INTRODUCTION: Thank you for the opportunity to provide comment on your *Issues Paper*, dated 17 October 2019. We also appreciate you taking the time to host a stakeholder consultation session in Deniliquin on 12 November. Please find below our comments against the Terms of Reference you have been given for the inquiry, as well as our thoughts on some of the 'potential outcomes' you've identified on pages 4 and 5 of your *Issues Paper*.

This submission is made on behalf of Murray Irrigation Limited (MIL) and the Murray Regional Strategy Group (MRSG). MRSG represents a broad range of community, business, local government, irrigation and Indigenous organisations across the NSW Murray region, and includes delegates from: Edward River Council; Murray River Council; Berrigan Shire council; Murrumbidgee Shire Council; MIL; Rice Growers' Association; Yarkuwa Indigenous Knowledge Centre; Speak Up Campaign; Murray Valley Private Diverters; Southern Riverina Irrigators; and West Corrugan Private Irrigation District.

Given MIL's connection to water markets in the Murray-Darling Basin, we expect the ACCC will contact us directly for additional information and advice. For example, the Water Exchange is a service operated by MIL to facilitate sale and purchase of tradeable rights (allocation and annual transfers of delivery entitlements). The Water Exchange is live and available on line 24 hours a day, 7 days a week, through the advertised operating season. Persons who aren't MIL customers can also use the Water Exchange.

MIL is very happy to provide whatever assistance is needed to ensure the inquiry is successful as possible.

COMMENTS AGAINST THE INQUIRY TERMS OF REFERENCE:

1. Market trends since 2012, including demand for water, changes in the location where water is used, the quantity of water traded, water availability, changes in water users and their communities, development of new trading products, and the number of participants and sectors participating in the water market.

Market Trends Since 2012:

There's growing evidence that market activity has significantly changed the pattern of water demand in the southern Murray-Darling Basin (MDB). Historically, demand and use were concentrated in irrigation areas in southern NSW and northern Victoria (i.e. the Goulburn-Murray Irrigation District).

With increased community desire for environmental water recovery, governments (state and federal) established themselves as market players, using water markets as the primary mechanism to recover volumes for environmental flows. With commencement of the Basin Plan in 2012, water recovered for the environment has been delivered in increasing volumes into South Australia. This has also raised the prominence of Lake Victoria as a key MDB storage in river operations decisions.

As water has moved away from southern NSW for environmental recovery, there has also been a distinct shift in irrigation crop type along the Murray. Market activity has driven this. The growing trend of permanent plantings, supported by temporary water, is now well known. This has compounded the demand for water near Lake Victoria and the SA border.

Overall, these two market trends have materially undermined traditional annual crops, pasture production and other essential commodities, in a way that is counter to the initial intent of water market establishment. These farmers are more likely to be at the mercy of market trends, as opposed to deliberately participating in markets to achieve specific production outcomes.

To illustrate, once a government has used the water market to recover flows for the environment, this volume is no longer available for trade in the same way that is was previously. This creates a permanent scarcity in water markets that did not exist, in any material way, prior to 2012. There is a price component to this new form of scarcity that is not properly understood, especially in terms of its impact on annual cropping, pasture production and the growth of other essential commodities.

This impact is significantly increased in the temporary market during times of drought, when physical water allocations are very low. We are seeing that, much more frequently, certain types of irrigated agriculture are now being 'priced-out' of water markets, where they previously weren't before.

Couple this with the activities of water market participants who are not connected to land or irrigated farming in anyway, and these competitive impacts grow increasingly worse, and more unfair.

Trends in Demand for Water, and Changes in the Location of Where Water is Used:

As noted, water demand has shifted substantially downstream, to meet the growing needs of the environment, as well as permanent plantings. Actual water use, and the location of water demand along the Murray no longer matches what was originally envisaged when markets were first created.

There was a clear expectation that annual cropping, pasture production and the growth of other essential commodities would continue. The evidence for this assertion can be found in recent government decisions (state and federal) to invest significant public money into the modernisation of irrigation infrastructure that was specifically built to support these crop types.

Based on patterns of public investment since 2012, the policy signals being sent to irrigators in southern NSW is that their footprints will remain active and significant water using areas, with no explicit requirement that the commodities they've traditionally grown should change. To fully realise this expectation, market settings should support this outcome, and they currently do not.

The Quantity of Water Traded, and Water Availability:

Prior to government (state and federal) reforms to recover water for the environment, MIL's licence volume was approximately 1200 GL. Post these reforms, we now operate on 30% less entitlement than this original licence volume. Virtually all of this reduction has been as a result of returning water to the environment. In the order of 1% has been due to permanent trade to other water users.

