all the scenarios that could happen. We're suggesting that's happening probably at the corporation level but the growers that survived well when the drought hit in those times were the ones that positioned themselves to be able to survive and have enough to get through. The pressure point becomes on those that necessarily don't have the capacity or can't, and that's probably going to go through that process again, but we lost a lot of - through that process. So, a very difficult question.

Now is there enough information out there? I'm sure people that have lived through it know that it's happening but whether they can control it is a - and prevent it is probably more of a question. But I think there's that much large foreign money coming into the region that they - there is information out there, but have they done their due diligence in the nature of the variability of access to water in regard to temporary market. I was at the Murray-Darling Association meeting about six weeks ago and the cotton and the rice municipalities were saying about \$330 of temporary meg, they're walking away from it. So if you look at that 1,550 acres projected in the next five years, some of it might come about if there's a drought but there's still people speculating on that, and we haven't even hit the drought

there, we've got another 12 months to go. We might get a heap of rain between now and next June, but what will water go to? And this is that idea of a regulation. So we don't have a regulation in opening land. We also don't have a regulation in who and how someone can pay for water at \$400 a temporary, or \$5,500 for permanent water. So we're in a really interesting area of what land - what the land - we can have as much land as we want, how much water can we put on it, and how much information have the people who are speculating on our land and our water. We're predominantly fine. Obviously there's local companies that do it as well on small family holdings. What is the result of that influx into an area that has been quite remote and had its own sort of regulatory systems for a very, very long time. It's going to be very interesting, to say the least.

MR ECKEL: The warning signals that we're announcing now in regards to there's got to be more regulation in regards to licensing and allowing of them, more properties, more of these big farmers coming on, is the example that we gave years ago as far as Timber Corp was concerned, superannuation. And what they did to devastate the area. The great big dams that they were - and water that they were drawing, that was sending the Murray River backwards when they switched their pumps on, went into dams, that the dams were all leaking and water going everywhere. And people in this area were yelling and screaming about Timber Corp and about what was happening to the water at those particular times. We weren't listened to. They went broke, then it all unravelled and everybody found out that - how the water system was being abused. We're saying exactly the same - well I think we're saying exactly the same thing now, that there's got to be some sort of regulation. There's got to be some sort of - regulation around the growth of farming.

COMMISSIONER MADDEN: This is a very complex discussion, I would say. I guess - I think that's a very difficult proposition in terms of using land controls because if you think of - - -

MR ECKEL: Yes, I realise that.

COMMISSIONER MADDEN: If you think of - imagine the coordination below the Choke that you'd have to do across States to have any consistent kind of approach. So realistically you're talking decades before three States agree on land controls to stifle and stop development of private land. What I do think is important is the water market and the regulation around deliveries and risk to entitlements, which is someone's job right at the moment, I'm sure at the Murray-Darling Basin Authority. So I guess my questions is well what kind of information/regulation in the existing market which is possible. You know, yes, it's a policy that has to be developed but again I'm just a bit - about Victoria would have to play a role in this. I mean it does come from States originally and then it goes up into the Basin Plan or the Basin Authority in terms of running the system and then again, as a regulator, they have a role as regulator assessing trading rules. So the Authority has two roles here; they have a running of the system role, and then checking trading rules because that's part of the Basin Plan, the trading rules are actually consistent with the principles of the Basin Plan. So again I'm not trying to harp again because I think we've got the answer, that it doesn't seem to be happening in a coordinated way, and this issue doesn't seem to be addressed in an informed, coordinated way, so I think we're almost back to Lower Darling territory.

COMMISSIONER DOOLAN: A forwarding looking way, as well. As a forwarding looking way; it's not just the issue is now, that you're actually saying that with changes in policy and land on the other side of the border here, it will be growing. Or the potential.

MR HAWSON: Well, the need will become more acute.

COMMISSIONER DOOLAN: Yes.

MR HAWSON: In the sense that why you need to do this. And the longer it goes on and the bigger the expansions and so forth, the bigger the - the higher the risk in terms of what happens if you don't have that preservation rule or some sort of - in the terms of reference of these various governing bodies, that they are - the preservation of community and their social, economic fabric is - comes to the fore and they are looking at indicators that are telling you when they are going to be affected. A more sophisticated approach, I guess, at looking at how these rules impact on community, and not competing systems or not competing priorities that prevent whatever this authority is, or how ever it's set up, that they are clearly divided, so - and that comes back to the transparency aspect. So there aren't conflicting agendas, I guess, from one authority; whether that be the market, big players, government policy, whatever it may well be, they need to separate that because it's preservation that is - and security of water.

Probably the biggest insight we learnt when we were doing some work in regard to sustainability of horticulture, and we started looking at this from the context of well what are the impacts that are driving sustainability of horticulture. And we went out and did a study in terms of talk to growers and talk to the industry and by far the thing that came back above everything else, above planning laws and planning requirements and what basically what local government could do, by far the biggest one was security of water, and access to water was clearly articulated as that is the biggest issue, that if we can't get that then everything else in regard to what you have to do to save horticulture is - becomes irrelevant more or less.

COMMISSIONER DOOLAN: Okay, well thank you very much. Thank you for attending.

MR HAWSON: And thank you.

COMMISSIONER DOOLAN: And thank you for your submissions. We would like to call on now Jane MacAllister from the Wentworth Shire Council. And again, Jane, if you wouldn't mind just introducing yourself.

MS MacALLISTER: Councillor Jane MacAllister, Councillor Wentworth Shire Council. First of all I just wanted to reiterate what I said a few moments ago to you, Commissioner. Thank you very much for being here to make the Commission, I suppose, available to this region once again, and on the back of that also very deep gratitude for making the time to make your way out to Wentworth as well when you did do the public hearings. That was very necessary from our point of view but it also gave, I think I can say, our community a

little ray of hope in amongst, as you've probably heard, of a lot of disinterest or perceived disinterest and disregard to our little area. And as I have mentioned previously and it's all through the submissions, we consider what's going on in our area to be of maximum interest, and so it should be because it is the area of greatest decline and disregard and neglect and, you know, Councillor Eckel used the word "genocide". It also feels like an ecocide. I mean it's - from a community perspective it feels like there is a concentrated effort at every level to bring about the demise of the Lower Darling for whatever purpose, and that is obviously contrary to what the aims and goals of Wentworth Shire Council is.

I should also preface my remarks by reiterating a very firm commitment that Wentworth Shire Council have taken in advocating for our community of Wentworth Shire but also for the community of Central Darling Shire as well, who is currently under administration and will be so until 2020 when it will be reviewed. There's no indication that that's likely to change at 2020. So while there is no democratically elected representation from Central Darling which includes the Menindee Lakes region and many other farming properties around there as well, and tourism, another industry we take very seriously, our role as good neighbours to ensure that those people are not forgotten, as we would not want our people to be forgotten either in all of this.

So I have submitted previously - sorry, Council has submitted previously a submission and I should preface the fact that further submissions to other agencies which have been provided to the Productivity Commission are, I suppose, trying to highlight the point that this is a moveable feast; it is an ongoing battle, as it were. Indeed on Monday I was delegated by Council to attend the flood plan harvesting information centre in Dubbo because the New South Wales Government had scheduled three such information sessions, one of them in Sydney which is not even in the Murray-Darling Basin; one in Dubbo and one in Tamworth. And our councillors thought we should make two points very loudly; one being that once again decisions made which affect upstream also impact downstream, which is a point that we continue to try to make, which is continually ignored, forgotten about, whatever the reason. So to be present and to let them know that we are indeed interested in where is our river, and where are our flows, and what other decisions are you making which may assist or hinder those flows reaching our little neck of the woods. And secondly to find out what level of information, insight, consultation, knowledge is supporting a policy which was initially dated 2013 and is now, as the tick clocks towards the time for the water sharing plans to be finalised, going to be hurriedly inserted into the 22 water resource plans for New South Wales, ahead of the Murray-Darling Basin Authority's review. So I left that meeting very concerned for a number of reasons and I have yet to report back to Council so I don't know whether I should go into that too much. But in general I think I can say, and this is my personal view I guess, it feels that once again there is a case of policy on the run. It seems that there has been, and in all the research that I've done and again whether it's intended or not, deliberate obfuscation of information of being able to access the rationale behind policy decisions and determinations. Indeed, some of the data can be very difficult to access from a very grass roots amateur level, speaking from myself, with no qualified training in such research.

The culmination of what is now a policy, which is being apparently peer reviewed by, the words were "a truly independent peer reviewer", so I don't know what they've had in the

past, sort of left me with no great faith that there is clear understanding of how, or even desire to understand how these policy decisions, particularly around flood plan harvesting, will impact, as we know they will impact in flows into Menindee and, therefore, through the Lower Darling and ultimately out at Wentworth.

Where to begin? There is so much and I don't sort of want to harp on but I will tease out the issues. It's already been stated that we very strongly consider the river systems, and indeed the nation as a whole, needs to be looked at. Even the modelling, just as an example, for the flood plan harvesting, it's done within streams, extrapolated to within valleys, extrapolated to riverine systems. And we know anyone that's, you know, had any interest in the natural environment and the way water moves can tell you water moves very differently depending on where it is and where it's going and how it's being sort of pushed through the system as well or navigated. So there are some concerns at the quantum level, particularly around the apparent reluctance of Queensland to have proper metering of New South Wales Government to very reluctantly, and I would suggest very slowly, on the back of a very definite assertion by Ken Matthews of a "no meter, no pump" rule to within a, I think it was 95 per cent maximum of metering by, I can't remember what the end date is now, it was 2019 at one point and then I think I've heard 2020, and it all seems to be fluid according to the needs of key stakeholders, and that term "key stakeholders" keeps being used in any "consultation" that we've had. Because apparently we are not key, we being Council, and indeed by the fact of what we are, the community. That was made very clear most recently - I'm sort of jumping around a bit - with the six options for the Lower Darling, which I think I've provided to you our submission to that, and we're expecting to have an outcome in the next couple of weeks apparently around that one, where the councillors who attended the target stakeholder meetings, I think as they were presented, were told, when we asked, "If we don't like your six options and we would like to provide one of our own, how long do we have?" That was on a Thursday and we were told "By next Tuesday". So we were also told previously in the same meeting that there had been key stakeholders who had been "on their backs" to fix the Menindee problem for the past five years. So we're being told that quite openly. There's no problem, I guess, on the Government side from admitting what is what we know to be the truth and have suspected for a long time. It is more and more getting out in the open, as people are able to speak truthfully about their experiences. So we are left with no doubt whatsoever as to where we stand on the, you know, the spectrum of stakeholders; we're very much down the bottom.

I would also speak for, I guess, the incredible amount of wisdom, knowledge, experience and understanding, and intelligence of our community. We have, in not only our shire but Central Darling Shire as well, people who have worked with the water, with the land, with the environment for many, many years, generations. I have been told they have been able to reduce evaporation at Menindee Lakes by 23 per cent in the past through proper management, understanding the system and trying a few different things. There seems to be an absolute reluctance at State level, indeed perhaps Federal level, I don't know, we don't see many of them, to engage with that level of knowledge in a true collaborative sense. And just, I suppose, to support what Alan, Rachel and Nerida have said, you know there is a hell of a lot of wisdom and experience there. People do want to engage and there are ideas, you know, knowledge, how things do work and can work better, that's just being dismissed, disregarded, and we keep hearing the same sort of narrative which doesn't seem

to be able to be supported when enquired. So, you know, that would be around, in particular, the evaporation rates of Menindee being a reason why, you know, it must be minimally used and flushed straight away, as soon as there's any water in it because otherwise it might evaporate. To the point where council have agreed to engage CSIRO to look into a comparative study of evaporation rates between Menindee Lakes and northern basins on farm storage. The consultation that we had yesterday with top CSIRO staff also showed that they too had difficulty accessing some of the data, that in fact there's - well I have to be careful what I say - that it seemed there is an appearance of perhaps some data either not being collected or available, and that perhaps that particular concern, or indeed evaporation rates themselves, to any verifiable amount have been recorded by the Government, or if they have, where they may sit.

As I say, this is an ongoing feast and while council are pleased that the Commission is doing a five year assessment of the Murray-Darling Basin Plan, our concern is that in five years we won't be here. I also wanted to make the point that council has been trying to find different ways, I suppose maybe using whatever forces we have because, as I've said, there's been a reluctance at State level to engage. Again my own personal opinion, the State Government appears to have a Pygmalion approach to local government so we're not used, as I feel we should be as, you know, the Johnny on the spot when there's a problem in the community, who do they call? Your local councillor. And you know we're there on the ground, we know the people, and we can certainly be that conduit, if you like, between agencies, departments. Being so far away from Sydney, when our closest capital city is Adelaide in fact, presents other problems. Our very closest neighbour of Mildura appears to be so much larger than we are and have all the services, so why should services be funded in our area? History shows that in fact the demographics were reversed; Wentworth was the largest inland port at one time and sort of in some ways opened up the region through the paddle steamer industry linked to farming. So there's a very strong history of the connection of the rivers across three States, moving supplies and produce up and down to large river systems just in our little area. A lot of the capacity for Wentworth Shire to grow was stunted with the introduction of the western land leases, as you've heard. I think currently we still have 99 per cent of our land locked in western land leases which, you might understand, prevents freehold development. There is also the furphy that Government likes to toss around about a lot of reports suggest that Wentworth's population is in decline, as is Central Darling's, when in actual fact what the statistics show is that we're growing. Where I live in Gol, which is just over the river from Mildura, four kilometres away, is having one of the largest growth spurts, I suppose, in the region, and we're hoping to continue that. Again, we need water in order to do that. And so we keep trying to make the argument that we have all of the ingredients in our little shire, in our neighbouring shire of Central Darling, the knowledge, the expertise, the wisdom, the experience, the fantastic resources. I know Rachel likes to use the term "the womb of the Murray-Darling Basin". It's a truly fecund place that should be utilised to maximise growth. Our chief industry is agriculture. We are being systematically decimated by our own government and our council are trying everything that we can to say, "Hang on a minute, there's people here that should be valued". To that end some motions have been put forward at the Australian Local Government Association National General Assembly last year, which was defeated. And this year, as they were revised and split into two motions, one being that there be a national water ombudsman with Federal jurisdiction and

specific roles that that might have, the argument being that while decisions around water management remain jurisdictionally locked up, according to the constitution under the States' powers, then - and there must be agreement or divestment of those powers to the Commonwealth, as we've seen with the Murray-Darling Basin Plan, and that even with that there is a minister at a Federal level sort of, I suppose, running the show, if you like. At all of those negotiations there is also, as we know the reality of our current political system, at the very least the perception of vested interests through political donations being able to skew the results in their own favour.

By taking that potential out of the hands of the legislature and putting it into the judiciary there can be a certain faith, a public confidence that here is a person of high standard, you know, an esteemed and learned person in the law who can not necessarily direct but can recommend that the State's laws are workable across borders; that they are correct and legal under the Commonwealth Water Act and that they best serve the interests of all people, not just those few that have hefty bank accounts. I know the Commissioner for the Royal Commission into the Murray-Darling Basin Authority was interested in that and has asked for a submission around that. I have also had conversations with the Environmental Defenders Office around some of the legality of that. Every person of law that I speak to thinks that's a great idea but it would require one thing, and that is incredible political will in order to get that enshrined into law to begin with.

So my hope is that perhaps with the backing and maybe some advice or recommendations from a person of Brett Walker QC's status, if that were to come about as a solid recommendation there may well be a way that minds more learned than myself may come together and find a way to effect some national oversight. Because while the Murray-Darling Basin Authority only serves the Murray-Darling Basin, we also know that there are disputes in the Fitzroy River in Tasmania. Water is only going to become more and more of a hot potato in this country and we need to find ways to resolve the inadequacies, the inconsistencies and the debates and fights that will occur as we bloom and grow.

The second part of the motion, or the second motion was that there be a national water registry, which I believe there have been previous iterations of something like it, that has various things including a keep-all, if you like, of hopefully real time, or as close to as you can get, of rainfall movement through systems. Who's using what licences, perhaps? You know, I mean all of these things to be determined but it's our thinking that - and for myself in trying to do some, again, very amateur research, it can be hard to find strings of data. There's an excellent (indistinct) website, there's a couple of great New South Wales State websites.

COMMISSIONER MADDEN: I think some of those issues would be more our National Water Initiative review.

MS MacALLISTER: Absolutely.

COMMISSIONER MADDEN: Which we do have a role in every three years.

MS MacALLISTER: Okay, good. So watch this space. Thank you.

COMMISSIONER MADDEN: I guess for me, just one of the questions I'd like to ask is that engagement with local knowledge and role of council.

MS MacALLISTER: Yes.

COMMISSIONER MADDEN: If we get tangible - in terms of supply project Menindee, I mean in terms of that consultation, and I'm not asking Rachel to comment, but those meetings, are they wider or is it with the affected communities? I'm just wondering how then the wider community and other stakeholders gets involved - does get involved in that discussion. And I guess there's another point which is there's a downstream review as well.

MS MacALLISTER: Absolutely, very much so. There are also a lot of people who use the river who don't live there. Who regularly come home to it or enjoy regular visits of it. There are also critters and plants and things. The river itself is a life force for so much of the place.

COMMISSIONER MADDEN: But just, you know, supply projects, is there any plans that you know of in that consultation, that it's wider than just what are the key stakeholders, in terms of the landholders?

MS MacALLISTER: Yes, and I guess that speaks to my point as well. My point is who are the key stakeholders and how do you engage with them, when they are everything really, and how do you select who they are? I think, you know, the Government is now, and I should say State Government, is now trying to find a way to do that, is my understanding. There's something around the definition of consultation that it feels more and more with each visit from different departments, and they do like to compartmentalise themselves, it's sort of gotten to the stage now where instead of listening to the people they're coming in with a prescriptive, "This is what we're going to talk about. Here's your handout. I'm going to talk about what's on this page and that's it. You'll have five questions and then we'll all leave". So the concerns of the people are left to be addressed by yourselves, by the Royal Commission. And the people who are making the decisions aren't interacting, there's no interaction. It's a very prescriptive form of consultation.

COMMISSIONER MADDEN: We've heard the term "meaningful consultation" a few times, so this might be a good example of that for us.

MS MacALLISTER: Indeed. And from council's perspective as well, you know, we would hope that - yeah, we would hope that we would be interested and engaged. Case in point, the Wentworth to Broken Hill pipeline being an imposed piece of infrastructure that does not necessarily need council approval, although we were presented with a scope of works and asked to sign off on the scope of works, and councillors weren't - my understanding of what happened was that councillors weren't satisfied to any real extent that their questions had been answered, or indeed that there was any perceivable benefit to Wentworth Shire or the people therein. In fact all we could see was perceivable disbenefit right along the way, and nothing has changed our opinion of that. At every turn we're - the local council have attempted to provide solutions that may help our shire and Central

Darling with water security, quality and supply issues. There's a reluctance to either, I don't know, listen, take seriously; I really don't understand what the problem is, but we're very much left with the sense that we don't count, that they don't have to have our approval for their works, so you know it's just something they have to do. And so, you know, the determination to come along as a joint venture and tick the box "We've consulted with our local people". The questions, I still have quite a list of questions that have been posed right from the first meeting that I haven't had a response to, despite frequently requesting responses on them, so.

COMMISSIONER MADDEN: Do you have any other questions?

COMMISSIONER DOOLAN: No, I think - thank you very much.

MS MacALLISTER: Thank you again for your time.

COMMISSIONER DOOLAN: Okay, thank you. Our next participant is Lindsay Leake.

MR LEAKE: I'd like to thank you for the opportunity to speak to you. I'm not a professional person; having left school at 14, worked for almost one year. Returned to school, obtained an intermediate certificate and joined the National Bank, still aged 15. I worked for the bank for almost eight years. I returned to Mildura, ran the administrative of my family's business for ten years. I left the family business, started my own business which I ran until I retired. In the mid-80s I purchased a fruit property which I also ran until the wine grape price was scratched in 2006. I held numerous positions in other organisations which included a member of the board of management of the Australian Dried Fruits Association; president and secretary of the Sunraysia branch of Victorian Farmers Federation; a member of the BFF Water Committee for some ten years; a member of the VFF Economics Committee for two years; BFF delegate to the Murray River Water Entitlement Committee for the full term of the committee; chairman of the Lower Murray Water Red Cliffs Committee in its various forms; a member of the Sunraysia Irrigators Council; Sunraysia Irrigators Council delegate to the Victorian Irrigators Council; Mildura Irrigators Council delegate to the Australian Irrigators Council.

My concerns are lack of open and accurate accountability for water and climate change. Accountability, right from the first day that I joined the bank it was drummed into me that accuracy was paramount and it was bank policy that you did not go home until the books balanced. This I might add was in the days of steel nib pens, writing paper and crank telephones, yet we could still put the profit and loss on the general manager's, now called the CEO I think, desk at the start of the next trading day with over 600 branches throughout Australia. To be able to balance the books you have to have accurate and up to date records, with a good system that works.

In my submission I detail some of the things that I saw as necessary and available; however, you also need the will for it to work. We have seen in the reports prepared by media evidence that irrigators and governments conspiring for the system not to work. We need leadership from governments that are committed to accuracy and honest. So far this is missing. Climate change. Until the Government is fully committed to accepting that

climate change is real and fully support research, we're flying in the dark. The report out Tuesday and the Federal Government's response is most impressive. I have tried to show in the graphs that I've produced that we have a problem that is here now and getting worse.

Summing up, there has to be a real commitment to super honesty, a commitment to accurate recording and public access to those records in a manner that can be easily comprehended. The technology is here now; has been available for years to have such records. Thank you.

COMMISSIONER DOOLAN: Thank you. So in particular, where do you want to see better information collection?

MR LEAKE: As Jane just mentioned, I believe that we should have a national registry, a water registry, that includes all the rivers. We should have - not only should we have meters on pumps but those meters should be set so that those records - those readings are transferred back to a central database on a 15 minute basis, so that we know exactly where water is. We should treat water as what moves in a valley and that is between the ridge lines. Also Jane mentioned overland flows. That's a ridiculous term, it's water moving down the valley and whether it's in the main channel, whether it's on the surface running over the flood plains, or whether it's underground in aquifers, it all comes out of the sky. Water moves to the lowest level and it all eventually ends up in the sea. If we're going to take a creative accounting attitude, which seems to be paramount, we're going to end up in trouble. And the real problem is that over the last 20 years we've averaged in the Murray-Darling, according to the MDBA figures, that we're down 35 per cent. Now that's a huge amount. And we've seen what happened with managed investment schemes where billions of dollars were lost because of people just with creative accounting, and we know all the disasters that happened there and the corruption that was involved in that.

We're still in the same situation today. I mean I can sympathise with Jane, I can sympathise with Mark Eckel, and I live in this community, but every other community has got the same problems. They've all got aspirations to be better than what they are, but if the water's not there, they're going to be disasters. And if you take Perth, which their inflows into their dams is down 86 per cent, leaving them only with 14 per cent. If they didn't have desal's, Perth could be in deep trouble. I'm not saying it's going to happen here but I'm saying why shouldn't it happen here if it's happened in Perth? And really there's been a gung-ho attitude all along. I've sat on one committee after another committee; I've listened to all sorts of people, you know, put up cases that where they had strong cases for a special consideration, but if you - if there's no petrol in the tank it doesn't matter how flash the car is, you're going nowhere. And there's plenty of evidence to say that we're running low on fuel; in other words, water. That's my main concern, and I'm just deeply depressed about the lack of honesty, not only by people who tell you outright lies but also by people who don't really sit down and really think through the problem and make their decisions before they really understand what they're facing. I mean some of the people are talking about how the drought affected farmers around here. The drought didn't affect farmers around here. The reason I shut down my property, I got \$950 a ton one year, I got \$500 a ton the next year, I got \$250 a ton the next year. The winery, there was about 50 of us contracted to the same winery at Griffith, they told us - the contracts had all been signed the same year, they said the wine - "Your contract's up, we're taking no more grapes, we're going to stay in Griffith".

The spot price was 150. You can't run a harvester over your crop for 150 a ton, so they just walked off. It also happened to coincide with water restrictions, but if we were getting a decent price we could've paid for our water, but I couldn't even pay for the harvester so why worry about whether the water was there or not. I didn't need it because I turned the taps off.

COMMISSIONER DOOLAN: But the issue really is planning for low water and reducing supply.

MR LEAKE: It's got to be taken extremely seriously. I mean I take - I've been to the United States a few times and I've taken a lot of notice there and I've watched their TV programs. Last year there was fires from Mexico through to Alaska, big ones, and on the West - East Coast, sorry, there were floods. And we're just seeing a hurricane go in - it's now inland now, but it had come from nowhere in a matter of days and it was a category four, and only a few mile an hour higher and it would've been classed as a category five. It's now up in the Virginia's, which have had horrendous floods just in the recent times and they're still draining, so they're in deep trouble again. We've got all - and then you can go on and on and on with all the things and we've still got people sitting in Federal Parliament who are saying climate change is not real. They're absolutely, you know - so I won't say what I think of them because I - I can be expressive. But all I'm saying is, let's look at the facts. Let's do what I was drummed into as a kid working for the bank; make sure those figures you've got on that sheet are right. And you can get them right. In those days, and those who don't understand what a steel nib pen and a bit of blotting paper is, I mean we weren't allowed to use biros because in those days biros leaked, and our bit of technology was a crank adding machine, you know, and we could still do it. But it was a good system, and I might - all I'm asking is - - -

COMMISSIONER MADDEN: Maybe you should've stayed in the banking sector.

MR LEAKE: Eh?

COMMISSIONER MADDEN: Maybe the banking sector could've had you stay there for longer.

COMMISSIONER DOOLAN: Given recent events.

MR LEAKE: Well, I won't. Don't ask me about that because I can tell you a few tales there that - - -

COMMISSIONER MADDEN: I think it's an important point around the transparency of information and supports again that not just baseline information in the background, but then also information about options that will impact, so.

MR LEAKE: Yeah, because if we're taking more water out of the river than what the water can supply - and don't ask me how these people get these jobs and get these huge salaries and spend huge amounts of money and then when they walk away, you know, and billions of dollars are lost, and we've seen it time and time again. Something has to change.

I'm 78, so I mean my luck's - all our luck's run out eventually and at 78, you know, I've dodged a few bullets already, so I'm just very depressed about how things are being run in the valley and I think that there's just too many people who haven't been on for too long.

COMMISSIONER DOOLAN: Okay, well thank you.

MR LEAKE: Okay.

COMMISSIONER DOOLAN: Thank you very much. All right, our next participant is Bill McClumpha, VFF.

MR McCLUMPHA: Yes, I apologise for being late, Jane.

COMMISSIONER DOOLAN: That's all right.

MR McCLUMPHA: Lower Murray Water decided to hold their water forum today, on the same day.

COMMISSIONER DOOLAN: Sure.

MR McCLUMPHA: I got there and Mark Bailey - - -

COMMISSIONER DOOLAN: No worries.

MR McCLUMPHA: Everybody was in the room, so that's what you're up against. Good to meet you.

COMMISSIONER DOOLAN: Yes, good to meet you. So, Bill, if you'd sort of sit down and just introduce yourself for the transcript.

MR McCLUMPHA: Bill McClumpha, I'm an irrigator from Red Cliffs, grower - was a grower of wine grapes, still a grower of dried fruit. I'm, besides being an irrigator, I'm with the local branch of the Sunraysia VFF and I'm on the - represent Sunraysia at the Victorian Farmers Federation Water Council, and I'm presenting today as an irrigator, but those other things are relevant to how I see water and what I think the state of play is with respect to the Murray-Darling Basin Plan.

Congratulations on your draft report, Jane. I thought it was excellent. Very circumspect, of course, but I'm seeing a very clear subtext that the Basin Plan as agreed to in 2012 is not over the line, that there's a long way to go, that there's a lot of difficulties on the way and you've very clearly set out the technical aspects of that. I'm interested today in putting my take on the state of the politics are going in the plan and how that's going to affect the, you know looks like affecting the final outcomes. Some of the confusion in debate, some of the common tripes that just keep getting trotted out on a daily basis and are unfortunately accepted by pretty much everybody, including the people with the power to make a difference with respect to the plan.

Just to go back to the basics a bit, the need for the plan. We've got a degraded basin, obviously in need of recovering some water for the environment in order to create sustainable outcomes for communities and irrigators. I think most people accept that. A lot of people wiff about it and say, "Yes, we've got to have a consent plan, we've got to have a plan" but they're not necessarily talking about the same thing as other people who want the plan. For example, I'll talk about specific parties presently but, for example, you've got most politicians on the production side, like National Party politicians; you've got repre groups like the National Farmers Federation, the National Irrigators Council all talking about the need for a plan and being quite pious about it and how they support it and all the rest of it but, as I intend to put to you, their idea of the plan is in fact a pretty much truncated plan with not much real water recovered. That's their idea of it and the politics surrounding the plan is that they've obtained the upper hand in the narrative and their continually putting that narrative, and that's affecting the Government and the Government is very nervous about going out and recovering the water that's necessary to have sustainable outcomes for everybody involved.

I see the plan as a 3200 GL plan, with the efficiency projects 450 GL water recovered, taking the plan to a notional 3200 GL, with nearly 2,500 GL of real water to use and the rest being imaginary water which may or may not show up, that remains to be seen. It's pretty obvious that obtaining the upwater is going to be extremely difficult. Now the environmentally sustainable level of take, as I read it, I apologise for my lay understanding of the plan, but the environmentally sustainable level of take is anything from 3,000 to 7,000 GL, so the science disagrees about exactly what - how much water the plan needs. The plan came in at an initial 2750, they vary towards 3200 with the 450 GL, towards the very, very bottom of what was politically acceptable and would satisfy the legal requirements.

Now just to go through some of the politics as I see it of the plan, some of the key elements. With respect to the plan itself, everybody in this room has been to a whole heap of forums, a lot of meetings and people talk about water and you might - some of you might have noticed that there's a lot of riffing about water in general. There's people talking about water and it's not clear whether they're not clear in their own minds whether they're actually talking about the plan or whether they're talking about water extraction, water reform and all the rest of it. You hear clichés like the corporates, water shortages, water being - shortage of water ripping the guts out of rural communities and all the rest of it, and if you add it all up it is a great big mess. There's no common ground on what the plan is, where it separates from water and in that very confused space the chances of achieving a sustainable Basin are very slim.

Yeah, just some key elements of the push against the recovery of water for the Basin. We've had water buybacks and now we've got - there was an acceptable push against water buybacks which ended up being capped at 1500 GL, which that amount has not yet been brought back. It was very clear that the Government - no Government has got the political appetite to go out and buy more water. Now a successful, a very successful element of the push against water recovery is what I call the socioeconomic battleground. You see a lot of heat regarding the socioeconomic impact of water recovery and that was, as I said, that was very successful with respect to water buybacks, and now that same - that same notion

and the related set of tripes that go along with it are being used to peg back any chance of the 450 GL upwater being recovered. Some of the parties that are involved, National Irrigators Council, the NFF, Dairy Australia, all the people who want water to stay in productive use, DELWP and so on, everybody in this room has got a fair idea of who they are. And on the other side, putting in a good word for the plan, putting in a good word why water should be recovered, putting in a good word explaining why it has to be recovered, putting in a good word sticking up for the plan, there's pretty much nobody. There's pretty much nobody who is effective who gets coverage in the press and who really puts a good case. The people you might expect to see in the press on a daily basis are the MDBA, various conservation groups, et cetera. It just doesn't happen. It's never happened. The MDBA has never effectively retailed the plan, it's never been interested in getting up there and selling the plan and explaining the elements and it still isn't. I don't know the politics involved, I can guess at them but they're being diffident and differential to the other side, who are against water recovery. They won't get into that space and contest it and as a result you've got a dominant narrative against water recovery. That's unfortunate but true and there's a lot of ground been lost and I don't think it can be pegged back and we've still got the problem where the topic of water, water shortages and all the rest of it are still conflated with water recovery under the Murray-Darling Basin Plan, and it shouldn't be that way. The opposite case should be put. Effectively what I'm putting to you today, Jane.

The key element of the socioeconomic battleground is there's the cliché of socioeconomic cost and there's a lot of reports that have been commissioned by various groups and Government with the intent of preventing water recovery by showing that water recovered has a net socioeconomic dis-benefit. That effectively started in a formal sense with the Goulburn Murray Irrigation District Group commissioning the report by the RMC group and that report came out with some text and a whole lot of impressive data about water trading and basically said that water is ripping the guts out of the GMID; it will never survive if more water is taken out; the Murray-Darling Basin Plan is evil; dairy farmers, they're entitled to cheap water, it's been cheap up till now and we might keep it that way, et cetera et cetera. That report, to my reading and objectively, jumps to a lot of conclusions that just are not supportable. For example, it presumes - or assumes that any water sold to the Commonwealth and the economic activity associated with that water leaves an irrigation district for good and cannot be recovered, and the whole report and other reports like it are based on that assumption, and that's getting away with the general confusion with respect to the whole water space, the whole topic of water. As most people - well, most irrigators and hopefully a lot of people in this room would realise, a path for water sold to the Commonwealth doesn't mean that the associated water - the associated economic activity associated with the water necessarily leaves the district. I myself have sold water to the Commonwealth and kept irrigating by buying other water, other permanent water from other places. So the water I sold to the Commonwealth did not result in this district losing water. Down in the GMID a lot of irrigators sold water to the Commonwealth because there was a - there was a premium on the price compared to the market and they got - realised a lot of valuable capital and decided, "This is great, I've got all this money, I'll expand my herd and I'll buy more blocks and put in irrigation and all the rest of it with that capital that I've just realised because water's cheap and I can buy temporary water". So they made a decision to alter their portfolio, they continued producing, in fact they produced more after the water had been sold to the Commonwealth. So we've got this

difficult notion of water leaving irrigation districts and that difficult notion is misunderstood and it's played on in this - in this socioeconomic debate and it's still dominant today. People still think that because the Commonwealth recovers water through buybacks or through on-farm efficiency projects that the economic activity associated with that water is lost to an irrigation district or is lost to irrigation, and it's just not the case. That's not how it works.

COMMISSIONER DOOLAN: So from your perspective then, the definition of socioeconomic neutrality, which is in the plan, which is just the participation of the individual, that's sufficient?

MR McCLUMPHA: Well yes. I'm not getting at the test so much, I'm getting at the - at what surrounds it. The fraught politics which says that water bought back necessarily is a negative for a community. And, you know, as you point out, that's not - well I think you're pointing it out - that's not necessarily the case. Now with the socioeconomic test, Jane, unfortunately there's never any consideration - I'll get to it later hopefully if I remember - but there's never any consideration of the positive socioeconomic effects of water recovered. And the plan is essentially a plan which says that if you recover water for the environment it's worth doing because the socioeconomic benefits are going to be positive. That's why we're doing it; that's essentially what the plan is.

Now studies like EY and the ones that followed don't consider the positive effects of water recovery. They don't calculate the benefits to the community of having a sustainable system, one that's not deteriorating, one that hasn't got increased salinity levels and all the rest of it. They don't consider the benefits of the amenity to a particular community and the whole community. They don't consider the economic effects of - the economic positives of sustainable biosystems, biomass, biodiversity and all the rest of it. All that stuff is there waiting to be considered and valued and it's not; it's just being completely tossed and ignored and the whole of the debate has gone completely the other way.

That report, the RMCG report, went really well; irrigators loved it, Governments loved it, the Victorian Government liked it so much they commissioned their own version, which was the TCA report, and that's now, you know, official Government policy which is purporting to show that the Basin Plan water recovery is socioeconomically negative and that any further water recovery will be socioeconomically negative. The Victorian Government report does not show the positive aspects of water recovery, and it should. And it also plays on the ignorance about how water goes in response to market signals from valley to valley, farm to farm throughout the whole southern connected system. None of that is acknowledged in a rigorous way and, you know, the whole debate is skewed because of the misunderstanding of just how water works.

Subsequent to the TCA report, DELWP and the farm lobby wanted to have a more academically acceptable report, one which would be more rigorous and one which they could take to MINCo and knock on the head for good the idea that water recovery was possibly neutral or - was neutral or positive and they wanted to show that it was negative and kill off the water recovery for good, so they - Victoria and New South Wales progressed that through MINCo and the Federal Department in response commissioned the EY study

which ultimately ended up coming down in favour of water recovery, showing that it could be - it was probably neutral or positive in socioeconomic terms. EY was an embarrassment to Neville, to Ms Neville, who commissioned that report or helped progress the report and EY has subsequently been pretty much killed off and buried, disrespected, not referenced and all the rest of it, all the things that happen to something that's politically unpopular. But that report's important because it shows that water recovery through efficiency schemes, you know, can have socioeconomic benefits and it would be - it helps - it's one of the things that can help justify recovery of sufficient water to make the Basin sustainable, the extra 400 GL. Now, where the - - -

COMMISSIONER DOOLAN: So, Bill, - - -

MR McCLUMPHA: Yes, sorry Jane.

COMMISSIONER DOOLAN: Sorry, we're just going to have to move on.

MR McCLUMPHA: Okay, well just to - how much longer?

COMMISSIONER DOOLAN: Five minutes?

MR McCLUMPHA: Okay, well the - at the moment we've got - we had David Littleproud come into office. He backed the full 3200 GL plan and said that he was going to recover the 450 GL upwater through - well hopefully through efficiencies, on-farm efficiency amongst other things. That really caused things to hit the fan with the farm lobby. There was a big backlash against Mr Littleproud and he ended up - appears to have ended up at the - at the last MINCo agreeing that the socioeconomic test that EY proved could enable the recovery of more water. He agreed with Victoria and New South Wales that that - and the farm lobby, that that test should be widened. So we're seeing extreme pressure to have that test configured in such a way that the water cannot be recovered; you know, which - they want the test to say that you can't recover any water because it's going to decimate rural communities. That's where it's headed. And it's not just me, David Pat said the same thing the other day in the next article in the Sunraysia Daily, some of you might recall that. So where we're headed now is successful lobbying by the farm lobby, by Victoria and by New South Wales especially to broaden the socioeconomic test in such a way that further water recovery - the further significant water recovery won't be possible and the Basin Plan is going to be left without enough water, and any future water efficiency gains from on-farm efficiencies will be remaining for consumptive use; they'll stay for productive use, they won't be going in environment. So if you've got a view of the plan like I have, the Basin's going to slowly die for that reason.

I just want to follow up - follow - wind up just with a few notes on some of the tripes that - a tripe is a recurring motif that you might hear from time to time about, you know, water being ripped out of the guts of communities. If that water is recovered it's going to be (indistinct) or horticulture. That sort of thing you would have heard of. Another big one is "Oh, the water's not going to fit down the river". Now we hear that constantly. The Minister was in Mildura last week, she said the same thing, "It's no good recovering the water, it's not going to fit down the river". Peter Crisp had an article in the Mildura Weekly

a few months ago - all this is on record, yeah I'm not trying to libel the Commission - Peter Crisp had an article in the Mildura Weekly a few months ago saying that, "Oh, it's no good recovering the - it's no good recovering upwater, it's not going to fit down the river". Now I think - well I've heard this plenty of times and I imagine some of you have as well, and you might have heard it yourself, Jane. And it is not supportable. It's a very tricky one to get your head around. I didn't understand it myself, I didn't know how this works and I sort of had an idea and it was wrong, but I rang up Dairy Australia; Claire Miller was the person running all the Basin Plan stuff for Dairy Australia. A very, very capable woman, she's working based in the water space a lot of time, you might - the others should know her - and she put me through the hoops and pretty much had me convinced that, "No, you couldn't recover water because it wouldn't fit down the river". And I researched it a bit more and I was lucky enough to get some direction from Environment Victoria, Juliet Le Feuvre looked up the stuff for me, and there's an excellent document on the Murray-Darling Basin website called "Hydrologic modelling of the relaxation operational constraints in the southern system". And that goes through and gives various scenarios for water recovery, plus removal of the constraints. Now constraints were agreed to be removed as a critical part of the Basin Plan and what Claire didn't tell me, and what other people won't tell you and they may or may not know themselves, they probably don't even know, is that if the constraints are removed, as the States agreed to remove them but they probably won't because there's too much opposition from the GMID and various irrigator groups and all the rest of it, but if they do remove them fully like they said they would, the whole 3200 can be used. It won't all shoot out the end of the river and be wasted. You can shoot it down to where you want it, it goes out onto the flood plains and gives you the - all the benefits that more water should give; improvements in the health and resilience of inundated flood-dependent vegetation, refreshed flood plain groundwater systems, flushing of salt, improvements in lateral connectivity and nutrient and carbon exchange between the flood plain and the river which support fundamental ecosystems. Well, to me, that stuff, that is what a plan's about; getting the water where it needs, getting the outcomes from it and then letting the system hopefully - well the plan hasn't got that much water anyway but it's a start, and you've got a system that might be able to sustain itself instead of dying.

And just to finish off, well one of the things I want to finish off on, Jane, is that in your report you mention that the Government has never really put any work into defining the socioeconomic test and it really should do so, and totally agree with you there. What I think is pretty obviously needed for the successful Basin Plan to go ahead, is for that test to also monetize and model the benefits of water recovery. Salinity outcomes, sustainability, socioeconomic - you know the various socioeconomic benefits that come from having a healthy, sustainable system, and there's plenty of them, but there's nowhere in the Murray-Darling Basin Plan, nowhere in the Murray-Darling Basin Plan politics that surround it has anybody said, "No, you've got to take into account the benefits". So you've got - you've got the dairy lobby, you've got the National Irrigators Council, you've got everybody else running around tearing the thing down and yet there's a tool there, there's a way in to counteract that. There's a way in to not make - well to displace the dominant narrative against the plan and against water recovery. There's a way there to recover the situation and explain why the plan can go ahead and can benefit irrigators and everybody in the community and, you know, give things a chance to get back on track for the future and move forward, instead of slowing dying in front of us because people want to extract

it to death. There's a way forward, and Jane I want you to take - take that opportunity and hopefully put it in your final report.

COMMISSIONER DOOLAN: Well thank you, thank you Bill. John, have you got any follow up questions?

COMMISSIONER MADDEN: Only out of interest, is after your efficiency project, when you bought the water.

MR McCLUMPHA: Yep.

COMMISSIONER MADDEN: Do you know what entitlement that was? Was it a local Murray entitlement or?

MR McCLUMPHA: Yes, I - at the time I was very concerned about the quality of Victorian entitlement and justifiably concerned because the allocations were - at that particular time were threatened or were low, and I moved to bolster my portfolio with New South Wales high security water. Which has got its difficulties, you've got different characteristics; it doesn't have carryover attached, but the benefit of that is that you get 97 per cent of your water on June 1. It's not dribbled out and you always get it. And just on that point, every irrigator, with respect to the plan, no irrigator has had their water taken off them. You keep hearing on a daily basis that water irrigators are going to have their water taken off them, through efficiency gains or whatever, they're going to have their water taken off them and given to the Government. It's not the case. If you get on-farm efficiency programs, they don't get their water taken off them. They get consideration for that water and they get a net benefit and they go out and buy more water. If the GMID wants to take the opportunity to modernise itself instead of staying in the Dark Ages, it can participate in the on-farm efficiency program, which is now knocked on - they've knocked it on the head, but they could've got, you know, five or six hundred million dollars, they could have all - a hell of a lot of irrigators here could've modified their systems and moved into the modern day instead of mucking around with ancient systems that they're going to be stuck with forever now because they've passed up on this opportunity. Every irrigator - no irrigator has ever had their water taken from them, it hasn't been stolen, it's been bought for good consideration. Every irrigator can work in the market. Every irrigator - I'm not holding myself up as a fantastic example, but every irrigator can decide on a level of risk and can structure their portfolio to deal with that level of risk according to what they perceive their needs are. And that opportunity still remains. And if the Basin Plan went ahead and recovered all this - if the authorities, the MDBA, the Governments, had the foresight and the ability to withstand electoral pressure, they could get those programs rolling, as the EY report said. They could recover that water and that recovery of the water would be a net benefit for every irrigation district, especially the Goulburn Murray Irrigation District, and they're passing up that chance. It is a tragedy.

COMMISSIONER DOOLAN: Okay, well we're due in Shepparton next week, Bill, and I'm sure we'll hear from the GMID.

MR McCLUMPHA: Yeah, well wear your armour, Jane, and you're going to hear - you're

going to hear the opposition absolutely loud and clear and none of the stuff I've said will be mentioned.

COMMISSIONER DOOLAN: Okay. All right, well thank you very much.

MR McCLUMPHA: Yeah, thank you.

COMMISSIONER DOOLAN: Okay. Our next participant is David Arnold from Bindara Station.

MR ARNOLD: Good afternoon.

COMMISSIONER DOOLAN: Could you just introduce yourself for the record.

MR ARNOLD: Yep. So I'm David Arnold. I'm from Bindara Station, which is up on the Darling River, just below Menindee Lakes. Righto. The submission I put in was a bit short, it was lack of time and last minute. But I guess the main things that I wanted to guess highlight to the Commission is you're here to do a review of the Murray-Darling Basin Plan and how it's been rolling out over the last five years, and I guess from my perspective is possibly different to a lot of other perspectives that you'll hear from an irrigation perspective. Our issue is more about liveability on our property and tourism from being on a river with water in it. In short, that's effectively our main concerns. Having water to irrigate a private orchard and the likes is part of our liveability and that's certainly an issue as well.

I guess with the release of the Australian Institute's report recently into the buybacks from Tandou Station, or Webster's as it was, I guess it highlights again how - the difference between how governments deal with big business and how they deal with normal people. The fact that, you know, they've offered - and it's not only offered but in fact sought out to pay compensation to a company to pull a water entitlement out of the system, yet, you know, no one else was being offered compensation; you know the townships have not been offered compensation with property losses or value losses. You know there's just - there's massive disparity between how different portions of - or the interested parties in the Basin Plan are being treated particularly in the Menindee region. I don't have the hard numbers but, you know, I've been - reported that up to 700 jobs are been lost in and around Menindee Lakes, including withdrawal of Tandou from irrigation. But, you know, 700 jobs lost in such a small community is massive, absolutely massive if you go back and look at a percentage of the people that live there and what means to the community. It's just absolutely devastating and it's not just Menindee, you're talking about a wider district including Broken Hill, you know, Broken Hill right through to Wentworth, including Wilcannia as well; like the whole region suffers. With the job losses that have been pulled out of the district due to, I guess, the management of the Menindee Lakes and also the management of the Upper Darling tributaries and what's now become, since the plan has been implemented, a less reliable water source in the Menindee region, and in fact an unreliable water source in the Menindee region.

The decommissioning of the Menindee Lakes or the supposed water savings project in the

Menindee Lakes, Jacobs report which I haven't had a chance to read yet, I only had a look at it this morning briefly but, you know, the Jacobs report has made a couple of very clear statements about what the water savings project for Menindee contained in the - what they very loosely term the - they call it the - - -

COMMISSIONER MADDEN: The business case.

MR ARNOLD: The business case, sorry, that's the one. I read it and it in no way forms a business case. It's simply a list of projects that are going to be done in Menindee. It was obviously the redacted version that I got to see but, you know, what come out of the Jacobs report is that there was virtually no quantitative evidence to say that there was even going to be a saving, let alone being able to determine what it might have been. And for, you know, SDL adjustments to be allowed to go through and be effectively implemented based on projects such as that, that don't have any quantitative evidence to suggest that the outcomes that they may achieve are actually achievable is quite bizarre at best.

I personally think that the - what's been done as far as the Basin Plan, the implementation and particularly the current Federal and New South Wales Government, I think the only way to get to the bottom of it is going to be a Royal Commission, as much as everyone is going to be kicking and screaming and justifying why they shouldn't have one. It's just the only way that you're going to get to the bottom of it is through something as significant as a Federal Royal Commission.

There was mention before about the constraints management within the, particularly within I guess the Murray Valley. I was only thinking about this over the last few weeks. I believe the constraints - and forgive me if any of the details I say here is incorrect, I'm still trying to get up to speed and remember stuff from years ago that I've read - the constraints management was put in place so that people that had moved down into the flood plains to grow and to graze and to use the flood plains for productive purposes wouldn't be impacted by the management of the river by the Murray-Darling Basin Authority, and that sounds all fair and feasible, but I guess it also changes people's perception of what a river is.

I know people's perception of, and I use road as an example, people's perception of a road is the bit you drive on. And you go, "Okay, where's the road?" "The road's over there, it's the black bit between the two bits of kerb". In actual fact the definition of a road is in fact the entire road reserve; it includes the nature strip, the footpath, right up to the property boundaries. And I think the way the river is being managed, particularly with the constraints mechanisms that have been put in it, is people view the river as this channel that runs across the country. It's this river channel. Once it flows outside the river channel you're exceeding the capacity of the river. That couldn't be further from the truth. The river is in fact not only the river channel but the flood plains as well. That is what forms part of the river. That's what forms part of the ecosystem. And the fact that the constraints management has been put in there and for fear of, I don't know whether it's reprisal from the people that are using it or whether they - I believe they fear that they would be subject to financial damages or financial loss if they inundate those flood plains unnecessarily.

And then I started thinking about our issue on the Darling River where we have flood plains

that haven't seen water in, you know, or have seen water once in the last 20 years. And what that means for us is, you know, when I was young we had lignum that was so thick you couldn't ride a motorbike or a horse even through it. It no longer exists, it's not there at all. It's nothing more than a bare, grey bit of dirt. We've got, you know, hundreds of acres of box trees that, you know, for as long as I can remember, which is almost 40 years, we had all these box trees everywhere. Almost all of those have died in the last 20 years, particularly in the last ten. You know, the river isn't just a river channel, and anyone who is thinking that the river is a river channel is not thinking big picture, they're thinking far away from reality.

One of the other reasons, I guess from a management perspective, to keep water in the river channel is that the plan seems to identify specific environmental outcomes which it plans to improve at specific locations. (Indistinct) is always touted as one of the, you know one of the real benefits of what the plans achieve and there's a couple in South Australia as well, I believe, but at what cost to the rest of the environment? At what cost to places that haven't been identified as, you know, perhaps as much of a golden child or a location that they can say, "Hey, look at what we've achieved". The river from end to end has lots of, you know, creeks, lots of flood plains that, you know, are really significantly suffering because they're not on the chosen list. And if you let water flow out of the channel and it's not going to one of three things being either environmental-specific locations, across the South Australian border as a GL value, or sucked out of the river for commercial use, then effectively the plan considers the water lost. If they flow a river and it flows out of the river channel, then all of that water that goes out is effectively lost; it's not treated as - well water losses in the system are in fact - or do in fact have environmental benefits. Nowhere is any of that, you know, triggered in the Basin Plan. Everything is so quantified that, you know, unless they can put a definitive figure on it or a definitive location for it, then it's just assumed as a net loss in the system and they are trying to reduce losses at all cost. And that's particularly obvious with the Menindee reconfiguration plan. It's nothing more than taking water out of an environment so that you can justify less water being taken off the farmers. So it's a double whammy for the system.

So the property that I grew up on since I was two years old is the Bindara Station. It used to be called Netley. In its heyday back in the turn of the - well, back in the 1900s, it was close to a million acres and actually went right across to the South Australian border. We've got records of them actually putting irrigation infrastructure in around 1875, so you're talking a long, long time ago. And that was considered obviously as a fairly reliable water source in the Darling River. You hear lots of reports about how the river used to always go dry every year and, you know, it was never reliable and the lakes were (indistinct) and therefore they, you know, often didn't have water in them and all the rest of it. In 1875 they were setting up pumping infrastructure to water lucerne for racehorses and they had gardens and they had an orange orchard, and this was prior to 1900. So, you know that goes to show that the water in the Darling River, even before the Menindee Lakes system was reconfigured with the weirs, was a fairly reliable and significantly reliable source of water. Up until the configuration of the - or the reconfiguration of the Menindee Lakes, we've got on record potentially three significant, I guess, cease to flow events in the Darling River where they've actually - they went to the hassle of putting in a - or constructing a weir to hold water back for their pumps. Since the construction of the Menindee Lakes in the 60s

and in fact since 1947, I believe, we - up until then, I guess the start of the Basin Plan being 2007, we had one cease to flow event. So from 1870 through to 2005 - sorry 2006, that's 136 years, four significant - what I'd call significant cease to flow events that I'm aware of. Since then we've had three significant cease to flow events, so that's three in the last 12 years. Of that, as of December this year, we will have had two in the last six years. So this is to - and the reason I'm counting the one coming up is because the river's expected to cease to flow in December. There is no water in the upper system coming down that we're aware of yet. We may get a big rain in the next week. It may not be until who knows when. It might not be for another 12 months. So the cease to flow event that we're having to manage in the very, very near future is likely to be the second significant cease to flow event since 2012.

So you're here to look and see how the Basin Plan has been going over the last five years or how it's gone in the five years that it's been implemented. So this is what I put to you. In the first 136 years of information that I have, it ceased to flow potentially - well more than that actually, 140-odd years, it ceased to flow four significant times. In the last five years we're going to have two significant cease to flow events, and that's the five years since the Basin Plan has been implemented. So you've spent \$8 billion on a plan that has significantly reduced the water availability and reliability in the Darling River, particularly below Menindee Lakes to Wentworth, and all it's done is decimated a community. Now you can look at all the benefits it may have had somewhere else, but for our region it has absolutely decimated the community.

And to give you a bit of an idea of once again what that looks like to me personally, you know, we have a property that, you know, is potentially worth upwards of \$1m with the water security it had prior to the Basin Plan, prior to your water sharing plans in 2012 in the Upper Darling tributaries. We now have a property, with the water reliability that we're seeing, as being unsaleable. Now this isn't just a business, this is our house, this is where I grew up. We've owned the property since 1981. The property has survived droughts, floods, two World Wars, union blockades, all of that stuff over the years it's survived. The Basin Plan has been in for five years and it's destroyed it. As simple as that.

The area basically from Bourke to Wentworth along the Darling is just - it's been totally forgotten. It's been ignored and it's been - everything has been pilfered out of that area purely because there's no votes there to stop it. And it's been shared to where there is votes and where there is money, and I don't think that was the intention of the plan initially, I don't think it's the intention of perhaps those who put the plan in place, but that's the outcome and that's what the Basin Plan has done for us and our community.

COMMISSIONER DOOLAN: Thanks for that. So looking forward, how do you see it being fixed? What do you want to see? Shifts and changes in the Water Resource Plan? Differences in how the Menindee project is going to be progressed?

MR ARNOLD: As I guess you're well aware, making assumptions and - assumptions of what water you're going to recover and making assumptions about how things can progress is all well and good, but you need to see how that works on the ground. You know, you can make all the assumptions in the world, you can do all the calculations and all the

modelling you like in the world but the inherent thing with modelling is, if you've got one piece of data incorrect it makes everything incorrect. How do you fix a problem? You fix a problem by coming back to having or assessing the critical needs first. I don't see how you can allow irrigators to extract water while people and townships don't have any to flush their toilets and have a shower in. That to me is bizarre. You know, you've got to have a hierarchy of water use, you've got to have a hierarchy of water security. I'm possibly going to be at odds with a fair number of people in saying this, but there was no problem before the water was unbundled from the land. Now I realise you can't go back to that, but when the water was attached to the land there was more water allocated than was ever used.

Now what happened with us, and I don't know how far this example spreads, but what happened with us is, and our neighbours, we had a small entitlement, I think it was about 120 megalitres. Of that 120 megalitres we might have used 20 megalitres at most every year, that's how it was. Our neighbour I believe had about 320 megalitres and they probably used less than us. So that's just two examples of water that was allocated that essentially was environmental water that ran down the river. Now when the water was unbundled no one cared. They had an entitlement, they didn't care. The water was in the river, they didn't care, they didn't use it, nothing changed. The Government then come through, the New South Wales Government come through and said, "Okay, if you don't use that water you are going to forfeit that water allocation", so we had no choice but to sell that water, or it was going to be taken off us anyway. So through, I can think of nothing more than, well, maybe there were other reasons, but from what I see is greed from the Government to be paid for the water usage and water allocations, all of a sudden all of this dormant water allocation that had been there since allocations were invented all of a sudden started to get used. It started to get shared between the valleys and because it went into commercial interest where it had a commercial value, either for trading or for growing crops with greater commercial value, it has been endeavoured to use 100 per cent of all the allocations.

You then have a further issue in the Barwon-Darling Water Sharing Plan where, you know, it's - once again you've got allocations, you've got a potential 300 per cent allocation if you don't happen to get all your water in one year. So all of a sudden not only do you use 100 per cent of your allocation in each year but you can carry that allocation over, potentially, and take water for a year that you're not in. Now, once again I'm not over at all 100 per cent but it seems silly to me that we're - we talk about, you know, taking water out of these communities, we're going to decimate the community, we're going to destroy the community. Well what was the community like before that water got unbundled? What was that community like before all these plans come in that give them all of this water that they've never had before in history? You know, someone has to give up water for the river to survive. There has to be a water allocation given to the river for its function, for its purpose. You can't just measure environmental water at specific sites, you can't just measure environmental water when it crosses the South Australian border. What about the water that is consumptively used by a river actually even being there? You have losses into groundwater, you're going to have evaporation, you're going to have all the other things that happen to water when it's in its natural environment. How can that be taken out of the equation when every millilitre of water is measured, or should be measured, for farming purposes? Someone has to give up the water, and at some point in time someone is going to go backwards. But at the end of the day this is a - it's effectively it's a national basin.

It's across four States, including the ACT, as a basin. The good of Australia has to be put above the benefit of companies. The good of communities has to be put above the benefit of companies and some communities are going to have to go backwards. And if that means that they have less farming in their community so that other communities actually have enough water to shower and wash their kids and wash their clothes and flush their toilets then that's a decision that's going to have to be made. Failing that, you effectively are prepared to kill off whole communities and whole regions to support the dollar for a few people.

COMMISSIONER DOOLAN: Okay. Do you - - -

COMMISSIONER MADDEN: No, I think - obviously we've heard this morning similar issues and talked through some of the things going forward that deal with rules and stuff. Because in the end we do have to look at what real changes have to occur to make that balance occur. So I think goods points there around that hierarchy and how you actually get that articulation of what you need. I guess for us it's looking at the processes, but more importantly the time allowed in those processes to address what obviously - and is recognised by I think New South Wales as inefficiency in the current arrangements. So we've made some recommendations in the draft in regards time to allow that to occur. I guess the issue for us is to articulate some principles about the importance of a good process to address that. It's difficult for us to actually say, "Well you should then adopt that rule", but I mean it's been very good for us to hear, and importantly some articulation of the problems, some start of potential solutions, like the hierarchy and event-based management. I start thinking of some issues around, well more systematic and short-term review on outcomes in places like - so how do you actually have events trigger reviews under the Basin Plan. I mean that's something that we can have discussions with the Authority and others, not just it's set for ten years and then changed; like under the Water Resource Planning construct it is very much a ten year kind of reset, and that might not be the case or the best approach.

MR ARNOLD: And I guess from, you know, from our property we don't have groundwater as such. We can put a bore down and the bore is in the lands of the river. It's as simple as that. So extracting water from below the sand in the river bed. Nothing more than that. So in the next couple of months we'll be in a situation, and probably by April next year, we'll be in a situation where we may not have water to flush the toilet. So our closest water supply is either going to be Menindee, which is probably going to be in exactly the same situation, or Wentworth, you know, and Wentworth's 240 k's away, Menindee's about 80 by road. That's our closest water source. You know, this isn't about, you know, we're losing business and we're not going to be able to make so much money this year. This is, you can't live there. You know, you're removed from your house because you don't have a basic amenity of water.

In answer to your question, very short and succinct, about what I see as a solution. The only solution I can see is you need to wind back the water usage to something that is sustainable. I don't believe the Basin Plan does that. And once again it's not about the amount of water that you flow out to sea and dilute the ocean water or the sea water, it's about having the water within the rivers to maintain the rivers' health. Yes, that includes

flow from one end to the other but you still have to maintain the river in the middle, wet. If it's not wet in the middle you haven't maintained a healthy river system. And the only way I can see that happening is simply any water portfolios or anyone that owns a significant water portfolio over a fixed amount simply loses a proportion of that from high security to general security or to low security, so that you can have - when there is no water you have a very limited amount and people need to have security about how much they're going to have as a definite. I don't care how big your business is, you need that. But the rest of the water should be there when the water's there. For example, Tandou sold, I think it was \$34m worth of flood allocation to Penny Wong when there was no water. Now just - I don't know about you but to be honest, when there's a flood I don't care how much water they take, it doesn't matter, it becomes irrelevant. Yet Government money was spent purchasing that water in the middle of a drought, and then that water is then put in and said, "This is environmental water". Well, who cares? It wasn't being used anyway and when it was, who cares? There was so much water it didn't make any significant difference.

People have to get outside of Canberra, outside of Sydney, and look at realities, not just look at figures in columns and, you know, numbers in cheque books. They've got to see what actually happens on the ground, and I think there's a big disconnect between reality and what is often put into these plans and when people go through and assess plans and check projects that one of two things; they're either very, very ignorant about what actually that means on the ground, or they just don't care what the actual outcome is.

UNIDENTIFIED SPEAKER: (Indistinct words.)

COMMISSIONER DOOLAN: Okay. All right, well - - -

MR ARNOLD: Yeah, thank you very much.

COMMISSIONER DOOLAN: Thank you. Thank you, David.

MS STRACHAN: Will you accept two little points?

COMMISSIONER MADDEN: Yes, we're going to open it up.

COMMISSIONER DOOLAN: Yes, so I was just about to say. So that does conclude all the scheduled hearings but there is an opportunity now for anybody else who would like to sort of make some comments or even address some of the concerns that have been raised in other people's submissions.

COMMISSIONER MADDEN: You're right to go.

MS STRACHAN: Just go up to the table?

COMMISSIONER DOOLAN: Yes, sorry, it will have to be at the table.

MS STRACHAN: It's just two brief comments. One thing that the Basin Plan I don't think actually has considered is that it's actually just created another irrigator. And one of

the problems that I have with the (indistinct) and OEH and what not, is that they have water allocation for that year and they have to achieve certain outcomes, and they want to be seen to achieve certain outcomes but it doesn't leave anything for the long-term. So they're seeing it within a very specific 12 month period, rather than having anything to actually keep the rivers flowing and have that instream health and longevity. So it's just exacerbated what David was talking about, that we now have an additional irrigator more effectively using that water which used to maybe sit redundant in accounts that actually quietly achieved outcomes for the environment but now it's actually got a productive use expected of it.

The other thing, Jane asked David and a couple of others in the room here too about well what did they see as the solutions of addressing and fixing the Basin Plan. It's really hard when the information hasn't been transparent and the assumption that local communities understands what's actually being imposed on them purely puts them on a reactive foot, to be very anti-plan. And I think that's a really big deficiency of the MDBA in that they're not willing to come out and really truly explain the benefits or their long-term vision of how this is going to be something that we need to adopt into the future. So that was my two points.

COMMISSIONER DOOLAN: Okay.

COMMISSIONER MADDEN: Thank you.

COMMISSIONER DOOLAN: Thank you. Yes?

MR ARNOLD: Sorry, there was one more, one more point I missed before so I'll throw it in here. In relation to, I guess, the use of figures and data. I'm a data person, I like numbers, they need to add up, so I enjoy playing with numbers. But the - and don't quote these numbers as being correct either, by the way - but to give you an idea of where things fall down is, in the plan, in the Darling - or the Barwon-Darling system I think they quote an average of 9,500 gigalitres a year or thereabouts on average as a follow in the so-called Darling River. That sounds all great and I believe that's a figure that most things are based on as far as water sharing plans and everything is based on. But when you look at - when you actually start to break that figure down, and I did actually have all this in my head and correct numbers about 12 or 18 months ago, by the Government's own documents over the hundred years that's your long-term average. So you think, "That's all right, that's a fair and reasonable explanation, 100 years, the longer the term you take it over the better the average is going to be". That doesn't work in a very highly volatile and highly variable system. So to give you a bit of an idea, and I'll break it down, in 80 years out of a hundred you had flows of less than 5,000 gigalitres. So all of a sudden you're almost at half of your average for 80 per cent of the time. So I'll break it down further. In 60 years out of a hundred you had actually less than 2,600 gigalitres going through the river. So more than half of the time you have almost a quarter of the volume that they tout as the average going down your river. And then you have, like I say, water sharing plans to compensate that for the irrigators, where you can take water for another year, whether it be forward or back or however the system works.

Now in three years, in the data that I had there, in three years, so 3 per cent of the hundred years, over 10 per cent of the total volume of water that went down the river occurred. So you have an average - a long-term average of 9,500 gigalitres a year. More than half of the years you have 2,600 gigalitres a year. In one year, once again off the top of my head, 57,000 gigalitres in one year. Now the long-term average very, very majorly distorts the realities of the river, and the fact that the water sharing plans and the Basin Plan is based on, I believe, that average, long-term average figure, it's totally distorting the realities of the river and it is absolutely 100 per cent not sustainable, because more to that, that, you know, they say, "Well you're going to have more water down the river with the implementation of the plan", and what they're counting on is that they're counting on the more water on a long-term average being - they're going to have years when there's going to be 50 to 60,000 gigalitres of water going down the river and it will make up for the lack of water over the next ten, 15, 20, 30 years and they can still say, "Yes, we achieved more water down the river, therefore, the plan has been a success". The reality is, the river may have been dry for the last 15 years, and that in itself, while the figures say it's a success, the reality says you've killed it, absolutely.

COMMISSIONER DOOLAN: And I think we did hear that with earlier submissions too, that it was around event management and low flows in particular, and how to share in those low flows.

MR ARNOLD: And it's how to use the figures to achieve a practical outcome, not an imaginary outcome. And when you have - and anyone who does, you know, does averages, if you've got a highly variable set of averages the first thing you do is knock off the top percentage and the bottom percentage and then you start to play with the averages. There's no point doing averages when you have extreme events that are four, five, six, 700 times what most of the other figures are because it totally skews - it totally skews your figures and it just simply doesn't equate to reality.

COMMISSIONER DOOLAN: I do understand that. Bill?

MR McCLUMPHA: Yeah, just a few things I've missed, Jane. Just wanted to recap, especially in light of your upcoming visit down to the GMID. I just wanted to go over the - I don't think I mentioned the notion of - of conflation where, when you conflate something you associate it with something else so the ideas merge and things can be very confusing. Well that's especially true with water which is, you know, confusing in itself. And one feature of the narrative of the debate of the whole - everything that's surrounding the Murray-Darling Basin Plan is the conflation of rural decline with the Basin Plan, and that it goes on a daily basis and it underpins a report I discussed and, Jane, when you're talking to everybody in the GMID next week you're going to be hearing a lot of conflation. All the problems of the GMID are going to be blamed on water recovery, et cetera, et cetera. And the things that actually have caused rural decline don't get mentioned. And they are terms of trade issues, water availability, social change, technological change and all the rest of it. Some of these have been outlined in the Murray-Darling Basin Plan assessment and the economic reports of 2017 and 2018, they go into them and they make the point, which is an obvious objective point that everybody should know anyway that, yes, there's been a lot of rural decline and job losses and all the rest of it, but there's a lot of factors at play and

it's not just the Basin Plan. And yet we've got the situation now where everybody feels like they've got the right to go around and point the finger at the plan and say, "Our community is going downhill. The dairy factory closed. This factory closed, that closed, everybody had to sell their cows because of the Basin Plan", when that is absolutely not the case. And it's very distressing to see this conflation just continue on.

Now I'll just give you a quick example. Take it as you like but objectively I believe that I'm on pretty safe ground. There was a letter in Sunraysia - the Sunraysia Daily last week from Richard Anderson of the - Chair of the Victorian Farmers Federation Water Council. He says - it's very brief, I'll just read it out, won't take a second - he says, "Farmers in Victoria have been hardest hit by the Murray-Darling Basin Plan and the northern Victorian dairy industry is significantly worse off as a result. Analysis of the MDBA's community profiles reveals Victoria has lost over 2,220 more full-time agricultural jobs than any other State in the southern connected system. The data shows Victoria has lost a staggering 5,000 full-time ag. workers compared to New South Wales 2,900, South Australia's 2,300. This is only 48 less than both New South Wales and South Australia combined". He says, "We have long suspected Victoria was the hardest hit. Now we have hard evidence based on the MDBA's own work. The Basin Plan effects on Victorian communities are real. Victoria has prepared endless reports highlighting the socioeconomic impacts of the plan. It's high time that Canberra started to take notice". Now I don't know if you've read this letter or - but you would've seen similar ones and you would've heard similar stuff. What he doesn't say is that that data isn't about those job losses that he quotes there. The MDBA doesn't say that they're due to the Basin Plan. It says that they're overall job losses in the basin over a particular period. Now the final paragraph, you know, "We have long suspected the Basin Plan effects on Victorian communities are real". What he's doing there, and he's not alone, it just goes on a daily basis from every politician, every DELWP does it, Lisa Neville does it, every water minister does it, every National Party politician and most Labour politicians do it as well, they continually conflate rural decline with the Murray-Darling Basin Plan. And it's one of the reasons that the Murray-Darling Basin Plan is under threat because this sort of low rent misuse of debating principles is allowed to run out unchecked and it's another reason - or it's another aspect of the MDBA's unwillingness to get in there and right the ship and explain exactly what the situation actually is. They just won't do it. You know, I've had a lot to do with the MDBA over the years; I ring them up, I've said, "So and so's done this. This report says that. Why don't you, you know, counteract that argument? Why don't you put the opposite narrative and protect your plan?" There's never been any interest in doing that. It's been anodyne, it has been pathetic.

Just one final example, Jane. Conflation. The Murray River Group of Councils commissioned a thing called the McGowan Report. Are you familiar with that?

COMMISSIONER DOOLAN: I don't think I've seen the McGowan report.

MR McCLUMPHA: Well it's available on the Murray River Group of Councils website. Now it is - calls itself qualitative research, which means it's not - doesn't have to be backed by facts and figures, that's what people feel, and you've got a lot of Basin irrigators, a lot of Basin identities giving their feelings about water, about rural decline and all the rest of it, and the whole report was commissioned by the - well by the GMID councils with the

purpose of conflating rural decline with the Basin Plan. And so people are riffing about how tough things are on the land, how they haven't got any water, there's no allocations, their cows are dying, everything is horrible, and the report points the finger - edits things and presents things in such a way that everything that the people are complaining about is due to the Basin Plan. And worse still, Jane, it's got an accompanying video, edited very cleverly to that effect; saying that the Basin Plan has ripped the guts out of every community from Wodonga down to the Murray mouth, and that everything's, you know, going to hell in a handbasket because of the Basin Plan. And that video was paid for by DELWP. DELWP is a guilty party. They are putting their shoulder to their wheel, putting their shoulder to the wheel of - the Victorian Government is putting its shoulder to the wheel, to pull the wool over the eyes of everybody about the Basin Plan and what its true effects are. They are guilty. Have a look at the video yourself.

COMMISSIONER DOOLAN: Okay.

MR McCLUMPHA: Thank you.

COMMISSIONER DOOLAN: I've certainly seen the other reports for RMCG, the Frontier and naturally the MDBA evaluation reports themselves.

MR McCLUMPHA: Have a look at the McGowan one, it's on the Murray River Group of Councils website.

COMMISSIONER DOOLAN: All right.

MR McCLUMPHA: And the video will come up as well.

COMMISSIONER DOOLAN: Okay.

MR McCLUMPHA: Thank you.

COMMISSIONER DOOLAN: Thank you. Over to you.

MS MacALLISTER: One of the hazards of speaking off the cuff rather than referring to notes. Just a few points that I wanted to reiterate which have come from previous submissions, one of which was presented to you as a redacted submission that we're still trying to remove the redaction on, that the New South Wales Government has decided to impose on our free thought and expression.

Wentworth Shire Council have agreed with certain recommendations that we would like to see our list of demands, if you like. We feel it's necessary to impose minimum flow targets along the entire length of the Darling River, including at the confluence. We'd also like to see water quality testing as well, not just for ECs and blue-green algae, or indeed pH which I think is a new one, but chemical residue. We have heard a bit about glyphosates and we're concerned that Mildura has reported to have a 9 per cent greater than the national average cancer presentations or diagnoses in this region and we would like to ensure that the children of our farmers and families along the Lower Darling are not again exposed to

infections that could further limit their ability to be treated with antibiotics, for example, just one example. We'd like to see Menindee, as an icon site, recognised for its national importance in upholding international conventions, particularly around water birds and - migratory birds, sorry, and biodiversity. It also has a significant cultural importance, as we've heard, not just for the traditional owners of the land and the people who have been using the Menindee Lakes as a meeting place for, at the very least, 23,000 years has been recorded up there. But also as we've heard from Mr Arnold as well, there is extensive western, if you like, cultural history around the region as well. We'd like to see that elevated in terms of status because we see it as a very important place that we simply can't live without.

We would like to include a requirement for community water alongside the need for environmental water. The terminology is often used as omissive, and a divisive term in the "us and them" debate about who owns the water or whose water it is. Using a term of "community water" reminds everybody that water is in fact a basic human right and also essential survival need, and ultimately we would like to see - I wanted to make the point that Wentworth Shire Council began water carting once again to affected properties that did not have potable water. We did that once again before assurances were given to us from the State Government that they would somehow compensate Wentworth Shire Council for the cost imposed on it in making sure that its people do not die of thirst, literally, through bad management on different levels. And ultimately we would like our people to be afforded the common decency and humanity that we believe all people of this great nation of ours should have, because we think that they are highly valuable and should be seen as such by all levels of Government and all agencies.

COMMISSIONER DOOLAN: Okay.

MS MacALLISTER: Thank you.

COMMISSIONER DOOLAN: Thank you Jane. Are there any other comments to be made? Okay, given that's the case I'd like to thank everybody who has appeared in front of the Commission today. We do find these hearings to be extremely valuable in producing further evidence for us and helping provide feedback on our draft recommendations.

So basically I'll adjourn the proceedings and the Commission will resume its public hearings on Monday 15 October in Murray Bridge. So thank you once again.

**MATTER ADJOURNED AT 1.40 PM UNTIL
MONDAY, 15 OCTOBER 2018 AT 9 AM**



Australian Government
Productivity Commission

PRODUCTIVITY COMMISSION

**INQUIRY INTO THE FIVE YEAR ASSESSMENT OF THE EFFECTIVENESS OF
THE MURRAY – DARLING BASIN PLAN**

DR J DOOLAN, Commissioner
MR J MADDEN, Commissioner

TRANSCRIPT OF PROCEEDINGS

**AT MURRAY BRIDGE GOLF CLUB, RITTER STREET
ON MONDAY, 15 OCTOBER 2018 AT 10.01 AM**

INDEX

	<u>Page</u>
MURRAY DARLING ASSOCIATION – REGION 6 MR VINCENT CAMMELL	74-80
DR ANNE JENSEN	80-91
MS ANN LUCAS MS LYNDAL WILSON	92-96
MR PAUL HARVEY	96-102
MR BOB NEWMAN	102-109
RIVER LAKES & COORONG ACTION GROUP MS ELIZABETH TREGENZA	109-115
MR ROBERT McBRIDE	116-126
MS ROSA HILLAM	127-135
COMMONWEALTH ENVIRONMENTAL WATER OFFICE MS MICHELLE CAMPBELL	135-137

COMMISSIONER DOOLAN: Good morning and welcome to this public hearing of the Productivity Commission inquiry into the five year assessment of the effectiveness of the implementation of the Murray-Darling Basin Plan. These hearings follow the release of our draft report, which happened in the end of August. My name is Jane Doolan, I'm a Commissioner with the Productivity Commission and my fellow Commissioner is John Madden and we've been leading this inquiry.

I'd like to begin by acknowledging the traditional custodians of the land on which we meet, the Ngarrindjeri people, and I'd like to pay my respects to their elders past and present.

The purpose of these hearings is actually to facilitate public review, comment and concerns of the Commission's work and to get their comments and basically understand people's reactions and suggestions to our draft report and the recommendations in that. We had a hearing first in Mildura last Friday and following this one in Murray Bridge we'll be in Shepparton on Wednesday and we've got scheduled hearings in Goondiwindi, Sydney, Dubbo and Canberra. When they're final we'll be working towards finalising the draft report with a view to providing it to Government by Christmas. It's really important that we do actually have participation, so we do thank you for your attendance. It's important to get feedback from concerned citizens and groups and stakeholders, and we actually take comments made in these hearings, the submissions that we receive and feedback from other stakeholder meetings in actually finalising our recommendations, so the advice is taken seriously and valued. When we do actually hand our report into Government at the end, Government then has something like 25 parliamentary sitting days after completion to table it to make it public and participants, those who have registered their interest, will be advised of when that is available.

In terms of these hearings we do like to conduct them in a reasonably informal manner but we do have a full transcript being taken and that will be publically available and on our website in a few days' time. And for this reason we can't take comments from the floor during participants actually advising us of their concerns or comments. But at the end of the day we'll have a time where we can actually make available for people from the floor to actually present if they want to. Participants are not required to take an oath but we do ask that you are truthful and you're actually welcome to raise matters, not just on your own submission but if you hear concerns or have comments on what other participants are saying feel free to address those.

I don't think we've got any media presence, okay, so we'll not worry about that, but we do have to comply with the requirements of the Commonwealth Occupational Health and Safety legislation so I advise you that in the unlikely event of an emergency, please follow the green signs out to the 18th green or the car park and all will be well.

Now, we do ask participants to open with a few remarks but basically if it's possible to leave some time where there can be some discussion with the Commissioners along the way. So I think that's all the business of the day, so I'd like to invite Mr Vincent Cammell as our first speaker, representing the Murray-Darling Association Region 6, to come to

the table. And Vincent, if you wouldn't mind for the record again introducing yourself and indicating your affiliation.

MR CAMMELL: Thank you. So I'm Vincent Cammell. I'm the chief executive officer of Coorong District Council and I'm here today representing Region 6 of Murray-Darling Association. I should put an apology in on behalf of the Association; normally it would be the chair of the Region 6 who would be here to present to you, but with the caretaker period and everything else with the local elections it falls to me today to present on his behalf effectively. I do thank you for the opportunity to talk. I have got a statement that I'd like to make, it's about five minutes only so hopefully it will go through to actually expand on or raise issues from our written submission and follow on submission. So if you're happy with that I'd like to just go through that. Okay.

So as you know the Murray-Darling Association represents the voice of local government and the communities we serve in the management of Basin water resources. Region 6 is uniquely placed at the very end of the river system and I'm here today on behalf of our member councils, being Alexandrina Council, Coorong District Council, The Rural City of Murray Bridge and Tatiara District Council. Our first key message is that our councils and the communities we represent overwhelmingly support the Basin Plan. Our linked experience has shown us all too well the direct link between the ecological health of the Lower Murray Lakes and Coorong and the economic social and cultural wellbeing of our people. If the river suffers, we suffer.

In recent months the national focus has been on the economic and community impacts of water recovery. Our job is to remind the national that we have already felt devastating impacts of not recovering this water. Unsustainable levels of take during the Millennium Drought almost pushed our community to economic and environmental breaking point. When the next big drought comes we need surety that upstream Basin States will play by the rules, and with current activities and where we're at with our weather patterns it's very timely to call that out again. We know that returning the use of Basin water resources to a sustainable footing is no easy task. There is compromise involved for all river communities in pursuit of the greater good, including ours. Against this background we welcome the Commission's frank and clear assessment of what is and isn't working.

As you've identified, the plan isn't perfect but we have been and will continue to be consistent and both supporters of the plan on the basis that it's still the best chance we've got to ensure a healthy working Basin for the benefit of all Australians. Our submission speaks for itself but I do want to add some comments on the supply and efficiency measures, as well as some additional comments about climate change.

So in regard to 650 gigalitres versus 450 gigalitres, our position has been that supporting full and timely delivery of the Basin Plan means supporting both the 605 gigalitre down water and the 450 gigalitre upwater. We agree that one of the biggest risks overall is the potential failure of 605 gigalitre supply projects to meet expectations in terms of delivering equivalent environmental outcomes. As identified in your report, project failure would trigger a further round of environmental water recovery via other means, such as buybacks or further efficiency projects which would in turn likely trigger difficult

reactions from affected irrigation communities. Despite the difficulties associated with this reconciliation process it is critical that the 605 gigalitre supply projects be backed by robust evidence before they are permitted to proceed. Our concern is that come 2024 the political will for this reconciliation process might be lacking, putting the 2007 150 gigalitre target, let alone the 200 gigalitre target in jeopardy of being abandoned. This is why we have emphasised in our submission the importance of political compact for making make-good arrangements, similar to the recent compliance compact. The adoption of a clear and robust reconciliation plan which has been expressly agreed to by Basin States will go some way towards allaying community concern about the extension of supply project implementation deadlines.

With respect to the 450 gigalitre, our initial reaction is that draft recommendation 5.2 seems to propose a common sense approach to the problems identified in draft finding 5.2. We do remain wary, however, about the increasing number of limitations being placed on recovery of 450 gigalitres. These limitations have included a 1,500 gigalitre cap on total water buybacks back in 2015 and now focus on off-farm versus on-farm efficiency projects. A revised test for socioeconomic neutrality plus a warning that the proposed package of supply projects won't sufficiently ease constraints so as to deliver the enhanced environmental outcomes our region has been looking forward to. We would be extremely concerned if Basin States use the findings of the Commission as an excuse to wave the white flag on the 450 gigalitre. Yes, the pathway towards recovering this water comes with significant challenges but our hope is that Basin States will tackle that challenge with genuine good faith and a can-do attitude, rather than an attitude of it's all too hard.

As indicated in our submission, we are particularly concerned that potential for the socioeconomic neutrality test to be used is a political play thing ahead of the forthcoming Victorian, New South Wales and Federal elections. To this end we strongly welcome the Commission's emphasis on Basin States taking joint responsibility for the implementation of the plan.

In regard to climate change. Both of our submissions did express concern about the potential impacts of climate change and Basin Plan implementation. We understand that CSIRO has predicted medium river flows and the Southern Mallee Darling Basin would decline by 13 per cent by 2030 and we also understand that the recovery target of 3,200 gigalitres is the bare minimum needed to restore the river to a more sustainable level of take under current conditions. The key risk then for achieving end of system targets is the fact that current sustainable diversion limits do not account for the projected declines in Basin rainfall and thus river flows. Communities all throughout the Basin will need continued assistance to adjust to a future of less water, not just from water recovery but also from the impacts of climate change. Over the longer term our region is also concerned about the impacts of reduced flows and rising sea levels on the effective operation of the barrages and on the economy and ecology of the Coorong and Lower Lakes.

We have written to the South Australian Government asking them to take the lead in establishing an intergovernmental taskforce which can develop a long term climate

adaption strategy for the Coorong, Lower Lakes and Murray mouth, and to do so in partnership with local government and community. It took many decades for Basin States to agree on and then construct the current barrages and we could expect that developing, implementing and adaptation pathway for this critical infrastructure will play out over a similarly long period.

Given the long lead time required for decision making of this kind it is important that initial steps to gather the evidence base are undertaken sooner rather than later. We would welcome some acknowledgement of the need for this body of work being included in the Commission's final report. That's my formal statement.

COMMISSIONER DOOLAN: John, do you want to lead off?

COMMISSIONER MADDEN: I guess it would be interesting to get some thought around the reconciliation process and what you mean by, I guess, a transparent - - -

UNIDENTIFIED SPEAKER: We can't hear.

COMMISSIONER MADDEN: Sorry. We might just call this and see what issues we'd like to cover, so that reconciliation would be made good and what else you want to cover.

COMMISSIONER DOOLAN: Well, could I come in with your last point, for a start, and then we'll get, if you like to your views and any suggestion also that you might have around our draft recommendations on supply projects and with suggested extensions where it might be required. I think in your submission you indicated you were not averse to that, providing there were checks and balances. So it would be a good idea to get a sense of what you felt were adequate checks and balances to ensure confidence.

But just following your last point, the climate change issue and the fact that you have asked the South Australian Government to establish that taskforce. Is the sense that that work would actually be done to enable input into the 2026 review of the Basin Plan, is that the aim, if you like?

MR CAMELL: That is certainly the aim, but at this point we don't know if that would actually be picked up or dealt with in that period. At this point in time it is early days in regard to that stakeholder engagement and trying to get this taskforce set up and going and looking for that sort of ownership. We believe ownership at another level might actually assist with that and help push the right buttons in regard to moving that forward.

COMMISSIONER DOOLAN: Okay. But an important thing to actually look at, particularly given the challenges of sea level rise, what's happening at the lower end and make sure that that's able to be fed into the review of the 2026 plan. But so far no response from Government on that?

MR CAMELL: Only initial engagement but no formal ownership or direction or focus at this point.

COMMISSIONER DOOLAN: Okay, thank you.

MR CAMMELL: I should highlight, this has been a project we started about six months ago, seeking that engagement. So it is actually early days in regard to that process. But it is a unified approach from the councils within the region.

COMMISSIONER DOOLAN: Okay. Thank you.

COMMISSIONER MADDEN: Just to follow on, on that, the climate change. We've had a few different submissions talk about accounting for climate change, and I guess it is that note of what do people actually want done with SDLs at the moment, given there is a review in 2026 and SDLs are set there and so on. Funnily it's an easy thing to say but I'm wondering - and I have some sympathy in terms of preparation for 2026 and information, et cetera but the SDLs were set for a period, they're not set in stone forever, there is an ongoing review, you know, every ten years, so.

