

“LATE ITEM”

12.11 Business Plan Incorporating a Revitalisation Program and Economic Feasibility Analysis

File:	
Author:	Dominic Carbone, A/CEO
Interest Declared:	One of the Consultants engaged to prepare Business Plan
Date:	10 March 2016
Attachment -	Nil

Matter for Consideration

That Council give consideration to amendments of the content of the business plan and adopted it accordingly.

Background

At the MRVC Ordinary Council Meeting held on 13 December 2016 the Council adopted the following resolution.

“That Council request that the Business Plan be updated to incorporate the following:

- (1) The Economic Feasibility Analysis
- (2) Addressing the Cell size concerns in line with the Dog Action Plan.
- (3) Deletion of the dual funding from Federal \$18M and State \$1.1M Grants.
- (4) The Revitalisation Program as a deliverable of the MRVC and not by independent pastoralist group and committees and includes the engagement of a co-ordinator by the MRVC to administer the program.
- (5) Address concerns in participating in a pilot program.

Statutory Environment

Nil

Consultation

Nil

Comment

The Business Plan has been accordingly revised to incorporate the items listed in the Background above and Council is now requested to review and adopt the plan.

Voting Requirement

Simple majority


COUNCIL RESOLUTION:

Moved:

Seconded:

That Council adopt the Business Plan as presented.

CARRIED/LOST



MURCHISON REGIONAL VERMIN COUNCIL

Murchison Region Vermin Cell Fence Business Plan

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1.0 EXECUTIVE SUMMARY

Wild dog predation is a serious, yet not mutually exclusive problem facing pastoralists located throughout the Southern Rangelands of Western Australia. In conjunction with wild dog predation, environmental degradation has all but destroyed a large portion of the livestock industry in the Southern Rangelands.

The Murchison Regional Vermin Council (MRVC) comprises of the Shires of Cue, Meekatharra, Mount Magnet, Sandstone and Yalgoo. The MRVC was constituted in December 1963 under the provisions of the Local Government Act 1960 for the rehabilitation of and maintenance of the No. 1 Vermin Fence. This fence traversed from the Junction of the No. 1 and Emu fence at the 80 mile at Lake Nabberu and the No. 2 Vermin Fence, named "Gum Creek" junction at the 322 mile; and extended for a distance of 30 miles west and as far west as deemed necessary in order to maintain these fences in a dog proof condition. This business plan proposes to amend the existing constitution of the MRVC through the preparation of a new Establishment Agreement pursuant to the provisions of the Local Government Act 1995. This will allow the MRVC to undertake additional projects and be the project manager for the construction and maintenance of the new 326 kilometre vermin proof fence, which will enclose the Murchison Region Vermin Cell (Cell). The Establishment Agreement will need to be approved by the member local governments and the Minister for Local Government and Communities. Once the Establishment Agreement is approved and signed and each member local government has decided to participate in the project then the MRVC can commence the preparation of a project participants agreement. The business plan anticipates that the Shires of Cue, Mount Magnet and Yalgoo will be the project participants for the new 326 kilometre vermin proof fence project detailed in the plan.

The purpose of this Plan is as follows:

- To document the current problem faced by pastoralists from a wild dog perspective and the impact it has on pastoral production in the Murchison region, in particular the Murchison Region Vermin Cell.
- To document how the existing vermin fence has assisted the pastoral industry control the wild dog problem.
- To enable MRVC to construct a vermin proof fence approximately 326 kilometres in length, which will result in a fully enclosed Vermin Cell surrounding 52 pastoral stations.
- To enable MRVC to develop a funding model for the construction and ongoing maintenance of the vermin proof fence.
- To enable MRVC to put in place the relevant legal mechanisms to facilitate the construction and ongoing maintenance of the vermin proof fence.

- To document how the MRBA, in conjunction with DPaW, will undertake vermin control measures within the Murchison Region Vermin Cell.
- To document how the Independent Group will implement revitalization strategies and vermin control measures for the management of the environment within the Murchison Regional Vermin Cell and the role of the MRVC in the process.

The Cell comprises of 52 pastoral stations and 6 properties owned and managed by the Department of Parks and Wildlife. In order to create the Cell a new 326 kilometre vermin proof fence is required to be built which is bounded by part of the State Barrier Fence of the No. 1 Vermin Fence and the No. 2 Vermin Fence. The cost of the fence is estimated at \$3.5M and is proposed to be funded as follows:

- Government Grants State or Federal	\$2,900,000
- Participant Contributions (3 Shires)	\$ 100,000
- Loan Borrowings (MRVC)	<u>\$ 500,000</u>
Total	<u>\$3,500,000</u>

The participating member local governments will make annual contributions of \$86,333 to \$99,733 for the first 5 years of the plan, which will be adjusted accordingly over the life of the fence for cost increases and the repayment of a loan over 20 years; to meet the ongoing maintenance, renewals and loan repayments. Each participating local government may choose to make their share of the contribution from its own resources or levy a specified area rate on pastoral leases within their boundary and the cell.

The creation of the cell in itself will not solve all the problems facing the pastoralists, as they still need to deal with environmental issues, productivity and natural resource management in order to ensure the long-term sustainability of the Cell. A Revitalization Program for the Cell has been prepared and is attachment to the plan with the aim of implementing a regime of management practices – those that are “leading practice” which will result in:

- Excellent animal husbandry to facilitate productivity improvements
- The ability to nurture the rangeland such that the carrying capacity increases, becomes more robust and provides the nutrition which enables livestock to express their full genetic potential
- Build a business and enterprise structure that reduces the impact of wild dogs.

Independent Groups will undertake the delivery of revitalisation programs. These groups will be formed for the purpose of each strategy/activity, with assistance obtained from external consultants/contractors as required and will be co-ordinated by the MRVC. The sum of approximately \$50,000 pa has been allocated for the purpose.

The cell will bring the following benefits:

Primary Benefits

- Fully enclosed area that will create a vermin proof cell.
- Ability to eradicate wild dogs, with the confidence that no new dogs will enter the cell.
- Construction of the fence will result in the segregation of the Cell from the environmental and production concerns of the region and create a bounded environment in which to trial innovative projects for managing natural resources.
- The vermin proof fence will allow pastoralists to implement a comprehensive revitalisation program with confidence.
- Ability of pastoralists to return to recommended Dry Sheep Equivalent (DSE) stocking rates, resulting in a five-fold increase on current numbers.
- The vermin cell fence will relieve wild dog pressures along an estimated 425 km of the state barrier fence reducing the number of wild dogs entering the agricultural areas.

Secondary Benefits

- Implementation of the revitalisation program involves the control of total grazing pressure through the construction of an exclusion fence, which will secure the environmental values within the Cell area.
- The revitalisation program will allow pastoralists to implement a range of 'leading' management practices.
- High expectation for increases in efficiency and profitability of various enterprises in the Cell.
- Significant long-term benefits through efficient production, lower debt levels, and overall reduced reliance on government support.
- There will be significant multiplier benefits to the economic and social viability of the local region through the creation of new jobs in the pastoral industry, such as transport, shearing, service sectors and potential re-opening of local abattoir.

Enclosing the Cell will restrict feral animals entering the cluster area and create an environment that can be sustainably and efficiently managed by all pastoralists associated with the Cell, and bring economic benefits to the pastoralists and the Region. The economic benefits range from \$260,000 to \$860,000 per annum for each of the 52 pastoral stations in the cell or \$13.52M to \$44.72M for the Cell. The benefits to the Region range from \$60,000 to \$400,000 per pastoral station or \$3.12M to \$20.8M for the Cell. Grant Consultants in their study Economic Feasibility Analysis on the implementation of the Murchison Regional Vermin Cell have estimated that wild dogs cost the producers and the community upwards of \$8,728M per annum in lost production.

