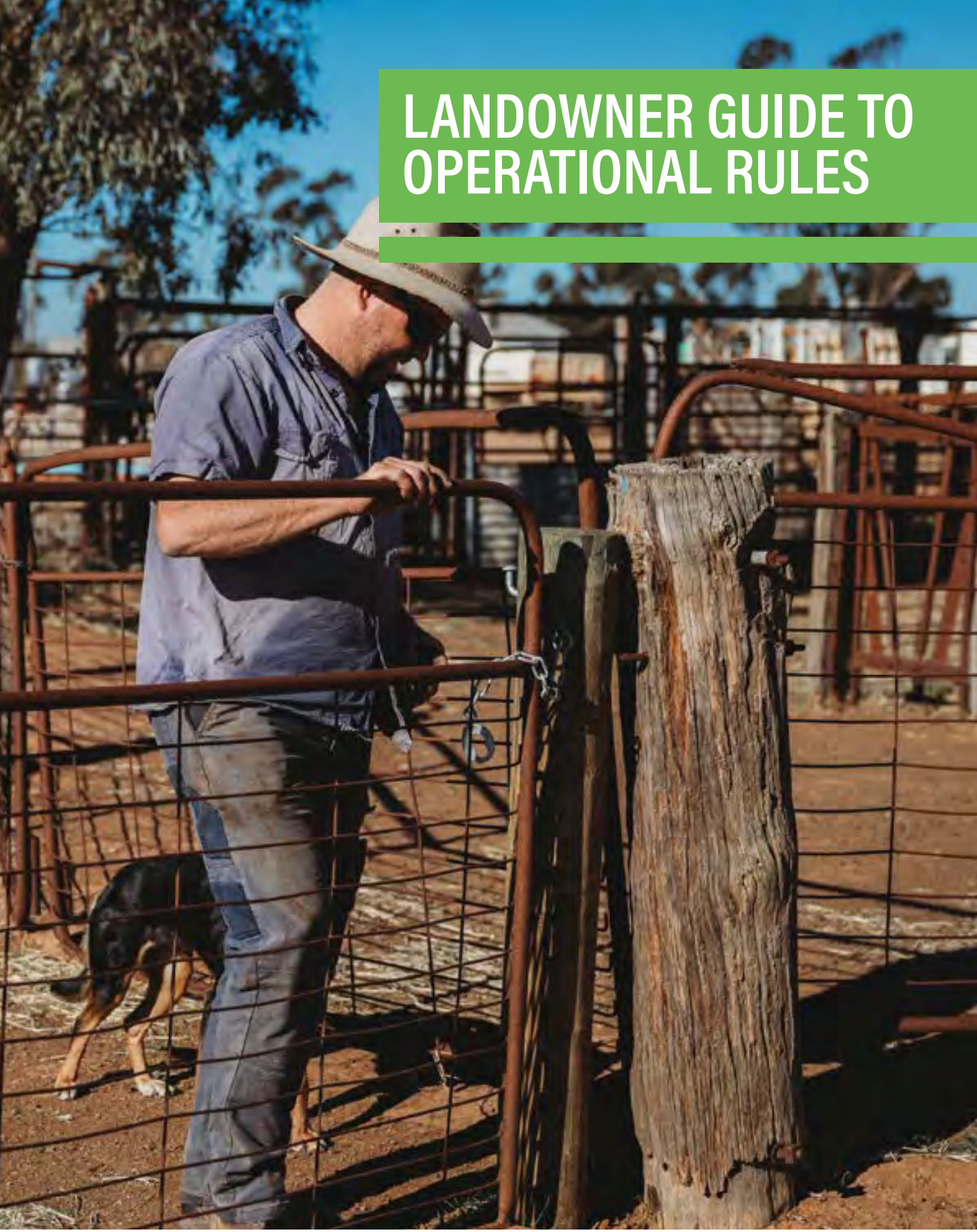
LANDOWNER GUIDE TO OPERATIONAL RULES



Goulburn-Murray WATER

Water Efficiency Project

Images in this document by Kayla Frizzell

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We use case studies in this guide to help explain certain concepts. The names used and the situations used are fictional and not intended to resemble real life.

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MEANINGS OF THE TERMS WE USE:

You
An owner of a property or multiple properties that are serviced by assets proposed to be treated as part of the GMW Water Efficiency Project.

We
The Water Efficiency Project or an authorised representative of the Project (such as a contractor engaged by the Project).