MR CAMMELL: From my perspective it's more about the actual recognition of climate change affecting the greater system and actually having it in there as part of the process, so when those reviews happen that it's already a given that it's actually part of the requirement or the need. And rather than just looking at the impacts or the outcome of climate change, actually accepting upfront what those changes or those drivers might be and actually having it as part of the overall plan. So it's more about the upfront acceptance, rather than if you're trying to pre-guess or alter what that future review might be. So by just for the recognition of climate change and the - where it's going or what it's likely to do, it might actually assist or allow some pre-work to occur to actually better reflect where we are at in 2026. So from our perspective it's more about the preparation process and don't let it be a surprise to you in eight years' time or whatever.

COMMISSIONER MADDEN: Yes, okay.

MR CAMMELL: At this point in time, unless it's called out it could still be no better understood than it is now.

COMMISSIONER DOOLAN: Thank you. I think that there is an area of our report where I think we do mention that, but I think it's an area that we could actually elaborate a little more on, is the preparation for 2026 and the type of information that's required.

MR CAMMELL: Yes. I think that's where we were coming from when we read the report. We wanted to see a bit more strength to it, so.

COMMISSIONER DOOLAN: Sure. I suppose we would like to get your views sort of representing the councils at the lower end. I think in reading your submission you were sympathetic to extensions of water resource plans and potentially supply projects, particularly the constraint projects. But it would be good to get a sense of understanding the checks and balances, if you like; what would be required to give your communities confidence that effort was being undertaken. Any comment there that you might like to

make?

MR CAMELL: I've probably got people with me today who could probably better answer that question for you, but from checks and balances it's about ensuring a robust process in regard to the checks and making sure there's actually oversight in regard to what's going on, where at the - it's probably from the perspective of a lot of concern in regard to the fact that things seem to happen, or people say they're doing the right thing but there's actually no demonstration or proof that they're actually - that things are actually assessed or measured or controlled effectively.

COMMISSIONER DOOLAN: So transparent governance arrangements.

MR CAMELL: I'd like to see more robust transparent governance.

COMMISSIONER DOOLAN: Yes, and frequent reporting on.

MR CAMELL: Yes.

COMMISSIONER DOOLAN: And frequent public reporting.

MR CAMELL: And independent review, if you like - - -

COMMISSIONER DOOLAN: Independent review.

MR CAMELL: In relation to what people are doing. I think there's a lot of faith at the moment in regard to a lot of the - what's being reported against. This might be a bit of simplification of a very complex matter but that's probably the way I see it.

COMMISSIONER DOOLAN: Yes. I mean we did recommend a gateway-like process, but again some of the feedback we're getting suggests exactly as you said; it should be followed up by clear milestones, transparent reporting and independent review so that people have got some confidence about what's happening.

MR CAMELL: I think there's a big issue at the moment where there's not a lot of faith in regard to what is actually occurring in the background so this is about actually building the process or building people's perception in regard to what is happening.

COMMISSIONER DOOLAN: John?

COMMISSIONER MADDEN: Yes, I guess it's a follow on from that, if there are any attributes around - you mentioned the make-good arrangements in the planning. Are there any kind of attributes, are they similar in terms of that kind of independence, or are you talking about actually outlining your strategy so people know what happens if one of the supply projects does fall over and what the response is, or?

MR CAMELL: Okay. My personal aspect is I'd like to see that strategy developed, to understand the impacts of something not working or not going to plan or even what is

being done being undermined by secondary cuts, if you like. It's failure by introduction of a thousand cuts, basically. Eventually you end up with something that's not workable or functional. So I'd actually like to see that brought out in the open and actually work done to demonstrate to people what the impacts would be of those little minor changes we've seen in their own regard, but when put together with those three other changes suddenly cause major grief.

COMMISSIONER MADDEN: So some kind of structured and independent review, that's honestly - - -

MR CAMMELL: A lot of this gets back to that, yes, yes.

COMMISSIONER DOOLAN: Yes. Are there any other areas of our report where you feel the recommendations perhaps need further work or you'd like to see more detail? Obviously that's a key area, and climate change.

MR CAMMELL: No, I think what we're materially saying is with our secondary feedback that we gave to you, that we weren't against the report. It was more to some fine tuning around the terminology of the words or even recognition of the future. So we'd probably certainly like to see more emphasis being placed on the bar for socioeconomic neutrality being set too high in regard to some of the testing. We're certainly aware that some upstream lobby groups are keen to make this test so restrictive that it will effectively come across with the recovered water, and that might be just our assumption of what it means but that's the way we see it, so we'd actually in your report like to see more strength in regard to ensuring the delivery aspect of water is actually put across far more strongly, not necessarily the aspects that might undermine it.

We also probably, and it's not something you can necessarily deal with through your report, but the - we are deeply concerned about the future political will for change or for outcomes, especially with political process, and we do think that some of that could be more clearly recognised through your report, so there's actually in people's thought process more directly, more openly, rather than something just happens in the background. And once again that might get down to just almost the sales pitch behind what your report actually is, to ensure that people - if you've got a politician saying something that they think of gaining votes somewhere, your report could actually stand alone in regard to trying to put that alternative argument in place or try to justify why something needs to actually be, rather than actually just being open conversation.

COMMISSIONER DOOLAN: All right. Have you got any further questions?

COMMISSIONER MADDEN: No, no, I think you've explained the key points that I just wanted a little bit more on, so thank you.

COMMISSIONER DOOLAN: Yes. Okay. That's fine, we haven't got any further questions.

MR CAMMELL: No, but just to maybe close, we do - we do welcome the

Commission's frank assessment of what is and isn't working and we do want to see your report maybe strengthened in a few little areas, but overall we like the direction.

COMMISSIONER DOOLAN: Well thank you very much, and please pass on our thanks to your councils, even though they are currently in caretaker mode.

I'd like to call on our next participant, Dr Anne Jensen. Again, Anne, if you'd just introduce yourself for the transcript.

DR JENSEN: Good morning Commissioners. My name is Dr Anne Jensen, I'm an environmental consultant, a wetland ecologist, and I'm also a Healthy Rivers ambassador, a member of a volunteer group of citizens throughout the Basin who are concerned to see a working Basin Plan and an effective Basin Plan.

Just in starting, first of all I'd like to say congratulations to you and your team. This was an amazing piece of work on a very complex topic and one of the most readable reports I've ever seen come out of the Murray-Darling. Considering what most of the Basin Plan documents look like, this one had one page in front with the summary and it was all there at a glance and backed by very solid technical detail behind it if people were interested, but I thought you did an amazing job to cover such a complex topic. Since I've been a Healthy Rivers ambassador it's taken me about two years to get my head around it because there are so many elements. And the main point I would make is I really strongly support your finding that in order to make the Basin Plan work as it's intended to work there's a lot of catching up to do, I think you called it "A stitch in time". We need all of the elements of the plan to be working and that means the so-called down water, the so-called upwater and the constraints and the complementary measures, and the water resources plans. And all of those things need to be on the table and functioning before we have a plan as it was intended.

I know there were a lot of compromises made to get the plan signed, to have a plan in place. I didn't realise the extent of those compromises until I got involved and I was somewhat stunned at the extent of the bargaining that had gone on, but that bargaining was done in good faith and what I'm seeing at the moment is people who are taking the plus side, the SDL adjustments for example, without working nearly as hard on what was supposed to be the other side of that bargain, which is to deliver the supply projects. If it was negotiated again I'd be strongly recommending not giving away the amount of water before they proved that they can actually deliver the promised equivalent ecological outcomes. As a scientist I have some doubt that that's possible - very serious doubts that that's possible but, as the previous speaker said, we need a process that makes sure that those projects are delivered, and I'd welcome your suggestion that there should be deadlines and that there should be financial penalties for not meeting the deadlines. I think that's what's missing in this current phase of the plan.

In the early days of water reform there was a very strong incentive in that financial payments could be withheld, the productivity tranche payments, and we saw lots of progress. And then that requirement was taken away and suddenly there's a big slowdown on meeting deadlines. So I welcome your suggestion that there should be

financial penalties. It would be better if they were independent financial penalties rather than tied to the projects themselves. It would be more effective, so there would be greater incentive to get on with the projects, and not only the supply projects but the efficiency projects as well. And as someone who's working in the area of environmental watering it's incredibly important that the constraints projects are brought up to speed because those constraints are stopping delivery of environmental water where it's most needed. So all of those elements in a package need to be sped up. So that's my overarching comment.

In supporting your recommendations I have a few comments. In particular, you talk about under-recovery water, which really surprised me, and I note that it's just the Gwydir and the Lachlan catchments that are referred to. I would like to see you have a recommendation that talks about under-recovery because a lot of questions have been raised about whether or not the environmental water on the Commonwealth Environmental Water Holder's books is real and available. I note that you've given it a low risk rating in your report on the basis of the numbers, but there have been questions raised by the Wentworth Group and by the Australia Institute about whether the holdings that the Commonwealth Environmental Water Holder has are in fact readily available. And there's been questions raised about some of them even would flow into the system. So I would hope that you might consider adding a recommendation around that notion, that perhaps the water that's on paper is not real and available water and we need to make sure that it is, because it was already a compromised number, far lower than what science said we needed. So I'm quite concerned that your very first recommendation comes up and talks about over-recovery, in a context where all scientists would be saying that the target is too low. If there's any notion that we're recovering too much it's very marginal, and in fact there's a bigger question about whether we're recovering even enough on the agreed compromised number. So I would like to see that included.

In terms of your other recommendations. Another issue I'm finding is that even having environmental water we need to secure its existence and its use on the same basis of - as irrigation water, it has equal rights, but I'm facing pressure right now in one of my jobs where we're being urged not to use all the available environmental water because some people upstream haven't got as much as we have, because we're in an area with 100 per cent allocation, with high security water, and people with low security water have zero per cent allocation. That's their market choice and I don't see the argument that we should not use the environmental water out of sympathy. An irrigator would use 100 per cent of his allocation. The environment should be able to do the same. Equally, if we're facing a dry year next year the argument's put forward that we should not start watering new sites this year because we wouldn't be able to follow it up next year. I would be arguing we should water them this year to at least give them some resilience if they're going to face dry times next year. So I'm really pleased to see that the new water minister defended the idea that we will take environmental water and give it to irrigators, but even so the pressures are there all the time and we need to make sure that we do have the water that is legally available for the environment.

Another point is in your comments about the salt target, I understand that's within the context of the salinity targets along the system and there's the suggestion it should be

reviewed, and you include the words that it might be abolished. That concerns me. I am happy to see it reviewed but I would prefer that abolishing it be taken off the table because it tends to lead the discussion because not only do the flows to export salt have a benefit in that arena, but there's a lot of environmental benefits attached to that, including removing salt accumulation from flood plains. So that if, for example, it's decided that the targets can be changed and lowered, there's pressure to stop salt salinity in such schemes on the basis of saving money, but that's based on the targets in the river water being met at the moment and it's ignoring the benefits on the floodplains of taking that salt out. So I welcome the idea of a review but please make it broader than just based on the difficulty of exporting the set number of tons of salt.

The next point I'd like to make is that we really do need effective monitoring. I've been very concerned that in the area of environmental monitoring a lot of money has been spent on Basin scale work, a lot of teams of researchers have been out there doing Basin scale monitoring. My concern is that when I read the report the conclusion is just that environmental watering is likely to have enhanced biodiversity. That seems to me to be a lot of money spent for no real conclusion. At the same time I'm struggling to find any money to monitor at a site scale or a reach scale because I've said - I'm told it has to fit into the umbrella of the Basin monitoring, and then I find there's no vegetation monitoring being done in South Australia so - and I'm working in an area where we have black box seedlings that came up in 2011, and these are the first black box seedlings that have any chance of survival since 1956. So we've been targeting in my group, we've been doing environmental watering to try and get them through the dry times, and succeeding quite well, but we can't even get the money to monitor what we're doing. And nobody else is either targeting black box or monitoring it in South Australia. So I think we need a review of what we're monitoring, how we're doing it, and then we need a clear report card coming out, as the sustainable rivers audit used to do, that we can come back and not just at catchment scale but more localised, smaller scales that communities can relate to.

One of my overall comments to you is I would really like to see a scorecard reporting system, something like the Healthy Waterways in Moreton Bay, where communities get involved. I know the Moreton Bay model includes local government, and we could get local communities and local government on side and understanding what we're trying to do all along the river. I think there needs to be much greater community involvement as part of the transparency so that people understand the decisions that are being made and the impact, potential impact on all of them.

And then my final key point is also that we need to include climate change, earlier rather than later. We're looking at very frightening predictions of how much less water we might be dealing with. We're already struggling with the amount we've got to try and return water to - enough water to the system to keep it healthy. We're facing a significant reduction in that. My understanding is the arrangements currently have the environment bear all of that reduction, but we need to be looking at how do we deal with that. If we come to reconciliation in 2024 and not only have we got a shortfall because the SDL projects haven't delivered or the efficiency projects haven't delivered, we may well have a major shortfall in our forecast for water availability to bring into the mix, and that's before we get to the 2026 review. So I would like to see this thing sped up with

deadlines, with penalties and with transparent reporting because I don't want this plan to fail. I think it's really important that we have a plan and I want to see it work, as it was intended. Thank you.

COMMISSIONER DOOLAN: I've got a range of follow up questions so are you happy for me to start, or do you want to dive in first?

COMMISSIONER MADDEN: No, you start. I think I have questions in each but you can.

COMMISSIONER DOOLAN: There's a couple of key things for me. Firstly, the issue that you raised about the capacity to use environmental water and the fact that you're concerned that there's an argument about not watering sites this year because you may not have it next year. So there is a framework and criteria for prioritisation. So is the concern that the criteria are insufficient or that they're actually not being applied appropriately?

DR JENSEN: The difficulty I'm facing and the small NGO, with relatively small sites is we're trying to follow the criteria; we're not sure that we're actually being told what they are, we thought we had developed a framework in partnership with the Commonwealth Environmental Water Holder and this year we put in our proposition based on what we'd agreed in previous years and suddenly we had this, to us, new criteria. And they may well have been there all the time but they were not communicated to us. And we're reading in the Environmental Watering Strategy that one of the priorities is to build resilience. We're saying, well if we're looking at dricons we should water now. If we have the water available we should water now. But we're being pushed back on new sites.

COMMISSIONER DOOLAN: So one of the criteria in the framework is about capacity to maintain those sites into the longer term, and not being - I know the criteria quite well and the framework. Not at all involved in its application. So for me it is actually trying to work through, is there a failure in the policy framework, or is there not very good communication of that, or is there a failure in its application.

DR JENSEN: Well I'd suggest that if you have a criteria that says you shouldn't water a site this year because you can't water it next year, and we might be facing who knows, we might be going into a four or five year period of dry times, failure to water this year when the water was available means a missed opportunity to me, from an environmental standpoint.

COMMISSIONER DOOLAN: It does depend on water though, competing priorities, but yes.

DR JENSEN: I guess. But essentially this is within an allocation, well we've been told we can have up to a certain volume and it's within that volume that we're being told not to water. So I'm just concerned about what I can see in the longer term from the policy that I'm experiencing this year, is that South Australia could end up only watering the icon site and two large sites where there's been investment in infrastructure by the State

Government, and our NGO not watering anything. So none of the rest of our floodplain getting watered in dry times. That's my concern. If you follow the policy through. I understand that the Commonwealth Environmental Water Holder has limited amounts of water available, has limited funding to deliver it, and it's expensive to deliver water onto the floodplain in South Australia because you have to lift water out of the channel, and therefore there's pumping costs. Okay, if we go for the best value for dollars invested, those small sites will drop off and the end result will be large sections of the floodplain in South Australia lost if we're in dry times.

COMMISSIONER DOOLAN: But nevertheless there is criteria for application of water in dry times and prioritisation. So your concern is that there's either not enough water, or some of those sites are still valuable but in dry times they're not the highest priority.

DR JENSEN: My concern is for the first time this year it seems to be that there's priorities being given for dollars for delivery cost. Like the lowest delivery cost possible. And if you go down that path, without looking at what your environmental benefits are, the whole of the South Australian floodplain gets ruled out, except for where there's large infrastructure projects that can - that where the costs will be borne by others other than the Commonwealth Environmental Water Holder.

COMMISSIONER MADDEN: Could I just follow up a little bit on the nature of the arrangement between you and the Commonwealth Environmental Water Holder. Is it a standing arrangement, does it have a five, ten year period? Is it then renegotiated on a - annual within an umbrella? I'm just wondering what the kind of, for want of a better word, contractual kind of relationship is.

DR JENSEN: Okay. I'm working as an advisor to an NGO. They had a contract with the Commonwealth Environmental Water Holder for five years. They were granted an extension because the Commonwealth Environmental Water Holder was reviewing arrangements and possibly going to procurement, but that hasn't happened yet. So we're in the second year of extension without knowing what the arrangements are, and now being hit by a criteria we weren't aware of. So it's in a state of flux at this point, and it may be that the NGO will not be able to meet the criteria in the future.

COMMISSIONER MADDEN: And so how does that integrate then with the South Australian priorities and how do you kind of - and I don't mean you, I mean the NGO, actually relate then with the South Australian Government and what priorities and how they fit within those priorities?

DR JENSEN: We have a member of the Department on our steering committee and what we're doing essentially is complementing what the State Government does and we're going in on the sort of lower priority. But they have a cut-off line, and we go in under that cut-off line and we do some more of the smaller projects on private land, with private landholders and community groups. So complementing what the State Government is able to do, but at a much smaller scale.

COMMISSIONER DOOLAN: Could I move on. The salt export objective. So I am keen, we've got a lot of comments about actually its utility, or lack thereof, and in particular what wasn't clear, at least to potentially a lot of upstream communities at least, is what is the ecological significance of that salt export objective? Now you clearly feel there is one, but I suppose if you could just expand a little more talk about - we understood the flow targets, which are targets under the plan, and they're concentration targets and understood, you know, what that means for people and ecology, but the salt export objective, the ecological significance of it was slightly obscure. So you found it - you thought it was a surrogate for floodplains?

DR JENSEN: Certainly the watering projects that we have, have all been sited within Salinity Interception Schemes because there wasn't much point in watering seedlings growing next to dead eucalypts that died because of the salt accumulated in their root signs, so we concentrated on areas where we know that the saline groundwater has been lowered under those floodplains, and there's been a significant benefit noted and some of my monitoring has gone to demonstrate that. And there's been concern expressed that if the SIS schemes are turned off for budgetary reasons we lose those environmental benefits.

I guess my concern about how the recommendation around the salt target was phrased, I understand it's in the water quality section of the plan but it seemed to me that we should be aware that there are some environmental benefits tied to exporting the salt and preventing it from accumulating in the floodplains and that - my concern is coupled with the fact that we're also looking at a flow regime which is not going to water the outer floodplains at all, where salt does accumulate, so we're getting a compounding effect. So it may be that that particular target is not the right one in terms of the salt export target, but I was just concerned that your recommendation said abolish it, and it specifically was one of the options. Maybe review it and change it but not necessarily abolish it, as long as you took into account the fact that there are some other benefits.

COMMISSIONER DOOLAN: So I think it's a matter of - in terms of identifying what those are in that review process and then working out if that's the right vehicle.

DR JENSEN: Yes. I had a bit of a concern because it was a bit of a silo effect, um, in that the water quality target sits in one part of the plan and flows, and environmental benefits sit in another part of the plan. But they should, I think, work together.

COMMISSIONER DOOLAN: Okay. I'd like to move on to your comments about monitoring as well. And you would have seen that we don't think there's, particularly at the moment, effective monitoring evaluation strategy. But probably like you, my own personal view and experience has been in matching up those two scales, regional and local, and Basin scale. And if you move too much of the Basin scale the results tend to get very generalised and to be as you said.

DR JENSEN: Yes. Yes, I was very concerned, considering that we keep being told that they spent \$30m on monitoring. When we look up the report, first of all it's dated 15/16, so it's quite old, and then the conclusions, when I - and I had to hunt for them, were so

generalised that you really could - you couldn't use them to justify using environmental water to someone who was opposed to it. Whereas I can produce photographs of before and after and demonstrate here's the change in growth.

COMMISSIONER DOOLAN: Then in terms of designing the monitoring evaluation strategy do you feel that focusing at the local regional scale, with the capacity to aggregate to the Basin scale, is a better approach for communities than concentrating on the Basin scale and hoping that there's something that sort of filters down? I mean this is a design issue, isn't it?

DR JENSEN: Yes. I think it has to be at least down to catchment scale, and if you can tell the story at a reach scale, then you can better communicate with the local people and have them understand what environmental water is doing for them in their community. I'm operating at the extreme local end of it, and I'm not saying that's the best way to do it, but perhaps some - a few examples might that help and if they can be aggregated, even better. But when I was starting out on my monitoring I tried to fit into whatever this Basin scale was, and it took me ages to even find out from anybody how it was being done, what parameters were being measured. And when I finally got there it was so expensive and so academic that there was no way an NGO could afford to do it. So there's a case, I think, for some - maybe some localised case studies. And I know even - in the monitoring they talk about case studies and there's a dot in the Riverland but when I tried to find out what that means they said, "Oh, that's just representing South Australia". And they've done fish and flows and I think salinities, but they haven't done - there's no vegetation monitoring in South Australia because apparently it was by a tender process.

And the other criticism that I have heard from other scientists is that there was an intent that there should be standardised methodologies imposed, and that they don't work very well in the Lower Murray, and the best data that has come out of the Lower Murray has been where the scientists have been allowed to design their own monitoring strategies, and that's the fish information coming out of (indistinct). So there's something in the design that's precluding getting detailed conclusions and I think the scale as well.

COMMISSIONER DOOLAN: Okay. And the design should, even if they maintain it as academic, it should be flexible enough to bring in local case studies as key parts.

DR JENSEN: Yes, or have plug-in points where someone can use the same methodologies and feed that up. But I couldn't find anywhere to put my data.

COMMISSIONER DOOLAN: Okay. Following on you also mentioned something like a report card, sustainable rivers. So harking back to the Sustainable Rivers Audit, it was not designed to detect, you know, the effectiveness of a new and different flow regime. So it wouldn't probably show a great deal.

DR JENSEN: No.

COMMISSIONER DOOLAN: So, what's your thoughts on what a new report card would have to do?

DR JENSEN: Well, I can't remember all the details from the Healthy Waterways typed report cards, but I do know they were able to give an annual report card to a local catchment, to the local government to tell them how effective the programs have been, and what the progress had been and my understanding is that it's a really good model to engage local communities. So without having a specific idea in mind, I would like to see something that had that effect. That communities that we're working with up and down the river can understand how environmental water is being delivered, what the results are and why we need it, and certainly from downstream communities we need the upstream communities to understand that water coming down to us isn't wasted. That it has its benefits all the way down to all the communities, and including keeping the rivers healthy enough to support us all.

We still need to get that message out and I think telling local stories is a really key way to do it. One of the programs that I've been working – just contributing to, is BioBlitz, which is about citizen science, trying to get people out in the field monitoring key parameters out in their local ecosystems, getting to know them. Those sorts of programs, perhaps, could be plugged in as well, but it's a real concern when I hear people from various communities who are not – obviously don't understand - there's a lot to understand, they don't understand the benefits to themselves. They don't understand why the rivers need to flow all the way to the end of the system, and what the benefits of those things are.

So, I see there's got to be a bigger role for the citizens of the Basin to be involved going forward, and that hopefully would feed into political will for when we get to the reconciliation process because as it stands now it's going to be really difficult. We're going to be looking at probably significant under recovery and probably in drier times.

COMMISSIONER MADDEN: I guess just two things on the monitoring. One is just from knowledge for me almost, but in terms of that local scale that we talk about, that means a lot of different things to different people. If you think about South Australia, how many kind of local scales – I mean are you talking about reaches, you know, is it kind of lower, middle, upper, I'm just wondering.

DR JENSEN: I mean you perhaps might, just as a guess and this is without any scientific basis, but we might pick say six communities along the length of the river and have reports of condition around them, or go for local champions, local individuals who are working on projects.

COMMISSIONER MADDEN: Yes, I meant just from your knowledge of working along the river.

DR JENSEN: Yes.

COMMISSIONER MADDEN: In kind of a social catchment, where do people identify what they're kind of interested in from a local perspective in terms of that reach?

DR JENSEN: Yes. For example, one of the sites we've been watering is Loxton Riverfront Reserve, in conjunction with the local council, using their stormwater system to help us deliver the water to the sites we need to get to, and it's a place where everyone goes walking and boating and swimming and there is a caravan park, so it's a very public space. So somewhere like that if you were able to then publish the story of what has happened there and tell that story, I believe you'd get the whole catchment of that community. So it would be about picking where the most effective stories could be told.

COMMISSIONER MADDEN: Yes, so that's a case study or maybe asset level.

DR JENSEN: Yes.

COMMISSIONER MADDEN: I'm just wondering then going up to the state, you'd mentioned the veg mapping, again what kind of reporting or is that the whole – I'm just trying to get - - -

DR JENSEN: Yes.

COMMISSIONER MADDEN: The issue we have, obviously, is the authority having roles that we see.

DR JENSEN: Yes.

COMMISSIONER MADDEN: The state then having roles which vary between different states, then obviously there's a whole asset scale - - -

DR JENSEN: Okay.

COMMISSIONER MADDEN: - - - long term watering plan, where there's another level again. So it really is that integration.

DR JENSEN: It is.

COMMISSIONER MADDEN: So just wondering what role the state in South Australia plays if native veg mapping is – for example, you said is missing.

DR JENSEN: No what it is, is there's no monitoring in the Basin evaluation of vegetation condition in South Australia. So that's the Basin scale monitoring. There are some individual sites that the state government has done work on and there has been some limited monitoring done at those, but it's not at a scale that could be broadened out to the rest of the river in South Australia. The Commonwealth Environment Water Holder has a black box management framework they've set up, where they've say these are the sorts of methodologies and the different areas we want to use, but so far what I've been doing on vegetation condition doesn't fit in that, and it's a long way off delivering the stories back from that.

They've used a case study at Calperum in South Australia, but my concern is that reading what was available did not tell the story, is not giving us any material to take back to communities. It's very small scale but what I can do is say to people I've monitored these ten sites for three years and here's the pictures, here's the stories about it, and those sorts of stories need to be out to the Basin communities. So I'm sure you could find someone like me everywhere through the Basin, but there's not a role for us at this point. I don't know that we're necessarily the best ones but there's kind of nothing between us and the Basin scale at the moment.

COMMISSIONER MADDEN: Yes.

COMMISSIONER DOOLAN: Yes, okay.

COMMISSIONER MADDEN: I'm not trying to ask you to design the whole thing for us.

DR JENSEN: No.

COMMISSIONER MADDEN: But it would be good to get that perspective, and I guess importantly to see whether you know, because you've just mentioned the (indistinct), you've mentioned the state, you've mentioned the authority.

DR JENSEN: Yes.

COMMISSIONER MADDEN: I was just wondering where it actually comes together.

DR JENSEN: I would hope that you could have a multilayered process that allowed people to plug in. Someone like me could plug in my data and it could go to higher use. At the moment it's just sitting in our reports.

COMMISSIONER DOOLAN: Look, I have one more question which relates to climate change and the previous speaker raised it as well, and the concept of actually making sure that we're prepared and we have information to assess it. The key question is - we agree we should - information to assess it, the question though is when is it actually dealt with, because when it becomes necessary to deal with it it will be one where we - we, not us, but the Basin communities actually have to think about environmental management objectives and ones that can no longer be met. I mean if inflows drop by a third then it's a very different Basin and the existing management objectives for the environment, regardless, would not be able to be met and would have to be reviewed.

So it's really from our perspective a little bit of - absolutely necessary to keep an eye on it, make sure the information is being collected but when do you think that call should be made to actually say well it's going to be a different Basin? Is that 2026 or is it 2036, because I think we have to acknowledge that in a whole range of places the current environmental objectives that are in the Basin environmental watering strategy, in the plan, if some of those scenarios play out as current predictions suggest, it wouldn't matter what level of water recovery came back, they could not be met.

DR JENSEN: I think this goes to the idea of transparency and one of my comments is that we actually need to spell out what we're losing. In a lot of the debates that are going on at the moment, there's no discussion about what is being lost. So inherent in our current arrangements we're going to lose the outer areas of the flood plain, which could be up to a third of the flood plains. In dry times we may have almost all the flood plain in South Australia not being watered, and I'm not sure how that translates further up in the Basin as to what areas would not be watered but we're already seeing that the Darling is running dry again for the second time in three years.

And we have new fish ecology coming out saying that the Lower Darling is critical to all native Basin fish species. They all spend at least part of their life cycle in that part of the Basin. So if the Lower Darling runs dry there's a cost for everybody. It's not just an argument within New South Wales. So I think we have to have a report card on the costs out there, and I would like to see some new scenarios introduced for at least discussion where someone does the modelling of what does the Basin look like if we do go down by a third in flows, and start preparing people for it.

COMMISSIONER DOOLAN: I mean people do, you know, say - - -

DR JENSEN: Yes.

COMMISSIONER DOOLAN: - - - take climate change into account, but as you know when you think about well what does that really, really mean, there's some quite difficult discussions to be had at that point.

DR JENSEN: Yes.

COMMISSIONER DOOLAN: And it's when do you actually need to have them.

DR JENSEN: Yes, and equally discussions to be had when we reconcile on the 605 gicalitres.

COMMISSIONER DOOLAN: Absolutely. Yes.

DR JENSEN: I'm assuming where we stand at the moment that we're going to find we haven't recovered enough water, and if we're already starting to feel a decline towards the one third less flows that will make it even harder. So we need actually better information as to what are the potential losses, as well as the potential benefits. I don't think it's been spelt out clearly enough what is the impact of going with a compromised 2750 gicalitres. What does that really mean for the environment and the way the river will look for the long term health of the trees, fish cycles, if the – if the Lower Darling runs dry again, what have we done to the fish cycles? What happened to all those cod that bred up when there were environmental flows in 2016, if it has gone dry again?

So that's where I would like to see the report card kicking in. So I guess the report card and – plus the idea of timetables and penalties for not meeting the deadlines, I think are really key elements of what - - -

COMMISSIONER DOOLAN: Yes.

DR JENSEN: Where we might go to make sure this plan can work.

COMMISSIONER DOOLAN: And we've talked about the transparency with the previous speaker as well.

DR JENSEN: Yes.

COMMISSIONER DOOLAN: Well, that's it for me. What about you?

COMMISSIONER MADDEN: I just wanted to mention over recovery. I mean we've got some comments from various people and may need to clarify a little in our report that it is after a period where the portfolio is assessed in terms of its long term take and matching SDL, and then where it's demonstrated there is over recovery addressing that issue.

COMMISSIONER DOOLAN: And where the capacity to use that, as well.

COMMISSIONER MADDEN: Yes.

COMMISSIONER DOOLAN: Yes.

COMMISSIONER MADDEN: So I take your point on portfolio. I guess the question from our perspective and those communities is, well, where do you draw the line? And what is - you know, is an SDL and SDL or not? And I guess there's other governance issues where if you can trade water and buy water and, you know, so that anything can be used for the environment, again where do you draw the line?

DR JENSEN: Well - - -

COMMISSIONER MADDEN: With the (indistinct) and others and their holdings. So we've thought about this and thought well maybe it's in a couple of per cent, you allow some leeway and things, but then I guess good governance brought us to the point, well, if you set a target, for the sake of integrity on both sides of the equation, you meet the target.

DR JENSEN: Okay, I guess I would like to see the idea of under recovery and over recovery put together, because they're both part of that same equation and as I said while it looks like on paper we've recovered the amount that's in the target, there's questions raised about whether that is real available water, which it needs to be, in order to make all the other concessions like giving away the 605 ggalitres. So I think they're both, if you make the point about governance, then both of those issues should appear.

COMMISSIONER DOOLAN: Okay. All right. Okay, well thank you, Anne. We'll take a short break now, 15 minutes, for morning tea and we'll reconvene at – what time are we reconvening?

COMMISSIONER MADDEN: We're running ahead a little.

COMMISSIONER DOOLAN: Just a little. Yes, at 11.20. Okay. Thank you.

ADJOURNED

RESUMED

COMMISSIONER DOOLAN: Okay, if we can reconvene, thank you very much. I would like to invite Ms Ann Lucas and Ms Lyndal Wilson up to the table, and if you wouldn't mind, again introduce yourself simply for the transcript. Thank you. Sit down, please.

MS LUCAS: Thank you.

COMMISSIONER DOOLAN: And the microphones are really for the reporting, so we have to speak up. They're not actually broadcasting.

MS LUCAS: Good. I'm Ann Lucas from Hindmarsh Island. I have just over 100 acres and about a kilometre facing the Coorong National Park.

UNIDENTIFIED SPEAKER: Sorry, we can't hear you.

COMMISSIONER MADDEN: There's a couple of chairs, it's only temporary, but feel free to bring your chair forward if you can't hear.

COMMISSIONER DOOLAN: Yes, there's nothing we can do. The microphones are not transmitting, and so just get closer.

COMMISSIONER MADDEN: So even another row. It doesn't matter if - this isn't a protected space.

COMMISSIONER DOOLAN: Move them up, yes. Sorry, Ann, if you continue.

MS LUCAS: That's all right. I'd like to introduce my friend, Lyndal Wilson, who lives on Hindmarsh Island and she's come for support.

I acknowledge the Aboriginal people who have been present on this land, especially along the River Murray and its estuary, and who traded up and down the rivers in the Murray-Darling Basin. I thank the Productivity Commission for this opportunity to address issues relating to the area of the Lower Murray and Darling Basin.

My submission sets out three major issues that should be taken into consideration if the Murray-Darling Basin Plan is to be effective. The subsidence of the islands and the lake system which must be accounted for before costly engineering works are undertaken.

Managing water flows events to a larger meeting of the waters to create the salt (fresh water) interactions that support healthy generation and sustainability of life in the delta, and recognition of the cultural and spiritual importance of the lower lakes in Coorong to the Aboriginal people.

I would like to emphasise the following. The degradation of the original vegetation of the islands and the lakes which was largely due to clearance of trees to fuel paddle steamers and for farming practices. The impact on native wildlife of the introduction of foxes and hares to the coursing and of deer farming with escaping deer and now cats, and the impact and presence of calves and seals on fish stocks. Seals, talking to a fisherman yesterday, are a major problem, and in Mulloway have just started spawning and are just keeping and of them at the moment.

Fishing. Barrages of altered flows of estuarine mix so bird habitat and fish stocks have been altered and our obligation to protect migratory birds, waders is under threat with the RAMSAR treaty under threat. These wetlands of international importance are vital to these migratory species' survival. Reference needs to be given to the latest updated Coorong and Lakes Alexandrina and Albert RAMSAR wetland boundary.

Sea level rise predictions should be updated due to changing weather patterns and factoring in subsidence of islands in the lake system. Dredging of them out is a very costly exercise and it appears now to be ongoing. Any new developments in the system north of the barrages that would entail diverting water in a way that would reduce flows needed to flush out salts and other matter in a seasonal manner should be considered carefully.

Prior to the barrages being put in place in the late 1930s, sea water went as far as just below Mannum, so if you see the meaning of Pompoota it's end or swell of tide. To summarise these points, hydrologists, geologists and also linguistic experts should be employed to piece together this very complex picture for ongoing sustainable development.

The article I've submitted from the Argos referring to the rye at Gawler may have been better referenced in the original writing of Rodney Cockburn's "What's in a Name" first published in 1908. The River Murray was called Berawi and the land Degulwa. Permission was given to me to use this reference by Stuart Cockburn but with acknowledgements to his father which I do.

According to Professor Diane Bell, I understand 2009, the South Australian Government recognised the cultural significance of the area known as the meeting of the waters and registered the site. This area of the lakes was referred to as the Picanniny Murray, so whether this was referring to a smaller race of people as in Queensland and noted by

Tindale, or whether this was because this area was a regenerative area of waters with its migratory birds, fish spawning, e.g. Mulloway species, in an estuarine delta is a topic that could be further investigated. Thank you.

COMMISSIONER DOOLAN: Thank you. John?

COMMISSIONER MADDEN: Yeah, I guess the one question that we had earlier on a bit of a discussion about the future of the system down here, and it's something we mentioned in terms of complementary measures with land measures and controlled pests and the like, is that something that's actively undertaken in an integrated way?

MS LUCAS: I wouldn't say it was an integrated way, no. Certainly Landcare had to do a lot of replanting because of deer that have escaped, so they tear down the plastic covers. Cats are a relatively new problem, so with the increase in development, of course, it used to be a one cat policy, but if that's one male and one female, it really hasn't worked very well. So whether we take a leaf out of Kangaroo Island and look at cat eradication in some organised way, I don't know.

COMMISSIONER DOOLAN: So I suppose following that up, there is an expectation that while the Basin Plan is mostly about providing better flow regimes, that state governments are still accountable to undertake that complementary work, and that if they don't then many of the ecological benefits that are expected to be seen from the Basin Plan would not eventuate. So is that something that you feel we're observing now, is that some of the benefits that should be coming out of the change flow regime, particularly down here at the lower end, are they being compromised by those other impacting factors?

MS LUCAS: Certainly reduced water flows, and being on a RAMSAR breeding site. I have noticed a decline in the birds, so to me it's all integrated with the fish and the birds and it's got to be a healthy system. Probably I would say it's easier sometimes to look at it as a symbolic body and then you can start getting a better handle on things, but with the barrages in place and the various weirs, the flows are not as they used to be, so.

COMMISSIONER DOOLAN: Yes, and I know this will be a difficult question, but the question we sometimes get from upstream communities, so I won't say it's frequent, but we definitely get it from the upstream communities, is actually, well, what about removal of the barrages. So what would be your reaction to that, particularly with the sea level rise, you know, not immediately, but into the future, sea level rise, questions of those sorts of - it's certainly one that is asked by upstream communities.

MS LUCAS: It's going to be a very difficult one because you've got large boating industry in there. You've got irrigation, so how you manage this with changing weather patterns I - I really can't say.

COMMISSIONER DOOLAN: Yes.

MS LUCAS: It's - but all these factors, I think, have to be taken into account because, as Professor Bob Borland's work shows that there is an uplift from the Mount Lofty Ranges and an uplift from the Mount Gambier, and then the island subsiding in the lake, so it will find its own course whatever.

COMMISSIONER DOOLAN: So then following that on, I think our first speaker talked about a potential task force, South Australian Government and local governments really looking at the future of the lower end? Is that something that you would support?

MS LUCAS: I would support that.

COMMISSIONER DOOLAN: And it's broader than water. Like, it's the whole system.

MS LUCAS: Integrated system, yes.

COMMISSIONER DOOLAN: So that is something that you think is really required here?

MS LUCAS: Yes, because the geological research in the area has been the very last thing done in South Australia here in Bolivar, so Prof Borland came and then he then started the Murray Mount documentation and so it's something that's largely been very hard, I think.

COMMISSIONER DOOLAN: So such a study could look at the past and the trajectory, but for a whole range of sea level geological subsidence, flow, it really should take a very integrated approach - - -

MS LUCAS: Yes.

COMMISSIONER DOOLAN: - - - to looking at the future of this area long term, and all of the factors that need to be thought about.

MS LUCAS: Yes, and the whole of the river system.

COMMISSIONER DOOLAN: Okay. I think we all acknowledge that that's going to be an important, but probably a very difficult thing to do, and one that needs to be tackled over a long period of time, I think.

COMMISSIONER MADDEN: Yeah, I mean, this is much wider - - -

COMMISSIONER DOOLAN: Much wider.

COMMISSIONER MADDEN: - - - than the Basin Plan because it's a state-based issue first and foremost, and a number of different elements coming in. I guess my only comment there is that we're about to see a huge management change with the water and the resetting under the Basin Plan. So in a sense that takes time to bed down in terms of,

because it will be a change for the system down here. I assume it's quite - very likely and very probable that it'd be much for the better, but then there's other actions that would take place in terms of complementary works which we do mention in our report that this comes from the Marron Lakes right down on all the different assets that are actually, we're trying to use and improve with additional water, but actually all those locations need local experience and knowledge brought to bear on other activities that can underpin that and enhance it. Thank you.

COMMISSIONER DOOLAN: Well, thank you very much.

MS LUCAS: Thank you.

COMMISSIONER DOOLAN: All right. Our next participant is Paul Harvey. So Paul, if you again wouldn't mind introducing yourself for the transcript.

MR HARVEY: Thank you. My name's Paul Harvey. I'm a retired water resources manager, particularly in relation to the Lower Murray. Firstly I'd like to congratulate the Commissioners on their draft report and I strongly support their findings and recommendations. There are a few areas where I think there could be an expansion and on the recommendations, and I suppose particularly in relation to the supply measures and toolkit, the efficiency measures and in terms of climate change.

In terms of the supply measures, there's almost a total lack of knowledge across the community of what these projects are, and how they will deliver savings, and as a consequence there's a lack of confidence that these projects will actually deliver true savings, particularly I suppose the suite of projects that is of most, for the few that actually do have some knowledge of what's proposed, the suite of projects that probably causes greatest concern are those relating to the operation of Menindee Lakes and the use of the so-called evaporative savings that that could develop or generate as part of the offset.

We really do need a much more open approach by the states and I would also contend, and would hope that the Commission could see fit to include recommendations in relation to realistic and effective community involvement and engagement in the development and operation of these, or implementation of these projects, and that needs to start, or should have started a long time ago but it needs to start immediately so that the community can be brought along the journey of the developing of these projects.

I think in terms of the efficiency measures, again there's a lack of knowledge and understanding of what this would actually entail, and therefore a lack of confidence that these savings will be delivered. I don't know of many people who are confident that that 450 GL is going to be delivered, and again, I think it really does need realistic and effective community engagement in the development and implementation of those projects. It's the only way that you're actually going to generate community support and backing for these sorts of projects by ensuring that your community is informed so that they can debate and have an informed debate on the pros and cons of the various proposals.

In terms of water resource planning, I suppose to me there's a real need to ensure that the proposed extension of time, which I fully support, is not used as an excuse for delaying or even abandoning the commitment to developing those water resource plans, and I'll come back to that in a minute. Well, in fact I'll deal with it now.

I think that there's, with a number of these recommendations there's really a need to provide some mechanism for penalties for not implementing key elements of the Basin Plan and complementary measures within agreed timeframes. It's not that this sort of thing hasn't been tried before. It is a specific example with the withholding of competition payments as a means of encouraging the states to implement the first interstate permanent water trading process which was very effective, the states jumped to very quickly when significant sums of competition payments were being withheld, and I think that there's need to have a bottom line to some of these recommendations for extensions of time and that sort of thing.

The other couple of issues which I would like to touch on in particular is climate change, and I see it perhaps from a slightly different angle to some of that which has already been discussed. Climate change and the rise in sea level is already having a significant impact on the operation of the lower lakes. Over the last 20 years or so we've already seen a measureable increase in sea level and therefore the downstream level of water at the barrages, and that's making it more and more difficult to actually operate and deliver the sorts of environmental outcomes that are required or that could be generated from the environment flows.

As it stands at the moment, particularly with the old technology that operates at particularly Gawler Barrage, a very conservative approach is taken to ensure that we don't finish up with major sea water incursions when you have a storm event coming which finishes up with the barrages being closed for several days at a time to prevent that sea water incursion. If that happens to be over a weekend the operation is extended, or the closure is extended because of the lack of personnel available at that time, and it's an issue which is of significance now rather than into the future.

I know there was an attempt to include the barrages as one of the constraints for the constraint strategy, and they were specifically excluded, but they really are a constraint to the operation of the lakes and that constraint is increasing as the sea level rise continues.

I would also just like to make one quick comment about the suggestion that was mentioned previously about removal of the barrages. I think one issue which needs to be recognised there is that the barrages weir pool extends all the way up to lock 1 at Blanchetown, and includes the major offtakes for urban supplies to Adelaide and to the upper south-east, and as a consequence there is a need to be able to ensure that that water within that weir pool, the whole of that weir pool, is maintained at a level that is appropriate for public water supplies, and it would not be possible with removal of the barrages without there being some other major element included in the operation of that system. I'll leave it there.

COMMISSIONER DOOLAN: Okay. Thank you.

COMMISSIONER MADDEN: I might just start specifically on the barrages and you were talking about the implications, you know, of them being closed for long periods, again for the sake of knowledge, what are those implications? You know, what are the actual issues in the short term that you're talking about with the barrages not operating efficiently?

MR HARVEY: Well, by - with the rising sea level and the fact that we're dealing with an unbelievably flat, entire river basin, it means the normal operating level of the lower lakes is something around about 0.75 metres AHD. That during winter nowadays is about 0.55 metres above mean sea level during, well, that's not taking into account the tides. It is not uncommon to have a tide on the downstream side of the barrage well in excess of 1 metre, and of course if the barrages are open that means that you will have reverse flow-through from the sea to the lower lakes. There have been a number of instances where that has occurred or during major storm events. You've even had overtopping of the barrages with the tide and wind surge, and that has resulted in issues in relation to the salinity of the water in the lakes.

Now, I would strongly support the proposals that have been talked about this morning of a significant investigation into the operation of this whole area, and it is an urgent - there is an urgent need because it is becoming more and more difficult to actually operate and to deliver those environmental outcomes with the increased flows that are coming. To be able to deliver those flows to, in a way that benefits to the greatest extent the Coorong and the Murray Mouth is becoming more and more difficult and is certainly constrained by the barrages as they stand at the moment.

COMMISSIONER DOOLAN: I mean, it is a really critical, albeit difficult, conversation to have.

COMMISSIONER MADDEN: Yes.

COMMISSIONER DOOLAN: But you're saying really, I suppose I didn't quite realise that it was already constraining operation to the extent that you've indicated. Yes. Okay. And therefore by constraining the operation, very much limiting some of those environment outcomes that people are expecting to see from the plan, which is not the fault of the plan.

COMMISSIONER MADDEN: No, that's right.

COMMISSIONER DOOLAN: It's a series of circumstances. Okay. That's actually very important to know. So thank you for that, Paul, and certainly your expertise and knowledge of the operation of this system is unparalleled at this end, so, can I come back to some earlier work which was both the supply and efficiency measures, and you talked about the importance of realistic and effective community engagement, and we have heard that everywhere. We have heard that from all communities, so then it comes to us is, well, it's very clear that that has not been the case. You know, there's been no

transparency. Business cases only released a couple of months ago, but moving forward, what would you want to see, what would you define as meaningful and realistic communication? What sort of standard, what elements do we need to make sure is put in place that actually the next phase, even if people have concerns and they might not agree, but there is adequate community consultation?

MR HARVEY I think we already have a number of community groups that are involved in looking at management and operation of the lakes and Coorong, and I think I would like to see that some of the leaders within those community groups are directly engaged in the processes of the development and implementation of these projects so that we can utilise the existing networks to disseminate that sort of information and to gradually inform the community so that, as I say, we can have an informed debate about the projects as the details are developed. It's very difficult to have that informed debate when communities has no information and no understanding of what the projects are all about.

COMMISSIONER MADDEN: Just to tease that out a little, let's take the Menindee project, because obviously the proponent is the New South Wales government. What expectations do South Australia have and how do they actually have meaningful engagement in a project upstream which actually affects them? I can understand if there's a project, you know, in your local system, but unfortunately as we know the river is connected, so the projects in Menindee have impacts wider than Menindee, and I get the feeling that when we say meaningful engagement, the proponents think with the local community, i.e. within 100 kilometres, or out there probably 300 kilometres, of the project, not along the whole system. So I'm just trying to tease out what's the expectation of the whole package and how do you actually get communication and not just a series of projects.

MR HARVEY: Well, I think, as I said, I think the way of having that or getting that engagement is to utilise the existing community groups as a mechanism for disseminating that network of people that are already engaged and have a basic understanding of the operation of the river and lakes at least in their own specific area, and I think if sort of community leaders from those groups are directly engaged, whether it's on a working group or some sort of communication group, I think it's horses for courses. But certainly a project like Menindee Project is going to impact on South Australia significantly.

The changes in operation of Menindee Lakes will impact on particularly, whilst the Darling may only generate something like 16 per cent of the total flow to South Australia, that 16 per cent punches well above its weight in terms of environment outcomes because the vast majority of that water comes in high flow periods that is very significant for the wetlands in South Australia, so we have a - South Australia has a strong vested interest in the operation and management of somewhere like Menindee Lakes and the changes that that will impact on flows to South Australia, and I think unless we actually start to get South Australian communities engaged in the process of the development of that, there's always going to be antagonism and negativity towards those projects, and we've seen in the past, you know, that can play a significant role in whether or not projects like that are successful, or get up.

COMMISSIONER MADDEN: So just to follow on on that, sorry, so the current arrangements, if we just look at next year, and we don't know the details of those, we've made some recommendations that they need to be in place and people aware of what they are, I guess is the obvious focus of governance is how the states and the state departments interact and look at that package of projects.

What we haven't considered is the expectations on the states of how to engage people in their local communities in that wider assessment of the package, you know, so we basically say, states will look and should understand Menindee as a project group, but we haven't talked at all about them, you know, how do they actually - what information does their communities, and what expectation do they put on, so South Australia, and you talk about the impact of flows in high periods. If there's less water stored in Menindee, you know, on average because of releases, that will have an impact, but the question is then the onus on who to bring that back to the communities. So that is right just residing with the states or is that something that the departments through the authority should kind of address. Just wondering where it's home and that obligation, where does it rest in your view?

MR HARVEY: Well, I think to date the states haven't shown any leadership in terms of implementing good engagement processes, and I think perhaps it's a situation where they will need to be led into that process at least, if not directed in it, so I would see a role for the Commonwealth Department or the authority to insist on the states implementing that effective engagement.

COMMISSIONER MADDEN: I wanted to follow on too, because I think we have concentrated actually, like, the level of engagement's been extremely poor, and so the immediately affected communities is where we've thought about, but one of our recommendations was actually to look at that whole suite of supply projects as an integrated package because their operation is integrated, and how they'll be integrated back into the running of the river is really important, and potentially how they deal with their Indigenous communities across the whole lot, but I think the point you've raised is, or a point that you've raised that's ticked off something in my head is that actually there's - that could also lead to better engagement at the communities who are absolutely involved in a project, but the communities who are further away who had interest in that project.

So they still need to understand it and need to understand that their concerns are either being met or their interests are not being compromised, and that's really probably an additional point for the planning of that integrated program that we've not captured as well as we could in the draft report, and it probably also goes to your point about the efficiency projects. Obviously the concerns in upstream states is about the socio-economic impacts taking more water out of their communities, and Wednesday we'll be in Shepparton, and we know full well that, you know, that will be their complete concern, and so they want to know and be involved in development of those projects, but you guys are signalling from here, again you might not be inextricably involved, but you need to be assured of what's happening as well and have a means of understanding it. I think we had a morning tea conversation about the myths and legends that actually evolve when

information is not around and generally communities always seek a worst case scenario for themselves in that process.

So we could potentially flesh that out a little more in terms of the immediacy of the communities involved, but the ones that are upstream or downstream having an understanding at least, and at least comes into the running of that integrated program, I think.

COMMISSIONER DOOLAN: Okay. Thank you. So we've had a conversation of the climate change and the standards of communication of community. Is there anything else. You mentioned toolkit. Do you want to actually talk about the toolkit?

MR HARVEY: Only that again I think it's one of these things that there's very little community understanding of what it actually is, what it means, and as a consequence there's little recognition of the progress that has been made and I believe there has been significant progress made, but that there will probably need to be, or there needs to be a mechanism which keeps the pressure on, and I think it's predominantly in New South Wales in terms of making sure that the full program of the toolkit measures is implemented and continues to be implemented and not just as a once-off trial as we've seen so far, and again, it's - and I recognise it's even more difficult for the toolkit measures rather than the - as they're not part of the Basin Plan directly, but there probably needs to be some mechanism to, should I say, encourage the states to implement those toolkit measures.

COMMISSIONER MADDEN: I've probably got a bit of a general question and you can feel free to ignore it. A number of things we've mentioned today are about transparency, so we've had reporting earlier on about assurance, about knowledge of supply projects. Given that we've got some history in the water industry, that lack of transparency, I think's, come in over the last five years and manifested itself and created a number of problems. You haven't touched on our governance recommendations which do try to address some of that. Do you think that is a structural thing or is it cultural? I'm just wondering in the very short term. Obviously we've made a strong call for transparency in processes. I'm just wondering whether there's any, with your knowledge, any history, whether you think there's anything in that relationship between the states, even in the short run that would encourage that?

MR HARVEY: I wish I could say that I thought there was. I just don't think - to be honest, I don't believe that it's structural or, but rather political to a very large degree, whereby senior executives within agencies these days are sort of rotated on a fairly regular basis, and we don't see the depth of knowledge and understanding at the business of the - of operational agencies, particularly in this case water agencies, that we had in the past, and I think that's led to some fairly limited decisions that perhaps would have been - in the past would have had better knowledge behind them in making those decisions, but I can't see in the short-term to me anyway, I can't really see any mechanism to change that situation, and I think it's something we're going to have to live with, and I think that comes - that emphasises one of the points I was making in that we need an informed debate, and to better inform the community is the more that the community is going to be

able to challenge an question those decisions which is one way of making sure that those things are a little better considered.

COMMISSIONER DOOLAN: I think we certainly take your point about capability in all of the organisations that actually manage the Basin and it's an area again we've touched on.

MR HARVEY: Yes, and we do see a mix. I think the environmental watering side have said in our report that it is a developing centre of knowledge but there seems to be good processes in place and a focus on that, and knowledge capture and the like, so you can see, you know, you can see the light at the end of the tunnel, or the water trickling out of the pipe.

COMMISSIONER DOOLAN: It's promising.

COMMISSIONER MADDEN: I'd support that and I think that there's mechanisms here of, you know, the consultation on the annual environmental watering plant, et cetera, is a good example of how it can be done and how you can utilise the expertise and knowledge in the community through the existing community groups.

MR HARVEY: So I think some of our recommendations and your comments around that transparency and getting people's input into those kind of learning process can be implied in the short, and by short term I mean five years, for things like supply projects, because it is a new - a lot of them are new. A lot of them are, not abstract, but they're new. We haven't done them before. Some of the Living Murray infrastructure works, yes, and there are lessons to be learnt that should be brought to bear.

COMMISSIONER DOOLAN: Definitely lessons, yes.

MR HARVEY: So it's almost a similar ethos and approach that has to turn quickly to these type of projects.

COMMISSIONER DOOLAN: Okay. Is that it for you?

MR HARVEY: Yes.

COMMISSIONER DOOLAN: That's it for me. So thank you very much, Paul.

MR HARVEY: Thanks.

COMMISSIONER DOOLAN: Our next participant is Mr Bob Newman. So Bob, again, if you would just introduce yourself for the transcript, please.

MR NEWMAN: Thanks. My name is Bob Newman. I'm an engineer, or a retired engineer these days, fair focus on hydrology. Had experience with state agencies, the Murray-Darling Basin arrangements and private consulting. I was involved in project managing some of the Murray projects some years ago and that led to me being involved

in heavy community consultation to environmental assessment processes which led to a life-changing perception and meeting a lot of the likes of people who are here today, so I moved to Berri. Got heavily involved in the community side of things as a state agency rep and began to appreciate the values of the river corridor. Prior to that I was an ivory tower engineer and we just sort of pushed projects and realised that we probably had sometimes the wrong answer to the wrong question.

So with that said, and I'd like to thank the scientific expedition group. I did put an explanation of that in my reference. They strongly supported my coming here and getting involved, as did the ACF through the healthy rivers program. I'd like to congratulate the Productivity Commission on a very robust report and strong language and getting down to the nitty gritty and detail of some of the issues that have kept arising, and listening to this morning. It makes me think, why do we have a Murray-Darling Basin Plan in the first place. We have it because communities got off their bum and got involved in demonstrating the degradation that was happening before their very eyes, and that was something I was not aware of, being based in Adelaide, but when you get into the region and you deal with the communities and the life-long experiences, and they're not long experiences. We're talking about 20 to 40 years of seeing the flood plain die in front of their townships and properties, and those voices created the need for the Living Murray and ultimately the Basin Plan.

And so I sort of feel that those voices are getting a little lost now, and the information, if you like, that came from the data of those observations is also being lost and Ann pushed that quite strongly in terms of her local knowledge of what's happening. So with that said, the Productivity Commission has made some pretty strong recommendations on some brave findings in relation to governance and leadership. That's coming across strongly, the idea of separating the roles within, say, the Murray-Darling Basin authority, and also I might make the suggestion that the funding agreement should be robust enough to effectively hold the Basin governments to account.

In terms of program design and delivery, I'm using your headings here, and the timelines and dates that gets associated with that, you stated that the supply measures timelines are unrealistic and the cost of failure and the need for consequent offsets is a high risk. Actually, I doubt that it is as high risk as you might say because I suspect that the measures have been under-costed and the idea of buying real water is probably the cheapest way to go. That's not - I don't have evidence for that, just a suspicion. Similarly, with the efficiency measures and easing of the constraints, I think they're likely to, or you've stated, and I think they're unlikely to facilitate meeting of the environmental targets, and certainly not in the right timeframes.

The notion of continuous improvement with adequate monitoring and reporting and evaluation, and you might note I've turned your order around on those, and I would add to that, responding and adjusting to the findings of monitoring and evaluation. It's really important to have a process whereby you just don't monitor and evaluate and sort of, it all looks good, because you add it up as a whole. You really need to bring out the, highlight the deficiencies and Ann's emphasised that.

Overall in the report, excellent report and really thorough piece of work, but it gets lost in the complexity of the findings and the complexity of the recommendations, and I do support some of the submissions that I've seen which look to aggregate things up. You've done that a little in your timeframes, in the order of priorities, that does aggregate things a bit, but I think getting a message back to governments and getting the ability of them to respond by really highlighting the important, urgent elements, and they're in there in the report. They don't leap out at you.

The one that does, you look at the first finding, the first recommendation, and it talks about under, what's the terminology, underachievement of the buy backs, and to me that was a, I'm stumbling for words here, sorry, that immediately put me a little offside to say, "Well, hang on, that's not the most deficient that we've got that we haven't bought enough water. We really don't have enough real water in the whole system. Anyway, that's a bit of a pedantic thing.

Issues that arise out of all of that, and it comes back to the way the Basin Plan was messaged in the first place, and you know, 3200 gigalitres, or 2750, all those numbers that were mooted around 2010/2011, and it eventually got rolled into the legal document for the Basin Plan. I think a number of us were somewhat surprised when the fine print came back to bite us and we realised that there was never going to be 3200, there was never going to be 2750, and we're talking about 2000 gigalitres a year of real water.

As a hydrologist, coming back to that issue, converting ecological targets into hydrological targets was perhaps a necessary simplification, but then to diminish those by having targets at particular locations at the South Australian border which, if the flow had been there, it would have been of benefit for the whole of the River Murray corridor. From Swan Hill all the way through we would have had 3000 gigalitres of water passing through the system and that would allow the flood plains to get watered throughout the system to some degree.

Now, as we diminish that, and we come back to 2000, and everything becomes back into the channel and the adjacent flood plain vegetation doesn't get a watering, and no amount of complementary measures really will assist that, so we really lose the essence of the plan by having these adjustment factors and efficiency factors that are all about not playing the main game. So where to go from there.

I want to mention water management plans. I think there's so little been done on those, there's so little consultation, it can only be effectively introduced with adequate consultation that we are going to lose the plot on those. We are going to miss achieving the right outcomes, and what will happen, no doubt, is a rather poor plan that goes through a process of so-called consultation essentially through attrition where you don't achieve the right ownership of those plans.

At a technical level within those plans, I have been quite involved in hydrologic modelling over decades, I'm somewhat suspicious of the confidence in the modelling, in particular in the upstream tributary models in the lower Murray because we built (indistinct) and human and we managed the river system of 100 years, we have incredible

information, and the models are very well validated, but as you go further upstream the data was never there to generate the models in the first place. The models are almost fictitious in a sense, there is so little data that - whereas we might have a million data points to validate the lower Murray system, we might have a few hundred in the upper river, and so to try to pretend that we can achieve all of these outcomes through hydrology is a bit of a misnomer in my view, so a little bit strong, but I'm sure the model has made a good effort to try and replicate the system over 140 years. That's a big ask when you don't have data for the first 40 years, so, except for anecdotal events and floods and the like.

And that leads me to the review of the models, and I've had quite a strong involvement with the review of models, and I'm somewhat sceptical that the process is often incestuous that we're talking about, because it's such a technical thing, you have to talk to people and have reviews done by people who intimately know the system, but there needs to be some pathway to get a little bit more impartial view, and I'm conscious of the work of the Wentworth Group in emphasising that need for increased impartiality. So within an organisation such as the Murray-Darling Basin Authority, there needs to be - I think it has been mentioned here already, that the top down approach has become a little overly political. There's been a sort of don't rock the boat attitude at the lower technical levels, and we've probably not got the level of impartiality and scrutiny and in particular emphasis on confidence and uncertainty. Those things, we appear to be more certain than we ever should have been. Yes, so a lot that's been said today that I totally agree with, so I won't dwell on those.

Just quickly noting on the supply and efficiency projects that meeting somewhat arbitrary ecological targets, surrogated by hydrological targets, without actually bringing in real water, you know, we're losing 1000 gigalitres of possible recovery, it sort of has a sense of smoke and mirrors to me, that we're being hoodwinked by this notion that we can achieve these ecological outcomes with efficiency measures way upstream. The Menindee Lakes example is a classic. I mean, how will that meet the ecological targets of the lower Darling, how will it meet the - I'm not an expert in ecology of the river system, but to me it is a whole system, and we divided it up. Probably the Living Murray using the icon site started that pattern, and then we've pursued that further by having these sort of icon locations and meeting particular hydrologic regimes which don't really result in ecological outcomes, particularly for the corridor between, let's say, Mildura and Wentworth and Wellington, it's really not part of the plan in any effective way.

Going perhaps beyond 2024, I talked about the targets being somewhat inadequate for the whole of system basin plan and from what you have been finding out we're probably not going to meet them anyway. I mentioned the lower Murray flood plains not being covered, so there's been a bit of emphasis here today on climate change and the implications. I think bringing in, you know, rather than waiting until 2026 or some other date, deferring everything, climate change is biting us hard already and Paul's emphasised that, so I think we really need to get on board those issues. I understand that the basin put climate change in the outer and it was not part of, and I agree that the issue that was urgent when the Basin Plan was signed up was over-allocation and overuse, and poor

management of the system at the time but the ecological decline is continuing and being aggravated by climate change.

So how would we communicate that in an effective way as we've been trying to get to today? We need to understand what level of protection we're trying to achieve. I don't think that's - well, a lot of people think the Basin Plan is going to bring the environment back to pre-European conditions. Well, that's a nonsense. But what are we talking about? Is it 70 per cent of the pre-existing European health or is it 20 per cent? Are we arresting the further decline or are we actually making some recovery in the environmental health, ecological health has assisted. I'll leave it at that as a statement, thanks.

COMMISSIONER DOOLAN: I'll follow on from that because I actually think the discussion that we've had with I think Ann and then again with Paul is exactly that. I mean, the Basin Plan is not going to be able to compensate for the worst case climate change predictions that we're hearing now, and an adjustment won't do it either, so it will be about understanding what the likely outcome is and what, from there, so that's really important. How do you go about exposing that debate? Well, it's not even a debate, but that information, in the currently charged environment that we have where people are concerned about getting the Basin Plan to its completion at least. So it is a little bit about, you know, your advice or your thoughts on when and how does that happen when we've got, you know, three-quarters of the water, but the next five years and the next phase as we've pointed out is complex, and it's difficult and people do need the commitment to complete it. So any thoughts?

MR NEWMAN: It's a philosophical question and it's a challenge because if you just put the timelines out to allow more time for consultation, that can well become an opportunity to further dilute the plan and to not meet targets and the like and it doesn't have a penalty, so right now the idea of a penalty at 2024, it's this next five years of effort doesn't achieve, is that somehow or other we've got to go and acquire more water. That, to me, is a preferable solution. I'd rather decide to do that today and admit that some of these things are not going to achieve, particularly as you've mentioned in an integrative way, I use terms like smoke and mirrors, it just doesn't add up to me, and I've tried to understand the complexity of it and I'm starting from a reasonable knowledge base but it's tough. I mean, when you're a bit out of the game for ten years, it's really hard to get your head back around this. We all relaxed.

All of those who were - had petitioned so hard, and I'm talking about many other people because I was kind of in the system back then, and so the community petitioned so hard to get the environmental issues on the agenda and all about the Living Murray, and actually I think it originated in the work that I got involved with on the charter flood plain back in the early 80s, recognising the need for putting water on the flood plain and protecting at least some large - some percentage of the flood plain system and you know, as an ivory tower person, I had completely ignored that, and I get the feeling we're into ivory towers right now with Federal government departments trying to resolve this and not listening to communities.

So am I getting to answer your question? I think I'm reminded of my time working in the Murray-Darling Basin Commission under a very effective leader at that time, who spent a lot of his own time outside of the office and encouraged all of the staff, because you know if you were sitting in the office, he'd come around and say, "What are you doing here? The real world's out there. Get out there and spruik your project", or whatever you were working on.

As we evolved into a Federal agency, the doors were closed, nobody could look in. It was really hard to - nobody was coming out, so I mean, everybody, all your recommendations suggest that we - you've just got to get the process, got to get the engagement back linked in, and that takes time to build the knowledge base and to - we've lost that time. We've lost that momentum and - and I don't know if I've answered your question, but.

COMMISSIONER DOOLAN: It's a difficult question, so that's fine. In terms of, though, losing that time, once again I think we've said as a general principle for us it's important, if it's an important project or a water resource plan, if you've got to actually extend the timeframe to have a good outcome then that's how, you know, we would recommend that you do that, clearly with checks and balances in place. So with the supply projects we've suggested a gateway project; once we've got detailed design, to go through it. Is it still operating the way people thought; and you could use that to set key milestones for credible timeframes independently validated, and then ultimately if those milestones failed, again move in to make good and water recovery. So you've talked about the urgency, but do you agree with our thrust that, look, if it's important extend it, but checks and balances.

MR NEWMAN: Yes, I wasn't sure how to respond to that one as I worked through the report. I certainly think you need to make the time to do the job right. I guess where I came at it from was the momentum behind the money expenditure and we're so far through the budget and they are kind of, you know, in a sense the early part of the program was spending money faster than - almost not worrying too much about the cost of effectiveness of each of the actions and you hear stories of some very high prices paid for water, and some very poor returns on investment from the point of view of ecological water recovery, so you hear those issues. So I would be sympathetic to the groups that are mentioned, put a pause on money expenditure to allow the budget to go beyond, to be extended to your extended timeframes. Otherwise money will suddenly dry up.

COMMISSIONER DOOLAN: Yes, for sure.

MR NEWMAN: So maybe that's the answer to that.

COMMISSIONER DOOLAN: Okay.

COMMISSIONER MADDEN: Just a question given we've got a hydrologist, and you mention the modelling, so obviously the modelling is quite complex. We've been told, you know, it runs in terms of the equivalence package and all this could take a couple of months and things like that, but just wondering if you - CSIRO was involved in that

environmental equivalence so there was some impartiality there to some commentary then on that, but then also just the modelling and the thing about Schedule 5 outcomes and under the new supply package what is the constraint lifting going to achieve in terms of Schedule 5 outcomes. So to cover key questions like that which, given your technical expertise, how could they improve transparency again in process and how they do things in that sphere.

MR NEWTON: Yeah, modelling is particularly difficult to go to a public meeting and talk about there.

COMMISSIONER MADDEN: Yes, I understand.

MR NEWMAN: And what you've actually done and what it means, and what assumptions and simplifications we necessarily had to make. So - and you mentioned the impartial component with CSIRO being involved. Just on the grapevine, I'm finding that there is a lot of time pressure that kind of reduced the impartiality to a degree. I'm not sure where to go with that bit of conversation, but - - -

COMMISSIONER MADDEN: I'm very much looking at how to improve the processes.

MR NEWMAN: Yeah, that's right. So trying just to go out there, I've actually been involved in going out there and explaining frequencies and the like, and when the Living Murray came out there was quite good communication of the natural regime at various locations. It was well illustrated and we were able to look at the seasonality of flow patterns and the like. Because it was the Living Murray was actually look at water levels. We don't see that too much in the upstream tributary models. It's very difficult for them to do that, so once again I suppose it's a matter of making time and perhaps having a hierarchy of engagement processes so that, we've talked here about the involvement of local groups for any changes that are local to them so they can understand.

Often flow is used as a surrogate for level and that is - it's been a bane of my life for much of my time and we've talked about the interfacing ground water and surface water and flushing salt out of the flood plain. All of those processes need quite intricate understanding, but if you take up the challenge to what are the real questions, I've actually come at this a lot from a salinity point of view, and I do question the salinity target. It was a simplistic add-on to a really good water quality strategy with frequencies of salinity concentrations and I'd always remind people that that target is an average over a period. It's monitored over 25 years so a lot of people talk about ten years, but it's not a load in a year. It's the nature of our hydrology. Have I got anywhere near what you're talking about?

COMMISSIONER MADDEN: I'm particularly, I guess, interested in the supply package and constraints that are - - -

MR NEWMAN: Yeah, look, I haven't - - -

COMMISSIONER MADDEN: And how you actually again bring community along in a technical sphere, it's actually really complicated so.

MR NEWTON: Yeah, that's right.

COMMISSIONER MADDEN: So we talked a little bit about impartiality.

MR NEWTON: Yeah, and I think also just having that hierarchy of consultation processes, so at least some credible person independent in a community can get their head around - the life-changing thing for me was getting involved in the Chowilla regime with a community group that was set up by the old Murray-Darling Basin Commission that met for two years for one or two days a month, working through 40 or 50 technical questions, and it was just life-changing for me to hear all these different views about what the river was about, and then for me as a hydrologist to come back and say, "Well, if we did this, then that would happen". It took time, and it took intensive involvement of individuals in the community, and they hung in there and ultimately we came out with the project that we were supposed to be promoting has been dismissed, and a multitude of other projects came out of it and I actually believe the Living Murray came out of it, but.

COMMISSIONER MADDEN: Yes, right. Thank you.

COMMISSIONER DOOLAN: Yeah, I think that's it for me too, so.

COMMISSIONER MADDEN: All right. Thank you.

COMMISSIONER DOOLAN: Thank you very much, Bob.

MR NEWMAN: One last statement - - -

COMMISSIONER DOOLAN: Of course.

MR NEWMAN: - - - to a question which goes to the barrages which is not an expertise of mine at all, but the barrages have kept the lakes fresh and it's really important to emphasise that, whilst it was a natural estuary, it was a freshwater estuary, and I think there's good scientific evidence, I'm not involved in it, you might get it from other people, to say that - to change the lakes to a more saline environment, with the reduction in flows that we now have inevitably would be, it's a really important thing to take note of.

COMMISSIONER DOOLAN: Sure. Okay. Well, our last participant before a break for lunch is Elizabeth Tregenza from the River Lakes and Coorong Action Group, and again, Elizabeth, if you could introduce yourself for the record, please.

MS TREGENZA: I shall. And may I first ask if anyone from the River Lakes and Coorong Action Group Committee would like to come up and sit, you don't need to support me now. I'm very happy if you would like to come and - no? Okay. There are lots of committee members in the audience which is fantastic.

I'd like to acknowledge that we meet on Ngarrindjeri land. My name's Elizabeth Tregenza. I'm the Secretary of the River Lakes and Coorong Action Group in which I have been a participating member since 2005 or 6, and there are others here who have been members for longer. Thank you for your report. Thank you for the opportunity to make a further submission to the Productivity Commission.

I guess, and may I say that I think people far more knowledgeable than I have made some exceptionally good points which are widely supported by the community around River Lakes and Coorong under Lower River Lakes and Coorong, and I would like to just go back to the basic premise of your report to start with. There are so many points that one could make in this complex situation, and I agree you'd done an exceptional job of putting together a very complex report.

In looking, and I acknowledge also that the terms of reference were actually quite prescriptive. I used to work as a consultant for some 20 years in my life, and if I was doing reviews and reports I would try to take as wide a ranging analysis of whatever the issue was and then pull out the details.

So in looking at your report, I looked at your terms of reference and I looked at the progress to meeting - I looked at the - sorry, the legal requirements of the Basin Plan, so the aims are right up front, the little series of dot points that says this is what the Basin Plan is all about, and I note that your report, I think, discusses seven out of eight of those, but it doesn't discuss the most important one which is nowhere in that report is there an assessment of how far five years in the Murray-Darling Basin Plan has gone in achieving progress against relevant international agreements.

So nowhere do you discuss the basis of the Water Act or the importance of restoring the river and the wetlands to health. You will recall when the Water Act was passed, John Howard, in a bit of fancy footwork to get it around the states, called on Australia's international agreements as the basis to finally push the Water Act over the line, and nowhere in your report could I find a recommendation for achieving the first objective which is giving effect to relevant international agreements including the biodiversity convention and the RAMSAR convention to the extent they relate to the use and management of Basin water resources.

And I mentioned Kildare and Williams who in 2011 concluded that while some social and economic factors can be taken into account, they cannot be given such weight as would prejudice the faithful implementation of the international environmental conventions upon which the validity of the Act depends, and I think that they're fairly strong words.

Second point, sorry, that was a bit long-winded, but I feel quite strongly about that. Second point is the timeframe. While accepting and largely supporting the level of review, structural and administrative change recommended in your report in order to meet the challenges of the next five years, we're concerned that this should happen with a degree of urgency given the state of the system and the forecast of increased drying periods, and I share Dr Jenson's concern about significant under-recovery in drying times,

and I also note, not just tongue-in-cheek, that governments have shown themselves very capable of moving quickly in the case of the Wentworth Pipeline and in the case of the buy-back of Tandou Station. So I think in the eyes of the general public there is room for improvement.

Another basic point, I think, is that we cannot overstate the importance of returning the full 3,200 gigalitres to the system which is what the communities believed they were going to get. They believed they were going to get 3,200 gigalitres of real water, and they thought they were going to get a sort of reserve bank for water. They wanted the Murray-Darling Basin Authority to be like a reserve bank for water which supports your recommendation to split off part of the Authority into a statutory body which is excellent, but it also underlines, I think, the degree to which the plan has fallen short so far.

We understand that the Australian Government has an obligation to recover the volume of water mandated under the Basin Plan, a legal obligation, by mid-2019, and that it also has the legal powers to recover the balance of this volume if the Basin state decides to walk away from the plan, and in this context we would like to strongly support lifting the cap on buy-backs and lifting the 1500 gigalitre cap on buy-backs. Restoring buy-back is a means of achieving the 450 gigalitres would relieve both budget and time pressures on water recovery. We note also that the constraints packages are now - constraints projects are now an essential part of the 605 gigalitre offset package, and they are an extremely important part of the plan which need to be developed fully and should not be consigned to the too hard basket.

This is a relatively minor point, but over-recovery, the term “over-recovery”, because while I recognise that it’s evolved from the SDLs and the concept that you could over-recover against SDLs, the way it sits in the report is quite - if you’re not aware of that, is somewhat confusing and people think, given that we already compromised so much on the amount of water to be recovered for the environment, how can anybody talk about over-recovery, so perhaps that needs a little more explanation.

I think they’re the main points. I mean, I’ve made many points, but I don’t know if you would like to ask any further questions.

COMMISSIONER MADDEN: It’s probably more for the sake of discussion, the points are clear and well made so - and I’ll address the question on the target and the assessment of the target. For us it’s about roles and the wider process.

MS TREGENZA: I’m sorry, the target and assessment of which target?

COMMISSIONER MADDEN: In terms of whether the plan itself is actually meeting the international agreements and the like.

MS TREGENZA: Yes.

COMMISSIONER MADDEN: To me that is almost with M&E and whose role that is in in terms of the review from the Authority over time in the plan structure, so given

we're five years into not completed, that wasn't a strong focus for us, I think the important thing is, and maybe that's worth area of discussion in the M&E section of recommendations and something maybe we do need to consider making clearer which is really over the term in the monitoring and evaluation plan should be answering those questions of, is it effective over time and meeting its objectives. So we come in periodically, not to answer that question ourselves, but to actually say can those implementing the plan answer that question.

MS TREGENZA: Yeah, absolutely, and would it not be appropriate for you as agents of government to flag to governments if something as important as the Murray-Darling Basin Plan is falling short in meeting its international agreements?

COMMISSIONER MADDEN: It's difficult for us to make that assessment.

COMMISSIONER DOOLAN: Exactly. I mean, if there was clear evidence that that would be the case, but at the moment the plan's not even finished, and it's not up to us to take that ecological data. As John said, for us it's to look at the monitoring frameworks to see if they will be adequate and sufficient to enable that answer to be made, and currently, well, we don't think the monitoring and evaluation frameworks are sufficient at all.

COMMISSIONER MADDEN: No, we've called that out and I guess I'm saying, we haven't talked about the international agreements and been explicit with that objective.

COMMISSIONER DOOLAN: No, but we could bring that in.

COMMISSIONER MADDEN: It's implicit but we don't think it's in place and adequate and it should be developed as soon as possible.

COMMISSIONER DOOLAN: Sure, yeah.

MS TREGENZA: Okay, so would it perhaps be worth spelling out that one of the ramifications of this might be that - - -

COMMISSIONER DOOLAN: Yes, absolutely. We can take that on board.

MS TREGENZA: Thank you.

COMMISSIONER DOOLAN: I take the point that a number of people have made about the over-recovery recommendation which possibly factors as the first recommendation if people are just looking at our list rather than obviously reading the report and sequentials, so we take that point.

COMMISSIONER MADDEN: Oh, look, it's a factor of just how it's compiled on the report.

COMMISSIONER DOOLAN: Yes, rather than on any degree of priority.

MS TREGENZA: Sure, a huge job.

COMMISSIONER DOOLAN: Yes. I do want to make one point, and that is, and again, because we have gone around the Basin and listened to communities elsewhere, and we will be doing, you know, we've done one in Mildura, we'll be doing that again, you said communities believed that there's a full 3200.

MS TREGENZA: M'mm.

COMMISSIONER DOOLAN: To be frank, that is South Australian communities. That actual 3200 plan in the irrigation communities was clearly a 2750 plan, and whether that's a communication problem from 2012 from the very start, but when you say communities, that's not a whole of Basin view.

MS TREGENZA: Sorry, no, and that's not clear on the part of my scribing, but the communities in South Australia, the communities around the region that attend our meetings and work for these things, - - -

COMMISSIONER DOOLAN: But that is part of the broad figure and general issue is that even in 2012 where people thought the plan was settled, it was interesting to see how it was described by various governments as they went back to their communities, and so we are starting, or not we specifically, but the plan itself is starting with a degree of ambiguity amongst the Basin communities which is a difficult starting point anyway, but it is important to just to note, we'll go to Shepparton on Wednesday.

MS TREGENZA: May I, sorry, make another point here that is probably not anywhere in all of this, but in the submissions that we wrote, I think people thought they were going to get, certainly around here, and my understanding further throughout the system, is that the general feeling was that people will go - there was going to be water returned to the system to stop the over-allocation and return the river to a healthy living system, albeit nothing, there was never going to be a return to pre-Colonial times.

And then if there was water on top of that, that was going to be for the good of the system. That was all to the good. I don't think anybody foresaw the sort of open slather assault on the system that accompanied the first five years of the Basin Plan, and I think that's - like, there are really different perceptions in amongst the - between the communities about what the expectations were.

COMMISSIONER DOOLAN: Yes, and I think that's to a degree, we're reaping some of the legacy, if you like, of that now, and having to deal with it. Well, not we, the Productivity Commission, but we, governments and communities are having to come together with that ambiguity, but it was important to note.

So just coming back then to some of the points about the timeframes, again, as we've said, in some of it, projects like the constraints projects are acknowledged to be important, to be important for a whole range of questions, but the existing experience to

date, which is lifting some former constraints from the Hume to Yarrawonga reach which is what happened around the early 2000s. That's definitely a project that would suggest that the timelines for the larger constraint easings are highly ambitious.

Now, we have said, and our recommendation as we've said earlier, is to actually, if it's a good project, worthwhile and necessary, to extend those timeframes, but to have checks and balances in place. Is that something that your group does support or still concerned about that?

MS TREGENZA: It's kind of between a rock and a hard place, isn't it.

COMMISSIONER DOOLAN: It is, yes.

MS TREGENZA: Because you totally support proper process and the lack of proper process has been an ongoing issue with the implementation of Basin Plan, and at the same time I think everyone is really concerned about the amount of water that - the shortfall in the amount of water returned so far and the drying conditions, and does the river have that much time. In fact, that was the first thing I personally thought when I read your report. I thought, does the river have this much time.

Well, while recognising it's necessary, it's totally necessary to have proper management and evaluation and tendering processes in place, and to develop the water resource plans so that there's appropriate consultation and so on, and I think one of the fears is that the states could continue to push this out forever, and therefore how do you stop that happening before we're left with a concrete pipeline through the middle of eastern Australia.

COMMISSIONER DOOLAN: And that is the trade-off, proper process but how do we actually put governance around it, and I think we've heard suggestions today about, well, you can use the funding agreements; you can use - pardon? Sorry, I was just saying, you know, payments versus milestones, those governance arrangements to greater effect than they have been used in the past.

So again, it's a checks and balances, but we're certainly very aware of the fear of communities that if you extend, how is their confidence that Basin governments will be forced to demonstrate their commitment.

MS TREGENZA: Yes, okay.

COMMISSIONER MADDEN: I guess the only comment is, we do have the review of the budget or the allocation in the review in 2021 so you did mention potential of the cap on buy-backs and the like there, so I'm just going to look through here now. That is something that if you do have a budget deficit or shortfall in terms of the approach you're going to use that's something we'll look at to see whether that should be considered as well in that 2021 review when they look at the funding that's set aside for deficiency measures.

COMMISSIONER DOOLAN: Okay. I actually don't have any further questions. Do you?

COMMISSIONER MADDEN: No, no. Thank you.

MS TREGENZA: Could I just make one comment, just for the record?

COMMISSIONER DOOLAN: Yes, of course.

MS TREGENZA: I think that in, and please take this in the right spirit, I think one of the aspects of the political behaviour, and Mr Harvey said that he thinks to a certain extent there are problems which political, not structural, I agree with that very much, and I think one of the political phenomena that has occurred across the Great Artesian Basin since the Basin Plan started to be negotiated and implemented is an extraordinary departure of voters from traditional political parties, and I note that at the moment there is a campaign going in a very conservative area of New South Wales called "Anyone But NATS", and I think - I only make that point because I think it underlines the degree of desperation that country people and people in the Basin are feeling, and just how let down they are feeling, and it would be nice if that message got back to Canberra. Sorry. I know I'm being - I'm not being cheeky. I'm a student of politics and I'm interested in how political things work, and I think it's quite unprecedented.

COMMISSIONER DOOLAN: So it is an interesting observation, but I suppose what I'd respond with is, the Productivity Commission is an independent voice.

MS TREGENZA: Yes, I'm not suggesting - - -

COMMISSIONER DOOLAN: No, no, but we do want to make it quite clear, we're here to look with objective eyes about the effectiveness of implementation and actually to call governments to account on that, and it's important that we maintain that. Part of the reason for being, really, and it's deeply ingrained, particularly in the staff of the staff of the Commission is evidence-based, and it's really important that because any Commission inquiry will do this, but we're doing this on a five-yearly basis. It's a regular role under the Water Act, and it's important, we believe, we don't be commenting too much on that, although we note your comments. It's important that we're able to see this and call governments out in an objective way and based on evidence with what we see, and that's to a large extent what we've tried to do with this report.

There are, as you say, there's probably lessons to be learnt in this, and there's lots of observations to be made, but we have to keep it to something that - - -

MS TREGENZA: I'm not suggesting for a minute that you should.

COMMISSIONER DOOLAN: Yes. So that's an interesting point.

MS TREGENZA: Yes. Thank you.

COMMISSIONER DOOLAN: All right. Thank you very much. We'll call a break now for lunch. I think we've scheduled about 40 minutes for lunch and then we've got two speakers after that, so we're a little early. Lisa, we'll stick with the schedule, yes? Yes, so perhaps if we come back at quarter to 2, a 45-minute break. All right, so can I thank the participants to date and we'll reconvene at quarter to 2.

ADJOURNED

RESUMED

[1.47 pm]

COMMISSIONER DOOLAN: So now we'd like to welcome Robert McBride from Tolarno Station. Robert, just for the record, if you'd introduce yourself for the record please.

MR McBRIDE: Thank you very much. Firstly, I'd like to pay my respects to the Ngarrindjeri and the Barkindji nations past present and future elders. My name is Robert McBride from Tolarno Station. This is situated about 45 k's south of Menindee Lakes on the Darling River. So, can I start or?

COMMISSIONER DOOLAN: Please. Absolutely.

COMMISSIONER MADDEN: If you make your statement and then we'll talk after that.

MR McBRIDE: Thank you both very, very much. I guess firstly we'd like to thank the Productivity Commission for the chance to give our assessment of what - how the proceedings and how things are going. We support the draft findings and recommendations of the Commission. We also acknowledge the significant community consultation that has been undertaken, and that's something that has not been done by Federal Governments, Murray-Darling Basin Authority or the New South Wales Government in any way, shape or form to us.