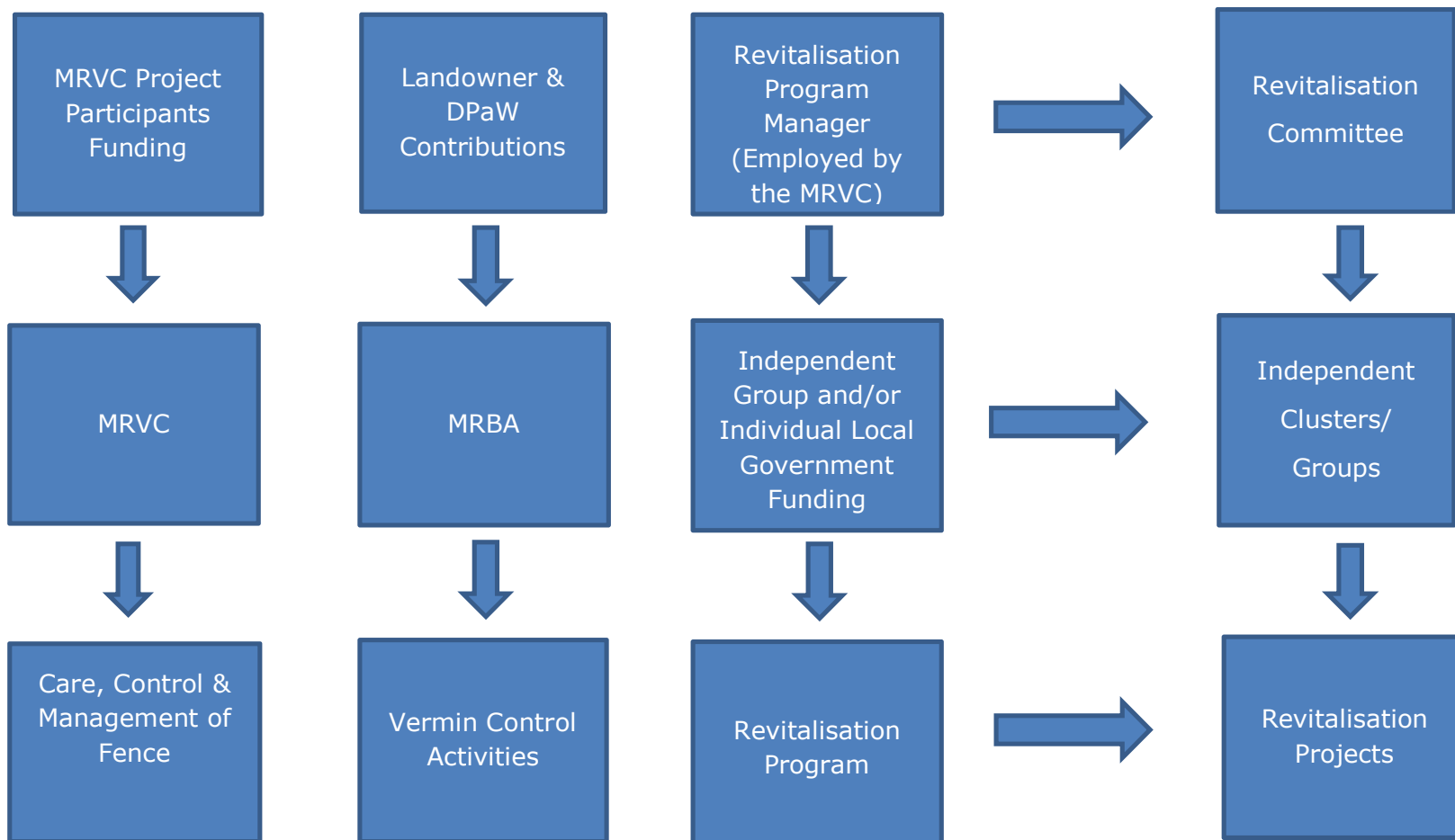
The business plan clearly indicates that the creation of the Cell will achieve the best possible outcomes for the pastoralists and the Region in securing the long-term viability of the pastoral industry in the Southern Rangelands.

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2.0 PLAN FRAMEWORK AND PURPOSE

2.1 PLAN FRAMEWORK

The framework developed in compiling the Plan is as follows:



The role of the MRVC is to facilitate the construction and maintenance of the proposed vermin proof fence and to co-ordinate the role of independent groups and local governments in delivering revitalisation projects detailed below.

The role of the MRBA is to facilitate the control of vermin within the Murchison Region Vermin Cell.

The role of the independent Group, in conjunction with the local governments, is to adopt triple bottom line strategies/activities for managing productivity and sustainability of pastoral operations within the cell.

2.2 PURPOSE OF PLAN

The purpose of this Plan is as follows:

- To document the current problem faced by pastoralists from a wild dog perspective and the impact it has on pastoral production in the Murchison region, in particular the Murchison Region Vermin Cell.
- To document how the existing vermin fence has assisted the pastoral industry control the wild dog problem.
- To enable MRVC to construct a vermin proof fence approximately 326 kilometres in length, which will result in a fully enclosed Vermin Cell surrounding 52 pastoral stations.
- To enable MRVC to develop a funding model for the construction and ongoing maintenance of the vermin proof fence.
- To enable MRVC to put in place the relevant legal mechanisms to facilitate the construction and ongoing maintenance of the vermin proof fence.
- To document how the MRBA, in conjunction with DPaW, will undertake vermin control measures within the Murchison Region Vermin Cell.
- To document how the Independent Group will implement revitalization strategies and vermin control measures for the management of the environment within the Murchison Regional Vermin Cell and the role of the MRVC in the process.

3.0 PROPOSAL

The Plan incorporates the following:

- Negotiation of a Memorandum of Understanding (MoU) between the Murchison Region Vermin Council (MRVC) and participating member local governments.
- Variation to the MRVC Establishment Agreement and project participant's agreement to permit the construction and maintenance of the vermin proof fence by MRVC.
- Implementation of appropriate legal instruments to provide access to pastoral properties for the construction and maintenance of the vermin proof fence.
- Statutory approvals required to permit the construction of the vermin proof fence.
- Costs associated with the construction and maintenance of the vermin proof fence.
- Funding options and mechanisms for the construction and maintenance of the vermin proof fence within the Vermin Region Cell.
- The delivery of vermin control measures by the Meekatharra Rangelands Biosecurity Association (MRBA), in conjunction with DPaW, within the Murchison Region Vermin Cell.
- The delivery of revitalisation program by the Independent Groups and individual local governments to increase the productivity and sustainability of the pastoral industry within the Vermin Region Cell. The MRVC to act as the co-ordinator for the programs.

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4.0 BACKGROUND

Wild dog predation is a serious, yet not mutually exclusive, problem facing pastoralists located throughout the Southern Rangelands of Western Australia.

In conjunction with wild dog predation, environmental degradation has all but destroyed a large portion of the small livestock industry in the Southern Rangelands. Such dire circumstances require urgent solutions to address-

- (a) wild dog predation; and
- (b) the subsequent revitalisation of the Southern Rangelands.

4.1 PREDATION PROBLEM

Wild dog management is a challenge because of the nature of the problem. It requires a collaborative and coordinated action by all landholders. No individual landholder can capture the full benefits of wild dog control if their neighbours are not taking similar action. The management of wild dogs is further complicated by different types of landholders with different objectives. Private/lease landholders are generally seeking to run profitable farm businesses, while governments managing public land, including national parks or state forests, have other goals (ABARES 2014). Where private/lease landholders share boundaries with public lands the management of wild dogs can be particularly difficult, with the public land becoming a home and potential 'refuge' for wild dogs.