Water Efficiency Project
The $177.5 million Commonwealth funded project focused on upgrading or decommissioning ageing off-farm infrastructure in the Goulburn Murray Irrigation District.

Fit for purpose
A fit for purpose solution is one that is appropriate based on historic water use and intended future use. This is determined in accordance with the GMW Water Efficiency Project's Operational Rules.

Goulburn-Murray Water
The rural water corporation responsible for delivering the Water Efficiency Project.

On-farm works design
The works that the Project proposes to construct on a property associated with reconnecting the property to the reconfigured GMW water delivery system.

Independent review
An additional layer of assurance to landowners that our draft final reconfiguration plans are consistent with our Operational Rules.

The Independent Reviewer provides recommendations to the Project as to whether GMW's reconfiguration plan or proposed landowner agreement for on-farm works are consistent with the Project's Operational Rules and policies.

Operational Rules
A set of principles proposed by the Water Efficiency Project to guide project staff in making design and operations decisions.

The principles address matter such as how we determine the flow rate for each service point which then determines the size and type of service point,, GMW pipeline/channel levels of service, operational and maintenance payments, voluntary dry-off, co-contribution and property consolidation.

Reconfiguration
The process in which GMW rearranges, reshapes, reforms and/or redesigns its water delivery infrastructure, which includes meters and channels.

Reconfiguration Plan
The adopted plan for reconfiguration of GMW-owned water delivery infrastructure (developed in accordance with Part 7A of the Water Act 1989).

Depending on the reconfiguration process adopted by GMW, the plan may go through several stages before it is adopted as final: desktop concept reconfiguration plan; concept reconfiguration plan; draft final reconfiguration plan and finally, a reconfiguration plan.

Delivery share
An entitlement to have water delivered to land in an irrigation area. It gives access to a share of the available capacity in the channel or piped network that supplies water to the property.

Landowner agreement for on-farm works
The formal legal agreement that we use to carry out any works on farm to reconnect water supply.

Service Point
The location where water is delivered to an individual farm from the communal water system.

SPO
Small Pipe Outlet (supplies stock and domestic water)

WUL
Water Use License – an entitlement to irrigate a specific parcel or parcels of land

WUR
Water Use Registration – authorises the use of non-irrigation water like stock and domestic or some industrial uses.

D&S
Stock and Domestic supply

DFR
Determined Flow Rate

LMO
Large Meter Outlet

INTRODUCTION

The GMW Water Efficiency Project (Project) is delivering modernisation and rationalisation works that have been identified across the Goulburn-Murray Irrigation District (GMID) to deliver automation and rationalisation opportunities and water savings.

The Project is expected to benefit approximately 1,000 customers by modernising or decommissioning more than 250 km of channels and upgrading or rationalising more than 1,000 outlets. Water savings totalling 15.9 GL will be achieved by undertaking these works.

The Project provides the opportunity for the recovery of water through investment in efficiency measures, which will generate benefits for local and regional communities, reduce the ongoing asset financial liability and achieve environmental enhancements.

The GMW Water Efficiency Project will use off-farm infrastructure changes to help meet Victoria's obligations as part of the Murray Darling Basin Plan and avoids water buy-backs by the Commonwealth Government.

The scope of the GMW Water Efficiency Project includes treating channels and meters throughout all six GMID areas. This is an opportunity to rationalise some parts of the ageing irrigation system, and reduce ongoing asset liability.

Together with the recently completed $2 billion Connections Project, the GMW Water Efficiency Projects will maintain Victoria's competitive advantage in the agri-food sector with greater stability in its agricultural productive systems and providing a more sustainable future for the GMID and supporting further regional development.
We understand landowner input is essential in this process. We work hard to ensure our Project meets the Project's Operational Rules and landowner needs.

This document sets out to explain these rules. It's the framework we use to make decisions on how the Project is delivered. The Rules are designed to ensure the Project is developing solutions that meet irrigators' needs and that we're spending money wisely.

These Rules will, and have been, updated by the Project to incorporate new learnings. They are designed to be read in conjunction with the Water Efficiency Project Landowner Guide which is available on the Project website at:
www.gmwater.com.au/WEP

WEP OPERATIONAL RULES

GMW channel and pipeline capacity

The level of service (capacity or sizing) of new GMW assets, such as pipelines and outlets, is based on historical deliveries and annual usage requirements. This ensures the Project is providing the right level of service – it means landowners are getting the capacity for which there is a demonstrated need.

Service Points

Determining the Fit for Purpose Flow Rate

Fit for purpose means landowners are getting the flow rate they need. It also means the Project is spending money wisely.