As outlined, we are pastoralists on the Lower Darling. I guess we're supposedly the largest privately held land in New South Wales as a husband and wife combination. Tolarno Station got going in the 1850s. My family has been farming in Australia since - for about 162 years, so we're pretty proud of coming into the sixth and seventh generation of Australians farming in our nation.

I guess a few things that come to fruition is the fact that over the last five years we used to live on a Darling River system. We don't anymore. Come December this year we fall into the category of a third world nation. We don't have drinking water and that's a critical undertaking. Under your assessment the findings demonstrate that we'll have access to water. Clearly that's not going to be the case. Your findings demonstrate that if you work under the Water Resources Plan that everything's going to be okay. That is not

the case. By December if we have no water in the Darling River there'll be puddles. So we've got to pump out of these puddles to conceivably wash ourselves and wash our children. We've become a third world nation in one of the richest countries in the world. And this has nothing to do with drought. This is greed, corruption and total mismanagement by the bodies who are there to supposedly protect the river. They have not done so and realistically we call upon you, through the Productivity Commission, to not hand out any more money.

Let's just go through a couple of the programs that we are looking at. Obviously the closest to us, closest to our hearts is the decommissioning of the Menindee Lakes system. Now last Friday Niall Blair came out from Sydney for his first occasion to put the closing piece of pipe on the Wentworth to Broken Hill pipeline. So it's just another nail in the coffin of the Darling River and the Murray River system. Ladies and gentlemen, under the New South Wales plans and those plans undertaken by the Murray-Darling Basin Authority they're looking to save 106 gegalitres of water by effectively decommissioning the Lakes. So we've got the situation where New South Wales is instigating these plans. Evaporation is supposedly a bad thing, and our lake system that's been there 30 million years, it's been the very heart of the Darling River system and the Murray-Darling river system is being collapsed by Government policy.

So I guess that's the preamble. We're much in support of what you are doing. The thing is, critical water use and needs are not being met under any of these plans. By December the Darling River dies, only for the third time in history; 1943/44 there was a drought. Since white settlement that has never gone dry except two and a half years ago where we were run out of water for eight and a half months without water on our station. Ladies and gentlemen, nowhere else on the planet is a river system being absolutely destroyed through greed and corruption and total mismanagement and allowed to get on with it. The Amazon is being destroyed by deforestation. The Darling River is just being destroyed, and as we know 40 million people across the world depend on the Murray-Darling Basin system for food. When that collapses, and it will collapse unless we make major changes to the policies of Government and through the Productivity Commission please do not hand out any more money until these projects, these efficiency projects, that are supposed to save our river system, come forward with something worthwhile.

As I said, the Jacobs Plan report that came out, that fell into our hands last week, makes it abundantly clear that all the propositions and suppositions that the Murray-Darling Basin Authority is using to decommission Menindee Lakes (indistinct). CSIRO staff have gone to the Royal Commission and said their figures were interfered with by the Murray-Darling Basin Authority. This is serious. This is science being totally prostituted by Government policy and Government departments and people like the Murray-Darling Basin Authority who are there to protect our system. We believe in the Murray-Darling Basin Authority's integrity, that we need somebody to oversee the Murray-Darling Basin Plan because that must work, but the people involved are failing miserably and must be replaced. They must front a Royal Commission at the very least because draining the Menindee Lakes twice in four years, that is not mismanagement, that is something far deeper and must be investigated by police or a Royal Commission. Thank you for that as a little opening.

COMMISSIONER MADDEN: Just one clarification for us. The Jacobs report that you mentioned, just so - we're going to request a copy from the relevant people, can I get you just to say who actually that was commissioned by?

MR McBRIDE: This was commissioned federally and was released on the October - sorry, it was never released. It was never supposed to see the light of day. It was an internal Government document that somebody with integrity has stepped forward in Government and I found it on a park bench the other day, but somebody in Canberra has got the integrity to support your river systems. And so not a whistle blower but a lady or gentleman who's got the integrity to say this is reality. The reality is your Murray-Darling Basin system will collapse if you start collapsing something like the Royal Commission. So does that answer the question?

COMMISSIONER MADDEN: And it's commissioned by?

MR McBRIDE: Sorry, it was commissioned by the Commonwealth Government Department.

COMMISSIONER DOOLAN: The Department of - - -

MR McBRIDE: Department, yes. Department of Agriculture, Water.

COMMISSIONER DOOLAN: Agriculture and Water. Okay.

COMMISSIONER MADDEN: Just a quick follow up question.

COMMISSIONER DOOLAN: Sure. All right.

COMMISSIONER MADDEN: It's a little bit different, but just one thing on process. In the Mildura hearing, this was a raised a number of times about the impact of the management of the lakes versus obviously upstream water sharing plan rules and practices. What's been the response? Because again we talked earlier about transparency in process and operational rules.

MR McBRIDE: No. Thank you for the question.

COMMISSIONER MADDEN: Has anyone told you that there actually has been a change in the operating rules that kind of govern the operation of the lakes, to date?

MR McBRIDE: I guess we look at - to date, no, no, thank you for the question. I guess there's two issues. Once the northern basin but also once - the second one is the administration. So if I may just look at the administration of the Menindee Lakes system. No tangible undertaking except that clearly a lot of the aims that the New South Wales Government want to achieve on water savings under the projects, like running a \$500m pipeline, to suggest that evaporation's a bad thing, means that it puts more pressure on the Menindee Lakes. So the Murray-Darling Basin Authority and the New South Wales

Government are now saying, "Let's decommission 80 per cent of the lakes and only hold 20 per cent of the water. Let's find efficient ways of getting in and out really quickly", and you go, "Are we on the same planet?" This is the Darling River system and, you know, with global warming or any of the issues regarding, we do - the reason why the lakes system was set up by the guy upstairs, and I'm not particularly a religious man, but effectively it's small flows regularly plus massive flows means there's a lake system, it evaporates, clouds are seeded, we all win.

So, no, there has not been a policy, to our knowledge, that has been presented to us by New South Wales and the Murray-Darling Basin Authority. We've been kept in the dark very, very much. And yet the second time the Menindee Lakes were filled on a weekly basis I was ringing up Neil Andrew, who's the chairman of the Murray-Darling Basin Authority, saying, "What in God's name are you doing Neil? The Murray's all but in flood, why are you draining the Menindee Lakes so quickly?" Remember, we have eight and a half months without water and then by a chance stroke of good luck in the middle of winter, which it never rains where it does in the middle of winter, it did, it filled up the lakes. Within three months the Murray-Darling Basin Authority had drained half the Menindee Lakes. This is not bad management. This is something far more serious that needs a Royal Commission or police investigations. So, to answer the question, no, nothing's been presented to the people of the Western Division. And look at the Barkindji nation; life expectancy for a Barkindji gentleman is 36 years of age, for a lady it's 42 years of age. Water is their life. Barka was their river for the first 50,000 years and it's been taken away from them in every way, shape or form. They're not party to the whole issue of the river system and that's a national disgrace. Their members are not on any Murray-Darling Basin Authority board. Clearly that's an insult to them. They're good people, they deserve their river back and integrity in their river. So, no, we haven't had consultation.

And as far as the Northern Basin issues are concerned, New South Wales as of this week, they're still looking at plans towards looking at issues like floodplain harvesting. Now I know what the word "harvesting" means, that means when you take - sorry, you plant a seed and you look after it and a bit of wheat grows and you harvest it. They're still putting in propositions to allow people to basically bulldoze off the river system even further. So that's the degree of integrity that the New South Wales Government is undertaking with the Murray-Darling Basin Plan; they're still undermining it at every turn. We do need a Federal Royal Commission.

So I hope that answers the question both - on both levels. We haven't been consulted by the New South Wales Government. Kept in the dark. We're still waiting for the business plan for the pipeline. Given that the pipeline's already finished, Niall Blair's \$500m was spent on this pipeline for 20,000 people. Cotton Australia in their annual report last year had prided themselves on congratulating themselves on telling the New South Wales Government. That's straight out of their annual report, it's "We congratulate ourselves on telling the New South Wales Government to run a \$500m pipeline". Now you've got to kind of wonder, given there's no cotton in Broken Hill, why are they congratulating themselves and why are they doing this? It's pretty clear cut why Cotton Australia wanted a \$500m pipeline running to effectively decommission the Menindee Lakes

system because remember there's two and a half to three times the size of Sydney Harbour of water. Water is gold. Burke and Wills stepped past our place in 1860 looking for that inland sea. If they found it they would've been gods. The problem is we've got a situation where greedy capitalists with big bulldozers have basically looked at a satellite photo and worked out where is the whole integrity of the river system. So that's the thing, we have no integrity in the river system and we have no river system. So when I bought a sheep station about 30-odd years ago as a young kid, I was living on one of the most amazing river systems in the world. Today it's a creek. In two months' time it's a puddle of water. Nothing to do with drought. This is the worst corruption in our country's history. It's going to make the Fitzgerald inquiry look like a tea party. We need all parties to be facing the music. Sorry.

COMMISSIONER MADDEN: So just to get some picture for us. So not to ask any kind of scientific or hydro - so all your experience in terms of how the lakes have been managed into the past.

MR McBRIDE: In the past, yes.

COMMISSIONER MADDEN: So the amount of water that was there with that winter rains and the levels that the lakes were at, in the previous operation would that last a couple of years?

MR McBRIDE: The previous operation would have lasted between ten and 12 years at least. You have to remember the figures that New South Wales - - -

COMMISSIONER MADDEN: That's with some top-ups and stuff, you know. A good foundation with the level that it was at, you'd be able to manage it, so you had - - -

MR McBRIDE: Absolutely. Absolutely. It's interesting, for people who don't understand, you've got to understand, a key point is evaporation. The Murray-Darling Basin Authority is saying "Evaporation is the biggest enemy of the Menindee Lakes so we've got to get the water out of it quickly". And you go, "Okay, let's just think about that. On what basis are you doing that?" Now anybody who has ever been to Menindee, there's a big metal tray, it's about a metre in diameter, it's about six inches thick. There's a small amount of water. So each day they go out and measure the drop in that water level. That is the basis for the evaporation of the Menindee Lakes. Now okay, hang on, the Menindee Lakes Cawndilla is seven metres deep. So you've got a little metal tray in an asphalted area and you're working out evaporation out of a lake system that's seven metres deep? And also what about the recharge? Because the Darling River recharges, you know, hundreds of thousands, if not millions of trees and you're three to five kilometres out from the river's recharge. How does that come out of the metal tray? Don't think it does. So realistically the whole basis of the science that is taking the Menindee Lakes system apart is evaporation is a bad thing, but it could be up to 95 per cent inaccurate and, therefore, people know this, scientists know this, the CSIRO made it abundantly clear in their findings to the Royal Commission that their figures have been interfered with by the Murray-Darling Basin Authority and those in the Northern Basin who want certain outcomes to be made by the decommissioning of the Darling River

system. Because at the end of the day that's what's happened. Twice in four years a 30 million year old river system has been crucified, not by drought, it was saved twice, you know by that second event back in 2017. God only knows, you know, if you put a million to one shot, I'm a Carlton supporter, it's like the chances of us winning a premiership next year is like a million to one shot, but it happened. And then the Murray-Darling Basin Authority drained the lakes within - well, they said half of it within three to four months and the rest of it within 12 months. That's not bad management, that is - and as I said, I spoke to Neil Andrew on a weekly basis while he was doing this, on a mobile phone every time, once a week. "Neil, what are you doing? The Murray's almost in flood, it's a banker, it's running enough water down to whoever wants it, why are you doing this?" And he said, "It's in the plan". He should front a Royal Commission or a police inquiry as to telling me what particular plan, whose particular agenda and whose aims are you fulfilling, because you're certainly not fulfilling those of the Australian citizens, the members of the Barkindji nation or anybody along the Darling River system or, in fact, any South Australian or any - looking longer term. So I apologise I'm long-winded but they're some of the answers.

COMMISSIONER MADDEN: No, no. So I will just respond very briefly. So in our report we haven't actually said that we things are in order. What we've said is that there's a water resource plan under development and that's where stuff should be considered. The question that we need I think, to put back to the Authority and to New South Wales, and this is where we're getting some of the feedback on Friday, is how is that process going? If it's not going well in terms of addressing the issues, the core issues, and I think one of the core issues is the operation of Menindee Lakes, so where's that addressed and how do the two interact. So again, we can't go and re-do and re-prosecute every water resource plan. We've said where they don't look like they're going to be good quality they should be delayed. The obvious case is the Darling, but it's obviously the Menindee Lakes operation and the Lower Darling as well, not just above.

So we've got the message I think now from Friday and today, that it's not travelling well. I guess then the question is, beyond asking Neil Andrew, who are the players that have to actually provide the appropriate information and what are the expectations around, as we talked earlier, about what information needs to be from the business case able to be prosecuted in various forms and in technical forums as well, not just put up on the web.

MR McBRIDE: Five years ago the Murray-Darling Basin Authority was set up to protect the integrity of the Murray-Darling Basin. So who needs to be looked at? It wasn't a toothless tiger from the start. It had certain powers to protect the integrity of the river system, it's chosen not to do so. So the Board, it's not only Phillip Glyde, Neil Andrew, Reynolds - Andrew Reynolds. We've been asking for the figures and the facts for some years now, so it's not like this is all new to us. We said, "On what basis are you sending flows down the Darling River? Why such large amounts? Can we have some integrity into your figures?" I've got one document there, it took me four years to get, which gives me a third of the information as to what - how they're collating their figures. They refuse to give the other two-thirds.

So I would suggest that while it's a Commonwealth Government issue as well, and

remember at the end of the day the Commonwealth has allowed the total mismanagement of the river system, so who do we look for the facts? Who are potentially the bad guys? Certainly the state of New South Wales continue to undermine the integrity of the Menindee Lakes system but by this report saying "Do not touch the Menindee Lakes", seriously, it's the very heart of the whole river system. You've still got the Murray-Darling Basin Authority hawking the fact that they can save 106 gigalitres of water by allowing efficiencies in the Menindee Lakes system. So I would look at the very basis of, "On what basis do you find any efficiencies? Come December this year we run out of water, so what provisions did you actually set up to provide basic human water requirements?" I think it works out to be about \$25m worth of businesses along that little stretch of the Darling will run without water, so I've either got to watch my sheep die or move them on, and watch tens of thousands of native animals die. So where's the provisions for safety met? I'm not having a go but I think under your provisions, your findings indicate at this juncture in time, and maybe I misread them, your findings indicate that the Water Resource Plan will fix the problems in the short-term. Your report must put in place measures to endure; that they are protected in the future. That is to say, just the very, very basics. Because under the Water Act, human consumption, stock and domestic, everything else. Now as you know in New South Wales they changed the whole very basis of that, so that the classifications under Katrina Hodgkinson as New South Wales Water Minister back in about 2008/9, she pushed all the classifications up to top and they were entitled to take three years' supply of water in advance. So there's no integrity in the river. Until these dubious practices by the New South Wales Government are reversed, you can't get integrity back into the river. You've still got a situation where, as much as the Murray-Darling Basin jumps up and down and says, "Send the water down", the New South Wales Government, even today, with the floodplain harvesting says, "Actually let's find another way of banking it up. This is called floodplain harvesting. Put a few barriers in and stop even more water getting down".

We need the reversing of these policies. As you know, Katrina Hodgkinson left Parliament the day the Four Corners report came out, hell of a coincidence. We need these policies by the New South Wales Government to be looked at closely and to be reversed immediately. So that is to say, let's get some integrity back on a State level into protecting the river system, because at the moment those protections aren't there. So the Murray-Darling Basin Authority may well say "We've only got a certain amount of powers". The problem is the Federal Government and especially the New South Wales Government, those policies have to be reversed to get integrity. Small pulse down the river. As you know, the Darling River survived over the millions of years by small pulses of water through the embargo system and as you know Kevin Humphries who's, I believe, being investigated by ICAC on the basis that at junctures in time in about 2015/16 when embargoes should have been put in place he, as Water Minister of New South Wales, spoke to particular key people in the Northern Basin and said, "Look, don't worry about the embargo, I'm the Water Minister". So again I'm not trying to name names; this is fact, this is common knowledge for people on the river.

COMMISSIONER MADDEN: Again, I think this is just - the place for this is water resource plans so - because that's where the Authority gets to actually say "Are your

policies in line with the Basin Plan and the SDL assessment and the like". We've heard and what I can strengthen about what are the expectations on consultation and information and analysis brought to bear in these hotspots, which is obviously the Darling and the Lower Darling. We then have the supply projects which we've argued for a gateway process. Now that means a lot when you know about treasury processes and Government processes but that's a very intensive independent type assessment, not just the Department doing it but actually someone from outside bringing an independent assurance process into a business case step. So you're progressing from a business case through to feasibility, with very strong oversight. It should raise - have a forum to raise those issues.

I think it's up to us to talk more about the expectations of what a good process is, and maybe not use Government code in some of this stuff because we are trying to be strong in terms of the oversight and have those Jacob-like reports inserted into that process so people can be sure that if a project doesn't stack up it actually gets put to the wayside.

I think the other points to be made in water resource plans are things like well how do you get consulted. Are you involved in the Barwon-Darling water resource plan development?

MR McBRIDE: They've kept us out.

COMMISSIONER MADDEN: Have you been consulted?

MR McBRIDE: Not at all.

COMMISSIONER MADDEN: Like these are the kind of things that - - -

MR McBRIDE: No, no, it's been basically on a mushroom basis; "You live on the Darling River so you must be a mushroom, it's not quite dark but we're not going to tell you anything". So it's a need to know basis. Obviously we don't need to know. Given that the Barkindji have been there for 40,000 years, they don't need to know either. So that's it.

One other little point if I may. Just the fact that - we talk about the Lower Darling as though, okay, that's it, game end, to have water going down the Darling of some descript. You've got to kind of remember that 200 million tons of salt has to get out to sea each year, out of the Murray-Darling Basin. So it's not just out of the Darling. If you stop the Darling dead, which as of December this year it stops dead, it will be probably at least a couple of years before it gets water in it so it will totally collapse. But the salt build up in the Darling going backwards, and also in the Murray. The ramifications are the system has to collapse. It's a very inefficient system of getting salt out to sea. It's not a perfect world but the way the Murray-Darling is set up it needs to move that water. So if that water with that salt does not move it will bank up, it will kill the Murray - sorry, it will kill the Darling and the Murray will suffer as well. So just to make sure that people understand it's not just that we like a little bit of water going past our front door. We do understand, we're here for future generations, just like the Barkindji and everybody else,

we're here looking after the future generations. That water must go down the Darling, not because I like looking out at water and going fishing, because I'm the world's worst fisherman. I know that for future generations of Australians that water serves as a purpose to get that salt out to sea. Otherwise the Murray has to collapse because it puts too much pressure on the Murray system.

So, look, there's a lot of factors that you've got to look at from a productivity prospective. You've been the one organisation, the Productivity Commission, that's actually talked to people along the Darling River, and we take that with great respect, as does the Barkindji. Everybody else has treated us like second-class citizens and the fact is there's been people there for hundreds of years, if not 40,000 years. We've got pretty much a good insight into looking after and administering our river as best as we can. As far as irrigation, we believe in sustainable irrigation. But they're the first ones who are going to be crucified this year. When the Darling goes dry, it's going to be all the people in South Australia jumping up and down saying, "Where's our water?" And continually New South Wales just keeps on putting in big pipelines, like the one to Broken Hill, out of the Murray. We've got an amazing river system. The Murray-Darling is the most amazing I think in the world, but it has been in the last five years, under the administration of the Murray-Darling Basin Authority, it has been crucified. And there is no way, in my little humble view, that one more cent should go out to the Murray-Darling Basin Authority. There has to be - and I know, you know, there's a lot of levels within Government but those levels of Government have allowed \$8 billion to be released out of your pocket to save our river system in the last year or so, and it will be up to, what, \$13 billion by the end of the year. Where's that money gone? And where's our rivers? So as far as making sure we send the money, utilise the money and protect our future generations, the Federal Government needs to be asked and water ministers need to be asked, ex-water ministers need to be asked where did that eight billion go? Where did the 13 billion go? Who's administered it? Because clearly we've got no Darling River left and the Murray is being crucified.

So as much as I believe that you're saying, "Look, it's about making sure the money goes into the right pockets to do the right thing", we spent 13 billion, we haven't got anything back, so I hope - and hopefully we've learnt from that mistake. Auditors must go in now and work out who got the money. Obviously there's a number of people in the Northern Basin a little bit nervous as to that and Norman Farms might be one of them, the Harris family might be one of them, they're having been assessed, and I'm not trying to point fingers. We live in a country with due diligence and the ability to work out the facts but from my perspective, from the productivity perspective and our basis, just don't release any more money to the Murray-Darling Basin Authority. Look at their track record. Look at the fact that they're presenting to the Government today the fact that the 106 gigs of water could be saved by decommissioning 80 per cent of the very, very heart of the Darling River system, when in fact they know this is around. That is the biggest indictment because it's the next generation that we're working for. We're just travelling through, we're worm bait soon enough, but what's the disgrace is there's a large number of people working in government, certainly government authorities who appear not to really give a toss about the next generation and that's - that's my greatest fear, is that how do these people look at themselves in the mirror, and I guess I've got no solution to that.

In summation, that was supply measures and toolkits. We know the facts that there's a - the effect on the impact of the ecological loss of habitat. There's so much to be lost with the destruction of the Menindee Lakes system. It's catastrophic to the whole Murray-Darling. It's not just to the Darling River system, it's the whole project, and it really is losing - if you lose your heart, the veins won't last too much longer without the very, very heart, so we just hope that due diligence is done. There has to be a change of management without a doubt before one more cent goes to those people. They've got to turn up to a Royal Commission or a police investigation and to explain, "How in God's name did you drain the Menindee Lakes twice in four years?" And have asked certain people that question and they just said, "It's in the plan". Well, I don't know what plan that is, but unless that plan is by people who own the Northern Basin, that's the only plan that gives me any semblance of why the hell you'd do that.

COMMISSIONER DOOLAN: That is not in the plan because we're assessing the effectiveness of the plan.

MR McBRIDE: I know.

COMMISSIONER MADDEN: We have a line of investigation.

COMMISSIONER DOOLAN: But one of the things that is in the plan is that the water resource plans do provide, if you like, the minimum flows. So everywhere else in the Basin there would be a series of rules governing minimum flows. And elsewhere there's been a lot of focus by the Murray-Darling Authority on maintaining those planned environmental flows as a key base point. So are there minimum flows in the Lower Darling?

MR McBRIDE: No.

COMMISSIONER DOOLAN: And there never has been?

MR McBRIDE: Literally the problem is the Murray-Darling Basin Authority treats the Murray-Darling as, I think, 36 valleys, so you've all got your little valleys, so they keep water going in different directions. So the argument early on in the piece was, "We drain the Menindee Lakes because it evaporates and Dartmouth and Hume Dam water evaporates less". And you go, "Okay. Let me get this right. Water evaporates less out of a much deeper dam that's man-made. Yeah, I've got that. But that's on the Murray. This is the Darling. Two totally systems that come together". It's like, "Yeah". You go, "Well hang on, you can't". So it's flawed logic from the start. So there's no environmental water. We asked last time, there was eight and a half months without water. We rang up David Papps from the Environmental Water Holders Department and said, "David, where's the water?" He said, "New South Wales won't tell us".

COMMISSIONER DOOLAN: So it's the planned process. I mean in - - -

MR McBRIDE: Yeah, sorry, so it's - - -

COMMISSIONER DOOLAN: Yes, it's in terms of looking forward and basically being clear what needs to happen and contained in the Water Resource Plan.

MR McBRIDE: There has to be a Murray-Darling Basin Plan where every valley is encapsulated in an overall holistic approach to a Murray-Darling Basin. Not every man, every valley for himself. And at the moment it appears every man, every valley for themselves, which leads to a cataclysmic effect that, you know, there's some people who supposedly say, "If water goes past my front door then that's a catastrophe, I've got to grab as much as I can". Now that isn't a very holistic approach for the survival of a river system but to answer the question, yeah, so at the moment the thinking of the Murray-Darling Basin Authority has to change. The paradigms have to change.

COMMISSIONER DOOLAN: Or be consistent across the Basin.

MR McBRIDE: Or be consistent across the Basin. Have a holistic approach rather than 36 valleys.

COMMISSIONER DOOLAN: But even in other valleys there are minimum passing flows required.

MR McBRIDE: At the end of the day it's respect. Respect of the river, integrity of the river, integrity of the future of the river. Because if your salt builds up, it's just going to run up your valley. If your valley isn't, it's the next valley is - so it's a time bomb about to explode in your own hands, so if you're not smart enough then understand that your land will become worthless in ten years' time by ignoring the harsh realities that the water and the salt has to get through the Murray-Darling Basin system as efficiently as it can and the Menindee Lakes is one of the stages, as is the other river systems. And we respect, you know, the Murrumbidgee, the Barwon, Darling, they're all components; I think seven major river systems create the Murray-Darling and it's effectively the respect of all those in one river system.

COMMISSIONER DOOLAN: Okay, well your message is also consistent, as John said, with the hearings that we held in Mildura on Friday, so I think we've - have you got any other questions?

COMMISSIONER MADDEN: No, but I think we've got plenty of questions to ask.

COMMISSIONER DOOLAN: Others.

MR McBRIDE: Sorry for not mincing my words, it's just that we're all a bit tired, we're going to see our river die again and the environmental disaster to families and communities on the Darling River, that's one thing. I think the Prime Minister gave \$89m to the Red Cross about mental health. You can't give me mental health when you destroy our river systems and, again, again I pay my respects to the Barkinji. A lot of their traditions are passed through water, passed down - elderly women tell their young children about their country by looking to water and doing - and that sounds superficial to you and I but I guess if we're here 40,000 years we hope people will understand we've got

a lot to provide that system. So thank you both very much for your time.

COMMISSIONER DOOLAN: Okay, thank you Robert. All right, well we have our last formal participant, Rosa. Rosa Hillam. And again just introduce yourself for the record, thanks Rosa.

MS HILLAM: Hello, my name is Rosa Hillam. I live in Meningie on the Coorong. I've been there about 16 years now. I'm a visual artist and a Healthy River Ambassador. I'm originally from Orange in New South Wales and I have friends and family in every Basin state. Because of where I live you couldn't not end up in the water space, and so I've been active in that space pretty much for 14 years. The last four, roughly, I've been actively lobbying politicians for quite a long time. It was for the Barwon-Darling and underlying all of it though always for the Basin Plan and for the full Basin Plan. Unfortunately it became very apparent that the plan was being eroded in (indistinct) and that it was being extremely manipulated, and that just a few were basically open slather and so that's basically how it sort of come to pass.

Since I've been here, being last, it's been quite interesting because nearly everybody has tapped on something that I was going to talk about, and being one for talking I'm going to try and be good and just read short little bits because being Italian you will get an hour's long. My main issue when I came here today was basically I'd seen that you were looking at abolishing the salt target, and for me personally that's just something that has to stay there. Everyone's touched on it. You know, you have the other States saying, "Oh, you know, South Australia, they just let all the water go out to sea, they waste it", blah, blah, blah, but that's not the case. It needs to go out, it needs to push that salt out and those nutrients out because then that feeds - like it cleans up the system but it also feeds the environment outside now. While I agree with what Anne said and, yes, it may need revision and we all know that the MDBA has never hit the target, the only time it actually hit the target was when we had the floods, it still is a major necessity. It has to be there. And I know when I was on a hydrological tour a couple of years ago and looking at the salt inception scheme in Renmark, they were panicking because they're scared of funding, you know. And so while these targeted salt interceptions are great, there has to be support for those as well, but nothing can make up for pushing the salt out, which means we need flows to do that. And by removing those targets you're basically saying, "Oh well we can disconnect the system" because it gives no push for the Barka or the Darling, or whatever you want to call it, to be kept intact. So that's my point on the salt anyway.

The supply packages put forward according to Wentworth Group didn't meet any of the 12 points that were in the Murray-Darling Basin Plan, yet they were all accepted at the ministerial meeting. The business cases were not available for them to scrutinise, yet it was done, and as Rob said, somehow a due diligence report came to pass. Now that report was put forward, was asked for by the Department of Environment and Water and it was finished 30 October 2017. It is a scathing report on the Menindee Lakes project. About the only good thing in the whole 90 page report is that they said the name was good and that it actually explained the package. But there were no reports, there was no archaeological stuff. There was absolutely virtually no consultation with any of the local

traditional owners or land title owners. There was none of that sort of stuff, and for the majority, I think there was 13 individual pieces, most of those didn't have any conceptual plans at all. So their report was scathing. They couldn't see it being value for money at all. There'd been no soil testing or anything done, so they reckoned the costings were out.

So if you look at that, and I did double-check, they had that report a couple of months before it went through and got passed with the SDL adjustments, yet they made no attempt to look at any of the million recommendations in there and change anything. None of that has been changed at all. So it begs the question of what confidence can we have in the rest of those plans and in them being put up. And you talk about the water resource plans coming up and they'll deal with this, but all the States have known they had a deadline for these water resource plans. None of them seem to have got off their butts and done much. New South Wales has 20 of them, to my knowledge. If we can't get them to shepherd water and do the right thing, how the hell are we going to get them to do 20 individual water resource plans? It just, you know everyone says they want communities to have more confidence but there is absolutely no transparency. There is no honesty. And in that report it talks about the purchase of Tandou from Webster's. So Tandou obviously is part of this completed package for the Meningie Lakes but that opens up a whole - another kettle of fish because when you look at some other stuff that has come out recently, and in particular if you look at the Australian Institute, they put out a paper about a month ago, maybe I think, called the Trickle Out Effect and it basically states that we all knew, it was in the news everywhere, that they got \$78m for their water at Tandou. And I actually tackled one of the people responsible for that - the administrative MINCo mixer in Albury, last year I think it was, and he said, "No, going price, that's the price". But that's not the price. They got \$38m or 38.something million dollars for their actual water, but then they were given \$40m compensation for future loss. And then on top of that, old Barney gave them 20-something gigs to - for the following year to grow a \$35m cotton crop.

Now this is just ridiculous. In the whole of New South Wales there's only been \$36m spent within New South Wales for farming, for efficiencies and that sort of stuff, and from my understanding of this report basically Webster's dictated what they wanted and what they got. And apparently there was supposed to be a caveat put on because they didn't get asked to remove the infrastructure; all that infrastructure is still on that property, yet there's been no caveat put on either. So if that's the case then, you know, it should - it stands to reason that that sort of starts a precedent for people to be able to ask for compensation. Either that or you have a couple of big end people that can have a revolving door and get whatever they please, which is what we've all noticed has happened at least over the four or five years anyway between Webster's and Norman Farms. It just seems like everybody else, any grazier, any first Australian hasn't got a hope.

Sorry, I'm trying not to prattle on too much but I will. I can't help myself. Part of the Menindee project is also taking back high and medium security licences. Now in doing that there are six families with permanent plantings that apparently have been in negotiations for four years about what's going to happen to them because they're not going to have the water security for their permanent, and these are, from what I can

understand, their stone fruit and vineyards. They have been pushing for four years to try and do some sort of deal to secure their security. Every time they meet with the departments they have to sign a confidentiality clause. They can't understand why. They're only trying to sort their own lives out, and this is - this is actually fact. So, you know, and it just - if six families are going to have to give up their water licences, why is it that Webster's can be compensated but these six families can't, or they can't without secrecy.

There is no transparency. There's no transparency around the modelling. A lot of the modelling we know was flawed. Everything's been pushed and shoved since it began. You know, originally the modelling was on 2,800, then it ended up 2,750, and I didn't actually find out until - through the Royal Inquiry that the reason it went from 2,800 to 2,050 was because Queensland wouldn't come to the table unless they took the 50 off. So, you know, there's always this push shove, push shove, and everyone forgets that the Murray-Darling Basin Plan was a plan to try and restore and protect the Murray-Darling Basin. But since it was actually signed, I'm pretty sure the figure still stands at - we have now 42 per cent more consumptive use. We're not staying the same, we're not going backwards, we're going further. And with these packages, these 36 packages or whatever it's ended up, if we - if they do what they're going to do and say, "Right, the 605 can go for irrigation", blah, blah, blah, I have no confidence any of these packages are going to give the equivalent in water. So if we have this reconciliation in 2024, which the MDBA is backing away from now because apparently they don't actually have to do it, it's just a suggestion to do, you're going to have - each State is going to have to be giving water back. And, you know, to my way of thinking there are a lot of irrigators that, if they can have that 605 now, they're going to be screwed at the other end when it doesn't work and they have to reduce back. It would be better and smarter for them to stay where they are now and for the money - for the water, sorry, to be at the end of that, rather than giving - you know, rather than giving it over in July, I think it was July, why can it not be turned around and allotted as it happens, as the projects work. And the other thing too, these projects are supposed to be interdependent. They're supposed to all work together throughout the Basin to give these efficiencies. It's obvious by the Jacobs due diligence report that Menindee Lakes is not going to do it and that's 116 gigs or something - there's two figures; there's a 72 or 76 gig and then there's 116, but there's not even any supporting evidence from the MDBA to suggest that's going to happen. It's all getting talked about but the Jacobs report says there's nothing there.

COMMISSIONER DOOLAN: If I could. Our recommendation, and I suppose it would be good to talk about the sorts of things we've recommended to deal with some of these issues and whether they're sufficient to deal with them with confidence, is we have recommended a gateway-like process where when they're at full detailed design they're assessed against "Has there been a change in the environmental outcomes or their price", and whether they're likely to meet the deadlines or not. And that gateway process would be determined within the next 12 to 18 months whether the project goes ahead or whether it doesn't, and if it does, whether there's changes in deadlines with checks and balances.

So that's what we've recommended to deal with the concerns that people have. They don't understand what supply projects are; quite rightly because they weren't made

available. There is a lot of detailed work to be done on a number, not all, of the projects. Some of them are almost shovel-ready but not others. And so it's really I suppose from our perspective if that recommendation that we made was actually implemented, is that going to shift and change; would you have better confidence in the arrangements?

MS HILLAM: Look, I don't think - I think the only way that I would be confident would be if the water was adjusted at the end of each one, rather than beginning. Because the thing is, if - you have a lot of irrigators that if they can plant extra and they think they're getting extra they will do it. And that's fine, but if up the road the water's not there and they have to pull back, that's cost them more in the long run. Do you know what I mean? And it's the same for the environment. If we go up the road and wait and wait and wait, we still can't have - you know, that water's gone because it's there for the irrigators, it's not - - -

COMMISSIONER DOOLAN: It's not gone, - - -

MS HILLAM: No.

COMMISSIONER DOOLAN: It just hasn't been recovered. So it's actually more - it's not taken away, - - -

MS HILLAM: No, and - - -

COMMISSIONER DOOLAN: So it is actually trying to get to a point that what arrangement would give people confidence that the supply projects are being managed either to a successful outcome, or if they are turning out to be not a good investment, that that's detected early and they're not actually pursued.

MS HILLAM: Yeah.

COMMISSIONER DOOLAN: And if that happens early, if it's declared not, then it becomes clear as you go along how much water has to be recovered.

MS HILLAM: You probably don't want to hear my answer, but if it was me - - -

COMMISSIONER DOOLAN: Well it's important.

MS HILLAM: Well if it was me, I'd say stop the plan where we are. Take the cap off the buyback. Let willing sellers sell back. Get rid of the efficiencies. Use that money to help communities plan for a future with less water. That would be the smart thing to do but - - -

COMMISSIONER DOOLAN: That's a change to the nature of the plan.

MS HILLAM: No, it's not because then the water is there.

COMMISSIONER DOOLAN: Getting rid of the efficiencies is a significant change.

MS HILLAM: Pardon?

COMMISSIONER DOOLAN: Getting rid of the efficiency measures is a big change.

MS HILLAM: No, because people - if you - if you use that other money to help build communities for a future with less water, that's not getting rid of efficiencies. That's just using efficiencies in a different manner. Because we've found that the efficiencies and return flows actually don't seem to give as much as what people thought. We're actually losing more in efficiencies than we would have got.

COMMISSIONER DOOLAN: That prospect has been raised but at the moment there isn't a lot of evidence yet to support it either way, which is one of the reasons we've called to go and get the information.

MS HILLAM: You just asked for my opinion, - - -

COMMISSIONER DOOLAN: Absolutely.

MS HILLAM: And that's my personal opinion.

COMMISSIONER DOOLAN: Sure.

MS HILLAM: I'm not saying it's the right opinion.

COMMISSIONER DOOLAN: Sure.

MS HILLAM: But with, you know, like - we all are concerned about global warming. We're all here because we are concerned about sustainable water for the future because we all forget, if this river dies we have no drinking water, we have no way of making - growing crops or keeping feed or cattle, or whatever, you know, and me personally, I'm not anti-irrigation, I'm only anti big irrigators. I worked in the dairy industry for the last decade and a half of my working life before I hurt myself, so it's all about protecting our most important asset and if - and that's what the plan was about, and that's what the plan is still about, if people would actually follow it. It was about trying to stop over-allocation and over-consumption and bring the river back to health. When the modelling was done there was a couple of flaws in it, but one of the biggest ones was they didn't model it on a very stressed system, because at the time it was a very stressed system. And so, you know, everyone that works so hard to do things are really basically running upstream instead of downstream because they're really pushing it. And I just think that, you know, if the Government wanted to be serious about it, they would be seriously looking at why the hell we are planting so many thirsty crops in areas that don't - can't sustain it and that we really don't need, you know. And a lot of these plantings have been since the plan. And I think one of the biggest mistakes that was made was the unbuttoning or uncoupling, or whatever you want to call it, of water, because it means that people like Webster's can buy it from anywhere. I mean my thought, because I tend to think really strangely, but you know if the Government's not put a caveat on Webster's,

and Webster's has not decommissioned all their stuff, how long is it going to be before they buy another water licence and start up again? Do you know what I mean?

COMMISSIONER DOOLAN: Just in terms of the Tandou purchase which, as you said, was raised by the Australian Institute, we do refer to the fact that the Australian National Audit Office is doing an investigation of that purchase.

MS HILLAM: Yes, I understand that.

COMMISSIONER DOOLAN: So effectively the facts around that will come out through that process.

MS HILLAM: Can I just make one more point?

COMMISSIONER MADDEN: I was going to say - I was actually going to say are you finished going through your points.

MS HILLAM: No, can I make one more point just before we move off that, off the - not off Tandou so much but off the Menindee Lakes.

COMMISSIONER DOOLAN: Sure.

MS HILLAM: I'm under the understanding that there was a - I think the MDBA did an independent review of the Menindee Lakes package and it's my understanding that the same person that actually wrote the package was on the review, the independent review board. And that was Brett Tucker. Just a titbit for you.

I just want to - I think I'm nearly over most of it - look, just quickly, I've got a whole heap of points that I wrote down here. With the 450 upwater I - like I said, I believe we should take the buyback cap off anyway. I don't know why it was changed - well I do, but - but I think that cap for willing sellers should come back off. But I really believe that we need wet water, and that 450, it would be far more prudent and probably far cheaper to buy it back because then we would actually get 450 in real water. Because in efficiencies we're never going to get it. There's that much push back from the other States, they're never going to - well they're never going to do it in a great rush anyway.

I believe that we need an independent water audit because I believe there's a lot of goanna water in the water, and I just think a lot of it is on paper but is not actually usable. So I really think we need an independent water auditor.

I've heard Anne talk about it and a few others here. There really is bugger all monitoring. There's bugger all monitoring of water. I think there's supposed to be one - I was talking to somebody the other day, there's supposed to be one monitor in Lake Alex but nobody seems to think anybody's actually checking on it. Whether or not that's the case I'm not 100 per cent sure. But we need real transparency and we need true - and I know you've have put it in, I have read the report, I know you've have put it in your report - but we need true engagement and we need non-segregated engagement. I am so over the fact,

and I know that Badger would also be over the fact, that there seems to be one meeting for us and one meeting for them. And I don't see any reason why the traditional owners and whoever else can't meet together as a whole. But it seems to be in unison in every State or Federal Government thing, it always seems to be that they separate and have different meetings for different ones, and that seems to be across the board. I know that Badger said that at the Royal Commission and I agree. I've heard other friends of mine say it. We are one community; we need to be seen as one community, not one meeting for one and one meeting for another.

The other thing I wanted to say is that it would be nice if the water ministers actually understood the river and how it works. And I can say that, I'm not being nasty or mean, but one of the problems is there's a bit of a - when there's a bit of a change in water ministers, then the new one comes up and really knows nothing - do you know what I mean? And I know that the majority of times I've dealt or talked with water ministers, they're really only as good as the one page brief that they've got, and if you go beyond that they really can't help you because they really don't know.

And I also think that this argy-bargy push, pull between all the States, I really believe the only way to stop that is that ministerial - like the MINCo meetings, should be open to the public. And I think if they were open to the public then that helps hold the water ministers to account. Hopefully there's less bickering over stuff and they just do the nuts and bolts of what needs to be done, rather than all the horse trading that obviously goes on.

COMMISSIONER MADDEN: Just a couple of small things. I think it's a good point around the assessment of the portfolio and the like over time, but that's something that I know it should do but obviously that will change over time as climate changes and interaction with the water entitlement system may mean there are deficits in terms of certain licences not getting allocation and the like. So that's something we can look at and how they do that over time.

I guess just the point with the wet water versus efficiencies and the return flows. I will just mention that it is entitlement going back under the efficiency programs. Now there might be some others, like recycling systems in Canberra, which is on the books as in an urban recycling water systems, so where you've got to think of how that translates to entitlement. So there are some things on the edges which would be required; detailed assessment, working through the water recovery to date. It is and it's half the entitlement generally, half the nominal savings being handed back to the Commonwealth Environmental Water Holder as they are, so it is - it is wet water.

MS HILLAM: But the problem is, and what came up in the Royal Commission, is that because of the efficiencies you're actually not getting as much water - - -

COMMISSIONER MADDEN: Yes, so that's return flow issue, which is a separate thing.

MS HILLAM: Yeah.

COMMISSIONER MADDEN: So even if you did buybacks and if I sold half my water to you and then used that money to go and invest in a new irrigation system, without any Government kick-off, I mean the same impact can happen both ways. So plenty of people I know sold part of their water and then actually invested in a better system or, you know, bought water back or whatever. So that return flows on a system level is something for the whole system, not just a program, which we have talked about and assessing that as an issue is important and it's critical again.

And I think some of this shows because some of the issues you've raised are the Department's role in terms of spending money. Some are actually the Authority's role - and this is a consistent theme so I'm not trying to single you out at all - but it's unclear for many people when it's the Department's role versus the Authority's role. So who's commissioning the Jacobs report, for example, is important because the Authority has a small role in terms of starting point, and also reconciliation on environmental equivalents but not, "Is this money well spent?" and many others. So I think it's a lesson, even from these first couple of meetings in general, that we've talked about governance, but there's just a whole process, education and awareness that has to go on early in developing these projects so people understand who's responsible for what, because that's when accountability can occur. If you don't know who's responsible, then accountability is difficult and you don't know where to go. And I just hope you don't dislike big pastoralists either.

MS HILLAM: Oh no, no. But it's - is he picking on you Bob - but no, it's also, you know like you can talk to the people and them still not be accountable. Do you know what I mean? I know because I have multiple times, but the thing is, the biggest issue in all of this is the manipulation and the lack of transparency and the secrecy around everything. It's like, you know - one of our favourite sayings and I heard Rob mention it before was - and I'm sorry Monique if you're still here, was that the Murray-Darling Basin is a toothless tiger - the Authority - and that was true, it was. Until it had to get called up to the Royal Commission and then all of a sudden it was a tigress guarding its cubs and made a stand. But it wouldn't make a stand when we were saying all this water was getting removed. Do you know what I mean? So I think, honestly, like I said, I think things need to be more open and I think as well as the ministerial council being open to the public, BOC need to be open to the public as well. And I think that if you're going to have people in to - as independent and supposed to be non-aligned and do the right thing, then you've got to make sure those people are non-aligned. I think the MDBA board definitely needs a shake-up and - - -

COMMISSIONER MADDEN: Yes, so we do have some recommendations around transparency and operation of the BOC.

COMMISSIONER DOOLAN: But in particular, I suppose from my perspective, you raised the question of an independent water auditor, so we made the suggestion that you separate the regulatory function of the MDBA from the agent of governance. And if that was done then you'd have a straight regulator, whose only job it was to actually do that, would become your - probably the equivalent.

MS HILLAM: I'm talking about right now. I'm not talking about into the future. They're saying we've got 2,000, whatever it is, gigalitres of water. I'm pretty sure we don't, and I would like someone totally independent, I don't care if they've got to come from overseas, I would like somebody totally independent to actually have a look and say, "Yes, there is this actual water here, and yes it can be used", or "Yes, there's 800 gigs here but all the rest is just paper". I'm not saying that's the right figure, but I know of two purchases that will never make - well the majority of it will never make its way to where it needs to go, to be useful for anything, and that's two that I know of. So, is there more or isn't there? I don't know. But I would like to know exactly what actual real water is there and what is actually just goanna water.

COMMISSIONER DOOLAN: All right.

COMMISSIONER MADDEN: Thank you.

COMMISSIONER DOOLAN: So that brings us to the end of the planned participants. We do have an opportunity, if there's anybody else who would now like to make any further comments, or actually having heard participants today if they'd like to make some comments, there is an opportunity now. Yes? Sorry Bob, for the transcript you basically have to come to the table.

MR NEWMAN: A brief supplementary point in relation to - what's the word I'm looking for - the sort of structured adjustment and the talk around - sorry, haven't got my thoughts quite together - there's great concern upstream about the impact on communities. I suspect the impact is nowhere near as large as imputed from some of the analyses that have been made and I think that a better scrutiny of the downsides to communities - my sense is communities are evolving all the time. The irrigation industry particularly is a dynamic industry, it has ups and downs to areas and a classic example and the excuse of the impact on community to avoid the environmental recovery for the whole river system is being made too strongly. And I would like to see better scrutiny over just how harmful or what the downsides actually are. I've seen some work done by people that suggest that there's very simplistic assumptions in terms of the reduction of capacity to create yield versus the loss of water from a district and other associated jobs. That's all I really wanted to say.

COMMISSIONER DOOLAN: Okay. Thank you for that. And as we said we'll be in Shepparton on Wednesday and I'm sure we'll get an alternative view, but thank you. Sorry?

COMMISSIONER MADDEN: I think someone hasn't spoken to us.

COMMISSIONER DOOLAN: Someone hasn't spoken? Sorry.

MS CAMPBELL: Hi, Michelle Campbell, Commonwealth Environmental Water Office. I'm assuming the reason that you didn't - with reference to the water resource plans earlier and the Lower Darling issues, I'm assuming you didn't refer to the water

sharing arrangements because that's something not under your remit. Is that correct? Because I'm wondering about the draining of the lakes is normally set out under the water sharing agreement. I understood that was - - -

COMMISSIONER DOOLAN: The Murray-Darling Basin Agreement?

MS CAMPBELL: No, I understood that the process of deciding which storages to be drawn from in different times is part of the water sharing agreement, the 1901 or 1914.

COMMISSIONER DOOLAN: Yes, the Murray-Darling Basin Authority.

MS CAMPBELL: And that's not under your remit, so I'm assuming that's the reason you didn't sort of raise it earlier when we were talking about the Lower Darling issues and the - - -

COMMISSIONER MADDEN: No. When I say the operation of the lakes and any change thereof, that's exactly what I'm talking about.

MS CAMPBELL: Okay.

COMMISSIONER MADDEN: So the rules are those but the real question is how do you work within those rules?

MS CAMPBELL: Yeah, yeah.

COMMISSIONER MADDEN: And that was the question. And the question that I'm saying is you'd have to put back to those who are running the system and making those decisions, which is has there been any change within those rules of how they operate and how they interpret those. So again, - - -

MS CAMPBELL: So you can address that in - as part of your remit?

COMMISSIONER MADDEN: So we'll be asking if - - -

COMMISSIONER DOOLAN: We can raise the issue but - - -

MS CAMPBELL: Okay, cool. I didn't hear that, sorry, in your reply.

COMMISSIONER DOOLAN: Yes, but - - -

MS CAMPBELL: I thought you were mostly looking to water resource plans as the - - -

COMMISSIONER MADDEN: But then that will be an interaction then of what does that actually mean for the Water Resource Plan.

MS CAMPBELL: I see.

COMMISSIONER DOOLAN: Yes, so the operation of Menindee falls under the Murray-Darling Basin Agreement, which is how the shares are done, and therefore changes to that, other States like South Australia and Victoria would have an interest if it changed the reliability of their supply or their entitlements. But to be frank, those two States probably don't then care about the Lower Darling, it's not their responsibility, and the Water Resource Plan is the vehicle by which the Lower Darling's flow requirements should be brought into bear, and then if that happened there would be implications for the water sharing.

MS CAMPBELL: Sorry, I just have to raise these things because as someone who works for the community all the time it's just important they understand all of the pieces and I wasn't sure that that was made clear to them. So thank you.

COMMISSIONER DOOLAN: Okay, and thank you Michelle.

COMMISSIONER MADDEN: So when I mentioned lines of investigation, you'll actually be saying how does that interact with the Water Resource Plan, and so how do you - in the Water Resource Plan it covers this area. When you actually talk about extreme events management and/or - I think it's extreme events management there because - how do you go through the process of accreditation and taking those changes into account and the impacts then on the entitlements and their security.

MS CAMPBELL: Yeah, okay, gotcha.

COMMISSIONER MADDEN: So that's for people with entitlements. But then obviously there's the critical human water needs or extreme event provisions as well. So the Water Resource Plan should be an umbrella over all water instruments that affect that area and take, you know, and draw them in. So that's why I guess why we're asking has there been any consultation, has there been a change? Now the obvious question back is the way you have managed this within the rules, has it actually shifted over time? So that's something you can look at, and if you've got the right expertise - not me but you can at least ask the question - if someone can actually assess whether that has changed or not.

MS CAMPBELL: I've been closely involved in assessing Water Resource Plans and I don't remember seeing that connection between - in there, but I'm - I might go back and look again, but I didn't see it. Yeah.

COMMISSIONER MADDEN: I think the Lower Darling is a particularly complicated one. Most of the other Water Resource Plans in New South Wales would not have to deal with this issue.

MS CAMPBELL: Okay. Okay, thanks.

MR McBRIDE: Ladies first.

COMMISSIONER DOOLAN: Okay Anne.

DR JENSEN: Anne Jensen again. One of the points I just want to raise is in relation to the Water Resources Plan for the Upper Darling. The Healthy Rivers Ambassadors went to see Senator Ann Ruston in 2016 to raise the issue of irrigators taking environmental flows that were meant to go to the Lower Darling, and she said at the time it was legal. It was described as "sharp practice" because the regulations were changed just before the plan was signed, and she said, "Nothing can be done until the Water Resources Plans come in in 2019". So I just wanted to raise that point; that there's an expectation that the Upper Darling Water Resources Plan should address the issue of the irrigators being allowed to take larger volume pipes and being able to take and store the next year's water and to take it at low flows. All of those things need to be reviewed and adjusted to ensure that there are flows to the Lower Darling.

COMMISSIONER DOOLAN: So we're certainly aware of the changes that were made in 2012 to the Barwon-Darling Plan and it's again one of the reasons why we've recommended an extension to a plan where there's really significant rule changes to be negotiated through, and that is clearly one of them. Their expectation is that some of those rule changes would be reviewed in that process, but that does have third party impacts.

COMMISSIONER MADDEN: Just to note, and our point is to ensure the integrity of proposed rules to address those issues, not to allow it just to go off into the never-never.

COMMISSIONER DOOLAN: Yes, that's right. To make sure that there is enough time for good stakeholder engagement but not, as John said, to be an open cheque to keep on going.

DR JENSEN: Okay, thank you.

COMMISSIONER DOOLAN: Okay. Robert.

MR McBRIDE: One little point that I did forget - I apologise, Robert McBride again. You know, Murray-Darling Basin Authority is given scope until - is it 26 or 24?

COMMISSIONER DOOLAN: Twenty-four.

MR McBRIDE: So literally, I mean we can collapse a whole river system before they're audited. That really does concern me. With their track record of the first five years we've really got to heighten in what, you know, what you're doing; is tell us about the efficiencies; do proper research to make sure of the proper numbers. Because if we don't get results back until 2024, God help the Darling River, it might be gone by then, and not only the Darling but the Murray. So we can look back but, you know, that's six years away. Very little - never in business are you given six years to totally destroy something and then assessed. So I guess what you're doing is perfectly right, is really make sure every dollar spent, every litre of water saved is more finely honed so that they're not given leeway until 2024. Their track record is appalling. It needs to be heightened in so that - that every dollar spent from Government is sufficiently (indistinct).

COMMISSIONER DOOLAN: That is the recommendation and we'll elaborate on that to make it clearer. Okay, thank you.

MR McBRIDE: Thank you. That was it, thank you.

COMMISSIONER DOOLAN: Is there anybody else? Okay, so then could we thank you very much for your participation in this session. I know for many of you we do have your submissions but if there's any further that would like to actually put in a late one we're very happy to receive them at this point as well.

It is really important. The draft recommendations that we have in place were based a lot on the round of the Basin that we did and the submissions that we had to our Issues Paper. It's equally important that we get the feedback on the draft recommendations and findings that we have, so that we can review them, make sure they're as tight as they can be and as clear as they can be, so that we give Government a document before Christmas that reflects to a large extent what we've heard and then, on the basis of that, what we consider to be improvements that can be made going forward. So again, thank you. Thank you for your submissions, thank you for your comments today. We do thoroughly value them and use them as we complete this report.

Now as we said, we hand in before December. I think you're all registered on mailing lists and therefore will be kept in touch with how this is going as we go. So at this point I'd like to adjourn the proceedings and the Commission will resume its public hearings in Shepparton on Wednesday 17 October. So thank you very much.

**MATTER ADJOURNED AT 3.12 PM UNTIL
WEDNESDAY, 17 OCTOBER 2018**



Australian Government
Productivity Commission

PRODUCTIVITY COMMISSION

**INQUIRY INTO THE FIVE YEAR ASSESSMENT OF THE EFFECTIVENESS OF
THE MURRAY – DARLING BASIN PLAN**

DR J DOOLAN, Commissioner
MR J MADDEN, Commissioner

TRANSCRIPT OF PROCEEDINGS

**AT PARKLAKE, 481 WYNDHAM STREET, SHEPPARTON
ON WEDNESDAY, 17 OCTOBER 2018 AT 8.40 AM**

INDEX

	<u>Page</u>
GOULBURN VALLEY ENVIRONMENT GROUP MR JOHN PETTIGREW	143-149
TEMBA ORCHARDS PTY LTD MS PETA THORNTON	149-161
LANDCARE VICTORIA MR SANDY MACKENZIE	161-166
ENVIRONMENT VICTORIA MS JULIET LE FEUVRE	166-175
BLUEZONE MR GRAHAM PYLE – CONSULTANT MR MARK HEGGARTY – GENERAL MANAGER	175-177
CHAIR OF SPEAK UP CAMPAIGN MS SHELLY SCOULLAR	177-183
GOULBURN VALLEY MR DARRYL HOGAN – DAIRY FARMER & IRRIGATOR	184-186
WEST GOULBURN BRANCH OF VICTORIA FARMERS FEDERATION & UNITED DAIRY FARMERS VICTORIA MR WADE NORTHAUSEN	186-188
MS NICOLE McKAY	188-191
UPPER GOULBURN RIVER CATCHMENT ASSOCIATION MS JAN BEER	191-206
LODDON VALLEY GRAVITY IRRIGATION DISTRICT MR KEN PATTERSON	191-206

THE GREATER SHEPPARTON CITY COUNCIL MS GERALDINE CHRISTOU – DIRECTOR MR PETER HARRIOT – CEO	206-210
MS MARIA RIEDL	210-218
YANCO CREEK TRIBUTARIES ADVISORY COUNCIL MR MARK WETTENHALL	218-226
MURRAY VALLEY PRIVATE DIVERTERS MS LOUISE BURGE	227-233
GMID WATER LEADERSHIP GROUP MS SUZANNA SHEED MR DAVID McKENZIE	233-240
MR NEIL EAGLE	240-242
MR KEN PATTISON	242-244

COMMISSIONER DOOLAN: Good morning and welcome to the public hearings of the Productivity Commission inquiry into the Murray-Darling Basin Plan. These hearings follow the release of our draft report at the end of August. My name is Jane Doolan, Commissioner with the Productivity Commission, and my fellow Commissioner is John Madden.

Before we begin, though, I would like to acknowledge the traditional custodians of the land on which we meet, the Yorta Yorta Nation, and pay our respects to Elders past and present.

The purpose of this round of hearings is to facilitate public scrutiny and input into the Commission's work and to get comments and feedback on the draft findings and the draft recommendations that we've included in our report. We have had already hearings in Mildura last Friday and Murray Bridge on Monday this week and today's hearing in Shepparton will be followed by hearings in Dubbo and Canberra next week.

At that point, after we've received that feedback from the hearings and taking into account submissions that have been made and outcomes of other informal discussions, we will then be finalising our report and aiming to give it to Government by Christmas this year.

Participants and those who have registered their interest in the inquiry will be automatically advised of when the report will be released by Government and Government does have 25 sitting days in which to table the report in Parliament after completion.

In terms of the hearing itself, we like to conduct our hearings in a reasonably informal manner, but I do remind participants that a full transcript is being taken and will be made available on our website. For this reason, we can't take comments from the floor during any of the submissions, but, at the end of the day, we'll have a period of time when people can come and either raise additional issues or further participants can actually have an opportunity to speak. As I said, the transcript is made available to participants and then will be on our website following the hearings. All submissions are also available on our website.

We do have media, so for the Country News, who are here, some general rules apply. There's no broadcasting of proceedings allowed, taping of the hearing is only allowed with permission and our staff have already spoken to the media about those rules. In line with the Commonwealth Occupational Health and Safety Act, we need to advise you of what to do in the case of an emergency and evacuation. In that case, a staff member will come and lead us down the stairs and out towards Maude Street, which is the meeting point. I think that's all.

Participants are invited to make some opening remarks and then we will move into some questions as well. I'd now like to welcome John Pettigrew as our first participant from the Goulburn Valley Environment Group.

MR PETTIGREW: Thank you. John Pettigrew, I'm President of the Goulburn Valley Environment Group. We welcome the draft report from the Productivity Commission and

we believe it goes a way, a long way, in answering a lot of questions with the Basin Plan, particularly its implementation, and thanks for the opportunity today to comment.

In saying that, we are in agreeance with the vast majority of recommendations. I've got a few here that I would like to touch on for some clarification and some comments.

Starting with the draft finding 5.1, you say there: "However, addressing these concerns requiring efficiency projects not to have any adverse impacts is impractical, and risks ruling out projects that achieve the outcomes at least cost." We would certainly support that. There's been a lot happening in this region on achieving the 450 GL. At the moment here, with socio-economic guidelines being presented by many different groups and State Governments and, in my view, those guidelines look to be designed to rule out any hope of achieving the 450. I would welcome any suggestions there on how that might be achieved on the sort of work we can do.

In 5.2, you mention there that water recovery should align with the progress in easing or removing constraints. GVEG agree with most of the recommendations in 5.2 but strongly opposes any alignment of water recovery to the easing or removing of constraints. We believe the Victorian and New South Wales Governments have purposely not acted on constraints management strategies in a timely manner in the belief that this will either delay or undermine the need for the additional 450 GL. Alignment would reinforce this strategy, reward the actions that are already delaying the efficient flows of environmental water. The removal of these constraints is required now. We could have achieved much if we hadn't had those constraints with the amount of water we have now, let alone the 450 GL.

Chapter 3 - I'm bouncing around chapters here - stick with me. Finding 3.1, a total of 1995.8 GL of the 2075 GL needed has been delivered. We question your figures there in that you go on to say that you identify 2075 GL as needed to meet the adjusted sustainable diversion limits. We don't believe this includes the 62 GL to be recovered through efficiency measures that's required to meet the Basin Plans limited on SDL adjustments to the 5 per cent overall, and I think it's just - it's not clearly identified there.

Draft recommendation 3.1, the over-recovery of water should be identified in the 2019 when water sharing plans are finalised. GVEG believes that given the uncertainty remaining over the delivery of supply projects and the timing of achieving acceptable constraints management strategies and recovery of the 450 GL, any over-recovery considerations should be postponed until after the Basin Plan's reconciliation 2024. In the Northern Basin, the situation is further obscured by the uncertainty over cap factors and changes to the flood plain harvesting regime. Any consideration of over-recovery should be delayed until those issues have been resolved and again until after the Basin Plan reconciliation 2024.

4.2, "Basin Governments should extend the 30 June 2024 deadline for supply measures to be operational." Again, we've got strong reservations with this recommendation given that the lead time already given to the development of these projects and a deadline of 2024. I wouldn't be adverse if there was a genuine, one or two genuine ones there that needed a bit

extra, but, in all fairness, I think, you know, talking over a decade to actually start planning and get these in place should be ample time.

Chapter 13, "Specific milestones are identified and clear responsibility is assigned for the delivery of each milestone. Where milestones are linked to payments, that these payments are disaggregated with a payment per milestone to provide a genuine incentive for implementation." We agree with this. Similar lines were taken in early - early in the water reform process with States and, unfortunately, a lot of those were eased and weren't carried through. You need to carry through with it, make sure that they are actually enforced.

Chapter 10, draft finding 10.1, "Some trade restrictions were inconsistent with the Basin Plan trading rules and have been removed." Any consideration of trading restrictions we're concerned about and we're suggesting they should be delayed until issues highlighted in recommendation 10.2, delivery capacities, have been resolved. I can certainly talk to that further later, if you require, but, in 10.2, you go on to say, "Basin Governments should set and publish a work plan within the next 12 months that describes how delivery capacity and constraint issues associated with changes in water use and trade will be investigated and managed." Look, we've been pushing this for over a decade.

We welcome any interest in it at all, but we certainly believe the issue to be urgent and we'd like to see timeframes on that recommendation there. It's a real issue and the Goulburn River is suffering at the moment because of it. The Barmah Choke's been long recognised as the prime risk in this area, but we're quickly seeing other streams come into it, especially Goulburn River.

I think I'll close there and open to any questions.

COMMISSIONER DOOLAN: Thank you for your submission. John, do you want to start or do you want me to go?

COMMISSIONER MADDEN: You can start, but I do have some questions, probably on the last issue of deliverability, a couple of comments around the socio-economic neutrality type of projects, just so you know. I think the other things broadly agree, maybe make a comment about the package and delays.

COMMISSIONER DOOLAN: I suppose the first question I have is that you are not supportive of extensions to the supply package but very supportive of the need to lift constraints?

MR PETTIGREW: Yes.

COMMISSIONER DOOLAN: For us, the supply package, notwithstanding there's been ten years, there's still a lot to go, they haven't yet determined and worked through the funding arrangements to actually have commencement. So, for us, the constraint projects in particular and the ones that - hydro-cues, for example, that depends on that, they will take quite a long time to do based on previous experience with Hume to Yarrawonga. From our perspective, if people felt they were important projects, you had to be practical about it

and given an extension, but then, having the checks and balances that you refer to in terms of payment by milestones. So, if that was packaged up together, if there was a credible pathway and payments with clear milestones and milestones where, you know, if you hadn't done something by year 3, then the project's a failure.

MR PETTIGREW: That's right, yep.

COMMISSIONER DOOLAN: And get declared early. If those checks and balances were in place, would you see it then as a sensible thing to have an extension?

MR PETTIGREW: Yeah, I think it would. If we were given the - if we were given the confidence that there was going to be genuine assessment of each of these projects at different - at different points of the progress, I would be much more comfortable with it. One of our strong points was the alignment of water recovery with constraints, we would not like to see that happen because I think it sends the wrong message.

COMMISSIONER DOOLAN: Partially the Plan basically, the constraint lifting was required to achieve the additional outcomes in Schedule 5 and that's why that alignment of those outcomes can only be worked through with constraint lifting.

MR PETTIGREW: I'd contend that there's efficiencies and benefits to be gained there now without the additional 450. Irrespective of that, we could have put environmental flows to much better use in the last 12 months on the Goulburn and achieved genuine connectivity with wetlands with a minimal amount of water.

COMMISSIONER DOOLAN: Just following that up, what did get missed out this year?

MR PETTIGREW: Sorry?

COMMISSIONER DOOLAN: What would have had to have changed? What did get missed out? What was the opportunity that was missed this year?

MR PETTIGREW: All we would have needed was allow us to put down a few thousands megs a day extra on top of existing flows. It was - it was a minor flood level that went through and, unfortunately, the restrictions of the Victorian Government don't allow any environmental water to go above minor flood level.

COMMISSIONER DOOLAN: I have one more. I'd like to follow up the observations on the Goulburn River.

MR PETTIGREW: Yes.

COMMISSIONER DOOLAN: And what is happening. We've heard that there has been damage to the Goulburn by continued high flows. Could you elaborate on that?

MR PETTIGREW: The problem - the problem is in a couple of areas. From an environmental point of view, we're spending a lot of money, using a lot of environmental water to develop instream vegetation. This is good, this is part of environmental flows.

We've advocated that we need to be using those environmental flows to get out of bank streams. We can't achieve that because of constraints, but in the meantime we're building up vegetation and putting a lot of effort into that. Unfortunately, the summer flows just drown out a lot of that vegetation. Now this is flowing way above what it ever would've been in summer flows under natural conditions, it's way above what's been flowing over the last 20 years through here.

The problem with our rivers we identified as turning them upside down. We've made that problem, increasing the problem, entitlements being traded downstream have to be delivered. We're questioning that. We've always supported water reform. This is one area that I think needs tweaking, but the other area of concern, if I was a downstream irrigator, I'd be concerned about my security levels as well as far as delivery in a timely manner because what's happening now is certainly not sustainable and will need to be addressed.

COMMISSIONER MADDEN: Just a follow-on on that, I mean, we've got a recommendation there, and you agree, to be more urgent. I guess I'm just a little interested in the recent history around this of where have you gone to have this issue addressed and why is it not being addressed in your perspective from an institutional response point of view?

MR PETTIGREW: Look, I'm not sure, John. I can remember presenting in Darwin on this issue over a decade ago and, since then, we've been prodding catchment management authorities, the Victorian Government, but it's only in the last few months that this has got any traction and I think you'll find today that it would probably have universal support now perhaps now that it's seen a way as restricting water flowing out of this area downstream. So, people support these ideas for many different reasons, I don't question that, but from an environmental point of view and a social point of view locally, we have some beautiful sandbars between here and the Murray and in summer now those sandbars are generally flooded, the local communities just can't use them.

COMMISSIONER DOOLAN: Just to make it very clear, some of the environmental benefits of increased environmental flows down the Goulburn River are being eroded by the need to deliver high flows in summer for extended periods of time?

MR PETTIGREW: That's our belief, yeah, yes.

COMMISSIONER DOOLAN: Sorry, I just wanted to clarify that.

COMMISSIONER MADDEN: Just a quick clarification then on the response. Again, just from the last few years, who are the people you've asked who have said whose responsibility this is to address the issue?

MR PETTIGREW: I see one of the prime responsibilities, it gets back to the Catchment Management Authority and Goulburn Murray Water, both directly linked to the Victorian Government, so the flaw is there. Politically it hasn't been an attractive area to touch on, I suspect.

COMMISSIONER MADDEN: Have they accepted that it is their responsibility in your discussions or have they said it's someone else's?

MR PETTIGREW: No, it is difficult to find whose responsibility it is for the Goulburn River, the environmental health of the Goulburn River. We know who's responsible for delivering flows down it, we know who's responsible for approving works on the river, but when it comes to the actual protection of the environment, it can only get back to the Victorian Government.

COMMISSIONER DOOLAN: You said the delivery needs tweaking and we've heard that in a number of places and, as you say, it's gathering momentum. Have you got views on the sorts of tweaking required or a process by which that needs to actually be managed or thought through?

MR PETTIGREW: The only thing I can think of is I reckon I'd declare a moratorium not on water trading out but the conditions under which water would trade out and those conditions would put a question mark on the deliverability of that water given reviews of the environmental impacts of delivering it. That's the first step I think I would take. Once I've taken that step, I'm not too sure where I'd go because you're virtually leading yourself into different classes of water, whether it was an entitlement pre-2018 or after 2018. I fully endorse water reform, water trade, but this is one of those, not unforeseen now, we've seen it for a long time, but it's an issue that's - it's not sustainable, we need to do something.

COMMISSIONER DOOLAN: Thank you.

COMMISSIONER MADDEN: Sounds like you'd tag the trades.

COMMISSIONER DOOLAN: We don't have to solve it, we just have to recommend a process to solve it.

COMMISSIONER MADDEN: Moving onto the socio-economic neutrality tests out there, because there's a number at the moment, I guess moving beyond that, from your perspective in northern Victoria from your experience, are there projects - are we talking about least cost and options, and I know EY looked at this in the broad, but are there projects that you think would have minimal socio-economic impact and actually other efficiencies still to be gained out there? Are there real projects in this space?

MR PETTIGREW: John, I think the most straightforward projects are on-farm efficiency. They always were and I think they always will be. I don't accept all of the impacts that are being attributed to those projects and some of the guidelines now for assessing that, I further query. I think you need to look at a broader picture. If you look just in one small area, yes, there might be some impacts there, but on a broader area, they smooth themselves out often. I think the most likely ones, the easiest ones, are on-farm efficiency. I think there's been some very good examples of the community here winning with that by maintaining production, even exceeding past production, without that water and I think that can go on to the future.

We're seeing - the drought that we're in at the moment with the price of water around the \$300, \$350, I would have thought that people who were working out water trading in past years and the market, I think they would settle - they'd settle for that because it is reportedly a 100-year drought.

COMMISSIONER MADDEN: My only other point is probably more a comment on the over-recovery. We have heard the message about that and I think it's an area we do need to clarify, that the timing that can be done is different in different parts of the system, so we take your point, yes.

MR PETTIGREW: I don't see how it could be done earlier.

COMMISSIONER DOOLAN: I think, just to clarify, but we'll be clearer, what we said was 2019 was to be clear about what we're going to do and not necessarily do it in 2019.

MR PETTIGREW: No.

COMMISSIONER DOOLAN: But give some notices to the approach and be clear about
- - -

COMMISSIONER MADDEN: What's the strategy to address it, yes.

COMMISSIONER DOOLAN: - - - what you were going to think about doing.

MR PETTIGREW: I accept that.

COMMISSIONER DOOLAN: No, and we accept that we didn't make that clear. We've heard that very clearly from a range of people. Okay, I don't have any other questions. John, do you have any other points that you might want to make?

MR PETTIGREW: No, I think we've covered most areas that I intended to this morning and thanks for the opportunity and all the best with the review. We look forward to the outcome.

COMMISSIONER DOOLAN: Thank you and thank you for your submission. We need to talk up, John.

UNIDENTIFIED SPEAKER: Yeah, we're having great difficulty hearing. I know it's going to be a long day, but unless we all move up to the front row, we might still not hear. You're very quietly spoken, which is nice, but I'm having great difficulty hearing you both.

COMMISSIONER DOOLAN: Thank you. We will do our best. We keep forgetting, I have to say, that these are recording microphones and not broadcasting microphones, so, please, every so often give us a reminder to speak up. Okay, is Peta Thornton here?

MS THORNTON: Yes, I am.

COMMISSIONER DOOLAN: Good. Peta, can we ask you to come up to the table and if you wouldn't mind, again, just give your name for the transcript.

MS THORNTON: Absolutely. My name is Peta Thornton, I'm here as an individual and a representative of my own company, which is Temba Orchards Pty Ltd, stone fruit growers in the Swan Hill region. I'd like to thank you for the opportunity to speak. I got a late berth here, so I'm unfortunately not as prepared as I'd like to be, but I apologise for that and I hope that I can make some points that are worthwhile.

As I said, I'm from the Swan Hill region. My father's family and my husband's father's family were both soldier settlers in irrigation districts, my father's family in Woorinen, which is where we now farm - sorry, my husband's father's family in Woorinen and my father's family in Robinvale. I grew up at Nyah, which is between Swan Hill and Robinvale. My parents owned a mixed business in Nyah, which is a small irrigation community. That was in the sort of late 70s and through the 80s into the early 90s, so I'm quite familiar with the region between Swan Hill and Robinvale.

What I experienced as a child, I actually grew up living next door to a river red gum forest. The community very much revolved around the wetlands and the forest in that district and also the irrigation industry that was centred around that area as well. It was vibrant, we experienced flooding in those forests most years of my childhood, lakes were often full, not always full but often full, and it was vibrant, it was a wonderful childhood, in fact. As I say, we had a swimming pool over the back of our business and we had the forest down the front, so our childhood was absolutely wonderful. The river red gum forests between Nyah and Robinvale are an absolute treasure, a place of natural beauty that should be protected and the ecological values of flooding which was there early in my childhood - I'm 46 years old - and it's hard to believe that this space is changing so much in my lifetime. There are values there that are absolutely necessary to protect.

What the river system delivered during those times was good water quality. My dad's stories of growing up, they fed the family often on fish from the river. That was one of his jobs as a child, going down after school to fish in the river and bring home the fish, which they did on a regular basis. The river, the water quality was, you know, very clear. It's not so now, we've changed the system very much.

I went away to university, I will say, and studied science and natural resource management before coming home to work in that field and then I married into a farm and now run that farm. We grow over 200 acres of stone fruit, we have 218 ML of high security and some low security water. We are highly dependent on temporary water. We own about half the water we need to produce our crops, so every year, we're out in the market buying that temporary water.

Observations as an irrigator since the Murray-Darling Basin Plan and Millennium Drought in Swan Hill, I just want to quickly talk to that. We, as irrigators, need to have a more honest conversation with our nation about the Murray-Darling Basin Plan. I strongly believe that irrigation communities have everything to gain in terms of the long-term health of the rivers which have nurtured our industry for decades. There has been plenty of water

under the bridge since the Plan became law in 2012. The Millennium Drought is well past. Good flows have provided for good allocations and export market access for grapes, citrus and now stone fruit have improved the situation for many of us.

Time might have allowed for gradual adjustment to change, but, unfortunately, in many cases, it has not quietened the agitators or improved the understanding in the community about this issue.

I acknowledge there are still issues in dairy. We have not heard - hang on, sorry, I'll go back to this. "The Murray-Darling Basin is killing communities" is what we so often hear, but the Plan has, in fact, injected billions of dollars of Federal funding into this region for what continues to be a State-managed asset. Top dollar for water buybacks which are voluntary have helped many irrigation businesses with succession planning, exit strategies, superannuation contributions and consolidation of holdings. I know many people who have taken advantage of that, but those good stories don't get out there. All we hear is, "Buybacks have been terrible for our communities", but people have taken them up and they have been able to consolidate and expand their businesses because of it.

"The negatives of water trading should be blamed on the environment." Water trading was initially established to help irrigators consolidate rights in low allocation years and later widened as an efficiency measure. I don't think water traded to the environment should be seen as leaving the district, which is what we so often hear. In fact, Lisa Neville only put out a press release yesterday or so saying, you know, "No more water to leave the districts for the environment", but, to my mind, we should be promoting that. It is not leaving the district, it is, in fact, flowing through the rivers in our district to keep them healthy. Isn't that what the Murray-Darling Basin Plan is all about? But we don't promote it that way, all we do is fight.

Money has also been injected into upgrading irrigation infrastructure, efficiency measures, et cetera, so irrigators have been quite well looked after along the way and there are many people in the community who are struggling more than irrigators and who do not have their finger in the pie of this irrigation economy. They deserve a healthy river and therefore they deserve efficient rollout of the Murray-Darling Basin Plan which, you know, that's what we're here to discuss is that happening.

That leads on to my discussion points now. That was kind of a brief intro, if I haven't gone over time too much. As I say, that, to me, leads into my discussion point 1, which is lack of leadership and lack of good information in our communities. I would support Productivity Commission recommendations which strengthen the State's dedication to this Plan, which is supposed to be, you know, a landmark plan - took a hundred years to get it - and yet we don't have good leaders out there in the community promoting it and actually broadening the understanding of why we needed it in the first place.

There is a lack of good information in the community about issues like river health, water quality and why we actually needed the Murray-Darling Basin Plan in the first place, how rivers work, why floodplains are important. More effort needs to be made there. That would be money wisely spent if this complex issue was made more palatable or more

understandable to the rest of the community because the community are confused, they do not understand what the risks are, what they are potentially losing if we don't deliver on a Murray-Darling Basin Plan.

Lack of trust in institutions managing water is a major concern, obviously, through all things that came out in 2017 re Four Corners, Lateline, et cetera. There is a lack of trust. I had great high hopes for the Murray-Darling Basin Plan and my trust is waning considerably. In this complex space, communities are confused and they don't know what to believe.

Unless you are involved in irrigation, you look at the river, it looks okay flowing through the towns. They also see a lot of irrigation development going on. Certainly in our region going from Swan Hill across to Mildura, they see huge amounts of development, so it seems like there's plenty of water out there. Confusion reigns.

The community does not have the information it needs to exercise its democratic right around this issue. There are reports that are commissioned which are then promoted. We recently had the Murray River Group of Councils - I found a video on Swan Hill Rural Council's website which was really bad-mouthing the Murray-Darling Basin Plan and saying how it's been terrible for communities, which was a reflection of a McGowan report that was apparently paid for by DELWP, and it made no sense to me. The video seemed to be a group of people stating their opinion and it was being promoted by the Swan Hill Rural City Council. Is it credible information? Is it promoting something that is actually real that is tested? I highly doubt it and I'm really in favour of getting the right information out to our communities so the community can actually make proper decisions about this.

We need institutions we can trust independent from Government on this critical issue. I guess that sort of speaks to the recommendation that you put about Murray-Darling Basin Authority being sort of split. I would support that.

The discussion and the debate is irrigation-focused, as I said, it's quite a selfish debate when we just think that our communities are all about irrigation. It's not all about irrigation. The river delivers good quality water, water we need to be able to drink, water our grandchildren need to be able to drink. We need a community where our cultural sites are protected. The indigenous history and heritage, the cultural heritage of our region is immense. What wealth do the Aboriginal people of our communities gain from irrigation? At this point, none, and, you know, it's embarrassing standing up in public forums that we've held in Swan Hill and all we are squabbling over is irrigation when, in fact, indigenous people have very little out of this and if we don't deliver on a healthy Murray-Darling Basin Plan, they will have absolutely nothing.

Politicians start off a good debate and divide communities. It's not in their interests, I suppose, and that's why Government needs to be at a distance from this debate. For example, when Barnaby Joyce came down and was pitting the Greenies against the irrigators saying he's split water from, you know, the environment portfolio and, you know, we're all living in the same community and we need to be able to get in the room and talk about it together, not be enemies, we won't agree on everything, but at least if we've having

open, honest discussions. That was like high treason what Barnaby Joyce did on that day, coming into a community where this issue is so important and we've actually made some ground, to be saying things like that where you're sort of pitting communities against one another, I think is terrible and it takes us back, you know, years and years and years and therefore costs us money.

Going to my next discussion point, socio-economic confusion. I guess the implementation of the Murray-Darling Basin Plan is being won or lost on the grounds of socio-economic issues or the effects of. I think they're very short-sighted, they need to be more long-term, there needs to be more long-term study of if we don't have a healthy Murray-Darling Basin Plan, what will happen. I find it difficult to understand why there's not more irrigators who stand up and say how much we need not just the Murray-Darling Basin Plan but the full extent of the Plan and enacted in the spirit that it was agreed to initially.

We have had the Ernst & Young report which was commissioned and then almost shelved or hidden which said that we could recover the 450. I believe we can. Too many other reports commissioned by other organisations and promoted in the community. What do we believe? It's difficult to say, but certainly we need better socio-economic study of the ecosystem services, tourism benefits, cultural, health, recreational and spiritual services of a healthy river system and better long-term costing of impacts to the irrigation industry of potential poor water quality if a healthy Basin is not delivered.

Okay, next talking point is the Swiss cheese effect. Governments argue that irrigation communities cannot withstand further water recovery through buybacks as a reason to not deliver the full Plan. However, those same Governments allow unbridled new irrigation development to occur without any permanent water to be secured against that development before it goes ahead. That in itself creates a Swiss cheese effect. Water is moving out of communities. If not for the Basin Plan to water new permanent plantings from Swan Hill to Mildura, from Swan Hill to Hay - they're absolutely everywhere - I called up just to confirm the rumours that I'd heard that you don't actually have to secure any permanent water before you get the go ahead to do a huge development of, say, for example, almonds, and that was absolutely the case. I got that straight from the Department of Ag in Mildura that, no, I can secure water any way I like, the temporary water, fine.

Well, this year, the cost of water is at an unprecedented high when we have not been having water buybacks for the environment, so why? Water brokers, you call them up to see when you should buy your temporary water and they're, "Oh", you know, no one has any idea what influences it or why it's happening, but if you're going to allow 7,000 acres of permanent plantings to be developed without any permanent water attached to them, surely that's going to heavily influence how much temporary water prices are. You need to have some sort of limit or planning restriction that measures development on how much water is actually there, the free market needs to be cushioned or the effects of the free market on existing water users and the environment needs to be cushioned, in my belief, by some - you need more permits to put up a carport on your house than you do to do a new irrigation development between Swan Hill and Mildura. That's not a joke, that's actually true.

I was at a water forum in Mildura on Thursday night and the sitting member, Peter Crisp, he clearly stated that the free market is all that is required and we cannot meddle in the free market, but, on the other hand, we could not possibly deliver the full Murray-Darling Basin Plan because of the effect it would have on the water market. To me, that's a double standard, it's a lie to the community because, on the one hand, you're letting the effects of new irrigation development - you're creating the same effect on the water market and existing users as you would, but at least the Murray-Darling Basin Plan has a public good.

I'm probably getting close to the end of my time. I just add that the water bought for the river system should not be advertised, particularly by the water minister, as being taken away from communities. In fact, it's purchased for the communities and is flying around the rivers and streams and wetlands and keeping them healthy. It is water owned by the nation. Better effort should be made to explain this rather than repetitive use of slogans.

There is also the influence of investors in the water market. We don't seem to mind about that at all, but we do mind about the influence of a healthy river or policies that will create a healthy river, their influence on the water market. It seems like a double standard.

The last discussion point is SDL adjustments. I would support any Productivity Commission recommendations that encourage better testing for the SDL adjustment projects. The adjustment mechanism was premature, in my belief, in that it is unwise to adjust the water recovery target and spends huge amounts of money without understanding first the effects of the recovery that we have had to date.

The SDL projects are costly in implementation and the risks they pose to communities, they are largely untested and community consultation was ineffective. I went to a community consultation - I've been involved in this over a number of years - I went to the community consultation last year in Kerang on the SDL projects and we heard absolutely nothing about the SDL projects that were moved forward to Parliament actually agreeing to projects that there was a lack of information on. Now, whether or not there are some projects in there that are worth doing, we don't know. There are some certainly that aren't worth doing, in my mind, but we don't have the information that we need to make that decision.

I will say that the Mallee CMA have made some effort to try and give us more information on that, on those projects that they're proposing. It's a sad situation that those projects are tied to a reduction in the water recovery target. It's difficult to - I cannot agree to a set of projects that are tied to reducing water recovery across the Basin because you don't know if the water recovery done to date is actually working. You know, have we done enough?

It seems as if the SDL, if anything, was just premature and the South Australian Royal Commission seems to be making similar comments in that we needed to - there may be unlawfulness in the way the SDL adjustments have been enacted.

Equivalent environmental outcomes from SDL projects is a bit of a myth and it was actually admitted to us by the Mallee CMA that it's not equivalent environmental outcomes across the whole district, it's for that specific site of that project. So whilst there may have been projects, may or may not have been projects that they were suggesting we should agree to

throughout our CMA area, it meant that there would be reduced water in the end and some areas had absolutely no guarantee of water. The idea was that where an SDL project was being enacted, there would be more likelihood of that area getting water than if an SDL project didn't happen there, but we don't understand, under the current water recovery situation, what would happen if - you know, how often that would be flooded if the SDL project didn't go ahead. Do you understand what I mean?

COMMISSIONER DOOLAN: I think so, yes.

MS THORNTON: So certain areas will have no - certain lakes, certain forests will have no water at all guaranteed for perhaps the future as we know it. They will change considerably, so red gum forests could be red gum forests, could be ephemeral lakes will change because they won't be flooded any more, but we don't know exactly how much or how little they will get under the current scenario, but we're being asked to agree to a different scenario altogether.

So, SDL adjustments, I have advocated we should be pausing, we should be pausing the SDL adjustments until we understand better - pause SDLs until better outcomes with metering and compliance across the whole Basin until we better understand what has happened with the current water recovery situation, and lift the cap on buybacks and keep it as an option because I think it's undervalued and it's a cheap way of getting water back and communities will tolerate it better than you think, in fact, they're tolerating it already because the water's already leaving communities for new irrigation development. I'll leave it at that.

COMMISSIONER MADDEN: One thing I did want to talk a little bit about, given your location and experience and the planning around forests, watering and the like, you touched on it right on the end there a little, too, about the SDL projects and some of those are - Menindee's one we've heard recently.

MS THORNTON: Absolutely.

COMMISSIONER MADDEN: And I think Yanco Creek is another we might hear later. There's obviously changes in the local environment and the benefits are then for the wider environment, and so there is a trade-off and there's trade-offs everywhere.