The latest studies from the Australian Bureau of Agricultural and Resource Economics and Sciences (ABARES), commissioned by Australian Wool Innovation, suggest livestock producers in WA spend around 32 days and over \$9,000 per year on wild dog management [and] those figures only take into account the direct costs of management efforts, like baiting, trapping, and so on (Nationals for Regions 2015). The dingo or wild dog (*Canis lupus dingo*, *Canis lupus dingo* x *Canis lupus familiaris*, *Canis lupus familiaris* feral) is found across most of Western Australia (WA).

Wild dogs kill and eat mainly according to need in unstocked areas. But when they move into sheep paddocks most begin to harass, bite and kill sheep, often without eating any. This behaviour appears to be a response to an abundant and panicky prey in flight. Such attacks and harassment may cause severe losses to pastoralists (DAFWA 2014).

At the enterprise level, wild dog attacks on livestock can quickly reduce productivity and profitability (McLeod 2004; Norris et al. 2006; Wicks & Allen 2012). This may result from several aspects of the attacks:

- the immediate or later death of attacked animals reduces the number of stock for breeding and production. The rate of genetic gain can also be slowed because reduced capacity to apply selection pressure when wild dogs reduce reproductive output
- genetic improvements achieved over many years through selective breeding can be lost when individual rams and their progeny are killed
- carcasses of livestock injured by wild dogs may be downgraded when the injured animals are subsequently slaughtered for their meat, and thus may be worth less in the market
- livestock stressed by wild dog attacks may lose weight or fail to reach target weights and hence lose market value; stressed sheep produce less wool, recovering calves grow more slowly
- lambs that are separated from ewes during an attack may later die, and high-value lamb carcasses and/or fleece may be lost to the enterprise
- wild dogs may spread livestock diseases, leading to condemnation of offal products, which in turn may affect the profitability of the enterprise.

Wild Dogs Impact in the Southern Rangelands

Where wild dogs are present in Southern Rangelands, small livestock (sheep and goats) are vulnerable to wild dog attacks. These attacks can cause not only the death of lambs but also severe injuries to juvenile and adult sheep and goats

The reduced livestock productivity as a result from wild dog attacks has had a severe impact on individual enterprises and the Southern Rangelands economy as a whole. For example, across the Murchison in recent years there has been a strong trend in enterprise to move away from merino sheep to meat sheep and rangeland goats. This was partly due to low wool prices, high meat prices, and difficulty in finding labour for wool enterprises and wild-dog predation on sheep.

The current challenge facing landholders and governments alike is to implement policies and programs that support coordinated wild dog management in order to ensure the benefits of control are fully realized; but to do this in a way that does not take over, or crowd out, private investments. Current programs have enlisted a number of strategies to combat wild dog predation. Such strategies include, but are not limited to:

- Baiting
- Trapping

- Fencing
- Dogging

The proposed Vermin Cell Fence is one method guaranteeing a coordinated vermin control approach, which also has the support of landholders. Currently, businesses with the Cell are unprofitable due to low livestock numbers, and their stock being unproductive, largely caused by wild dog predation. Further exacerbating the problem is the current inability to reduce overhead costs, despite the low stock numbers and productivity.

The construction of the Murchison Region Vermin Cell, when combined with current dogging and baiting programs being managed by the Meekatharra Rangelands Biosecurity Association, and those individual projects undertaken by landholders, will overtime enable large reductions in the wild dog population to be sustained, thus giving hope to those seeking to re-establish financially viable small stock enterprises.

Wild Dogs Impact On Proposed Murchison Vermin Cell

The reduced livestock productivity as a result from wild dog attacks has had a severe impact on individual enterprises and the economy as a whole. A survey was conducted in October 2012 and sent to 53 pastoral stations in the Shires of Cue, Mount Magnet, Sandstone and Yalgoo. A response rate of 32% (17) was received. The survey response received has a sampling error of within +/- 5.5% at the 95% confidence level. The results indicate that the responses received were mainly from pastoral stations that were still working and running stock, whereas those not running stock did not respond. Survey results were-

- 95% of respondents advised they had wild dogs on their property
- The average number of wild dogs recorded was 9.88 per respondent
- 90.9% of respondents reported using baiting as the primary method of reducing dog numbers
- Average number of sheep lost due to wild dog attacks per annum per respondent 313
- Average number of cattle lost due to wild dog attacks per annum per respondent 9.25
- Average number of goats lost due to wild dog attacks per annum per respondent 1,160
- The average annual loss in monetary value due to dog attacks per respondent was \$90,490
- 85.7% of all respondents considered that a vermin proof cell in conjunction with the current wild dog control program would be an effective method of combating wild dogs.

- 86% of respondents also considered foxes to be vermin and present on their property.
- 55% of respondents have ceased to run small stock (sheep) as a result of wild dogs
- 81% of those respondents who have ceased to run small stock would re-instate those enterprises again if the wild dogs were reduced to insignificant numbers.
- 90% of the respondents consider that the reducing wild dog numbers to insignificant levels would have positive environmental and conservation benefits on their property.

The conclusions of the survey were-

- 14.5% of all sheep are being lost to wild dog attacks on an annual basis;
- 2% of all cattle are being lost to wild dog attacks on an annual basis; and
- 37% of all goats are being lost to wild dog attacks on an annual basis.

This loss has notably impacted on the degree of individual productivity and prosperity and the overall economic viability of the region.

A more recent study conducted by Rural Business Solutions Pty Ltd in 2014, titled '*The Projected Financial and Economic Benefits to Pastoral Businesses of the Proposed Murchison Region Vermin Cell Report*' detailed the economic impact of wild dogs on pastoral enterprises-

- Pastoralists reported wild dogs impacting their Merino enterprises in the order of 40% to 75% of the calculated deaths, causing a reduction in lambings of between 30% and 60%, and wool cuts being reduced by approximately 20%.
- Those with meat sheep enterprises estimated lamb losses (from birth to weaning or sale) from wild dogs of around 15% to 20%, and losses in adult sheep as a result of dogs at around 10% to 12%.
- The reported impact of the wild dogs on cattle enterprises ranged from "no effect"; "we don't see the results, but calvings have fallen sharply in the last 5 years" to a 1% to 5% reduction in calving rates. Pastoralists also report a reduction in cattle sale weights through harassment and stress, although the weight reduction was difficult for pastoralists to quantify.
- The harvesting of rangeland goats has also been significantly affected by the presence of wild dogs. Two pastoralists were unable to harvest any goats in 2011-12, down from as many as 2,000 head in previous years. Others report a reduction in kidding from 50% to "did not see any kids in the 2011-12 year". Estimates of adult goat death rates caused by dogs range

between 10% and 17% of the goats estimated to be on the station. As the goats are unmanaged, these can be difficult figures to quantify.

- Despite the obvious difficulties in quantifying the actual losses caused by wild dogs in a rangeland environment, the economic and financial analysis of these stations clearly highlight the poor profitability, productivity and turnover; and a significant proportion of this must be caused by the impact of wild dogs.
- In addition to the impact on livestock productivity, there is also the issue of the additional time and cost incurred in predator control, not to mention the personal toll due to stress and worry. One pastoralist reported spending 130 days per year on wild dog control. That doesn't leave enough time for "best practice" management of the livestock enterprises.