The Project aims to:

- Rationalise as many service points as practicable, which will minimise ongoing costs to irrigators and GMW; and
- Provide a flow rate that is fit for purpose and meets irrigators' demonstrated needs.

For landowners there's an ongoing fee for each service point. Rationalising can provide cost benefits through reduced service point fees.

The fit for purpose flow rate to be provided through a modernised service point is initially based on the 90th percentile flow rate delivered during the previous 5 completed irrigation seasons to the end of the last completed full irrigation season, and any other seasons referred to in GMW's Conditions Determination.

The 90th percentile means that of all recorded flow rates during relevant irrigation seasons, only 10 per cent were larger than the proposed flow rate for a new service point. For example, if a flow rate is 5ML/d for 95per cent of the time, but 6ML/d is used for 5 per cent of the time, the 90th percentile flow rate will be 5ML/d.

This flow rate is known as the Indicative Flow Rate.

The Indicative Flow Rate gives an indication of what the flow rate for a new outlet should be. This rate can be modified in circumstances where:

- The Landowner can demonstrate a different flow rate is needed (whether this is higher or lower than that determined by the Project) and the Project team agrees to change the flow rate. We'll need documented evidence showing current or future farming practices to support any change; or
- A landowner makes a co-contribution (refer to page 8).

Where a flow rate is not changed by the Project, the landowner can make a co-contribution to having the flow rate and meter size changed.

Subject to any changes resulting from this process, the Project then confirms the determined flow rate. It will then be recorded in the relevant reconfiguration plan and/or landowner agreement for on-farm works, GMW's IPM System (known to landowners as WaterLine) and the Water Register.

Where it is decided to increase the flow rate at the Project's cost, the landowner must provide demonstrated evidence that a higher flow rate is required. Where the flow rate adopted does not meet the landowner's personal expectations, the landowner can contribute the additional capital cost of the upgraded service point (refer to page 8).

If a landowner accepts a lower flow rate than would otherwise be indicated by the Indicative Flow Rate and this results in the downsizing of the service point, the lower flow rate will be adopted as the determined flow rate.

Where multiple service points supply a property that will be replaced with one service point, they are to be treated as one service point for the purpose of determining the flow rate to the property.

EXAMPLE

If the property has three service points, each with historical flow rates of 7ML/d, and:

- They all operate at different times then the flow rate will be 7ML/d for the new service point; or
- Two operate together and the third at different times then the flow rate will be 14ML/d for the new service point; or
- All three service points operate together, and are equired to do so in the future, then the flow rate will be 21ML/d for the new service point.

Determined flow rates cannot exceed the capacity of the GMW delivery system or capacity of on-farm systems.

Headloss through a modernised service point

A large Dethridge meter outlet (LMO) was designed to utilise 75mm of head across the service point. What this means is that the water level on the farm side of the LMO is 75mm lower than the water level in the GMW channel.

The modernised service points are designed to utilise only 50mm of head across the service point, an increase in water level of 25mm on the farm side of the service point. The design head loss for service points on channels using greater than 15ML/d, or on GMW owned pipelines, is 75mm.

Modernised outlets provide lower headloss and therefore higher commandability.

While we stipulate a determined flow rate, there may be instances where the service point can deliver greater flows. Please note that this is dependent on the channel and on-farm conditions. To ensure the appropriate outlet size is installed for the determined flow rate to be achieved, survey will be undertaken at the outlet location.

Table 2 - Typical flow rates at adopted head loss

Service Point Type	Typical flow rate (ML/d)
375mm closed conduit	5.5
450Mann Pit	10.3
450Mann Pit with shroud	12.5
600Mann Pit	25

Rationalise (existing service point removed)

A one-off payment may be available to landowners in return for their agreement to rationalise a service point and in lieu of any on-farm works.

Where on-farm works are needed to enable the rationalisation of a service point, the Project will do works up to the equivalent value of replacing the service point that is to be rationalised.

Where the cost of connecting works exceeds the cost of the service point, co-contribution can be made to make the works cost neutral to the Project.

The Project will not cover any costs associated with delivery share termination for single outlet rationalisations.

Replace (replace the LMO with a flow meter)

A service point will be replaced where it is determined the service point cannot be rationalised, uses greater than 10ML/year and is value for money to replace.

Landowners will be responsible for future service point fees in accordance with the standard fee schedule dependent upon the type of service point installed.

Retain

Where it is determined the service point cannot be rationalised, and the use is less than 10ML/year, the service point will be retained as is.