MS THORNTON: Yes.

COMMISSIONER MADDEN: I just wonder, your experience then in forest watering, planning for that, and you talk about the trust in institutions, so what do you see as an adequate, a good, a better arrangement? Is that something that actually has worked quite well, because you're obviously a local community.

MS THORNTON: Yes.

COMMISSIONER MADDEN: Dealing right on the forefront or the interface with environmental watering. You then talk about some of the benefits being explained wider,

but even at that local level how is the watering conducted in the forests that you are aware of? Is there involvement, engagement, do you understand the trade-offs and how they are made?

MS THORNTON: Absolutely. I would say there's not enough information and there's a lot of misinformation in the community. The people who are working in the environmental watering industry, for want of a better word, are doing a great job and trying their best to - they're trying to do the best with the water that they have and the system that they have to deliver it.

For example, in Swan Hill, after the initial bringing in of the Murray-Darling Basin Plan and all the hoo-ha that went with that, it's like everything went quiet, business as usual, and the Millennium Drought sort of ended. To my mind, business as usual went on. Everything seemed to be fine. The only thing that you would hear was the big issue of blackwater and there was a huge amount of misinformation about what blackwater is because, to my mind or my knowledge, says that there is a huge danger that we'll continue to have blackwater if we don't have enough water to flood these forests and wetlands on a fairly regular basis. However, what the community was saying or hearing and what was being promoted was that, in fact, environmental watering means blackwater. So, there was a lot of misinformation about that.

The people who are trying to manage environmental water are trying to do the right thing. I'm seen as an ally to that, but, at the same time, I'm looking at the whole of Basin approach and I'm not comfortable with the idea of reducing the amount of water recovered through buybacks for projects that I'm not sure - I don't know enough about, and I'm not comfortable with the idea that you trade off a system that was working fairly naturally. Admittedly, it was a regulated system, like through my childhood, it was a regulated system, but there was enough water in it that it had quite a natural flow in the sense that water flowed over the banks, flooded these areas, and that delivered beautiful environments.

We live in a very arid environment and that created a great childhood. There were places where you could go and swim and, you know, Aboriginal people lived in the forest actually in my childhood, they lived in the public forests and quite often there were people like that. So there were multiple benefits, I guess, to the whole community with that. I feel like it's a great risk, you know, even just in terms of water quality, to reduce the amount of waters flowing in our rivers. I don't see the evidence that it works. I'd like to be able to see the evidence. If the evidence is there, we need to see it, that these projects can deliver the same kind of water quality.

2016 there was a huge algal bloom right through the river system. To my mind, you need flows to mitigate algal blooms. There's a potential link between algal blooms and motor neuron disease. You know, all this kind of stuff that doesn't get really talked about is really, really important and I think there's a lack of information.

The people who are trying to do the environmental water are doing the right thing with the resources that they have, to bring it back to your question.

COMMISSIONER DOOLAN: Could I follow up because much of what you have talked about is either a lack of information or a lack of credible information or information tied to vested interests.

MS THORNTON: Yes.

COMMISSIONER DOOLAN: Then also about how does the community get together and actually - so two elements of really what is appropriate community engagement and consultation, particularly on the SDL projects I think you have referred to.

MS THORNTON: Absolutely.

COMMISSIONER DOOLAN: And then how do we get good information out there? So, looking forward, and we're at the start of these SDL projects, still really to set up, I think, the community engagement processes.

MS THORNTON: Yes.

COMMISSIONER DOOLAN: And the processes for generating the information, the detailed business cases that need to go to the next stage.

MS THORNTON: Yes.

COMMISSIONER DOOLAN: What do you want to see in this next 12 months that actually would be much better consultation and perhaps the provision of information that would be more trusted, if you like?

MS THORNTON: If I try and bring it back to our region because, I guess the Menindee Lakes project, it would be easy to run to that, which sort of seems to highlight all of the negatives of this whole process so well, but with regards to our region on the SDL projects, for example, in the next 12 months, we've sort of said to the CMA, "We would like information on" - okay, so we've got some information on the specific sites of the SDL projects, but we also want information on the rest of the forests and wetlands throughout our region that we know of and how they sit going forward and how often they would be likely to get water, how often they would be likely to get water under the current situation or under an adjusted Plan.

In honesty, I still don't fully understand, and you sort of have to scramble around in your spare time to try and get a handle on this information, is what - I know what the forests and wetlands looked like in my childhood and going forward sort of through the Millennium Drought, but sort of yet to try and understand exactly how it is going to be with the Murray-Darling Basin Plan, the amount of water recovered, exactly what it's sort of going to look like, and that's exactly what we need to understand before we can agree to it. I think we need to understand that before we adjust the Plan, but we've already adjusted the Plan. That's what we have asked for from the CMA and, to my mind, we also need that to be taken to community and presented without the rush or the threat of, you know, that funding.

When we had a session with our CMA, sort of there was the idea that, "Oh, these projects have been in the pipeline for three or four years and, you know, we're waiting for this - we need this funding, so many million dollars of funding, to go ahead with this. So there was a pressure there, there was definitely a pressure to agree to these projects because, you know, the CMA was waiting for that funding. That's why I think it would be better to sort of pause the situation and let us get this information and make the right decision without having that pressure of - I know that's probably - - -

COMMISSIONER DOOLAN: Well, the amendments have been made.

MS THORNTON: Yes, that's right.

COMMISSIONER MADDEN: We do have to be clear that they're not passed yet, it's a reconciliation process.

MS THORNTON: Yes, okay.

COMMISSIONER MADDEN: So, just to talk it through, the supply projects have basically gone into a process that hasn't adjusted yet. The adjustment actually happens in 2024 after reconciliation.

MS THORNTON: Yes.

COMMISSIONER MADDEN: So it's very likely that the number of 605 will change.

COMMISSIONER DOOLAN: And it is important to note that we have recommended a gateway process so that when they do go to detailed design, they are assessed to see are they likely to meet the environmental outcomes that people thought.

MS THORNTON: Yes.

COMMISSIONER DOOLAN: And about their price and a range of things as well. So there's still - - -

MS THORNTON: Opportunities there for - - -

COMMISSIONER DOOLAN: Well, there's gateways.

MS THORNTON: Gateways.

COMMISSIONER DOOLAN: To be assured that it's either a good project and worth going forward or to cut it out at that point.

MS THORNTON: Yes.

COMMISSIONER DOOLAN: So that's still to happen.

MS THORNTON: I support that greatly because - - -

COMMISSIONER DOOLAN: The other thing that we recommended was you do look at this as an integrated program of packages and so what is the impact of the whole lot and manage them that way as well.

MS THORNTON: Yes.

COMMISSIONER DOOLAN: Once again, part of that is good community consultation going forward because we have definitely heard it's been very patchy in a number of those projects.

MS THORNTON: Yes, absolutely. I mean consultation - so often consultation is just coming to tell a community what is going to happen rather than actually taking on board local knowledge, local opinion and thrashing it out, you know. We don't have many opportunities where we can all get together and freely talk about it and share information and learn from one another. We've held three, and we're planning another community forum in Swan Hill, where we've had great open debate, you know, we've had a room full of a vast array of opinions but a passionate - I felt like I was trying to do the job of the Murray-Darling Basin - what I thought the job of the Murray-Darling Basin Authority would be, more so in terms of trying to encourage open debate, learn from each other, share ideas and make the policy the best that it could be, rather than, you know, just sort of bits and pieces in the media and vested interests.

Let's not forget I am an irrigator, my whole income comes from irrigation and I just think that, you know, we've got such power in this debate and that we need to be really honest about it and deliver - make sure that there is still a healthy river going ahead.

COMMISSIONER MADDEN: Just a quick question, and it may be out of the community discussions you have had as regards new development and the issues of deliverability, et cetera. For the sake of discussion again, it is a little bit different to the Swiss cheese effect because that's relating to generally joint infrastructure schemes and kind of higher costs being left behind, but I do understand the issues of development.

MS THORNTON: Yes.

COMMISSIONER MADDEN: And then the movement of water. What actually policy responses are there because even a development, they might tweak things, but that's not going to stop new development necessarily if you have a control where you have to buy permanent water. That could enter the market more and drive the price of permanent water up. This is a fine line

MS THORNTON: It is. I guess I - - -

COMMISSIONER MADDEN: - - - because, you know, any policy could capture you if you don't have enough water to grow your crops.

MS THORNTON: That's right.

COMMISSIONER MADDEN: Given you're in the temporary market. So there's a lot of unintended consequences that can occur.

MS THORNTON: Yes.

COMMISSIONER MADDEN: So I can understand why people are moving slowly, but I think the options should be on the table in some process and that has to happen urgently, as we heard earlier. What are some of the options that actually people are talking about?

MS THORNTON: I was surprised. I haven't heard anything. In the public forum that I was at in Mildura on Thursday night, there were six candidates up there and they were asked this very question and no one - well, Peter Crisp stated straight out that they couldn't get involved in the water market and the free market needs to just deal with it. I personally just came up with the idea that - I was surprised that there wasn't a need to at least, you know, perhaps have a third of the water that you might need to irrigate a particular development secured against it. I guess, to me, allowing any amount of irrigation development suggests that it's an infinite resource or something and you can just put in as much as you like regardless of how much water is actually there.

I had also heard that many of these huge corporate sort of developments have one-third permanent water, one-third temporary water, one-third lease sort of policy, but that was not a planning process, it was something that they tend to do. I thought it would be, you know, something that you could ask that they've had to secure at least a third. That would just make it a gentler process of water changing from, for example, perhaps this district to that district up there, it would make it more gradual in my mind and give us a better idea of what the needs for water would be, because if you have developments out there that have no water right, how do you understand how much water is actually required?

I realise that that's the risk that the developer takes when they go and plant this stuff, but, at the same time, a corporate agri business may have, and I would argue will more often than not have, a better chance of, or better money behind them and better able to buy temporary at a high price than perhaps we would be.

COMMISSIONER MADDEN: Has the local community had the opportunity to actually communicate that issue to the Authority?

MS THORNTON: We are setting up a meeting with Swan Hill Rural City Council, so I - no, I don't believe so, but there is a lot of talk. Even the South Australian Royal Commission had a public hearing in Mildura and that was very much the flavour of the whole morning of that public hearing, the concern in that community, I guess, because a lot of it is in that region, but it's not just affecting - it's affecting actual smaller traditional farmers in that region as well, not just farmers here in this region, you know. It's sort of that corporatisation of food production.

COMMISSIONER DOOLAN: Thanks, Peta.

MS THORNTON: Thank you very much. Again, I apologise for my lack of preparation.

COMMISSIONER DOOLAN: I would like to call Sandy MacKenzie from Landcare Victoria as the next participant.

MR MACKENZIE: Thank you.

COMMISSIONER DOOLAN: Just introduce yourself for the transcript, please.

MR MACKENZIE: My name is Sandy MacKenzie and I'm speaking on behalf of myself as well as Landcare Victoria. I must say welcome back, Commissioners Jane and John, to Shepparton and I know how far you've been travelling in a very short period of time. The last time you were here was in March and I think you're doing a fantastic job because it's not often that we get people of such skill and experience coming out from Canberra and going from one end of the Basin to the other, so thank you for that.

Also, I've been preparing a masters of ceremony speech for my niece's wedding, so if I lapse into "Cheers and stand for the bride and groom" - - -

COMMISSIONER DOOLAN: We will have the odd toast.

MR MACKENZIE: So, yes, I was a small irrigator on the Goulburn River at (indistinct). At one stage it was under-farmed, but today, as I did before in March, I'd like to make reference to the Lower Darling. I do so because I do have a personal connection, but also because I've been a member of the Board of the Goulburn Broken CMA. That CMA, much to the credit of those two gentlemen over there, Chris and Carl, have developed a tristate alliance across three States and one of the members of that alliance is Western LLS in New South Wales, which covers the Lower Darling. I'm also on the Goulburn Broken Water Services Committee at Goulburn Valley Water and I'm on the Members Council both of the National Landcare Network and Landcare Victoria Incorporated and I had some time as the Federal Member for Calare in New South Wales in the Fraser/Anthony Government and Calare covered the upper reaches of both Macquarie and the Lachlan Rivers.

With that personal connection, and the connection is a person who managed huge stations on the Lower Darling in the early 1900s, and I have wonderful photographs and records of those days, which I ought to mention, and one of those leases went from the Darling to the South Australian border, 140 kilometres.

The draft report of the Commission refers to indigenous culture and the need for Aboriginal heritage impact statements. Without belabouring the point, I would like to point out that the Darling is also a national icon in our European settlement history and I am titling my little talk "The Darling River, a National Icon but now a National Disgrace".

Our national heritage and culture, whether it's Burke and Wills or Charles Sturt, but when one looks at the history, and I've got fabulous photographs here of the paddle steamers, a barge with 1,050 bales awaiting steamers, another photograph here of 27 men employed

washing wool in the Darling at Netley Station with a paddle steamer and a loaded barge about to depart, I think we have to take into account that there is this wonderful distressed waterway that is very much part of our history. And quite extraordinary stuff, you know, one paddle steamer actually travelled from the Darling up the Barwon to Mungindi, a distance of 2,000 miles from the mouth of the Murray.

In 1991, we probably will all recall there was a huge algal bloom on the Darling. It extended for a thousand kilometres along the Darling and the consequent death of livestock and threat to human health provided a real wake-up call to the Australian community and, together with the condition of the lower lakes, it gave impetus to the Federal Government at the time to, in due course, implement the Water Act of 2007. There was great enthusiasm from the five Basin States, overwhelming in the Federal Parliament of 95 to five and the MDBA was launched with a huge taxpayers' investment of 13 billion, of which five has been spent or committed.

The MDBA website headed "The Plan for the MD Basin" in its very first paragraph states: "The rains, rivers and aquifers of the Basin provide essential drinking water for the more than 2 million population of the Basin as well as water for urban recreational, industrial and agricultural activity."

So, how have we gone, after ten years, towards achieving that very first objective of essential drinking water? Two other photographs show the Darling just six weeks ago in Menindee, which I can pass over. The first is at Tolarno and you can probably even see the blue-green algae on the river from Google Earth. The second is the Darling of just a few weeks ago at Netley Station a little bit further upstream. The last photograph shows New South Wales water technicians surveying the depth profile of the Darling at Netley in order to establish where the temporary block banks are to be installed to provide back-up of the barely flowing river for stock and domestic supply.

These block banks currently being installed are a number of temporary earthen dams with gate valves placed across the river to a height of some 3 to 5 metres, each costing between \$350,000 and \$450,000 according to the New South Wales Water people that I was talking to, and we had an informal conversation, they didn't know who I was. They are to back up the barely flowing river to provide for stock and domestic supplies, the lowest one being downstream from Pooncarie, the others extending upstream to near Menindee. They are temporary measures and are to be removed when high river or flood is expected, again at a cost of hundreds of thousands of dollars.

The sample taken from the river at the village of Pooncarie and the smaller samples, which I have here, I distributed these to Members of Parliament. I was sitting in the Speakers Gallery on the day that actually turned out to be Prime Minister Turnbull's last Question Time, so, as you can imagine, they did have a few other things on their minds on that particular day, but I did distribute those and I said, "It's a tasting sample from Pooncarie town supply, and that, see morning tea is coming, was the actual Darling River at Pooncarie as of a few weeks ago and it's what most people are washing in and what livestock are drinking on the Lower Darling on 10 August." As I say here, "Have a smell, better still, have a taste."

I don't wish to take up too much time, but I want to congratulate the Commission on its first assessment of the effectiveness of the implementation of the Plan, in particular its recommendations regarding the Authorities' role in ensuring compliance from the Basin States on water take rules. It's very easy, as some Members of Parliament say, "Well, of course there's a drought, that's the result of the drought." The drought has certainly exacerbated it, but it's not really, and we all know that. We all know that, as the Commission states in its draft report, an overwhelming number of participants to the inquiry indicated that stakeholder confidence has been rocked by concerns that some Basin States have been lax - and that's a moderate word - in ensuring compliance with water take rules, and the Commission is sufficiently concerned that it recommends a new independent Commonwealth statutory regulator be established and that the Federal Government enact laws and regulations to achieve compliance.

I do say "Best of luck." I wouldn't hold my breath about it because the States will become very defensive, but it has to happen and I congratulate the Commission for actually taking that stand.

I don't want to run over time. The Commission is well aware of issues such as the proposed Menindee Lakes Water Saving Project, which was mentioned by the previous speaker, and the new pipeline from the Murray to Broken Hill costing \$470 million, bringing the total projected cost to near one billion. Now, if you take into account the cost of the Menindee Lakes Project and the infrastructure there, the new pipeline to Broken Hill, the \$78 million paid to Websters at Lake Tandou and a few other things, you come to a figure of nearly \$1 billion. That compares to NVIRP, the Northern Victoria Irrigation Renewal Project, of \$2 billion, and that is projected to save 430 GL.

That billion dollars in the Lower Darling at Menindee is going to save 22 GL and I just think that's an issue - I may be wrong in my figures, but they seem to be the published figures - that seems to be a gross misuse of taxpayers' investment and it has resulted in, from what we can see here, no actual progress towards that original paragraph in the MDBA statement of providing fresh, safe, secure water supplies on what is, I believe, a tragedy of the Darling. Thank you.

COMMISSIONER DOOLAN: We were in Mildura last Friday and we did hear significant comments from participants and concerns about the Lower Darling. Our recommendations have said that needs to be sort of sorted out through the relevant water resource or water sharing plan. From your perspective and your connection and your hearing, has there been any discussion within that Plan of minimum flow requirements and what needs to actually be included in that Plan to give some confidence that the condition of the Lower Darling would be dealt with?

MR MACKENZIE: I think it comes back to the effectiveness of the legislation, perhaps, of the MDBA. It seems to be, sadly, in this sort of context, an abject failure because it does not have the power - let's face it, we all know that when the New South Wales Minister said that the Menindee Lakes Project to save us 22 GL is going to relieve upstream irrigators mostly of the requirement to secure environmental water. Now, Cotton Australia

is in full - they fully agree with that, absolutely, and so you have to ask the question, the Minister for Water at the time - Federal - said that this would provide water for the environment that doesn't have to be otherwise taken from irrigators, but then it's a fair question to say, "Has that in fact enhanced the environment of, anyhow, that particular river?" And it hasn't.

It's a function of the legislative and regulatory powers that you are anticipating hopefully may be changed to ensure, for example, compliance, is the responsibility of the Basin States, is somehow monitored and imposed, and I don't know how that question - you have to framework legislation and you have to have the cooperation of the Basin States, which, if you look at the relationships between Federal and State Governments, it's quite a big call.

COMMISSIONER DOOLAN: I suppose from our perspective again, taking on board your comments, but the Menindee Project is still at its concept phase and it will still have to go through its detailed development and gateway before it actually gets funded and water resource plans have to actually be accredited. The Lower Darling is included in the Lower Darling Mid-Murray Plan.

COMMISSIONER MADDEN: Murray-Lower Darling, yes.

COMMISSIONER DOOLAN: The Murray-Lower Darling Plan, which obviously we have yet to see, but the Menindee Project goes to things that are related and they are under-developed now, so it is really trying to get a sense - we've said that's the place that this needs to be solved, but if there's opportunities to be more specific about what we think the community would want to see coming out of those two processes, it would be good to actually have that.

MR MACKENZIE: Yes, I agree, of course, but I think there are so few members of the community, for a start, which is easily ignored politically. Some Members are very outspoken and not necessarily assisting in the process, as you would know, but it is a small area of affected landholders, but I think it gives a real indication of how effective or ineffective the whole structure between the MDBA, the Federal Government and the States are.

In terms of actually providing the data or the records of what is necessary in order to maintain an effective flow and to keep those landholders secure, I can't ever give that data, but New South Wales Water is certainly doing some what would appear to be rigorous investigations as to the profile, but, at the moment, when I met them a few weeks ago up there, it was primarily to work out where these block banks would go rather than the longer term process of what is required.

COMMISSIONER DOOLAN: All right. John?

COMMISSIONER MADDEN: I guess the only comment is I think I agree with the comment that this is where a lot of issues come together. It's the intersection between plans, it's actually the interface between operating rules and then water sharing plans, so how you manage the storages and the like. It's an example of local environmental benefits versus

wider benefits downstream, you know, trading those off and poor communication, stop/start processes because of the constraints around supply projects and how they have been progressed as well.

So there might be a small group but there have now been representations around this issue in three different hearings that we have held to date and we are taking on board our recommendations and potentially examining those and making, I guess, some more detail around processes, because I think it is an example.

I guess, for me, just one comment that you may want to comment on is the lack of information. Is this drought, is it non-compliance in the Barwon-Darling, is it the operation of the lakes and their drawdown, whether it be changed? The fundamental failing that I see is no one can actually answer that question and someone managing a resource should at least have addressed that issue through a process, started investigations, you know, as pre-work for any response.

So, I think, a little bit like the question before on deliverability, like who is responsible? Is it something falling between the cracks? Is it that people are deliberately allowing stuff to fall between the cracks or just that everyone's busy? I'm just wondering from your perspective and your interactions with people again, who actually owns responsibility in your discussions to date, or has everyone pointed the finger?

MR MACKENZIE: Good question. That's the point I'm making. In terms of inadequate data, I don't know if any, whether the Authority or your inquiry, can say how much water in Northern New South Wales, for example, is illegally taken, how much and when, how much is taken because of poor metering or lack of metering. It seems extraordinary to me - Carl, I think I'm right in saying that there's barely a litre of water in this Goulburn-Murray irrigation district that is taken that isn't metered - he ignored it - and that's an extraordinary situation that's happening up there, so how on earth can you get that data if (a) certain Basin States might be reluctant to provide it or they don't know and we don't know, so until we get that data as to whether these are the impacts consequential on things like the Lower Darling, I couldn't agree more.

The thing that concerns me more is the effectiveness of the regulatory and legislative structures between the Federal Government, the MDBA and the Basin States, and until such time as we've got some effective level of compliance amongst the Basin States, and certainly two of them, then I think we're not going to progress at all.

COMMISSIONER DOOLAN: A last question from me, but obviously we made a recommendation to separate the MDBA, its regulatory functions from its agent of Government functions. In our view, that would enable both to be done to their utmost capability and might start to address the lack of resource manager on the one side. I note that you are not certain that it might be able to be pulled off, but as a concept, as a recommendation, would you be supportive of that?

MR MACKENZIE: Absolutely, and I have said so, yes, absolutely, and I think it's quite telling and perhaps courageous, maybe, for the Commission to actually have come out on

such a fundamental issue, and I know it's been highlighted on the ABC and media programs and ICAC and all the inquiries, but, to my mind, it has tackled the real nub of the problem, and that is the relationship between the Basin States and the Federal Government and the capacity to actually ensure that the Plan is delivered, not on time, but it's at least delivered, hopefully on time. Thank you.

COMMISSIONER DOOLAN: All right, thank you very much. At this point, we'll break for morning tea and we will reconvene at 10.30.

ADJOURNED

[10.08 am]

RESUMED

[10.32 am]

COMMISSIONER DOOLAN: Our next participant is Juliet Le Feuvre from Environment Victoria. Juliet, if you wouldn't mind just giving your name and organisation for the transcript, please.

MS LE FEUVRE: Yes, I'm Juliet Le Feuvre and I'm the Healthy Rivers Campaign Manager with Environment Victoria. For those of you who don't know me or us, Environment Victoria is one of the State's leading conservation organisations. We've been around for almost 50 years and we have been involved in the healthy river space for more years than I personally care to remember.

I would just like to acknowledge the traditional owners on whose land we meet and to pay respects to their Elders, past present and emerging.

I would like to say that Environment Victoria welcomes many of the Commission's draft findings and recommendations, particularly its founding premise that the best way to restore community confidence in water management in the Basin is to go back to the basics of good management. I find it extraordinary that we need to make this recommendation, but I'm really glad you are doing it, and it's particularly relevant to the comments that Sandy was making about the Darling. To my mind, there's been a lot of attention to illegal water take, there's been much less attention to legal water take and the content of the Barwon-Darling Water Sharing Plan, which was changed in 2012 to allow much greater irrigator access to water, and that is responsible for many of the consequences that we're now seeing on the Lower Darling.

The protection, the prerequisite policy measures, that protect environmental water, particularly in New South Wales, you have expressed some confidence that they will be in place by June 2019. I have really serious concerns about the will and the ability of the New South Wales Government to actually make that happen, so I am actually really bothered about the protection of the environmental water up there because since the new Water Sharing Plan came into effect, we see many more low and no flow events in the Darling, a direct correlation.

But I would really like to talk about Victoria, which is my area of expertise. We strongly support the Commission's critique of the Basin Governments' lack of commitment to the Basin Plan as a whole and we agree with your statement that the Ministerial Council must set a much clearer tone of firm commitment to the Basin itself, not just their own patch, with unmistakable collected direction in delivering on commitment. You made that as a finding and I'd like to see that translate into a really strong recommendation because the behaviour on the part of Governments is continuing.

Publication of the Victorian and New South Wales Governments' Criteria for Socio and Economic Neutrality earlier this week is yet another example of the Governments protecting their particular patch, in this case the GMID, at the expense of Basin-wide benefits for environments and communities.

As I say, we share your concerns about the prerequisite policy measures, water resource plans, supply projects, efficiency and constraints measures being completed in a transparent and accountable manner on time and within budget. There's a serious risk of failure in any or all of these, but the problem should not be used as an excuse for not delivering on water recovery under the Basin Plan. We have always said it's a 3200 GL plan and that's where we need to get to.

We would like the Commission to re-emphasise the importance of implementing the Basin Plan package as a whole and to stay the course. Ultimately, the entire Plan is more than the sum of its constituent parts and will actually deliver for our rivers if we do it properly.

We were intrigued - in previous reports the Commission has been a strong supporter for buyback as an equitable and efficient response to the structural change in water recovery for the environment and that's been in your reports consistently over many years, even up to last year when you reported back on the National Water Initiative - so we are concerned that you are not continuing along that path. We would like to see you recommend lifting the 1500 GL cap on buybacks so that this can be brought back into the mix of means of water recovery, which would help take a lot of the pressure off on both the budget and the time pressure. It's quicker and more cost-effective than infrastructure projects. So, if we reinstate buyback, we are much more likely to get to the full amount of water recovery by 2024.

Similarly, constraints projects, an essential part of the 605 GL offset package, in addition to the vital contribution to the enhanced environments, so that comes to 450 gigs, and flood mitigation benefits, again they are too important to the success of the Plan to be consigned to the "too hard" basket and landholder negotiations should not be regarded as an inseparable value.

There's a view developing that the 450 gigs is unachievable as it will not be able to get down the river system without third party impacts, but that's exactly what constraints management is supposed to do, mitigating those impacts, and water flowing out to sea is not water wasted. It supports some of the richest and most diverse habitat on the planet and estuaries. Just ask any Coorong fisherman what the effects of upstream water extraction has been on their livelihood and you'll soon hear about socio-economic impacts.

We agree that the timeline for accrediting water resource plans should be extended beyond June 2019. However, supply projects are a bit of a different case. We don't think the timeline for them should be extended. If we can't sort them out by 2024 then I don't think they are viable projects. They have already had many years in development, have got quite a few years to go and there's plenty of time to discover whether they are going to deliver the promised benefits or not.

Your recommendations on environmental water planning and management should address the Plan requirements and give effect to international agreements and the Ramsar protected list of Wetlands. That's one of the key objectives of the Water Act and the Plan, but you don't address whether or not environmental water management is actually addressing those key points.

You should also be thinking about what is the impact of the adjusted SDL on environmental watering outcomes. It hasn't been taken into account in the Basin-wide Environmental Watering Strategy and we don't know whether we can achieve the objectives of that strategy with a reduced volume of environmental water. Nobody has done the work and that's something we really need to see attention paid to.

We really support your recommendations about splitting the compliance role from the operational role of the MDBA. I think that really, obviously, is a serious conflict of interest between the roles. We have been asking - the Environment Group Collective has been asking for the establishment of a Federal environment protection agency to deal with threat to species legislation, a whole raft of stuff, and the compliance role would well sit with that body if such a body were established. That's our preferred model.

We are a little bit concerned about the independence of the MDBA. The MDBA was set up as an independent authority. There's a lot of argument how well that role has been achieved, but, in your recommendations, giving the Basin's official committee, you know, a prime role, I'm concerned about that because we don't want to see control and controversy handed back to the States, we want to see the MDBA continue in that and strengthen the role of independence.

Just finally, when I was preparing for this, I was looking for an Aboriginal name for the Goulburn River and I stumbled on a list compiled by a surveyor in the 1860s of Aboriginal names and there were hundreds of them. It recorded Mille or Millewa for the Murray, meaning big one water, and then there's a comment saying that every feature on the map has its own name, and it's the same story with the Goulburn, there's different names for the river in different languages and every bend has its own name. That's the quality of the environment we're actually trying to protect that this Plan sets out to look after.

That's what we want to see actually happen, is that that full scope of environmental protection and enhancement and if we lose it, we are all the poorer, including the irrigation communities that Governments are struggling so hard to protect. Thank you.

COMMISSIONER DOOLAN: Thank you, Juliet. I've got a number of questions and I'm sure John has too. There's a couple that I'd like to start with and that is taking on board

the constraints are very important to achieving particularly the enhanced outcomes in Schedule 5, they are supply projects, though.

MS LE FEUVRE: Exactly.

COMMISSIONER DOOLAN: And they are yet to commence before Governments have not fully agreed the funding for the initial stage of development and then finally taking it through, and our experience with raising constraints in Hume to Yarrawonga showed that you do have to negotiate with landholders and it does take time. Would you support, as we have suggested, an extension of timelines for those supply projects once they have been determined to be - the detailed design actually establishes that, you know, the cost is okay or they are willing to pay and the environmental benefits are there, if there were checks and balances along the way, so independent assessment of progress against milestones, for example, because it's very early to call it, but certainly based on Hume to Yarrawonga, the current timelines for the constraint projects would seem to be highly ambitious and likely to fail in 2024 and better to set them up properly is our view if you want to do them. If there's checks and balances and proper independent assessment of progress against clearly set milestones, would you be more inclined?

MS LE FEUVRE: We have consistently called for really thorough assessment of all the supply projects, all 36 of them, so, yes, we have recommended that the Wentworth Group criteria be adopted and we have actually recommended that they be put into legislation in past discussion of this issue. So, we are really, really keen to see the projects properly assessed, and we need to see what are or are not the benefits of the projects and what are the risks, and obviously that is taking time. I'm a bit down on the State Governments because it's taking such a long time to actually do that. They've already had seven years to develop these projects and it's a real shame that we're in such a poor state of development at this point and we should be much further progressed than we are.

If I had some real comfort that there was going to be really strict, you know, conditions, particularly for the constraints projects, not so much for the ones which are more straightforward, I mean the rules-based stuff, the onground project, there's absolutely no reason why they would need to be delayed if the benefits stack up. For my mind, it's horses for courses, but the key bit for me is the rigour of the assessment. If I was given a cast iron guarantee in 2024 that was actually going to happen, then I would feel more comfortable about it.

COMMISSIONER DOOLAN: The sorts of things we have been discussing and imagining for that would be that that gateway process would independently set a credible timeline and milestones along the way that - - -

MS LE FEUVRE: Yes, you make some other comments about milestones which I really totally endorse.

COMMISSIONER DOOLAN: Yes, and then, if you weigh off and the project fails, you could declare it early.

MS LE FEUVRE: I mean a milestone is a milestone and if it's not met then it's not - you know, that's it.

COMMISSIONER DOOLAN: So it's something that you would be happy to consider if the rigour of the process was there?

MS LE FEUVRE: I would consider it, yes.

COMMISSIONER DOOLAN: You mention the Basin Environmental Watering Strategy. It gets updated every five years and it's due next year, I believe, so we have again made some recommendations about what sort of improvements the next version of the Basin Environmental Watering Strategy should take, which would be better inclusion of event management in the Northern Basin, better setting of regional priorities, mostly to really build on better information and adaptive management as they have learnt. Is that the place where - do you feel currently it is not dealing with the international agreement requirements now?

MS LE FEUVRE: Yes, absolutely, it doesn't specifically focus on the Ramsar Wetlands, it doesn't specifically focus on the international agreements. The good part about the Basin Environmental Watering Strategy is it's got strong targets of where we want to get to, and that's the bit I'm concerned about with respect to adjusted SDL and whether those targets will be maintained in future iterations with a lower volume of environmental water and I don't want to see any backsliding on that, but I also want to see more of a focus - the foundation of the Plan is on those international agreements and they don't come through either in the Watering Strategy or in your discussion of it.

COMMISSIONER DOOLAN: Is it more they don't come through or is it that you do have a real concern that - - -

MS LE FEUVRE: I'm really concerned about the Ramsar sites, I'm seriously concerned.

COMMISSIONER DOOLAN: That they aren't getting water?

MS LE FEUVRE: That their environmental condition is not being maintained.

COMMISSIONER DOOLAN: Okay.

MS LE FEUVRE: Particularly the Lower Darling system, Coorong, a prime example of that.

COMMISSIONER DOOLAN: All right, thank you. You also had some comments about supporting our recommendations about governance and separation and I suppose your comments about BOC then and its enhanced role, we actually do believe Basin Governments need to start owning it, but the separation - so BOC would own, if you like, the Ministerial Council, but BOC on its own would give effect to the agent of Governments for the running of the Basin and the separation, the Authority itself would be the regulator. Under that separation, do you have less concern?

MS LE FEUVRE: I think separating the regulatory function from the implementation function, I've got no problem with that.

COMMISSIONER DOOLAN: Yes.

MS LE FEUVRE: It's more what then would the MDBA's role be in implementation? That's the bit I'm more concerned about.

COMMISSIONER DOOLAN: Yes.

MS LE FEUVRE: Because the MDBA need to be able to say, "Come you, you guys, you partner Governments, get your act together." They need to be able to crack the whip over the partner Governments and make them do things.

COMMISSIONER DOOLAN: Yes.

MS LE FEUVRE: That's what I'm worried about.

COMMISSIONER DOOLAN: But isn't that the regulator?

MS LE FEUVRE: That's not the regulator, no.

COMMISSIONER DOOLAN: In our view, that's the regulator.

MS LE FEUVRE: The regulator is, "Are the rules being complied with?" The implementer is, "Are you recovering enough water for the environment, are you putting barriers in the way of environmental water recovery, are you not contributing to the Watering Strategy?" you know, all those sorts of things. The regulator is - I guess you maybe need a little bit more discussion on the regulator role. I interpreted that as meaning, "Are external parties complying with the rules?" The implementation function is, "Are the salinity targets being met, are you doing enough to meet those targets?" If you consider that to be part of the regulator role, then that's a different issue.

COMMISSIONER DOOLAN: Yes, I think we do see that.

COMMISSIONER MADDEN: I think the important thing there is it's a Basin Plan regulator.

COMMISSIONER DOOLAN: Yes.

COMMISSIONER MADDEN: So the whole of the Basin Plan.

MS LE FEUVRE: So would that be a matter of including meeting targets within the Basin Plan? Would that be part of the regulator role?

COMMISSIONER MADDEN: Yes, are they implementing stuff that actually is meeting the Basin Plan, which is more than just water compliance rules.

MS LE FEUVRE: To me, the regulator role is, you know, is metering right, are people abiding by the rules?

COMMISSIONER MADDEN: We see it as things like are they doing monitoring and evaluation right, so there's a whole lot of assessments that feed into a 2026 review that a regulator, as an independent, would actually say, "Have the Governments, including the Commonwealth Government because they're a member of BOC actually played their role to deliver on the Basin Plan as a whole?"

MS LE FEUVRE: Then that's a bigger role than I think comes through in your report, so I think there's probably - - -

COMMISSIONER MADDEN: No, no.

COMMISSIONER DOOLAN: No, the next - - -

MS LE FEUVRE: There may be a bit of misunderstanding there about what actually that means.

COMMISSIONER DOOLAN: The next iteration needs to actually describe that more accurately in terms of what we're thinking.

MS LE FEUVRE: Exactly. If that's what you were intending, that's something else from what I construed from the report.

COMMISSIONER MADDEN: Yes. We take the point and it's not just yourself making that point about the functions because there's trading rules in that as well that the regulator would have to see someone managing it, so they do have those dual roles, it's just that notion that people jump to compliance, particularly after Four Corners and the like.

MS LE FEUVRE: Yes.

COMMISSIONER MADDEN: Being water take.

MS LE FEUVRE: That's how many people see compliance.

COMMISSIONER MADDEN: So SDL compliance would be number one, but there are many different roles in compliance, and water trading is an obvious one of that that people haven't had a focus on, but that is there.

MS LE FEUVRE: That's right.

COMMISSIONER MADDEN: I guess my only question is around PPMs. I think this is another thing of what the risks are if PPMs are not included. The confidence we have is the fact that if they're not in place by July 2019, the ramifications for the State may not be very explicit to people but they're actually drastic in terms of make good. This is the same

with the 605 if things fall over and the make good and the risk and who is responsible there. We see that it's not clear but the consequence of a make good and whether that is buyback or reduction through plan changes, water sharing plan changes, so, say in the case of New South Wales, that's why we have some of the confidence and the fact that the confidence is that New South Wales and the Authority are both aware of the drastic consequence if they don't get done in time. So, I guess just to comment on that?

MS LE FEUVRE: Yes, I'm really concerned about slippage within that, that the MDBA has not really been willing to push the New South Wales Government on it, they've sort of more dangled the carrot, "Oh, yeah, come a little bit closer and we'll approve that." I'm really concerned with, you know, the past history of that. I think probably in the last 12 months, there's been a better chance of it happening, but, you know, the MDBA has, in the past, ticked off on the existing situation as being compliant with the Basin Plan. That's what I'm concerned about, that the MDBA, particularly if we stick to the timeline, the existing timeline for water resource plans, that, in the rush, they will say, "Oh, yeah, that's fine" when it's not fine. That's my real concern about it, that they will want to keep the New South Wales Government at the table, so they'll tick off on something which is not up to standard.

COMMISSIONER DOOLAN: You did mention - I mean, we have suggested, not for every water resource plan but for water resource plans with really significant issues that still need to be negotiated to comply with the Basin Plan or provide good environmental outcomes, then you would enable an extension?

MS LE FEUVRE: Yes, absolutely.

COMMISSIONER DOOLAN: Okay.

COMMISSIONER MADDEN: Which is a bit different to the PPMs, though.

COMMISSIONER DOOLAN: It is different to the PPMs, yes.

MS LE FEUVRE: But the PPMs are part of - - -

COMMISSIONER MADDEN: Well, they've coupled now but they're not necessarily.

MS LE FEUVRE: But the water resource plan has to give effect to the PPMs.

COMMISSIONER MADDEN: You could actually - in New South Wales, you could bring a PPM in through a water sharing plan even without a water resource plan or just legislative change, so you don't actually have to do and have a water resource plan accredited to give effect to a PPM. They put them together, but they're not necessarily - - -

MS LE FEUVRE: Yes, obviously there's different ways of doing it, but, as I say, I'm really concerned about the Barwon-Darling Water Sharing Plan as being the root of many of the problems that the Lower Darling is experiencing, independent - the Menindee

situation, I'm not saying that's a great situation, but these problems were there before any change in the operation at Menindee.

COMMISSIONER DOOLAN: I just have one more question and that is I know there is a focus on the international agreements and the Ramsar Wetlands, but we have been hearing here today about some of the environmental outcomes for the Goulburn are being compromised by high summer flows.

MS LE FEUVRE: Yes, absolutely.

COMMISSIONER DOOLAN: And obviously we've heard the story of the Lower Darling. So it is actually, I suppose, getting your thoughts on the need - I think you brought it in at the last bit - for the Basin Plan to have good environmental outcomes, effectively at the local scale as well as at the Basin scale. Is that - - -

MS LE FEUVRE: Yes, that's right, yes. I mean I think we ought to - we talk a lot about being clever in the management of environmental water and I think we ought to be clever enough to drive both the local outcomes and the broader Basin scale ones, and it's easy to focus on the one. The local outcomes, you know, often watering a particular wetland, is easier to achieve. The Basin scale ones are the much harder ones to achieve, which actually require coordination, and that's always been the most difficult aspect of environmental watering to do that part, but I think we ought to be able to work it out.

We've had great results here in the Goulburn for fish spawning and we're beginning to see migration and now we need to actually see recruitment into the population and make sure that those fish not only have enough food to be babies on but have enough food to supply them when they are adults and that's a different proposition from, you know, a spawning event.

COMMISSIONER DOOLAN: Yes, and I think some of the concerns that we're seeing about the impacting factors aren't about the use of environmental water, it's about how water is being managed generally.

MS LE FEUVRE: Well, I mean, the whole issue with the Lower Goulburn is not a result of the environmental watering.

COMMISSIONER DOOLAN: No, nobody's saying that.

MS LE FEUVRE: It's a result of the deliveries downstream, which are actually wiping out the benefits of the environmental watering. That's the problem. You know, on the one hand we're doing this great stuff with the environmental water to encourage vegetation growth and all the rest of it; on the other hand, we're delivering water downstream that's washing the stuff away again. It's a ridiculous situation.

COMMISSIONER DOOLAN: Yes, so the Basin Plan management in total needs to deal with both those elements?

MS LE FEUVRE: Exactly, exactly.

COMMISSIONER DOOLAN: That's it for me.

COMMISSIONER MADDEN: Thank you.

COMMISSIONER DOOLAN: Thank you very much.

MS LE FEUVRE: Thanks very much.

COMMISSIONER DOOLAN: Could I call on Graham Pyle from Bluezone as the next participant and Mark Heggarty. Again, if you would just introduce yourselves for the record, please.

MR PYLE: I'm Graeme Pyle, a consultant from Berrigan. I've been greatly interested in water for many years, being an irrigation farmer, and I've taken a great interest in measurement of water and telemetry. This is Mark Heggarty, he's General Manager of Oceanic and Hydrographic at Bluezone based in Newcastle and Mark actually lives in Numurka.

First I would love to comment, Commissioners, on your morning tea. That was fabulous, the scones, particularly the cream.

Our previous speaker, Juliet, spoke at length about various volumes of water and we've heard 3200 gegalitres, 2750 gegalitres, 605 gegalitres and 450 gegalitres. Now, the measurements of all those volumes seems to be fairly much plus or minus 25 per cent. When you multiply 2750 by 20 per cent, that's 550,000 megalitres and currently that's worth \$192 million to somebody. We don't know exactly who lost it and who gained it because our measurement systems are not accurate enough and that's what has driven me in the pursuit of measurement of water everywhere.

We can measure the floodplains in the Northern Basin and that hasn't been done before but we have the technology to do that. There is technology being developed right now in Griffith by Thompson Aviation to measure aquifers down to 100 metres underground. There's Lidar cameras, the Teledyne Galaxy camera can measure within 3 centimetres from a thousand metres in the sky, and the Teledyne Titan camera can measure five different volumes of vegetation in a forest, and that hasn't been done, to my knowledge, and I did ask a senior person in the Commonwealth Environmental Water Holder and he assured me they did not have that technology.

So, all these things are about measurement. I am talking on 12.2, Commissioners, and that's dealing with, "Basin States should consider the role, costs and benefits of consistent metering policies including the role of metering standards." To that, we have to comply with meters to the patent approval system delivered by the National Water Institute. A meter has to be validated. It can take three years and up to \$300,000 to get a meter validated.

At this stage, there is no concept of LaserFlows. That's a meter that Bluezone has access to that runs on lasers. That's not commented on or mentioned anywhere in the whole system. Australia has three LaserFlows in it, but Kuwait, where water is fairly valuable, bought 250 six months ago for their irrigation systems there, but, in Australia, we are way behind. That would indicate we have problems with our validation systems.

In Australia, you're not allowed to sell stuff that doesn't work. The Office of Fair Trading will make life very difficult for you and then the court systems after that will take everything you've got if you sell something that doesn't work and it costs people money.

We are talking about water worth a lot of money. The patent approval system only checks machinery for three years, but most of this machinery would be in place for 10 or 20 years, so the patent approval system by the National Measurement Institute doesn't give recourse to people after three years, so it would appear that that is an impediment to new machinery.

When I was a kid, the only bloke with a mobile phone was Maxwell Smart, now we've all got them. I don't think we thought particularly that that would happen quite as quick as it has, much less how much power our mobile phones have now and all of the myriad of things that they can do. The same is happening in water measurement, in aquifer measurement, in forestry measurement, but we're not keeping up.

If you are going to manage systems, you've got to be able to measure it and we simply can't measure the vast amount of water that flows into the Murray-Darling Basin every year, being 33,800 gicalitres, and we can't account for a vast amount of that water, yet that's very valuable.

I'm looking for questions.

COMMISSIONER MADDEN: Well, there's an obvious question.

MR PYLE: Pardon?

COMMISSIONER MADDEN: There's an obvious question in terms of a policy change or direction other than the recommendation we have.

MR PYLE: Yes.

COMMISSIONER MADDEN: What would you actually like Governments to do - that's obviously not adopt your product tomorrow - it's about the processes that they have to go through. So, you're talking about the failing and the \$300,000. I can understand that that would be a barrier unless you actually get either a Government or a large organisation or the Authority trying to progress something through that process, but can you tell me what the barriers are and what response you would like?

MR PYLE: A method by which the rest of the world operates on is of the ISO system, so that you comply with that and you validate yourself with the ISO people. Teledyne works closely with them in America. In fact, they have a very close relationship and they co-

develop measurement systems between them. That system works in the rest of the world, but it's not used straight up in water in the Murray-Darling Basin.

The MDBA dreamt up the patent approval system, or, sorry, they complied with the patent approval system in about 2004, I think, and things have moved on a lot faster than I believe those people that worked on that at the time would have ever have thought, particularly in the last five years. So, the ISO system would be preferential to metering at a fair price and across the board rather than the system that we have.

Also we have to have meter installer validation. It's pretty hard to get a validation to ensure a LaserFlow meter. If this room was a channel and that was the bridge, you'd simply install the meter up there and it's only a matter of bolting it on, you don't have to be technically inclined other than to be able to get the meter the right way up and hook the little positive bit on to the positive bit and away it goes and that's it. There's no science, technical things. It's a bit like installing your new toaster in your kitchen; it's about as complicated as that.

COMMISSIONER MADDEN: No, you'd need a better base - yes, sorry.

MR PYLE: So there's a huge value that you can make - save a hell of a lot and get much more accurate measuring far quicker under the ISO than you can under the patent approval system.

COMMISSIONER MADDEN: This is something that is of wider Australia-wide perspective as well, not just the Basin.

MR PYLE: Yes.

COMMISSIONER MADDEN: So it's something commented on in last year's review as well with the National Water Initiative and how States actually bring in measurement policies over time. It may be that we talk wider about the process and the link with innovation, but it's probably something that we will come back to over time with our role in the National Water Initiative and reviewing States' progress against that every three years.

MR PYLE: Right.

COMMISSIONER DOOLAN: Okay, I haven't got any comments.

MR PYLE: I'm done?

COMMISSIONER MADDEN: Thank you.

MR PYLE: There's the brochures on all that machinery.

COMMISSIONER DOOLAN: Shelly Scullar?

MS SCULLAR: Scoullar, yes, thank you.

COMMISSIONER DOOLAN: Scoullar, sorry, Shelly.

MS SCOULLAR: No, no, that's all right.

COMMISSIONER DOOLAN: Representing Speak Up For Water and again if you would introduce yourself for the record.

MS SCOULLAR: Yes. Shelly Scoullar, Chair of the Speak Up Campaign. I just want to start by thanking the Productivity Commission for giving me the opportunity to address you today. I'm here today on behalf of the Speak Up Campaign, a voice for real communities. We have a growing membership base which includes businesses, farmers, councils, landholder associations and concerned individuals and I come today as a representative of the grass roots.

The submission which Speak Up has prepared on the draft recommendations addresses a number of the key points highlighted by the PC's draft report, key recommendations, which were determined by set terms of reference, giving clear purpose for the report. As such, the recommendations address directly to those terms of reference. I would like to point out that whilst there is some reference to consumptive water users and the communities which rely on them, largely the impacts on people in communities are under-represented by the report, which is the purpose of us being here today.

The key areas our submission focused on include support for the majority of the findings and recommendations of the Productivity Commission. We included that New South Wales Murray was not historically poorly managed. Water markets, while now being fluid, lack transparency and have now priced many food producers out of the market, even when dams are now considerably full.

We highlighted the fact that the socio-economic impacts of the Basin Plan have far exceeded those estimated. We address the failure to recognise and address the negative environmental consequences of planned watering events. We highlighted the opportunity to make the stitch-in-time changes which are needed to prevent further damage to communities, people and the environment.

When asked to provide the key issues which I would like to discuss today, I specifically chose three areas of concern, all of which directly impact on people and their communities. These include concerns with the monitoring and evaluation. That includes the lack of a citizen science incorporated into experimental design and failure to adequately assess negative environmental outcomes, which was briefly touched before, concerns with the water market and the lack of affordable and accessible water, the current drought situation and impacts on regional economies, irrigation communities becoming part of the problem instead of part of the solution, and the promised countercyclical nature of environmental water, which hasn't occurred. Solutions and options moving forward, how can the stitch-in-time changes present real opportunity to salvage the Basin Plan?

We are the people who are affected by the Plan and we have lost confidence with all the parties associated with implementing the Plan and are still coming to grips with what our future will look like. We believe the impacts on people and communities should be addressed in a far more comprehensive manner. The success of this Plan is dependent on all parties being treated equally and feeling that they are willing participants in a Plan that treats all Australians fairly. This is not the case and the report has missed an opportunity, we feel, to comprehensively address the underlying issues.

I do not come here today with an overload of technical details. I come here with some common-sense solutions which have been supported across many levels. I come here today to ensure that it is on public record that our communities, our farmers and our businesses are past tipping point and some are on the brink of survival. And these are not the 10 per cent that some people claim to be weeded out. That has already happened.

These are passionate people who want to grow food and fibre, employ locals, either as contractors on farm, accountants, financial consultants, they want to send their kids to the local schools, visit their GP, buy their household needs locally. They are people who just want to live a normal life, grow the best, leave their land in a better way than they found it and participate in their community. Yet, due to poor science, flawed assumptions, unrealistic timelines and political agendas, water is becoming increasingly inaccessible, unreliable and unaffordable for those who are best placed to grow the staples which we all need three times a day. That's my introduction.

COMMISSIONER DOOLAN: You did talk about having solutions or actions that you would like to see happen. Can you take us through what you - - -

MS SCOLLAR: Absolutely, yep. Okay, so earlier this year, we produced this document which is "Balancing the Impacts of the Basin Plan". We have nine organisations across three States which have endorsed this document and it outlines a number of steps, but the three I want to address today are - sorry, let me just get back to where we are.

The greatest solution comes from the management of the end of system. The Coorong and the Lower Lakes, so far just over 2100 ggalitres or 4.2 Sydney Harbours have been recovered from productive use and the vast majority ending in the Lower Lakes. But, in those Lower Lakes, approximately one-third of the volume evaporated.

The main driving force of the Basin Plan are problems in South Australia being solved by volumes of water from upstream States, yet South Australia has barely lifted a finger to become a part of the solution. It won't even turn on its desal plant beyond maintenance capacity despite the plant being built with the help of significant Federal Government funding to secure Adelaide's supply. So, our recommendation is the construction of Lock 0 or returning the Lower Lakes to an estuarine system which would secure irrigation and human needs in South Australia and, at the same time, preserve water for upstream States whose communities are under increasing pressure and, as already pointed out by Juliet earlier, we are compromising environmental gains in our upstream regions by trying to get these vast amount of volumes of water to the end of system.

Then comes solution 2. As you're well aware, enormous volumes of water from the south-east of South Australia are drained out to sea every year, returning greater volumes of these flows back into the Coorong would be another step in the right direction to securing environmental outcomes and supporting the health of our upstream communities as well as the health of the Coorong.

Following on from Mr Pyle, we believe that Basin-wide standardised metering and compliance is essential. Of the 2117 gigalitres recovered to date, 82 per cent has come from the Southern Basin with the major storages being Hume and Dartmouth and the majority of environmental and South Australian water will need to be delivered via the Murray. Is there any wonder the problems of the Darling are far from resolved? Installing the latest technology for metering and measuring is a crucial step for solving the problems of the Darling.

That's our three main things that we think could have a significant help Basin-wide.

COMMISSIONER DOOLAN: We've also been in Murray Bridge on Monday.

MS SCOULLAR: Yes.

COMMISSIONER DOOLAN: The concerns that we heard in Murray Bridge were about Lower Lakes and Coorong not getting enough water, needing the 450 and the constraints lifted and the need to maintain those systems. Obviously across the Basin, we have - so the solution of the construction of Lock 0 is not one that at this stage would be supported by other Basin communities. You said it's three - - -

MS SCOULLAR: Yes, it was supported by - the South Australian Fishing Alliance have supported this documents, yes, because, you know, the fish back before the barrages were put in and before the drains were put in, mulloway was, you know, the main industry down there. I can provide you with a document from - yep.

COMMISSIONER DOOLAN: No, that's fine, we've been down there.

MS SCOULLAR: Yes.

COMMISSIONER DOOLAN: And we have certainly heard about the south-east drainage scheme into the Coorong and partially that work is happening as well.

MS SCOULLAR: Yes, it has started, yep.

COMMISSIONER DOOLAN: Your solution is a large scale solution which would be highly contested in parts of the Basin.

MS SCOULLAR: Yes.

COMMISSIONER DOOLAN: Are there things that relate to what we have recommended in our report that you feel, without going to that extreme, we could actually enhance or improve?

MS SCOULLAR: You've put me on the spot there.

COMMISSIONER DOOLAN: Sorry.

MS SCOULLAR: No, that's all right. I've have to take that on notice, please.

COMMISSIONER DOOLAN: Of course, sure.

COMMISSIONER MADDEN: Probably a couple of comments, and it might come up later in terms of one of the options that might meet some tests, but the desal plant, I'm not sure of the volumes, I was going to look it up here, that it can actually provide. I guess from the Productivity Commission's point of view, we would have to look at the economics of that.

MS SCOULLAR: Yes.

COMMISSIONER MADDEN: And I understand it is built and that's at some cost, and we've said some things in the past about the value of the desal plants in Melbourne and Perth, Perth less so because there was a plan and they are actually being utilised whereas, obviously, Melbourne and Sydney, to a lesser extent, and Adelaide are not being utilised, so my only comment there is a bad decision being followed by then operating it at a high cost to society. I'm not sure how the Productivity Commission could support one bad decision being followed by another.

I am interested, though, in the countercyclical nature of environmental water that you mentioned and just exploring that a little bit more and then, second, so you've got a bit of time to think it through, on the monitoring and evaluation, what you actually see as - because I know there's been work done and when we went round the Basin, we did hear - I'm sorry - Phil from the Murray-Darling Basin Authority who has done the socio-economics, Phil Townsend.

MS SCOULLAR: Yes.

COMMISSIONER MADDEN: Many communities, for example, in St George, were on record saying he did a very good job of understanding their communities and the changes. I am just trying to think of how that can be enhanced going forward. Number one, a little bit more about the environmental water and its interaction with irrigation and then second on that - - -

MS SCOULLAR: Yes, not a problem at all. So when John Howard addressed the National Press Club on 25 January 2007 to announce the 2007 Water Act, he said: "Water that accrues to the Commonwealth Government through these measures will be managed to restore the health of the rivers and wetlands in the Murray-Darling Basin. The

countercyclical nature of the environmental watering will also allow some water to be made available to irrigators during dry periods." That is the countercyclical nature of environmental watering.

This year, when we have starving and dying stock, the Government is providing huge amounts of financial support and funding for drought-declared regions, yet a mere 35 gigalitres has been made available for trade from the environment. Water is the only solution to the current drought situation and, yes, there are a number of different buckets besides the environmental bucket. However, the contribution of 35 gigs is hardly what I would call countercyclical during this time.

The whole premise of the CEWH account was set up so that when we were in these dry times, water could be traded back, the CEWH can cover their costs by trading water back into the market, and I don't feel 35 gigs is a major contribution to countercyclical trading.

COMMISSIONER DOOLAN: However, the Basin Plan itself and the Basin Environmental Watering Strategy, which is the document "Strategy to Govern Environmental Water and Outcomes" developed - - -

MS SCULLAR: Doesn't allow - yep.

COMMISSIONER DOOLAN: Well, it's been developed since John Howard's initial speech and basically on the basis of good information, and so it would seem that those comments will have been made before the information had been collected, the strategy had been developed and it's clear under the Act, the water holder has a very clear requirement to meet its environmental requirements before it trades. So is the question really that you're raising being clear and transparent about how they make those decisions because it's okay for John Howard in 2007 to sort of indicate an intent, we have moved well past there.

MS SCULLAR: I think the problem is the 2007 Water Act and that's where the start of the problems - that's obviously not in your terms of reference and I agree, the rules are very clear in how the CEWH is allowed to trade water, but we have - and this is, I guess, what we said that your terms of reference was able to pick up the basis of why the Basin Plan is failing because there's - Phil Townsend, I agree, he's done a very great job of picking up the community things, but my monitoring and evaluation was more on the environmental side, and so internationally, a multiple lines of evidence approach, including citizen science, is widely used to form the basis of monitoring and evaluation.

Without this approach, important data can be missed, not only in baseline collections but also in ongoing monitoring. For example, silver perch do not get picked up through electrofishing, however, they are easily caught by recreational fishers and because the Basin Plan does not incorporate citizen science in experimental design, silver perch numbers are severely distorted. So, if we're not using all the best available science and we're not using a multiple lines evidence approach, can we be sure of our baseline data and our models?

COMMISSIONER DOOLAN: Effectively, you are suggesting that the monitoring and evaluation strategy have a role for citizen science in it?

MS SCOULLAR: Yes, absolutely.

COMMISSIONER DOOLAN: So it's part of it?

MS SCOULLAR: Yes.

COMMISSIONER DOOLAN: It may not be the whole. We heard that again in Murray Bridge, that there is a place - design a strategy that has a range of hierarchies able to operate at different scales and utilise citizen science in that process.

MS SCOULLAR: Yes, absolutely.

COMMISSIONER DOOLAN: We heard that there, too.

MS SCOULLAR: Yes.

COMMISSIONER DOOLAN: All right, thank you. I think that's it.

COMMISSIONER MADDEN: That's it, okay.

COMMISSIONER DOOLAN: Thank you.

MS SCOULLAR: Thank you. Can I just have one parting comment?

COMMISSIONER MADDEN: Sure.

COMMISSIONER DOOLAN: Of course.

MS SCOULLAR: Okay. So, as a mother of three boys, at times I have to make decisions that are not always popular, but, as a mother, I make decisions which are best for my entire family, which may make some unhappy, but that is my job.

Today, if you take only one message from my time, then let it be this: I urge you to recommend that it is time for South Australia to be held to account for the mismanagement of the end of system. I urge you to recommend to the Government that it is time for them to step up and be the parent. Our Government needs to make decisions which won't be popular with one of the family members, but it will be a decision which will be best for the family as a whole. Our region cannot continue to be the collateral damage from South Australia's refusal to be part of the solution. No doubt there will be tantrums, as you pointed out, Jane, but for those brave enough to push through and stand up for what is right, the nation, our communities and our future generations will thank you for the stitch-in-time changes which have saved us. Thank you.

COMMISSIONER DOOLAN: Thank you. Now we actually do have a little bit of time before scheduled lunch. Our normal process is to wait until the end of the day and ask if there's anybody else in the audience that would like to make comments on the record.

Given we have got a little bit of time, we thought we would do that twice, just before lunch

- - -

COMMISSIONER MADDEN: And the length of the day, sorry.

COMMISSIONER DOOLAN: And the length of the day, the fact that it's a long day, we would do that at this point and again. So, if there was somebody who did want to make a comment and wasn't able to stick around until the end of the day, there's an opportunity now, if you want to. Alternatively, we can wait until the end of the day. Again, please state your name and if there's an affiliation for the record.

MR HOGAN: Darryl Hogan, dairy farmer and irrigator from the Goulburn Valley. By and large, I pretty much accept all your report and I think most of it is pretty sound and is solid. The part that I'd actually like to take even further and discuss is around the governance and arrangements of the Authority, its roles, and I think before we support, rightfully support, the teasing apart of their two roles of regulatory compliance and implementation, but that will only go so far unless we address the culture, and unless we address the culture within the organisation of properly engaging and listening, separating their responsibilities, we'll not actually deliver the full benefits that can be achieved, and part of the culture and the problems also applies to the Federal department.

It is actually MINCo's responsibility to implement the decisions and the agreements to be put in place, but while the Federal department continually interfere and road-block them, probably push their own agendas, the States don't get that space to fully implement the agreements that come out of each MINCo meeting, and I sometimes wonder actually what is the role of the senior management and the board at MDBA when it appears that the Federal department is actually the ones calling the shots and directing them what they can do. There has to be a significant change in culture first before we can actually get the benefits out of decoupling the roles and responsibilities within the Authority.

COMMISSIONER MADDEN: From our recommendations, role clarity was an important part of that and culture, again, we see as an important part, and we have looked particularly with the Murray-Darling Basin Authority, so its role as partner, in some cases, and the culture of "Let's help you" - and a PPM is an example of that - "Let's help you develop and work with you", but we then have to turn, at a certain point, and pass judgment on the work we have done together. So, we use the word "marking" around homework, I think, but often it's marking our progress together as partners not just their own homework.

We have heard a few examples where that culture has engendered trust issues about the process, and PPMs is one of them, but water resource plans, information around Lower Darling, where do the issues come from, kind of gaps in compliance, but we haven't heard a lot about the department and how it has actually interacted, and I guess - have you got any examples, and I don't mean names here, what I mean is just in the process how things can actually not work well?

MR HOGAN: I think the most obvious one at the moment is the last MINCo meeting which clearly set the States to develop its socio-economic neutrality test and the

department, from my understanding of the press releases, and the contrary was the expressions of interest for the on-farm efficiency programs, but that was supposed to not be implemented until the socio-economic neutrality test had been agreed on at the next MINCo meeting, and yet the department had already started drawing up its expressions of interest and what the terms would be and how it was going to be implemented. So, if there's an agreement at MINCo for the States to go back and do their job, then they should be allowed to get on and do their job, rather than the federal department continuing on their own agenda or their own pathway and not listening to or taking on board the MINCo agreements.

And I think, back on the culture thing with the Authority, this just hasn't happened overnight. If you go way back to even before the plan was brought into legislation there was continued issues around agreement that certain sections of the Basin Plan weren't right and they would change it. But further back in the plan hidden somewhere was another clause put it which actually counteracted what was agreed to earlier on. So there's been a continual undermining of the confidence of the communities in the plan because of the lack of transparency and trust within the Authority to say what they - deliver what they said they were going to do.

COMMISSIONER MADDEN: So we do have some broad - we've probably floated a few ideas around an independent chair of BOC. We've considered those arrangements and maybe some directions and statement of expectations and some of the machinery or the architecture around how BOC works and naturally translates what is decided and communicates what is decided. Is there anything about those recommendations or more specific that you could - - -

MR HOGAN: I think enhancing the powers of BOC and how they operate prior to, is the right step forward. Let the Basin officials come to the agreement, let it go to MINCo, let them have their meeting, decide on the course of action and then get on and do it.

COMMISSIONER DOOLAN: And certainly the separation, in our view our thinking was if it was separated then that part of the MDBA would then be fully the supportive agent of those governments and not confounded by its regulatory function. So both sides would be able to do their jobs far more effectively.

MR HOGAN: As long as the Authority truly acted as an independent agency to do its role and not being seen or instructed or appeared to be following out the wishes of somebody else.

COMMISSIONER DOOLAN: Well again, if there were further suggestions as to consolidate the means of BOC and MINCo operating as an entity, we're very happy to hear them in submissions. Okay, thank you.

MR HOGAN: Thank you.

COMMISSIONER DOOLAN: Thank you, Darryl. Is there anybody else who would like to - - -

MR NORTHAUSEN: My name's Wade Northausen. I'm the president of the West Goulburn Branch of Victorian Farmers Federation and United Dairy Farmers Victoria. We're based in Kyabram, so I represent quite a large area of the Northern Victorian dairy industry and other associated irrigation enterprises in our region.

I think it's - I've always said that when we get to have a very, very dry year we're going to see a lot of destruction throughout the irrigation industry in Northern Victoria and Southern Riverina. Now, we are now having a very dry season and we are seeing the irrigation industry in Northern Victoria coming into a very, very horrible, terrible time. We're going to see quite a lot of the dairy industry collapse in our region because of, specifically, the Murray-Darling Basin Plan. If we look at the changes that have been made we see a pattern, and for those of us who move in political circles we are aware that there are - there is a push to do away with Australian family farmers in favour of corporate agriculture. Now the changes that have been made in terms of the environmental side of the Murray-Darling Basin Plan, the water that's been bought for that, the open free trade mechanism that was introduced and various other things are absolutely making it impossible for Australian family farmers, who rely on that irrigation water, to survive. They ultimately will not.

All through the Murray-Darling Basin process we've heard of checks and balances and we've heard of opportunities to put submissions to different bodies. The Murray-Darling Basin Authority wanted to hear from a cross-representation of the community, they will talk to anybody who wanted to make a submission or speak to them. Now they have deliberately cherry-picked the people they have and in many cases you have not had the opportunity to put forward the information and many of the bureaucrats in the Murray-Darling Basin Authority they just lie to you.

When we look at the politicians' role in all this, I think that we are dealing with some fairly high level corruption and I think that we need to look at things; that we have a specific plan using the environment to transfer ownership of our water resources and our land to, in particular, multi-national corporates. Now the only way you can do that is to destroy your family farmers and I believe that's the objective of this plan because that is the result. And in politics you don't worry about what you're told at the start of it because that's garbage, you look at the end result to find out what the initial intention was.

So that's the situation that we are at. We may need to make some very, very dramatic changes to a number of the things that have been done. The State conference of the Victorian Farmers Federation that was held in Ballarat on 19 and 20 July this year passed a motion to support a Federal Royal Commission into the Murray-Darling Basin Plan to investigate corruption, dishonesty and failure to follow due process. So we do intend to push that agenda and we do intend to start holding people accountable because the destruction that our people are going to go through is enormous. We've already lost a huge amount of our farmers. We hear governments talk about, you know, the strain and mental anguish of people in situations. Well they are creating the situations. We don't need to have reactive policies to help people in those situations. We have to stop causing the problems that are creating them.

We are also told that it's "Oh, very, very dry, you know". We hear the environmentalists talk about weather conditions and commodity prices, "that's why farmers are in trouble". Well, I have absolutely no faith at all in the environmentalists whatsoever, given their role in all this. So at the end of the day we don't have a shortage of water in the Southern Riverina or in Northern Victoria. We have plenty of water; it's still sitting in the dams. The problem we have is the politicians and bureaucrats have made it so that we can't get it. So the irrigation system was set up to mitigate our region against dry conditions, that's its whole purpose. And they have systematically destroyed that ability. They have put water out of the reach of our family farmers throughout this entire region. South Australia, as has been said by previous speakers, have a hell of a lot to answer for and I think that any Royal Commission should investigate the South Australian Government first, as well as the Murray-Darling Basin Authority.

So we need changes to be made. We don't need to continually make submissions to things that are just so blatantly common sense and so blatantly corrupt. So, I could take up a lot more of your time, however there may be other speakers who wish to make a statement or you may also have questions. So I'd like to say thank you for the opportunity to put that to you and if you've got any questions now's the time.

COMMISSIONER MADDEN: I won't go into any detail of your statement but I guess the addendum I'd like to hear is, well, what are the options in terms of review? I know we'll be talking a little bit later about socioeconomic neutrality and the 450 and the like. Given that there are different forces in terms of market forces, and we've been to other areas such as Mildura and Griffith where we don't hear the same comments; so in the Murrumbidgee there's been positive investments going on and family farms are still operating and moving into cotton and the like, and I'm talking at family farm level. I guess just wondering what is the going forward. I mean it is easy to say we'll stop the plan and things, but what are you actually asking for in terms of policy?

MR NORTHAUSEN: So first of all, in terms of the Darling, you could be transferring water through a not very expensive infrastructure project from floodplains in Queensland right through into the Darling and recharge that entire system. How that is not on the table is the most bizarre and ridiculous - it's just unbelievable that that's not on the table. They seem to be intent on taking every drop of water out of this system and not allowing any other water to come into it.

We need changes to South Australia's so-called environmental science garbage. We need it to look at the fact that a lot of the waterways down there were saline. They're trying to recharge them with fresh water. That was only one in a blue moon event. So that's wrong. We need to start looking at the environmental scientists who are putting this garbage up and hold these people to account. There's no accountability. We need to change the water trading rules that have been created here. Now under the Murray-Darling Basin Plan they implemented water trading allowances for the Commonwealth to buy water. Now that then has gone on to anybody. We have this ridiculous open free trade policy where anybody at all can buy water. Now that has to stop. That is not - that's not viable. Water is a very, very scarce essential commodity and it has to be - it has to be maintained in an area for the people who actually use it. You can't have water speculators all over the place, and I know

we hear all this garbage about there's only 5 per cent water speculators, et cetera et cetera. Well, you know, when you look at the reality, that's not right.

Government has to start putting in place policies that encourage water to come back to areas where it is - can be best used for Australia's food security. Not put into the hands of multinational corporates who can be here today, fall over tomorrow, flog off water to whoever. Now we have to get back into the idea that we're trading on a world market where it's very competitive in terms of selling food, the whole lot of it, so we've got to be able to grow the food; we've got to be able to have security of water at affordable prices. Now Government does have the capacity to change whatever rules or laws it wants to, to effect that. But they are choosing to put in place policies that are wiping out our people.

Now Australia's food security is hanging in the balance. It's not a joke and it's not ridiculous. These are the facts. So we need to get some very serious things happening. We need to, as I said, have a Royal Commission and investigate who's the winners and who are the losers, and who has effected that to happen. Those are the three points that we need to check out. So, as I said, I could say a fair bit more and they're some suggestions. If you're interested later on we can talk, I've got a lot more suggestions that could be made, but we need to get that on the record and up and pumping now, especially seeing as how we've got a rolling State election coming up in another couple of months and a Federal election coming up, plus or minus February/May next year. So that's a good opportunity to start pushing this stuff, but we need to start an inquiry to find out what's going on and fix it before there's nothing left here.

COMMISSIONER DOOLAN: All right, thank you. We probably have got a few minutes if there's somebody else.

MS McKAY: I would like to endorse many factors that you said as well. My name is Nicole. I am a community person. I am not a farmer. I have never held - well maybe I did actually some time ago - I don't hold a water licence. I come from a community where I sat down at the table with local men older than me, when water trading was introduced to our community.

COMMISSIONER MADDEN: Sorry. Could you say the surname as well, sorry?

MS McKAY: McKay - McKay.

COMMISSIONER MADDEN: Thank you.

MS McKAY: So my family were soldier settlers in Robinvale. My great-grandfather worked on a station in Pooncarie and my father had businesses and my mother had businesses as well. And I have family in irrigation communities, so I've been someone who's just interested in community and what's going on in politics and the land and environment in general. I sat down at the table when our region was the first area where water trading was introduced, at Nyah, by the Nyah to the Border Salinity Management Plan or some other such thing, and we were told as a community that this would be good for the environment and also good for flexibility of farming. And I would like to say that

I share grave concerns that community agriculture is heading into corporate hands and that this is being manipulated by Government previously aligned with farming communities and I find this a great concern. I have watched with great interest the controversies of the last year.

Things I would like to discuss about the Basin Plan is - and I think - I've been told, and as a community person I've willingly turned up at every consultation and given my piece, which I can tell you that as someone who's interested in the environment I feel incredibly disempowered, and as you've said this had no effect whatsoever, being not part of money lobby group at all. Nonetheless we all turn up time after time, so I can sympathise with that feeling.

I think that the worst time ever for our communities was during the drought and during a time of change in agriculture when water was scarce. And I have been saying for the past year publically, whenever I could, that we will see a crisis in water availability when we have dry times again. Unfortunately this is shown to be true, but I think that various things that have occurred in policy have made this worse. And I would like to talk a little about my perspective on the Basin Plan, which is that for any water recovery which has been done for our nation and for the fact that we have entered an area where water trade seems to be the rule of the day, that it's an open market, whether that's right or wrong I will maybe say a sentence about that. You need to have an amount of water that is not in consumptive use, especially in light of the fact there seems to be enormous amounts of development in our region. I live in Swan Hill and there does not seem to be any understanding of how they - is this controlled or not. I was at the Royal Commission in Mildura. There are great concerns about supply and that there would be a scarcity of water. So who is encouraging this development? What is the restriction on it? I'll just put those questions out there. Because, of course, family and successful family farmers who have somehow made it through the last 12 years will not be able to compete against corporates who have - who exist because water is now perceived to be an investment, which I don't think in the long-term for our nation is a good thing. I think there needs to be some control over that, to protect communities, the environment, but especially indigenous communities who will see themselves entirely ripped off by this situation and are being ripped off now.

So, water trade is the name of the game. It cannot be all in consumptive use. I think anyone who comes from the country realises that if everything is in consumptive use then there will be - it will run out before the end, or it will run out at some point and at the moment it's running out in the middle, which is at the Lower Darling and the Lower Murrumbidgee, which happens to be a region which I live quite close to and I can report that those - not enough people are talking about water quality and flows as an important thing for community health and wellbeing in remote and rural areas where it is hot and everyone recreates in those regions. In Hay there was a huge algal bloom this year and the Murrumbidgee and Balranald looks not good at all and seems to be not flowing at various times when I went up there. The Darling River is in a shocking state and of all things these should be national scandals and they have not reached the national stage for the scandal that they are and the risk to human life and communities continuing. Because if you have poor water quality that people can't touch, for one thing the effect on people's daily lives is huge. We all like to swim in the river. We fish in the river, we recreate there. There's huge

tourism effects in our Basin and particularly in the beautiful wilderness areas that existed between Swan Hill and Wentworth, where all the rivers from - the Maribor from Swan Hill but the New South Wales rivers' junction and this is a very, very important area. So the fact that water quality in those areas is potentially going to be at great risk is a very - should be the primary concern, a productivity issue. And then after that I think the continuing of our communities, farming communities, the family farms, is really, really essential as well. These are things that are at great risk.

Another thing to mention is a shocking situation, that the Barkindji people of the Darling River have the largest native title recognised claim in New South Wales and their water is empty and poisonous for much of the time. I don't think any one of us want to hold our head up and say this is a situation we want to continue.

However, I will go back to our area. I have been in the local forest. I grew up beside red gum forests between Swan Hill and Mildura within families scattered along. In spring they are inundated regularly. This is not something that disappeared 50 to 60, 100 years ago, although the amount of water into those areas was probably there for less time. However, it happened most springs in those forests, that's the reason they exist. They wouldn't have been so foresty, they would've been more reed beds. I'm not going to go into a dialogue about red gum or other things, but what I would like to say is that water was there and those areas are hugely significant for tourism and recreation and the general community and indigenous, cultural and environmental heritage. We are risking a lot and we are just being the general community the large amount are not irrigators and we are all related, we all matter, we all are the nurses, the shopkeepers, the other people who live in those areas. We need to live near healthy waterways and we also want to live near beautiful wilderness areas that add value to our homes and our towns, especially as we hope to grow with a viable community-based irrigated agriculture.

Now, those areas of wilderness are the site of many proposed SDL projects. It's said that constraints mean the water can't get there. I do not have detailed understanding of the constraints, but all I know is that the water was there in the 80s and in the 90s and the constraints didn't do anything to stop it getting there. So I will just put it there, that that water came down those rivers and no one complained then about effects on their lands because it was part of the natural system.

Now those SDL projects, there are some risks and as far as assessing their - whether they're a good project or not in themselves, they deliver an environmental benefit on a particular site. So, yes, they may deliver an environmental benefit. Is it equal to water flowing into that area in the natural way? And I'd like to add that this is a minute percentage of the water that would've flooded into the floodplain everywhere around here and other places 200 years ago. We're asking or trying to speak up for an area that is - was functioning as wet areas in our region, including lakes where people fished, swam, caught yabbies, fish, et cetera, speed-boating, you know, whatever people want to do when they live in a virtual desert. '

So delivering water to a certain area via an engineering project may be a grand and wonderful scheme that someone thinks up but the areas between will eventually probably die off, give them 50 years. So we're looking at protecting very small spots with these SDL

projects and the remainder will have to deteriorate with time because they are going to be watered by pumps and hoses. It's vastly unnatural and I think probably unsustainable. If you're going to do those SDL projects, I say why don't they have allocated water then that could be in indigenous hands, so that at least you spend the money, they last forever. They've got a right, a water right associated with them? No. They can't have that apparently.

So I just think there are risks. The risks of low flows. What are the risks of low flows to our communities downstream of here? And I feel very much for a lot of the other issues that are brought up. The risk of low flows are blue-green algal events; gastroenteritis just came up as being increased in droughts because there are more bacteria - it was something that came into the media this week in an international journal of water and health, I think. So this is very interesting as well, but also black water events do not occur because of flooding. They occur when all the small floods disappear out of the system. We didn't have them prior to over-extraction and now they will be a risk when flooding is uncontrolled and they can be devastating. So I'm wanting to bring up all of these issues. A whole of the system approach. We shouldn't be - the Basin Plan was put to us as something that would mitigate the effects of over-extraction or water trade and in fact what we have, I think the environmental benefits have been meagre and isolated and it absolutely seems to be clear that if you look into the media and various investigations Basin Plan funds have been used to enrich - or potentially, allegedly been used to enrich corporates or enrich large water holders, or just to malmanage the situation to the benefit of certain States. And this is a national disgrace and I entirely support the call for a Royal Commission. The Murray-Darling Basin has supported our lives and our communities and we wish that it would be able to do that into the future and not just for the term of some small amount of government and not because of pressure. Thank you. I don't think I've got anything else to say. I probably could but that will probably do. Thank you. I appreciate it.

COMMISSIONER DOOLAN: Okay. Thank you.

COMMISSIONER MADDEN: Thank you.

COMMISSIONER DOOLAN: We will adjourn for lunch and we'll reconvene at 12.40 with the Upper Goulburn River Catchment Authority. Thank you.

ADJOURNED

RESUMED

COMMISSIONER DOOLAN: We'll reconvene our hearings and we're kicking off with Jan Beer and Ken Pattison from the Upper Goulburn River Catchment Association. So for the record, I understand you're doing the presentation together?

MS BEER: We submitted the submission together. Ken is much more knowledgeable on

irrigation and metering, the information we put in on that.

COMMISSIONER DOOLAN: Sure. Okay, so basically if you'd state your name and association for the record and then please start.

MS BEER: Jan Beer, Upper Goulburn River Catchment Association, not Authority as listed on the form.

MR PATTISON: Ken Pattison, Loddon Valley Gravity Irrigation District based - centre based in Pyramid Hill.

MS BEER: So I'll just make a statement first up, and I'll be talking mainly about the constraint strategy and the 450. So far under the Murray-Darling Basin Plan it appears to have been all about the acquisition of vast volumes of water, with really no idea if that water can actually be delivered. The constraint strategy is not achievable and consequently the delivery of the additional 450 and enhanced environmental water delivery project of Hydro-cues, which are interdependent projects, cannot be realised. We have seen no documents at all that have analysed the risk; whether the strategy is actually viable, practical or economically and technically achievable and able to accomplish the overall project and its stated environmental objectives, while also optimising economic and social outcomes. In other words, there's been no cost benefit analysis which is essential for projects of this magnitude.

The businesses cases have been poor standard, rushed, limited; for example no farm by farm assessment.

Relaxation of constraints in the Goulburn Catchment will not be happening as the Victorian Water Minister has stated many, many times publically and to me personally in letters, that flows at Shepparton will now be 20,000 maximum per day; 17,000 megalitres per day flow, plus a 3,000 megalitre buffer. And this has been reduced from the initial 40,000 megalitres per day which I believe was the initial modelling. We have not seen the revised business case which is still in Canberra. There will be no, and this is again what the Minister has told us, no overbank flows, only in-channel flows. No flooding of private property, no piggybacking Eildon releases on top of high natural tributary flows that would mean any overbank flooding. No compulsory acquisition of easements.

The Victorian Government Ministerial Council meeting in June 2018 secured agreement that no on-farm programs for the recovery of 450 would be delivered in Victoria or in New South Wales. DELWP have also said that of the 62 gegalitres that Victoria has to find before June 2019, they have - Victoria have found their nine gegalitres and stated they had to look in absolutely every nook and cranny to find it and there is simply no more water to be recovered and they will not consider on-farm efficiency measures to recover 450. So I really doubt that the 450 can be recovered, let alone delivered.

The Goulburn and Upper Murray are the main drivers needed to achieve the proposed 80,000 at the South Australian border and the proposed environmental objectives. So if the Goulburn is taken out of the equation, constraint strategy and delivery of the 450 is not achievable. If one of those projects is not going to be able to be delivered then the other

constraints projects fall over also.

Just a few points here. Mitigation cost for the five constraints projects, excluding Goulburn, is now 760m, and if you'll remember it was initially to be 200m across the board. 450 gegalitre upwater will depend entirely on socioeconomic criteria and communities will not accept individual participation as the definition of positive or neutral socioeconomic outcomes. Neither will Victoria or New South Wales accept that. Constraint strategies do not have the ongoing approval and acceptance by local communities; therefore, they have no social licence whatsoever.

The Murray-Darling Basin Authority is attempting to move from the business cases immediately to implementation, without any cost benefit analysis, without resolving legal liabilities, without resolving easement issues, without resolving issues between States in equitable fashion.

Another point is proposed flows Hume to Yarrawonga is 40,000 megs per day. So how do you fit these flows through the proposed flow further downstream of Yarrawonga to Wakool, which is 30,000? The simple fact is the proposed flows will not fit through the river channels without massive flooding.

It is time that the MDBA publically acknowledge that the constraint strategy has many insurmountable problems and, accordingly, review the practicality of this strategy, which is strongly opposed by local communities. The constraint strategy and 450 were last minute decisions made without any idea whether these projects could be accomplished. Consequently, we now see MDBA pushing Basin States to retro-engineer these projects, to hopefully achieve impossible environmental outcomes, such as keeping the Murray Mouth open 95 per cent of the time without dredging.

As a solution I would say we now have approximately 2,100 gegalitres. We need to use this to investigate whether proposed ecological targets can be achieved with this amount. Ex-Commonwealth Environmental Water Holder David Papps stated he could achieve all his ecological targets without constraints. I would say that we need to - and people continually say "We can't stop the Basin Plan". Well, if you're in private business you don't rush headlong to fall over the cliff. You stand back. You look at what's happening. You revise, review and you reassess. But it seems MDBA and the Federal Government do not wish to do this. But we are the ones that are going to suffer if this continues like it is. Now is the time to stop, reassess, review. Thank you. And I must thank the Productivity Commission for bringing up so many points which we have been saying for so long and no one listened to.

COMMISSIONER DOOLAN: Thank you. Ken.

MR PATTISON: Yes. The Productivity Commission, we've said in our submission, has opened a Pandora's box, and the definition of a Pandora's box is very ugly, awful things. You've slammed the lid on the Pandora's box, having found dead and rotting carp, and you've tried to pump oxygen through the rest of the hundreds of pages in how you might get round the things that you've highlighted. No one's been prepared to go. We've been

talking and talking to what you've raised for that long we've run out of spit. So I congratulate you on what you've put in your draft document.

What you now need to do, because every page, practically every page has got a red flag; there's a red flag practically on every page. The question is now, will you carry through and try and patch it up, or will you red flag what you're hearing across people, across the Basin, that politics is what is driving a lot of this, to the detriment now of the environment and our southern connected basin. And politics, as we know, can make an awful mess of things. We want good environmental outcomes. We want a productive southern connected basin.

If you wish to look at a document, that bears your name, of 2000, it's a pretty candid sort of a document, it's my bible. You could do no better than have your staff and have - go through, albeit with different criteria, different ideas of what the outcome would be. You said earlier on, South Australia don't like the idea of Lock Zero. The science says the sea level is going to rise. The Southern Ocean continually overtops the barrages. There is photographs, there's evidence where it overtops the barrages and runs around the barrages. What are they going to do to secure Adelaide's water supply if the sea level rises? Which is what the science says is going to happen.

So I wouldn't worry too much about suggesting, as this says in there, "The ageing barrages of looking at a way of managing the Lower Lakes in the Coorong". To suggest that you take my water and somehow try and fix the Coorong. And it's not South Australia's fault. Government's did this. They've made the southeast of South Australia into a highly productive area, but in doing so took every litre of water out of the southern Coorong. Killed the seagrass out in the sea and all that sort of thing. Well we all mistakes, we're trying to correct mistakes.

So I would like you to think about seriously of red flagging what you find doesn't work. Might be legislated, everyone might have ticked a box, everyone might have been in agreement in the hallowed bowels of Parliament House and the environment and everything else, but we are suggesting there is a whole raft of things that won't work. And one of the classic examples is 80,000 megalitres at the South Australian border. Jan has just mentioned the constrictions that you would've heard about; the Barmah-Millewa Choke, the Molesworth Choke, (indistinct), and there are many, all the way through. Now I don't know what bank the Government wants to dip into to cover what this means. Piggybacking, buffer flows, Hydro-cues, they're fancy bureaucratic names, "But we're going to flood yah", that's bad English. Anyway, that's what it is. Now this is highly productive land, highly valuable land. Why should they take one for the road, one for the team, over the basis of this water. And 2016 proved we got the flows through, down to the bottom end, and Deverman said, "Didn't quite work, didn't quite happen, six to eight million cubic metres of sand have accumulated at the Murray Mouth". Well sorry, I can't fix that and we can't fix that, but we're damn sure we don't want to see our southern connected Basin communities destroyed on the basis of legislated outcomes that can't be achieved. So I would implore you to red flag what you discover can't be achieved.