The return of water to the environment has very different market effects when compared to both permanent and temporary trade between traditional water users (i.e. irrigators). All environmental water holders (EWH) in the MDB have rules about the conditions under which they can trade. There is generally a need to prove that the outcomes of the trade directly benefit the environment in some way. The effect of this is two-fold:

- Firstly, most EWHs have extreme restrictions on permanent trade out of their portfolios. This has
 created a significant, enduring reduction in the total amount of permanent water available to all
 water markets in the MDB. Trends across the southern Basin have been in the order of what MIL
 has experienced in its own footprint. As a consequence, new users wanting to enter the market
 to support new agriculture are more likely to find water available in the temporary market.
- Secondly, EWHs are typically much more active in the temporary water market. Given the volumes of water within their portfolios, this type of activity can cause significant fluctuations in the size of specific allocation markets year-to-year. This is a new market trend that has not been captured well enough in terms of useful, timely information for other market participants.

What this example also demonstrates is that new forms of water 'availability' are having an impact on market participation. Firstly, transparent, accessible information on the size of individual markets is significantly incomplete, especially with respect to temporary, or annual markets. This means that true water availability is very rarely known. This can drive individual irrigator decisions to become much more conservative due to increased uncertainty about true market availability and behaviour.

In addition, as we've explained above, price is also limiting water availability for certain market participants in a way that is well outside of what was originally expected as 'normal' market operation. This particular anomaly is significantly compounded when coupled with the activities of water market participants who are not connected to land or irrigated farming in anyway.

Changes in Water Users and Their Communities:

As we've described, both state and federal governments have sent strong policy signals to many MDB farming communities that annual cropping, pasture production and the growth of other essential commodities have a legitimate future. Unfortunately, the policy settings within water markets have not kept pace with these public commitments and their associated levels of government investment.

What this means on the ground is that communities are suffering as a result. As noted, in MIL's footprint, permanent water availability has reduced by one-third. Given the way this environmental water was recovered, and the way EWHs are now permitted to trade from their portfolios, water users wanting to access additional resource are being forced into the temporary market.

This creates a new level of scarcity, and a consequent 'step-change' in temporary water value that places this market well out of the reach of many participants for whom water markets were originally designed. This can really only be described as a significant market anomaly, as its impact directly contradicts all other policy signals these irrigated communities are receiving from their governments.

Development of New Trading Products:

This would be one way governments could ensure that water markets support their investment. Products tailored to support long-term certainty and security, per crop type, would be very useful.

Sectors Participating in the Water Market:

Similar to comments made above, this has changed significantly from when water markets were first created, and especially since 2012, which is when governments became active market participants through the recovery and subsequent use of environmental water.

As we've described, EWHs are a very new market player, with very different water needs and very different restrictions on their ability to trade when compared to more traditional market participants. Current market settings have allowed for permanent plantings to grow significantly, with their only access to water often what's available on the temporary market.

Current market settings also allow for a new breed of 'speculators', who are free to make money in a market that was expected to do no more than distribute a scarce resource for productive agriculture.

2. The role of carryover arrangements, and the trading of water allocations which have been carried over, on water markets.

Carryover arrangements can have benefits and disbenefits, which are often tied to their location and design. The full impact of carryover on market operation across the southern MDB is not well understood and would be worth further investigation to optimise this particular tool.

Reflecting comments made earlier, since 2012, new participants (environment and other), have engaged in allocation trade and used carryover in ways not expected when markets were established. Where new players are creating market outcomes outside of original intent, this is worthy of review.

3. The role and practices of market participants, including water brokers, water exchanges, investment funds and significant traders of water allocations and entitlements.

Trends in the Role and Practices of Market Participants:

Our view on observed trends have been captured earlier in this submission.

Water Brokers and Investment Funds:

As we've described, since 2012 many new players have entered water markets who are not connected to land, or irrigated farming in anyway. Particularly concerning is the ability for individuals to make a profit from market involvement that is counter to its initial intent (i.e. to distribute a scare resource for productive use). Where these types of participants are driving negative outcomes that are outside of the market's original intent, this needs to be properly understood, and addressed.

Significant Traders of Water Allocations and Entitlements:

Significant holders of water can create their own market distortions, which may be both intended and unintended. This can be an artefact of demand (e.g. the environment's demand for and use of water is very different to that of more traditional irrigation). In addition, this impact can also be connected to the size of an individual market (i.e. the holding is proportionally large compared to market size).

Patterns which have emerged since introduction of the Basin Plan (2012), have generated new conditions that restrict fair participation of all individuals with a stake in reasonable market operation.

In particular, significant traders have the ability to create new types of scarcity that traditional market participants have not had to deal with before. They can directly influence the physical volume of water available. The lack of good, usable information on their activities can also limit the ability of all individuals to engage in water markets with full knowledge.