4.2 REVITALISATION CHALLENGES FACING PASTORALISTS

The Murchison Region Vermin Cell seeks to improve the overall biodiversity values of the region with a strong focus on cost-effective economies of scale developments. The Cell revitalisation landscape management project involves the control of total grazing pressure (TGP) through the construction of vermin proof fence surrounding a cluster of stations, securing the environmental values within the cluster area. Through the use of this fence, the area can be segregated from the environmental and production concerns affecting the region. The fence is intended to restrict feral animals entering the cluster area, and create an environment that can be sustainably and efficiently managed by all landholders associated with the cluster.

Grazing of livestock is the most extensive land use in proposed Cell. Projected changes in climate will also impact the future way in which pastoralism occurs within the Cell and adaptations will be required, both at enterprise scale, the Cell as a whole, and regionally. Longer term, systemic or major structural changes are probably required at both enterprise and regional scales to enhance environmental, economic and social components of resilience. For those pastoralists within the Cell this may amount to transformational change, for example, movement from traditional wool production based on merinos to meat sheep (Dorpers, Damaras, etc.) as has been the case for some enterprises located throughout the Murchison.

The larger and more long-term challenge is to implement management practices on stations throughout the Cell (and the region) that will build on the productivity improvements achieved through simply removing the wild dogs, and change the structure such that overhead costs are not the crippling factor they are today. Implicit in this, is, that along with advances in productivity and cost reductions, turnover must be increased at the same time.

4.3 HISTORY OF VERMIN PROOF FENCE

The No 1 Vermin Fence was completed in 1907 and at the time was the longest unbroken line of fence in the world. The No 1 Fence runs from Starvation Boat Harbour on the south coast to a point near Cape Karaudren on the North West Coast. The fence was built in an endeavour to stem the hordes of rabbits from eating their way west from the eastern states. Today the fence remains an important barrier for the pastoralists of the region.

The section of fence under the control of the Murchison Region Vermin Council (MRVC) extends from the 80 mile peg in the south (Lake Moore) to the 426 mile peg in the north (Meekatharra/Wiluna Road), (RSM Bird Cameron, 2014).

The existing No 2 Spur Vermin Fence extends west from the No 1 Vermin Fence and terminates approximately 50 km south east of Meekatharra, on the northern boundary of the property "Hillview".

4.4 INITIAL BUSINESS CASE FOR CONSTRUCTION OF MRVC VERMIN CELL

A business case was prepared by the Shire of Mount Magnet to support an application to the Midwest Development Commission under the Midwest Investment Plan for funding of \$4,534,000 to assist in the construction of a vermin proof fence to complete the Murchison Region Vermin Cell. The total cost of the project was estimated at \$5,822,000, with the balance of funding to be sourced from the Country Local Government Fund and participating member local governments.

The business case was submitted to the Midwest Development Commission in January 2014. The business case was referred to the Department of Regional Development for assessment and submission to Cabinet. Through the Cabinet submission drafting and development process, the Department of Regional Development (DRD) provided Treasury with the draft Cabinet submission and the business case and attachments for the Shire of Mount Magnet Murchison Region Vermin Cell. The Treasury analysts reviewed the submission and provided both general and specific comments as follows:-

4.4.1 GENERAL COMMENTS

- Private sector funding contribution is unconfirmed.
- Pastoralist contributions cannot be levied under the *Biosecurity and Agricultural Management Act 2007* 'Industry Funding Scheme'.
- The responsibility for the ongoing maintenance of the fence remains unresolved.
- The business case proposal proposes to commit the State to the funding prior to the development of a detailed Implementation Plan, an appropriate governance framework, a project delivery framework, construction schedule, resource management plan,

communications and stakeholder engagement plan, risk management plan, review and monitoring framework, post construction fence maintenance strategy, and the management of future wild dog control programs. Treasury suggested that these items be progressed to a level where in principal agreement with the pastoralist has been reached so that all parties know the costs associated with progressing the project.

4.4.2 SPECIFIC COMMENTS

- Business Case does not provide clear explanation of the problem, its magnitude, and has provided limited information on how it has exacerbated over the years and on previous fencing. It does not provide sufficient information on other strategies put in place to address the problem in the past. For example, what is the expectation of the Minister's announcement of \$100 per wild dog bounty? What is it expected to achieve, over what period of time? How is it being monitored and reported?
- It would be useful if the Business Case provided more detailed information on how previous fencing has assisted in controlling wild dogs.
- It is unclear what the \$4.5m from Royalties for Regions (RfR) and the \$1m from the DRD are going to fund, what areas are within and outside the reserves, and if the monies can be spent as proposed according to current legislation.
- There is no information on who / which department would have responsibility for the fence, or risks associated with it not being on an allocated reserve.
- Reference to the pastoralists contributing 50% of the \$4,534m being sought is misleading, as it can be 'financial or in-kind' contributions, and it suggests they are contributing to the constructing of the fence. The use of this contribution is also unclear in statements that refer it will be used for maintenance and for development of agriculture practices. Clarification on what proportion of financial and 'in-kind' contribution is needed; what 'in-kind' contribution is expected; how it would be value; and detailed information on what these contributions are intended to fund. In addition, clarification on how it would be managed, including dispute resolution.
- It is difficult to determine the raft of funding sources coming from pastoralists and local government and what their intended use is. It is unclear if the \$1.022m from Country Local Government Fund (CLGF) is money they have raised through local government rates, DRD funding channelled through them, or money from various State Government collections.
- Advice from the State Solicitor's Office (SSO) suggests that funding be sourced through individual contracts, however the submission states it will proceed with levies collected through the Biosecurity and Agriculture Management Act 2007 (BAM Act). It appears that advice from the SSO has not been taken into account.

- Additional contribution from pastoralists to the funds may have an impact on the Consolidated Account, and the estimated amounts would need to be specified.

Section 139(1) of the BAM Act states that:

For each financial year for which a rate is determined for the purposes of the Declared Pest Account, an amount equal to the rates amounts collected by the Commissioner under the rate determination is charged to the Consolidated Account, which this subsection appropriates accordingly.

This could mean that, if pastoralists intend to contribute to 50% of the project costs, the State would be liable to match the funding from the Cons Account, according to section 139(1) of the BAM Act.

- The Department of Agriculture and Food WA (DAFWA) has advised against the formation of a new Recognised Biosecurity Group (RBG) for the purpose of collecting of managing the 50% contributions from pastoralists (financially and in-kind), with these funds to go towards the construction of the 380km of fence outside the existing reserve (pg 4 of Business Case). The DAFWA stated that 'RBGs are primarily for the purpose of controlling widespread pests and a matched rate can only be used for the control of declared pests (not industry adjustment)'. DAFWA supports the use of funds towards maintenance of the fence.
- The status (and authority) of the RBG is not given. Authority for control of the 380km of fence by the RBG has not been established other than it appears to do so by non-binding agreement with the pastoralists. It is unknown if the RBG's has the ability to: (a) legally insure the fence, (b) fund its replacement, (c) any associated risks this poses if the fence is not in a reserve.
- The Business Case should identify the responsibilities of and financial impacts on each of the project's stakeholders (government agencies, local governments, pastoralists, etc). This would also help to clarify the various funding sources, and identify any risks. It should also include clear support (or otherwise) of these stakeholders, and confirmation of their capacity to pay. It should also list the membership of the proposed Interagency Working Group.
- The Department of Parks and Wildlife (DPaW) has advised that it estimates an additional cost of \$200,000 per year until dogs are removed, and that the agency:
 - has not made any commitment in relation to providing additional resources;
 - has limited capacity to meet the current wild dog control program; and
 - has no resources to direct to an increase in effort.