Now when you said the Murray-Darling Basin hasn't done any model, they haven't released any more modelling. They've modelled that many damn computers into the scrap heap it's

not funny. Go to them and say, "You haven't released it but let's have a little bit of a look at what you've tried to do", because I'm advised that they've been trying to model. How the hell they're going to do this ever since it became apparent. So they're some questions for you.

So I'll go on to the gravity irrigation and DELWP have released a paper understanding the delivery shortfall risks in the Murray - Lower Murray. I've put in a little attachment here that I'll show to somebody after. Four hundred gigalitres are estimated to be required to satisfy the need of what is already existing down there. Now we've had an incredibly good working relationship with Minister Neville; she's understood, but no one will go near the trading market. No, the market is the market is the market. All politicians. Because we don't pick winners. And I said, "Well I can guarantee you will lose her because it's all coming out of the gravity irrigation district of Goulburn- Murray water. We are losing 5,000 megalitres on average every month out of Goulburn-Murray Water. Every property that is sold, is transferred, an estate settlement or everything else, the water is going off the property because no one on our communities can afford to buy permanently the water. So we're spending in excess of \$2 billion on a gravity irrigation system, so-called modernising it, and the water is leaving faster than you can say "It's down the river". And what are we getting with the river? We've heard Environmental Victoria, we've heard others, we're getting the worst of environmental outcomes because the Environment is watering early in the spring and now we're multiplying their water that's required in the summer. And there appears to be no one prepared to stand up and say, "This is not working. We're getting bad environmental outcomes", and we are; bank slumping, black water, carp. Haven't heard the word "carp" mentioned all morning. Millions and millions and millions of carp. My fisherman friend says, "Great to catch, lousy to eat". They're everywhere, and they are destroying the environmental habitat that they are trying to attract with environmental flows. Why do I say that? I've lived on the Loddon River all my adult life and I've seen what carp have done to the Loddon River. And we've got flushes going down the river and we're going to grow stuff up the banks. They destroy every vestige of growth of things that our native fish would want to live and survive on. The cod at a certain stage, yep, they eat the carp, but until you resolve the way they feed, which is stirring up phosphates and nitrates of an accumulation over all our Murray-Darling Basin rivers, we won't have any improvement in the environment and we're transferring water down the system to hotter, drier climates, transmission losses and we're spending massive amounts of taxpayer's funds.

So we then get back to savings. What a wonderful thing, metering. We've got wonderful meters in Goulburn-Murray Water. They measure blue sky. Now there's been a lot of blue sky bought by the Commonwealth and the taxpayers. Taralee Station was mentioned this morning. Wonderful. I don't know how - 87 million or 85 million, they can go straight back in to Murrumbidgee and the Murray and Goulburn and buy high security water entitlement. They've bought blue sky, because when they had water there was water everywhere, plenty of water in the Darling, and that's happened up and down the whole system. So, savings. We're not far off where Goulburn-Murray Water will not have sufficient water to be over and above what their claiming to be saving through modernisation projects - and I've got a little graph here I can add into. So that doesn't add up.

The metering. Well - and the savings of total channel controls. It comes as no surprise I suppose, they cooked the books. They had to get the project up, they had to get it done. If you want to know, to see the documentation, anything I say I can back up with documentation. You'd know the rotunda in Tatura, just near the railway line. Yes. I met a fellow there one day, it's a daily newspaper, brown envelope in there, not many words spoken, and we took that envelope home, and interesting reading of what we found out in how they established that the Dethridge wheel was non-compliant and Hydro Environmental did a report and a properly maintained Dethridge wheel, run within desired parameters, meets national metering standards. Now if someone wants a high flow, if someone wants a new scheme, put a new meter in. Over 40 per cent of the metering fleet in Goulburn-Murray Water don't deliver a litre or less than ten megalitres. By the end of this - when the money runs out over 50 per cent of the metering fleet will not deliver any water. So hundreds of millions of dollars of taxpayer's funds, and savings claimed, is going out of our system. So instead of having a system that was 97 per cent return frequency under a long-term cap equivalent, we'll be back about 88 per cent on high security water, because the books have been cooked.

Return flows into the river. Return flows from one channel to the other is counted as savings. Shepparton did a modernisation project. They saved the water, they didn't put it into the Broken Creek. The next thing we've got a black water event and algae blooms in the Broken Creek. Environmental water had to be put in. Where was the savings? Yet savings were claimed to come off our bulk entitlement, which is reducing the security of our water.

The Commonwealth buyback. The Commonwealth did not pay the ongoing costs to gravity irrigators in the Goulburn-Murray Water district. The water went; most of it went to the banks, most of it went to survive the drought, et cetera. Those people today have a delivery access share and they are paying the levies and fees attributable to if they had water, and that is devaluing and crucifying our customers in Goulburn-Murray Water. Now the Minister's got a review on delivery access shares at the moment, there's plenty of documents on that, but the facts of the matter is if you relieve them you've got to put it on to somebody else. Goulburn-Murray Water hasn't reduced its staff, 700 people. We've just had the debacle of yet again the CEO with his nose in the trough, bar fridge, expenses, everything else. We've had a run of this since I don't know how far back and people are getting very demoralised as to what their futures are. We're losing our water out of our district.

And as for on-farm efficiencies which is talked about as being the way to go forward, I can see plenty of on-farm efficiency projects but they will not be able to buy the water to run them. And what do they do then? Have a fantastic travelling irrigator centre, pivot pipes and rises. Sixty percent of our customer base was the dairy industry and they cannot afford to enter the water market temporarily because it's too dear. Now when Phillip Glyde writes in the paper, which we've got this churn of media releases of "This is the plan, we can't go back, we've got to see it through, the trading market's working". Too right it's working, it's crueling our communities and the people that we're trying to represent and the people - the people that put kids in the school, doctors, the whole thing down to the corporates. And we've seen the corporates before. Some, they'll lose a lot of money but that - it's not their money. But our communities, they are - it is their money, it is their lives.

And the unbundling of water off the land was an absolute disaster. And you go to Canberra and the pollies will say, "Do you think unbundling was a good idea?" We'll say, "No. We didn't ask for unbundling". If we had training it should never have been going out of our business. We've got ample land, ample infrastructure and ample people to run all these things within our business. And what are we seeing? Going down the river. There's a song "Cry me a river". I'm saying "Drown me a river" because that's - we've got the worst of all outcomes now, already. You worried a lot about setting the framework up for the next evaluation. I wouldn't worry about the next evaluation; we've gone far enough down the track. We've seen enough of what's gone on, and it's in your document to well work out where the end game's going to be. And as for Pandora's Box is, it's there for everyone to see.

Now someone smart just recently said, "You can pluck a chicken one feather at a time and nobody notices". Well, the southern connected Murray-Darling Basin is down to the last few feathers because the chicken's about naked. And you have an opportunity to red flag and highlight, because you've done it here. You need to carry it through now and make sure that what's not going to work, ask the questions, "How are you going to make this work?" Jan worked and worked and worked with Janet Pritchard on a Goulburn Broken committee. She told them and told them. They're not interested, they don't listen. They've got on-time and on-budget and this is the way it is, this is the legislation. I said to them, "What are you doing this for when the sea is going to rise and it's going to go over the top?" "Oh that's not in our criteria." We said to EY, "Who wrote the terms of reference for EY?" We met them twice - I met them twice in the Shepparton office down here, and we said - they said, "How we can deliver it, it's not in our terms of reference. We don't get paid for that". So they put a little box, and it's in our submission, consultants always cover their backside, a little box that says, "Need to have a bit of a look at that". Why go down to all the excruciating stuff, where the 450 was a political deal done with Tony Burke, and Peter Walsh mentioned twice in his second reading speech and mentioned again in his speech just last time. Fancy Littleproud giving a blank sheet of page to Tony Burke and Penny Wong, fixed it all up up north, they're all happy, but 80,000 at the border. And when they put that last paragraph in it was evident of just how polluted and how prostituted this whole process is and how poorly an outcome we're going to get for our communities and for the environment. Thank you.

COMMISSIONER DOOLAN: Okay. Well thank you. I think as you mentioned, Jan, there is a need to revisit, review and reassess, and this inquiry is part of that review process. So it's a regular five year review under the Water Act and it does provide part of that opportunity.

Now a number of the issues you've raised, I think we have also raised and we've made recommendations about dealing with some of the issues that I think you're concerned about. So some of it was about revisiting the modelling and modelling the constraint proposals that are under consideration and actually seeing if the 80,000 megs a day could be met with those new constraints projects and actually getting that information done and made available. So, from our perspective, noting your broader comments, the key elements for us is in what you have before you. Are the recommendations we've made, where we've

actually asked for some of that to be done and made publically available, are there other elements that we have not covered as well as we could, or do those recommendations start to deal with the lack of information around some of the concerns that you have?

MS BEER: I think you've done very well bringing to the fore that constraints aren't going to be finished by 2024. I think it probably needs to be brought up that - the Federal Government aren't going to give the money for constraints, I don't believe, if they can't recover the 450. Why would they do that? And if you can't get the 450, what is the point of the constraints? But there's - look I haven't seen, maybe you have, I haven't seen the rewritten Goulburn business case which sits in Canberra. Have you seen that?

COMMISSIONER DOOLAN: Yes, we've had a copy of that, we believe. Haven't we?

MS BEER: I've asked for it many times but I haven't received it.

COMMISSIONER DOOLAN: But it's not part of the supply projects either.

COMMISSIONER MADDEN: Sorry, I was about to say, we've got to clarify that we've seen the constraints - - -

COMMISSIONER DOOLAN: We've seen the original.

COMMISSIONER MADDEN: That are under the supply package. I'm not sure about the Goulburn because it's outside - - -

COMMISSIONER DOOLAN: So you're right, we've seen the original Goulburn but not the revised because it is not part of the constraints - sorry, the supply projects, so it doesn't contribute to the 605.

MS BEER: It's a standalone constraints project.

COMMISSIONER MADDEN: Yes.

COMMISSIONER DOOLAN: Yes.

MS BEER: I think what you do need to be really pushing is it needs to be remodelled because the modelling they have done previously is now no longer relevant because they were initially talking about a 40,000 flow, now they're talking about a 20,000 flow.

COMMISSIONER MADDEN: Yes. So just so you know, we have discussed the differences that you talked about, going down to 20,017 within the free board or whatever, the buffer. So we have our discussions on that when we're talking about the modelling. So it's recognised that modelling - well we were informed that that hasn't been done and so - - -

COMMISSIONER DOOLAN: And that's why we've - - -

COMMISSIONER MADDEN: That's what our recommendation is actually aiming at. Given the supply package and Goulburn Broken - sorry, the Goulburn constraints project are not what they were originally envisaged, as a package, we've said that modelling should be done to see what is possible against then Schedule 5 outcomes.

COMMISSIONER DOOLAN: Outcomes.

MS BEER: And I can't remember, forgive me, but in your document whether you then said that because the Goulburn constraints case has now changed so much, the interaction with the other projects of course comes into play then. The whole thing, the whole projects then need remodelling. And because they're so interdependent then they need to be looking at the Hydro-cues are enhanced, environmental water delivery and the 450. So those things are all so intertwined that the whole thing must be remodelled, revised, reviewed, whatever. And I think that, along with the constraints - sorry, cost benefit analysis will probably pretty clearly show you're not going to get your enhanced environmental objective for some of those at the border.

COMMISSIONER MADDEN: So we haven't made any call on that and it's not within - well, for one, we don't have the information because it hasn't actually been analysed, given that the new package has been recently developed. We agree that that work should be done but we can't pre-empt, as a Commission, what that might find. So what we are saying though is that a program and its original objectives, good public policy, we'd say that you - once you design that program you recheck that it can meet its objectives and you look at also budgetary changes and go through an evaluation, a re-evaluation. Now, we're not trying to say what that might mean and what that might find but it should be based on not only solid and the best available information, but also that information should be transparent.

MS BEER: Have you also made the recommendation that in their structure they're trying to leap from business case directly to implementation, but there's no integrated policy between States or work plan worked out with - - -

COMMISSIONER MADDEN: Yes. So this is the gateway process that Jane's mentioned a number of times.

MS BEER: Yes. Is that what it's called, gateway process.

COMMISSIONER MADDEN: That's bureaucratic speak which is - - -

COMMISSIONER DOOLAN: We're calling that.

COMMISSIONER MADDEN: It's named basically for its series of gateways, so you progress from business case through to full feasibility and, you know, assessing risk along the way. So it's actually a process where various assessments have to take place and are very formal and potentially an independent way.

MS BEER: Are we talking about the same thing there though, that this needs to be

integrated between the Basin States, not just - - -

COMMISSIONER DOOLAN: So we've made two recommendations in that area. Firstly, that each of those supply projects, which includes the constraints projects, not Goulburn because it's not part of it, but the others, actually when they're at detailed design phase, and the Federal Government is funding that next phase, at that point they go through what we're calling a gateway process to have the environmental benefits changed, what is - has the cost changed and has the timelines changed. So that provides a wherewithal to sit back and look at those projects and decide whether they're going to go on with them or not.

COMMISSIONER MADDEN: So - sorry.

COMMISSIONER DOOLAN: The second part - sorry - is we've also recommended that you look at the supply projects as an integrated package and that there are processes for consistent policies between States on key elements of them. And some of that is how landholders would be dealt with in constraints, but it's also about how community consultation would be undertaken in a consistent manner and how consultation with traditional owners would be undertaken in a consistent and respectful manner as well. So those things are already in our draft recommendations and that's really what we're consulting on now, as to whether they're adequate or they need further review.

COMMISSIONER MADDEN: So I'll just add that, for me, that process in terms of assessing benefits would have to take into account what the revised Goulburn project is and how that interacts and enables you to deliver.

COMMISSIONER DOOLAN: Or the modelling would.

COMMISSIONER MADDEN: Yes, no the modelling would, so you'd have to take that into account when you're assessing the revised constraints under the supply package. You can't just ignore one of the sources of high flows down to the border. So it wouldn't be within, in a sense, but it would have to be taken into account.

MS BEER: Yes, so one of your recommendations would be that the Goulburn - what do they call it now, they keep changing names - Goulburn key focus area, which is what the constraints was, you would be recommending that it must be looked at in conjunction with the other constraints strategy when they're redoing the modelling, or whatever. Because as the MDBA have said themselves, and they keep repeating that Goulburn and Upper Murray are the two drivers of this whole strategy, so if one falls over.

COMMISSIONER DOOLAN: However, we - yes, but we also do note, so we've recommended that modelling to occur and be then transparently available. We've recommended the gateway process look at all the projects, but we do note that if they fall over they contribute to the supply package and that would mean water would have to be made good.

MS BEER: So you mean it's then got to be bought in.

COMMISSIONER DOOLAN: If there is a failure of those projects and the 605 gegalitres offset is not able to be met, then Governments do have to make good the difference.

MR PATTISON: So what do you do if you can't deliver this without socioeconomic ramifications? Which is the log dam which is what was put in that 450 upwater to make sure it wasn't going to happen.

COMMISSIONER DOOLAN: This isn't the 450, this is actually about the supply package which buys the 605. And constraints are a significant part of that.

MR PATTISON: That's right.

COMMISSIONER DOOLAN: So, we have recommended that if they go ahead, people think it's a good deal, then they do extend the timeframes because they're important projects, subject to milestones and credible checks and balances.

MS BEER: I thought under the three stage phased assessment that if they didn't make it to be deliverable and operational by 2024 that was it.

COMMISSIONER DOOLAN: That is the current settings.

MS BEER: That they're thrown out, is my understanding.

COMMISSIONER DOOLAN: That's the current settings and that's - - -

MS BEER: So do you mean they can then reset it?

COMMISSIONER DOOLAN: No, our recommendation is if some of those supply projects are important and effective, good outcomes and people want to go along with them, then if they need it their timeframes should be able to be extended to deliver that. Okay? But if they are not extended then they fail early and the supply projects have to be made good.

COMMISSIONER MADDEN: So we've got to be clear that made good essentially means entering the market or changing rules.

COMMISSIONER DOOLAN: Well recovering water.

COMMISSIONER MADDEN: Recovering water.

COMMISSIONER DOOLAN: And that recovery of water, because it's part of the bridging the gap, does not have to be socioeconomically neutral.

MS BEER: I didn't bring it in this time but I did in the previous submission I think, I could never understand how the Goulburn constraints case failed initially and still got put back in for reassessment, where it clearly says under that phased assessment it should not be reassessed if it's failed the criteria.

COMMISSIONER DOOLAN: Well currently it's not part of the supply. So it's registered but it is not part of the supply. It's not part of that package of 605. It's not.

MS BEER: But I didn't think that mattered. I thought the phased assessment was the phased assessment of each of those projects, whether they were supply, efficiency or anything else, constraints.

COMMISSIONER MADDEN: No, not efficiency.

COMMISSIONER DOOLAN: No, not efficiency.

COMMISSIONER MADDEN: It's very much on the supply.

MS BEER: It's now a constraint. Well it was thrown out because it was - didn't deliver the supply. So now it's been put back in under another name. That doesn't quite ring as though it should happen.

COMMISSIONER MADDEN: No, it's still being assessed but outside the 605 supply package.

COMMISSIONER DOOLAN: The supply package, yes.

COMMISSIONER MADDEN: I know it's technical and this is obviously part of the problem with this whole discussion.

MS BEER: I was just concerned that you - you sort of didn't mention that, that it was a supply measure, it couldn't supply more than three or four gigs. It wasn't economical, viable. It disappeared and then suddenly it's gone back in to be reassessed under a slightly different name.

COMMISSIONER DOOLAN: Well that definitely is not part of the supply package.

MS BEER: But you don't think that's worth mentioning?

COMMISSIONER MADDEN: We'll have to have a look at it - - -

COMMISSIONER DOOLAN: I think we do mention it actually.

MS BEER: Do you?

COMMISSIONER MADDEN: We'll have to look at it within the report.

COMMISSIONER DOOLAN: No, we do mention it.

COMMISSIONER MADDEN: Yes, but I'm just saying what does it mean.

MS BEER: Recommend that it should be thrown out.

COMMISSIONER MADDEN: The gateway process for us is actually looking at the supply. The process then for the Goulburn, I think we've been - - -

COMMISSIONER DOOLAN: Is a different process.

COMMISSIONER MADDEN: Yes. So we can have a look at that.

MS BEER: Our main thing is with constraints, and you probably will say well it has to be remodelled to show us that, but you simply cannot deliver the water. You cannot get it down the system because of the myriad of chokes without massive socioeconomic damage.

COMMISSIONER DOOLAN: But, as you say, that actually has to be modelled and shown transparently, and that's what we have asked to have happen.

MR PATTISON: Could I just make one comment. In regards to your comment on Victoria being recalcitrant in actively pursuing these issues, I would completely disagree with that. We've been working with the - - -

COMMISSIONER MADDEN: I don't think we've made any comments about States in particular.

MR PATTISON: Anyway, well it's there somewhere. Victoria kept asking, which is you're now asking the Murray-Darling Basin, "Show us how this can be done", because the water managers, and we've got an excellent one that I highly regard in Goulburn-Murray Water, just said, "It cannot be done within the laws of Victoria". Now it's all very well for New South Wales to change their Water Act that says, "If we put environmental water down and oops we make a mistake, we're not liable". That's not what the Victorian water law says. And I've sought much legal advice and it comes right back on to the customers, which won't have the money. It will go back on to the Government. And this minister and this Government, and we've got an election in five weeks, and I believe the opposition have said that they will not take away the liability of a flow of water onto private land. And as Jan said, 10,000 megalitres at the Molesworth Choke, after that you flood private freehold land.

COMMISSIONER DOOLAN: So again - - -

MR PATTISON: Good.

COMMISSIONER DOOLAN: We need the modelling - - -

MR PATTISON: Yep.

COMMISSIONER DOOLAN: To be publicly available to show the outcomes.

MR PATTISON: When do you think you might get that?

COMMISSIONER DOOLAN: Well we've recommended it. We need to see Government's response - well sorry - it's recommended in our draft report. We will need to make our final report to Government and then they'll have to respond.

MR PATTISON: Do you think you'll get it before you make your final report?

COMMISSIONER MADDEN: Well we'll have a look at some submissions. So that will be an important point. The Department has put a submission in. The Authority is likely to put a submission in, but it's not yet arrived, so we'll see their response to those things. I guess just to comment on this. We may approach it with different language but I think we are agreeing on some things about information and transparency. So issues like can the constraints be done? We hear both sides. We hear "Just get it done". We hear people saying "Change laws overnight". You know, so I guess what we're trying to bring here is a process that actually resolves - starts resolving these issues one way or the other, and then getting a response from that point.

The thing that we've had a lot of the time is actually issues being kicked down the road, another year, another - et cetera and we've still got a deadline looming. That doesn't move at this stage. If, with constraints lifting, only a certain amount can be done and it all depends on processes in different parts of the system and there will be different outcomes, depending on negotiations and the like, it's a matter of, "Well, what does that mean once a package, a revised package", whatever you want to call it, "along that pathway is actually - well what is it in the end, and then what does that mean?" I think what we're trying to do in our recommendations is actually get a structured process that actually has information available to all, so you can actually interact with that; you know, talking realities, bluntly. And I'm not saying people are unreal, it's just that we actually don't have information to coalesce around and discuss at the moment. That's been stop-start with different negotiations. We think it's an opportunity for all and not just the Authority but the Victorian Government, the NSW Government as well, to actually say well what's the information we need going forward.

MR PATTISON: So in your draft report, if you find something that doesn't work will you red flag it?

COMMISSIONER MADDEN: The issue is that without modelling and without information - - -

MR PATTISON: No, just generally. If you find - - -

COMMISSIONER MADDEN: No. No, I'm just saying - you can say what "red flag" means but red flag to us is actually there's a danger. It's not a stop. So we do not have the information to say "Stop" something at the moment because we don't have the modelling, we don't have the detailed business case. It is actually the next year or so. People haven't gone out - going on Menindee but also in New South Wales that we went and saw landholders along the river, they haven't seen anyone for a year or two.

MR PATTISON: Neither has Jan.

MS BEER: Three. Three years.

COMMISSIONER MADDEN: Yes. I'm talking Menindee particularly but, yes. But things started and then stopped. So they don't even know what the actual detailed proposal is, so - - -

MR PATTISON: Did they explain to you why they stopped?

COMMISSIONER MADDEN: No, so I'm talking about the landholders saying they haven't seen anyone.

MR PATTISON: Yes, but - - -

COMMISSIONER MADDEN: We know why it stopped, because they basically went into a whole negotiation phase and putting them into the supply projects. So they do have to restart. Our red flag is that when they restart they have to very quickly coalesce into real plans and a prudent and sound judgment has to be made on their likelihood of success within that certain time frame. Then when that information is actually made transparent to all, what are the ramifications for the effectiveness of the plan? So, bluntly, the work needs to be done in the next year or so, and it needs to be put out and then people - by that I mean the Authority and Governments - have to be then honest about what does it mean for their original objectives of the plan.

MS BEER: And I think already the Basin States, Victoria and New South Wales, they know it's not doable and they're reluctant to spend more time or more money on it knowing that. I mean that's what you hear from them.

COMMISSIONER MADDEN: Yes. Bluntly, they're about to spend, after agreements are struck, they're going to spend Commonwealth money for the first phase.

MS BEER: Yeah, they like spending Commonwealth money.

COMMISSIONER MADDEN: Yes, so that's why there's a bit of a hiatus at the moment.

MR PATTISON: Don't worry about pork on your fork. Just follow the money trail to the trough.

COMMISSIONER MADDEN: So we don't want to be talking too much because we do want to listen. But it's important that I think we get what the basis of our recommendations are, quite clearly. So we've got a little about the process of assessment. Are there any other questions that you have, or areas?

COMMISSIONER DOOLAN: No. I think that's covered my key areas. Yours?

COMMISSIONER MADDEN: No, no. I mean accountability to me is an important

point that was raised and I think that transparency is an important point in that as well. So, thank you.

COMMISSIONER DOOLAN: All right, well thank you very much.

MR PATTISON: Thank you.

MS BEER: Thank you very much. We do thank you for your report. It's the best report we've read for some time.

COMMISSIONER DOOLAN: We consulted widely across the Basin and have tried to reflect what we heard.

MS BEER: Great. Thank you.

COMMISSIONER DOOLAN: The Greater Shepparton City Council. Do we have Peter Harriot and Geraldine Christou. Thank you. When you're ready, would you mind state your name and affiliation, for the record please.

MS CHRISTOU: Geraldine Christou, Director, Sustainable Development at Greater Shepparton City Council.

MR HARRIOT: And Peter Harriot, CEO, Greater Shepparton City Council. Well thank you, thank you for allowing us to present today. We're general practitioners in the area of water. You'll no doubt hear from a range of experts. We don't have the detail in relation to the water debate but we're here to represent our community, 65,000 population in the Greater Shepparton area, and water, it's fair to say, is their number one issue and it underpins our whole economy.

So I'll start by saying *gulpa gucha*, or welcome in the Yorta Yorta language. The Goulburn Valley has had 60,000 years of history of managing the valley, managing water, using water in agricultural practices over those 60,000 years. It was used in perfect balance for 60,000 years. However, 200 years ago we saw some change in that regard. Settlement occurred and unfortunately Aboriginal knowledge was lost, and we saw vegetation removal and water practices that needed to be improved. Now it's fair to say that by 2012 when the Basin Plan was put in place the Goulburn Valley and the State of Victoria had looked at the past 200 years and seriously recognised that things needed to be done differently and had put in place major modernisation efforts in the irrigated agricultural space. There was the start of the \$2 billion of investment into the channels and the systems and I think we heard about our water authority in the previous speakers, so Goulburn Murray Water in partnership with the likes of the Goulburn Broken Catchment Management Authority and the whole community in general worked together to say water is our number one resource, underpins our economy like nothing else, therefore we're going to be leaders in relation to management of that water system. We're going to have smart meters and we're going to have smart irrigation practices and we want to regulate appropriately and we want to make people responsible for appropriate water use.

So by 2012 I think we had some really good practices in place but there was a need for the Basin Plan, no doubt about that. And the Greater Shepparton City Council supports the Basin Plan at the 2750 gigalitres. We must have healthy river systems if we're to utilise that water for everything you see in this basket of goodies. The industry associated with not only food production but manufacturing in the Goulburn Valley is as big as anywhere you'll see in the State of Victoria or even the nation. So it, as I say, is critical to us.

Our main point is the additional 450 gigalitres of water being potentially taken out of the system and what impact that will have. We've already seen from reports that have been done by the GMID or the leadership group, who you're hearing from later, but Council is a member of that group. We've seen from the work that we've done in that group that the impact of the plan as it stands over the first five years of its implementation has seen \$550m worth of economic activity lost to the region and 1,000 jobs lost from the region just in the water being returned. Now to put that into some sort of scale, the Hazelwood Power Plant was closed down; that was a loss of 750 jobs and that had every available helicopter fly into it with every available Government cheque book available to restructure that place on the basis of 750 jobs being lost. This is a much bigger impact. The five years of the implementation of the plan is a much bigger impact than that and it's got ongoing impacts. As I said before, we're committed to the plan, we need the plan, but we've got to recognise that it's having impact on regions such as ours.

In summary, our issues are the risk of losing more water; the neutrality test surrounding the 450; the accuracy of water savings and recording and whether that - you know if we don't really - we're not really confident in this calculation exercise, it underpins the whole credibility of the plan. The level of compliance from the other States, as we've seen in recent times, has got to be questioned. I guess I want to finish, before Geraldine might make some comments, is just to reinforce the importance of these businesses to our region and the investment that is being made over the last hundred years supporting the irrigated agricultural systems we've got here in place. It's not just the \$2 billion that has been invested in the modernisation, it's not just the investment that's being put into the farms, it's not just the billions of dollars that has been invested in the food manufacturing areas, but it's the investment in the schools and the communities and the hospitals and everything that surrounds these key cities that sit beside this magnificent GMID irrigation district. It's sunk investment, I guess. It's certainly investment that's there and shouldn't be wasted, it should be utilised, it should be leveraged upon and, therefore, if we're going to have irrigated agriculture into the future this is the area for it. We should be maximising the use of this magnificent asset and that means retaining as much water as possible. It certainly means using it as efficiently and with the most modern practices we can imagine, but it certainly means retaining as much as possible in this area without further loss. So I might pull up there as my opening comments. Thank you.

MS CHRISTOU: Look I'd just like to say, to really hone in on the point about the 450 gigalitre recovery. It's holding this region back. There is uncertainty around the 450 gigalitre recovery. Part of my portfolio is investment attraction and economic development. The investment that we have had in this region, that we've been fortunate to have, an example is the \$100m that's being invested in Freedom Food around UHT milk production and infant formula and those sorts of things which are prime export product for

us, they are relying on, particularly the dairy industry, to keep that processing factory going. And the 450 gigalitres is stifling the region. It's had such an impact; the implementation of the plan has had such a significant impact on the dairy industry already and I think Peter's prop here of the balancing of the 450 gigalitres holding up, you know, the production that's happening in our facility is a real visual - a visual example of just how paramount - how much of a tipping point we are with the 450 gigalitres.

COMMISSIONER DOOLAN: Do you want to start off?

COMMISSIONER MADDEN: Yes. I guess, given your background and experience, we won't go into all of the detail on the - you know, the ins and outs of the plan. But I was interested in hearing the kind of proactive steps in terms of maximising the use of the assets. Obviously these commodity prices have driven a lot of - or is the background to a lot of the trade movement and the like, but it is a new system, or the \$2 billion of investment I assume have increased reliability or standards of service level and flow rates and the like. I'm just wondering then, do Council - and I'm probably not speaking on behalf of Goulburn-Murray Irrigation, but what are some of the things in terms of proactive projects that have actually been done to actually attract business to this area, and by that I mean irrigation type business?

MR HARRIOT: Yes, so from Council's point of view we've - or one issue, we've adopted an international engagement strategy to, well initially to lobby for the fruit protocols to be put in place as part of the free trade agreement. You know, we're only a small player in that but we'd like to think that we influence that a little bit. And now that we've got the protocols in place for stone fruit, the work now is with the apple and pear protocols and if we can get those in place that will provide greater export opportunities and that's significant for our area, and is another means of providing some independence from, you know, the Coles and the supermarket - Coles and the Woolworths side of things. And we were in China just this September, we attended the Fruit Logistica Conference at Hong Kong; that's where a lot of our growers go, there would have been a dozen or so of our growers there trying to sell their product at one of the major food fairs in Asia. So, yes, I was just - - -

MS CHRISTOU: The other project that we have undertaken from Council's perspective is the Great Things Happen Here campaign.

MR HARRIOT: Sorry, just before you go to that, I just want to finish on the international.

MS CHRISTOU: Sorry.

MR HARRIOT: Yes, I just lost my train of thought there a bit. So with that access to the markets in China, or greater access to markets and the greater potential for export, that will in itself lead to major restructure of our horticultural industry here in the Goulburn Valley. So further modernisation. So it's probably less on the water side this time, but more in the storage and logistics and packaging and sorting and that sort of thing, and probably some consolidation of that. There's around about 80 pack houses at the moment and they could probably be consolidated into larger facilities with modern freight logistics access. So there's potential for major investment in that area which will be good for the region. Sorry,

I cut you off.

MS CHRISTOU: No, you're right. So the other project that we have is the Great Things Happen Here campaign, we have an ambassador attached to that, Charles Wooley, and that is about recognising the great things that are happening in Greater Shepparton. The reason that campaign was born was because there was a lack of confidence, both by our community and from people wanting to invest here. It came about at the time where SPC was undertaking a strategic review of their operations, so the sentiment in the media and amongst some of the community was, "Well, SPC's going to be exiting the Goulburn Valley", so no one in Greater Shepparton was expanding, no one - you know, there was a lot of trepidation from people wanting to invest here. So that campaign was about recognising the great things that are happening here; about, you know, the amount of exports that are happening from this region, the volume that's occurring, and that in itself has had some impact on instilling confidence back into the region. The message that we get back though all the time from, you know, people wanting to invest and from our own community is, "That's all very well, there are some great things happening here, we've got some great construction going in, we've got some good Government funding that's come through with the hospital and the courthouse, but that 450 ggalitres that - the confidence around water going - water security going forward is still holding us back".

COMMISSIONER MADDEN: Do you work closely then with Goulburn- Murray in terms of that water futures type kind of planning?

MR HARRIOT: Yeah look, as I said from the start, we're general practitioners but we tend to sit on most committees and discussions that are going in this regard. Our major impact in the water discussion is through the GMID Water Leadership Group and other senior leadership groups, some of them coordinated by the CMA.

COMMISSIONER DOOLAN: I mean we will be hearing from the Water Leadership Group later on today and we're aware that that Leadership Group released their criteria for socioeconomically neutral, and then two Governments released theirs. Your take on criteria, and also are there projects in this area that would meet those criteria, from your perspective?

MR HARRIOT: Well look we participated in the - I think it was a day long workshop to put these together, so we definitely support them. We believe that it's going to be difficult to meet this test, if not impossible, because we've already done the analysis on the implementation of the plan to date, let alone this additional 450. And what the RMCG report clearly says is that there's significant impact already. So it just follows that any additional water is going to have impact and, therefore, won't pass the test. So I think it's great that we've got additional clarity being provided by the GMID Leadership Group with this further neutrality test criteria, but it's hardly necessary.

COMMISSIONER DOOLAN: It was more about are there proactive projects that actually people would want to do to assist in the Great Things Happen Here and attracting more investment to this area, which would meet the criteria but would also bring investments. So it's just a question of just generally, because I suppose in some of the other

places in the Basin, and we understand they're different, we are hearing that it would be possible to meet the criteria and that there would be investment and there'd be some good projects. So it's really just - - -

MR HARRIOT: Yeah. I guess that goes to the difference in the regions and the fact that we've been a heavy lifter in this regard and have provided a large volume of the water back to the environment; a large proportion of the 2750 has already been recovered from this area. I'm sure there are still good projects and you'll hear from those, from the likes of Chris sitting over there and GMW. Yeah, that's about all I can say.

COMMISSIONER DOOLAN: Okay.

COMMISSIONER MADDEN: Okay. Thank you.

COMMISSIONER DOOLAN: Thank you.

MR HARRIOT: Very good. So we'll leave you our box of goodies to represent the great production, and if you don't mind we'll keep our 450 gicalitres.

COMMISSIONER MADDEN: We may have to donate that to someone.

COMMISSIONER DOOLAN: We're really sorry but we can't accept it.

MR HARRIOT: Oh okay.

COMMISSIONER DOOLAN: So if it is possible to donate it that would be lovely, but we're sorry we can't.

COMMISSIONER MADDEN: Anyone involved in St Vincent's de Paul or someone?

COMMISSIONER DOOLAN: Homeless shelter.

MR HARRIOT: We could organise that for you. Okay.

COMMISSIONER DOOLAN: Thank you. Thank you very much.

COMMISSIONER MADDEN: I will have a look at it after, so we know what we're missing.

MR HARRIOT: Yeah okay. Yeah, all right, I'll leave it there and we'll sort that out.

COMMISSIONER DOOLAN: Our next participant is Maria Riedl. Hi, if you wouldn't mind again introducing yourself for the record, please.

MS RIEDL: My name is Maria Riedl, I'm here actually from Buronga, New South Wales. I've lived in Mildura Victoria since 1981 directly, and now directly adjacent to the Murray River across from Lock 11, Lock Island since 2000. I couldn't submit last week in Mildura

because I was in (indistinct) . I've come to do so in Shepparton. My interest is the Water Act 2007 and the Murray-Darling Basin Plan, and I've actually attended a lot of the consultations for the draft plan in Mildura and I actually made the effort to go Renmark to see how South Australia was doing, to Adelaide further downstream, and to Melbourne to see what was happening there, as well as Coorang.

The case I think is quite clear, that it's really difficult to readjust something that you've given, you know, if you've given - the Government actually said, you know, expand, grow, et cetera et cetera using as much water as you - it didn't how much water you used or lost. And this presented a problem, you have to grab back some because the whole system was degraded. The Millennium Drought just highlighted this because that was a very long drought, nearly 14 years, it was ten plus years, and the problem is that you're upstream from us. So, like I said, I'm from Buronga and I go to Wentworth a bit. I've been to Broken Hill, I've been to Pooncarie a couple of months ago to see what their situation is. You're lucky down here because the Darling is going to - they're going to stop all flows from the Menindee on December 1st. There will be no flows from Menindee, and that's because New South Wales has done deals and is doing deals, et cetera. Now the problem there is that it's not - Tandou - well I'll probably go through this - so I've come to the conclusion that the rivers are over-allocated, the whole Basin has been over-allocated and it must be re-done so it actually can survive the next drought and the next drought. Now climate change obviously has set in, so it's not just a drought, we've gone a step down. The amount of water that is available if - and Lindsay Leake would have told you with a graph, it is a lot less than it was a few years ago, and it's becoming less and less as rainfall sort of doesn't happen.

So basically we're still ignoring the idea that we have to make do with less water, and the environment has to make do with less water. So basically climate change has exacerbated the extent and severity of drought, intensified by historically high temperatures at the same time. So we've got real issues. The rivalry between State Governments and Government bureaucracy over allocation of water licences to appease farmers and industries for a political gain meant a 65 per cent increase in water from 95 to 96/97 and irrigation grew by 76 per cent. This is over-commitment, over-extraction and it led to river and ecosystem degradation. And this is why the plan was important and brought in by a Liberal Government of all things.

Now the key feature for achieving major water reforms is the implementation of SDLs, to regulate environmental water requirements within the Basin catchment. And the whole thing happened because of bad management and unsustainable use.

The successes that you've highlighted - and I congratulate you on your report, I think it's excellent, it's the best thing about that Darling Basin Plan, and I've seen a fair bit of it - you acknowledge that there has been significant progress. There has been significant progress and we forget that. Over 750 environmental water events have occurred in the last five years. Water recovery is largely complete. 1,995.8 gegalitres of adjusted target, 2,075 gegalitres has been delivered to the environmental water holders; 60 per cent of this was bought from willing sellers and during the drought obviously there would've been willing sellers, but they were willing, unlike - I went to a meeting in Gol Gol where Mr Joyce stood

up and he said, "They're going to steal your water". Well that was incorrect. Those people wanted to sell it. Fine, they were in dire straits but it gave them an out.

The remainder through programs that modernise water infrastructure. New rules for the provision of critical human water needs in the River Murray have been established, as you've pointed out. Integration of salinity targets into salinity management frameworks. Now people forget, downstream is where the salt goes. So if you don't get it out of the mouth a river dies from the bottom up. So, therefore, the idea that you can put locks or weirs or something like that and keep the water further upstream is not a good plan and it does not achieve what we want to do, which is a certain amount of water up the mouth regularly. And this has to be done, otherwise it starts dying from the mouth up and it will reach as far as who knows.

Okay, so Basin States have an opportunity to demonstrate commitment to jointly implement the plan. Now we've got problems with Victoria and New South Wales; they don't like certain things and they think they're getting hard done by. Anyway. So the other thing is water resource plans are behind - these are the failures, there's a lot more positive, these are the failures. They're behind time, there's major implementation problems and risks in terms of implementing them by 2027, unrealistic timeframes, lacks transparency. There's a whole bunch of stuff that you've pointed out that is quite correct. That there are real issues. Another issue is perhaps, as you said, divide the Murray-Darling Basin into two bodies; one is, you know, puts the plan in place and the other has got a regulatory role. And that's a very good suggestion because the Murray-Darling Basin is not publishing information of compliance, there's lack of meaningful consultation, community consultation and how environmental outcomes will be monitored, et cetera, et cetera.

Now the other thing, the recommendations that you give are really good. Clear objectives to maximise environmental outcomes. Clear guidance, et cetera, et cetera. And so I've gone through a whole bunch of stuff and - okay, milestones, strategic leadership, take joint responsibility. That's the role facing governments and they're not actually achieving that; they're sort of buddying up with whoever, you know, gets them - so they can keep more water.

Okay, compliance should be brought into an office of the Basin Plan regulator and include compliance and evaluation. That's fine and I'll go through that. The climate change is a new normal. It is not just drought, and Peter Mailler, this was - he was on I think one of the programs last week, third generation farmer says, - and this is a farmer talking, and there's a lot of farmers out there that actually agree with the Murray-Darling Basin Plan and implementing it in full because they realise that if you don't have a healthy river system you don't - and also if you don't support ecological targets, et cetera, et cetera, then the whole system collapses and nobody will benefit. You know, you won't be able to grow this stuff, or go overseas and sort of try and sell your food over there. So he said, "You can't keep arguing, this is just a cycle". He doesn't expect to be farming his 6,000 acre property near Goondiwindi. "There are dry periods, yes. Wet periods, yes. There are warm periods, yes. Cool periods, but we've shifted averages. We're running out of tricks", and that's what it is, we're running out of tricks. We're not going to get a coherent policy around drought if we don't deal with climate. If we don't have people who won't admit something here

needs to be done. And this is still the case. You know, I've got a whole list of articles where every day in the paper, "Oh, they're taking our water. Oh, we won't be able to grow this. Oh, you know, we need more water". The Windsor inquiry in 2011 recorded that Aboriginal people themselves have not been consulted, et cetera. In terms of the Menindee Lakes business case they failed to consult with the Aboriginal communities, which you've pointed out and I've given you documentation regarding that. That's in risk assessment associated with the Aboriginal heritage risk, technical elements, et cetera, et cetera. That's up in the north, I'm not sure about down here, but I know that along the Menindee system, the Darling River system there's been real issues, et cetera.

There's clear uncertainty in actual water savings and actual project costs, et cetera. There's 160 water licences going back to the Lower Darling, along the Lower Darling. They have concerns. Have they been addressed? No. What's happened is that a large corporate farmer, Webster's, bought out Tandou, and so what's happened there is they - they somehow got \$78m from the Federal Government in two bundles, because they split it up so they could justify it, and the other thing is then they got to use the environmental water that was acquired by the Commonwealth Water Holder for another year, to grow another crop of cotton. And they made a \$35m profit. Now, they were compensated. They were also compensated partly in that 78m on what their loss was going to be into the future, their business losses. So they were compensated, but the 160 other people that live along the river are not compensated and they deserve compensation. So the additional 40m for the loss of future business and surrender of works approvals, and the first and only compensation payment under the Murray-Darling Basin Plan. And that sets a precedent and it should set a precedent because it was badly done.

Then there's another project, the Menindee project, which obviously is going to decommission some of those lakes because they - there's a lot of evaporation. Now in decommissioning they're also forgetting that there's high security and general security water along the river, not just Tandou and Webster, but along the river. These people have had no chance to meet and discuss with the New South Wales Government in an equal turn basis, whereas Webster did, had meetings, closed doors et cetera, they have not been able to meet and so that water has just been basically taken off them, which is not the plan. That is not part of the plan. The plan says you can't be worse off, et cetera.

So let's see, Tandou got privileged treatment and there's serious issues. There's a breach of the Commonwealth Procurement Rules due to discrimination between suppliers of different sizes, a corporation or a family corporate farm versus the little farmer down the hill. So, plan also requires that water saving projects must ensure no detrimental impact on the reliability of supply to water holders. And so the Menindee project actually is a serious concern. SDLs create a statutory basis for water licences. So they're a financial asset. They must be based on robust, credible and defensible numbers to avoid risks to irrigation businesses, the environment and to the financial sector, because the financial sectors lends, because now water is a property right, basically a property even though it's there and not there, depending on how much water there is. Banks lend money if you've got water. I know because we've got, I think, 400 megalitres of water and we sell it and whatever and we can borrow money on it and all sorts of stuff. The amended SDLs, because they were amending them, undermine the financial security of all water licences and increase risk to

the financial sector exposed to water.

I'll just skip through. Transferring SDLs between valleys undermines the scientific justification for SDLs and moving SDLs between valleys has implications for downstream flows, environmental targets and socioeconomic impacts. So this is to do again with the Barwon-Darling et cetera. And basically in that case the Federal Government has bought ghost water because basically Tandou didn't grow a crop for five of the 14 years that - due to lack of water. So in actual fact, is the water there that the Commonwealth has bought? And how often is it there? I'm not sure if it's high security water actually. Now Barnaby Joyce said, "Oh there's going to be no more straight buybacks" and then all of a sudden there were three since June. There have been three buybacks after people approached them, huge buybacks. And so there's been no assessment of actual availability of water under licences because security water has been reduced because of increased extractions upstream in the Barwon-Darling and its tributaries. And that was a comment by Bill Johnson, who was the MDBA Environmental Water Planning Director.

And the other thing is, let's see - I'm just going to flick through because I'm holding you up - here's where a government steps in, or you know some people have access through back doors or front doors. New South Wales Former Minister for Primary Industries, Katrina Hodgkinson, set altered water sharing plans for the Barwon-Darling, even though the public consultation on the draft plan had finished. So Ian Cole went to her and whispered in her ear and so he got what he wanted. And he's since sold to Webster's upstream for 45m. Water sharing plans disadvantage people downstream. So the impacts of the changes made to suit Ian Cole and others were that diversion of water for irrigation grew by 32 per cent or 51.4 GL.

So anyway that's New South Wales. David Papps, who was mentioned before, retired five years ago as the man responsible for the Commonwealth's portfolio of environmental water, said the biggest problem was the lack of commitment from New South Wales and Victoria. The accusation is that they're failing to do their part on enforcement and being overly influenced by irrigators. There is a functioning water market and there is now available - water available on the market for purchase. And so that's what the market has done.

The other thing is Victorian, Lisa Neville, has formed a political alliance with Blair and their lack of commitment to a full, proper implementation of the plan is seriously compromising its environmental outcomes. There was something yesterday, I even heard it in Hobart, there was something - that they weren't going to do something. So New South Wales is going to fail to meet the deadline for developing a crucial water resource plan. That will underpin the Murray-Darling Basin Plan, and Bill Johnson basically said that. Basically he sort of said that the Murray-Darling Basin Authority, and I'm not sure if it's true or not, is more interested in meeting its schedule, correct accreditation schedule by 30 June 2019.

Now of the 33 water resource plans, one has been approved. They're due next year. One has been approved, one is in the process of accreditation, 11 are something else. I've got it in here but I can't remember. So we've got real problems about getting to that deadline, so perhaps you're right, that the deadline needs to be extended so we don't make a mess of

what we recommend and the water savings aren't there. So it has to be a proper process.

There's been farmers, you know, in terms of - not long ago up here Walsh said, "Money reached from the extra" - this one I have to say - "In Victoria one solution the farmers - some farmers suggested, is to stop this season's environmental water flows to the Gunbower Forest and sell extra tens of thousands of megalitres to the local farmers". And he said that the extra money should be invested in environmental infrastructure, and he said that the 45 to 50 megalitres pumped into the forest means that probably 50 dairy farmers could have that water. Well he doesn't - I'm not sure - I know Peter Walsh, but I think he knows the plan but the environmental water has legal rights, so you can't just do that, but Jaala Pulford is also sort of commenting on that.

Then on top of that we've got cotton farmers doing the wrong thing. They've been accused of fraud over at the Murray-Darling Basin water funding earmarked for the Murray-Darling Basin water savings, and that's two senior cotton farmers, huge farms. And the other one is, charges are being laid against two members of the Harris family, accusing them of stealing water, accused of taking when the shore conditions didn't permit it, and breaching their licence and approval conditions. And then the three other people of the Barlow family had been pumping during an embargo and pumping while their metering equipment wasn't working. So all these things are being looked out.

Now in conclusion, the Murray-Darling Basin system, I know where I come from, and I know that the Lower Murray - I went to a Lower Murray talk and they lost a lot of water because the farms were dried out because of the drought and because of other things. So those farms were no longer producing, the water was sold. So basically what Lower Murray Water is trying to do is shepherd water from here down to there. And so their idea is Sunraysia Modernisation Project No.2 which is get back that water from wherever it went. But the area is under further strain as orchard planting has increased by 41 per cent. Huge expansion of irrigated crops in the Mildura region of the Lower Murray is threatening to overtake water availability and sets the scene for disaster if drought continues. In the 20 years from 97 to 2015 - mind you, you know, there was a little bit of a die back - there was some reversal and an additional 4,500 hectares, mainly of almonds, was planted last winter and another 15,500 hectares is due in the next five years, and those are probably old figures. And they're permanent plantings, which means in a drought when there's no water or, you know, there's a stepdown of climate everybody gets less water. How are those farms going to survive and should they be allowed? The last few years has seen a huge corporatisation and a huge usage of large chunks of land to grow things. The risk would be to the remaining small farmers. So, you know, you've got big farms, huge corporate farms, foreign-owned, large family concerns that have grown bigger because they want to leave something for the next generation, and so small farmers are going to face skyrocketing water prices in the dry seasons, which is what is happening up north. I'm not so sure down here because I drove up from Melbourne and I saw this huge - huge canals basically of open water, you know. And we've closed a lot of ours through the Sunraysia Irrigation Project 1. So uncontrolled development does pose a huge risk. So perhaps it's time that governments looked at development and where they're placed.

Anyway, the Victorian Government is working against the Murray-Darling Basin Plan

under pressure from the dairy lobby, because the dairy lobby says, you know, "It's all due to the Murray-Darling Basin Plan". Well in actual fact China has put in place - well you can't tip your milk there because of all these - I know Tasmania had the same issue because, you know, you have to meet certain regulations, et cetera. You've got the downturn in market, too much milk, not enough milk, too much milk in one area. So it's not just the Murray-Darling Basin Plan; everybody has to re-adjust. Confusing messages really when nut plantations are springing up along the river. So here you've got the dairy farmers thinking, you know, "We're suffering", and then you've got more almond plantations and more growth in whatever you're planting.

Developments are being allowed to go ahead without water attached to them. They're big players on a temporary market, and I know that a lot of the almond farms in Mildura have been set up with temporary water, so that's going to distort the market when they come back in.

Now David Paton who is from South Australia and who's an ecologist - the Coorong isn't just a pretty place with nice birds. It can tell us what is going on with the health of the Basin. Rivers die from the mouth up, and if the end is struggling, the rest will struggle.

So, in sort of conclusion, I think that there needs to be an assurance that the water that is being paid for - and the State Governments are getting paid every year even though they're not delivering necessarily - so if - we have to make sure that the water savings are there for the environment, the metering has to be done, and protection of environment water must be upheld. You can't just sort of always ask for the environment's water just because the environment is silent. Why not ask it from an irrigator who's not using their water? You know, they're allowed to sell it, or they're allowed to keep it, but the environment must give it over because of social and economic impacts. Well the fact is that if you don't have a healthy environment you don't have a healthy society and the economic impacts are going to be huge.

So SDLs are the core element of the plan. Supply measures are important. They're physical environmental works operation rule changes. Efficiency measures are projects to improve efficiency on-farm. And I just want to give you this document, this is "The Basin files. Maladministration of the Murray-Darling Basin Plan, Volume 1". Now that was June 2018 and I've got a few other things that I've forgotten I think, they're not with me. And basically on p.33 it says, and this is an interesting one - and this will be my last comment - is that, "The Commonwealth makes annual payments totally \$174m over seven years to the States for meeting milestones described in the funding agreement. At the request of Shadow Minister, Tony Burke, the Australian National Audit Office undertook an audit of the Commonwealth payments under the funding agreement in relation to the protection of the environmental water in New South Wales" - this is New South Wales - "and the ANAO found that there was little evidence to support Commonwealth's positive assessment of New South Wales' progress towards protection of environmental water and therefore little evidence to support the payment to New South Wales". Perhaps that type of thing needs to be done. "The Murray-Darling Basin Authority has a statutory requirement to ensure that States have policies in place to protect environmental water, before they estimate the savings on the 36 projects." So, protect the environment first before you start estimating the savings.

COMMISSIONER DOOLAN: We have not got that much time but I would like to just - a few of the issues that you raised about water purchases, the Tandou purchase, we note that in our report; the Australian National Audit Office will be doing - is doing an investigation of those purchases and that will become available. On your last point about the need for milestones of national partnership agreements is again something that from that ANAO report we picked up on and agree and have made recommendations about that for the future. John?

COMMISSIONER MADDEN: I think it might be public record that the Commonwealth has actually withheld the payments for this year for New South Wales.

COMMISSIONER DOOLAN: That's right.

COMMISSIONER MADDEN: Under those agreements.

COMMISSIONER DOOLAN: Yes. So again, just for information. Any questions, John?

COMMISSIONER MADDEN: Yes. I guess the one thing that comes to me is the reliability to landholders in the Darling and the like of changes, and it reinforces to me some of the comments earlier about information and - not just information but analysis of that information. It should be made available. I think there is a big step from, yes, put data out and all those kind of things, but it's actually analysis, answering questions and assessing principles about some of this stuff that we need to be maybe more explicit about, about what we think is a good process to land, a water resource plan, for example.

MS RIEDL: Can I just ask one question. Can the New South Wales Government and Victoria step out of the plan?

COMMISSIONER DOOLAN: That's a decision you'd have to ask those two Governments.

MS RIEDL: Okay, yeah. Can they legally do that?

COMMISSIONER MADDEN: We're not lawyers.

MS RIEDL: Okay.

COMMISSIONER MADDEN: You have discussions around it and, you know, you can look at the various agreements that underpin various elements of the plan, so it's a very complex question to ask. I guess more broadly you talk about what the benefits of the plan are. The Commonwealth Environmental Water Holder is established. It does give a voice to the environment. For example, when you said there is no voice, there is, and that's - it was David Papps and now - - -

COMMISSIONER DOOLAN: Jody Swirepik.

COMMISSIONER MADDEN: Swirepik.

COMMISSIONER DOOLAN: And currently hold 2,000 gegalitres of water.

COMMISSIONER MADDEN: Yes, and could enter the market into the future if other things don't happen. That's total conjecture, but in a sense the property rights that underpin irrigator's rights, underpin the rights of the Environmental Water Holder, so - and there are various agreements which underpin the sharing of the waters which remain as well. So when people say that, they've actually got to articulate what bits of it they mean because it's a lot more complex than "in or out".

MS RIEDL: Because the water Basin Plans, they're actually carried through by the State Governments themselves.

COMMISSIONER MADDEN: They are?

COMMISSIONER DOOLAN: They are, but they still have commitments under the Murray-Darling Basin Agreement, the normal water sharing arrangements, and all of that underpins the entitlement frameworks that we have, where the CEWH holds those entitlements. In Victoria they hold the Victorian environmental entitlements and New South Wales. So those entitlement frameworks are robust.

All right, so we might break now for afternoon tea and we'll come back at five to three with Yanco Creek.

ADJOURNED

2.44 pm]

RESUMED

COMMISSIONER DOOLAN: So actually, we'd like to call on Mark Wettenhall from the Yanco Creek Tributaries Advisory Council. Thanks Mark. If you wouldn't mind again, just introduce yourself for the record.

MR WETTENHALL: Yes.

COMMISSIONER DOOLAN: Okay. Thank you.

MR WETTENHALL: My name's Mark Wettenhall and I am part of the Yanco Creek Tributaries Council, and I would like to thank you for the opportunity to speak. I would like to start firstly with a simple question which I don't expect to be obviously answered, but just a simple question and that is, is the Murray-Darling Basin Plan truly about water recovery for environments in need? Now, who we are? We're a little creek between

Narrandera and Moulamein which is 800 kilometres long. It is up to 3000 kilometres counting all billabongs and unregulated streams.

We have 150 registered wetlands. We have such animals as endangered animals as the Southern Bell Frog and the Trout Cod, and may I say that the Trout Cod has only one other place of natural nursery and the place in our stream is at the upper end of the Yanco which is in danger of being cut off. We have at the bottom end, a swamp called the Wanganella Swamp which in recent times has been in scientific papers as more diverse in bird life than Kakadu itself. We are an irrigation community and also we are home and the centre of what was once the densest population of Aboriginal people in Australia as we are between The Murray and the Murrumbidgee River.

I would like to, after reading the draft, I found that 6.1 probably was the clearest problem we had and that was inadvertently the impact on the entitlements of water users and the environment, although we had many problems with other pieces too. We are in jeopardy of losing our environment and also our community to survive. Firstly, we have lost half of our water, more than half of our water. We are only very small but 70 gigalitres has been sold to water efficiencies, private sales and water buy backs. Thirty-six gigalitres was taken for the Forest Creek Environmental Plan. Ten gigalitres for the CARM metering plan, and now a further 30 gigalitres for the SDL Projects that lie on top of us which is about 450 megalitres a day which would have come into our creek, out of a creek that on average only runs 800 megalitres. We feel that we've already given up far more than any other irrigation community or environment in Australia for this plan.

To speak about the three SDL Projects which are upon us to take more water from us. The SDL Project first is the CARM metering. This is fantastic. It is about real time metering down our creek and the savings are totally under-estimated. We believe that with this in place the creek will be able to be monitored far closely for irrigators and environment and kept flowing. The second is the Yanco Creek regulator. Two years ago George Warne and David Harris came to speak to us. That is the only State agency ever spoken to us again. They will not come to the table. For two years they came to us with about ten different plans to the creek. We realise why there is so many SDL plans for the creek because we are small-fry and easily stood down upon.

The main reason for the Yanco regulator was that we are an inefficient creek in their view. This is because what that flows out of our creek into the Murray River is seen as a loss to our system, so at times we can have 2000 megs of unregulated water coming in at the top end from Holbrook and 2000 or nearly 2000 at the bottom end, but because we don't use it, we are seen as inefficient and it is a loss.

This water could simply be seen as intravalley transfer and not as a loss to our environment and the Murray System could use it, as they do now, for water entitlements or for reducing salinity or water they chose to use it to, but it should not be seen as a loss to our system, just an intravalley transfer. So with this in mind, the major SDL project is a Yanco Creek regulator. It was designed to be shut - as you all know, the regulator - well, the Yanco Creek regulator is Narrandera and is to shut the water coming down the Yanco Creek when there's a man-made flush to flush the lower Bidgee floodplain. And the idea of it is, it will

be shut for ten days so they can peak a flood and get a better flood down the bottom of the Bidgee floodplain.

The problem with this is though, that we don't get water for ten days and that's fine for ten days, but is it really that feasible that they spend \$55m for a 15 gicalitre saving, and then the plan is to use it only one in four years or one in five years to flush the floodplain, so that works out at about \$20,000 a megalitre for this plan. That is a reasonable problem for us. The other problem is for us, is when this regulator goes in, we feel that we are at the mercy of an ever-changing government.

As we are only small-fry, they can shut the door and close us down at any time they like. We have no confidence in the State or Federal governments. The Forest Creek Plan, they took 36.5 gicalitres and they promised a watering out to the Wanganella Swamp of one gicalitre every year and up to four gicalitres in odd-years. The last ten years we have had one controlled flooding of that swamp. So that means - and there's been one other flooding when it was an unregulated high creek, but we just don't have any confidence.

Also recently, we've received a letter from the State Minister's office saying that they want to place the creek back into a pre-1850s wetting and drying phase. What do you think this will do to our native flora and fauna? What do you think this will do to our farming community down our creek? We've already lost 60 per cent of our water but then when we have a drying and wetting phase it will be absolutely devastating on us. Are they going to have this wetting and drying phase in The Murray River we ask ourselves? Are they going to have this drying phase at Melbourne's water supply and they're going to go down and collect their water in a bucket like we will have to. I guess not.

The second project is the modernisation of our effluent creek. We don't like the word effluent because it just makes us sound like you know what, but anyhow that's minor I guess. On this, is six weirs? These are very small weirs at the top end and they each hold 150 megalitres. Are basically about one day's supply down our creek. We are told that with these six weirs we'll be able to reduce our water ordering by half. How can this happen when we're, on average, on a 21 day ordering and these weirs only hold one day? We find it an absolute furphy that they can even put that in print. The other is that they're going to bring water in from CIA and MIA to help run the Billabong Creek and Yanco Creek. They've been doing this for 20 years and there is only one new system where they're bringing it from and to my knowledge, the farms are up in arms there because they don't have enough channel flow themselves to look after their corn crops and don't want it to go ahead. So unless they're going to increase the infrastructure in Murray irrigation this perhaps will not happen in a higher use year.

The cost of this modernisation scheme is to be paid by the State government or the Federal government, but then after that cost, farmers along the river system will have to pay for maintenance. We have not been told what this might even closely resemble and why should we have to pay when the 14.5 gigs actually goes back to the Commonwealth water holders' basket for environmental watering when we don't get any benefit at all? We feel that this should be rationalised perhaps over the while Murray-Darling Basin if the water's going back to the Murray-Darling Basin.

Finally, we must get State agencies to the table. To date they will not come. And we know why they won't come, because they have the biggest project on their Murrumbidgee River being stopped by a small community which we are. They're not about to have us stop their \$55m irrigation project stopped just so we can have our irrigation and environmental river occur. We need Murray-Darling Basin people to come to the table with us, because there is no way anything we say will stop this project.

So please, please come and make sure our river, our 800 kilometre river keeps flowing and that the flora and fauna survive through this period and that our community survives too. We have lost over half our water and we feel we've given up more than almost any other river system there is. So I ask that question again. Is the Murray-Darling Basin Plan about water for environments or is it basically about water for political environments? Thank you.

COMMISSIONER MADDEN: A couple of more minor questions. Technical but not minor.

MR WETTENHALL: That's all right.

COMMISSIONER DOOLAN: So I suppose the question I have is that Yanco Creek is part of the supply measures, and it is one of those in a relatively early stage of development, so we have recommended a gateway process so that a detailed design including the environment assessments, the cultural assessments and the approvals that go with that, have to be undertaken and at that point, the project gets re-evaluated and decisions are made as to whether it is a worthwhile assessment or not, and we have also heard from, not just your community, but many others, about the degree of or lack of consultation on these projects.

So I suppose the first question I have for you is really I understand the concerns that your community has. What do you want to see as an appropriate process for the next 12 to 18 months as they do the detailed design in this project? What sort of assessments do you want to see done? What sort of consultation do you want to see done? What would you consider to be adequate?

MR WETTENHALL: We would like for starts to actually learn about the project, firstly and foremost. I mean, I've read the 450 page document and most of it, to me, is figures pulled out of the air. Like on the modernisation plan one, they take our average year as 2014 which is a very wet year so of course we had flood (indistinct). Of course we were inefficient in that year, and if you use my figures that we've lost half our water, our creek is actually going to sit right on the bottom of the creek now for ever and a day. So we aren't going to be inefficient. There is not going to be the savings. So we must have real figures. Not figures that State government who want these big projects to go ahead, require. We must have transparency that someone else sits at the table than just State government overpowering Yanco Creek. Because obviously they won't listen to us. They won't even come to the table.

Two years ago before all these SDL Projects, they would come to our general meetings. We had a great working relationship with them. Nowadays, it has totally gone. They're staff are told they are not to talk to us and so we are really, really in an appalling point of communications. And we just can't understand. We thought actually that the Murray-Darling Plan would be a good thing for our creek, and we are a great channel supply water from the Murrumbidgee to The Murray and yet it doesn't seem to be the case. And we are not asking for more water.

COMMISSIONER DOOLAN: No. No.

MR WETTENHALL: We're not asking for irrigation water or anything like that. We take the process with everybody else.

COMMISSIONER DOOLAN: So again, I'm just wanting to understand all the concerns so I understand from a community perspective, you are starting behind the eight ball.

MR WETTENHALL: Yes.

COMMISSIONER DOOLAN: In terms of trust.

MR WETTENHALL: We think there's savings that could be made.

COMMISSIONER DOOLAN: Okay.

MR WETTENHALL: But not the way they're making them but shutting us down like the Minister said.

COMMISSIONER DOOLAN: Yes.

MR WETTENHALL: To pre-1850s. We can't go back to pre-1850s.

COMMISSIONER DOOLAN: So firstly an agreed technical basis which is the first piece.

MR WETTENHALL: Yes.

COMMISSIONER DOOLAN: Some independent chair or something of a steering committee.

MR WETTENHALL: Yes.

COMMISSIONER DOOLAN: And regular and ongoing meetings with community to assist in the design or define the design.

MR WETTENHALL: Or maybe not even going ahead with it.

COMMISSIONER DOOLAN: Okay. But it's actually getting - from our perspective the next 18 months is critical in terms of really the development of the project.

MR WETTENHALL: And if the project was to go ahead, is there any real chance that we can have a fishway that works, and I don't know if everybody in the room knows this, but there's not a fishway in Australia that's the same as the last because all fishways generally don't work because every native fish has a different characteristic and so if we get a 400 or 500 meg fishway which we're sort of hoping for if they do put the weir in as a permanent flow, it will have to be built with three or four different fishways because the native fish don't go up like trout, you know, to a bears mouth in America. So it's a real problem. And then when they do bring it in and they do have a low creek, we all need more regulation in our creek, they'll be periods of mud banks and things like that - that just no costing has been taken into account, and it just seems to me, and I hope I'm not rude, but the State government seems to be grabbing at money, worse than the cotton farmers in northern New South Wales stealing water, these blokes are just taking this great opportunity to get this \$55m project for a ten day use in four years. You know, it makes the cotton farmers look minor, I can tell you.

COMMISSIONER MADDEN: Just as a discussion point and you might not know the technical - and that's why I said it was a technical - - -

MR WETTENHALL: No, no, I'm not technically a water person.

COMMISSIONER MADDEN: To me this comes down to the local versus the wider environmental benefits and that kind of trade-off.

MR WETTENHALL: Yes.

COMMISSIONER MADDEN: So we have a role at the moment for the authority in supply projects which is to come and verify savings. Are there ecological targets that you're aware of that actually relate to the Billabong/Yanco system that the Basin Plan actually should take into account first?

MR WETTENHALL: We, as a community have fund raised \$2m through a private levy. So the irrigators pay a private levy. We've cleared willows. We have fish studies. We've done lots of things like that, so we do have a base where we know we are. So I guess moving forward, you know, we'd like to see that base like everybody in this room to improve on our river and to improve the logistics of irrigation water, and we have a 50 gegalitre and may up to 100 megalitre at Darlo which is our last gauging station, so there's always an end of stream flow. But that's very hard to control when you've got an 800 kilometre - and even with these six new 160 megalitre dams, that's going to be a drop in the ocean to try and control it. That's why it is so important that that water that leaves our end of system is seen not as a loss, but as The Murray system - I don't mind what The Murray system uses it for. It's all good water for them. It's just not our loss, and once that's cleared off the table in accounting figures, that's not a loss, we all look as good as any other irrigation channel because our river runs in the bottom of a clay pan, not like an irrigation channel on the top of a limey ridge where it leaks water.

COMMISSIONER MADDEN: So I will have to look at the business case, but my question relates to, how does the Authority and what role do they have to take into account a part of the Basin plan that sits within the Basin and environmental issues within that, and this is the same with Medindie Lakes.

MR WETTENHALL: Yes.

COMMISSIONER MADDEN: Similar kind of concept.

MR WETTENHALL: Yes, yes.

COMMISSIONER MADDEN: What assessment do they take to be able to enable a trade-off as opposed to the higher level ecological flow type targets, because obviously if you look at one side of the equation that's one thing. I guess it is how do you have sublevel goals or take that into account? Now, it is one thing to say the State has to go away and look at the environmental approvals, but that doesn't actually consider the state of the Basin and the health of the Basin, so - - -

MR WETTENHALL: I understand. I take on board - - -

COMMISSIONER DOOLAN: And this is - - -

COMMISSIONER MADDEN: It might be something - I realise you might not be aware of it - but it is a line of questioning that I'd like to actually ask the Basin, the Murray-Darling Basin Authority, sorry, not asking the Basin, it might not be able to respond. But asking the Authority well, how do they weigh that up, other than yes, it is a saving that will go towards - - -

MR WETTENHALL: But communication could go a long way and there is absolutely none.

COMMISSIONER DOOLAN: I think the answer is we'll check the Basin environmental watering strategy which does have more general flow targets in it, but we will check it at least and ask that question of the Authority.

MR WETTENHALL: Yes.

COMMISSIONER DOOLAN: Okay. Did you have others?

COMMISSIONER MADDEN: I guess the question for me is - I know it is early days - but is there a restart or a reset in terms of the State government communicating with you on where to go from here?

MR WETTENHALL: Tracey McDonald who is recently the head of SDLs in New South Wales is new to the job and I spoke to her two weeks ago and she said that she has to get her head around the situation and will not be able to come for three to four weeks, otherwise

any consultation will be meaningless and so we start again. And no doubt she's a very great person or whatever, but you know. It's very, very difficult and I'm at the sort of forefront of my community and people in the community keep asking me, "Well, what have you found out?" And do you know what I have to tell them, "Nothing". And we're edging closer to this SDL project happening and we all feel that the concrete trucks have already been ordered and there'll be no communication. And I don't know, it's just a project for State government and they're using it as a disguise as an SDL project for a 15 gigalitre saving to be used once every four years.

COMMISSIONER MADDEN: Just on Forest Creek.

MR WETTENHALL: Yes.

COMMISSIONER MADDEN: I know you've talked about the lack of water into the swamp.

MR WETTENHALL: Yes.

COMMISSIONER MADDEN: Has there been any evaluation on that?

MR WETTENHALL: Yes, last year they came and did bird counts and things like that. I can't give you the results. I'm not a Forest Creek expert, but they did do studies on it last year.

COMMISSIONER MADDEN: So that's just not the creek, but then also the impact on the system and any other, in terms of the flows through the system?

MR WETTENHALL: No, no, they only did studies on the bird life of a watering event last year.

COMMISSIONER MADDEN: Okay. So that's not the evaluation I'm talking about. I'm talking about have they looked back and said, right, what are the actual impacts from that project?

MR WETTENHALL: No. And what you have to realise too is that 14.5 gigalitres ran through our whole system to get to the Wanganella Swamp. Now, we don't have that and nor does the Wanganella Swamp even get their one gigalitre each year. And that all went to water for rivers, so we sort of feel that we've given up a lot and if these SDL projects have to come forward, we have to - you know, we can't just let our creek just totally go. It's a fantastic environment and it's a great irrigation channel too.

COMMISSIONER MADDEN: So it seemed to me one of the key bits of information to go into a feasibility study to a gateway process would be what are the other projects that have happened and what's happened under those projects over the last ten years, is it, since Forest Creek?

MR WETTENHALL: That's right. That's right. Well, farmers they say it's a disaster who are out there. It has just dried up - and you know, and I know there was licences bought back and things happened like that, and people went to the Edwards and their licences were moved to the Edwards, but the Forest Creek and the Wanganella Swamp didn't get what they were promised, and that's what makes us very, very nervous that when this regulator goes in, we won't get what we're promised, and I know you can't promise that either. But you can imagine us as a community with a letter from the Minister saying that we are heading towards a pre-1850s drying and wetting phase on our creek, how that makes us feel. And I'm sure if you put that letter to Tocumwal people and said, "The Murray was going to dry in Tocumwal like pre-1850s", there'd be panic amongst the pigeons.

COMMISSIONER DOOLAN: Okay. So one of the things I suppose I would encourage you to actually think about, what sort of consultation you'd like to see. What sort of things you would like considered in the next 18 months as they do the development and perhaps, you know, shoot us an email with that because that would give us - we're recommending adequate community consultation, credible community consultation.

MR WETTENHALL: That would be fantastic.

COMMISSIONER DOOLAN: We need to understand what that means.

MR WETTENHALL: I will do that.

COMMISSIONER MADDEN: I will add to that and we'll put it in our report. Community consultation is not an end to itself. So that's why I guess I'm asking about what are the impacts of Forest Creek and what are the concerns, because it is actually proper assessment and analysis of what that's likely to be, because funnily whatever pre-1850 drying and wetting - it is easy to say, but the obvious question is well, what does it actually mean for the hydrograph.

MR WETTENHALL: I don't know.

COMMISSIONER MADDEN: No, I know you don't know but for someone to say that in a letter from an office - - -

MR WETTENHALL: Well, it has come from Neil Blair in response to a letter of mine.

COMMISSIONER MADDEN: Well, that actually needs then underpinning of what that actually means before you then can progress and discuss it.

COMMISSIONER DOOLAN: All right.

MR WETTENHALL: Thank you.

COMMISSIONER DOOLAN: Thank you. Thank you very much. Our next participant is Louise Burge from the Murray Valley Private Diverters. Louise, if you wouldn't mind introducing yourself for the record.

MS BURGE: Yes. Louise Burge, representing Murray Valley Private Diverters and I've also put in a private submission as well, a personal submission. Firstly, I'd like to thank you very much for the opportunity to speak today. I can only describe it for our members and our community as being an emotional rollercoaster for the last seven years, and that process is continuing. Just in brief, the Basin Plan is a political plan and it's a political plan about numbers and that is what's guiding the decisions and while ever that process is about numbers, it is clouding good decisions for the social, economic and environmental interests.

The failure of the Basin Plan dwarfs many other government failures including the pink batts scheme. I believe there are opportunities to improve and to make some sensible decisions going forward even within this implementation phase, but there's no sign or evidence that that is occurring to date. You would have heard today about the devastation for the north-east Victoria and New South Wales Murray and I think that's very, very evident and it's not just the risk today, it is going forward.

In regard to the Productivity Commission's draft report, and I welcome many comments in there, but I would like to draw attention to a few issues. One is that I don't think we can avoid the need, not just to look at what are the implementation impediments as we see them today, but this is a real opportunity to create the necessary changes, that are both absolutely critical for the environment as well as the people because we are not getting the decisions right. Also the lack of decisive - you made mention about the lack of decisive decisions. I think we don't need decisive decisions to implement what we already know is failing. So we need decisive decisions to improve, and the mention before about the Yanco Creek is a classic, and I could name a number of other things like that. We are sacrificing one environment and one community - a whole range of communities in the interests of protecting other environments and other communities, and I even question the term "environment".

The question needs to be asked in its decision, has the MDBA adhered to its charter and truly acted as an independent organisation? And I think when you look through the submissions that I have done over the years and I will present more to you, I think I can provide sufficient evidence that they have not acted according to their charter. The standard of information underpinning the Basin Plan decisions is very - I would not describe it as robust science and I certainly would describe it as very much in line with the political campaigns of South Australia.

If there are a number of major - if you look at where is the evidence to date that this is not working? We've seen it in the social and economic fallouts in these regions, northern Victorian and New South Wales Murray. We've also seen it in the 2016 catastrophic flood where the warnings that we had been given for seven years came into fruition. For our own business we were wiped out and I'll get to that later.

But what that catastrophic flood showed was how this Basin Plan is based on theory and as we go forward the risks are going to be further exacerbated. The MDBA's proposing flows of 77,000 megs in Yarrawonga to Wakool Junction region. That's exactly what happened

in September 2016. Following that, we got a catastrophic flood in October. Why? Because the risks and warnings that we had been providing for seven years were ignored.

Mark made mention about promises from government. We know when we document these risks and governments promise consultation, they promise change et cetera, none of this is occurring. So as we go forward in this implementation phase, there is absolutely no sign of improvements. I do think, and I won't go into detail on it, but I do think it is critical that the Productive Commission actually does review the science or initiate somebody to review the science that is underpinning decisions and the example was given before. How can you sacrifice one set of environments simply to provide a political outcome for another set of environments which that in itself is not based on transparent science of which we could have confidence in.

The issue about - we've heard before too about end of mouth flows et cetera. This Basin Plan has to revisit the Coorong, Lower Lakes and Murray mouth. That catastrophic flood in 2016, 204,000 megalitres went under the Tocumwal bridge. It wiped our business out and it wiped many other businesses out. Now, what that flow did in October, in the first week of October, by the time it got to the South Australian border it was around about 94,000 megs, and by the time it got to the Murray mouth and barrages, it was 75,000 megs. Three weeks after, that water hit there, dredging of the Murray mouth was required to be resumed.

I've got photographic evidence and I've provided this in numerous, numerous - if you want to go through all the details, this is what I wrote in 2010. Everything that I am saying and have said in submissions is fully referenced and can be found in that document. The connectivity. This was meant to be an environmental plan across the Basin. It is not. Of the 2750 gigalitres being recovered under the Basin Plan, 2,000 gigs is directly to flow out the Murray mouth. We know that in the absence of localised solutions in South Australia, this will not work. It will not work for the Coorong. It will not work for the Murray mouth. It certainly will work for housing development in South Australia's Hindmarsh Island, and that was evidenced by the 58,000 property price per house increase in the CSIRO's ecological and environmental benefit report of which they weren't too happy about releasing at the time. But in terms of growth of corporate agriculture downstream at the Barmah Choke, I think the Basin Plan will work also.

If you look at, going back to the base science, and I think it's really important to differentiate between the Northern Basin and the Southern Basin. I've got a document here that talked about in 1992 and I will quote. "The time for unfettered access to water is over". In 2017 the extraction data on the Northern Basin is still not known. And in 2017, New South Wales is only beginning the licensing process for flood plain harvesting now. Now, how can the MDBA say that they got their baseline models right and said that only six per cent of the Darling flows impact the Murray when New South Wales itself didn't know, and still doesn't know, what is exactly being extracted.,

One of the other major features of the Basin Plan is that everybody's to make this flow contribution to the South Australian border to meet a target of 80,000 megs a day at the South Australian border. 100,000 megs, for example, puts our property under water. At

Tocumwal 204,000 megs under the Tocumwal bridge just wipes us out completely. And I can just name heaps of people in this situation.

If you look at the social and economic impacts and the regulatory impact statement the MDBA was required to do in 2012, in their simplistic approach they only looked at two things; one was the water for future program which was how government was going to acquire the water, and they also looked at the SDL adjustment mechanism. For Murray Valley Private Diverters the impact on a number of the SDL adjustment projects is significant, not only in terms of potential property access or flooding risks, but in terms of reliability changes to their irrigation entitlements because of the changes to river operations. The way regulated rivers were run before is going to change. None of this is included in the regulatory impact statement. None of the flooding risk or property impacts or impacts to tourism is included in or the price of water, what the water recovery strategy has done to the price of tradeable water, is included in this.

In regards to the Productivity Commission report you do acknowledge that the extra 450 gigalitres will be more than anticipated. I can only reinforce that statement, but also concur with you that it is a real worry that there is no requirement to consider what the cost is, and I think that is critical that the Productivity Commission identifies that risk. And in regards to the 450, the neutrality test is fundamentally flawed and there is no capacity to recover another 450 under the guise that it will be socially and economically neutral.

I have to say that the SDL adjustment mechanisms need an urgent and complete review. I acknowledge your gateway comment previously, but what worries me is that I think there needs to be a step before that, and that is to actually re-look at what is realistic, what is the total objective of the Basin Plan and then determine whether the SDL is consistent with what we are told originally was meant to be broader environmental objectives because clearly the targeted flows are only for one parts of the Basin giving protection to many other parts of the Basin.

And I tried to mention before that, you know, when I've asked the question about end of valley flow targets, which rivers will deliver this 80,000 flow target? Darling, none. Meant to be 143 gigs. Not likely to occur. Murrumbidgee, meant to be. Not likely to occur. Nothing coming from south-east of South Australia. In fact, it's not even in the catchment maps, and that's because of historical maps and yet we have an MDBA which is trying to replicate the flows to south-east of South Australia but simply from the wrong catchment and catchments.

In regards to consultation on the SDLs, I can only describe it as emotionally draining, appalling, dishonest, and leaving people with a very bitter taste. I've been involved in catchment management, natural heritage, trust programs. I've worked for an environmental group, Greening Australia. I've worked in a range of places, and number one, I work on farm, and I have spent 20 years of voluntary time also in the field of natural resource management, and I have held elected positions as well.

I cannot agree with any component with the MDBA in its current form because it has so many flaws in it. It is easy to talk about you know, relaxed constraints and consultation

and all these things. But we are spending \$13b and what are we going to get for our money because the Murray mouth is still going to sediment up. The Darling River is not going to improve. I was standing out on the Darling less than four weeks ago. I went to two block banks, so great big earthenware walls over the Darling. So you imagine the Murray or the Goulburn having earthenware walls - sorry, I need to describe that. Think of a wall of China and plop that in the middle of the river and block it, and basically that's the same sort of thing as happened in South Australia with the building of the barrages. Now, they are what they are but there is no question that something is wrong in both areas, both in the Darling and in South Australia and we, in New South Wales Murray and Northern Victoria are going to pay the price.

In terms of compliance, and I note that the Productivity Commission has suggested splitting the MDBA, I possibly need to clarify with you a few things before I, sort of, have a firm position on that. And just nearly to conclude, you made mention of a stitch in time. I think that is a very valid statement. What worries me immensely is that a stitch in time if it's just sort of not comprehensive enough, it's not going to work, and if we look at say the 18 environmental indicator sites across the Basin, only six of those relate to Murray River flows. So why then - and there's one on the Goulburn. So if seven out of those 18 environmental targets are on the Murray and one on the - six on the Murray and one on the Goulburn, why is 2289 gegalitres of the 2750 being recovered from the Southern Basin? Something is seriously wrong.

And just to conclude with - and I am putting in a - or I have put in a personal submission too which was a copy of my one to the South Australian Royal Commission. In 2010 we had environmental flows put down the Murray system without warning. Our property was cut in half. That was the first crops we grew after the ten years of millennium drought. We lost the lot because we could not get access to the other side of our property. We got five days of rain and lost everything.

In 2016, despite seven years of documented warning, personal warnings and documented warnings, we experienced a catastrophic flood, exactly what is going to happen to us on a more regular basis. We've gone now into this current drought with no grass on the areas that were flooded, with an economic devastation to our business and what was the response of the MDBA? We were blamed for being irresponsible with our infrastructure. That was every farmer along the New South Wales Murray. That was in the December minutes of the MDBA.

The productivity loss and business loss to our business is indescribable. I do get upset when you've put so much effort as I have. To date we've lost over three-quarters of a million dollars, to be blamed for something which was not our mistake, to be lied to. I spent 18 months on a constraints advisory committee and I should actually say the whole constraints management strategy came about because of what happened to our property in 2010, but we weren't the only one.

I hold a table out of a constraints management strategy report 2013/14, so after spending 18 months advising the MDBA with other - a range of us, the very flow regimes that we had rejected then appeared in the report as feasible with community acceptance for further

investigation. We've been called recalcitrant. We've been called difficult, and I recall a statement that Mike Taylor did after I wrote that, and everything is documented in that about the Coorong et cetera. Mike Taylor said to me that he was the first chair of the MDBA. Actually he didn't just say it to me, he said it in front of hundreds of people in Shepparton, and in Deniliquin also, that the problems of the Coorong are a South Australian problem and they need to address it. I believe Mike Taylor was an honourable man and he resigned from his position as the MDBA chair. We've hosted ten tours. In the whole Wakool and on our property et cetera, nothing is making a difference.

Now, in closing I appeal to the Productivity Commission as I did with the South Australian Royal Commission. The solution does not lie with taking lots of water and ruining northern Victoria and New South Wales Murray. There is political interests that are dwarfing our needs and that needs to change, but as a responsible agency, which I believe you are, and if I can appeal to you, your duty to send a very clear message to government, implementing the Basin Plan as it is today is wrong for everybody. Taxpayers, environment and our communities. Thank you.

COMMISSIONER DOOLAN: Thank you.

MS BURGE: I should also say and John, you probably may have heard me and Jane too. I have put forward many, many solutions over the years and I continue to put those forward. One good example is a suggestion that within the 650 SDL adjustment mechanism, if governments have got the decision making wrong around the SDL projects because this was all about numbers. This wasn't about science, it wasn't about good process, it wasn't about due diligence. Why not have an adaptive component within the SDL adjustment mechanism? If for example, we have a number of projects - if we've got to get to the figure of 650, I think we're at 605 now, if we are aiming to get - because I agree and Murray Valley Private Diverters has been very, very specific. We agree with the principle of the SDL adjustment mechanism. But what we can't agree with is the process for decision making around those projects. The Menindee Projects may have huge consequences for Murray resources, let alone the people on the Darling, and I sympathise immensely with those people on the Darling.

There may be many, many smarter and more innovative projects than closing the Yanco Creek down. Flooding people out. Destroying communities. Let's have the due diligent properly prepared scenarios. My concern is that if we go simply into saying "let's have improved consultation", without actually doing a complete review first, we will get to the point exactly what Mark Wettenhall said. It will be done deal and the concrete will already be delivered. Thank you.

COMMISSIONER DOOLAN: So thank you for that. I suppose on that line then, we have recommended a process for review of those projects; a process whereby if they're good projects but they need extra time, that's discovered in that process and they can be held to milestones. But if we were to take further your suggestion of an adaptive process - I mean, we have already been meeting concerns that by extending the timelines your putting off the inevitable. So the adaptive component, how would it work? How would it work within a reasonable timeframe?

MS BURGE: My experience in natural resource management is that there is no one answer from day one and it evolves and we should be taking a lessons learnt process. So if you can imagine the 2750 with the 650 underneath. The independent audit in - I think it was August 2014 said that there was a 580 gigalitre plausible SDL project number. I don't think a lot's changed from that timeframe, even though we're talking now about 605. But let's pretend that of those 605 projects that are on the table, they don't actually end up adding up to the 605.