Retaining service points with low water use is one way the Project ensures it is spending money wisely. It means we're focusing on upgrading our region's primary producers.

On channels which we proposed to retain, all small pipeline outlets (SPOs) will be retained.

Service points on channels to be rationalised or replaced with GMW pipelines

The Project aims to rationalise as many service points as practicable, and will typically construct only one irrigation service point per WUL held, with the following exceptions:

- One service point will not meet the existing demand of the property, or
- The property has demonstrated water use in excess of 500ML/year, or
- It costs more to replace only one meter with on-farm works than replacing multiple meters.

Where an irrigation service point has no history of usage, and there is no demonstrated requirement for an irrigation flow rate, there will be no provision of irrigation supply. Where required, the Project will provide a stock and domestic service point.

Domestic and Stock Service Points (SPOs)

The aim is to utilise the irrigation service points to provide D&S where practicable, or provide one SPO where this is not practicable.

Fees are also charged for each Domestic and Stock Service Point – so reducing SPOs can also help reduce costs.

GMW may elect to meter any SPOs installed, typically if:

- The usage will exceed 10ML/yr; or
- The supply is for commercial use (i.e. dairy wash down, factory etc); or
- Supply is via a pipeline design to provide a head at the SPO of 6m of greater.
- Service points on retained channels

Service points on retained channels will fall into one of three categories

On-Farm Works

On-farm works are designed to maintain existing service arrangements. This means reconnecting the irrigation footprint as it currently exists where service points are rationalised, as cost effectively as possible.

Where a landowner wishes to irrigate additional land or undertake additional works, this is to be undertaken at the landowner's expense through a co-contribution arrangement.

The order of preference for on-farm infrastructure required for reconnection is generally:

- Gravity channel
- Gravity pipeline
- Gravity channel with a lift pump
- Pumped pipeline

Where a gravity channel requires the bed of the channel to be above natural service, alternatives will be investigated to minimise the risk of leakage and blow outs.

Pipelines are the preferred solution over channels where the infrastructure crosses another property (anywhere other than immediately adjacent to the property boundary).

In addition, pipelines are preferred where construction, drainage or flooding, environmental or cultural heritage constraints do not permit channel construction.

Where the on-farm works offered do not meet the landowner's personal preferences, the landowner may decide to contribute the additional capital cost of the works (refer to Co-Contribution section of this guide).

The Project will design and construct on-farm works to a standard developed in conjunction with farm designers with many years' experience in the Goulburn Murray Irrigation District. Using experienced farm designers to work with landowners to engage and construct on-farm systems allows irrigators to take full advantage of the modernised delivery system.

The Project will provide a 12 month defects liability period for the design and construction of on-farm works.

Operation and Maintenance Payments

In most circumstances, where a preferred solution requires a landowner to own additional assets, an operations and maintenance payment will be offered to the landowner.

This payment is to offset the ongoing costs associated with operating and maintaining these assets.

This will be paid as a one-off Present Value payment based on a 20-year period.

Co-contribution

During engagement a landowner may advise that they plan to undertake additional on-farm works over and above the solution to be delivered by the Project. This may be the GMW infrastructure itself (e.g. service point) or may be the on-farm works, or both.

A co-contribution agreement can be developed, with either the Project or the landowner undertaking the works. In either case, the Project will undertake the works necessary to upgrade GMW's assets as necessary.

The Project will undertake all works where there is certainty on the delivery schedule and cost. For example, a service point or pipe size upgrade, or upgrade of a simple farm channel to a gravity pipeline, would be undertaken by the Project.

The additional cost will include any cost increase associated with the GMW assets (pipelines, meters, etc.) or the on-farm works. For example, where a landowner proposes to materially change the irrigation layout or the irrigation method (e.g. from gravity to pumped irrigation), the landowner must pay all of the estimated costs above the original solution to the Project before a date nominated in the landowner agreement. Should payment not be received by the Project, the original proposed scope will be constructed.

In some cases, the landowner may be permitted to undertake on-farm works themselves. This is where the additional works cost and delivery schedules do not have certainty. Where this option is selected, an amount payable to the landowner to complete the works will be calculated (equal to the value of the on-farm works required as part of the landowner's reconnection solution). This is a fixed sum payable by the Project, paid progressively as works are completed.

All risks for design and cost are to be met by the landowner where there is identified environmental or cultural heritage management associated with the works. The landowner must engage and utilise an appropriately qualified and experienced project manager to oversee the works on farm.