- It would be useful to identify how much State Government has expended on the control of wild dogs over the years, and any funding allocated in the forward estimates.
- It appears that the Department of Aboriginal Affairs and the Office of Native Title were not consulted, and it would be advisable to do so or clarify that consideration has been given to their roles.

The aim of this business plan is to address these concerns.

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5.0 KEY STAKEHOLDERS

Key stakeholders relevant to this proposal include-

- (1) Murchison Regional Vermin Council;
- (2) Project participants, being the Shires of Cue, Mount Magnet and Yalgoo; (have properties outside the LGA's listed, may need to include other LGA's where the pastoral properties are located)
- (3) State government agencies; and
- (4) Private pastoral lease holders as identified below-

STATION NAME	STATION NAME
Bimbijy	Boogardie
Mouroubra	Hy Brazil
Nalbarra	Windsor
Ningham	Wondinong
Pullagaroo	Wynyangoo
Maranalgo	Wanarie
Pindabunna	Mt Farmer
Narndee/Boodanoo	Yarraquin
Wydgee	Annean
Oudabunna	Cogla Downs
Badja	Nallan
Muragarra	Yarrabubba
Nalbarra	Hillview
Kirkalocka	Karbar
Meeline	Coodardy
Iowna	The Glen
Windimurra/Challa	Meka
Wogarno	Bunnawarra
Yoweragabbie	Wandarra
Mumbinia	Pindathuna
Carlaminda	Jingimurra
Wagga Wagga	Poelle

STATION NAME	STATION NAME
Edah	Austin Downs
Murrum	Norie
Madoonga	Melangata
Morawa	Beebyn

- (5) The Department of Parks and Wildlife own and manage four properties within the cell. The properties owned and managed by Department of Parks and Wildlife are:

Name
Thundelarra
Karroun Hill Nature Reserve
Dalgaranga
Noongal
Lakeside
Burnerbinmah

6.0 LEGAL STRUCTURE

6.1 MURCHISON REGIONAL VERMIN COUNCIL (MRVC)

The districts of the Shire of Cue, Shire of Meekatharra, Shire of Mount Magnet, Shire of Sandstone and Shire of Yalgoo were constituted as a regional district by virtue of an Order of the Governor made under the Former Local Government Act 1960 and published in the Government Gazette on 13 December 1963. Pursuant to the Former Act and by virtue of the Order of the Governor, a regional council was then constituted.

The regional council constituted was named the Murchison Regional Vermin Council (MRVC), by way of notice published in the Government Gazette on 13 December 1963.

The MRVC Constitution was amended on 14 October 1985.

6.2 MRVC CURRENT CONSTITUTION

The current MRVC constitution reads as follows:

This Council shall be called "Murchison Regional Vermin Council".

Members

- (a) The Constituent Municipalities of Meekatharra, Cue, Mount Magnet, Sandstone, and Yalgoo shall form the Murchison Regional Vermin Council.*
- (b) Ten (10) Regional Councillors shall comprise the Murchison Regional Vermin Council.*
- (c) Each Constituent Municipality shall appoint Two (2) Regional Councillors to the Murchison Regional Vermin Council.*
- (d) Each Constituent Municipality may appoint One (1) Deputy to the Council.*

Function

Is for the rehabilitation of and maintenance of the No. 1 Vermin Fence from the Junction of the No.1 and Emu Fence at the 80 mile at Lake Nabberu and the No.2 Vermin Fence, named "Gum Creek" Junction at the 322 mile and extending for a distance of 30 miles West and as far West as deemed necessary in order to maintain these fences in a "Dog Proof" (declared animal)

condition.

Contributions

(a) Each Constituent Municipality shall be levied a Precept of 'x' cents or part thereof in the Dollar on the Unimproved Capital Value of the area of the said Municipality on figures supplied by the individual Municipality.

The Precept for Financial Year to be determined at the Budget Meeting of the MRVC.

(b) A Rent shall be raised against all (Pastoral) Leaseholders adjacent to the No. 1 and No. 2 Vermin Fence.

Amount to be determined at the Budget Meeting.

(c) Matching monies from Agricultural Protection Board, via R.A.C. (Agricultural and Related Resources Protection Act) on a Dollar for Dollar basis.

Accounts

Accounts shall be issued in July of each Financial year.

Interest, at a rate to be set by MRVC may be added to accounts if not paid within a specified time.

Financial

Books of Financial records shall be kept in accordance with Part XXVII of the Local Government Act [1960].

The Council shall submit to Constituent Municipalities-

(a) An Audited Financial Statement of Affairs.

(b) Furnish a report on Council activities for the year.

Audit

At each Budget Meeting the Council shall appoint an Auditor.

Reserve Fund

Bush Fire Control, Flood Damage.

Where there are surplus funds, that these be directed to a Bush Fire and Flood Control Fund.

Experimental Funds

Donations made to MRV Council for specific purposes to be administered in accordance with donors specifications.

Secretary

A Secretary shall be appointed at the first meeting of a Financial year. Remuneration for Secretary to be nominated by the MRV Council.

Presidential Allowance

Shall be paid as determined by MRV Council.

Constituent Municipalities and Regional Councillors

Shall comply with Regulations as set out for Regional Councils of the Local Government Act [1960].

6.3 LOCAL GOVERNMENT ACT 1995 REQUIREMENTS

Pursuant to the transitional provisions under section 9.71 and clause 10 of Schedule 9.3 of the *Local Government Act 1995*, the regional council continues as a regional local government under the Act.

This business plan proposes that the MRVC be the project manager for the construction and maintenance of the vermin proof fence on behalf of the participating member local governments.

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7.0 ANALYSIS OF PROPOSAL

7.1 AMENDMENT TO ESTABLISHMENT AGREEMENT

In order for the MRVC to undertake additional projects, an amendment to the existing constitution, or a new establishment agreement, needs to be drafted.

The Establishment Agreement should contain a clause that provides the power for member local governments to participate in project(s) and give notice of their decision to the regional local government.

A project participant agreement should contain the following-

- | | |
|---|---|
| (1) Terms of project; | (6) Entitlement to operating surplus; |
| (2) Project budget; | (7) Late payment; |
| (3) Contributions to capital assets; | (8) Withdrawal from the project; |
| (4) Contributions to operating expenditure; | (9) Arrangements after withdrawal |
| (5) Proportional equity and liability | (10) Any other matters considered relevant to the project |