COMMISSIONER DOOLAN: We have to face that possibility.

MS BURGE: Yes. So let's go back to the August 2014 audit where they said there's plausible 508 gigalitres. So at that time I said, "Well, okay, if there's only plausible 508 gigalitres, let's have 150 gigalitres option that still will go into the SDL adjustment mechanism, it's just simply that the project names aren't on the table at 30 June 2017.

To me it allows proper due diligence in taxpayers' expenditure. It's about due diligence in designing environmental outcomes. The way we're it at the moment is all this scramble for a number. We've got to meet a number by a certain time so what can we busy think about putting in a number. I know of one project that was dreamed up in two weeks. I know of another project that affects our irrigation infrastructure. We were not allowed to see the business case and we had to struggle and kick and scream to try and even actually get a glimpse of it. Let alone have input into it which we couldn't do. And the bizarre thing, even now you've got two business cases for changing the flow rates on the Murray River, you've got the Hume to Yarrowonga and the Yarrowonga to Wakool. They both claim two different flow regimes for the same stretch of river below Yarrowonga.

You then have a process with that, you've got Hume to Yarrowonga going to be managed by Victoria and Yarrowonga to Wakool Junction being managed by New South Wales. It's the same river and all the risks primarily will lie in New South Wales Murray. We have not - Hume to Yarrowonga have not been consulted at all. Yarrowonga to Wakool Junction - I would encourage you to suggest you read my South Australian Royal Commission because that's got some points in there that I won't take your time up today, but it hasn't been a wonderful process, put it that way.

But there is tremendous opportunity to improve this and get the environmental expenditure right. But we cannot while it is clouded by politics and somebody has to break through that mould and say "This is wrong".

COMMISSIONER MADDEN: Thanks for running through some of the issues, Louise. One of the things you mentioned liability changes which you see in a number of the projects is potentially quite important, I mean, at the local level which we heard before, but at the whole system level as well, with Menindee changes and Hydro-cues and the like. Have you, given your history, heard any consultation or work program how that actually is going to occur across the package, because again, it is one thing to look at each - - -

MS BURGE: Well, I do sit on the State Advisory Panel for water resource plans as well, and for our research plan, New South Wales Murray, Murray Lower Darling. We have got nothing more than a diagrammatic explanation, but in terms of risk assessments and understanding the modelling of changes that the Medindie Lakes project would - how it could or would impact on Victoria or New South Wales Murray supplies, we can't get that information. The pipes were already on the truck before, in terms of building the Broken Hill pipeline, so that's another classic case where the decisions are taken well in advance.

We have to get solutions more broadly. Can I draw your attention back to the Living Murray. The Living Murray process was about designing and achieving environmental outcomes with infrastructure to deliver a healthy working river and the scientific reference panel said at that stage, 1500 gigs would deliver a healthy working river with infrastructure. Now, we've reversed that thinking, we've reversed all catchment management thinking which is a whole of catchment thinking. We now simply measure environmental success with the volume of water flowing out of the Murray mouth, and we now are perhaps abandoning - well, no we are, seemingly to abandon the infrastructure built under the Living Murray by saying well, we're now going to have flows above the banks of the river.

For those people who don't know what this scenario means, for example, the MDBA in all its modelling for below Yarrawonga, the river runs at 10,600 megs through the Mulwala region and then 8,000 megs in the Barmah Choke. The modelling of the MDBA that underpins the Basin Plan is saying 77,000 megs. So we're not talking just about a little overbank flow as described, and going into this next phase of achieving environmental outcomes, let's be smarter than using a crude methodology of somebody wants to take the river from there up to there.

COMMISSIONER DOOLAN: Thank you very much, Louise.

MS BURGE: Thank you very much for your time.

COMMISSIONER DOOLAN: Thank you. Our last participant for the day is Suzanna Sheed and David McKenzie from the GMID Water Leadership Group. If we could invite you to the table. And just for the record, if you'd just introduce yourself for the transcript, please.

MS SHEED: Thank you. Thank you for having us here today. My name is Suzanna Sheed. I'm the independent member for Shepparton District in the Victorian State Parliament.

MR McKENZIE: And I'm David McKenzie, co-chair of the Water Leadership Forum.

MS SHEED: I thought I'd just start briefly by reminding everyone about the GMID Water Leadership Group. So in 2015 we held a water summit in Tatura and out of that one of the recommendations was that we needed an advocacy group with strong representation from people across the water industry in the region, including environment, farmers, water authorities and the like, and we were able to put together that group and they have worked hard on a number of issues over the ensuing years.

Part of the reason for doing it was just the dearth of leadership in the space, the lack of any government really taking the space to hear what our communities were concerned about, and I think it would be fair to say that one of the first things we did was commission the RMCG Report which the Productivity Commission will have a copy of. I think it was tendered earlier on. That report went to the damage that has been caused as a result of the plan so far, but to be clear, we were always prepared to wear the 2,750 and part of our concern was around the 450 gigalitres and how that would be achieved and what impact that would have given the damage that we had already identified in the 2016 RMCG Report.

So that report has been backed in by numerous other reports since then, and I think it's fair to say that when it was first done, MDBA were quite critical of it and in some ways white-anted it and it was a really disappointing time for us and it was probably the strongest view we had at the time of how they were operating and how we would have to deal with them, and we moved to a position where we decided after a period of time that consultation with the MDBA would get us nowhere because their role seemed to be to roll out the plan at any cost. We're here to follow the Act, follow the Plan, roll it out and everyone get out of the way. That was really how we saw it.

So probably around two years ago, we decided that we would engage on a political level rather than on that level, and so that is really what we've done since then. So we've made many submissions to many people where we've been consulted with a lot, and we have attended numerous meetings and engaged with many people from across the region and in other places in the Murray Region as well. We've kept a link with Speak Up just so that we understand each other's issues along the way. I think it would be fair to say that as a regional community, like so many other regional communities, we're feeling so disaffected, so disengaged in a lot of ways from what is happening in this process, and I think I can probably speak a bit politically about it, and I've been recently reading Gabrielle Chan's book called *Rusted Off*, and while she's talking about different regional communities to ours, the resignation of a lot of the things she says about how regional communities feel in relation to the bureaucrats in Canberra, the politicians in Canberra, the lack of understanding of what's happening in our own communities, and what seems to be an incredible unwillingness to engage in a way that takes into account the overall situation, and so policies are made and they are just driven home. It seems to be that that is what has to happen.

And in relation to the Murray-Darling Basin Plan it's that lack of any adaptation along the way that we are feeling the most. So there seems to be - you know, there's been two amendments to it, but of not much significance to us in the southern connected basin, I will say for the SDLs of course, that was a critical piece, so it's this rigidity around it that is a real concern. So I just wanted to set the ground work. David will speak to some of the recommendations because you've got our submission, you've heard from us before. We're keen to actually talk to you about some of your draft recommendations and how we see them.

MR McKENZIE: Thank you, Suzanna. So Commissioners, congratulations on your report because I think it is a really clear on capture of some of the issues that a lot of the

communities have been trying to articulate for a long time, and struggling to get any real traction on. There are some elements that I want to focus on, in particular in Chapter 5 of your findings and recommendations around the efficiency measures which are probably the most pressing for northern Victoria and southern New South Wales at the moment, I think.

I think it probably can be summed up in terms of concerns about the death of a thousand cuts that the irrigation communities are suffering. Every report that has looked at the socio-economic impact and the implementation of the plan to date, starting with your RMCG Report that Suzanna mentioned early on, confirmed by the Tim Cummins & Associates Report commissioned by the Victorian State Government and finally by the MDBA and their own community profiles, has found genuine evidence of real socio-economic negative impact, and despite all that, because there was no trigger to sort of pull it up, the plan, we see, our communities feel has been ruthlessly implemented so far. There's been no real allowance for adverse outcomes or pockets of disadvantage or unanticipated impacts, and they're real and they're happening, but there was no opportunity to sort of - apart from community advocacy which largely has fallen on deaf ears particularly in Canberra, to really do anything about it except try and shine a light on it.

We see that the trajectory and the implementation of the plan in the southern connected basin is almost unchanged from its original design, and as a few earlier witnesses have called out, emanating out of Canberra is really what seems like a blind worship of deadlines and volumes, rather than a focus on outcomes, and you picked that up in your draft report as well.

But now at this critical point of time when it's actually getting really hard, you know, all the low hanging fruit has been picked, and all the early wins have been had, it is getting harder and harder month by month and year by year now. The question is who is going to bear the pain of the final recovery? And it is really obvious where that is heading. So despite all the obvious hardship, despite all the quantification of the negative impact, it is really clear to us that the only ideas coming out of the MDBA, out of Canberra for efficiency measures are to recover the 450, are to go back to the consumptive pool.

We think that is an intellectually lazy approach just going back to the low hanging fruit there, because the pressure of the deadlines and the focus on the volumes that you have identified, is driving a lack of thoughtfulness from the key policy decision-makers. Part of that, I think, is a subtle shift in the language around the commitment to the neutral or positive socio-economic outcomes that is really starting to become quite persuasive and it is causing more anxiety in our communities amongst the people who follow these things, and part of that language has found its way into your report, and they are the things that I want to focus on.

The past 2750 gigalitres our communities have been promised from day one that there would be no more pain, that the 450 would only be recovered or one pursued on the basis of neutral or indeed positive socio-economic outcomes. On farm efficiency programs, to go to those for a minute, that involve permanent transfer of entitlement, do cause negative socio-economic outcomes at a range of scales across the basin. It has been very hard to get anyone to understand or to acknowledge the reality of consequential impact, but as a

property valuer in my day job where I value agricultural holdings from one end of the Murray River to the other, and into New South Wales, I see enterprises further downstream all the time whose production is sustained by Victorian high reliability water, Murray or Goulburn high reliability water. They enter into on farm efficiency projects further downstream. They trade their entitlement for the works. That's fine. And then they go back and they either buy permanent entitlement from this part of the world or they enter the allocation market in this part of the world, putting up with price pressure.

So it is mining the productive resource, productive capacity of this region in a very real way, and trying to get anyone to take any attention to that market reality that is actually playing out all the time, it is real and it is not hard to pick up. That is something that the consequential impact is something that is just not detected at this point and it doesn't look as though it's proposed to be detected if the rhetoric from Canberra is what we're taking notice of.

So in terms of your draft findings and you're seeking feedback specifically on your report, and to call out the change in the language and the drift and the decline in the language around the commitment to positive or neutral socio-economic outcomes, draft finding 5.1 where you rightly call out that addressing concerns by requiring efficiency projects to have no adverse impact, you say is impractical and it is probably quite right. Then that risks ruling out projects that achieve least cost outcomes. The commitment to regional communities is that if it is a socio-economic cost, it won't be pursued.

Over the page on draft finding 5.2 where you say, second dot point, "Basin governments have not yet agreed on an efficiency measures work plan to recover 450 gigalitres by 2024, including how major socio-economic impacts will be addressed". Again, this is the drift in the language. If there are major socio-economic impacts the commitment to these communities from day one has been that they can't be pursued. Trying to address them or fix them up later on, is not what the commitment was, and under recommendation 5.2, fifth dot point, "Program design and implementation should explicitly consider potential socio-economic impacts and include mitigation strategies".

We shouldn't need mitigation strategies if a commitment to positive or neutral socio-economic outcomes is fulfilled. This is the language that is infiltrating all the commentary on the Basin Plan now. So I suppose if it is known in government circles that no impact is impossible and practical then it is pretty obvious a new level of honesty is going to be needed with communities pretty urgently. If least cost projects are really the only option, how is the extent in the severity of the impact of those projects really going to be measured and how is it going to be dealt with? It seems to us the principle, the concept and the commitment to positive or neutral socio-economic outcomes around the efficiency measures is under real attack, and the language that is in some of your draft findings and recommendations seems to be laying out a pathway for some decision-makers to start stepping away from that commitment. That's what I really wanted to shine a light on today.

COMMISSIONER DOOLAN: Okay.

MS SHEED: I just wanted to add some comments on one of the other recommendations and in Chapter 14 the Commission speaks to the government's institutional and governance arrangements in relation to the Murray-Darling Basin Authority and I have to say for some time we've discussed, you know, the fact that it's there to do everything and that that doesn't seem to be working so we would welcome the recommendation you have made about separating those roles into the trusted advisor and reliable regulator, and I think it was very much brought home to me the conflict that must exist within the MDBA when I first saw the Four Corners Report about the Northern Basin and then later the Lateline Program because during all the years that the issues were arising from 2012 to 15 or 16, the Murray-Darling Basin Authority were in the Northern Basin conducting the northern review, not a whisper about those issues, the alleged water theft, the lack of monitoring, the taking of environmental water, the banks going up in all sorts of places, and as it turns out in southern Queensland, now allegations of fraud and indeed charges being laid around the Norman properties.

So it really does show that there needs to be a regulator and the other, because I think that combination of both is what has led to such a loss of trust by many of us in the Authority. It is trying to be everything to everyone and it certainly hasn't shown itself as being effective in terms of regulation or oversight, and while it might have come up with a sort of a tool kit for the Northern Basin, it didn't shine a light on what was happening. It should have shone a light, it should have insisted on compliance. It didn't do it and now we have people in this room and everywhere still calling for a Royal Commission into the whole of the plan. That lack of trust and those things that have gone on over the years are what have been percolating to lead to the demands around that.

So I think getting the governance right and those institutional arrangements right, is an absolute must and we welcome that recommendation.

COMMISSIONER DOOLAN: Thank you for that. I might just deal with that and we move to the socio-economic. I think the governance recommendation, obviously we feel strongly that that separation is an important element for two reasons looking forward. From what we see, successful implementation of the SDL Projects moving forward, taking on a real resource manager role in the MDBA, it's extremely important into the future and that's in the trust advisor camp, and obviously the regulatory function also, and we just believe combining them means neither function is done to their best capacity. Separation enables both to be - totally to the best capacity and the community needs both those functions done really well to capitalise on some of the issues around the Basin Plan.

So that was our thinking about that separation. In some cases people have asked us to explain those benefits and those risks in greater detail which we will do in our final report. But coming back to the socio-economic issues. John?

COMMISSIONER MADDEN: Yes, I think it's - you mentioned honesty and the like and maybe this is a part of the development at the early stages of the plan and the 450 being a late development, and a sentiment being put in, but you've got to them read the test and I don't want to get into legalities because we hear this on both sides. As we've gone through, we've heard people say, "Well, this was the principle, if you read that bit". Then you hear

others, including South Australia, saying "Yes, but if you read the rest, what we wanted was, you know, the 450 and on farmers' participation and that's the test".

So we could talk and people have talked about that for a long time. I guess the question I have in trying to step back and maybe it is a question to you and it is difficult to get an easy answer, but after 2024, if the 450 has been obtained or recovered, what do you actually want to see? Because the application of the criteria and we heard it just before, could actually mean that no project could ever be done because as an economist, I read any transfer of water out of the consumptive pool and handing it over to the environmental water holder, to not have an impact on price over the long term. I mean, I could only imagine one project which would be running the SDL - sorry, the desal plant. I can't think of other projects that would actually meet that test.

So the question for me is number one, we're going to get into what project would meet the test, and we could talk a long time about that and the criteria, or what are the attributes of a program. Not just the assessment criteria, but what's the program and - - -

MR McKENZIE: Commissioner, with respect, I'd reject the premise of the question. This is the drift in the conversation. The commitment has been that the up water would not be pursued if it couldn't be proven to have neutral or indeed positive socio-economic outcomes. I don't want to be drawn into a conversation about how do we mitigate bad outcomes or how do we make them not as bad as other outcomes. That is the drift in the conversation and taking the whole community down a path where the commitment - contrary to all the rhetoric from all the decision-makers from day one. That is exactly the sort of conversation which is the death of a thousand cuts which will see. Who is going to bear the pain of this transition again? It is the people who are trying - the irrigation dependent communities taking water out of the consumptive pool.

Just because it can't be done without causing damage, that's where it starts and ends. It's not how do we do it with causing less damage. It is a matter of fundamental principle, and engaging in conversations past that first principle are just taking us down a path to again, to that death of a thousand cuts.

COMMISSIONER MADDEN: Okay. We will move on then. We did have a discussion around the cost benefit of the 450 and the review of the account and the amount of money available for the Department to pursue the 450, so we have some recommendations in the report on that. Do you have any comment on that assessment of costs and benefits and then linked through to lifting constraints?

MR McKENZIE: I would suggest the constraint issues have probably been well-covered here. In terms of genuine costs benefit analysis for the taxpayer which is probably something that the PC has, you know, front of mind for your thinking, there's massive questions to be asked there, and I think our group, as a principle at the start of the socio-economic work, not just taking a self-interested view of this, but a view for the Australian taxpayer, this thing absolutely echo your concerns about the lack of rigour cost benefit analysis on that, and it really needs to be done to demonstrate that this is actually worth pursuing, and combined with a focus on outcomes rather than, you know, a blind adherence

to deadlines and volumes, will actually end up making the whole plan and balanced out, comes better for all. So very comfortable with the broader recommendations that you've made in respect to PCA.

COMMISSIONER MADDEN: Yes. Do you have any comments on the neutrality and the like?

COMMISSIONER DOOLAN: Not really. I mean, we have actually noted that your group put out your criteria yesterday and two governments came out as well. I suppose a question that we did have was from your perspective and understanding, and not just in this region, what sorts of projects would meet those criteria?

MR McKENZIE: I understand there's buildings full of people in Canberra who are working on those sorts of issues rather than time poor volunteers trying to advocate for their community.

COMMISSIONER DOOLAN: Okay. All right.

MR McKENZIE: Wouldn't that be in their domain to put it up to be tested?

COMMISSIONER DOOLAN: Well, elsewhere in the Basin, some communities have indicated they have got some projects that they, you know, feel might be worthwhile. So it was actually to see if there's anything here.

MR McKENZIE: Yes. Look, I think that's admirable but I don't think the onus should be on the communities to offer up ideas, is my sense of it.

MS SHEED: I think there's a strong sense in which we would like to see how the SDLs go. Like there's a whole lot of projects that haven't even started yet, and before we talk about the 450, ought they not to be rolled out, see how they go, assessed, evaluated and all of that before you'd even talk about doing the 450. That would seem a logical step and it was probably - the understanding for us was always that you'd roll out everything and then you'd have a look at how things have gone and is it possible to get more without any negative socio-economic impacts, neutrality, hopefully even positive benefits. So I would have thought - I think it was in our minds initially that this discussion around the 450, it would have just come much later when everything else had been done and you'd probably evaluate all of that and say, "Well, do we need it and can we get it without anything negative happening?"

But it has been thrust upon us by effectively political issues in Canberra around getting, you know, getting some amendments through.

COMMISSIONER MADDEN: Okay. So I guess we do make that point, the cost benefit and no regrets and waiting for the SDL information.

COMMISSIONER DOOLAN: And aligning to the benefits of the additional water. So those points have been made. We understand your bigger picture, but rolling out and trying to get a logical sequence is something we've tried to do.

COMMISSIONER MADDEN: And recommended.

COMMISSIONER DOOLAN: Yes.

MR McKENZIE: I suppose the only thing - just even the tone of the conversation we've had suggests that we have to win 450. Like that is the mindset that the region has been confronted with all the time. If this is really hard, that's bad but how else we going to do it? If it can't be done without any negative impact this way, how else are we going to get there? The sense is that that is not a target, it is a locked in part of the whole project and it's not how can it be done with no damage, it's how do we do it with the least damage? How do we actually nurse this through and just get to 450? You know, again that sort of blind fixation on a number as a lock as part of the plan, rather than something that should be pursued with full intent and endeavour at the end of the plan, on the basis that no damage would be done to communities. It is a really different style of conversation.

COMMISSIONER DOOLAN: Okay. Thank you.

MR McKENZIE: Thank you.

COMMISSIONER DOOLAN: So that is our last scheduled participant. There is an opportunity now for anybody in the audience who would like to make a statement to do so, and so I think we have - so again for the record, your name and affiliation.

MR EAGLE: Yes. It is Neil Eagle from the other side of the river. I've been previously the Chairman of the Murray Valley Water Diverters and also Chairman of the New South Wales Murray Lower Darling River Management Board for ten years, so I've been involved with water matters for a long time. The thing that I want to - I didn't put a submission in. I've put a whole heap of submissions over 20 years and most of them have been ignored. I am not saying to you.

What I'd like to say is that this Basin Plan is predicated on a lie. It's an environment plan. It's got nothing to do with a balanced appraisal of socio-economic environmental needs. It contravenes the National Water Initiative. It is indicated under COAG that that was supposed to be the case. If you read Briscoe's report, Professor John Briscoe, the late Professor Briscoe, he does outline exactly what is the problem and that Australia previous to the 2007 Act was considered the world leader in arid zone water management. He considers it has now lost its way and unless that Act is redrafted, it will never reclaim that position again.

So I heard a lady talking about over allocation, and the river declining. Obviously the river was, at the time when Howard brought this forward, when you've got a drought and you haven't got any water in the river system, that's obviously - it could be considered a decline in the system. So far as over-allocation is concerned, there's no such animal as over

allocation. You could argue in some rivers that there might have been too many entitlements given out, but you've got to realise the understanding seems to be zero of knowledge between the difference between allocations and entitlements. The entitlements are what's granted, and the allocation depends on the basis that the first water goes to conveyance losses. The second water goes to critical human needs. If there's any environmental needs, the next water goes to that, and if there's any water left over, it goes to productive use.

In the Murray during the drought, the New South Wales Murray, was two years of zero allocation; one year of nine per cent and one year of ten per cent because they were the last cab off the rank, and so you can't have over-allocation when you've got no allocation and that seems to be missing in an understanding of the real issues in relation to this. As far as the solution to the problem goes, I consider we're looking at a train wreck in relation to the irrigation industry of this country. It has been sacrificed on the basis of buying a few votes. It's really a political animal, it's not really dealing with the real issue of river health. I was engaged in the 90s with three scientists on our river board in determining how you deal with river health issues.

The first thing you'd do is you identify whether there's a problem anywhere. The second thing, you identify what's the best most cost effective way of dealing with it and then you put in a monitoring program to see if you've achieved anything. What we've done here, both in the Living Murray which they were promoting first and it started off at 500,000 megs and then ended up as Louise said, to 1500, but it was reviewed in the House of Reps interim report into the Living Murray where they came to the conclusion, ten out of the 11 cross-party politicians came to the conclusion when they were address by both the Wentworth group and other scientists, that there shouldn't be any water taken from production at that time in 2004 because there wasn't the science there to justify it.

Now, that was the finding of those people and as I've said to one of the politicians that was involved in that, I said, "If that report had been waved from the rooftops, we wouldn't be dealing with this Basin Plan now". We're looking at really squandering equivalent to Hume Dam every year down to the bottom end and out to sea. A million megalitres of evaporation in the lower lakes and two million megalitres as Louise said, over the barrages, out to sea to try to scour out the opening between the Coorong and the sea. It is an absolute nonsense and what I'm saying is here, we're looking at the irrigation industry of this country, both on New South Wales side and Victoria because primarily 80 per cent of the irrigation industry is in the southern connected Basin. We've got MIL operating now with about half its historic water use, the same with Goulburn Murray Water.

I believe that they are on the brink of tipping over and if that happens, all hell with break loose. We're threatening the actual food security of this country for no purpose. We are not gaining any environmental benefit because that's where the water's going. I've got no problem. I was involved with the River Board in trying to identify how you deal with the environmental issues, and you should deal with them, and the people that are in the valley want to see a healthier environment all the time. But they don't want to see water squandered and choofed out to sea for no purpose and that's what we're talking about.

We're talking about squandering Hume Dam every year for nothing, and I just cannot believe - if you talk about the 450 which is a nonsense, a thought bubble in the first - the last five minutes to get South Australia to once again agree to extortion, it's unbelievable. It was just a pure thought bubble, and if that happened, that would be the final nail in the coffin. I am really concerned about the future of the irrigation industry of this country, and I'm very concerned that we've got young irrigators who are now weighing up the options, "is there a future in this industry in irrigation or not". And I know there are ones in our area that are talking in this way. That really concerns me and they're thinking of bugging off. They'll just say, "It's too hard". I mean, it's been going on for 20-odd years. It doesn't look - we're looking at a situation and I've talked to a great friend of mine, that's the previous Director-General of Water in New South Wales, Peter Millington, who I consider the top water policy person in this country. He said, and I talked to him the other day, and he said, "Really there's got to be something wrong" - he's out of it now, he's retired - he said, "When you think that Dartmouth's sitting at about 90 per cent, Hume's 50, you've got zero allocation in New South Wales, you've got sales water in Victoria no longer ever going to be available to them, you'd have to really come to the conclusion that something's bloody wrong". And it's time people stopped and realised there's something wrong and people have been duded politically. It's a political decision that's driving this. It's got nothing to do with dealing with the real issues, the environment issues and productive issues of this country, and it's bloody time it did change and those things became the top of the things that are being considered, and I'm hoping that really, the Productivity Commission, I didn't put a submission in, I just came, I was going to listen, but I was hoping that the Productivity Commission will actually highlight how serious this issue is to the politicians.

They'll have to wear it in the end. If they don't wake up very quickly, I'm concerned that we're on the brink of a real disaster in this country, and it is time that people stopped and realised how serious this issue is.

COMMISSIONER DOOLAN: Thank you for that. Thank you.

MR EAGLE: Thanks for your time.

COMMISSIONER DOOLAN: No, thank you. Is there anybody else who would like to? Ken? Again, for the record.

MR PATTISON: Ken Pattison. The review and the conclusion that relaxed constraints were going to be beneficial, was based on the Northern Basin. They did no work in the southern connected basin, and it is correct that the channel country and a lot of that country up there, to be flooded, is beneficial. So to them extrapolate that down to the southern connected basin and say, "It's good and everyone will be happy about it", is fundamentally flawed. Thank you.

COMMISSIONER DOOLAN: Thank you. Are there any others?

MR EAGLE: Could I just one last comment?

COMMISSIONER DOOLAN: Yes.

MR EAGLE: About the Darling - - -

COMMISSIONER DOOLAN: Again, sorry, it's for the transcript. So we need you there.

MR EAGLE: I am sorry. I was just about the Darling. There's been some comments made and I've got friends in the Darling and it is very concerning. And the other thing is that if there's something being done wrong up in the Barwon or northern, that should be dealt with. The problem is that the southern irrigators have been tarred with the same brush. They are very closely monitored. The metering is very tightly controlled in the southern rivers, and to have South Australia come out talking about they want a Royal Commission into it, it is absolutely nonsense. It is really offensive, because South Australia, after Dartmouth, gets its water before the upper states get any. So they are never going to be short of water. If it doesn't come down the Darling, it comes from the Hume, and so they are not short.

The only people that had a concern around any water that was taken out of the Darling, in the upper end of it, would be the lower end of the Darling who had real reasons to be concerned, and New South Wales and Victorian Murray irrigators because they're the only people impacted by that operation if people did take water that they shouldn't have taken up north, and if that happens it should be addressed. But to have South Australia having a Royal Commission into it thinking that they've been disadvantaged in some way, that is offensive to the upper states' people because that is not possible. They get their water before the other states get any.

COMMISSIONER DOOLAN: Thank you. Under the agreement. Yes. Louise.

MS BURGE: Just in terms of ways forward and solutions. If we could broaden our thinking on infrastructure solutions at the bottom end of the system, I do believe the Northern Basin issue does need to be addressed, but if we look within South Australia - I will give you an example of the salinity target. We have to meet 1000 EC target 95 per cent of years in Lake Alexandrina now. The official measuring point obviously is Morgan, and I believe that that should still be retained.

But if, over time, we are going to have to meet this target, it is sometimes referred to as an aspirational target, I don't see it that way because it is a target within the Basin Plan. If the construct of the barrages and the operations of the barrages actually still allow sea water to permeate under the barrages and also re-enter into the Lake Alexandrina when the barrage gates are open and during periods of southerly swells, they can't effectively close, for example, the Goola barrage, why should we be held accountable for an EC level in Lake Alexandrina when South Australia can't actually keep the sea out?

That's an example where an infrastructure investment, you know, makes sense. It avoids flooding people. It avoids decimating irrigation communities et cetera. We also, up to this point, have had a rule in place when the Federal Government funded the upper south-east drains, the upper ones that no more than 40,000 megs on average over a ten year average

of the upper south-east drainage and flood mitigation scheme, so no more than 40,000 megs of that water can go into the Coorong.

Now, we've got the absurd situation of saying, "We can't have local water go into the Coorong, but we can take it from Victoria and New South Wales Murray and travel it 2,225 Ks down there and then miraculously once it does get to the barrages, it's got to do a left hand turn and travel 150 kilometres left when the prevailing wind is in the opposite direction and the tide is a 12 hour tidal wind. So it just cannot work. And if you look at - you know, there is discussion on returning additional water. I think it is only 29 gigs or 26 gigs from the upper south-east drainage and flood mitigation scheme.

There is a lot more that could be done there. And in relation to the main south-east drains of which there's, I describe as a deathly silence about, South Australia does talk about the upper south-east drains, but does not talk about the main south-east drains and I've done a tour right through that area, I know exactly where bits are and what it is. In the year 2000, for example, 450,000 megalitres was put out to sea in that one year. Now, it might have been a wet year, 2000, there have been many other wet years. I think it is incumbent upon governments to know exactly how much water is going out to sea from the drainage schemes and look at measures to return some of the historical flow pathways from south-east South Australia back into the Coorong, and that under the MDBA's approach is a missing link. They will not enable any focus to go back into South Australia to meet their own objectives of which we have to provide the solution which can't physically and geographically work. You know, it's just like a brick wall.

COMMISSIONER DOOLAN: I suppose one of our recommendations which is about the 2021 review of the water for the environment special account, actually does raise that question of looking at other options to achieve some of those environmental outcomes of Schedule 5. So we have tried to, if you like, utilise a scheduled review to actually look seriously at a range of some of these issues.

MS BURGE: We will, under a cost benefit analysis, surely some of these are outputs, you know, can be more effectively met. Thank you.

COMMISSIONER DOOLAN: Okay. Any final comments? All right. Ladies and gentlemen, that does conclude today's scheduled proceedings and we would like to thank everybody who has appeared and people who have spoken. We would like to thank people for their submissions and again encourage, if there's anything further, that you would like us to be aware of, to actually provide it to us in the process.

We will be taking account of what we hear in these hearings, what we receive in submissions, what further information people provide to us, to finalise our draft report and to actually provide that to government, as I said earlier, by Christmas. So at this point, I adjourn the proceedings. This concludes the Commission's public hearings for today and we will resume our public hearings next week in Dubbo. Thank you.

**MATTER ADJOURNED AT 4.23 PM UNTIL
THURSDAY, 25 OCTOBER 2018**



Australian Government
Productivity Commission

PRODUCTIVITY COMMISSION

**INQUIRY INTO THE FIVE YEAR ASSESSMENT OF THE EFFECTIVENESS OF
THE MURRAY – DARLING BASIN PLAN**

DR J DOOLAN, Commissioner
MR J MADDEN, Commissioner

TRANSCRIPT OF PROCEEDINGS

AT DUBBO RSL CLUB
ON THURSDAY, 25 OCTOBER 2018 AT 8.40 AM

INDEX

	<u>Page</u>
HEALTHY RIVERS DUBBO MELISSA GRAY	248-257
INLAND RIVERS NETWORK BEVERLEY SMILES	257-267; 299
MACQUARIE RIVER FOOD & FIBRE GRANT TRANTER	265-269
MACQUARIE MARSHES ENVIRONMENTAL LANDHOLDERS ASSOCIATION GARRY HALL DUGALD BUCKNELL	269-280
LACHLAN VALLEY WATER MARY EWING	280-286
BELARINGAR CREEK ASSOCIATION MICHAEL JOB	286-289
MS MARGARET McDONALD	289-291
BARWON-DARLING WATER IAN COLE	292-298;300

COMMISSIONER DOOLAN: All right, good morning and welcome to the public hearings for the Productivity Commission inquiry into the five-year assessment of the effectiveness of the implementation of the Murray-Darling Basin Plan. These hearings follow the release of our draft report which occurred at the end of August. My name's Jane Doolan, my fellow Commissioner, John Madden, will be arriving, he's driving down from Sydney and has encountered a little bit of roadwork on the road, I think, but he'll be arriving quite soon.

I would like to begin by acknowledging the traditional owners of the land on which we meet and pay my respect to the Elders, past and present.

The purpose of this round of hearings is to facilitate public review of the Commission's work, our draft findings and our draft recommendations, to get comment and to get feedback on that draft report. We have already had hearings in Mildura, Murray Bridge and Shepparton. This hearing is in Dubbo and our last hearing tomorrow is in Canberra. Then we will be working towards completing the final report to be handed to Government just before Christmas. In completing that final report, we take very seriously the submissions that we have received and the comments that are made in public hearings and in meetings that are held with stakeholders, so this is very important input into the finalisation of our draft findings and our draft recommendations.

Participants and anybody who has registered their interest in the report will be automatically advised when the draft report is about to be tabled, so, as I said, we will hand it into Government just before Christmas, but the Government has up to 25 sitting days to table it within Parliament, so somewhere between Christmas and probably the end of May.

In terms of these hearings, we like to conduct them in a reasonably informal manner, but I do remind people that a full transcript is being taken, so, for this reason, we can't take comments from the floor. There will be an opportunity at the end of the day for people who are not participating, if they wish to have their say, to come up and actually put comments on the record. Participants can not only refer to their own submissions and comments but other people's comments as well, if they wish to do so.

You are not required to take an oath, but we do ask, obviously, that you are truthful in remarks and, as I said, you are welcome to comment on issues made in other people's presentations.

The transcript will be made available to participants and will be available on the Commission's website in a few days. All the submissions are also publicly available on that website.

To comply with the requirements of the Commonwealth Occupational Health and Safety Act, we are advised that in the unlikely event of an emergency requiring evacuation, a signal will go off and we all go down the stairs and we actually aggregate in the car park, so if people can just be aware of that.

Each time we ask a participant to the table, we ask you to make some opening remarks but then allow some time for questions as well.

I would now like to welcome Melissa Gray from Healthy Rivers Dubbo. Melissa, for the record, if you wouldn't mind introducing yourself and your organisation.

UNIDENTIFIED SPEAKER: Excuse me, can we say that that's been hard for us to hear.

COMMISSIONER DOOLAN: These microphones, I'm sorry, are not for broadcasting, they are just for recording, so maybe just move forward. I'll try and speak up, I'll do my best to speak up, but if anybody wants to move forward in the room, feel free. Melissa?

MS GRAY: Thank you, Jane. My name's Melissa Gray, I'm the founding member of Healthy Rivers Dubbo. I'd like to acknowledge the traditional owners, past, present and future, of the land that we're meeting on and the custodians of Wirrimbah, the Tubba-Gah Maing of the Wiradjuri Nation.

I volunteer a lot of my time for the river on weekends with my bushcare group. I play my part in physically restoring the river to health. I give a lot of my time and resources to being an advocate for water in the rivers and the marshes. I am a founding member of the community group Health Rivers Dubbo and I'm a member of the Macquarie Cudgegon Environmental Flows Reference Group.

In my day job, I'm a contract book-keeper and I work with small businesses. I know how accounts work and reconciliations and I know the value of complete transparent, meaningful and relevant data.

I welcome the Productivity's draft report and I thank you for the opportunity to speak here today. In particular, I commend the draft report in highlighting the lack of commitment by Basin Governments in implementing the plan and the need to extend the deadlines for accrediting the water resource plans.

Just broadly, big picture level, I believe the most logical and efficient way forward for the Basin Plan implementation is for the 1500 gigalitre cap on water buybacks to be lifted, for actual water to be purchased from willing sellers at an acceptable market rate. I think that the buybacks should replace the \$1 billion worth of poorly described efficiency projects that are looking to permanently restructure the natural forms of our rivers and wetlands in the Basin. The money saved by replacing the supply measures with water buybacks could go to supporting communities that need to transition from a reliance on irrigation.

Today, I would like to take this opportunity to talk specifically about extending the deadlines for the accreditation of the water resource plans. Initially, first, vital indigenous consultation is missing from the process, particularly in New South Wales. There's no conduit for Government to consult with indigenous communities any more. There was, but it's been disbanded and dissolved, and that's crucial.

Secondly, the claim that is being made and referenced in your draft report, draft recommendation 3.1, of over-recovery just cannot be the case. Over-recovery in the Macquarie and the wider valleys cannot be real and I'd like to talk to two points to back this position up. One point is the exclusion of floodplain harvesting volumes from the sustainable diversion limit to caps, and the other point I would like to speak to is the questionable use of cap factors. There are a lot of other concerns as well about how the Northern Basin amendments were actually arrived at. Thank you.

COMMISSIONER DOOLAN: Perhaps you could actually take us through your views on floodplain harvesting and cap factors.

MS GRAY: Sure, thank you. Incomplete data is being used to reach the assumption of over-allocation, data which doesn't include floodplain harvesting volumes in the SDL. So the volumes of floodplain harvesting take will not be ready in time for the accreditation of the water resource plans, and this was confirmed by New South Wales DPI staff in Dubbo on 8 October. So, they are going to have a mechanism where the water resource plans can be adjusted after they are accredited to include the volumes, once known, of floodplain harvesting take. I don't believe it's a logical step to accredit a plan that's got a ten-year life before such vital information is available and can be accurately assessed.

Although the Macquarie Water Sharing Plan does acknowledge that floodplain harvesting happens, there is no figure at all associated with the take, the amount of take, so, therefore, the water that is taken has been assumed to go to the environment, which it very clearly does not. Information about the volumes of water taken by floodplain harvesting in the Basin is very limited.

In 2012, it was estimated that the floodplain harvesting take for the whole Basin would average out at 210 gigalitres a year. Recent work on the Gwydir Valley alone revealed the potential for 614 gigalitres of new compensable property rights eligible for licensing, and that's just one valley alone. So, all we do know about floodplain harvesting volumes in the Macquarie is that floodplain harvesting has increased since 2000, especially downstream of Marebone and downstream of Bells Bridge and, according to DPI, New South Wales DPI staff working on the floodplain harvesting project, the volumes of water taken have been grossly underestimated.

So, the challenge now that New South Wales DPI has is to fit the volume of floodplain harvesting under the existing SDL cap so that the licensed take plus floodplain harvesting equals the SDL. The way algebra works is that, therefore, the licensed take would have to be reduced if the SDL is a fixed amount. However, the SDL is apparently a concept rather than a fixed figure, meaning that the value of the SDL can be adjusted. That's not really accounting. A limit with no value is not a limit.

COMMISSIONER DOOLAN: When you say the SDL can be adjusted, where did that advice come from?

MS GRAY: The Murray-Darling Basin Authority and New South Wales DPI. It's part of the Murray-Darling Basin Plan that has just become - it's been around since the Plan

was implemented, but lately it's become spoken about more and more, this concept that the SDL is just a concept, whereas that's sort of new learning for a lot of stakeholders who believed it was a fixed figure, which, from an accounting point of view would make sense that it be a fixed figure, and the volume of environmental water is a fixed figure, but the SDL take can be adjusted.

COMMISSIONER DOOLAN: By climatic conditions?

MS GRAY: No, there's no - absolutely no working in of climate change or climate variations.

COMMISSIONER DOOLAN: Not climate change, just sort of year to year variabilities?

MS GRAY: Well, no, just can be adjusted, as far as I know, to suit caps.

COMMISSIONER DOOLAN: That's something we will take up, but that's not our understanding.

MS GRAY: Okay.

COMMISSIONER DOOLAN: That the SDL is firm as a long-term annual take, so year to year, but long-term annual take.

MS GRAY: That was our understanding.

COMMISSIONER DOOLAN: And that floodplain harvesting would, as you say, come under that and if there were issues that New South Wales would have to actually balance its floodplain harvesting with its licensed take to still achieve the SDL.

MS GRAY: Well, apparently the SDL is a moveable target.

COMMISSIONER MADDEN: Were there any materials at the meeting discussing that?

MS GRAY: No, but it was definitely confirmed by a member of the Murray-Darling Basin Authority and someone from New South Wales DPI, the person who's working on the floodplain harvesting project, yes, it was definitely confirmed.

COMMISSIONER DOOLAN: All right, thank you, we will follow that up. You mentioned New South Wales will not have the figures for floodplain harvesting in time for the release of the draft Macquarie Plan.

MS GRAY: That's right, yes, it's not expected that they will have the volumes ready.

COMMISSIONER DOOLAN: As a stakeholder in that plan, as you can see from our recommendations, we have recommended that there is an extension of time, obviously

regrettable because, you know, States have had quite a lot of time to actually undertake their water resource plans, but, in our view, a good plan requires decent community consultation and if there's real changes involved, obviously it's much more important that that community consultation occur. So, from the Macquarie Healthy Rivers Dubbo's perspective, extension of the water resource plan timeline is preferable to a hard sticking to a deadline?

MS GRAY: Absolutely. Floodplain harvesting is one of a few very serious elements that need to be correctly addressed. There has been no study of the environmental impact of floodplain harvesting, it's all unknown. There's no plan also, there's only a little bit of environmental work that will be done when actual earthworks happen for floodplain harvesting, there's a little bit of environmental work, but there's no plan that I'm aware of to actually assess the environmental impact of floodplain harvesting on the Macquarie marshes, which are internationally significant marshes, Ramsar-listed wetlands included, our obligation under the Water Act and International Migratory Bird Agreements is to protect those wetlands and by not having any environmental impact studies in the wings around floodplain harvesting, that should be all done before a ten-year water resource Plan comes in to accreditation.

COMMISSIONER DOOLAN: Given it is important to have the SDLs come into operation as soon as it is practicably possible, from your perspective, given the current status of the draft plan, what is a reasonable extension here and what needs to happen?

MS GRAY: Well, we need to assess the environmental impact of floodplain harvesting. We need to find out the volumes first and learn about what this sliding SDL limit, we need to understand the impacts of that.

COMMISSIONER DOOLAN: That's a broader question that we will take up.

MS GRAY: Yes, we need to know what that means for our valley. We need to know what the figures are and we are far from that point. Without all of the relevant data - - -

COMMISSIONER DOOLAN: A 12-month extension?

MS GRAY: We need the extension to go until we've got the data that we need to understand the truth of what's happening.

COMMISSIONER MADDEN: Did they outline the mechanism? We are talking about floodplain harvesting that already exists as an operation and the structure is already in place.

MS GRAY: Yes.

COMMISSIONER MADDEN: So we then have an SDL accounting approach which, over time, depending on that estimate would actually measure that estimate take over time and then obviously to comply with an SDL that will occur as implications on the take

under floodplain harvesting or supplementary or general security, you know, as you say, has to fit that number.

MS GRAY: Yes.

COMMISSIONER MADDEN: So notwithstanding the concept of a floating SDL, would not the compliance and SDL accounting going forward be the best way to get information anyway? I'm just wondering what additional information you would get in a year?

MS GRAY: Cap factors create a bit unknown element in all of this in calculating SDL's baseline diversions and water recovered, water for the environment. We've got three versions of these cap factors which blur everything and it's not clear which cap factor is being used in which circumstance and so, unless that information is clear and transparent and available for stakeholders, we won't be able to understand, you know, some basic truths about what water is going where. It's very murky. I could speak to cap factors, I think, if you would like.

COMMISSIONER MADDEN: Yes, I was going to say if you would deal with cap factors as well.

COMMISSIONER DOOLAN: Yes, please.

MS GRAY: So they use like a conversion rate between valleys, they represent the long-term average reliability of water supplies for each valley. They are referred to as long-term diversion limit extraction factors, but I'll just call them cap factors. The calculation of cap factors is contentious, it has generated distrust of the Government amongst stakeholders since 2011. For us to have confidence that actual water is being recovered for the environment, the calculation of cap factors must be transparent and be able to be scrutinised.

New South Wales Department of Industry Water has come up with three different cap factors. So, there's one for baseline diversions, there's one for water recovery and there's one for SDL. We don't know which cap factor they're using. We cannot have confidence that they aren't being used to reach a predetermined result, including over-recovery and no further recovery, which is just not accounting and it's something else completely.

For example, the 2018 cap factors, they were determined in June, they were calculated in June this year, but they were apparently already known by the Murray-Darling Basin Authority when the Northern Basin amendments were finalised in November 2016. This is when the Macquarie and the Gwydir were flagged as over-recovered. Knowing what the figures will be two years before they are calculated, that's not accounting, that's something completely different.

When the same cap factors were applied to the Lachlan, the result was a significant under-recovery. So, after years of work, over a weekend, that value was revised to zero with no explanation coming forward, they just said, "There's extra information came

forward over a weekend and we've changed that figure to zero." That's not how accounting works, that's not - anything but.

Then there's the finance, how cap factors and money interact. The Murray-Darling Basin Authority and New South Wales Water say that cap factors should never be used by the finance sector to value water and yet they are supposed to represent real water. That's a red flag. Cap factors are not indeed representing real water and that must mean that we can't trust those figures. In accounting, figures must represent what they are meant to represent, but if there's a different cap factor for environmental water and a different cap factor for SDL, how can we know - and they're saying, "Oh, don't use that, don't take that number to the bank", well what's the use of that number if not to be a mechanism to obtain the answer that you want?

COMMISSIONER DOOLAN: I certainly understand the confusion. Cap factors are highly technical, an arcane science, if you will, but, however, necessary. So, what mechanism of communication would actually help restore your confidence in this? What would you like to see?

MS GRAY: I'd like to see consistency in the application of cap factors. There shouldn't be one set of rules for the environment and one set of rules for take, it doesn't make sense. When a cap factor is applied to any water, it should represent real water and you should be able to take that number to the bank.

Water markets are affected by the SDL, of course, because the SDL sets out the amount of water available for consumptive use, which in turn affects the price, so if a cap factor is only applicable to environmental water, it undermines the water market, it's taking away integrity of the CEWH's \$3.2 billion water portfolio and the property rights associated with that water. It's diluting the property rights and it's undermining the entire water reforms of the past decade, including our \$13 billion investment in the Basin.

COMMISSIONER DOOLAN: As we understand it, the application of cap factors is a necessary element. Without the Basin Plan, it would occur in a continuous improvement cycle anyway.

MS GRAY: Yes.

COMMISSIONER DOOLAN: The application, whilst I certainly take your point that it is not terribly transparent, it's very confusing and therefore it does reduce confidence, absolutely.

MS GRAY: Yes.

COMMISSIONER DOOLAN: The numbers are still around the margin, so it's, I suppose, understanding that the application would still be around the margin, it doesn't hugely change the portfolios, but the key thing is undermining confidence here and public trust.

MS GRAY: Absolutely. You do come up with different figures when you use different cap factors and we know in our rivers, getting away from accounting, when we're out on the ground, you know, on the land, that most times are dry times and a little bit of water makes a huge difference.

COMMISSIONER DOOLAN: Okay.

COMMISSIONER MADDEN: Just a clarification. When you say environmental water is treated differently, do you mean the Environmental Watering Allowance holdings or do you mean general security holdings held by the CEWH are treated differently to general security water that's held by irrigators?

MS GRAY: Well, that's my understanding, that's my understanding. I would imagine that's the case, but I can't absolutely confirm.

COMMISSIONER MADDEN: Sorry, you mean - - -

MS GRAY: Yes, SDL has got its own set of factors and the water held by the CEWH, which is both general security, has a different set of factors again.

COMMISSIONER DOOLAN: Thank you for that.

MS GRAY: So there's no longer a publicly-available and readily understood metric developed by Government that can be used by the finance sector when considering finance against water licences and that is extraordinary.

COMMISSIONER MADDEN: We can put that question back to New South Wales.

COMMISSIONER DOOLAN: To the Authority.

COMMISSIONER MADDEN: And the Authority.

MS GRAY: There's clearly data missing from the technical document for the 2018 cap factors calculation, including reliability and utilisation factors, therefore, the data is incomplete and the accounting cannot possibly be sound.

COMMISSIONER DOOLAN: Thank you for that. But what you would want to see going forward and into the finalisation of the water resource plans is a clear set of cap factor numbers, consistently applied, and transparently understood.

MS GRAY: Absolutely. We understand the need for cap factors, we get it, we're all experienced with the practicalities of the river and availability and management of general security, so, of course, we understand the need for cap factors, but we don't trust they're not being used to get predetermined results two years in advance.

COMMISSIONER MADDEN: Just in that meeting, and they may not have specified, but what were the kind of broad next steps, and did they communicate, more importantly,

the broad next steps on how to come to a landing on some of these things in terms of policy or process where they're telling you what's happening, water resource plans and the like?

MS GRAY: Yes.

COMMISSIONER MADDEN: The next major step?

MS GRAY: Yes, I'm not on the stakeholder panel for the water resource plans, so I won't comment on that.

COMMISSIONER DOOLAN: The October 8 meeting, it was a more general meeting?

MS GRAY: That was a floodplain harvesting consultation. The next thing that we're going to get together again next year, I think, early, and we're going to know what the volumes are and we're going to learn more, I'm sure, about this sliding SDL limit with no value.

COMMISSIONER DOOLAN: Okay.

MS GRAY: I'd just like to tie some - I mean, these are just some concerns that we have about a lot of assumptions that have been made, particularly over recovery of the Macquarie and the Gwydir as well, but they all tie in, along with a lot of other things as well that other people can speak to, about what went through - the Northern Basin amendments that went through the Senate earlier this year. So the amendments are going to reduce the amount of water in our environmental accounts. The amendments were calculated in a rush. There was no new science done to assess the health and resilience of rivers and our internationally-significant marshes, which we've got an obligation to protect.

The modelling used must have been flawed because the data available didn't include floodplain harvesting and it's got this very foggy, unclear use of cap factors, and this work was done two years prior to those factors being calculated. It's not transparent and it's not accounting.

The Northern Basin amendments are going to have significant negative impacts on the health of our rivers and our marshes, our internationally-significant Macquarie marshes are going to reduce in size and complexity. If our floods get further apart because of a dry in climate, the flood events are going to be longer apart than the life span of the birds that come to breed and we'll lose the entire site as a breeding opportunity.

If we had less water in our Macquarie accounts, we are going to be able to connect to the Barwon even less frequently than we can now. We've currently got a connection to the Barwon, which is great and against the odds, but we're going to be able to do that less and less frequently.

The rivers in the Basin, if they connect less, they are weakened, they have got less resilience, it's going to impact on the local economies of places like Brewarrina and Bourke. That water that comes through the Macquarie falls in winter and in springtime finds its way through to the Barwon in ideal circumstances. All the other - most of the other rivers in the Northern Basin are monsoonal-fed and they get summer rain. So, the water that does come from the Macquarie is precious to these economies and communities along the Barwon-Darling, so the less water we can get out - connectivity is how our native fish move and we are going to lose species of native fish naturally occurring in the Macquarie if we lose more connectivity that we've already lost.

COMMISSIONER DOOLAN: I have read your submission as well. Do you mind if I ask a question around your submission rather than what's covered - - -

MS GRAY: Yes, absolutely.

COMMISSIONER DOOLAN: You did talk about connectivity in the submission.

MS GRAY: Yes.

COMMISSIONER DOOLAN: But you also did refer to the trade-off between the use of environmental water locally with the use of environmental water to produce the connective event down the Barwon-Darling.

MS GRAY: Yes.

COMMISSIONER DOOLAN: We have made recommendations about how the Basin Environmental Watering Strategy, the next version of it, what it needs to take into account, so there's some areas where it's a good start, if you like, but people have learnt and it's a bit deficient and connectivity through the Basin is one of those areas.

MS GRAY: Yes.

COMMISSIONER DOOLAN: Do you want to comment on the trade-off, if you like, between a local environmental watering or decision to water locally and a decision to devote to a more system-wide event?

MS GRAY: Yes, we aim to connect to the Barwon-Darling as often as we can through our local watering events. Because of the marshes, it's not an easy case of just sending water through the marshes through the Barwon. The marshes are a complex system, they've got deep, spongy composting soils that take a lot to keep moist. A parched system takes a lot more water to get water through, the cracks are deep, the water goes down and down and down before it goes along.

COMMISSIONER DOOLAN: So not a lot of control anyway?

MS GRAY: There's not a lot of control. We can only - the best time that we can send water through the marshes into the Barwon-Darling is when the marshes are wet and,

obviously, that happens less and less. We can do it, but we know our system well enough to know that if the system is parched - - -

COMMISSIONER DOOLAN: It won't happen.

MS GRAY: It won't happen, it takes too much water because they're too dry for too long.

COMMISSIONER DOOLAN: Okay. I'm sorry, I interrupted.

MS GRAY: No, that's okay.

COMMISSIONER DOOLAN: It's just an interesting element. Are there other comments that you would like to make?

MS GRAY: I could sit here and talk all day, but I have mentioned everything in my notes. Yes, prime concerns around a lot of things, but the Northern Basin amendments don't sit very well with us.

COMMISSIONER DOOLAN: Thank you. I have no further questions. John? Okay.

MS GRAY: Thank you very much.

COMMISSIONER DOOLAN: That's the first set of clapping we've had for a submission. Well done. Our next speaker is Beverley Smiles from the Inland Rivers Network. Beverley, do you mind just introducing yourself again for the record.

MS SMILES: Beverley Smiles, President of the Inland Rivers Network. I appreciate the opportunity to present to you at this hearing today and I would like to start by acknowledging the traditional owners, present, past and emerging, on whose country we are meeting today.

The Inland Rivers Network, or IRN, is a coalition of environmental groups and individuals that have been advocating for healthy rivers, wetlands and groundwater in the Murray-Darling Basin since 1991. As you are aware, we submitted comment on the draft five-year review of the Basin Plan and we outlined a number of key concerns both with the review, some of the recommendations, some of the economic analysis and our deep concern that the Basin Plan is now completely off the rails.

I would just like today to concentrate on three areas as the basis of our concern for the lack of success of the Basin Plan. These are the failure to meet an environmentally sustainable level of take, or an ESLT, the process of water resource plan accreditation, WRPs, and the State and Federal Government commitments under international treaties, as identified in the Water Act 2007.

We consider that the original Basin Plan adopted in 2012 already had a highly compromised volume of 2750 gigalitres set to be recovered for river and wetland health

across the Murray-Darling system and this figure already failed to meet significant hydrological and environmental targets. We consider that the final outcome of the Northern Basin amendment and the SDL adjustment package certainly fails to meet an ESLT. We note that by referring to the new recovery target of 2075 gigalitres throughout the draft report, the Commission has failed to recognise the 5 per cent limit of change built into the SDL adjustment mechanism and that a further 62 gigalitres need to be recovered under that adjustment.

The original 390 gigalitres for the Northern Basin recovery met only 49 per cent of the environmental targets. So, lowering that to 320 gigalitres takes the outcome further away from an ESLT. Returning 605 gigalitres back to extractive industries in the Southern Basin from the already compromised Basin Plan recovery target will cause a major failure to meet the objectives of the Plan.

The 36 supply measures proposed to provide this significant claw-back will not result in environmental improvements and have compromises inbuilt within the way they were developed. So, there is a high level of uncertainty and limitation in the modelling and the ecological elements method scoring and final modelling outcome was not available before the SDL adjustment was made.

The Menindee Lakes Project is a key element of the package that is supposed to provide the greatest return of water to the extractive industries and this project, as we all know, is highly questionable. The Jacobs Due Diligence Report on the business case for the Menindee Lakes Project is dated October 2017, so prior to the SDL adjustments, stated: "In general, the business case does not present an organised, comprehensive, consistent or persuasive case for the Project. It does not include all the elements that would be expected for a project of this type and, in some instances, provides cursory consideration of key project issues." Yet this is the project that got the SDL adjustment package to a politically palatable volume of water claw-back for the industry. There is significant doubt around this project and, indeed, the whole package of supply measures, as the Commission has recognised.

The current political threat to achieving the 450 gigalitres upwater through on-farm efficiency measures now creates a greater risk of an ESLT being achieved. Lack of cooperation from New South Wales and Victoria through refusing investment into improving the efficiency of on-farm water use is a very strong argument for lifting the cap on buybacks. We are disappointed that the Commission's economic evaluation of Basin Plan spending did not include this option as a way forward. We also note that modelling scenarios of the full recovery of 3200 gigalitres showed that 22 of the 25 hydrological targets at four indicated sites have a high level of uncertainty of being met.

From our perspective, the Basin Plan appears to be broken.

With the water resource plan accreditation, we support the Commission's recommendation for an extension of time for this process because there are critical issues in New South Wales that need to be resolved.

The issue of amending WRPs after accreditation is very unclear and, as you have heard from Melissa, that has been publicly stated to stakeholders that that's a consideration in regard to plugging in figures some time in the future. There's also a bit of uncertainty about the lifespan of the water resource plan. We have heard, again, some people think it's got a ten-year lifespan, I've been told they are perpetual plans. Unless there's an amendment to the Basin Plan, that causes there to be a need to amend the water resource plans, so there's a bit of uncertainty around what a water resource plan actually is or, you know, the period of time of its input.

As we have said, it's been stated that a solution to the current timing constraints - there is, you know, a lot of timing constraints for a number of complex issues, and really the whole accreditation process needs to be more accountable with clear explanation of the standing of water resource plans.

So the New South Wales Government has not completed, as you have heard, the estimation of take through floodplain harvesting, Water Sharing Plans have not been finalised, particularly in regard to protecting environmental water in unregulated river systems, the development of cap factors to account for water recovery is still a work in progress. From our understanding, there has been a consultation process around cap factors and, to my knowledge, nothing has popped out the other end of that yet, that particular process, and the consultation with Aboriginal communities has been less than desirable.

We believe it is really important for held and planned environmental water to be protected within and between water sources in rules within accredited water resource plans. For example, there are unregulated sections of rivers at the end of the regulated part of the river in rivers like the Macquarie and actually most of the New South Wales Northern Basin rivers have got a regulated section and then a bit of an unregulated section before they enter the Barwon-Darling. We consider it is really important for that feed into the Barwon-Darling to be protected in that unregulated section.

But the New South Wales Government is saying that they do not intend to amend their unregulated plan rules until the end of their ten-year lifespan under the New South Wales Water Management Act 2000, which is generally around 2022, and the Northern Basin toolkit measures, which include protection of environmental water, will not be implemented by July 2019 when the water resource plans are supposed to be turned on. So, we consider a pause in this process to get the water resource plans right is really important.

We have got two WRPs on exhibition for community comment, as we speak, of the 22 to be developed in New South Wales. The community will be overwhelmed by this rushed roll-out to get all WRPs to the MDBA in time for accreditation by June 2019. This is an impossible task and should be recognised as such. Because New South Wales is the largest extractor of water in the Basin, it is critical that the water resource plans are fit for purpose, that is, to achieve and manage the combined ESLT.

So, just to restate some of the things that have been said about the importance of the international treaties and the Basin Plan and also State Governments, who have an obligation as land and water managers to promote the conservation of wise use of wetlands, as required by the Ramsar Convention, and this includes the provision of adequate share of water, and the Convention on Biological Diversity is also an important environmental treaty signed by Australia giving the Water Act and Basin Plan constitutional validity, one of the key aims of the Basin Plan is to prevent the ongoing decline of wetland across the Murray-Darling and to improve their health and resilience.

The Basin Plan, as it now stands, after the dubious and non-transparent processes around the Northern Basin amendment and the SDL adjustment package will fail to meet the obligations under international treaties, and the 16 Ramsar-listed wetlands in the Murray-Darling Basin have not been recognised in the Commission's draft report.

The reduction of water recovered to meet environmental objectives will cause the Basin Plan to fail. That's the general position of Inland Rivers Network.

COMMISSIONER DOOLAN: If I could follow up on a few of those things, you referred to the SDL adjustment of 605 and, as you said, a number of those projects have a high degree of uncertainty about them as we speak. We have recommended a gateway-like process where, say, Menindee goes through a much greater detailed design package and, at that gateway time, is actually assessed as to whether the principal environmental outcomes have changed, if the cost has gone up, deadlines, a whole range of things, but, at that point, a decision be made whether to go ahead with it or not.

We have also gone - well some of those projects are really important and desirable, but if they need a longer time, you could use that then as well. So, we have imagined a series of checks and balances, go and no go, milestone assessment, and a call of failure, if you like, in that process in advance of 2024. Whilst noting that generally you feel that they put the outcomes at risk, nevertheless, that's the process that we've got. Does that process, should it be accepted and put in place, provide more confidence that those projects would go ahead only if they did deliver those environmental outcomes at the price?

MS SMILES: Definitely, and we have been saying each of the projects, particularly the onground ones like Menindee, need a full EIS to start with.

COMMISSIONER DOOLAN: Sure.

MS SMILES: And, you know, the preliminary business case has been demonstrated to be very deficient.

COMMISSIONER DOOLAN: By that you mean the environment assessment, the cultural assessment?

MS SMILES: Yes, exactly.

COMMISSIONER DOOLAN: Everything a major project requires.

MS SMILES: But, I mean, that whole side of things means that the decision around recovery for environmental water is going on for a limitless time and the 2024, which is what our concern is, the Basin Plan will not have met its objectives by that deadline because the complexity around the supply measures that have been put up and, as I said, you know, the strong doubt around the actual process, which was not transparent at all - I mean, over the period of time that the ecological elements modelling was being developed - but, I mean, we were meeting, environment groups were meeting regularly with various people involved in that process and coming away feeling more and more concerned about, you know, the route that it was taking.

Then, when the final process of having the draft SDL package out on exhibition, where there still wasn't available information, particularly around modelling, we were very critical of it and then, all of a sudden, it was in Parliament and passed, you know, so there wasn't even a response to our submissions before the amendment went up to Parliament. The whole process, from our perspective, has been very dodgy and was aimed at getting a number that was politically palatable. So everything, you know, was sort of back-tracked to achieve that, and it wasn't good science, isn't going to be good for environmental outcomes, is not forward for the objectives of the Basin Plan.

COMMISSIONER DOOLAN: Going forward, though, they are all in the process now of further development.

MS SMILES: Yes.

COMMISSIONER DOOLAN: So it is about designing the next stage of the process to provide greater transparency and confidence in the decision-making.

MS SMILES: If I could just say why I backtracked a bit is because some of the initial modelling and some of the stuff that needs to be reviewed as well, while you're looking at each individual project and, you know, putting together a more stringent process around that, is how they fit together as the final package.

COMMISSIONER DOOLAN: Yes.

MS SMILES: But also the rigour of the modelling and like the ecological elements method, all those types of things really need to be looked at.

COMMISSIONER DOOLAN: Okay. The equitable ecological equivalence method was peer reviewed and - - -

MS SMILES: But there were already compromises built into that.

COMMISSIONER DOOLAN: Sure.

MS SMILES: So, there were already compromises built into the environmental outcomes that were then adding up to get, you know, your big picture package. So, right through the whole process, the environmental outcomes are compromised.

COMMISSIONER DOOLAN: Okay.

MS SMILES: So some of your trade-offs with - - -

COMMISSIONER DOOLAN: Levels of change were developed at each of the KI sites which meant there was a minimum level.

MS SMILES: But they weren't all met. Even in what went out as the draft SDL adjustment package - - -

COMMISSIONER DOOLAN: Sure.

MS SMILES: - - -some of those were not met. The limits have changed, and particularly keeping the Murray Mouth open for nine years out of ten wasn't mentioned anywhere in the entire document. So, there's a number of key things to do with the Basin Plan that have just been swept to one side to get this particular outcome. So, yes, the compromises built into the actual process to get to that outcome, to further compromise the actual volume of real water returning to the rivers and wetlands is, you know, a clear concern.

COMMISSIONER DOOLAN: Okay. Coming back then to the water resource plans and, once again, looking forwards, what would be the key points you would want fixed in a plan, and obviously an extension is an extension, it can't go on forever.

MS SMILES: No.

COMMISSIONER DOOLAN: So we do need to be quite clear about what is the key points that the Plan needs to have in it and, I suppose, almost set a work program for New South Wales, so the level of consultation required. Could you just elaborate on that because we do think extensions are necessary, we have heard that, particularly in this area, but the element is to be quite specific about what needs to happen.

MS SMILES: You did ask Melissa what sort of timeframe.

COMMISSIONER DOOLAN: Yes.

MS SMILES: I think another 12 months would be a reasonable thing and, from our perspective, all the floodplain harvesting - well, not just estimates because they are handing out new compensable private property rights with floodplain harvesting licences - so that needs to be final and bedded down so that everyone actually knows what the actual licensed volume of take is for floodplain harvesting, and the problem around that is while they're working on the Northern Basin, they haven't even started looking at the

Southern Basin, so while it's not as extensive in the Southern Basin, it still does occur. So, it's this big question mark of the actual original estimate of take from the river system.

The other really important thing is the rules for protecting environmental water in unregulated systems. I don't agree with the New South Wales Government's position that we're not going to change anything about our water sharing plans until the end of their life under our Act just because the Basin Plan is asking us to put something in a water resource plan that we don't really understand what the life of the water resource plan is, and this referral to, "Oh, well, we'll just amend the water resource plan after it's been accredited", you know, how does that work, who's in control of that? It's just all these unknowns that again cause a lot of doubt about the final outcome for environmental benefits from the whole process.

COMMISSIONER MADDEN: I wanted to touch on another thing which is the governance of the MDBA, which we haven't talked about. So, notwithstanding who does it, but just one of the, I guess, key functions or roles that you - and I think it's why you yourself recommend some independent authority to be looking at parts of the regulation of the Plan.

MS SMILES: Yes.

COMMISSIONER MADDEN: Are you happy to elaborate your concerns?

MS SMILES: There's a general sense that a totally separate body to the MDBA, or anybody else that are doing the hands-on water management, like the day to day making decisions around turning levers on and off and all of that, that, you know, the regulations should be separate. New South Wales should be highly embarrassed by a news, a television program, how to set up the independent regulator, and that's - you know, they're really starting to put runs on the board, which is why, you know, while you're proposing two arms of the MDBA, so there's a regulator and the rest of what they do, we would prefer to see a totally separate regulator set up and, we have suggested, for a whole range of environmental regulation at a Federal level and a Federal MDBA be established and regulating the Basin Plan could be one of the roles that that body takes on.

COMMISSIONER DOOLAN: I think we agree with total separation.

MS SMILES: Yes.

COMMISSIONER DOOLAN: I have one more - and again it's more in your submission, but if you wouldn't mind - we have actually recommended - the environmental water holders obviously make decisions around environmental benefit, but, as a secondary consideration, taking into account social and cultural benefits, and I think in your submission you say there's not enough water to do that, but I suppose I just wanted to clarify, from our perspective, we're not saying those benefits - they are a secondary consideration.

MS SMILES: Yes.

COMMISSIONER DOOLAN: So work through the priorities as per the Act and, you know, the absolute statutory requirements on all those environmental water holders, but then, if there's flexibility, all things being equal, to take account of social and cultural outcomes after that, or to identify them at the very least, do you see - do we not clarify that well, our prioritisation, or do you see problems with that as an idea?

MS SMILES: Well, I mean, we all agree that there are multiple benefits from the use of environmental water, having water in your river systems, and that there are automatic and subcultural and lots of social benefits.

COMMISSIONER DOOLAN: Yes.

MS SMILES: But I wouldn't like to see the argument move away from having additional cultural water because the tick the boxes are the environmental flows are doing all of that anyway, so I've got some concerns around that and from the social perspective, but the example that we've had with a recent Northern Basin productivity flow, which, you know, we have really tested how that process works, and a lot of people were involved in it and there was really close scrutiny, but the real driver for that flow happening when it did is the poor water sharing rules in the Barwon-Darling Water Sharing Plan.

That's what caused this disastrous social situation where people couldn't even - you know, people bathing their children in their water supply ended up in hospital, and so while there was a bit of a tag put on this water released for fish and blah, blah, which would have happened, the timing of it and the decision-making around it didn't take into account that that water was sitting in those storages with possibly previous decisions around watering internally in those valleys, and, you know, it was a great - it was a great pilot program how that would all work, but, again, I would not be comfortable with those types of releases being used because there's not enough water getting into the Darling system.

COMMISSIONER DOOLAN: The value of critical habitat, something like that?

MS SMILES: That's right, that's exactly right. So, again, that's why I've said if you're going to go down that road for the use of environmental water, we need more water because there will be other possible decisions made that that water is no longer available in those catchments.

COMMISSIONER DOOLAN: Okay. Taking your point, from our perspective, we need to make that clearer in our report.

MS SMILES: Yes.

COMMISSIONER DOOLAN: All right, thank you. Thanks very much.

MS SMILES: Thank you.

COMMISSIONER DOOLAN: If I could call on Grant Tranter from Macquarie River Food and Fibre and, again, if you wouldn't mind introducing yourself for the record.

MR TRANTER: Sure. Morning, my name is Grant Tranter, Executive Officer at Macquarie River Food and Fibre. Excuse me while I get my technical issues file. Apologies.

COMMISSIONER DOOLAN: That's all right, if you need to take a glass of water.

MR TRANTER: Nothing beats paper and pen, I think, and now it's got a mind of its own.

COMMISSIONER DOOLAN: Are you all right?

MR TRANTER: We'll soon see.

COMMISSIONER DOOLAN: We have got copies of each.

MR TRANTER: Okay. Thank you for the opportunity to present today on behalf of the nearly 500 irrigated enterprises in the Macquarie Valley which we represent. I would like to start by congratulating the Commission's effort to date in encapsulating an incredibly complex journey which is the Murray-Darling Basin Plan. In particular, I would like to thank the Commission for appearing in Warren, which really demonstrated an appetite for genuine stakeholder engagement. We don't typically get government organisations out that far and I think it went a long way to garner some local support, so well done. I won't belabour the points of our original submission. I would rather focus on the Commission's draft report, and there, as we agree, there are areas we still feel require attention. I'd rather keep my address short and engage in some conversation.

First and foremost, MRFF welcomes the Commission's draft recommendation 3.1 with regard to the state of over-recovery and that a policy and timeframe should be formulated. To date, neither the New South Wales or Commonwealth Governments have accepted governance or responsibility for addressing over-recovery in the Macquarie-Castlereagh catchments. While MRFF welcome the recognition of the issue, we strongly urge the issue should be addressed as a priority within the Macquarie-Castlereagh Water Resource Plan, thus before July 2019.

Addressing over-recovery within the WRP process will ensure it is dealt with in a timely manner and subjected to the necessary accreditation processes. MRFF strongly recommends governments work closely with communities to ensure over-recovery is addressed in a socially suitable manner.

We agree with the draft recommendation 3.2 and welcome the focus on environmental outcomes rather than a simplistic recovery volume. With that said, we maintain that environmental progress is fundamentally hampered by the Water Act itself, at 22.10, which specifically excludes the Basin Plan from dealing with land use or planning management, other than water and control of pollution. We contend that a solely water

focus as a means of achieving environmental outcomes is both economically inefficient and environmentally ineffective.

We request the Commission to consider the impact of the Water Act between 2007 and 2015 and possibly amendments that permit more integrated approaches to environmental management. In our submission, we present evidence of the value of coordinated NRM.

Draft recommendation 3.3 is correct in asserting rural assistance funding to date has not been commensurate with reform impacts, with little ground made in assisting communities divesting from the irrigating industry, and specifically the grants-based structural adjustment program, we don't believe has been particularly effective in the towns of Narromine and Warren, who have been significantly impacted.

We agree that the Government should put in place transparent and accountable governance around the Northern Basin reviews, the Northern Basin Toolkit. It is in line with our long-held strategy that there's more than just water, this is about value adding to recovered water and that it's about an integrated approach to environmental outcomes, and specific environmental outcomes rather than things such as specific flow indicators.

MRFF agrees with the Commission's findings and recommendations regarding the water resource plans. Now, we have had an interesting experience with the water resource plan and the stakeholder advisory panel and it became clear quite early there was a lack of appetite or lack of opportunity for real change in terms of the water resource plan or the water sharing plan itself. MRFF formally stated that we were requesting a minimal change to the water sharing plan on a couple of issues. There's a lack of progress on local and state-wide policy issues such as floodplain harvesting, over-recovery and planning assumptions, and what they really did was cloud the water resource plan process. With those unresolved, it was very difficult to understand what moved in one area would result in another, so we essentially were hoping that those positions would be formulated before the water resource plan could be accredited, but that doesn't seem to be the case.

There was a level of scepticism of the modelling process and whether the modelling is fit for purpose for many of the stakeholder advisory panel issues. Recognising the considerable uncertainties of the model, we believe there is insufficient numerical evidence to warrant significant change.

We are also in the position that, you know, for a sustainable and profitable industry in the Valley, we require a stable policy environment and change for change sake is just not an effective use of resources.

We strongly agree with the Commission's report with regard to measuring policies and we have been an active participant in the water reform process being led by New South Wales Department of Industry and NRA. We are seeking cooperation from those organisations, which has been somewhat patchy to date. Those timelines are quite optimistic, to say the least, and for us to have any chance of meeting those deadlines, we require as much assistance as possible. I'm not talking about financial assistance, I'm talking about information provision in terms of, you know, what's the current state of our

meter fleet and how can the current records held by NRA assist us in engaging private industries such as meter manufacturers in getting the required equipment.

That's where I'll leave it and hopefully have some questions.

COMMISSIONER DOOLAN: The water resource plans, you don't believe there's sufficient evidence to change the rules at the moment? Is that what I took from your comments?

MR TRANTER: We had presented a number of issues which were - some of them were new and some of them were legacy from the previous water sharing plan.

COMMISSIONER DOOLAN: Yes.

MR TRANTER: We were provided with modelling outputs to indicate what the subsequent rule change would mean in terms of, you know, shares and things like that. Now ultimately those models present us with a number and that number is - I think it presents a level of accuracy which just isn't founded.

COMMISSIONER DOOLAN: All right.

MR TRANTER: That's essentially what we thought about the modelling, that there was a bunch of assumptions made and, whether we agreed with those or not, the accuracy of the model couldn't be substantiated to us. So, it's a bit of better the devil you know, I think, in terms of some of those rules.

COMMISSIONER DOOLAN: Okay. Just in terms of what we've heard today but also in submissions, the issues around the floodplain harvesting which you have said is an issue and the cap factors, the confusion around cap factors, from your perspective, there is a need to extend the timelines for the water resource plans in these areas to debate it through or simply to rollover the existing rules?

MR TRANTER: I think we have to be quite aggressive still because this could just bleed on for years.

COMMISSIONER DOOLAN: Sure.

MR TRANTER: I think there needs to be a very clear cut process about how we actually lock in some of these things. Some of these things, such as planning assumptions, didn't directly affect the water resource plan, but what it did was it diverted resources from areas within the department, so there was a resource scarcity, so that was more of the issue rather than a direct impact on the plan itself. Whether we had another six months, I think a lot of those issues we had wouldn't be resolved in the six-month process. I do feel that some of those larger issues, such as the floodplain harvesting number, I would like to see that number in the water resource plan and, to my knowledge, we will be submitting the water resource plan to the MDBA without the floodplain harvesting number in it.

COMMISSIONER DOOLAN: Yes, so basically that's not adequate, you want to see that number in the plan and that would give you - - -

MR TRANTER: I think that would give all stakeholders a bit more certainty. I think, you know, making amendments here and there, it just clouds the issue, so I'd like to see it as a package.

COMMISSIONER DOOLAN: All right.

COMMISSIONER MADDEN: Just a quick question. Given that there has been some investment in efficiency works and the like in this area, we have heard a lot in the south because they are obviously in the planning phase as regards further on-farm efficiency and system efficiencies. Notwithstanding - and I'll get you to have some comment about the structural adjustment and the like and if there are any lessons to be learned about what will work, but also in that kind of PIOP or PEOP, depending on which part of the State you are in, has that been working well? What's the general feedback from people who are involved in those projects and have they been successful, has production been maintained by the lessons learned in that, and then moving on to the structural adjustment, is there anything that actually has worked as well?

MR TRANTER: I think PIOP definitely has winners and losers. I think the schemes in PIOP, a vast majority of the water that was returned during the PIOP process was something they called scheme rationalisation, which was essentially just severing unprofitable or inefficient limbs from the scheme, so essentially that was just telling people from (indistinct) areas, "You're not irrigating any more" and that's buyback by another name, I think. There are some savings in terms of lining. We had the (indistinct) system with their extensive rubber lining was, I think, a good news story and I think the scheme itself works quite well in that regard, but taking water out of production certainly, I think, takes water away from communities and takes money away from communities. Whether or not there's more opportunities - and they will be here next week to discuss it - I'd be surprised if there was a lot more. The Macquarie is quite unusual in that a significant portion is managed by operative schemes and most of those have already been part of the PIOP process, so how much fruit is left to be picked from the Macquarie is yet to be seen, I think.

In regards to your structural adjustment question?

COMMISSIONER MADDEN: There's a comment about impacts and we're aware of the work that the Authority and others have done in that area. I guess just on the ground, talking about green space funding not having much of an impact, but in terms of structural adjustment going forward there could be lessons elsewhere as well. What does work in your opinion?

MR TRANTER: I think locally what's hurting at the moment is the (indistinct) cycles and it's hard for towns and businesses to adjust to a high allocation, no allocation, high allocation, no allocation, so there are groups in the Valley looking at developing

industries in the Macquarie, so things like permanent plannings or back into (indistinct), which was quite common here in the 80s and 90s, and valuating to those industries and keeping that money locally, so that's things like co-ops and seed funding for those type of things that just tend to take the bumps and swales out of the local economies, which really hampers local business, I think. It's hard to put on people when next year you might need to get rid of them. Whether or not there is opportunities to develop those industries locally and keep those industries locally-owned, I think would be a great opportunity.

COMMISSIONER MADDEN: Just a quick follow-up on the meeting you talk about next week, is that for the efficiency measures and further work in that area?

MR TRANTER: Yes. This is for the upwater.

COMMISSIONER DOOLAN: Yes. Can we ask who you're meeting with? Is it the Commonwealth management of that program?

MR TRANTER: Yes.

COMMISSIONER DOOLAN: Yes, okay.

MR TRANTER: That's an open forum next week, they're doing their caravan around the State.

COMMISSIONER DOOLAN: Okay. I actually haven't got any other questions, John, do you?

COMMISSIONER MADDEN: No, no.

COMMISSIONER DOOLAN: Do you have any other comments?

MR TRANTER: No, thank you.

COMMISSIONER DOOLAN: Thank you very much. We have finished a little early. We will break for morning tea and reconvene at 11 with the Macquarie Marshes Environmental Landholders Association.

ADJOURNED

[10.26 am]

RESUMED

[11.01 am]

COMMISSIONER DOOLAN: Okay, if people are ready, we would like to resume the public hearing and Garry Hall from Macquarie Marshes Environmental Landholders Association.

MR HALL: Thank you.

COMMISSIONER DOOLAN: Just introduce yourselves for the record, if you don't mind.

MR HALL: Are we right?

COMMISSIONER DOOLAN: Yes, go.

MR HALL: Good. I'm Garry Hall representing the Macquarie Marshes Environmental Landholders Association, referred to as MMELA. I'm a marsh landholder, have lived in the Macquarie Marshes and part of my property is Ramsar-listed. I'm the Chairman of the Macquarie Marshes Environmental Landholders Association. I'm a landholder rep on our local water advisory group set up under the water sharing plans and I'm also the local EWAG rep, Environmental Water Advisory Group, on our stakeholder advisory panel doing the water resource plan. I am unprepared for this procedure, but I do appreciate us being given the opportunity.

I have read as much as I can of the Productivity Commission's report and there are points in there that I do congratulate on and there are some points that I would like to take you to task on.

COMMISSIONER DOOLAN: Sure.

MR HALL: The first for me, and it is - - -

MR BUCKNELL: Do you want me to introduce myself before you go on?

MR HALL: Yes.

MR BUCKNELL: Dugald Bucknell, I'm also a member of the Macquarie Marshes Environmental Landholders Association. I live on the eastern marsh. Garry is on the western marsh, which is the marsh which is the major side, I'm on the eastern side, which is the Gum Cowl Terrigal System, which is a minor side, but, without each other, neither would exist, so they are complementary. I'm a marsh grazier and at the moment I'm representing MMELA, so I'll hand back to you, Garry.

MR HALL: Righto. The main thing that I'd like to bring up is after making my way through the report, on several occasions, including, as an example, was the reference to the Northern Basin Review and the Macquarie and the Gwydir over-recovery. For me, that's been actively involved in environmental water management and also live in the marshes, I've had major concerns for a long period of time about the term over-recovery of water, which is a number that's come about when the Northern Basin Review process was being worked out that the Macquarie - more water had been recovered than was necessary.

At the very beginning, when I first started to ask questions about how they decided that the Macquarie was over-recovered, I kept getting referred to this SFI, site flow indicators, which is an attempt to measure the volume of water entering the marshes, often at the lower reaches of each valley, each water course, and that was cross-referenced to a flow frequency, and in the Macquarie, with the model, the modelling has shown us that we've

hit four out of four of the site flow indicators, one of the few in the Northern Basin to achieve those four indicators, four out of four site flow indicators.

So, I dug a bit deeper and started to ask questions about what are the volumes that they're trying to achieve and, in the very beginning, I was surprised. This was with the Northern Basin Review team working with the Office of Environmental Heritage NSW, who are the environmental water managers, to say, "Work out what's required." So the first - it's divided into four - we've got 100 gig, 250, 400 and 700 gegalitres. In the first site flow indicator of 100 gig, wetland and the channel flood plain, volume over five successive months. Now that's a mistake, it should be three successive months.

Just imagine channel capacity. If you are putting a volume of water down, the longer the duration for a volume of water, it's going to be reduced (indistinct), so it's actually going to be in-channel flow if you extend that three months to five months. You don't need to take my word for it, it was the Office of Environmental Heritage that had provided me with the information that that was wrong, and during the period of the three years, I've been challenging the MDBA on that because it is actually critical that in their objectives they had added two months to the duration of flow and then the results were we weren't achieving the desired outcomes in the marshes.

If we step up to the 250,000 megalitres, 250 gig, flow floodplain level, the next biggest flood, and we have also failed on that one. The duration is correct because that much larger volume of water over the five months, it's providing over-bank flows during that period because it's a larger volume of water, but the actual - I checked back through the actual observed data at the gauge where this information is collected on the site flow indicator - and in the actual delivery, we have failed each time.

So, as a farmer with not a lot of experience in modelling - I'm in the room where a lot of people seem to think they know a lot about modelling - but, to me, if we're failing in observed data actually what's going on on the river heights when the flow is delivered, but the model tells us that it's going to reach the site flow indicator four out of four times, a light comes on. I'm concerned about that. I've challenged the MDBA about it every opportunity and I haven't been given a satisfactory response. Phillip Glyde told me that they had reviewed a site flow indicator in our local area and you must understand my frustration when I was to learn that site flow indicator that was reviewed was several hundred river kilometres downstream of this site.

So, to bring it back to your report that you have been provided evidence from the MDBA that the site flow indicators in the Northern Basin end up us accepting of the terminology over-recovery, I would ask - I know you don't have a lot of time - but I would ask that you investigate the over-recovery in Macquarie and the Gwydir based on the site flow indicators.

There's just a couple of other things I want to touch on. In the Macquarie, we have unreg licences both above the dams and below the regulated region of Macquarie. Those licences, the licence conditions have been changed by the New South Wales Government recently and it has resulted in an incident of an unreg irrigator being able to harvest an

environmental flow. As a result of the Matthews Inquiry, we have an improved system to monitor irrigation take, but it hasn't had an impact on the ground yet.

COMMISSIONER MADDEN: Do you have the name of the plan, the water sharing plan that's been changed?

MR HALL: No, these are licence conditions in the unreg, so it's licence conditions of the unreg - the licence holders in the unreg water sharing plan in the Macquarie-Castlereagh (indistinct), which was 2012.

COMMISSIONER MADDEN: And this particular instance is above the environment, not below the environment, so they actually took the water before it got to the environment?

MR HALL: Then the only other thing was - - -

COMMISSIONER MADDEN: Sorry, we think it's legal.

COMMISSIONER DOOLAN: Those changes were made in the 2012 plan?

MR HALL: No, the plan's been legislated by the New South Wales Government recently to try and (indistinct) protection of environmental flows. It's a real sad case of a restructure in government agencies that has resulted in a severe lack of knowledge on ground works and how they operate. What I was also going to say is that up until now, preventing these things from happening of a change in the licence conditions was operation managers living locally that understood about operation procedures, if environmental water is being delivered, the unreg irrigators are restricted from take. Those positions are no longer there. We've lost localism as far as our water managers go and we are now seeing the result of that change.

COMMISSIONER MADDEN: Just to get the timing on the changes, is it during the last year or so and, I guess, again for us to be able to look at that as a process, have the Authority been aware of that, including when they're making a water resource plan? I assume you are on the water resource plan group?

MR HALL: Yes.

COMMISSIONER MADDEN: Has that been raised in that meeting?

MR HALL: Yes.

COMMISSIONER MADDEN: In that context?

MR HALL: That's right. Everybody in the environmental water management space understands that the changes made by licence conditions to, you know, an attempt to protect the portion of environmental water has removed some of the other protection.

When? I'm guessing. Within the last 12 months. Those are unreg. I can provide you with an exact copy of the change, a printout of each licence conditions if you like.

COMMISSIONER MADDEN: That would be helpful.

COMMISSIONER DOOLAN: Yes, that would be good.