Property Consolidation

Landowners can ask the Project to investigate opportunities to consolidate contiguous properties. This can provide benefits to landowners through less service points and less infrastructure to maintain.

Property consolidations are the amalgamation of two separately owned, contiguous properties that can enable the consolidation and rationalisation of irrigation infrastructure, thereby generating water savings or reducing the number of private connections. The Project may provide contributory funding related to the purchase of a property in agreed circumstances.

Consolidations will only be investigated by the Project as a result of any approach from a landowner. The Project will never initiate a property consolidation. Landowners should contact the Project as soon as possible if they are interested in exploring consolidation opportunities. The Project will undertake the calculations and assess the feasibility of the request.

The Project is not involved in any negotiations in respect of property transfer. Where a payment has been made previously on a purchased property no further payments (e.g. further connecting works or dry-off) will be made in respect of that property other than for rationalisation of GMW infrastructure.

Voluntary de-irrigation or dry-off

Voluntary de-irrigation is the term used when a landowner agrees to terminate irrigation service and replace this with a stock and domestic supply. Dry-off is the term when the property is provided no service from the irrigation network.

These options will not be considered for landowners on channels that are retained.

The de-irrigation or dry-off option can only be offered to landowners on a GMW channel that is proposed to be rationalised. In the case of a de-irrigation the property will be converted from a Water Use License to a Water Use Registration.

The delivery share will be proportionally terminated by the Project commensurate with future use and is undertaken at no cost to the landowner.

The delivery share will be the annual use divided by 100. For example a WUR created to supply 2ML/y will have the delivery share reduced to 0.02ML/d (4ML/y would be reduced to 0.04ML/d).

Partial dry-offs will only be considered where a property is physically split by assets such as roads, drains or railway lines and each section of the property has its own individual service point.

Road Crossing Ownership

Any road crossing of domestic and stock infrastructure installed by the Project, will be landowner owned, and therefore a private responsibility.

This also includes irrigation infrastructure constructed by landowners to transfer water across a road to an adjoining property, where initiated by the landowner to manage their enterprise (i.e. this infrastructure is not a result of the Project).

Land Acquisition

The Project may need to acquire a land interest to facilitate GMW asset construction. The acquisition of land interests by the Project is generally undertaken by agreement with landowners and is guided by expert valuation advice.

Fencing

As a general rule, landowners are responsible for ensuring their property has a boundary fence. However, the Project recognises that in some cases, GMW channels to be rationalised have performed the purposes of a fence, and in many instances a new fence will be erected. Where an existing fence is removed to allow for construction and decommissioning works a replacement fence will be erected.

The Project will provide a standard seven wire pine post and dropper fence design. If a landowner requires a higher standard, the landowner must pay the additional cost. However, where the Project removes a fence that is of a better standard and is in good condition, it will be replaced to a similar standard.

Construction Impacts

Generally, we will try to plan our construction works around your farming operations. However, we may not not always be able to avoid a disruption to on-farm operations or productivity.

We will work with you to identify the best way to mitigate any potential impacts to your on-farm operations or damage to crops resulting from the delivery of works.

Exceptional Circumstances

Landowners who require significant on-farm works and are experiencing exceptional circumstances that are directly impacting on their ability to engage with the Project, may be eligible for exceptional circumstances consideration.

Exceptional circumstances can include (but are not limited to) a major personal crisis which has occurred beyond the landowner's control and impacts their availability and/or capacity to make decisions.

Once approved, the Project can make allowances for additional time to engage with the Project and consider the works being proposed. We will also try to provide additional assistance to the landowner, which may include independent financial or engineering advice, or similar.

COMPLAINTS MANAGEMENT

To ensure greater accountability for, and responsiveness to, landowner and stakeholder complaints, the GMW Water Efficiency Project has a dedicated complaints team.

The Project will accept complaints verbally or via email.

A response to a complaint will deal with the substance of the complaint, or in more complex cases, will inform the landowner or stakeholder when they will receive such a reply. The response issued will provide reasons for any decision given, and if appropriate, will include the legislative or policy basis for the decision.

If you have a complaint, please contact the project team via the contact details provided below

Contact us

To find out more about the GMW Water Efficiency Projects, you can reach us in the following ways:

T: 1300 163 006
E: WEP@gmwater.com.au
W: www.gmwater.com.au/WEP

Contact us

GMW Efficiency Projects Team
Phone: 1300 163 006
Email: WEP@gmwater.com.au
Web: www.gmwater.com.au/WEP
Mail: PO Box 1404, Shepparton VIC 3632