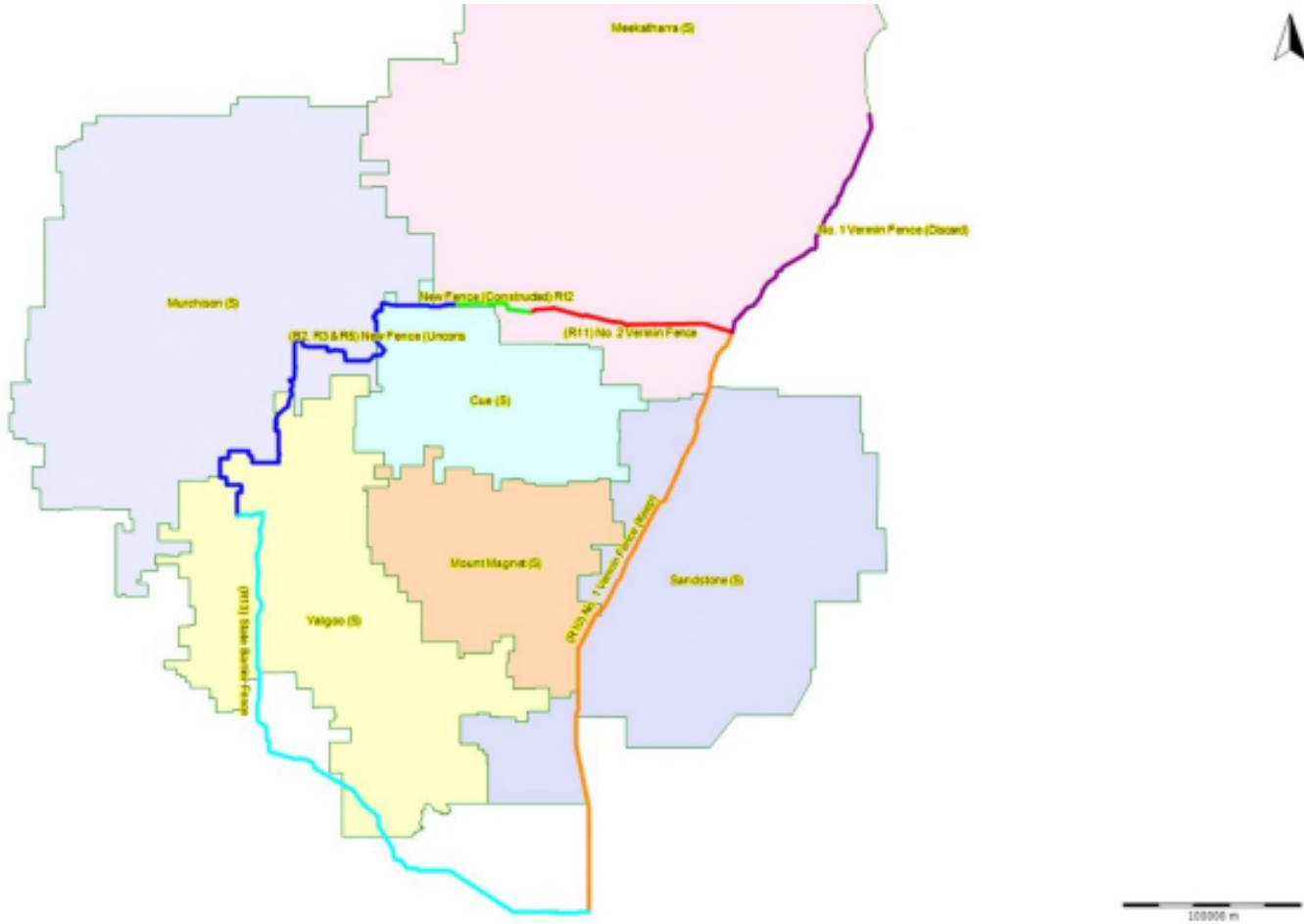
Solicitors have prepared a draft establishment agreement for approval by the member local governments and for submission to the Minister for Local Government and Communities for approval. Please see section 15.2 of this Plan.

Once the establishment agreement is approved and signed, and each member local government has decided to participate in the project, the MRVC can commence drafting a project participants agreement.

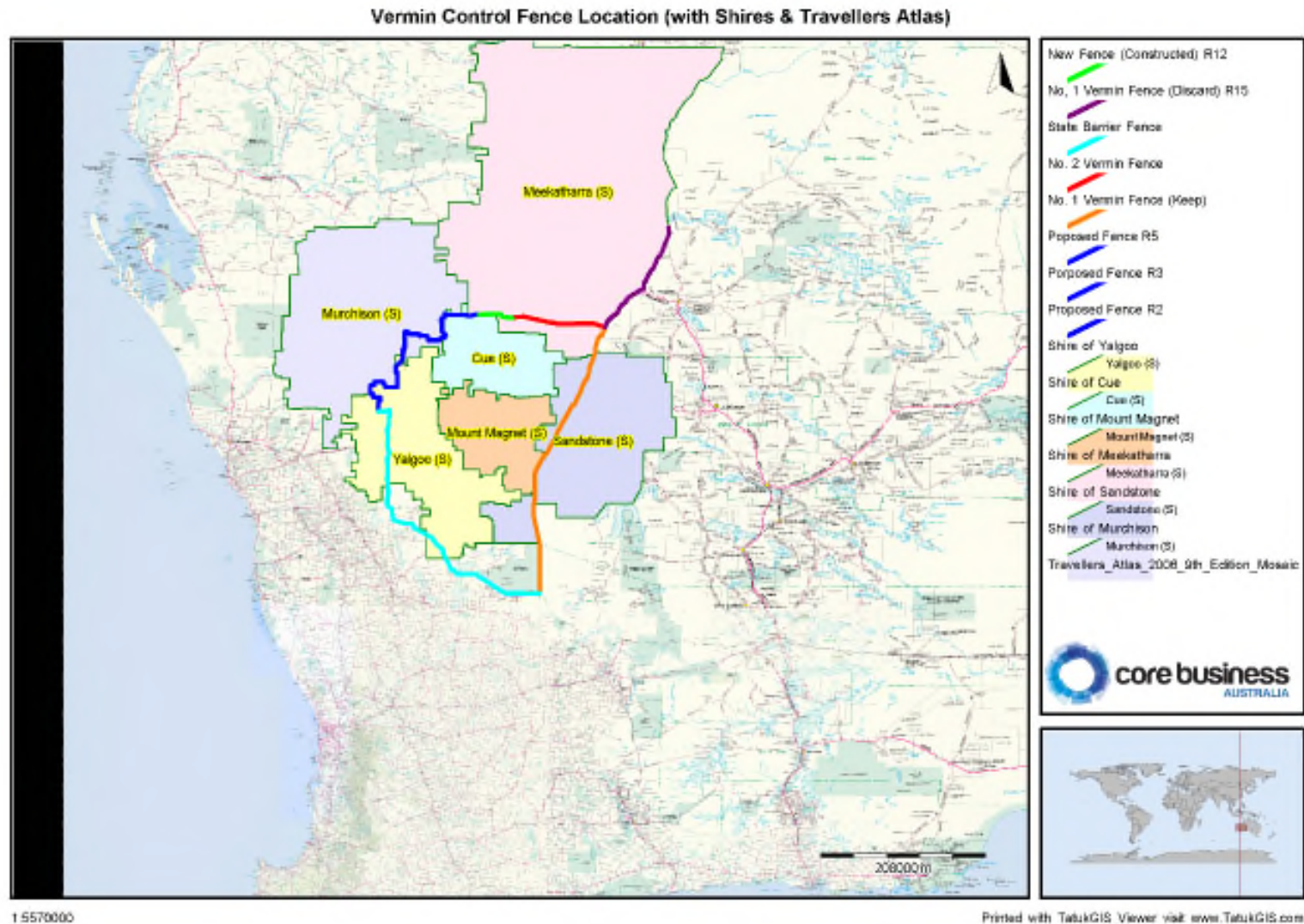
7.2 LAND TENURE AND ACCESS

7.2.1 ROUTE OF PROPOSED VERMIN PROOF FENCE

The identified route for the proposed 326 km vermin proof fence is outlined in dark blue in the figure below.



The following topographical maps provide more detail on the proposed route for the fence.



7.2.2 LAND TENURE

Before the proposed vermin proof fence can be constructed, legal access to the land on which the fence will be placed needs to be arranged. This access must be a legal access right that is ongoing so that the MRVC can enter the land at any stage and undertake future maintenance.

The route identified for the proposed vermin proof fence is located on Crown land that is subject to pastoral lease.

7.2.3 LEGAL ACCESS

There are three avenues of providing legal access to the land to construct and maintain the proposed vermin proof fence. They are –

(1) Easement

An easement is a grant of rights over the land by the property owner in favour of another person, to enter onto land for the purpose of installing and maintaining facilities such as cables, pipelines, etc.