COMMISSIONER MADDEN: I guess the second part of that question is was it discussed in the water resource plan stakeholder advisory group - panel?

MR HALL: It was discussed at length, but, like many other things, it was outside the terms of reference.

COMMISSIONER MADDEN: How can the licence change of protection of environmental water be outside the terms of reference?

MR HALL: We're not discussing licence conditions within the water resource plan process.

COMMISSIONER DOOLAN: Okay.

COMMISSIONER MADDEN: Sorry, that was a comment from the New South Wales Government, the Department of Industry, not the Murray-Darling Basin Authority?

MR HALL: That's right, yes.

COMMISSIONER DOOLAN: At any of those meetings has the MBDA indicated how they would accredit such a change? Has there been any discussion of that because protection of environmental water is a prerequisite in the Basin Plan, so has any of that come out? I take the point that it was an attempt to protect in some areas but with some adverse outcomes.

MR HALL: I'm sure you understand that the environmental water holdings in the Macquarie that I'm familiar with is quite a complex space. We have an EWA, environmental water allocation, of which it's within the water sharing plan, and we have both Commonwealth and State licensed water. This isn't about the last two, this is about the EWA.

COMMISSIONER DOOLAN: Yes.

MR HALL: And its licence conditions on the EWA. The other two licence holders have all their own set of problems about access for unreg irrigators, but they're not what we're talking about. We're talking about the active and translucent portion of our EWA.

During our water resource plan development process, MDBA have been at the table - not always the same people - and your question was have they expressed concern?

COMMISSIONER DOOLAN: Yes.

MR HALL: The way the process works, we don't have an opportunity to make statements about whether we're concerned or not about that, we're just sitting in the room to deal with the facts that are put in front of us.

COMMISSIONER MADDEN: They didn't raise the fact that that might be something they look through through a water resource plan accreditation process?

MR HALL: I still don't think it sits within our water resource plan that's - - -

COMMISSIONER MADDEN: The Authority, sorry.

MR HALL: No, I wasn't aware that they understand the risk, and it's not until a lot of these changes are actually - environmental water being delivered down the system - that we realise the implications of these changes, so, no, personally I don't have any faith that the MDBA accreditation process will have the backbone to challenge any of those changes, but that is my personal view. As you have indicated in your document several times, communities losing confidence in the MDBA, I can resonate with that loss of confidence.

COMMISSIONER DOOLAN: But your concern is also that, even if they do, because the licence conditions aren't necessarily referred to in the water resource plan, they might not even have the wherewithal to understand the actual shift that's happening on the ground?

MR HALL: That's right. New South Wales can tidy it up.

COMMISSIONER MADDEN: Not that I'm trying to labour the point, but looking forward now from this point, I mean the plans have to go on public exhibition to get submissions that will then be public through the Authority. Again, has anything been mentioned or has there been any intimation that if that issue is raised through that process, it would be addressed then through the Authority? I'm just trying to think of the channels that you actually - - -

MR HALL: Yes, well, firstly, the community consultation period for comments on the water resource plan process is going to be six weeks, it's going to be rushed. Our community is also struggling with the implementation of the floodplain harvesting policy and the floodplain management plan, all during the same period, all prior to Christmas. Our area, other than a pretty favourable environmental release that's happening right now, is still in severe drought, so I'm not looking forward to asking the members of our association to be able to give worthwhile feedback to the Water Resource Plan on its own, let alone all the other plans we have to - - -

COMMISSIONER MADDEN: I take that the expectation should be raise the issue with some level of materiality and then those best placed to assessment et cetera, actually do their job.

MR BUCKNELL: Could I interrupt there just for a second?

COMMISSIONER MADDEN: Yes.

MR BUCKNELL: The two sides of the marshes, Garry's side has had quite a reasonable environmental flow. It seems to be, on all accounts, you know, reasonably good. The eastern side has been absolutely atrocious. There's not enough water. There's been gauging problems and there's been water take. The other things you were talking about, the Water Resources Plan and the Water Sharing Plan being put into them. At the cap meeting for the Flood Plan Harvesting meeting that occurred earlier this month, it was mentioned there and I don't think this is right but you can check it, that the New South Wales Water Sharing Plans are going to be incorporated in the Water Resource Plans. But their belief was that they're not going to be - they're going to be insulated in those Water Resource Plans, and I looked at this guy and I said, "What do you mean?" He said, "Well, they're our plans in their Water Resource Plans. We are the ones who run them or operate them, they're what we put in there. They're not going to be changed", and I don't think that's right.

And you will have a better understanding than me, but I sort of walked away because I - not enough grounds to be able to pass judgment, but it shocked me.

COMMISSIONER MADDEN: So my understanding, and it depends on which State you are, but I would say that the legal instruments are still the Water Sharing Plan, however the Water Resource Plan for the region would have a number of Water Sharing Plans that sit under it and various rules and policy instruments and the like and the Water Resource Plan goes over the top. But the fact that they don't get changed - this is all accreditation process, so if you fail accreditation you request the State - - -

COMMISSIONER DOOLAN: It means the Water Sharing Plan is insufficient.

COMMISSIONER MADDEN: - - - to then actually go and make the appropriate changes. So there's still a process you have to go through which actually says yes, that package of instruments including the key one which is the Water Sharing Plan, meets the requirements of the Water Resource Plan. So in that way they are nested in a sense, there's not suddenly two plans here.

MR BUCKNELL: I hope you are right. I can only pass on, because you bought the conversation up, this is the structure.

COMMISSIONER MADDEN: No, that's the structure. The question of how you actually assess various elements including licence conditions or rules and then actually give them accreditation, is the key issue here. Where there's contestability what's the process to contest something? From draft Water Resource Plan which references Water Sharing Plans as part of that, through to the authority actually saying yes, we believe that actually meets the requirements set down under the Water Resource Plan process.

MR BUCKNELL: The problem with that is that the knowledge - the complication - how complicated the Water Sharing Plans are and the effects on the ground and all the machinations of it, can only just be understood and is constantly under change by Water New South Wales. So how's the MDBA actually has the ability to recognise a problem without actually going to Water New South Wales to clarify it, Water New South Wales ought have the ability to clarify any problem in any manner of ways.

COMMISSIONER MADDEN: Which I think is why we're saying it's important to raise these issues through a process and secondly, we've got reservations in some cases were they were major changes but you're telling us that even minor changes can have major impacts. Now, I think we've heard earlier that rushing these things through has potential for significant local impacts to the detriment of the environment, potentially other uses, so we need to allow in our recommendation, talk about materiality where you actually put a plan, a Water Resource Plan back in terms of accreditation. I think we're hearing now there's a lot of smaller issues which need airing and proper analysis and resolution which sounds impossible for June 2019.

COMMISSIONER DOOLAN: So just to take - it's a combination which we understand is to meet its requirements, New South Wales are making a range of different changes, Statewide changes to floodplain harvesting rules which changes the protection of (indistinct) water rules within Water Sharing Plans and it's the combination of those in a local area that people need to understand. Is really what we're saying, isn't it?

MR HALL: On ground stuff.

COMMISSIONER DOOLAN: On ground stuff.

MR HALL: We're being - there's less and less knowledge so the offending agency is DOI Water who are going through the planning process at the start four years ago when we were first going through the review of our (indistinct) and Regulated Water Sharing Plan of which had been operating for almost ten years and had not been reviewed. There's few people left in the room who were there at the start other than stakeholders. Some of them have changed but it's the water planners whose agency had undergone massive restructure that is likely to have impact on the end result and achieving improved environmental outcomes and water protection.

MR BUCKNELL: One of the things you missed then with changes, is the change to the cap. Not cap factors, but the cap. They are changing the cap as we found out last week at the floodplain harvesting meeting by - because they admitted they have no idea of what floodplain harvesting water was taken. Earlier in the year they did admit that they had grossly under-estimated it at another meeting here. Now, they're going through a process of what they call an IBQ, Irrigator Behaviour Questionnaire. Now, this Irrigator Behaviour Questionnaire is going to be kept totally absolutely confidential and they are going to have no ramifications if they have done something wrong, different, suspect or anything in the past. That does not count. This is kept completely confidential.

Out of that Irrigator Behaviour Questionnaire, they're going to attempt to build a model to try and describe the floodplain harvesting in the Macquarie. The questionnaire is based on year 99-2000. Now, 99-2000, in 2000 there was a flood in the Macquarie, a big flood. It was actually just before the Floodplain Management Plan is going to be developed for Narromine to Oxley Station which I was a part of. So it was quite fortunate.

So at that time lots of levee banks in the Macquarie had to be blown because the water was dangerously high. Now, at every farmed paddock, dry land or irrigated, that year received flood water on it. So it is quite possible in this Irrigator Behaviour Questionnaire and probably correct for those irrigators to say "These paddocks received flood water this year thus my floodplain harvested".

Any enclosed areas that captured water that year because the flood was so big or banks had been blown and enough water entered, could actually be counted as storages. So the Irrigator Behaviour Questionnaire can be extremely misleading. Once they've done the model for it, then they are going to come out with a new redefined cap. We'd all been operating under the theory that the cap had two definitions. One amounting to 391,900 megs and the other one 433,000 megs and the cap in the Macquarie was to be the lower of either which thus was 391,900. That figure, we were told at this floodplain harvesting meeting no longer exists. The definition is not changing but it is being redefined. I don't quite know how you can say that but that's what they said.

So once you have a changed cap, you really have a changed, completely changed system in the Macquarie. And when you have the efficiency programs that are being pushed by the government and funded by the government and water being returned through those efficiency programs to the environment, we now have many more storages on the Macquarie to capture that floodplain harvesting.

We also have just learnt about this meetings going around, designed to again try and have efficiency programs so that when the floodplain harvesting licences are actually given, how there can be efficiency programs created in there to give water back to their environment, but more storages will be delivered. The re-licensing of works, now NRAMA, and I've got it here, has a form out for their customers to change the licences of already licensed works. Application for modification of works. So the potential changes in the Macquarie Valley are almost unlimited. Now, NRAMA I thought was the regulatory body but for them to be putting out an application form for modification of works seems rather curious, and it is for their customers and for floodplain harvesting.

COMMISSIONER MADDEN: So we'll look at the integrity of this system because it's around the whole - I mean, these are bringing what was unlicensed into the licensed system. There then has to be processes around, well, if you want to be (indistinct words) actually got to put that on the record et cetera otherwise you can't have a compliant system. So I think we've just got to be careful of processes going through and the integrity again, and the process around that of how it is assessed in the Water Resource Plan as policy.

COMMISSIONER DOOLAN: And the totality of shifts and changes that happen together.

COMMISSIONER MADDEN: Yes. And it is something that as it is for a long time in terms of the practise, so it has had an impact on the water resources and under the Water Sharing Plans has always been there as an estimate in terms of how much water goes. It's not something new. The question is how to bring it under a proper monitoring and compliance regime.

COMMISSIONER DOOLAN: With accurate estimates.

COMMISSIONER MADDEN: So again, I think it gives that on a macro scale as opposed to the micro scale on licence conditions, the level of uncertainty in how that actually is bought under a compliance regime where you're talking about volumes, is really something that (indistinct), even though we've had many years of this policy being developed, when it's coming down to the end, there seems to be a lot of loose ends being tied very quickly.

MR BUCKNELL: So I get the risk. I think we've got to be aware though that it is trying to move to a better (indistinct), and I think that's worthy to just making sure that it doesn't cause anything that has unnecessary impact on just the environment holder, (indistinct) security holders and other licence holders as well (indistinct).

MR BUCKNELL: And so could I ask, in the environmental sustainable level of take, if under the present situation that is valid, the under this new cap, if more water is taken then that environment sustainable level of take is not found to be environmentally sustainable, how do you propose quickly before the environment suffers damage for it to be fixed?

COMMISSIONER MADDEN: So you'd have to ask the authority and it's a question we will ask, what's the relationship between the baseline of diversion limit, so the baselines and what this actually means in (indistinct). So whether both are shifting because we're actually talking about those SDLs is shifting at the margins to meet the flows. So if you under-estimated, you know, by 50 gigs that take, it actually has been taken in the past, well, if you move this, that moves the other as well. So we will get to the bottom of it about whether there's actually any change in approach (indistinct) in the last (indistinct) and I think the important thing is here, is unification around that and the policy itself as well.

Which comes back to the point of rushed, lack of analysis, and consultation that is not actually wide-spread is again, for us, another example of appalling run process. That being said, that then doesn't come to the conclusion that it's fundamentally lacking integrity somehow, that's another question to ask. However, time is required, I think, and due process to ensure that integrity can be achieved.

MR BUCKNELL: Because what we and our members see is that the environment is spiralling downwards. Every now and then mother nature supplies with a sight flow

indicator of a three or a four which the environmental water can't do, and mother nature steps up. And then we start spiralling from that point downwards. So we are still on a downward trajectory. We haven't hit the bottom yet. And so that is our major, major concern. One would think that an ESLT would mean that we've hit the bottom, when in actual fact we haven't on the ground.

COMMISSIONER MADDEN: We might come back to that. Anything else Garry, as we go through? Then we will come back to (indistinct).

MR HALL: At a few stages during your report, you talk about coordinated, connected environmental watering activity. Environmental water management in Macquarie has been going on for - over the last 20 years and the Macquarie now has a volume of water contribution to the Barwon-Darling. It is an extremely complicated space. I don't think the MDBA has handled it very well at all. In theory, the idea of having (indistinct) in the Northern Basin and hooking systems like the Macquarie in with it to achieve and improve flows in the Barwon-Darling it works in theory, but in practice it is very difficult and often jeopardising local environmental assets and in your report, it appeared to me, my interpretation of it was, that you are after more structure about the decision-making process. I'd say successive environmental water deliveries requires less structure and more adaptive management. Because the Macquarie has been involved in environmental water management for a considerable period, I would urge caution on your reporting on this subject.

COMMISSIONER DOOLAN: We certainly take your points, new discipline and there's a need for adaptive management, but we also do believe that there needs to be a bit more clarity about what they're aiming for in connectivity because it's not clear if the pilot worked, I suppose, but in terms of then what's the balance between local assets and a connected flow isn't clear and needs to be clear to the downstream users, and that includes the downstream environment.

MR HALL: Yes.

COMMISSIONER MADDEN: So the aim of our recommendation is not just to make that happen and - - -

COMMISSIONER DOOLAN: No, it's to make it clear - - -

COMMISSIONER MADDEN: So we've got to make that clear, its actually to enable discussion from various stakeholders about what the goal is and that there are local considerations, not just an end to itself. So I think hopefully we can make it a more structured process that actually is adaptive, if you know what I mean. So we take your point.

COMMISSIONER DOOLAN: Yes.

MR HALL: I do note the Northern Connected Basin and Environmental Watering Committee and that would be the type of committee that would be answering the challenge of what we're trying to do.

COMMISSIONER MADDEN: Yes. Including to have those discussions about trade-offs.

MR HALL: Righto. One last thing on the - - -

COMMISSIONER DOOLAN: Yes, we will have to move on.

MR HALL: Yes. Reporting, monitoring and evaluation which is an extremely contentious issue with the environment water, and our association and members happen to live in a place where a lot of that data collection takes place, and from the very beginning of the Basin Plan, our association has been consistent that we need the same - similar agencies, similar staff collecting that data. As agencies changed and now we've got the Commonwealth Environment Water Holder, we've got the MDBA, we're watching as every agency wants to come and collect the data themselves. I would like to see in your report, that consistent data collection. I don't know how you write it, but it's frustrating to us that every time people are after a new story, they send out funding application, a different university will win the contract and there's new people on the ground. They are very often entering our private land. It's frustrating to us telling them the whole story over and over again, let alone, the strength, the rigidity of the data set that has these rakes in it from different government agencies, playing with it and using it in different ways.

COMMISSIONER DOOLAN: All right. Thank you very much. Our next speaker is Mary Ewing from the Lachlan Valley Water. Mary, if you would introduce yourself for the record.

MS EWING: Thank you. Mary Ewing, I'm the executive officer with Lachlan Valley Water which is the valley based industry group representing ground water and surface water irrigators in the Lachlan catchment. So our members extend from up around the Crookwell area to down below Booligal, and I am also a representative on the Lachlan surface water stakeholder advisory panel, the groundwater (indistinct) and the environmental water advisory group. So thank you for the opportunity to speak today.

We've, I guess, got five main points. We agree with the recommendation you've made about dealing with over recovery, that there needs to be a clear policy and process for that. We think it is a high priority because the over recovery generally has been in existence since 2010, and it was largely achieved through open tender buy back. So exacerbating, I guess, the social and economic impacts of it. We think there are a range of water trading options that are available to address it, and we agree with your proposal that there should be engagement with the valleys that are involved. The wider Lachlan and Macquarie have actually put together a couple of proposals over the years and have presented it to the Commonwealth Environmental Water Office and we would be keen to continue in that kind of work.

Secondly, we agree with the strategy or the program you've outlined in terms of - that there should be a strategy for recovering of 450 gigalitres of up water. We agree that it should be the criteria, it should be both science based and objective and be very clear in addressing those Schedule 5 outcomes and you know, be weighted towards achieving those outcomes.

We do have some concerns now that the Department of Agriculture Water Resources is out consulting with communities on recovery through on farm programs at what we feel is a relatively early stage and we certainly don't believe that voluntary participation in that program via an irrigator is a sufficient test of neutral or positive socio-economic impact. We suggest that it actually needs to have a regional approach. We also agree with your recommendations about the Northern Basin toolkit measures, the requirement for governance arrangements. We acknowledge that there are risks with non-implementation and while the toolkit measures don't specifically affect the Lachlan, we think there's certainly benefit in expanding those measures across the Basin where appropriate. Environmental outcomes are not just flow based and in fact, we think there's a link back to dealing with over recovery and using proceeds from traded water to implement toolkit measures.

With regard to the Water Resource Plans, we agree with you that there is a risk with the time frame there. In New South Wales the fact that there's only two plans out on public exhibition now, the Lachlan Ground Water Plan came out about a month ago and wider surface water came out last week, so two specific issues there. I guess one is the one you raised about some issues that have not been addressed, and clearly it has been difficult with the restructuring of the department.

I think there is some benefit in allowing additional time to address some of those issues, if they can be addressed in a reasonable period of time. However, one of the other issues, I think, is that when the plans come out, it will actually be a difficult to consult with communities. The six week period for consultation will presumably be over December, January when people have other priorities. It's, I think, going to be difficult for people to have the time to attend some of those meetings and for organisations like us to get representative feedback and be able to provide submissions.

Finally, on the long term watering plan, we concur, I think, with one of your comments that some of them are fairly aspirational. We think there are some risks in trying to, through long term watering plans, replicate environmental conditions that are not representative of long term variability in the environment, and that, for example, in the Lachlan, I think, there may be a risk that continual lower volumes of watering may effectively end up irrigating, river (indistinct) saplings in water courses or open water bodies and actually change some of those environmental conditions. We suggest that part of the problem is the lack of locally based staff and local engagement there.

Finally, we agree with your comments about compliance and we endorse it. The regulations must be workable and must be cost effective to be adequately implemented. Thank you.

COMMISSIONER DOOLAN: So I suppose I'd just like to pick up a bit of a theme that we've got in this region which is the Water Resource Plans and the need for extension of time. From your perspective then, what would be a sufficient time, but also the key elements that need to happen within that. So really nailing what's lacking in the Water Resource Plans now. People are concerned about that. That needs to be in a final plan that people will be confident about. Might not agree, but be confident about.

MS EWING: Yes.

COMMISSIONER MADDEN: So just on that. I was going to ask a similar question but (indistinct) through the Lachlan Ground Water package that came out. There is probably more detail in there than I thought and expected when I went and had a look through. The feedback, the (indistinct) have seen there the detail and so on, (indistinct) adequate.

MS EWING: They actually held the first consultation meeting on Tuesday night and probably the two main things that came back from people were, they were concerned about managing local impacts and you know, how you have confidence that the assessment criteria that are used will prevent - - -

COMMISSIONER MADDEN: Within zones you mean?

MS EWING: Yes, sorry, within zones John, yes. And the other one was about the mechanisms that you use to manage - if usage exceeds the long term annual average attraction limit, what methods you use to manage that because two methods are talked about; one is simply an allocation across the board, and one is reducing access to carried over water which clearly has different impacts on different types of users.

So at this stage that's the feedback we've had from ground water. There's two more consultations to take place so I'll have a better handle on it after that. In terms - - -

COMMISSIONER MADDEN: There was enough doing for people to actually engage on the major issues?

MS EWING: I think so. I mean, part of the issue is, I guess, that there's - - -

COMMISSIONER MADDEN: I know it is early days.

MS EWING: No, no, but the plan - the Water Resource Plan is 80 pages. The Water Sharing Plan is 60 pages. There's 300 pages of supporting documents. It's quite a lot to get across and you're probably going to count the number of people on one hand who are going to read all those documents. So people - it is probably hard for people to get up to speed quickly with everything that's - all the potential impacts, I guess, John.

COMMISSIONER MADDEN: Yes.

MS EWING: In terms of surface water, in the Lachlan for example, we've had an issue with persistent under usage. Long term average usage is about eight per cent below the plan limit. We did put forward proposals for how that could be addressed. Obviously those proposals will be contentious. Anyway, they haven't been adopted yet. In fact, the Department has said there's too much risk. They need more time to address it. I think possibly a three month extension is not going to be enough time to address that. But in terms of surface water, I think maybe - it is a hard trade off because with all the restructuring that has happened in the Department, time lines have just moved out and out and out and you don't want to just extend timeframes and just have the time lines move out further without the work actually staying on a schedule.

So possibly six months something like that. I think there's probably not going to be time to address all the issues, but it may allow some more of the issues to be addressed.

COMMISSIONER MADDEN: In terms of that under use issue that was mentioned up in the Water Rivers I think in our consultation as well.

MS EWING: Yes.

COMMISSIONER MADDEN: Is there kind of general policy? I mean, are they talking about the risk (indistinct) about central changes, but is there kind of a buffer that if it goes above five per cent they actually have a look at what the rules will mean for the usage? Do you know of any?

MS EWING: I'm not aware of the general policy. The Department's response was basically it's due to irrigator behaviour. You are not using enough - "It's down to you guys. You're not using the water. Therefore if you change your behaviour, the usage will go up". I think in the Lachlan there's - I mean, clearly the Lachlan was very affected by the Millennium Drought. We had seven years of zero general security allocation so I think that damaged everyone's confidence, and they're quite right that behaviour is one of the key factors, but I think it's also probably the interaction with some of the rules. The fact that under the Water Sharing Plan, the 2004 plan, extractive use was limited to 25 per cent of the long term average annual flow, 75 per cent was already reserved for the environment.

The purchases then took the proportion for the environment up to 80 per cent. So there's not very much, sort of, room to move there for productive users, I guess.

COMMISSIONER MADDEN: I guess - I am just going to come back to the public hearings and talk about the 450 and voluntary participation. I am sorry, I can't remember my schedule, but are they coming to Forbes or were they - - -

MS EWING: Yes, they are coming to Forbes on 1 November.

COMMISSIONER MADDEN: I am not sure of the technicality of it but obviously there's not a lot of connectivity.

MS EWING: Correct. Yes, John.

COMMISSIONER MADDEN: Is it one in a hundred years? What's the connectivity between - - -

MS EWING: In a large drought - in a large flood, sorry, so maybe once every 30 years, something like that, but the MDBA recognises the Lachlan as a disconnected catchment. There's certainly no certainty that water recovered is going to - well, end up - clearly it's not going to end up in the Murray, let alone at the Coorong.

COMMISSIONER MADDEN: So you think the meeting will start with a discussion of the 450 and Schedule 5 outcomes?

MS EWING: I honestly don't - - -

COMMISSIONER MADDEN: Has the Department mentioned anything? Have you had direct discussion at any stage either with New South Wales or with the Department about the 450 and the Lachlan being even in the scope?

MS EWING: We're right at the start the Lachlan, three years ago, I think, in 2015, they approached the Lachlan as a pilot. We looked at it and we decided not to participate for two reasons. One was the administrative complexity and the other was, it was becoming increasingly obvious that we had an under use problem and we thought that recovering additional water for the environment would only exacerbate that under use problem.

COMMISSIONER MADDEN: So no strategic discussions since in terms of the 450 cup water, resourcing that.

MS EWING: No.

COMMISSIONER MADDEN: So they are consulting on the criteria and the like but - - -

MS EWING: That's what I understand.

COMMISSIONER MADDEN: - - - but they haven't discussed that kind of regional approach or basis of the program itself?

MS EWING: Not yet and to be honest, I haven't read the discussion paper that is out yet either.

COMMISSIONER DOOLAN: And your irrigators basically would want to - would potentially want to be part of that or not?

MS EWING: I'm sure some individual irrigators would want to be part of it because if they're going to pay 1.75 times the market value of water, it's a way to fund the project so yes. Our concern is really about the regional - - -

COMMISSIONER DOOLAN: The regional which is the concern elsewhere. Okay. I haven't got any more questions.

COMMISSIONER MADDEN: No. I mean it's more thoughts and it's probably back to this - the over recovery and noted from the fall over recovery is different things in different valleys. I note that we have to be clear that we're talking about a policy for over-recovery, not on a certain date that it has to be resolved, so if there's uncertainties around cap factors and the like, and even things like the 450 in various places, we're talking about when things are resolved probably 2024.

COMMISSIONER DOOLAN: Yes, or even 2026.

COMMISSIONER MADDEN: You know, when things are clear. Then actually addressing it.

COMMISSIONER DOOLAN: But being clear about the policy early.

COMMISSIONER MADDEN: Yes. So for us - the Commission was actually about well, the integrity of the program saying "this is what we need" and in a sense sticking to that as you start talking about how much (indistinct) and all that kind of thing, so probably could have talked about that earlier but point taken and it's a point taken made in other areas. We're not talking about just divest in 2019, so we do have to have certainty around that, what the over recovery is. But I'm just again thinking if there's over recovery in the 450, I'm just wondering how you actually deal with that and what does it mean for the Lachlan? Do they have a program and is it (indistinct) separately or - anyway. It's a question we can add to the Department - - -

COMMISSIONER DOOLAN: It is also whether there are any potential views from your organisation.

MS EWING: Yes.

COMMISSIONER MADDEN: Leading into that a little bit about the water trading options. So the options there, are you talking about kind of leasing in the meantime and things like that, while this is resolved one way or the other in terms of the water trading options or are you talking about once there is a point where a decision is made selling back into the market?

MS EWING: Temporary trade can be - yes, is an option now, I think.

COMMISSIONER MADDEN: Yes.

MS EWING: We understand that people don't want to necessarily make permanent decisions until everything's settled. But we think that - I guess, dipping your toe in the water and getting used to it, is a way to start addressing some of the issues.

COMMISSIONER MADDEN: So again, as part of that policy.

MS EWING: Yes, and with a year like this when water is valuable, temporary water is valuable there's an opportunity to put a reasonable amount of money away. Thank you.

COMMISSIONER MADDEN: Thank you.

COMMISSIONER DOOLAN: Thank you. Our next speaker is Michael Job. Would you again, for the record just introduce yourself.

MR JOB: Hello, yes, I am Michael Job, from Warren. Yes, I am here, I am a landholder. I'm actually a landholder along one of the tributaries of the Macquarie River, the Brummagen Creek and I'd just like to pass on some observations and some things I would like you to put towards the Plan.

As I said, I've got a bit of a vested interest. I'm a landholder in the Brummagen Creek. I have observations of missed or maybe undervalued, passed over, forgotten or maybe sacrificed parts of the Macquarie Valley. I'd like to use my personal experiences as an example of what goes on in environmental sharing of water. Questionable water sharing plans of creeks and tributaries. They are stressed and dying because of management driven by government, international requirements and of what looks good in the news and in newspapers.

The marshes are a very important part but they are not the whole story. I believe the reduction of local knowledge and management, local management by land and water is being replaced by regional management and centralisation of people who have too much on their plate already. I believe you need to make a bigger emphasis on local on the ground management otherwise it all falls down, and then this results in water not hitting its intended mark.

As an example, I could give you a bit of a personal experience. I think there is inequitable access to Macquarie River flows down the creeks and tributaries, especially with the land and water installation of gates to prevent water flowing down creeks. In a lot of cases, the river needs, especially in my case, the river needs to be flowing, it's, for example, like a 7.6 metre height to run the creek and it is the same with a lot of other creeks, and this normally occurs once or maybe twice a year if you are lucky for a few days or a week and there are no local water officers anymore who know and understand the required quick action time to open these gates to capture these runs down the creeks before the river drops below these run levels. The gates used to be left open and only closed when deemed plenty of water had run down the creek and no more water was wanting to be - and more water would then need to be sent down the river.

I fail to see why the fauna and flora down any of these creeks and tributaries and I'm mainly meaning like the unregulated creeks are any less important and are denied legitimate flows, when the Department of Land and Water are still more than happy to send bills for water access but then block the water from flowing down these said creeks. This is rather frustrating when the river flows 24/7, 365 days of the year and these creeks are denied very infrequent flow opportunities.

A lot of these tributaries are used to move water from the Macquarie Valley to the lower Murray-Darling valley, (indistinct) are used to shut water down to the Bogan River for Lower Bogan and then that water's then often sent down to places like Goulburn and then back down to Bogan. And so basically I'd just like to close by just saying that yes, I think it comes down to we just need more on the ground people and they need to be local with local knowledge. And that's me done.

COMMISSIONER MADDEN: I think this was raised at Warren when we were out there talking. I guess the question for me is what's the change of management? We talk about the gates. If we go back ten years and then we put the operation out and I don't mean the pointy bit, you know, over a couple of years and the point now. With the closing of the gates, was there any discussion with landholders about the operation of the gates and the expectations allowing water into those creeks and the timing of it? I mean, was it something that used to be discussed at that local level a couple of times a year or actually having a target in terms of having (indistinct) pool available at certain points (indistinct) or whatever it might be? I'm just wondering what the kind of change in operation is and whether there was a discussion about that at all.

MR JOB: Yes, there were plans and they used to like want to flush the creeks a year, they'd give them a really good flush, but now they'd rather just either pump water down channels or just let - in my specific case we haven't (indistinct) channel, and it flows like at 30 megs a day. But 30 megs a day just channels out the creek, whereas we'd much prefer the water to come gushing out of the river out at full flow and we used to get - we used to have good local management but as the boys were saying just a while ago, we used to have good local management but that's all gone now, and it's all been centralised in Dubbo. And those people are already over-taxed doing what they're doing. When we come down and talk to them, they don't know who we are. They don't understand that these gates need to be opened like yesterday. You've really got to - you've nearly got to see hitting the ground so then you've got to know that gate needs to be open tomorrow. Well, maybe we should be opening it now, because that river's going up and down. Before they have time to consult and talk to other people. These things have got to happen like yesterday.

It is the quick reaction time and these local water officers we used to have, when these rivers are high they'd know which creeks to run first because the river levels are at different heights so they'd know that this creek, we need the river at high level so we should run this one first, and then they have an order how they run them. So it's shared more equally or effectively is probably the (indistinct) there.

My main crux is that we can now make up all the plans we like, but unless we've got the right people on the ground making the decisions and carrying out these plans, it is all going to fall down and that's going to come from local knowledge.

COMMISSIONER MADDEN: This is something that we have raised (indistinct) projects down the Yanco for example, this is further south. The same kind of discussion about how you make decisions for the system versus local kind of areas. We've got a

creek in a similar kind of proposal with a weir in there and change the flows down that system. I guess for me it is a general point that we can make regarding how you actually make these local environmental issues come to the fore.

So the local management, there's also discussion - have you actually had a forum? Have you been to the local and environmental water committee meetings? Did you raise it there? I'm just - - -

MR JOB: I've been - - -

COMMISSIONER MADDEN: What you've done to raise it, I'm not saying you should have done this or that.

MR JOB: Yes.

COMMISSIONER MADDEN: But I'm just wondering what avenues you've tried and had no success.

MR JOB: Yes. I've been to the meetings. I've been - spoke to the local - spoken to water resources and they will pass you off and they say you've got to go to another level. You're at the wrong meeting. You need to go to this meeting. You need to go to that meeting. And you go and then they don't get back to you. You don't hear back. So - and that's pretty much because we don't have the local representation anymore.

COMMISSIONER DOOLAN: When did it go?

MR JOB: Well, unfortunately what happened was they retired. We had two very good water officers and they both hit retirement age and retired and were not replaced. So then it was all - it's all operated out of Dubbo now. And so now we used to have two guys who used to, rather effectively, operate the Warren area, for example, and now they're gone so now we've got Dubbo looking after the lower, the middle, the upper and all the other tributaries and probably the other valleys as well. And that's fine, you can contact them as long as the rain falls on a Sunday night and water's flowing on the Monday, but if it doesn't, if the rain falls on a Thursday or a Friday, by the time you ring them and you talk to them or you try to get through to them, you know, the water's gone, it's passed you by, especially on the - in respect to the tributaries. It's the unregulated tributaries, they're the ones that are getting choked.

COMMISSIONER DOOLAN: All right. We will take the issue.

COMMISSIONER MADDEN: Yes, it is a general issue and honestly we could have chased this to the enth degree because it's not our role.

MR JOB: But it is part of the Macquarie Darling.

COMMISSIONER MADDEN: However, there is points to be made and we will discuss it with New South Wales. In terms of Water Resource Plans, how do these local

decisions actually get made and what's the forum for them. So we'll actually say well, where's the forum, was not shop around, so don't shop around, it should be explicit on a range of these rules and a similar thing (indistinct) where they actually get aired and what are the impacts on the local environment.

MR JOB: Thank you.

COMMISSIONER MADDEN: Thank you.

COMMISSIONER DOOLAN: Thank you.

MR JOB: No, I just agree with what the other people said. I was just speaking on a few things that weren't mentioned.

COMMISSIONER DOOLAN: Our last formal speaker Ms Margaret McDonald.

MS McDONALD: Thank you for this opportunity. I am speaking on a personal level and usually you'll find my submissions are on a personal level. I am an emotional person and I've complained mostly on environmental and social justice issues, and I'm a retired mathematics teacher and have the character of believing in the experts. If they are experienced in their field, and they have the data and research, then I'm somebody that takes on board that information.

So I don't necessarily have my head all around the way that the Murray-Darling Basin Plan works, but I have believed in the experts when they've told me that the May 2018 northern amendments was passed that the pipeline to the Menindee Lakes and the extra water from the north arch of New South Wales, that that would mean the death of the Darling River and the death of the Menindee Lakes.

So now I would like to acknowledge also the Wiradjuri first nations people who were the custodians of the land which we stand upon and also the custodians of the central west land of New South Wales and the north-west land of New South Wales where my forebears came from Britain and settled and prospered by farming that land. And it is today that I would like, because we have had people speak for farming and irrigation and the environment, I would like to speak on behalf of the Aboriginal people.

All right. The Aboriginal people were here for 60,000 years and we know now things that we didn't know when we first arrived and people reported that the land looked beautiful and grassy and like parklands in England, and wonderful to farm. That that land was nurtured by the Aboriginal people with their burning regime, that they used their culture of their dreamtime which was their religion and to nurture the resources so that they could be sustained, self-sustained in this country.

So the dreamtime meant that there was spirits in all of the natural resources. In the trees and in the rivers, in the oceans, in the flora and fauna and it was their duty to look after those things, and they held such a strong belief that that was their duty, that in Tasmania where they were being captured and either put on islands or killed, and they knew they

were being hunted down because there was a bounty on their heads, they still burnt where they knew they needed to burn to maintain the grasslands or the templates that they were then managing for the 60,000 years, they still did that, even knowing that they would give themselves away and thus their lives. So they had a strong bond to the land and they believed that the spirits needed to be appeased.

Now, with the rivers and the swamps and the billabongs, all of these things were maintained. They did not just leave them as they were. They looked after them so that the fish and the fauna would reproduce the resources that they needed. So we have fish traps like at Brewarrina which are now dry. I spoke to somebody in May this year in Dubbo from Brewarrina, an Aboriginal youth, who said that you could walk across the river at Brewarrina. This is the Darling River. The fish traps were built and maintained so that they could not destroy the water and not destroy the river, but actually reproduce them and propagate them and make them more abundant.

So what we have done in the last 200 years, and I am including myself as a white settler, is that we've cleared the land. We've gotten rid of the Aboriginal people. We shamelessly massacred them and kept that secret because we wanted the land to put our sheep on. We cleared and we're still continuing to clear today. Michael Baird relaxed the laws only two years ago of clearing and that resulted in an 800 per cent increase in clearing in one year because we, in our wisdom, allowed you know, people that owned land to self-assess whether it was necessary or not.

We know that clearing the land destroys the soil. We know that having grasslands and trees stores the carbon. We know that it makes good soil. We know that the water doesn't run off and erode the land, and yet we're still doing things like that today. So here I am, I'm a second or third generation descendant of farmers and I am a person who is responsible for the disenfranchisement of Aboriginal people and for their displacement, and now I'm looking at what we're doing to our rivers.

We have Aboriginal communities at Wilcannia, at Bourke and at Brewarrina, and what are we doing about it? Do we feel any shame for what we have done to them, how we've taken their land from them and how we're placing them in juvenile detention centres here in Dubbo where I know that children as young as 11 are being housed in over-crowded conditions because there's nowhere else for them to go, and because they lack such opportunity and their families are so dysfunctional, where I know that up to 50 per cent of those children have alcohol foetal syndrome conditions and even if they wanted to go on a drug rehabilitation program, they aren't bright enough or literate enough to actually sign the papers because they don't understand the conditions of their rehabilitation.

Explorers in the mid-1900s came looking for inland sea because all the rivers flowed out west. If they were today - they found the Darling River. If they came looking today, what would they find? Large holding dams that hold more than the Sydney Harbour. The Aboriginal people on the Darling River, they call themselves the Darling River People, they call it their life blood, and water for Aboriginal people has always been their life blood, but - and without it, they say they all die and that means their spirits will die because they know they need water for everything else that their culture is dear to them.

So I want to ask what our legacy as settlers in this county is. We have said sorry and made a big deal of it at Parliament House to the Stolen Generation. It was just a little tick box thing to make them feel sorry at the time.

An extra 70 gigalitres of water allowed to go out of the rivers in May 2018 will not give those communities the water that they need or the fish that they need or the river gums or any of the grasslands that they value. The Food and Fibre executive, Grant, has said that we need more natural resource management to recover some of the water, but I have been told that for the last 20 years this process has been in place and large amounts of money have been spent on it, and still we suffer over-extraction and over-allocation which has not resulted in more water into the rivers and the tributaries are still not flowing into the Darling River.

So in conclusion, in my emotional way, as a settler to Australia I would like to address the issue of our treatment to our Aboriginal people. We've only been here 200 years and we should be ashamed of the situation we've placed them in, and I feel a debt to them because they did maintain this beautiful land that my family have farmed. I have to say my father, because he had four daughters, sold that farm in Baradine to a large company and then they over-stocked it and the place is just a barren wasteland at the moment.

I would like the Darling River people to be treated with respect and to be allowed, at the very least, to have their healthy flowing river.

COMMISSIONER DOOLAN: Thank you very much. We certainly note the comments. Many of the issues that you have raised are much broader than our inquiry can deal with. But the areas that our inquiry can deal with are the areas of restoring health to The Darling to some extent, and also the participation of indigenous people in water management and water sharing specifically. We have been discussing with both the Northern Basin and indigenous nations and The Darling indigenous nations along the river as well. Their concerns and their thoughts on how this process is rolling out for them, and the level of consultation that's occurred and will occur in the months to follow.

So we are talking directly to them, but putting that aside and noting the more limited scope of our inquiry, is there anything that you would like to see from our inquiry specifically?

MS McDONALD: If there was a way to make the whole of the country aware of how important this river is, The Darling River and how the rivers are being affected because I think there's a lot of ignorance out there and I think the city people - it's not part of their lives, and unfortunately they vote in these governments and that's probably, if that's possible, that's what I would like. More publicity about the straits that the rivers are in.

COMMISSIONER DOOLAN: Thank you. Thank you very much. Well, that is our last scheduled speaker. At this point though, we do have an opportunity for anybody in the audience who would like to put comments on the record or make additional comments to actually come up and take that opportunity. So are there any people who would like to do that? Okay. We have one.

MR COLE: Yes, thanks for the opportunity.

COMMISSIONER DOOLAN: Can you state your name and affiliation.

MR COLE: My name's Ian Cole. I work for Barwon-Darling Water which is an organisation that represents water users on the Barwon-Darling River. I have been a farmer. These days I'm retired from farming. I'm a councillor on the Bourke Shire. I've lived in Bourke all my life. Did all my schooling there. Know the Darling River well and I certainly agree with what you said before. We do need to pay our respects to the Barka People of the Barkindji Nation who lived and originally came from along The Darling River, and also the Wiradjuri people locally.

But I guess there a lot of issues that came up today that are either relevant or not relevant to what you are looking at, but just looking at some of the ones that are relevant here and to your report, with the Water Resource Plans, yes, probably more time is needed on those. There are a lot in New South Wales and there are only two on exhibition at the moment that I'm aware of or three. Is there a ground water one as well?

COMMISSIONER DOOLAN: There's no ground water one.

MR COLE: There's two. Okay. And there's quite a lot of work to be done and the Department has had in New South Wales had quite a lot of restructuring to do in the last year or two. But a lot of work has been done already. We're not starting from scratch with these Water Resource Plans and Water Sharing Plans. A lot of work has been done already. I hear people often complain about the modelling not being sufficient. I'm a SAP member for the Barwon-Darling and I've seen extensive modelling over many years, firstly, on the Barwon-Darling River Management Committee back in, starting in the late 90s and through the early 2000s. Work done on our Cap Management Program. Work done on the Barwon-Darling Water Sharing Plan which involved extensive modelling and what we're doing really, is building on that modelling now and improving that modelling.

So what I see in the Barwon-Darling is yes, we probably are behind schedule and more time may be necessary, but I don't know that six months would make all that much difference. Maybe a year might make a little bit of difference. I guess what do we want to achieve here? And you know, from Barwon-Darling Waters' point of view and certainly from people who live along The Darling's point of view, we want to see a plan completed. We want to see a Murray-Darling Basin Plan delivered that does protect the interests of people with water licences. Does protect the environment and does protect the rights of other water users in the system, and so we'd like to see that earlier than later.

On the Bardon-Darling, we're a bit like the Lachlan and this might be strange for some people to hear, that water usage, irrigation is way below plan limit and that has to do with what Mary said earlier, it is irrigator behaviour. Irrigators on the Barwon-Darling have, because of the Millennium Drought and this most recent drought, become a lot more at risk, I suppose you'd say, in their planning decisions and the type of gamble they might

take on a crop, given that the Barwon-Darling is an opportunity type river. A river that runs sometimes and doesn't run a lot of the other time.

And on The Darling itself, the irrigators take a very small amount of the water that comes down the system. If you look at it, and the numbers - the gross numbers tell you and it's written in the Barwon-Darling Water Sharing Plan that six per cent of water long term is used for irrigation. Now, I know there's been a big discussion about that publically after the Australia Council, someone put out a report on this, Ms Slattery put out a report on it. But the truth is that if you look at averages, and when you look at averages you've got to look at the big years and you've got to look at the small years, the Barwon-Darling runs a lot of water and very small amounts are taken as irrigation. The average at the moment is 189 gigs, that's a long term climatic average, 189 gigs, less the 32.6 that's being taken.

One of the other issues that was raised here this morning is over recovery and again, people may be surprised to know that under the Murray-Darling Basin's original plan, the Barwon-Darling has been five times over-recovered on their local contribution towards the plan. So initially we were slated to have six gigs bought back as the SDL reduction, so far we've had 32.6. And we have asked that something be done about that so what was done about it was it got wrapped up in it all in Basin review and the number was changed from six to 32.6. We call it reverse engineering, I don't know what you call it. So that's where we are at the moment with that.

So a small impact industry on the river has made a big impact, I know nationally in the news and current affairs situation the politics of water. But we do on the Barwon-Darling love the idea of connectivity. We wouldn't have the water in the Barwon-Darling if it wasn't for the contributions of the Macquarie, not the Lachlan, the Border Rivers, the Moonie, the Weir, the MacIntyre, the Colgoa, Bokharam, all of those contribute something to the Barwon-Darling. So with these watering plans that you are talking and other people are talking about, we don't think that the tributaries can be selfish and say "We want to use our water out of our dam to water our assets only". What we'd like to see as a Barwon-Darling community where we derive most of the water that flows in the Barwon-Darling from the tributaries, not from local rainfall or local run-off, we'd like to see that more of that water come down.

And I don't think a lot of people realise that under the Plan we're going to get on average an extra 320 gigs in the north flowing in the rivers. That doesn't mean 320 gigs makes the Barwon-Darling, but a good proportion of that will. So we're going to have more water on average flowing down the Barwon-Darling and this is why I don't understand the problem - the people who have got a problem with the Wentworth pipeline they say, "Because the pipeline's going to be built from Wentworth to Broken Hill all the water's going to be kept up north in the Northern Basin". That's just absolute rubbish. More water is actually going to flow down on average when the drought breaks, through the Barwon-Darling and fill the Menindee Lakes.

So some of the other issues that were raised this morning, there was something said about the Barwon-Darling water sharing plan being blamed for us needing an environmental flow. This year we've had three environmental flows in the Barwon-Darling and that's all

we've had. That's the only flows we've had. Firstly, there was an embargo flow early in the year that came out of the Gwydir and the Border Rivers. There was the early environmental flow that was embargo which was unregulated water that would have been available to irrigators. It was allowed to flow down the river because of that section 324 order or whatever they call it now. We call them embargos.

Then there was the great northern connectivity flow that came out of the Gwydir and the Warr rivers, and then there was a small flow that generated from rain fall up around Brewarrina, not long after that, that irrigators in the Brewarrina to Louth section of the river decided to let go which created another environmental flow, they weren't going to get much benefit from pumping the water anyway, to let that go to go down the river and that's the only flows we've had.

Now, it was suggested, I think, that at that time there was water in storages, private storages, at the time, and that was the reason for the river being dry. That was not the reason for the river being dry. The reason the river was dry is because we've had a standard drought since 2016. So I think what we've got to do when we're looking at the points that the Productivity Commission's looking at is to look at facts.

Let's look at the facts of the flood plain harvesting and there is flood plain harvesting on the Barwon-Darling and we're having meetings with the Department about that very shortly. We've sort of been one of the last ones to be looked at, but it was always intended that the Barwon-Darling would have its cap which became our SDL, it would have our cap and then the flood plain harvesting would be external to that. It wasn't included in the SDL, in the original river take. It was the cap plus your flood plain harvesting. But those figures had to be ground truth first and it has taken many, many years. I mean, work was started on this back 2007? Hold on. It's a long time ago. And so I'm sure the Productivity Commission knows that the flood plain harvesting in each valley in the north is not meant to fit under the current cap, it's the cap plus the flood plain harvesting and always was.

And all that's happening there is - all that's meant to happen and we should make sure that this does happen, is that historical use is being licensed and then being able to be, you know, monitored, metred and monitored properly. So all we're doing is taking what is historical take and bringing it under a licensing regime, just like we did in the unregulated rivers back some decades ago in properly licensing all unregulated take.

Basically, they're the points I wanted - I mean, there's much more I could say. I've been involved in Barwon-Darling issues for many years and one of the things I did want to say, what Grant had said earlier, just to back that up and say thank you for coming to Bourke. Not many organisations like yourselves come to Bourke to consult, and you did and you came and listened to us, and we were pretty grateful for that and thanks for the opportunity today.

COMMISSIONER DOOLAN: Thank you.

COMMISSIONER MADDEN: I take your points about the Plan and the like. I guess, you talk about the averages but it is - you're concerned that we get the low flow in the changing of commence to pump rules.

MR COLE: Sorry, no changes have been made to the commence of pump rules on the Barwon-Darling. There were no changes in the Barwon-Darling Water Sharing Plan and there are no charges - - -

COMMISSIONER MADDEN: I'm trying to get - what I'm actually trying to get to with the modelling in the broad is we get the questions from the Lower Darling that they see changes so and they gave us figures about how often they go dry over time. As seen from their perspective it's either one of two reasons. One is less water coming into Menindee Lakes over time and that can be a range of factors, and/or the operation of the Lakes changes so they've actually gone down quicker as water is released. So when you have the discussions at Barwon-Darling SAP, how do you actually address that interaction between the Upper tribs for you and what are their impacts and their changes. How do you - and what changes you may or may not make, whether it's trading or whatever the conditions are on all types of flow, but then also there is a discussion about what happens in the operation of the Lakes.

So it seemed to me that in isolation we're having discussions and you saying there's no rule changes, but something prima facie has changed but I'm wondering, from your experience, where does that actual discussion happen about or what does it mean further down? So when the Lower Darling people say it's this, can you actually say what you think, or have you seen modelling or aware of modelling from the authority or the Department in your interactions with them? Have they said well, it's actually an operation of the Lakes causing that. Or is it further upstream or just the draught.

MR COLE: We do have discussions all the time obviously. Sometimes with the SAP process and other processes before that, you've tended to work in isolation in your own valleys and certainly there is still a little bit of that goes on, but we have had a number of all SAP meetings where representatives of the various SAPs have been invited down to Sydney to take part in two or three day discussions on all sorts of things, including the connectivity issue, and certainly that's been big on the agenda. Do things change? Yes, they do change over time and certainly in the last couple of years, well, really since the big flood of 2012 in the Barwon-Darling system. We've had a pretty dry run except for that 2016 year when the Bogan River, I think had five or six floods in one year and we almost filled Menindee Lakes as a result of that.

I've had discussions with the - what do you call them - DPI or DRI Water, the New South Wales officials about how they manage the Lakes and most of the replies I've had are indicating to me that they haven't really changed the way they managed the Lakes. But yes, sometimes water is let out a little bit more quickly than in previous years, but they really haven't changed markedly.

We had a huge drought in the Barwon-Darling from 2001 through to 2009. Then we had 10, 11 and 12 which were pretty wet years. Since then, except for 2016, we've had

drought. So yes, things have changed but things will turn around again, and we may find that in the next ten years we have a 1970s period again or a 1950s period where you get a lot of water down the systems and the Lakes are never empty. But that's the type of episodic system we live on, and it is, the Barwon-Darling is and always has been, even under natural conditions, an episodic event based river, and that's how the businesses that operate on the Barwon-Darling have to survive. They have to manage their risk around the fact that sometimes the river runs really well, and sometimes it's absolutely dry.

The Barwon-Darling today would be bone dry from top to bottom if it wasn't for the weirs on the river and the fact that you've got dams on the top of the tributaries that trickle water down the river in the growing season, in the summer growing season.

COMMISSIONER DOOLAN: So if wanted to change over time to actually achieve some level of security to the Lower Darling people - I'm not saying they should - is the modelling up to it to be able to actually model what changes you would have to make in terms of - - -

MR COLE: If you look at the modelling, the Lower Darling Irrigation System is probably dealt the highest security of any valley in the Murray-Darling Basin, maybe except for the Murray. Well, certainly in the north it has anyway or in this northern part of the river going down to the Lakes. Their security on a historical basis is very, very high compared say to the Gwydir or the Namoi or the Barwon-Darlings. It's a very high security. And now that Tandou's gone, there's very small amount of water being used there anyway, and a big lake system that has normally got a lot of water in it. We've just gone through two big droughts and we're still going through one.

COMMISSIONER MADDEN: So I asked about the modelling, whether it's actually in a sense up to the task to actually assess its small rule changes and see what the impact is.

MR COLE: Oh, sorry, yes. Look, yes, it is and you could probably - you can log onto the Barwon-Darling SAP site and get the modelling so the low flow access on the Barwon-Darling and see that a lot of people think that because A class water is used more on the Barwon-Darling now that it used to be, that it's having a big impact on the low flows downstream. The modelling doesn't show that. Talk to Andrew Brown who did the modelling on that and you'll find that the demand is just not there to have that huge impact that people like to talk about. Out of the 189 gigs of licence on the Barwon-Darling, there's nine and a half gigs of A class. It's a very small amount of water in the whole scheme of things.

I can't believe that you've got people who will sit there and say that this nine and a half gigs is really important when they sat in the Northern Basin Review, those same people, backed the Northern Basin Review and said "Let's not let another 70 gigs go down the Northern Basin". Do you see what I mean? It's okay to take that out of the system, that extra 70 gigs on average, but "Let's worry about this nine and a half here". It's just nonsensical

COMMISSIONER DOOLAN: I suppose what has become apparent to us is though in such an episodic river as you say, actually the low flow arrangements and event management is becoming particularly important, particularly for a climate change future where vulnerability will only increase and it's probably the area that people are learning most about.

I have a question though, we've obviously - - -

MR COLE: Could I just comment on that? I think it's always been important. I don't think it's just become important. It's always been important and if you go back to 2000, 99 and 2000, all the water users on the Barwon-Darling got together on the Barwon-Darling River Management Committee with the environmentalist, Aboriginal representation, local government, Fisheries, everyone in, and looked at what we could do about the low flows on the Barwon-Darling. At that time B class access, which is the big pumps on the Barwon-Darling, and C class - oh, not C class, but B class which is the big pumps and the majority of pumps, have access down to 390 megs a day past Bourke and there were different access levels up the river.

But 390 megs, not gigs, megs a day past Bourke, you could start a B class pump. So we looked at that and we said that that is not sustainable for the low flows, so you know, Louth, Coolabah, Wilcannia, other people downstream weren't getting a fair go. So those all got lifted to 1250 megs a day past Bourke before any of them could start a B class pump. Now, you might want to argue about whether that's enough or whether it should be higher or whether it should be lower, or where it should be, but we actually lifted those heights and at the time of the Barwon-Darling Water Sharing plan, the regional advisory group made up of all the scientists in Fisheries and water and other government departments, got together and did an assessment of the low flows in the Barwon-Darling and found that because we'd implemented a low flow regime, it was called our environmental flow package, because we'd implemented that under the Barwon-Darling Management Committee, the environment was better protected and they came up with all sorts of reasons why that was a good thing.

Now, no one's ever gone back and done another assessment of that since probably the. So right now, yes, the low flow regime is really important in the Barwon-Darling and all the rivers, but it always has been.

COMMISSIONER DOOLAN: So we did understand and correct me if I'm wrong, that there were a number of rules in place both in water sharing plans and then in other rules said to protect the low flow regime back around the late 90s and 2000s, but in the 2012 plan and then subsequent arrangements, some of those have fallen by the wayside in some way.

MR COLE: No. No, the rules are exactly the same. I said that before and I'll say it again. The environmental flow package of - begin to pump and cease to pump rules on the Barwon-Darling that were put into place in 1999, 2000 are still in place exactly as they were.

COMMISSIONER MADDEN: Sorry, I think the important thing is obviously given the level of concern that there are actually changes under foot or underway at the moment, when's the plan, in terms of consultation for the - the Water Resource Plan that covers the area, do you know when it's meant to be out for public discussion?

MR COLE: Well, it should be out very soon. We've got, I think, one and possibly two more meetings of the SAP and then it will go out to - - -

COMMISSIONER MADDEN: So it will be next year?

MR COLE: I should image so.

COMMISSIONER DOOLAN: Does your SAP have representatives at the Lower Darling on it? I mean, I understand all SAP members meet in Sydney.

MR COLE: It's got representation of people all along the Barwon-Darling, just like there's representation on the Gwydir, all along the Gwydir.

COMMISSIONER DOOLAN: Including the Lower Darling, below Menindee or not?

MR COLE: No, no, the Lower Darling is a separate system.

COMMISSIONER DOOLAN: Yes, I understand but there's still an interest in how those rules go. I know there's Menindee and Menindee operations (indistinct).

MR COLE: Yes.

COMMISSIONER DOOLAN: I mean, clearly we've seen and heard a lot about the Lower Darling. We've had a lot of representations at Mildura. We will be asking the authority about the shift in change that's apparently occurred and what might be the cause.

MR COLE: Well, the - okay, I will say again. There's been no change in the access rules. If there's interest in the Lower Darling and what's happening on the Barwon-Darling, I'm sure there is.

COMMISSIONER DOOLAN: There is.

MR COLE: Yes. There's also interest in the Barwon-Darling and what's happening in the tributaries too.

COMMISSIONER DOOLAN: Sure.

MR COLE: So we are all connected.

COMMISSIONER DOOLAN: Of course. Part of the - and the accreditation process is understanding how those plans talk to each other and the connected nature of those plans. It's a critical element about its accreditation. Okay, thank you.

MR COLE: Thank you.

COMMISSIONER DOOLAN: Is there anybody else who would like to speak? Okay. Last chance.

MS SMILES: Can you get up a second time?

COMMISSIONER MADDEN: If you want to clarify something, yes.

SPEAKER: I've got to go, thank you very much. If you want to ask anything, feel free to contact me. Thank you.

COMMISSIONER DOOLAN: Just again for the record.

MS SMILES: Bev Smiles, Inland Rivers Network. I think there was a general understanding just in regards to the Barwon-Darling Water Sharing Plan, that the Water Sharing Plan that went out on exhibition for comment was vastly different to the Water Sharing Plan that was gazetted in 2012. So that's one of the key concerns that people have, that difference, and I think it's the A class, the change in the A class access is another thing that's probably been raised, and also from an Inland Rivers Network view point, the business of using long term annual averages as a way of explaining that water use is only a very small percentage of that long term annual averages, yes, it is because that long term annual average includes all the really big floods.

And the real concern with river health is what is extracted during medium and low flows. So that's where your river health issues really can be impacted, so the use of long term averages is a way of explaining that the irrigation industry only uses a very small percentage of water in the system, it doesn't really have a relevance to the volumes of water that are taken out at critical times. So you know, it's horses for courses as far as impacts are concerned and that's one of the - we see that's one of the key problems with the way that water's managed, is using long term annual averages smooths out the problems. Yes, so I just wanted to make those couple of comments.

COMMISSIONER DOOLAN: Thank you very much. And we certainly appreciate the importance in a river system like the Barwon-Darling.

MS SMILES: Thank you.

COMMISSIONER MADDEN: I guess for me there's a couple of comments out of that which I think are expectations around consultation on changes. We've had a discussion with New South Wales about the changes between the plan that went out and in and sorry, that was gazetted. They said the changes were minor but I think that's an important thing that they should actually spell out in consultation regards the changes going forward, so people can actually see and definitely see what they were because we do get the sense with New South Wales being absent in some cases. This is the Department of Industry water. This is also reflected in their recommitment recently to the Murray-Darling Basin Plan and the like, so it is not something that they don't shy away from, that

they can be explicit about some of that history. I think the other point is that - and this is something we have heard. Water isn't run and managed on averages. It's often used for the sake of commentary and setting SDLs and numbers and things, but it is annually water availability and I guess the other thing with that consultation, important point of low flows is to be explicit with your modelling and information that it is not done on averages.

So again, that's, I think, something we could make in the expectations what's an appropriate and meaningful consultation process.

MR COLE: Can I comment further?

COMMISSIONER DOOLAN: If you want to come to the table.

COMMISSIONER MADDEN: If it's minor clarification. You have to come up and state your name.

MR COLE: Yes, I will. Ian Cole from Bourke from Barwon-Darling Water. I just want to clarify that there were not changes to A class access as a result of the Barwon-Darling Water Sharing Plan of 2012 and that will be confirmed to you by the Department. Any change that was made on type of pump was as a result of that plan then coming under the new Water Management Act rather than the old Water Act of 1912, which the new Water Management Act didn't manage access by pump size, but by annual volume, and that was the difference. There were no changes to the actual access rules of A class, and the Water Sharing Plan that went on - went out for advertising was different than the one that was bought in. Every plan in New South Wales, I dare say, was the same way because changes were made between advertising and public comment and final proclamation of the plan. That's not new. That's what happens to just about every plan. It happened to the Barwon-Darling and the changes, as the Department says, were minor.

COMMISSIONER MADDEN: I think this is the point of the Department giving information about those changes and their extension and materiality and so I think the point stands on a good way going forward on consultation, is actually having a solid foundation on facts.

MR COLE: Sure is.

COMMISSIONER DOOLAN: Anybody else? All right. Thank you very much, ladies and gentlemen. I will now adjourn the proceedings and the Commission will resume its public hearings tomorrow in Canberra for its last public hearing. So once again, could I thank you for your participation and your comments. We value them and the submissions that you make, and they do form part of the evidence with which we review our draft recommendations and findings. So thank you again.

**MATTER ADJOURNED AT 1.01 PM UNTIL
FRIDAY 26 OCTOBER 2018**



Australian Government
Productivity Commission

PRODUCTIVITY COMMISSION

**INQUIRY INTO THE FIVE YEAR ASSESSMENT OF THE EFFECTIVENESS OF
THE MURRAY – DARLING BASIN PLAN**

DR J DOOLAN, Commissioner
MR J MADDEN, Commissioner

TRANSCRIPT OF PROCEEDINGS

AT DIALOGUE BUSINESS CENTRE
ON FRIDAY, 26 OCTOBER 2018 AT 10.00 AM

INDEX

	<u>Page</u>
BALONNE SHIRE COUNCIL COUNCILLOR RICHARD MARSH	304-309
NATIONAL FARMERS FEDERATION LES GORDON WARWICK RAGG	310-322
GWYDIR VALLEY IRRIGATORS ASSOCIATION ZARA LOWIEN	322-331
FONTERRA JACK HOLDEN	331-340; 346-347
MURRAY DARLING ASSOCIATION EMMA BRADBURY COUNCILLOR DAVID THURLEY	340-346
WENTWORTH GROUP OF CONCERNED SCIENTISTS DR CELINE STEINFELD DR TERRY HILLMAN	347-354

COMMISSIONER DOOLAN: Good morning and welcome to the public hearing for the Productivity Commission inquiry into the Murray-Darling Basin Plan, an inquiry that under the Water Act we do on a five yearly basis. These hearings follow the release of our draft report which occurred at the end of August. My name is Jane Doolan, my fellow Commissioner is John Madden, and I'd like to begin by acknowledging the traditional custodians of the land on which we meet today, the Ngunnawal people. I'd like to also pay my respects to their elders past and present.

The purpose of this round of hearings is to facilitate public review of our draft report which was released in August. In that draft report we provided evidence in a range of draft findings and draft recommendations, and as I said, the purpose of our hearings is to actually get feedback from the public and interested stakeholders on how those draft findings and recommendations can be improved as we move to a final draft.

This is the final public hearing. We had public hearings in Mildura, Murray Bridge, Shepparton and Dubbo and we finish today. From this point on we will be taking the information that we've learned from the hearings, from the submissions on our draft report and from meetings with stakeholders to finalise that report and to hand it out just before Christmas.

Participants and those who have registered interest in the inquiry will automatically be advised of the final report release by government. As I said, we will hand it to government just before Christmas. Government has up to 25 sittings days of Parliament to release the report to the public.

We like to conduct our hearings in a reasonably informal manner, but I do remind participants that a full transcript is being taken and for this reason we can't take comments from the floor, but at the end of proceedings, at the end of the session we'll actually have an opportunity for anybody in the audience who wishes to make a public statement on the record to come up and actually make that statement.

Also participants can refer to comments made by previous participants should they choose to do that. Today we'll actually be having presentations from people actually here in Canberra, but a number will be on the phone from other parts of the Basin.

We remind people that participants are not required to take an oath but should be truthful in their remarks and the transcript will be available to participants and then will be available on the Commission's website within a few days, and submissions on our draft report are also available for people to look at on our website now.

For any media representatives, and I don't believe there are any, but should there be, there are some general rules that apply and talk to our staff to actually work through what those rules are.

To comply with the requirements of the Commonwealth Health & Safety Act we're advised that in the unlikely event of an emergency you should assemble - go out the door and assemble across the street, across Blight Street unless the fire wardens tell us

something different. As we move through this, we do ask participants to actually make some opening remarks but to leave some time for questions from ourselves.

So as the first participant I would like to welcome Mayor Richard Marsh from the Balonne Shire Council who's actually been sitting waiting for us on the phone. Richard, are you ready to speak now?

MR MARSH: Yes, thank you, Commissioner. Did you just want me to proceed?

COMMISSIONER DOOLAN: Yes, please.

MR MARSH: Yes, okay, good morning, Commissioner and good morning to others in the room, and I'd like to thank you for the opportunity to present to you today.

At the outset, I just want to say that I and my shire or my council support the Commission's findings and recommendations, but we do have some comments we would like to make, and that I as Mayor of the Balonne Shire, and I should also alert you to the fact that I'm a director of the Murray-Darling Association, so I wanted to raise in any force some of the aspects of the plan going forward.

Firstly, Balonne Shire does support moving forward with the plan and while we have some of the most significantly impacted communities in the Northern Basin in our shire, being St George and Dirranbandi, we believe that we've come this far and we need to continue, so we need to make sure we go through the process, and that process needs to be modified as we go along, but you know, we've suffered the pain of water buy backs and this is exacerbated even more by the ongoing drought which we're all suffering, but we do want this to be a positive outcome for the plan, and that will only be achieved by working through the process.

I've got four matters I'd like to briefly comment on and the first is to deal with timeframes and deadlines, and we seriously believe that the plan may be impacted if there's rigid application and deadlines and timeframes on projects and outcomes. We think there needs to be some flexibility. There is obviously some frustration being developed at all levels because one group it's not moving quickly enough, et cetera, but to achieve an optimum result we believe that there should be some flexibility around the deadlines and timelines, and specifically I suppose this relates to the easing of constraints in the supply package. That's all going to take time and work. The development of the water resource management plans that is reliant on state governments working closely with - that are involve with the plan objectives, and I think effective management of projects and the process for achieving the objectives of the plan there needs to be some flexibility there. Surely it should be sufficient that if each phase is showing that the objective is moving on towards finality, then a reasonable timeframe should be accepted.

We don't want to see the plan fall over or be compromised, if you like, because there's been a missed deadline and that'll derail the long-term objective. Obviously the objective is to achieve the best results from the resources that are available, and flexibility and relief of frustrations will help with that.

I just want to comment also on the 450 gegalitre upwater and being a shire that has suffered significantly from the buy backs, we agree that it's paramount that the socioeconomic impacts be considered more closely in any endeavour to recover that further water, the 450 gegalitres. There's a criteria that it must be recovered with a nil or a positive socioeconomic outcome, but that strategy is yet to be developed. That's going to be difficult, but from the point of view of our shire and the people impacted in this area we really believe it must be a no regrets result. We really can't afford to suffer any further, to lose any further productivity, and any proposal that reduces the amount of consumptive water must surely be built on socioeconomic backgrounds or socioeconomic activity.

You know, we're in a case of population decline and socioeconomic decline, and we've got little chance of reversing that trend without state and Federal Government support. That's all been promised, yet to eventuate, and we wait with some - patiently I suppose is the best word.

I also want to talk about - following on from that I want to talk a little bit about the support to impacted communities and three shires in the Northern Basin have basically carried the burden. They're the most impacted, the Warren Shire which has the community of Warren; Walgett which has the community of Collarenebri, and Balonne Shire, as I said with St George and Dirranbandi.

So we in this area know what it's like to have our communities decimated, and we have the numbers that support that statement. This is not just a bland comment or statement. It is supported by the numbers, and I think are currently acknowledged by government that that is the case. We want to see the result, but we also want to be acknowledged and receive some support.

A lot of talk about support and funding and all those accompanying statements that, you know, they come but they don't come with any help. We commenced discussions in June as some of the three shires most impacted, and we met with the Minister in Canberra. We've done all sorts of things and still we haven't seen (indistinct) socioeconomic considerations. While they're relatively new in the Murray-Darling vocabulary, Balonne, I can tell you, has been talking about them since 2009. That was one of the major things we raised when the plan was brought through to the regions, and we can only hope that it's finally going to be recognised and applied in future decision-making. We were all for a no regrets policy and we hope that that can be achieved as we go forward.

Now, my final point, and this is more a local government point than a shire, individual shire point, and that comes from my association with my directorship of the Murray-Darling Association. They made a submission to the Commission which makes the case for inclusion of local government in the arrangements to implement the Basin Plan, and that argument is well-documented in the submission.

I and my council fully support local government involvement. We agree with the reasons that are presented by the Murray-Darling Association, and I think we go further in saying

at a more personal and a closer community level, we understand our communities. We see them day by day. We see their joys, we see their sorrows. We try to pick up the pieces and we try to provide support when things are tough. We look to our state and our Federal counterparts for help with resources, funding, et cetera, and we think we can contribute strongly and provide balance in the discussion on implementation in the Murray-Darling Basin Plan.

We must say, and I mean local government generally, not Balonne Shire, I think it should be remembered that we provide a strong link to community and that we can be a great conduit between communities and government at all levels. So on that point we seek inclusion in this important matter.

Commissioner, that concludes my presentation. I put those matters before you and I thank you for the opportunity to put these matters forward. Thank you.

COMMISSIONER DOOLAN: Thank you. Thank you very much, Richard. Are you happy to take a couple of questions?

MR MARSH: Yes, thank you.

COMMISSIONER DOOLAN: From my perspective, as you know, in the report we did actually in our draft recommendation recommend extending timelines where projects were important, cost-effective and really important to proceed, really important to have community consultation. So from your perspective that is important that we do actually have a serious analysis of timelines and good planning, and the timeline has to creep. It has to creep?

MR MARSH: Yes, I accept that, and we are supporting all of that process.

COMMISSIONER DOOLAN: Just on that then, I mean, the counter view, of course we've been around the Basin, is that to date some states have sort of shown creeping deadlines as a way of avoidance. What sort of checks and balances would you like to see in there to make sure that if we are actually extending deadlines to get good outcomes that it is making sure we're still holding states to account. Have you got any particular thoughts on that?

MR MARSH: I don't have - I don't have any particular thoughts on how you might do it, but I think it is important that everybody around the table understands that they - when I say around the table I mean at a state and Federal level, at a Commission level, at a Murray-Darling Basin Authority level, understands what's, and I think we all understand what we're trying to achieve, it's a case of how do we get there, and people have different views. I think they'll need to understand what the views generally are and the processes to be put in place.

It's, I was going to say it's easy. It's not easy, but you can have a plan in place to achieve certain things within certain timeframes, et cetera. That is the best information available at the time that that is set up, and I think that there needs to be some acceptance of

complications, timeframes, whether it be - and you know, we're going to go through a Federal election some time next year. There's going to be state elections that happen as well. These things all impact, and I think that pressure - I agree, pressure needs to be put and we've - in Queensland I would be critical of some of the things that some of our politicians or groups may have done, but they need to be lined up and told, "This is the way it's to be. Give us a very good reason and we'll consider it, but you just don't go and - just don't walk away from the process".

COMMISSIONER DOOLAN: One of the reasons that occurred, and we acknowledge you would want to extend deadlines in some of these critical projects for water resource plans is to ensure that you do community consultation well. As a local government and one that's been involved throughout, what do you think is adequate in good consultation? Could you give us your thoughts on that?

MR MARSH: I'd probably say that there hasn't been any at this stage, not at our level anyway.

COMMISSIONER DOOLAN: So what would you have liked to have seen, or moving forward, what would you like? That's the message we get around the Basin as well.

MR MARSH: Yes.

COMMISSIONER DOOLAN: But it gives us a bit of an opportunity to make suggestion back to governments of how the next phase should proceed. What would you want to see in your community as good consultation?

MR MARSH: That's difficult, but from our point of view I think good consultation is government working with the community with those people in the community reinforcing what's available, reinforcing the guidelines, the rules, you might say, and I think that's where we've got some differences at the moment as to how we all do - how we develop our plans, how our plans work, and I'm not saying there should be consistency across the Basin. Very nice if there was but that's not likely to happen. It seems to me that they take too long to get the detail to the groups that need to consider it and then a very short timeframe to respond. But I'm not answering your question, I know that, and I probably don't have a specific answer to the question.

COMMISSIONER DOOLAN: Okay. No, that's fine.

COMMISSIONER MADDEN: I'm just wondering, Richard, in terms of structural adjustment we've had some feedback where things haven't worked so well. I know we had a good meeting with the Balonne Shire when we visited and talked about some of the issues, including kind of mental health programs and the like, but have you given more thought or can you give us some idea about what are some structural adjustment programs that actually well-targeted and worked, if any? Even from other experiences where any programs have actually helped with transition?

MR MARSH: I'll be blunt and say that we've seen very little in the way of structural adjustment. We're not looking for a handout, and you know, the saying in our shire is, "We don't want a handout. We want a hand up". We want some funding that we can work with to progress and develop other opportunities, you might say, and we've got some of those. We were properly gutted yesterday when we were advised that we didn't get some funding from - to do the, building of regions I think it was called. We had a proposal in there to do some significant work with our sheep graziers you might say, and that funding didn't come through, so now we have to find another way to do it.

Now, that's not just - that's from your - it's got nothing to do with the Murray-Darling Basin Plan, other than we had to look at alternative opportunities and that was an opportunity we saw. We needed the funding. We went into a joint approach with another shire thinking it was the strongest we could possibly build and I can tell you, there were some people at different levels pretty upset by that, but anyway that will all take its case.

As I said, we have not seen any real funding. We have heard comments, we have had some come through the (indistinct) development programs and things like that, but there is a lot more needed. We're working with those impacted communities, particularly Dirranbandi. We have a committee that operates down there once - they're meeting about once every three to four weeks, trying to put together a program to improve things in that community, and that is community driven. There are no councillors on that committee. We have our CEO and our — one of our economic development people involved, and it really - we're trying to do it as a non-political, let's build the community and let's get some (indistinct) coming out of it.

That structural adjustment, yes, it talks about (indistinct) and it comes back to the case, we don't want to be told what to do there. We don't want a handout so that people can sort of say, "Okay, I've got my money, now I'm gone". We want to rebuild our communities through that hand up process.

COMMISSIONER MADDEN: Okay. Thank you.

COMMISSIONER DOOLAN: You mentioned the 450.

MR MARSH: Yes.

COMMISSIONER DOOLAN: So as far as you're aware the scope of the 450 water currently does extend to northern communities?

MR MARSH: I haven't seen anywhere it says it doesn't.

COMMISSIONER DOOLAN: Okay.

MR MARSH: Is that - are you - - -

COMMISSIONER DOOLAN: No. Well, as we've highlighted in the draft report, the 450 is aimed at achieving enhanced environmental outcomes in schedule 5 of the plan which are South Australian.

MR MARSH: Yes. Yes.

COMMISSIONER DOOLAN: So it's just the link between the recovery and achieving those environmental outcomes that, you know, we want to make sure is a clear link, that's all. So it's a question for us, a little bit of - if the enhanced environmental outcomes are the key, then obviously water recovery needs to occur in locations which can help achieve that.

MR MARSH: Yes.

COMMISSIONER DOOLAN: Okay. Have you got anything more, John?

COMMISSIONER MADDEN: No.

COMMISSIONER DOOLAN: I haven't got any other questions, Richard. Is there any other point you would like to make?

MR MARSH: No, I've made my points and they're consistent with what we've been following up all the way through the process. As I said, we're more than happy to work with and achieve the best result we can but obviously looking at a nil further impact on the shire.

COMMISSIONER DOOLAN: Thank you for your participation and thank you very much for phoning in. Do you want to stay on the line for the next presenter or are you happy that we cut you off at this point?

MR MARSH: Yes. Is it appropriate that I stay on and then cut myself off at some stage?

COMMISSIONER DOOLAN: Absolutely.

COMMISSIONER MADDEN: Yes.

COMMISSIONER DOOLAN: So our next presenter is the National Farmers Federation, Les Gordon and Warwick Ragg and then we'll be taking a tea break. So if you do want to hang on - - -

MR MARSH: Yes.

COMMISSIONER DOOLAN: - - - as long as you like you're welcome to do so.

MR MARSH: Thank you. Then I'll drop out at the tea break.

COMMISSIONER DOOLAN: All right. Would you mind introducing yourselves and your organisation for the record, please.

MR GORDON: Okay. Les Gordon, Chair of the Water Task Force of the National Farmers Federation.

MR RAGG: Warwick Ragg, General Manager, Natural Resource Management, National Farmers Federation.

MR GORDON: Thank you. Mr Chairman, as you well know, the NFF was established in 1979 as the national peak body representing farmers and more broadly agriculture across Australia. The NFF's membership comprises of all of Australia's major agricultural commodities across the breadth and length of the supply chain. NFF has in excess of 30 members, predominantly state farming organisations and commodity bodies. For the purposes of this hearing the NFF will be elaborating on its recent submission to the Productivity Commission's draft report on implementation of the Murray-Darling Basin Plan.

There are several recommendations in there that we wish to comment on and to further discuss with the Commission. The NFF would first like to make clear its position on the 450 GL worth of efficiency measures. This is particularly contentious. NFF recognises the plan is legislated as a 3200 GL plan. This includes the 605 GL supply measures and 450 GL of efficiency measures, but the final 450 should be considered after first recovering the necessary 62 GL by mid-2019, after the 605 projects are progressed to the extent that they can be confidently delivered.

Further, the 450 acquisition should exhaust all avenues of off-farm sourcing prior to any consideration of the consumptive pool as a source, and even then it must be made abundantly clear that the social and economic impacts locally and regionally and more broadly are at least neutral in all cases, and preferably positive.

The EY report and the ministers have recognised that the existing legislated single property impact test does not properly account for the flow-on impacts to communities, irrigation districts or cumulative impacts. We also recognise that linking the funding for the supply measures and efficiency measures is an issue to deal with. The NFF is of the view that these payments should not be linked because they are distinct programs and can potentially undermine the implementation of both the supply measures and the efficiency measures.

We note that the department has proceeded with the tenders for off-farm projects and on-farm projects in South Australia, Queensland and ACT, and New South Wales and Victoria are leading consultation on a better test for socioeconomic impact following the June Ministerial Council meeting which must be finalised to deliver certainty for irrigators.

In addition to considering proposals put forward by the tender process, the Commonwealth must be proactive in facilitating and funding the options suggested by EY

in their report, along with options potentially available from state governments where funding may be required to undertake feasibility or planning work.

The NFF has been consistent in its view and advocacy that the Murray-Darling Basin Plan is a compromise plan which was designed to meet a number of often competing needs across a diverse and complex basin. I have yet to meet the person that is fully satisfied with the plan. We say that that plan, though, is the plan and it should be implemented sensibly and as designed. In that sense maintaining bipartisanship is absolutely critical now that the plan is moving into its implementation phase. Bipartisanship is what drives investment security and is therefore a key tenet of ongoing confidence in the regional economy.

One of the key recommendations in the report was to reform the governance and roles of the Murray-Darling Basin Authority. As stated in the NFF's submission, we agree in principle to split the Authority and enhancing the role of the Basin Officials Committee. While we think this is sensible and recognise that implementation requires a clear strategic plan and policy direction, we do not want this to create any delays in implementation and we will need to closely examine any separation proposal. In this context the proposal needs to be actioned promptly, and I'll come back to promptly shortly.

The other key recommendation is to extend the 2024 deadline for which supply measures need to be in operation and necessarily the efficiency measures if the payments are linked, as well as the 2019 deadline for completing the water resource plans. The National Farmers Federation acknowledges that some projects are incredibly complex, particularly the constraints measures and are unlikely to be completed by 2024. We understand the consequences for irrigators if this is not completed. More critical is getting it right than getting it done on time. Community ownership and agreement are critical components of a successful water sharing plan.

In saying that, we support a limited extension of deadlines for some projects, but it should be determined on a project by project basis, with clear rules on how this would occur. However, the NFF prefers these projects to be implemented on time and should not detract from in fact reinforced efforts by government to make sure they are implemented on time.

Before I close, there is one further observation I'd like to make. It's not part of your report, but it's about your report. This report is incredibly important to my members and the communities in which they live. I am most concerned about the timing of the release of the report and a likely response, and the reason I'm taking this opportunity of putting it on the record is in doing so I'll paint a likely scenario.

A report released at Christmas, we come out of Christmas, we have elections in two states and a Federal. We'll have various iterations of caretaker mode through that. It is easy to foresee this report not being actioned until this time next year if there's change of government and personnel and what have you, and actions from that response then not perhaps taking place until March 2020. That can't be allowed to happen. This report's

far too important, and the outcomes of this report, are far too important to our communities to allow that to happen, and it will need to be a deliberate focus of all of us to ensure that this report is responded to and actioned in a timely manner. There's time sensitive, time critical recommendations in there. We need to recognise - we all need to recognise that and not allow this report to get caught up in a political cycle that would disadvantage its outcomes.

Thank you for the opportunity. I'm happy to take questions.

COMMISSIONER DOOLAN: Thank you, Les. Do you want to kick off?

COMMISSIONER MADDEN: I was expecting you to go first Jane. I guess the linking of the funding of programs is an interesting area. I'd like to talk about. We're yet to see the detail of that. I guess I just wonder, just explore that a little bit more, what you see as, you know, how that could actually slow things down, make things complicated. What do you think the possible ramifications of that are?

MR GORDON: Look, I just think it's all too obvious that it could become a stalling - not necessarily a stalling tactic, but certainly a stalling factor, things not proceeding because - the implementation of the projects is going to, some of the projects it's going to be problematic. Now, if you don't advance some projects because others are taking time to work their way through, and to do some of this stuff properly it is going to take time. Some of these projects, some of the water resource plans, some of the efficiency projects, if they're going to be done properly you have to take the communities with you.

The only way you can take communities with you is to go and sit down with those communities, listen to their concerns, give them an understanding of what the issues are, work on solutions together and come out the other side. If you're going to do that and take time, some of the other projects that you all agree on don't get done because the funding's contingent on the one that is taking time. The whole thing just rolls out, so you either don't do your consultation properly, communities don't have ownership, or you don't fund the ones that you could have done a long time ago. So it just - it ramps up another level of complication. Just, let's get on with what we can do and work on the ones that are more difficult. You start tying the two together, it just gets -nothing happens.

MR RAGG: And it risks becoming a distraction, that, you know, we need to worry about which one's being funded when before we can proceed and you'll just end up going down a cycle where you don't want to be.

COMMISSIONER MADDEN: So we understand in a similar vein we have the 450 projects, so I take your comment on looking at options off-farm. I guess the question for me is, given the timeframes to go through a phased process of off-farm and exhausting, and then, you know, so how can you run these things in parallel, and I guess - do you have any comments on how that program design or strategy could actually work in to have things in parallel working together, but more importantly, where do you get the input as stakeholders? Is it through the states, is it through the Commonwealth? I'm just

wondering from your perspective and your knowledge, where do you actually get that input into that design so we can make some statements in our report, and as you say, that then gets to Christmas and, you know, but these decisions are kind of happening now.

MR GORDON: Now.

COMMISSIONER MADDEN: So I'm just wondering what do you think are the most important things for the state and the Commonwealth to do in this next period to ensure that that strategy - - -

MR GORDON: Around the 450 specifically?

COMMISSIONER MADDEN: Around the 450 and the EY - sorry, the EY projects and the kind of - - -

MR GORDON: So around the on-farm things. Certainly our first level of input is through the states, Victoria and New South Wales principally because they're working on a better definition of socioeconomic, and I hate that phrase, for the record. It's social or economic. Rolling the two together devalues both of them in my mind. So that's the first point of pressure.

I am sure there's probably projects ready for both in urban and off-farm. There's been a fair bit of work in that area already. I think most of the proponents would know where they're up to in their individual projects and what scope there is for further, so I think that's probably relatively doable. The on-farm component, there are people who are keen to proceed with that, I acknowledge that. On the other hand, the project that is being promoted at the moment as we speak around the Basin by the department I think is, I don't know why you'd bother, to be honest. But anyway that's their choice, and people respond accordingly.

COMMISSIONER MADDEN: Sorry, can you give us a bit more detail about that?

MR GORDON: So the ratio they're working on is 1.75. I can't see why an irrigator would seriously look at that. By the time the costs are taken out of that, an irrigator would be much more sensible to go to their bank, borrow the money and keep the water.

MR RAGG: So as the Commissioners would be aware, there's consultation going on as we speak on 450 on-farm socioeconomic measures. We're looking forward to those resolving themselves quickly in consultation with industry, and our observation at the moment is that there is still a way to go, and Decision looms large on the horizon so the MinCo will need to make some decisions and I don't think there's a consolidated position yet.

Now, it's important that community has their say, and as I understand it they are having their say, but then we need to make sure that what is proposed as the next layer of detail, which is where we're really at is able to be sensibly implemented and solves the problems that we've identified.

COMMISSIONER MADDEN: Are you aware of a step between consultation moving through to program design and options and then feedback on those?

MR RAGG: No, I've asked the question and haven't been assured that that step exists, so.

COMMISSIONER MADDEN: So you haven't been assured that it exists?

MR RAGG: Have not.

COMMISSIONER MADDEN: Have not. Right.

MR RAGG: No, I continue to look for those assurances.

COMMISSIONER DOOLAN: Can I just - you indicated a preference for a sequence in your opening comments, so the sequence for the 450 was do the 62 gigalitres, that's all set.

MR RAGG: Yes.

COMMISSIONER DOOLAN: That was set.

MR RAGG: Yes.

COMMISSIONER DOOLAN: But then finalise the 605 and then do 450. Is that - did I take that correctly?

MR GORDON: Yes, probably 450 on-farm is probably more correct. So our position hasn't really changed. We've said now as early as 2017 that we think the 450 should be done after we've got clarity on this 605 because it remains the same. I think we'd be happy for progress on 450 off-farm to happen in parallel if that's reasonable, but we really need to closely think about making sure that the impacts of a 605 don't grind into the 450 proposal, so there needs to be a step by step process, otherwise how are we going to understand what the actual impacts are without knowing where the 605 measures are going?