These behavioural decisions can then have a direct, yet very arbitrary impact on water price. This has the strong potential to distort price signals, so they no longer drive the types of policy outcomes that governments wish to achieve for all market users. Where this is generating negative effects that are contrary to original market intent, this needs to be properly understood and addressed.

4. The availability to the public of information on water market activities and tradeable water right holdings.

This is critical. Information must be quick to access, understandable and meaningful. To ensure markets encourage irrigation decisions that are aligned with desired public policy outcomes, much better information is needed.

This may require specific information obligations for significant market participants, to ensure the size and depth of markets is clear for all individuals who have a stake in reasonable water market operation. Governments also need to provide better tailored storage, operational and allocation data, again so the true size and depth of markets is clear for all market participants.

5. The timeliness, accuracy, and completeness of public information released on water market activities and tradeable water right holdings, including true trade price reporting and the types of trade (for example, immediate purchases, forward contracts, leases).

Timeliness, Accuracy, Completeness of Information & True Trade Price Reporting:

As noted above, the availability of market information requires urgent and significant improvement.

6. Barriers to entry, expansion and exit, including transaction costs.

Barriers to Entry and Expansion:

As we've noted throughout this submission, market operation since 2012 is very different to the expectations that were set by governments when water markets were first established. Some of the observed changes have been the result of deliberate government intervention, where others stem from unexpected, unintended market anomalies, which can legitimately be described as externalities.

Unfortunately, it is original market participants, more traditional agriculture types and importantly the communities they support, that have borne the full brunt of these third party impacts. As we've described, annual cropping, pasture production and the growth of other essential commodities are now priced-out of water markets, where they previously weren't before. In addition, this has led to patterns of more conservative use, due to increased uncertainty about true market availability.

Transaction Costs:

These can be prohibitive for smaller trades which restricts fair market involvement for all participants.

7. The management of constraints on the storage or delivery of water, including adjustments made to give effect to trades and intervalley transfers.

Constraints on the Storage and Delivery of Water:

This is a market externality that is having a significant effect across the board:

- Within MIL's footprint in particular, entitlement reliability is being substantially undermined through river operation changes associated with meeting increased downstream water demand.
- As noted already, current market structures are driving very unsustainable and irrational behaviours (e.g. the significant growth of permanent plantings reliant on temporary water).
- Poor market information is creating patterns of increasingly conservative water use that are counter to water market intent (i.e. to distribute a scare resource and encourage productive use).

Adjustments Made to Give Effect to Trades and to Intervalley Transfers:

Market information on these activities is very unclear, and the communication of related decisions is very slow. Where this is having an impact, it requires thorough review and appropriate intervention.

COMMENTS AGAINST KEY 'POTENTIAL OUTCOMES' IDENTIFIED ON PAGES 4 AND 5:

1. Findings regarding the practices of water market participants.

Since 2012, markets have not been used in line with public expectations set by governments when they were first established. As we've described, this original intent was the utilisation of a known policy tool, to distribute scare water resources, across known irrigation footprints. Traditional market participants have been involved in water trade on this basis. They are now being impacted by:

- government intervention through environmental water recovery, use and trade;
- involvement of other new market players, who don't always trade for purely productive purposes;
- new patterns of use and demand, where delivery decisions are still based on old assumptions.

All of this serves to impact on many individuals for whom water markets were originally designed, and crop types that still have a future.

2. Recommendations and/or collaborative work with governments and industries on solutions to any structural, institutional, competition or other issues affecting the efficient operation of water markets.

Structural, Institutional and Competition Market Issues – Recommended Solutions:

Water market information must be: (i) comprehensive; (ii) easy and quick to access; (iii) simple to understand; and (iv) meaningful. Significant traders may need to meet specific information requirements to ensure the size and depth of markets is understood by all participants.

Water market operation must continue to support irrigation, in line with continued public investment. Coupled with this, an urgent review of existing river operations is needed to ensure underlying assumptions and associated decision-making adequately supports modern market operation.

A proper, modernised understanding of river operations in the southern MDB is increasingly essential when set against the back-drop of significant reforms that have come in with the 2012 Basin Plan. In particular, governments and the MDBA have set themselves some very ambitious targets with respect to addressing system constraints. If these targets are successfully implemented, they will have a significant bearing on consumptive water availability, movement of water through the system and hence, future market operation. All third party impacts must be understood and addressed.

3. Referral of issues regarding conduct outside the *Competition and Consumer Act 2010* to relevant authorities or agencies.

Where issues are outside of the ACCC's scope, a complementary review by the new Federal Inspector General, Mick Keelty, may help to resolve some of the more critical matters raised.