Part 8 of the *Land Administration Act 1997* (LAA) provides for the granting and administration of easements over Crown land.

Specifically, section 144 of the LAA states-

144. Easements over Crown land, Minister's powers to grant etc.

(1) Subject to this section, the Minister may –

(a) with the consent of every management body of the relevant Crown land and of every person having any interest, right, title or power in respect of that land, grant to any person an easement in, on, over, through or under that Crown land for a specified purpose or any other purpose the Minister thinks fit; and

(b) in that grant express that easement to be subject to specified conditions and the payment of specified consideration.

(2) The grantee of an easement may, with the consent of any management body or lessee of the relevant Crown land, apply to the Minister for the easement to be varied or cancelled.

(2a) An easement may be granted under this section despite the fact that the characteristics of the easement do not satisfy all of the characteristics that must be satisfied for an easement to be created under the common law.

(3) The Minister may, on receiving an application under subsection (2) –

(a) by order or other instrument vary or cancel the relevant easement; or

(b) *refuse the application.*

(4) *In this section —*

specified purpose means for —

(a) *the provision of pipes, conduits, cables, transmission lines, and other services; or*

(b) *the provision of any structure, plant, or equipment; or*

(c) *the provision of access for carrying out of any works and the performance of any maintenance that is necessary for, or ancillary or incidental to, giving effect to any of the purposes referred to in paragraph (a) or (b); or*

(d) *a prescribed purpose.*

Conventional easements favour one property or the “dominant tenement” at the expense of an adjoining property – the “servient tenement”. Section 147 of the LAA allows for the creation of easements over Crown land without a “dominant tenement”. These are called ‘easements in gross’. Section 147 states-

147. Easements in gross may be granted under s. 144

An easement may be granted under section 144 without there being a dominant tenement and there may be made appurtenant to or annexed to an easement so granted another easement or the benefit of a restriction relating to the user of the land concerned.

Section 195 of the LAA allows for the creation of easements in gross over Crown Lands, in favour of the State of Western Australia, a State instrumentality, a statutory body or local government. Section 195 states-

195. Easement in gross in favour of State etc., creation of etc.

It is possible, and is deemed always to have been possible —

(a) *to create in favour of the State of Western Australia or in favour of a State instrumentality, statutory body corporate or local government, an easement without a dominant tenement; and*

(b) *to annex to or make appurtenant to an easement, another easement or the benefit of a restriction as to the user of land.*

(2) Licence

The Department of Lands WA, in its publication ‘Crown Land Administration and Registration Practice Manual 2013’ states-

Licences are, at common law, a personal right between two or more persons authorising the doing of a certain act for example the right to enter upon land which would otherwise be a trespass. A licence is not an interest in land, and a mere licence is always revocable.

Being merely a contractual right and not an interest in land, licences cannot be registered under the TLA, nor can a caveat be lodged to protect any claim relating to a licence.

The Minister may grant a licence that is a contractual, non-exclusive right authorizing a use of land to do an act which would otherwise be a trespass or illegal. The Minister determines the fees and conditions to be applied and may fix or extend the duration of such agreements.

Licences can co-exist with pastoral leases and with the agreement of the pastoral lessee, can be held by third parties. Examples of the use of licences include walking tours and four wheel drive recreational operations.

Section 91 of the LAA provides for the granting of licences for any purpose. Section 91 states-

91. Licences and profits à prendre over Crown land, grant of

(1) The Minister may grant a licence or profit à prendre in respect of Crown land for any purpose.

(2) The Minister may —

(a) fix or extend the duration of; or

(b) determine fees and conditions in respect of; or

(c) review; or

(d) with the consent of its holder, amend the provisions of, any licence or profit à prendre granted under subsection (1).

(3) The Minister may on the breach of any condition to which a licence granted under subsection (1) is subject, terminate that licence.

(3) Reserve and Management Order

A reserve is a form of tenure of Crown land. It is not an interest in land. A reserve is Crown land that has been set aside or dedicated for a particular purpose in the public interest.

Reserve tenure is usually applied to land, which, because of its intrinsic community value, should be preserved and maintained

for the benefit of present and future generations. This is primarily because of its recreation, historical, social, natural resources, its environmental, or cultural significance, or because it has special value for present or future generations. Examples include recreation reserves, national parks, conservation reserves, heritage areas and timber reserves.

Generally reserves are only created over unallocated Crown land that is Crown land that is not subject to any other tenure or interests.

There are 3 main types of reserves that can be created over Crown land under the LAA by the Minister for Lands:

- Reserves: created by the Minister making a Ministerial Order (prepared on LAA Form-1015) under section 41 of the LAA reserving a parcel of Crown land for one or more specific purposes in the public interest;
- Class A reserves: created by the Minister making a Ministerial Order (prepared on LAA Approved Form-1015A) under section 41 and classified as a class A reserve under 42 of the LAA; and
- Mall reserves: created by the Minister making a Ministerial Order at the request of Local Government within its district under section 59 of the LAA.

Once created, a reserve is usually placed under the care, control and management of a State government department, Local Government or incorporated community group by way of a Management Order registered against the relevant parcel of Crown land and endorsed on a CLT.

A Management Order is not an interest in land; it is a statutory right to manage and control Crown land in accordance with the Management Order granted under the LAA. Management Orders may be granted by the Minister for Lands under section 46 of the LAA. Section 46 states-

46. Care, control and management of reserves

- (1) *The Minister may by order place with any one person or jointly with any 2 or more persons the care, control and management of a reserve for the same purpose as that for which the relevant Crown land is reserved under section 41 and for purposes ancillary or beneficial to that purpose and may in that order subject that care, control and management to such conditions as the Minister specifies.*
 - (2) *The Minister may, with the consent of the management body of a reserve and of the holders of any interests within the reserve, by order vary any condition to which the care, control and management of the reserve is subject.*
- (10) *In subsection (1), a reference to a person is a reference to —*

- (a) *a person having perpetual succession;*
- (b) *a person not having perpetual succession who is —*
 - (i) *a Minister to whom the Act specified in the relevant order is for the time being committed by the Governor; or*
 - (ii) *the Marine Parks and Reserves Authority established under section 26A of the Conservation and Land Management Act 1984; or*
 - (iii) *a person holding a prescribed office.*

The simplest and most appropriate instrument to provide legal access to the land on which the proposed vermin proof fence will be placed is an 'Easement' under sections 144, 147 and 195 of the *Land Administration Act 1997*.

7.3 STATUTORY APPROVALS

7.3.1 STATE BARRIER FENCE – APPROVAL TO JOIN

This project proposes that the vermin proof fence join the State Barrier Fence.

The State Barrier Fence is a fence structure regulated by the *Biosecurity and Agriculture Management Act 2007* and the *Biosecurity and Agriculture Management Regulations 2013*.

Regulation 46 states-

46. Terms used

In this division-

barrier fence means a substantial fence under the control of the Director General which is used to impede the movement of animals that are declared pests;

barrier fence reserve means land reserved for the purposes of a barrier fence and for the protection and maintenance of the fence.

Regulation 48 states-

48. Offence to use barrier fence without consent

A person must not-

(a) *Make use of; or*

(b) *Interfere with; or*

(c) *attach any vertebrate animal trap, diversionary wing fence, gate, wire netting or other attachment thereto, a barrier fence unless the person has obtained the prior written consent of the Director General.*

The MRVC will need to write to the Director General of the Department of Agriculture and Food WA and seek consent to join the proposed vermin proof fence to the State Barrier Fence, to form the Murchison Region Vermin Cell.