COMMISSIONER DOOLAN: So with that preference, that takes you to an extended time model 405 - 450 anyway, doesn't it.

MR GORDON: Yes.

COMMISSIONER DOOLAN: Regardless.

MR RAGG: Probably, yes.

COMMISSIONER DOOLAN: Yes, in terms of the on-farm component at least. Okay.

MR RAGG: But of course that depends on how far down the track we think we can go before we've got confidence on the 605 proposals. That's the pivot point.

MR GORDON: And that will vary from project to project within the 605.

COMMISSIONER DOOLAN: Yes, so that comes to the next point really which you said overall, overall it's something that we recommended as well, that we prefer to see project success for good projects, and extended deadlines are perhaps necessary.

MR GORDON: Yes.

COMMISSIONER DOOLAN: We would agree it's project by project so it's not - we're not ever recommending a blanket extension, but it is project by project which does then lead you to a gateway type process to assess that.

MR GORDON: Yes.

COMMISSIONER DOOLAN: To assess the costs, the benefits of the more detailed signs which we understand is under consideration, but then monitoring going forward, so assuming you get through a gateway and get an extended deadline for a constraint project and everybody thinks it's important, I think working in the ways that - of milestones, and assessment of milestones and insufficient progress, call it failure in advance in 2024, I think for us it's also, if you wait until 2024 to call that failure then the water recovery to breach the gap happens all at once and we've still got to think about how that might happen.

MR GORDON: Yes.

COMMISSIONER DOOLAN: Have you both got thoughts on a process that would enable that to progress in an orderly way, and then determine if further water has to be recovered?

MR GORDON: Look, my view is that the process is one around, as we've said, project by project, and we're reasonably comfortable with the gateway process, and none of that's inconsistent with the Basin Plan as it is structured now. The dates that we're dealing with within the Basin Plan now were all arbitrary, and if we can't review things like that, then why are we even bothering? So in my mind it is logical to say, "Okay, the Basin Plan said we need to look at supply measures".

We've looked at supply measures. Some of them are easier than others, so we need to be flexible enough to say that the ones that are going to take longer than anticipated in the original time scale, then we should do that and get on with the other ones, but there are going to be negotiated compromises at each of the gateways and each of the call of success or failure, but we need to be flexible enough to make those calls in an appropriate fashion as we go for water.

Time scale in my mind, as required but with some discipline. I mean, we can't do this in an undisciplined fashion, otherwise we're right back where we started.

MR RAGG: Yes, so the gateway or milestone approach needs to start being involved. We'd obviously like to look at how that works and how that gets implemented, and it may come to a point where early in that process some projects are identified as not as deliverable as possible, as anticipated, so do we need to go back and find options because you know, the last resort option for irrigators is that it's their burden and we'd like to find every opportunity to avoid that, and that again impacts on why you wouldn't rush into 450 because there might have to be some interaction in what's available there.

And I mean, we're probably going to go under resource plans, but the same applies to water resource plans. If you're going to delay any of those then it needs to - then progress needs to be identified. Gateways or milestones met or set and met are, and we need a structured approach. I mean, that's as important to the community as it is to irrigators to make sure that everyone knows where we're heading and what the risks are, and the - frankly the really delaying factor in the 605 measures is likely to be the capacity to consult and get people going with them on what the outcomes of the measures are, and that's really only starting now, so.

MR GORDON: Barely.

COMMISSIONER DOOLAN: So could I follow that up, because you actually outlined in your opening remarks effective consultation.

MR GORDON: Yes.

COMMISSIONER DOOLAN: But I would like you to expand if you don't mind on - to some extent the consultation that's occurred today, but where that leads me is, with difficult projects like constraints, is probably, you know, there's a number of difficult projects here, but constraints is an obvious one. Where they sit right now and what level of community consultation needs to occur to get those projects back on track. It would be good to have your understanding.

MR RAGG: Less quickly would be my high level - - -

COMMISSIONER DOOLAN: No, it's really important.

MR GORDON: It's - it's - - -

MR RAGG: And look - you go, yes.

MR GORDON: It's really interesting that you used the comment "back on track" as an acknowledgement that - so in the absence of consultation, and that's pretty universal, in the absence of consultation all sorts of misinformation has been filling the void or partial information, so not only are these projects now starting off from a standing start, they're actually being handicapped by misinformation, or only partial information being

circulated. The communities feel threatened by a lot of them where really they should be opportunities.

The only way that can be fixed is for the Authority, for the jurisdictions to get out into those communities, give those communities an understanding of what the problem is that needs to be resolved, what the alternative solutions to resolving that problem are, and how that might be implemented. It's intensive. It's going to burn resources, but if they don't start to do it, this will just be an angst filled place that will never come to a sensible conclusion, and the longer it's allowed to fester, the harder the job's going to be.

COMMISSIONER MADDEN: So just on that - are you confused in that area about capability and the like?

COMMISSIONER DOOLAN: No, I think that's - what it would take - - -

MR RAGG: So a narrative? A clear narrative on each of the major projects?

COMMISSIONER DOOLAN: Yes.

MR RAGG: Dispel the myths on each of the major projects?

COMMISSIONER DOOLAN: Yes.

MR RAGG: Clear engagement process, a pathway to engagement and decision points, and instil confidence in the community that is local and regional that what is being proposed has merit, and that the merit can be understood where the merit exists.

MR GORDON: And if the scale requires going down and sitting at kitchen tables then it should.

COMMISSIONER DOOLAN: Well, constraints does, doesn't it?

MR GORDON: Yes.

COMMISSIONER DOOLAN: We know that.

MR GORDON: Yes.

COMMISSIONER DOOLAN: We've done that before.

MR GORDON: And so there's a couple of other projects, Menindee to name another obvious one, so that's the sort of scale, and the trust (indistinct) from the government at the town hall with 1,000 people in front of them is not going to go.

COMMISSIONER DOOLAN: And I mean, again, clear narrative, that's a clear narrative supported by all governments, so effectively no room to misinterpretation.

MR RAGG: Yes, and I guess I'd add to that, the appearance from all jurisdictions that they're engaged, even if the project isn't in their state, that the impacts of that are understood more broadly and that those jurisdictions are also engaged and preferably present at the consultations.

COMMISSIONER DOOLAN: Sorry, John.

COMMISSIONER MADDEN: I was going to say, one of the comments you said just leads on to governance because you said the Authority should get out there and explain these projects when it's not their role at all across the whole program. There's one or two that have a role in, but it's the Authority's job on SDL projects to assess them as a regulator in time to see whether they actually meet the environmental equivalents, not to actually be a spruiker or potentially, you know, promulgate the projects because they'd actually have to test that they're valid and have integrity at the end of the process. So that is in itself an issue on the SDL and it would be good to have a comment then, but then leading on to other issues that raises in governance.

I guess the same thing with efficiency measures. The Authority has no role in delivering on efficiency measures other than, I guess, in the long term looking at the outcome of the plan and whether the 450 is contributing as it said under the plan towards schedule 5 outcomes. So that's actually a process I assume in 2026 when you actually go to review the plan, (indistinct) is the 450 effective? So I'm not sure what the check on whether water sourced in the Lachlan or the - in the Balonne actually contributes. I'm not sure where that check happens until 2026 which may be an interesting surprise when they say that it hasn't actually contributed towards schedule 5 outcomes.

However, so first in the short-term, the SDL projects, the role of the Authority, and what do this community actually think at the moment, or no, what's the communication? And then second into what are some of the key functions into the governance area that is causing confusion in the community.

MR GORDON: So around those kitchen tables that I referred to a little while ago, government is government. People don't make a distinction. What they do want to know is the point that Warwick made, is that all of government has some ownership of what's being done to these communities, and the Authority being the peak body for want of a better description, they would expect it to be there.

Now, whether they're part of the decision-making process or the assessment process or whatever isn't going to matter much to most of these communities at the end of the day. They won't make that distinction. It's for those of us that make and advocate policy that will make that distinction.

COMMISSIONER MADDEN: I'd comment though that they should know who they should contact if there's a problem because no one contacts government, they contact someone. Anyway, that's an - - -

MR GORDON: But not necessarily the right department and that's where you start to get buck passing and duck-shoving and all the rest of it. It's a consistent complaint if you talk to people who feel disenfranchised that that buck gets regularly passed. So that was the first of your question, John. Second part, sorry?

COMMISSIONER MADDEN: Sorry, just on that, so the Authority's clearly got a role to articulate their view on the success potential of those SDL projects and I think that would comfort some communities to be - see that confidence. It's a default mechanism that they will be the go-to people in the absence of any other clear identity. We can talk about splitting shortly, but I think it's - there's an expectation that the Authority is the authority, and people vest things in the Authority that's not their role. The high level process should be mature enough to be able to filter that and resolve that for the communities. The communities shouldn't have to make those distinctions.

COMMISSIONER DOOLAN: Could I just ask one last question and maybe it's - I mean, you referred to, which is not within our control, but the release and response of our report. If some of our recommendations aren't necessarily picked up, if things go on the way they have been, particularly so community consultation, what do you think could be the outcome over the next five years?

MR GORDON: I think the indecision, the angst will only get worse. The uncertainty would lead to people saying, "Well, why am I here?", which translates to, "Well, I'm not investing any money in this. I'm out of here", it would start to undermine significant investment. You're going to see investments shift away from within the current irrigation corporations to greenfield sites and they'll become more and more unviable.

I mean, there needs to be some certainty and some structure around the whole process now. If there's no ownership of, say, water sharing plans, if there's no - if - if communities are put in a position where they spend all their time and effort and resources looking for a way around what government's doing to them, rather than working with government towards a sensible outcome, then anarchy's probably too strong a word, but you certainly don't end up in a, you know, a sensible place.

There's opportunities to get this right and the previous speaker asked that, you know, we come to a sensible conclusion, I think to paraphrase him, and I think we're asking for the same thing, but some of the changes you're recommending in your draft report are timely or time bound, and if that doesn't happen, and at this stage it's really, really easy to imagine that that won't happen, then there's implications for all of us. So I guess the reason I raised it was to try and focus those that have got to respond, and we'll certainly be advocating that those that have got to respond to your report, pick it up in a bipartisan way, work together, get it done and dusted, you know, in a sensible way, because otherwise all of this process, all of this work is going to be for naught.

COMMISSIONER DOOLAN: And I think you did say communities need certainty, certainty with (indistinct), and governments have been trying to give them certainty which is behind the delivery on time.

MR GORDON: Yes.

COMMISSIONER DOOLAN: I suppose our observations and discussions around the Basin are, that's not certainty if people don't believe it can happen. It's just then a different sort of uncertainty.

MR GORDON: Yes.

COMMISSIONER DOOLAN: I'd like your perspective on that because you're much closer to the grass roots.

MR GORDON: Look, it's really difficult to interpret because communities are diverse and there's diversity within communities, so some people don't believe it can be done and are trying to, you know, are walking away or preparing to walk away, or at a - and I guess the fact that a lot of these communities are currently in drought are really causing them, "Okay, step back time, re-evaluate. I'm in drought, I'm pulling my head in for 12 months, that's going to make it a bit tougher. Got the Basin Plan there no certainty around what that's going to mean. Water sharing plans, we know they're going to change. Is that going to be - you know, what impact is that going to have on my business?".

There's just a million questions, not just of individual businesses but communities as a whole. Some think they'll be more affected than others, but 450 is clearly part of that, because, you know, South Australia can only - those environmental outcomes can only be generated from a more confined space which is an issue you've raised a couple of times this morning.

So that level of uncertainty just causes people to at least temper their enthusiasm for investment, and that's - there's no doubt that's already happening in some areas. I had a conversation as recently as yesterday that reflected that. So it's one that's happening out there now. It may not - the conversations at the moment may not necessarily be triggered by the Basin Plan, but Basin Plan's part of the equation because it's been triggered by lack of water or access to water through higher market prices or whatever. It just - it's not to say investment's not happening, but you know, with interest rates where they are investments should be coming hammer and tongs, and in some areas it's not clearly.

COMMISSIONER DOOLAN: So good, proper process - - -

MR GORDON: Good, proper processes and it's even as simple as, okay, we all know water sharing plans have got to be reviewed by the middle of next year. We all know that's not going, or not likely to happen, and that just creates some level of uncertainty. The government couldn't even make a decision - if your report's released, because of a recommendation that says that timeline should be extended and government doesn't respond to it until this time next year or later, people say, "Oh, they couldn't even get their act together to respond in time to that", you know. So it's just another opportunity to say, "Damned government", you know, and they won't make a distinction. It's - it is government in the broadest possible definition.

MR RAGG: And so a couple of things to add on that, so firstly with recognising that the report is for jurisdictions, albeit will be reported to the Commonwealth, so there will be a need for early understanding of what's in a cross-jurisdiction, so we'd encourage that to happen as quickly as possible. I haven't done the sums but I'm suspicious that there's not 25 days between the release of the report, 25 sitting days between the release of the report and the potential Federal election, so that may be something to consider.

And the third point to make is that, by the nature of the process, the draft report has socialised a number of recommendations already in the public domain. It's therefore a reasonable step that the final recommendations be socialised with or without commitment that can follow, but because jurisdictions in the industry, community need to understand what's going on, what's being proposed and work towards that. Earlier is better.

MR GORDON: The further point to that, and I guess it's a little bit obtuse, but we keep talking about community and about businesses and what have you, but at the end of the day this is about how government trusts people, and that's the really important thing. So stop socialising it across nice weasel words like community and whatever, and focus on, this is how government treats people because it really is at the end of the day that simple.

COMMISSIONER MADDEN: Do you want to do splitting?

MR GORDON: I was going to come back to governance but I thought that was a nice end.

COMMISSIONER MADDEN: Yes, we touched on it in terms of the functions for SDL but I did want to ask more widely about, there's a lot of roles, and we've raised some of them such as trading, also deliverability. You know, there's then the 2026 review. You know, so there's a lot of roles with the Authority as an independent regulator versus operator, so I'm just wondering what some of the key things that again, from community in your experience, come up as problematic in that space.

MR RAGG: They're probably not that close to it. I mean, they're probably, as I alluded to before, they just see it as one big thing so they haven't got into the detail of that. That said, our view on the identification in the draft report on what should go where is reasonable. We're content to pursue that. The pathway to implementing it is the troublesome bit. It probably needs to be done sooner rather than later, but I think there needs to be some judicious preparation to do it, so I've been in and around government for long enough now to see that vesting roles in a new entity or moving roles around comes with inertia.

There are ways to address that, have a clear articulation of what's going to be implemented and an implementation date so it can be fully or at least substantially resourced, including by the appropriate staff at implementation, not gap. Okay, we've made the decision, this is what's going to happen, and then it takes six months of inertia to get the right people in to wait for them to serve their time wherever they are and move across and for people to agree, all of that bureaucratic process that will need to take place

at some point needs to have happened before you press go rather than afterwards because we don't have time to wait six months for someone to get up to speed.

MR GORDON: In a general sense, community is saying it doesn't, as Warwick said, doesn't see that need for separation. Having said that, though, the model that you suggest they will recognise in that, one of the things that they don't like about the current process is that it's us versus them, them versus the other them and what have you, whereas people are much more comfortable if they can see, and I think we talked about a little while ago, see people working, governments at all level of government, working together.

Now, the model you're proposing re-engages the states more collaboratively than perhaps has - where it's been more adversarial in the more recent times, so the model that you proposed in the draft report tends to say, "Okay, we need to put all that stuff aside and actually start to work together for the common outcome", but more importantly be seen to be working together for that more common outcome.

Now, I think the splitting of the roles between regulator and checker is not a distinction that most people would see from a process point of view of ensuring good policy into the future is really, really important.

COMMISSIONER DOOLAN: Thank you. Thank you very much.

MR GORDON: Thank you.

COMMISSIONER DOOLAN: We will now take a break for tea and we'll reconvene at 11.15.

ADJOURNED

[11.00 am]

RESUMED

[11.16 am]

COMMISSIONER DOOLAN: We'll reconvene. Our next speaker is Zara Lowien from the Gwydir Valley Irrigators Association. Zara, you're on the line?

MS LOWIEN: Great, thank you very much firstly for allowing us to present to you this morning, but I'd also like (indistinct words) to getting involved and staying across it so I appreciate that very much.

I'll be pretty brief to start off with. Basically I've just got a couple of points I want to raise. Thank you for your draft report so far. We agree with a large majority of your recommendations, particularly those around addressing over-recovery of the alignment of outcomes and the achievement of outcomes (indistinct) scenario. I strongly agree with your language and your recommendations around providing leadership and a change of government from the Federal level right through to the Basin states.

The real challenge for industry and individuals on the ground at the moment is to understand who may be in charge but also what is the overall objective that governments

seem to be working towards. We've had a lot of change very recently or over the last six months in New South Wales in particular, and have created a lot of uncertainty and instability, I suppose, in the industry. So we definitely needed some action in a few areas obviously and we've had that but now it is getting (indistinct) and we think that also needs to come from a Federal level so we agree very much so with many of the recommendations around that within the reported findings.

The other area we thought to talk about is in (indistinct) particularly of the over-recovery that the timeframe for that in its process to that or the policy around that. We've just had confirmation with the wider water resource plan now in a public exhibition here for service water that the region is over-recovered to a point of nearly ten GL. That's been updated from (indistinct) figures which are yet to be finalised but New South Wales government report has given new figures so I assume they'll be the ones recommended to use.

That for us presents a really unique opportunity for governments to show leadership and recognise the impact that water recovery had in its previous no regrets policy, and look at coupling some of those structural adjustment opportunities financially with provision of the opportunity to purchase back over-recovered water. The legislative arrangements available for that — I think how that happens doesn't really matter, but I think it needs to be a concerted effort by governments to ensure that does happen and does happen in a way that can provide genuine socioeconomic benefits to communities that have been significantly impacted.

I think I'll probably leave it at that. My only other point at all is that the wider community has had a long history of environmental water management and use and we have achieved some great outcomes and we need to ensure that we can communicate that that better, and I think that to do that we'll need to continue to work collaboratively across a number of government levels and there is now, with an oversight towards the whole of northern Basin approach, particularly out of the Basin Plan, we may need to look at as suggested by itself and northern Basin government's arrangements for discussions and a platform and also a sharing of ideas. So as I've said, wider (indistinct) water (indistinct), particularly since the dam was built. It wasn't called that at the time but it was called replenishing for the wetlands and so we have (indistinct) and I think there's an opportunity to share that knowledge amongst the different valleys, between industry as well as (indistinct) water managers in the community, we all have different values in our water, I think and I'll leave it at that if you have some questions.

COMMISSIONER MADDEN: Thanks Zara. Just for me, given this particular northern Basin issue around the toolkit and the deal sheet and the like, I just - we've had a conversation this morning about the SDL and how it's kind of starting getting into gear. I know we've had the northern Basin Commissioner come on board. Would you be able to provide us a bit of an update of what action or activities are happening in the north in regards to the toolkit, its governance, its management? We've made some recommendations in that area which is good to get some feedback, but just a bit of an update of, you know, what's happened in the last three months in that space.

MS LOWIEN: Well, officially there hasn't been a lot locally in that space. I think around the whole leadership in government problem, I think we need a great deal of clarity around the toolkit and the deal sheet. They are two separate things. I would have to - I don't want to assume that they're interconnected, but I believe that they are in some way or form, and I think we need to have some engagement on who's leading that as indicated in your draft report. I believe the states are - in particular New South Wales and Queensland - are meant to be working on business cases. I'm not sure if the business cases are only for the toolkit or whether they're required for deal sheet requirements as well, but I think we need to sit down and actually work out, well, what are the things we can do. What is the total bucket of funding that we're talking about. Obviously we can estimate that based on the water that doesn't need to be recovered now.

But in particular for Gwydir constraints. It continues to be one of the key flagship toolkit measures. We have not seen any progress on it. Local land holders in and around the area of concern have been consulted for a number of years now, and in fact I would assume that the project is ultimately led by OEH and to my knowledge they've had no information or I've seen no further versions of that project going forward. So I would agree with your findings that it would definitely need some clearer rules around projects, how to get consent to put in reports and some timeframes on when we expect to see those be prepared and assessed and then also potentially implemented.

COMMISSIONER MADDEN: So New South Wales hasn't sketched out any broad plan around resolving those kind of issues?

MS LOWIEN: Not with our organisation, although I have met with the MDBA more recently and there was a discussion about working up some business cases within the next short period of time, but there's been nothing formal in terms of an approach to us or from any of our members in regards to the constraints project, which is very concerning for us because obviously if that's its flagship project it could take roughly half the amount of the toolkit budget if not more, and it could take years to implement, so what is the - how does that impact the Basin Plan overall if it is a ten-year project, for example. We haven't had those discussions.

COMMISSIONER MADDEN: So just in those discussions with the Authority, what do they say is their role in a project like that and within the toolkit?

MS LOWIEN: I think they're still working out their role in the toolkit and the deal sheet but I believe it is an overseeing role and a recommendation role to funding, kind of like an assessment approach in terms of does it need to, the toolkit in particular, does it help address an improvement in environmental objectives and outcomes as modelled under the Basin Plan.

That is what I got out of the discussions with them, but I think there's still a lot of internal government discussion around the role and I think you touched on that in your draft report, and I think it's getting to a point that there is so much on individual agendas at a local level and all the way through both state and Federal government projects that it's

time to start sorting this out so we know who's in charge, who do you go to if you've got a problem, or if you've got a solution, and that is not clear at this point in time.

COMMISSIONER MADDEN: All right. Thank you.

COMMISSIONER DOOLAN: You mentioned that Gwydir's water resource plan is out and that's one of the early New South Wales ones. We were actually in Dubbo yesterday and heard a great deal about water resource plans that potentially have been complex. Were there any serious rule changes that needed to be shifted in Gwydir, or was it a fairly smooth process?

MS LOWIEN: There's a bit of a long history in Gwydir. I think all regions would say their water sharing (indistinct) all relative to the valley. The Gwydir was a tireless project and we in fact have gone through a review phase and (indistinct) before New South Wales (indistinct) were brought into the water resource plan, so we've gone through the initial review phase now twice, and now come to the end of the water resource plan.

The frustration from leadership and local stakeholders around the table was that there are a number of issues that will remain unresolved. There has been minimal change. There has been some good change, some amendments to this change and also some agreement to prepare maintenance operational changes and putting them into the plan to provide security and new opportunities for environmental managers in particular, but from an industry perspective there are a couple of quite key issues that we want to look at that either weren't progressed because of uncertainty around the model at the time, particularly with floodplain harvesting not being fully implemented yet, and that's one key aspect that is missing at this point in time is still under review, and then another part in terms of that they ran out of time and didn't have the (indistinct) to model another issue (indistinct words) allocation, so the short answer, that's a long answer, but the short answer for you is there will be minimal change. They need to have (indistinct) that are quite well progressed and may not have - may have a couple of key issues. There will be unlikely to be significant change due to the inability to, one, test that, and then to provide the right level of assurance that there is no impact on either side of that (indistinct), and it comes back to a concern we had with the way the Basin Plan was structured and the way the water resource plan process goes and the requirement needed to show that improvement from phase 1 and (indistinct) conditions and it's providing - the Basin Plan, one, to provide opportunities for the new evidence from science companies, for example, updates based on the (indistinct) limits which is what's happening over healthy flood plain projects at the moment re-estimating our base line.

Then on the other hand there are really quite prescriptive rules around if the rules changed whether it benefits - how it impacts or has no net impact on the environment even though it might more efficiently provide the opportunity to share resources and provide benefits to the environment for (indistinct) water allocations, that can't be balanced out and we're finding that to be a really, quite a difficult discussion point, and getting enough evidence in time to work through that complex issue when this process is not going to be available. So it's a real - it'd be a real shame to see those water sharing plans that are now 16, 12 years old, 2004, yes, 12, 14 years, 15 years old, and we're not going to see significant

change, particularly because of that even though we've been reviewing this now for nearly five years.

COMMISSIONER DOOLAN: So even if the environmental water holders and irrigators work their way through win/win, there's difficulty in having that accepted, is there?

MS LOWIEN: Well, there's difficulty in getting - - -

COMMISSIONER DOOLAN: The information to show that.

MS LOWIEN: - - - the agreement to - yes, the information to show that, and a willingness to put significant time and resources behind that in some cases. So there might not be agreement - a (indistinct) agreement from around the table but there could be an agreement to pursue it and look into it.

COMMISSIONER DOOLAN: Yes.

MS LOWIEN: And then you make a judgment call based on the outcome, but we, for example, one of our key issues in terms of supplementary and looking at a new accounting framework for that was just a blanket, "We don't have resources and time for that", and I feel that we're now looking to that sharing arrangement which may not be the most efficient process and we'd probably be locked into that for another ten years, and I think that's the, you know, disappointing outcome for everyone who has been quite patiently waiting for that ten year review and also the opportunity to then develop the water resource plan and then change being able to make significant change.

COMMISSIONER MADDEN: So just on that, has anyone talked about how there would actually be changes and amendments and the process under an accredited plan to actually do something before year ten?

MS LOWIEN: Yes, we have raised it as wanting some more, some more clarity around what would happen with the issues list that couldn't be addressed, and to my understanding there is, there is definitely something within the Basin Plan to do that basically in New South Wales (indistinct) for accreditation (indistinct) plan. If that was a material change they would have to go and probably get permission again, but at this stage I haven't seen a process presented to New South Wales on how they would do that, whether it would be five years or ten years, and as the - something like 11 schedules and attachments for the water resource plan. I haven't quite stumbled across the clause yet that might tell me what that could be in terms of the package of documentation we'd have to review to (indistinct). It's quite significant and overwhelming for a group like ourselves, let alone an individual to really get their heads around the impact of change and opportunity in the future.

COMMISSIONER MADDEN: Zara, on that plan itself you said the floodplain harvesting is not completed yet. Is that likely to be completed by the time the plan is actually put to the MDBA?

MS LOWIEN: So I have had discussions with both New South Wales and the MDBA on that. Because of challenges with confidence in (indistinct) gone through many of the peer review process issues kicked off earlier this month, so that will take us through to nearly April of next year. New South Wales could have presented the Gwydir water resource plan before February and for accreditations that they were going to hold off, so what they will do is, they'll hold off until (indistinct) can be included and then accredit both that being finalised, so MDBA are aware of that timeframe and they're not expecting or anticipating, particularly the northern valley, to go through accreditation until after (indistinct words) been finalised. So that puts us in for accreditation process in April which will also (indistinct) accreditation for New South Wales (indistinct).

COMMISSIONER DOOLAN: So, sorry, if you don't mind, it's just that we were in Dubbo yesterday and so we did hear quite a lot about water resource plans in that region and the uncertainty about floodplain harvesting, and confusion about how floodplain harvesting is included in the BDL and the SDL, what does it mean for (indistinct) water. Has that been - is that confusion shared by the Gwydir Valley or is it actually (indistinct) out and we do understand that and it is clear?

MS LOWIEN: So the Gwydir Valley that had probably a long history with floodplain harvesting, we are again the pilots for (indistinct) projects.

COMMISSIONER DOOLAN: Right.

MS LOWIEN: We - floodplain harvesting as a project is all about re-estimating and providing a better estimate of our BDL which then provides a new answer for the SDL approach, so we are anticipating our baseline diversion limit to be changed to incorporate the new estimate for flood plain harvesting. I'm not sure what that is or it will be at this stage but we always knew throughout the entire development of the Basin Plan, and indeed the development of our water sharing plans back to 2004, that the estimate provided in the model for floodplain harvesting was incorrect. It was underestimated floodplain harvesting, legitimate floodplain harvesting access and this project is all about re-estimating that and then providing a volumetric (indistinct) for that and there is a communicating and understanding what floodplain harvesting is in a challenge because it's often perceived as new water, but in fact it is a long-standing, historical form of (indistinct) licence under type 2 of Part A, both under the Water Act of 1912 and then also incorporated into the Water Management Act allowance

Now what we're doing is transitioning what is an allowable activity and creating a volumetric licence for that which is part of the National Water Initiative requirements, so it's not actual new water. It's just providing a volumetric estimate to what that water take is currently and getting confidence around how that number is estimated, is where we're currently in discussions and going through the peer review process because we need to understand how the model can improve to make sure we have the confidence that the number is a good estimate because if you over-estimate or you under-estimate and we need to have an agreement of the level of certainty or uncertainty around that and then create an accounting framework tool and manage uncertainty.

So the clear message for me on floodplain harvesting is, it will provide a new estimate for baseline diversions across the northern Basin. It isn't new water, it's just re-estimated water that is already taken and diverted or intercepted and just allocating that volumetric number as opposed to either a model estimate or a floodplain lot number which is currently sitting in (indistinct) so we've still got some way to go if you get that in place where all stakeholders are in agreement.

COMMISSIONER MADDEN: So, just Zara, just for clarification, the point you haven't mentioned, that is the SDL once the BDL is better estimated. It's my understanding to achieve the flow indicators and the like that the SDL would be adjusted as well, but what is the understanding in the discussions you've had under the water resource plans?

MS LOWIEN: Yes, so the way the Basin Plan is written is, the SDL equals the baseline diversion limit, the number required for water recovery. So the number required for water recovery doesn't change. It's 42, and if the baseline number changes through better information which is above the help flood plain project should do. That means that the difference of those two numbers would change, but in fact it's a relative change because it's a new estimate. You wipe 42 off it and you get an outcome. In that scenario, for example, the current sustainable diversion limit model for the Gwydir system, Appendix C of Schedule F of the Water Resource Plan, that's part of the appendices and schedules I've got, it goes through the process of that calculation in the model used so that the number that they use changes up by, say, you know, a number X is just a new calculation where everything just goes up by that amount.

COMMISSIONER MADDEN: Yes, so 42 remains the answer.

MS LOWIEN: The 42 remains the recovery required. Yes, and I'll say that the 9.90 GLs over-recovery essentially stays the same answer because it's - the number goes up under both scenarios.

COMMISSIONER MADDEN: Yes. I just wanted to clarify because there was, as Jane said, there's a lot of different misunderstandings with stakeholders and informed stakeholders of that.

MS LOWIEN: Yes, it's a - it goes back to my point about this not being new water. It's just that the a perception issue, and baseline diversion number isn't a set number in time. It's actually just an estimate, so it could go either way with new estimations, but in fact in this case it most likely will be going up.

COMMISSIONER MADDEN: Yes. So I wanted to ask one area about environmental watering, and I know the Gwydir, as you say, has a lot of experience with (indistinct) and the ECA and the like. From your perspective in terms of how those arrangements are working, given that there is a change of OEHL obviously being there, but then the Commonwealth having holdings, so is that process - I know you then talked about the

whole of the northern Basin and welcoming some of those suggestions there, but are there lessons at that, I guess, valley level in terms of how things have worked?

MS LOWIEN: Yes, I think there is, and we've had an ECA committee meet for water sharing plans and that is a statutory requirement (indistinct) and it has evolved over that time and that's now been called an (indistinct).

I think some key lessons and I've only been a part of it for about the last seven or so years, finally seeing good representation from those within the community and getting them the evidence from both the water managers, you know, the scientists and having the right decision-makers around the table so that you can come to a good informed decision, but it's getting the right local representation that sometimes you, whilst at the local based approach, we might have more agency people from various levels of government being there to, you know, give a strong opinion that if it's for our environment, for our local community they should have a very strong voice in that, although I feel that sometimes it's a lot of people from outside telling locals what they should be doing. Now, they should be given the information to make the decision best for both the environment and community in some cases.

So I think there could be some better consideration around that. I think there could definitely be some streamlining in the planning and the government's arrangements and I know that information projections about that and we've been looking at all the different types of long-term plans and short-term plans and annual plans, and it's really hard to keep up with them and I think we need to streamline that significantly, and in reality the CEWO and OEH, while they hold two different portfolios under different names, they operate as an entity.

So we are duplicating in some cases governance, when in fact it could be a joint decision and that be streamlined much better. So I think we need to come back and constantly be stopping and reflecting on those arrangements over time, and in Gwydir we might be able to jump ahead with new structures and new ideas, but in valleys that don't have that issue, well, they might have to - they're in a different phase in their group development and they might not even have a group yet, so it's really quite important to get the right people on the ground in a proactive manner.

COMMISSIONER MADDEN: Thank you.

COMMISSIONER DOOLAN: Sorry, I've just got one, that was the one you started with which was over-recovery. Gwydir is one area where that's been (indistinct) signals we've heard. We made a draft recommendation about governments having a clear policy about how they would deal with over-recovery, not necessarily immediately in 2019, but to provide some certainty about in what timeframe they would look at it, what they would take into consideration. Is there anything - I mean, you opened with that. Is there anything that you would like to add on that?

MS LOWIEN: Look, I think getting agreement in a policy to, one, recognise it has been a challenge for us and now the water resource plans (indistinct) kind of cemented in more

firmly for it. I think having the policy agreement to express it is one aspect. The timeframe is really quite key so whilst it might not be able to occur in 2019, I think if it's extended for too much longer you're pushing into the ten years since the water was initially (indistinct) in Gwydir. If it goes out another ten years, that's 20 years where we've had lots of lost production that may not need to have occurred.

So I think we need to be really cognisant of the impact and the long-lasting impact of that as it extends further and further, so I'd like to see something, an agreement to have a discussion on it by 2019, just (indistinct words), and then have a very firm timeframe that isn't too far out to provide communities some assurances, and my - our recommendation here would be to look at how you can integrate the opportunity of over-recovery and with other structural adjustment opportunities, and one here is determined by the market water back to production. There is an opportunity to maximise that benefit for the broader community if the type of entitlement is considered as a high security option. For us that provides not only a larger economic and socioeconomic benefit through higher employment, it provides us a greater economy of scale in that the permanent plantings of which we could then capitalise on possible inland rail opportunities and we might see a change in structure to provide a more consistent level of agriculture (indistinct) cycle because of our low reliability on other entitlement categories.

So my addition to that one is to definitely couple it with other structural adjustments, look at the structural adjustment opportunities that exist in the government portfolio already, like in the NBN, for example, fast-track that and then add that with water, and we could make a significant impact to some communities that have unfortunately suffered more than they technically needed to.

For example, obviously 9.9 gigs, possibly over, or most likely over up here in Gwydir, if that was high security that would be about 11,000 megs of high security. That, depending on the crop, so if I was to use nuts as an example which is a pretty significant permanent planting here already, another 1400 hectares, would almost double from the planting here for pecans, and for every hectare of pecans you're looking at about 15 (indistinct), and obviously there's a (indistinct) across the numbers affected (indistinct) that's significant. That changes the fact that we have then local growing services, with local processing. Put all of that on a train to somewhere and that would really change the economy and I think that's the opportunity that they need to see.

COMMISSIONER DOOLAN: Thank you. Have you got questions, John?

COMMISSIONER MADDEN: No. Thank you, Zara.

COMMISSIONER DOOLAN: Thank you very much, Zara, we'll leave it there. Now, you're welcome to stay on. We next need the phone at about quarter to 1. If you want to stay on you're welcome, but if you don't that's fine, we'll cut you off. What's your preference?

MS LOWIEN: I'll politely decline if that's okay.

COMMISSIONER DOOLAN: Okay. That's fine.

MS LOWIEN: I've got something on in a little bit so that's wonderful. Again, thank you for the opportunity to present and via this phone. That's wonderful.

COMMISSIONER DOOLAN: Okay. Thank you. We appreciate it. Bye.

MS LOWIEN: Bye.

COMMISSIONER DOOLAN: Okay, our next speaker is Jack Holden from Fonterra. Jack, if you wouldn't mind introducing yourself for the record.

MR HOLDEN: Thank you. Thanks for the opportunity. I'm Jack Holden. I'm the sustainability manager at Fonterra Australia. That's my day job. Part of that is being a part-time support for our dairy suppliers on the water-related issues, particularly in the Basin but not just in the Basin. So we, yes, we appreciate this opportunity. I'm not going to read all of this, but I'll just give you some highlights from that and, yes, look forward to the Q&A.

Just an overarching statement, and I, look, I just thank the NFF for their contribution this morning. I mean, the expertise that they bring to this is well beyond what we can resource internally inside a dairy company. We're good at making cheese but there are other things that I think, you know, the expertise is elsewhere, so we, you know, we endorse all that pretty well from our point of view. I think it's ironic, I suppose, from the dairy industry's point of view at the time when this is such a live issue.

Our largest dairy company, Murray Goulburn, named after two of the biggest rivers in our - has gone through a, you know, a transformation and now it's been sold, and so their capability to sort of sit with us and present on this basis I suppose is understandably hampered, so you know, we do feel it's an opportunity to actually sort of put the view of dairy processors, but there are others apart from us who are, you know, essentially in the same position.

By way of background, Fonterra, it's the second largest milk processor in Australia by volume. It's a New Zealand-based cooperative. The Australian farmers we have here are essentially contract farmers. They don't own us and we don't own them. They're independent businesses that are free to come and go, you know, as they see fit I suppose.

We collect about 2 billion litres of milk across Australia. It's mostly Victoria and Tasmania. It's no accident dairy in south-east Australia is the most profitable part of the dairy production areas, and we have about 1200 farmers across that area. We have seven manufacturing sites, 1600 people employed in Fonterra and in Australia in sort of ongoing jobs mostly in rural communities.

Our footprint in the Basin is the Stanhope Processing Facility which provides about 200 jobs, 200 sort of ongoing jobs, and some contract labour around that, particularly in the construction phases that we're going through at the moment as well, and we source from

around 200 farms that directly source into Stanhope as the first point of receivable, pretty well in the GMID, although there are some sort of further upstream in the sort of north-east catchments, but mostly Victoria and a couple across the border in New South Wales.

By way of context, in 2014 the cheese plant in Stanhope in late 2014 essentially was damaged by fire. The plant burnt, a considerable part of it in an accidental fire. We deliberated for a long time about do we rebuild. That was a pretty key sort of business decision for us. We went to a considerable effort to keep our staff on during that period of uncertainty. The decision to rebuild was made basically in response to a global demand for export cheese.

Northern Victoria's got some attributes in terms of milk volume and seasonal conditions that do suit a cheese production facility so we've committed some hundreds of millions of dollars to set that up. That rebuild continues but you know, progressively we've been able to take more milk back in there and put people back on the payroll to do that, and you know, we're months away, I think, from sort of completing the final stages of that build.

I think part of that - sorry, and the important part of that is that the customers we're looking for here is not a commodity market. This is customers who are, you know, high value. They want a predictable supply of a quality product from a consistent sort of supply chain. So it's very much trying to take our farmers away from exposure to a commodity price into something that's got, you know, much more resilience in what we can afford to pay back in milk price away from just, sort of, you know, putting powders into the market on whatever day it is.

The farmers are, I suppose, the primary reason for our interest in this right now is the 450 GL and we'll talk about the upwater, give you some sort of context around that. We've made a submission in the previous process here in some of the sort of key points of agreement around that. I've outlined in that and I won't go over those. On the whole we're very happy with, you know, the material that's provided in the draft report. We think it raises some really important issues that we do think need to be addressed, and I'll just reflect on a couple of those particularly now.

I think the first one, I suppose, is just, is the governance questions. I mean, we're not governance experts and we rely on others to do that, but it does seem quite disjointed from an outsider's point of view about where is the point to access government, and are the government agencies talking to each other around that. So, you know, the MinCo process is essentially invisible to us. The process of actually who you go to and who you would hear from seems quite unpredictable and I think some better way to structure that so that the decision-making and the monitoring, and you know, the proposals that you have in the plan, in the draft plan, you know, may well do that, but certainly for us who are, you know, looking for efficient engagement, find that the current model is very difficult to navigate and we do rely heavily on sort of, you know, insights developed by experts and it's not a very engaging process for us and I can imagine it's even less engaging for our farmers, and that's certainly the feedback we get from them.

I think that sort of leads into a sort of discussion around stakeholder engagement. The culture of stakeholder engagement across the, you know, different parts of the Basin Plan process, you know, from literally a decade ago has been quite chunky. Sometimes we feel like we're part of what we call like a lucky dip invite process. You get invited to some things and, you know, we've been - some of us have been in northern Victoria this week, had discussions that were given invites sent out on the Thursday for discussions that started on the Monday or Tuesday of this week. You know, it's just - it's just not possible to get the right intellectual response and to get the right people engaged to get a corporate view in that sort of timeframe. It's a very difficult sort of process for us to do. So we feel like there's got to be some hardwiring of stakeholders into that process rather than sort of, wait until we cook it up and then show it to you and then, you know, hopefully can get through that process before the deadline runs out. I'll come back to deadlines too. I think that's an important point.

Our primary concern is water recovery for socioeconomic tests for the 450 and I think our initial thoughts on, you know, two, perhaps three years ago was that water recovery through on-farm efficiency was okay. I think we've changed our view. We've changed our view and our view now is, no, that removal of water from the consumptive pool presents plenty of challenges to us and to our farmers and our view is now that that's a real challenge. I mean, obviously that is made worse by the fact that it's, you know, available in some states still and so a removal from the consumptive pool puts a challenge on our suppliers who have to face the increased water price somewhere else with that change going on.

We're very supportive of the concept of farm efficiency, so don't for a minute imagine that we don't see great opportunities around making our farm base much more efficient. You know, we've got a full-time northern Victoria farm water efficiency manager who one-on-one engages with farmers about their water security position and looking at all sorts of technology changes that might take them to a better place and you know, the gravity fed only model that we've gone to, or that we've inherited I think is, you know, we know the days of that are numbered if we're going to be a competitive world producer of food. We do believe the market will sort that out, though, so farmers will, on their own balance sheet, you know, we've heard this comment this morning, on their own balance sheet make sensible decisions about improving the upgrades on their farm, that government intervention in that right now is actually not going to help us, I don't think, in the short term, and we just think, you know, let the market sort that out. That will happen.

Our experience is that the dairy farmers in the GMID that we work with who have participated in public funded on-farm efficiency projects in the past have all returned to the market and water to take them back to where they were previously, either, you know, from local or from other places. It's almost unheard of that they don't, in our experience, for the farmers we do.

No doubt there's great benefits there in terms of lifestyle and great benefits in terms of from efficiency upgrades. Certainly benefits for the service provider industries that, you know, get on to the end of these sort of projects, but we're less sure about the water

efficiency benefits just yet, and you know, would like to see some more evidence around consistent improvement that comes from that rather than just anecdotal one-off stories in areas that are perhaps not replicated or what we do currently.

I think there's plenty of evidence that Victorian dairy farmers particularly have carried much of the impacts, you know, given the water pricing and where it is, of water reform today. We can't really afford to make them worse by removing additional water from the consumptive pool through on-farm efficiency. Even currently if they do go off and make efficient improvements on their own balance sheet, that water will then become back available into the consumptive pool and we don't want to actually lose that by taking it out right now when it will come back, so theoretically it's available, practically it's not just yet, but over time it will come back and we actually need that water to actually underpin the production we've got.

Milk processing in essence occurs locally, so the impacts of - the social and economic impacts of water removal in milk processing particularly are strongly felt. We estimate that for every dollar of lost farm income from - for whatever reason, there's another dollar in the local community, in the Basin, from processing or transport jobs, and it's at least another dollar in the value add that happens nearby. It doesn't happen to a lot of other commodities that are, you know, shipped outside of the Basin where the processing occurs, but dairy, I think is quite peculiar in the sense that there's a lot of value add nearby and any socioeconomic tests need to consider the loss of not just the impact on the farm at the farm gate, but the impact in the wider community that is still very much within the Basin in the dairy point of view.

So any socioeconomic tests, and we're of the view that it needs to be much stronger, needs to consider that additional (indistinct) piece. Clearly our factories are, you know, unable to handle - sorry, are able to handle small changes and fluctuations, but large changes we can't just pick up a piece of our factory and move it to somewhere else in our network. They are here for the long term and volume actually matters. They have fixed costs. Those fixed costs have to be underpinned by a, you know, a high amount of volume going through that to make the product that comes out competitive against exports from other places. So it's, you know, the scale really does matter from that point of view.

I think the other point we'd like to talk about is, we just need time to develop more innovative solutions here, I think. There is probably ways that we can do this and, you know, we would possibly look at things like, you know, maybe there's ways of tagging the water, maybe there's ways of doing long-term lease backs following a sale or something like that where we get things in place, particularly constraints. It worries me that we're going to recover water before a constraints process actually demonstrates that we can actually move that water and have the benefits that it's talking about. We would be very reluctant to give up that water and then find that it's actually not usable. How do you sequence that in a way or how do tag that in a way I don't have the answers to and I'm relying on, sort of, you know, people with certainly more time but also perhaps more expertise in this to go and build that for us, but I think some work and some effort needs to go into that.

We're completely on board for the fact that we need to deliver a Basin Plan. We don't want to have a process that runs outside of that, and putting water back from the over-allocation of years past is an important part of that, but the pathway to doing that is super critical for us.

I think the - finally, I think the other point, I think, is that we need to acknowledge that the adaptive capacity of our stakeholders, and clearly they're part of the Basin stakeholders generally, their adaptive capacity tank is now low, so we've come through a couple of decades of water reform. The ability of people to make, you know, good decisions in difficult times, not just because of, you know, climate conditions, but because of reform.

After two decades, people have tuned out. A lot of our supply base are not engaged in this anymore. They won't turn up and they're going to make fire sale decisions rather than good, thought through business decisions based on, "What are all my options?", and I think our job is to just give them time to recover, to go back into these decisions they need to make to reform their businesses and restructure whatever they need to do, and allow that to happen in a reasonable timeframe.

It's an emotionally raw, very - it's a very raw, emotional journey for some of these people, and I think the progression of water reforms are now, the decision to enter into an on-farm efficiency project are not - is a really difficult place for them and we genuinely look forward to some opportunity for them to do that in a considered way rather than in a hurried way, and this is, you know, compounded by sort of, you know, at a lower level I suppose. You know, even the GMID connections project is bringing us some of those decisions, people too who were not ready for that.

Our experience is their, you know, their ability to make good decisions in that process will not have improved by the time we get to the decisions about whether I should take an on-farm efficiency project, and so we encourage you to, sort of, pass that on in your final report that the time for people to make good decisions is really critical.

The confidence matters, this is underpinned by farmer confidence, and at the moment we've got a structured process around certainly capping farmer confidence and perhaps even eroding it through the way the Basin Plan's been rolled out, and the final deadlines are looming upon us where we really don't have a clear pathway and a logical sequence of actually doing these tasks. So I think that's how we (indistinct) around, just making sure the timing here leads to good decisions rather than just sort of hurried and adverse outcomes that were unintended.

I will pause there.

COMMISSIONER DOOLAN: So could you elaborate for me, timing's very important. What does that turn out to be in practical terms? If you were the Commonwealth designing this program, what would you want to see shifted and changed?

MR HOLDEN: I think it's about the - the rubber hits the road for us on the farmer's decision to take up an on-farm efficiency project and sell their water back, you know, to the Basin, to the government, and for that to be a public and open tender process without consideration of, you know, local and business and community impacts, and without them being given, and presumably it will be a, you know, like it seems to be in South Australia at the moment, a short time scale to do that.

So the planning process will be, you know, perhaps not fully thought out on every property and people make rash decisions that some time later they'll come to regret and I think our experience from the previous rounds is that, "I wish I hadn't sold the water. I wish I'd done this myself". So that's the decision point that we need time to get ready for. In terms of from a regulatory point of view what needs to happen to allow that, I don't know. I mean, we're not - - -

COMMISSIONER DOOLAN: Well, not even regulatory, but program design.

MR HOLDEN: Yes.

COMMISSIONER DOOLAN: So at the moment the program design is around tender processing individuals to actually participate.

MR HOLDEN: Yes.

COMMISSIONER DOOLAN: Any thoughts that you might have on a program design that did allow - skip the definition, if you like, but almost a program design that allowed a region to sort of work something through. What would be the key elements of that from your perspective?

MR HOLDEN: Yes, yes, I mean, look, we haven't done the thinking on that properly. I mean I can't give you a list of principles that you need to go to

COMMISSIONER DOOLAN: No, sure.

MR HOLDEN: Except to say that, you know, they're the rocks we need to look under and we're completely on board for that, and let's - let's make sure the right people are in the room to have that discussion, yes.

COMMISSIONER MADDEN: Just on that, you talked about having an invitation to discussions this week. Did you go to any of those?

MR HOLDEN: Yes, so we had representatives at, everywhere except Mildura, I think. I was at Shepparton on Wednesday evening and Echuca earlier the same day.

COMMISSIONER MADDEN: So did they look under those rocks? Are they actually talking at those meetings about program design, about regional impacts, about options other than tender? Do they consider off-farm versus on-farm? I'm just wondering what that - - -

MR HOLDEN: Yes, I mean, I think - I mean, it was reasonably clear that off-farm was our preference, right? And I think the department's view was that that's where you go to first. You know, I'm not going to speak for them. I'm sure they've made their views strong to you as well, but that's clearly what we think. I mean, let's go and recover water everywhere except on-farm. Do all of that to the extent that you possibly can, but then what do we do after that? I don't think they had any sort of, you know, clear process for identifying those and putting them in place given the time scales that we're working to.

COMMISSIONER MADDEN: So I might re-ask the question a little. We haven't seen those processes. I'm just wondering, do they give you any indication that the process of design that they're going through, which they are, and the consultation is to assist them do that, do you think they will actually through that process get to a point where some of the issues that you've raised will actually be considered or do you think it'll be, well, let's do some off-farm and have a tender process?

MR HOLDEN: My view is that, I mean, all of those things will be considered, but the deadline is the deadline was the message we got.

COMMISSIONER DOOLAN: And that's an issue?

MR HOLDEN: Yes.

COMMISSIONER DOOLAN: You need to be able to the planning.

MR HOLDEN: Yes.

COMMISSIONER DOOLAN: Think it through to work it out.

MR HOLDEN: Yes. Yes, and if you've got that deadline where it's got to be delivered, and you know, you guys know more than me what the MinCo decisions and the, you know, NFF discussion about, you know, if we don't get anything planted soon it's another year before we actually get anywhere and get agreement. I think that's the issue for us.

COMMISSIONER DOOLAN: Thank you.

MR HOLDEN: I mean, the mechanism where you can actually, sort of identify something, run the decision-making parallel, but have the ability to have a no go, or go decision on the recovery at some other point down the track when we're confident that it works and everything else is in place, I think rather than having the go, no go decision being the first thing you do which the tender process currently does. So you lodge a tender and then you're in or out, right? And I think that's the wrong way around. Let's do the thinking, agreed that if we can land somewhere that we're okay with, then here is the parcel that goes to this purpose, or whatever it actually looks like, but if we can't land that, well, you know, then the project has failed the socioeconomic test, and the recovery is not possible. You know, so maybe it's just, you know, you can have a pipeline of

possibles, but it's not an irreversible decision before sort of, you know, December this year.

COMMISSIONER DOOLAN: You talked about innovation and with more there is the capability to develop better solutions. Now, it's probably a bit hard to go, "Okay, give me an example of that", but even the sort of indication of what might be possible.

MR HOLDEN: At a farm scale, you mean?

COMMISSIONER DOOLAN: No, whatever.

MR HOLDEN: Yes. Look, again, I mean, I think it's about being able to say, "Look, I can see ways of making my farm better and improving my production and, you know, using water more efficiently". We have no problem with the idea that for every meg that gets on to our farms we need to get more production off that meg, and if we give people the next couple of months to sort of work through a, "I'm in or out of an on-farm efficiency decision", they won't make the right decision.

They'll go with the service provider, the technology, the person that's knocking on their door saying, "I've got a project for you. Now, my commission's the lowest", and it will be very much driven by the demand to get a project nailed rather than, "What's the right thing for my farm? What's my soil moisture sensors that I've just installed tell me? What's the data Agtec guy sold me that I've been monitoring for a while? What does that mean for succession and aggregation", or you know, they're the right sort of bundles of a good decision, and I think we'll end up with something that's sort of, look, you know, here's a, well, actually a one size fits all approach, and you've got to make a decision pretty soon, and we will not get good outcomes, and the scope of innovation in that is very low.

In terms of innovation about the decision-making process than I'd have to defer to others about how - - -

COMMISSIONER DOOLAN: You referred to some farmers, and I know it's only anecdotal, but have regretted having participated in the past?

MR HOLDEN: Sorry?

COMMISSIONER DOOLAN: Regretted participating in the past?

MR HOLDEN: Certainly one of our farmers spoke up at Echuca about they'd done two on-farm projects. The original one was funded, you know, through the original Basin Plan on-farm efficiency projects. They've done a subsequent one which they funded themselves, and they wished they'd done that the first time. It's, you know, given water pricing the business case for doing on-farm efficiency yourself actually makes sense. I think that's - that's the realisation that our progressive farmers have got to is, why would I do this, you know, in the structure that puts the water away from me, and then had to go into the market anyway. I mean, we've now got an asset that really does work well and

has great water efficiency, productivity, lifestyle, you know, benefits for - for the farmer. The natural tendency is, “Well, I should put more water through this”, rather than less, and I think that's - they work that out, yes.

COMMISSIONER DOOLAN: John, have you got anything?

COMMISSIONER MADDEN: I guess just a quick question about delivery on this and again it's another part of program design, and it's from your experience and water efficiency guys who go around and what actually works in that planning phase. I look at some of the things in New South Wales where you actually - the PIOP programs, we actually had the infrastructure operator working with a group of farmers doing that planning over a longer period of time and basically tailoring a solution for a group of farmers which is very different to the Victorian early experience of system reconfiguration. So I have some experience of that local scale, and I can see where that can work in places I know.

I'm just wondering how that could actually in Victoria what are the mechanisms? Is it CMAs? Is it, you know, the Goulburn Murray, GMW doing that at a local level? Have they got the capability to do that? Is it a mixture? Because obviously we've got private operators going around doing that kind of thing and then the companies are in there doing it as well. It just seems a lot more fragmented in northern Victoria than places I see in New South Wales, so I think it's, when you're doing program design you've got to be aware of what you're going into, so I just wonder whether that, if you had a, I don't like using the word, but agile or nimble approach like other people there who can deliver on that?

MR HOLDEN: There's sort of two components to that. One is, you're right, it probably is fragmented, and so first of all just join these people up. Don't pick a winner. Join them up, right? And don't say, “It is that one”, and then have everyone else disenfranchised. I think from an irrigator's point of view it's - I mean, the simple transactional relationship they have is the person who sells them the water and the person who sells them the water is someone that they transact with on a daily basis, and perhaps that is the go to point for the introduction of those services. It's a bit like your electricity company is where you go to get advice on, you know, what I need about reducing consumption of electricity or something like that, and when you've already got a relationship with them, I mean, we have trucks that go there once a day or twice a day, and so to the extent that it makes sense for us. We would happily provide services as well. You know, they open our mail once a month because there's a cheque in there and that's useful too, and so everyone's got unique advantages, but it just needs to be joined up better, I think. There's no winner.

COMMISSIONER MADDEN: No, not asking you to pick one. I'm just wondering of the environment that we potentially working in, that's all.

MR HOLDEN: Yes.

COMMISSIONER DOOLAN: Thanks very much.

MR HOLDEN: Thank you.

COMMISSIONER DOOLAN: All right. Our next participant is the Murray Darling Association, Emma Bradbury, and Councillor David Thurley. If you wouldn't mind just introducing yourselves for the record.

MR THURLEY: My name's David Thurley. I'm the National President of the Murray Darling Association.

MS BRADBURY: Thank you, Emma Bradbury, chief executive officer, Murray Darling Association.

MR THURLEY: I'd just like to make a brief introduction then I'll pass to our CEO to give the main elements of our submission. The first thing I'd really like to do is thank you for including the MDA in the stakeholder working group. We believe that that was an important and good decision. We also believe that the consultation process that you've gone through has been good, and I think as you're probably aware already, we strongly assert that local government needs better involvement than has been the case up until now. The closest government to the people concerned is local government and we believe we bring a unique perspective, and from the MDA's point of view it's an opportunity to represent local government right across the Basin from the Queensland border to South Australia. So I'll pass to our CEO and move on.

MS BRADBURY: Fantastic. Thank you. And again, thanks for the opportunity to present here and ensure that the Murray Darling Association's position is, I guess, on the record in terms of in support of our submission. Again, reiterating David's comments, I think the process that the Productivity Commission has undertaken we've heard in feedback from our members has been very welcome and well-received.

I think the report, the recommendations and the findings of the report reflect the quality of the consultation that has gone through. So our members have quite consistently expressed a level of appreciation for that process and for the findings. They've also indicated, and certainly the findings and the analysis within the report, that draft report, have reflected very well the broad range of issues of concern that have been raised to us by members in recent years.

I think the overwhelming sentiment, and we're hearing this now expressed again in the current consultation round between the Department of Ag and Water Resources and the community in relation to the water infrastructure program. Similar themes are emerging through that process also whereby the need to ensure that social and economic impacts are understood and that communities have the opportunity to participate in program development with sufficient time to consider, you know, what good solutions look like is coming through in that consultation as well.

So I guess if there's an opportunity to use this forum to reiterate a set of themes that that has been consistent for a couple of years now, and that I know that the Productivity

Commission have heard in their consultation with the community, it is that one. It is that the changes to water availability are impacting different communities in different ways, and they're impacting different sectors within communities in different ways. So the development and design of programs to achieve the Basin Plan's objectives really does need to pick up and recognise that program planning needs to reflect local and regional circumstances, and it's a whole range of circumstances, to just industry-based circumstances or central issues, but as the last presenter in discussion just explored.

You know, where you've got inter-jurisdictional arrangements, but specifically jurisdictions also, such as northern Victoria's water delivery and program development experience is quite different to that in other jurisdictions. Recognising that those are dynamics that will have an impact on the people who are experiencing the effects of the implementation process and that their need to consult and contribute will look different according to their circumstances, those different circumstances is really important.

We found, you know, and again, as David said, one of the reasons that the sense of importance for local government to contribute to this process is not because, you know, this incredibly complex process needs another layer in the set-up. It's more because through the prism of local government we are finding that there is the opportunity to identify, harness and then leverage the common ground, and shared experience, and also then recognise the differences and identify where and at what points programs need to distinguish between the circumstances in one jurisdiction and another.

So I think it's important - I know that, you know, at the risk of the MDA sounding like a bit of a single issue pony, I don't think that's the case. I think, you know, our members are very clearly identifying the fact that they have something to contribute that is consistent with the diversity of experience across the Basin, across this implementation process, and I think that's one of the key reasons that the MDA is so very, I guess, consistent in our calls for one socioeconomic, so consistent socioeconomic assessment criteria and framework, so that it can look at and capture similar experiences and distinguish different circumstances across communities in the Basin and then prepare, you know, policy advice, data sets and contributory evidence, evidence that will assist state and Federal governments to make decisions forward the implementation of the plan.

I think, you know, in all of the diversity that we hear across the Basin, I think one of the interesting elements is again this sense that there is a hell of a lot of commonality and common ground across all elements of the plan, and that the complexity adds - the complexity of not only the plan's overall objective, but the timeframes involved, and you know, whether or not it's water infrastructure efficiency programs or, you know, the SDL adjustments. These are really complex concepts for people whose core business doesn't sit in this space to actually meaningful contribute on. That, I don't think though, I don't think you can diminish though the need to have a contribution in that space.

One other comment just in relation to, I guess, specifically because we're sort of criss-crossing across between Productivity Commission hearings and the engagement on the water infrastructure program planning, one of the comments I'd make that crosses over both spaces is that we're hearing from our members that the provisions - the assessment

criteria for socioeconomic neutrality, which the department's currently exploring in its consultations really should extend to the whole of the 450 gig, not just the - so the whole of the - the efficiency measures, you know, ergo 450 gig, not just the on-farm efficiency measures.

So there's some concern at the community level that the - you know, while they really appreciate that New South Wales and Victoria have extended this push and Basin governments have agreed to consult with the community on what they see as reasonable assessment criteria for socioeconomic neutrality, on-farm efficiency programs, which is where the pinch point is being felt, you know, as indicated by the last presenter. There's concern that the 450 - you know, the recovery, the efficiency measures will apply to a range of water recovery programs that will ultimately impact on the communities at community level, so the need to extend the assurance that there's broader criteria to look at socioeconomic impact of that water recovery should apply across all of those programs, all those efficiency programs.

I think in wrapping up, and I will wrap up because I think the consultation process has been thorough. We've had the opportunity to submit our report or our comments on the Productivity Commission's draft report, and so they're on record, but in summing up, I think this is a really busy time and space for the Basin community. I think there's some really complex messaging that's being presented and, look, I'm not sure I've got anything much more to add. I'll just leave it there. Thanks for the opportunity.

COMMISSIONER DOOLAN: Thank you. Most of your comments have dealt with the impact on communities and therefore people are really thinking about what would be the next phase.

MS BRADBURY: Yes.

COMMISSIONER DOOLAN: And it is obviously decisions and discussions around socioeconomic entitlement, in our view that really translates to program design.

MS BRADBURY: Yes.

COMMISSIONER DOOLAN: And obviously attributes of that program but also the process. So I think you've indicated already, local government would have a real role to play. Are there elements of consultation that we think are really important that we need to actually probably pursue and be clear about, how consultation occurs not just the report but there's the old projects. They all have impact on communities. So from your perspective, if you like, regarding those local communities, what do you see as good consultation?

MS BRADBURY: I think that's a really good point. I think - I mean, we've said to anyone who cares to listen, if we get the process right, the outcomes, the community will deliver the information that you're looking for. It's about ensuring that we get the process right, and the process in consultation is the key to getting that community input into program design around that whole range of, not just the efficiency measures, but the

supply measures. If we get the process right, the additional benefit that we'll achieve is that there is two-way consultation. The community gets a better understanding of, you know, line of sight between the decisions that it's making, the impacts it's feeling and what is being felt up and downstream, and you know, up and down different levels of government and communities and across different sectors within communities.

So I think if we get the process right, that consultation that starts at the ground level, so ground up consultation, that starts with your local community, and leadership within the local community is vested in, you know, your local government, so your mayor and councillors are representing your community's peak bodies, industries, primary, secondary, tertiary industries. They will be your, not so much spokesperson - well, in an ideal consultation, that local government, that conduit through local government into a community will not necessarily see council as spokesperson. It should see council as conduit to the key drivers within a community. So an understanding of the social dynamics within a community, the economic drivers, the opportunity or risks within a community.

So you know, local government in terms of this process in our view should be seen as the conduit to, not the voice, not necessarily just the custodian of a community's views because every community that you go to, and you've only got to ask any councillor in our, you know, who's a member of their community, they're diverse spaces. So if they're used as conduits to livelier, you know, broader information, then that's a really good start in the process.

I think - and again, at the risk of sounding hackneyed on this one, if we do recognise that that collaboration between all three levels of government will bring together that community perspective and community authority through a disciplined process of engagement from the ground up, then I think we're well on the way to getting process right. I think the other key element of process is timeliness. I think it's got to be recognised that consultations, if they're to be meaningful and achieve or discover the information that you're looking for, then being genuine in that equates to providing the required amount of time.

If you need to consult with a particular industry or business, you go straight to the top. You go in there. You ask them, you know, to prepare three days or three hours or whatever, and this is what we want to extract and that's fine. They'll be happy to do that. If you need to go to a, you know, an industry peak it'll take more. If you need to go to a community peak it'll take a bit more again. So that people are feeling heard and are heard, and prepared.

COMMISSIONER MADDEN: I guess it may be a general question. I mean, we've actually been through recovery now and we're, what at 2000 megs or something, we're talking about the last 450, and I know these are the criteria around it, but I guess for me it's a matter of looking back. If you look back we've had a mix of different methods to get things. We've had different approaches, different people, tenders versus strategic programs, buybacks. I just wonder, is there anything we can learn, not just looking

forward to it getting even process, but is there anything that your members talk about that actually has worked well? What are the lessons to learn to date?

And I mean, we've heard a few of them before, earlier about having the time to be able to evolve plans, because I look at it and think, "Well, where do we want to be in X years' time", so I agree we've got to think about the process, but also want to think about what you want to do and achieve, because for this 450 everyone's understanding that landing the last bit's really hard. We're already on a foundation of impact and a lot of impact, and the next bit might have disproportionate impact to the stuff we've done so far.

So then you want to say, well, we want it to be planned, not just willy nilly. We want to be able to be sure about how to go forward. We want other people to respond — like processes to know what's going on. So once you say that, you then think, well, who, what when, the typical project questions. But I still think it's important to think, and I know you're saying who, Emma, but a little bit about, well, what have we learnt? What hasn't worked? What has? What are the failings to date? Why are people not that enamoured with the process to where we got and how can it then improve, and I feel that Jane's - we're focussing so much on criteria in this whole process that no one's actually having the discussion about what do we want in the program. I know we talked about design, but we're talking about attributes. I'm talking about really getting in and designing the nuts and bolts of a program.

MR THURLEY: If I could just make a very general remark, what doesn't work is a bunch of bureaucrats from Canberra turn up in a community and say they're listening and doing consultation, but what they're making is a presentation about how they're going about things, and there's very little - often this is one of the criticisms we would hear, "Yes, you came and told us all this stuff, but did you listen to what we told you?", and often - there are probably quite a few examples where it hasn't been clear that people have been listened to, and you have a discussion and then six months later a decision's made and it's like, "Well, where did that come from?".

So rather than turn up to big town hall meetings with hundreds of people, the first thing we need in the community is, I think is either said through the general managers of councils, and the councillors and the mayors. If you don't speak well on behalf of your community, well, you won't be in there, in this case in two years' time we have elections in New South Wales. You really do need to get out there and speak to the community, and the MDA is the vehicle where that happens, and we have councils from Balonne right through to the mouth of the Murray, and we hear from our members.

Now, there's certainly differences between those - well, you only have to read the last 100 years of the history of the Murray. People look from downstream look upstream and say, "What the hell are you doing with all our water?", and those upstream look downstream and say, "Why are you letting it just go out to sea?".

We've got to talk more and talk better to get people to understand, and there's still a lot of problems in getting people to realise why the plan's there and what it's meant to do, and why it's so necessary to do it. If you just look recently about calls to release

environmental water, yes, there are - you can see the reasons why people call, but is it the right thing to do and how do we get the community to really listen to the message and work out what is the best way to do it, and know that you've got to take some pain for some long-term gain.

MS BRADBURY: John, if I can just add to that also, I think we're right to be looking for what's worked, what hasn't, and in Renmark in 2017 at our National Conference there, Department of - sorry, I'm getting my state departments mixed up here, but the science project was presented, so that was a project that was delivered by the South Australian Government. I'd have to take it on notice, but I'd be happy to provide it. We jumped in as an organisation. Our members and our board was very keen to see a lot of the lessons learned through that project elevated to the national level. We felt that there was opportunity to for a lot of the process and the outcomes from that particular project to provide broader learnings across other jurisdictions.

Now, at the time I think it's fair to say that the politics and other elements across the Basin prevented a really tremendous good news story getting out there. We did a bit of work at the time with Ben Fee who was the project coordinator and did the presentation at the National Conference on that program, who went on to do some other international study work recognising that that program had in it elements of, you know, learnings for better way to do it next time.

So, you know, talking to that department they sort of recognised, "Look, there's some things we do differently, some things that wouldn't apply in other jurisdictions", but it was essentially a program that looked at water recovery where the first conversation was not at the program design level at Federal government or state government. The department went out to the community and said, "What does our program design need to look like? How would you - if you had leadership and carriage of this, how would you do it?", and the innovation and solutions that came up through that collaboration between state and community and local government and irrigation districts were involved as well because there was technical expertise, there was community expertise and there was farm-gate expertise, and it was driven by a philosophy of innovation rather than water recovery, and a lot of their outcomes were really quite exciting.

So I think there are programs and projects that have looked at - that have worked. I think there's other, you know, one of the other things that has worked is, we see a difference across the jurisdictions between those that have had stability within departments and that have cultures that are promulgated by that stability and then their capacity to design projects and design criteria around programs tends to reflect that, as does the community engagement and connection to their community. Third level of complexity of course is always the political - - -

COMMISSIONER MADDEN: No, I think that's an important point because you wouldn't want to look back on this and say, "Well, these communities were affected by lack of capability at one level", at a point in time, so I mean, these are the kind of discussions that should occur, but anyway. No, that's good, we'll have a look at that program.

MS BRADBURY: I think one of the other programs that's worth looking at is not necessarily for its direct application to the Basin Plan implementation, but the regional wellbeing survey has over time established a capacity to demonstrate that people who are engaged in the process are more likely to be, if not champions of, then willing participants in, you know, outcomes that they're seeking. So there are programs that have had successes.

COMMISSIONER DOOLAN: I think that's it from us so thank you very much.

COMMISSIONER MADDEN: Thank you .

MS BRADBURY: Thank you.

COMMISSIONER DOOLAN: Now, we actually have one more participant that will be another phone discussion. We've got the Wentworth Group of Concerned Scientists.

COMMISSIONER MADDEN: Okay, so maybe we'll actually ask if anyone else wants to - Jane, just on the floor?

COMMISSIONER DOOLAN: So whilst we're waiting, could we just get a sense, is there anybody else who might like to actually present or talk while we - - -

COMMISSIONER MADDEN: Or clarify any - if you can just state your name.

MR HOLDEN: Sorry, Jack Holden from Fonterra. One of the mechanisms that we talked about earlier this week in our road show around northern Victoria was on-farm efficiency with the sale of water but long-term lease back. Long-term lease back to the, you know, the original and that water is tagged and unable to go back to CEWH or anywhere else, you know, for a considerable period would be something worth workshopping. Plenty of hazards, plenty of risks but it might be a - one of the circuit breakers that we're looking for.

COMMISSIONER DOOLAN: They're the sort of options - what are the options sort of basically long-term lease of water (indistinct), or you know, some more (indistinct).

MR HOLDEN: Yes, so it might be used differently in a wet year and a dry year. It might, you know, it needs to be of a considerable period of time so we're, you know, we've actually restored adaptive capacity to make decisions at that point, you know, I mean, look, there's plenty of hazards. It's not a widely, you know, workshopped position certainly amongst our stakeholders, but you know, we need to push on, push on some sort of opportunities like that.

COMMISSIONER MADDEN: All right. Thank you. Okay, is anyone on the line there?

MS STEINFELD: Yes, Celine Steinfeld here from the Wentworth Group.

COMMISSIONER MADDEN: Do we have Terry there at all? Are you there, Terry? Evidently not. Celine, do you want to start or do you want us to wait for Terry?

MS STEINFELD: Probably wait for Terry if that's okay. I was talking to him before so he shouldn't be long.

MR HILLMAN: Hello.

COMMISSIONER DOOLAN: Hi Terry, it's Jane Doolan here, and John Madden.

MR HILLMAN: Giddy, Jane, how are you?

COMMISSIONER DOOLAN: I'm good. How are you?

MR HILLMAN: Good. Are you in Canberra or Melbourne?

COMMISSIONER DOOLAN: Canberra, so we're in full hearing mode here.

MR HILLMAN: Excellent.

COMMISSIONER DOOLAN: So you're on speaker and we do have an audience of observers as well, and transcript is being taken, so the transcript will be available in a couple of days for you to look at.

MR HILLMAN: Thank you.

COMMISSIONER DOOLAN: So you're also our last speakers for the Canberra hearing, but in fact for the series of hearings, so just to let you know we've been around the Basin, Mildura, Murray Bridge, Shepparton, Dubbo and we're finishing today. You're our final.

MR HILLMAN: Excellent.

COMMISSIONER DOOLAN: So can we take it over to you?

MR HILLMAN: Yes, okay. Is - - -

COMMISSIONER DOOLAN: Celine is on.

MS STEINFELD: Yes, I am here, sorry.

COMMISSIONER DOOLAN: Would you mind stating your names and also affiliation just for the record.

MR HILLMAN: Sure. Want to go first, Celine?

MS STEINFELD: You go, Terry.

MR HILLMAN: Okay. I'm Terry Hillman. I'm retired, but still work occasionally for Murray-Darling Basin Authority with some of the committees and I'm a member of the Wentworth Group of Concerned Scientists which as a group made submissions to the Commission.

MS STEINFELD: And I'm Celine Steinfeld. I am the policy analyst at the Wentworth Group and my role is supporting the water reform program that is led by the members.

COMMISSIONER DOOLAN: Okay. So if you wouldn't mind taking us through the key points you'd like to make, and then if you're comfortable we'll ask a few questions.

MR HILLMAN: Well, first of all, thank you for the opportunity for us to make our written submissions to the discussion. I think our submission was quite brief but fairly to the point. I've got my submissions for the Royal Commission.

COMMISSIONER DOOLAN: That's not us.

MR HILLMAN: No. While you're a commission but you may or may not be royal. So I think we by and large supported what the Commission had to say. I guess we'd probably like to talk a bit about how the SDLs are going and what that really means and the water resource plan process, et cetera. Interested in your take on the responsibilities of various components of the MDBA and the responsibility of the Commonwealth versus the state, but literally don't claim any expertise, probably have opinions. Do you have anything to add?

COMMISSIONER MADDEN: Well, we might start then with that opinion. Do you mind just to enable discussion, maybe making a comment then on the governance and those roles and then maybe making a comment on the SDLs and any concerns, and then we have questions after that.

COMMISSIONER DOOLAN: And timeframes, we have actually recommended where an outcome is important and at risk because of a deadline. We've recommended a process to extend deadlines to ensure good outcomes.

MR HILLMAN: Yes, I accept that. I think that's very true and it's been a bit the pattern of dealing with the Basin Plan from the beginning, a really short timeline. And also I guess the interdependency of various components in the (indistinct) of the development of the SDL. Okay, well, where, I mean, I'm having trouble speaking for the Wentworth Group as a whole because I came to this fairly late, but I'm personally not convinced that the MDBA is really a (indistinct) authority as much that could and possibly should. There seems to me to be a risk of finishing up with the railway gauge fallacy where every state's doing things differently to the cost of the outcome of the whole thing. So I would be concerned that the coordination role at the very least be emphasised.

COMMISSIONER DOOLAN: So I suppose, Terry, in the governance area, we've, in our draft recommendations make that - the MDBA's two clear roles and one is as the regulator and one is as the agent for states, and that actually both those roles are important because they are in conflict, so as a regulator you're marking your own homework.

MR HILLMAN: Indeed.

COMMISSIONER DOOLAN: When you're being the means by which states coordinate and deliver.

MR HILLMAN: Yes.

COMMISSIONER DOOLAN: So we've stated a strong preference for separation.

MR HILLMAN: You did. I noticed that, yes. Yes.

COMMISSIONER DOOLAN: And just wonder if there's any views that you might have on that.

MR HILLMAN: I don't - well, it's not within my expertise and certainly not within the expertise of the Wentworth Group either, so I think we'd have difficulty deciding where the dividing line should be for its broad function, and there seems to be also some value to it in the internal workings of the Authority being as well related as possible too, so if we were going to split it up I think it'd need a bit of work done to define where that line is going to go.

COMMISSIONER DOOLAN: We've got that, prepared that, and we're going to do a bit more work from the draft to its final form.

MR HILLMAN: Okay. That's good.

COMMISSIONER DOOLAN: Timeframes?

MR HILLMAN: Timeframes, very, very short, but I don't see how the SDL projects itself can be put in place by the required time, but it's not my problem I suppose.

COMMISSIONER DOOLAN: But important do you think that they be given time to actually be successful or - - -

MR HILLMAN: Absolutely. I think we've been bedevilled by lack of time all the way through, including things like the (indistinct) and so forth that would seem to me to be a very good model but which we haven't seen any on the ground application and trials of the models which you would normally think could be the next logical step that we (indistinct) and making sure we've got the conceptual models in place that allow it to be developed from that.

COMMISSIONER DOOLAN: So you're talking generally there or on the SDLs?

MR HILLMAN: Well, particularly on SDLs but I think it's symptomatic of the tight timelines and rushing at the end, the last date (indistinct) doing the end of the job as well as we could.

MS STEINFELD: To add to Terry's point, the timing is important just as much as the standard set for those projects, so in the case of the SDL development supply measures, extending the timeframe may not guarantee that those projects will be implemented to a standard that's critical to ensure that the Basin Plan outcomes are likely to be delivered, so it's I guess just as important in developing an alternative pathway to these projects or I guess strengthening the standards around them is to ensure that they are very clear and with recommended legislative changes to ensure that stakeholders and governments who have agreed on what the project standard is to be from the beginning. I know that there's been the phase 1, 2 and 3 that the (indistinct) have been put through and we are not satisfied that all of those standards have been achieved through the ones around (indistinct) and ensuring that risk is properly mitigated and in our submissions (indistinct) the conditions report we put in, suggested about the 12 conditions that we recommend applying to SDL projects to ensure that by 2024 those - there'll be clarity around the quality of those projects.

COMMISSIONER DOOLAN: So just to comment on that, who then makes the assessment against the standard under that model?

MS STEINFELD: We would - we'd recommend that the Murray-Darling Basin Authority assesses the projects against the standard and the authority has already done their own assessment of the SDL projects which was made publicly available earlier this year, and the standards that we specified, we've done it in a way to ensure that the MDBA is required to make information transparent and publicly available for - that stakeholders have trust that those projects are of sufficient quality.

COMMISSIONER DOOLAN: So again, and I think your submission indicated this is while that - for our perspective a good, well done project achieving its outcomes is a better outcome than its meeting deadline, but you do have to have - you do have to make sure you've got checks and balances along the way that lead - enable you to pick it out if it's failing along the way.

MS STEINFELD: Exactly, and upfront agreement on what those standards will be by 2024, and if everyone's in agreement those standards now are going to be a lot easier to bring everyone along to develop and bring those projects along to those standards because of the long (indistinct) times that it takes to properly address (indistinct).

COMMISSIONER DOOLAN: Okay, and so that's really in the next phase, gateway 2, probably, we need to be quite clear and transparent about how that operates and how it will operate going forward. Is that - - -

MS STEINFELD: Yes, certainly.

COMMISSIONER DOOLAN: You also had some recommendations about the toolkit and the governance of the toolkit. Do you want to elaborate on that?

MS STEINFELD: Well, Terry, do you want to do that?

MR HILLMAN: No, you can go first.

MS STEINFELD: The toolkit measures were a by-product of the northern Basin Review which is (indistinct) quite critical of, the final outcome, and one of the key reasons was that the toolkit encapsulated a bunch of measures that should be in place to ensure that the outcomes are guaranteed but there was no legislative guarantee that those toolkit measures would be delivered. So what we'd like to see in regards to the toolkit is permanent measures that have been legislated and we suggest, you know, clean water is (indistinct) planned to make sure that the assumptions that have been made in the models will be applied in practice and some of those relate to the coordination of requirements of watering and the (indistinct) water so it's very important that those toolkit measures (indistinct) to achieve the outcomes that were agreed (indistinct).

COMMISSIONER DOOLAN: And so I mean, we would agree that strong governance around transparency and public (indistinct), so I noticed you said legislated. Is it legislated or is it included in a statutory instrument in particular that you're looking for, like the water resource plan?

MS STEINFELD: Yes, I think the water resource plan is the obvious place for some of those rules, but perhaps not the only place for them. For example, there might need to be an arrangement for strategic entitlements, for example, but certainly for rules around the protection of environmental flows. It is critical that water resource plans contain those provisions.

COMMISSIONER DOOLAN: Yes, absolutely. I think there was just one other point I had and there was other points you want to make, but in your submissions you do talk about the Commission, our Commission potentially playing a strong role in encouraging states to address climate change. Now, for us I suppose that really is almost something to be considered in the 2026 review and perhaps greater planning for that review should be undertaken earlier. How do you feel - I mean, given that that is a concern of yours, how do you see that actually being incorporated now?

MR HILLMAN: Well, it may - it may take a change to how we quantify what we're doing in the sense that firstly environmental water and the productive diversions are defined in, volumetrically which means that any adaptation period of climate change will come out of the planned environmental water because that's all that's left and so in time we're probably going to have to come up with a better way of doing dividing up the water between the - - -

COMMISSIONER MADDEN: My only comment there is, that's not correct.

MR HILLMAN: That's a reasonable comment.

COMMISSIONER MADDEN: The entitlements are actually defined as a share of a consumptive pool, not as a volume.

MR HILLMAN: Are they?

COMMISSIONER MADDEN: Yes. So you have your baseline flows, et cetera, and then there's a consumptive pool left. Now, they're still tagged as megalitres and things like that, but fundamentally they're a share of the consumptive pool, not a volume.

MR HILLMAN: Right. Okay.

COMMISSIONER DOOLAN: Some systems that - - -

MS STEINFELD: (Indistinct) is that the - it's really a lot of the planned environmental water that's at risk in terms of climate change because it's not well-defined or quantified, and when entitlements are allocated and (indistinct) taken, if there's any climate change impact on the river system, you know, reducing flow, say, to the river system, but the balance is taken out of the planned environmental water pool, and there is some evidence, for example, the Murrumbidgee River could (indistinct) by the end of very dry periods, long droughts, that is actually the planned environmental water that can - that crashes and (indistinct) outflow at the end of the system.

COMMISSIONER DOOLAN: No, but certainly (indistinct) strategy in Victoria shows similar things. It's the spills and the high flows and a range of things that (indistinct) to go, but I suppose the question is adaptation, as you said, to the Basin Plan with the current settings, it's looking forward, how would you like to see climate change brought into those discussions? Is it through the 2026 review or is it again through adaptation? It's just getting an understanding of how you see those discussions coming into the implementation of the plan or the review of the plan.

MS STEINFELD: Yes, sure. Okay, so I think both of those things are important opportunities to take into account climate change, particularly with the (indistinct) the Basin Plan that climate change really needs to be front and centre of that review through active reassessment of SDLs and climate change projections and using new water sharing arrangements to enable the targets and objectives to be assessed within the envelope of projected water availability. So if that work is to be done, it would need preparation now to ensure that the modelling and climate scenarios for stream flow are available because the (indistinct) flow is only up to 2030, so, you know, work would be great immediately on preparation for that, and also (indistinct) climate change adaptation framework to much better understand the potential (indistinct), you know, whether extremes and long-term climate changes, and then climate change adaptation programs for the environmental assets and infrastructure will be developed to ensure that climate change has been considered and every effort is made by the government for the Basin water management in the next decade or more.

COMMISSIONER DOOLAN: So, just again, given our (indistinct) of the Basin Plan, certainly jurisdictions are undertaking a lot of the work themselves but it's actually how it comes into the Basin Plan, but the point really is, in preparation for the 2026 review, and I think we've tried to cover this but we might need to expand on it in the monitoring and evaluation chapter. It's not just about thinking back. We're got to be looking forward to what other information needs to be taken into account in 2026 and to make sure that that's being collected or undertaken now in preparation.

MR HILLMAN: Yes, (indistinct words).

COMMISSIONER MADDEN: So just a clarification, not a clarification, but is it the long-term environmental watering plans that should consider those things or asset plans within the Basin Plan construct? I'm just wondering what the best place to feed that kind of planning into.

MS STEINFELD: Yes, well, it's - in my view it should start at the beginning in terms of establishing the objectives for Basin planning and that feeds down then through the environmental watering plan and (indistinct) watering strategy and then to the catchment watering strategy, and then also a few of the SDLs (indistinct) piece of policy.

COMMISSIONER DOOLAN: But it is - also it's very much (indistinct), isn't it? When you said look at the environmental targets and in the envelope of water availability that is really done at a local scale and then the outcomes of that (indistinct) as well, don't they?

MS STEINFELD: Yes. Yes.

COMMISSIONER DOOLAN: Okay. All right. Thank you. That's it for us. Have you got any other points that you might want to make?

MS STEINFELD: I would like to just reiterate (indistinct) mention in the draft report the importance of addressing constraints.

COMMISSIONER DOOLAN: Yes.

MS STEINFELD: Given that constraints are environmentally an important part of the Basin Plan in ensuring that the water that's recovered can, you know, make the most of ecological benefits. We've looked at the various constraints proposal and are - and we think that they fall far short of what is required to actually - that the MDBA has (indistinct) standard so (indistinct) South Australian water and we think that there needs to be a much more - many more incentives to ensure that they will (indistinct) those constraints (indistinct words).

COMMISSIONER DOOLAN: Okay, and given that again that moves to a timeline question as well.

COMMISSIONER MADDEN: And a modelling question that we have actually articulated about that being transparent and public.

MS STEINFELD: Yes, and also the - those incentives which are only \$200 million have been put aside for constraints, as opposed to (indistinct words). I know that constraints are (indistinct words), but it's, I guess it's just really important there are enough incentives and also perhaps (indistinct) to have the - trying to make sure that (indistinct) to ensure that, you know, the kind of system and all the way up to the (indistinct).

COMMISSIONER DOOLAN: All right. Well, thank you for that. There's no further comments? Thank you. Very excellent, and that being the last speaker I'll call one more time, are there any people in the audience who would like to actually make a final comment? Okay.

Well, that concludes today's scheduled proceedings and in fact our series of hearings completely. I adjourn these proceedings and basically from now we will be refining our report, as we said, on the basis of the feedback on submissions and from these hearings and from the stakeholder feedback that we have and we'll be basically handing it to government before Christmas.

So can I thank you very much for your attendance, for your interest and for your input. It is highly valued by the Commission and it is really taken seriously and used. Thank you very much.

We adjourn the proceedings.

MATTER ADJOURNED