7.3.2 ABORIGINAL HERITAGE APPROVALS

Department of Aboriginal Affairs provided commentary to the Director General Reference Group on 4 February 2014 and advised that there were no adverse impacts for aboriginal heritage for the proposed vermin proof fence or in relation to aboriginal trust land.

Consultation will be required with the traditional owners of the land through the Yamatji Land and Sea Council Geraldton, being:

- (a) Wajarri people;
- (b) Badmia Yamatji people
- (c) Ngoonooru Wadjari people; and
- (d) Yugungu-Nya people.

7.3.3 ENVIRONMENTAL APPROVALS

7.3.3.1 Native Vegetation Clearing Permit

The site line for the proposed vermin proof fence will need to be cleared and levelled to facilitate the construction of the fence.

Any clearing of leased land requires a permit from the Pastoral Lands Board (PLB), except for clearing that is authorized under the terms of the lease or necessary for the construction of improvements permitted under the lease, such as fences or sheds. The PLB must consult with the Commissioner of Soil and Land Conservation before granting a permit. In addition to obtaining a permit from the PLB, a pastoral leaseholder is required to obtain a clearing permit from the *Department of Environment Regulation* under the *Environmental Protection Act 1986*, unless the clearing activity is an exempt activity.

Clearing is defined within the *Environmental Protection Act 1986*. Section 51A defines clearing as-

51A. Terms used

clearing means —

- (a) the killing or destruction of; or*
- (b) the removal of; or*
- (c) the severing or ringbarking of trunks or stems of; or*
- (d) the doing of any other substantial damage to,*

some or all of the native vegetation in an area, and includes the draining or flooding of land, the burning of vegetation, the grazing of stock, or any other act or activity, that causes —

- (e) the killing or destruction of; or*
- (f) the severing of trunks or stems of; or*
- (g) any other substantial damage to,*

some or all of the native vegetation in an area;

Section 51E provides for the application for, granting of and refusing of clearing permits-

51E Clearing permits, applying for, granting, refusing etc.

- (1) An application for a clearing permit shall —
 - (a) be made in the form and in the manner approved by the CEO; and
 - (b) indicate whether it relates to —
 - (i) the clearing of a particular area specified in the application; or
 - (ii) the clearing of different areas from time to time for a purpose specified in the application; and
 - (c) be accompanied by the fee prescribed by or determined under the regulations; and
 - (d) be supported by any management plans, maps, and other documents and information required by the CEO and include a summary of that supporting documentation and information.
- (2) An application for a clearing permit can only be made —
 - (a) if it relates to clearing referred to in subsection (1)(b)(i) —
 - (i) by the owner of the land on which the clearing is proposed to be done or a person acting on the owner's behalf; or
 - (ii) by a person who satisfies the CEO that the person is likely to become the owner of the land on which the clearing is proposed to be done;

or

 - (b) if it relates to clearing referred to in subsection (1)(b)(ii), by the person by or on whose behalf the clearing is to be done.
- (3) If an application made under subsection (1) does not comply with subsections (1) and (2), the CEO shall decline to deal with the application and advise the applicant accordingly.

7.4 VERMIN PROOF FENCE CONSTRUCTION AND MAINTENANCE COSTS

7.4.1 CONSTRUCTION COSTS

The project involves the construction of 326 km of new fencing to create the Murchison Region Vermin Cell, bounded by part of the State Barrier Fence, part of the No 1 Vermin Fence and the No 2 Vermin Fence.

Standard of construction for the proposed fence include-

- 1650mm galvanised steel pickets to be placed at 7 metre intervals.
- Box strainers to be installed at the start and finish of each section, at both sides of gateways and at both sides of creeks and at prominent bends.
- In line strainers are 80mm tubular galvanised steel with 40mm angle stays/struts. See photograph 1 below.
- In line strainers are to be installed at 500 metre centres and as required, depending on terrain such as top of ridgelines and bottom of troughs in undulating country.
- Fabricated vermin fence to be strained and tied off at each and every strainer. Foot netting to be tied off and strained to outriggers that are to be welded at 90 degrees to tubular posts located either side of gates, flood gates and bends.
- All strainer holes to be a minimum 150mm in diameter and 900mm deep. Strainer holes are to be concreted to above the top of the hole, to prevent water sitting in the hole and rusting the posts.
- Strainer holes in rocky/granite ground must be rock drilled to gain the required depth.
- 12/101/15 fabricated vermin fence to be used (250 metre rolls), incorporating a four (4) line foot netting (to be anchored) and a single top barbed wire. Fence height is to be 1.2 metres from the ground to the top barbed wire. Anchoring with large rocks is acceptable.
- All gateways are to have conveyor belt positioned underneath the gate to prevent vermin digging under the gateway. Conveyor belting is to be cut to fit under outriggers and around posts.
- Each line wire is to be strained to 1.4 kN or 300 ft lb.
- All galvanised steel pickets to be driven into a depth so that the bottom hole of the post is 40 mm above the natural ground level.
- Galvanised steel pickets are not to be concreted in the ground.

- The Jio Maxy posts are to be concreted in the ground when they are located in areas of water flow.
- The first (bottom), fourth, eighth and twelfth wires of 12/101/15 fabricated vermin fence are to be clipped onto the galvanised steel pickets with the first (bottom) wire clipped to the hole located 40 mm above ground level.
- Galvanised steel pickets situated in hollows must be anchored down by driving a second galvanised steel picket in at 45 degrees and tying it down with wire.
- In area of water flow where weldmesh is used the weldmesh must be welded to the pipe posts.
- Heavy foot mesh must be used in front of flood gates.
- Light foot netting is to be used in conjunction with weldmesh.
- Flood gates to be constructed at Sanford and Greenough River crossings.
- Stayed posts are to be constructed as part of fence near flood gates.
- All wire to be joined by crimps.
- Foot netting to be anchored where needed in order to ensure firm contact with the ground is maintained at all times.



ORDER OF MAGNITUDE ESTIMATE

The following Order of Magnitude Estimate for the construction of the proposed 326 km section of vermin proof fence was compiled using actual costs for the most recent 123km section of the vermin proof fence that is currently under construction by the MRVC.

DESCRIPTION	UNIT	QTY	RATE \$	COST \$	STAGE 1		STAGE 2	
					QTY	COST \$	QTY	COST \$
Construction Costs per Kilometre								
Contract Field Coordinator	Km	326	\$279	\$90,954	218	\$60,822	108	\$30,132
Clearing and Grading Contractor	Km	326	\$602	\$196,252	218	\$131,236	108	\$65,016
Fencing Materials	Km	326	\$4,466	\$1,455,916	218	\$973,588	108	\$482,328
Fencing Contractor	Km	326	\$2,864	\$933,664	218	\$624,352	108	\$309,312
Construction Costs Sub-Total				\$2,676,786		\$1,789,998		\$886,788
Site Specific Works								
Surveying costs (including as constructed drawings)	Item	1	\$30,000	\$30,000	1	\$20,000	1	\$10,000
Grids								
- 2 gravel road grids	Item	2	\$93,241	\$186,482	1	\$93,241	1	\$93,241
- 1 sealed road grid	Item	1	\$125,000	\$125,000	1	\$125,000	0	\$0
River crossings								
- Sanford River	Item	1	\$50,000	\$50,000	1	\$50,000	0	\$0
- Greenough River	Item	1	\$80,000	\$80,000	1	\$80,000	0	\$0
Advertising costs	Item	1	\$1,500	\$1,500	1	\$1,500	0	\$0
Audit Fees	Item	1	\$3,000	\$3,000	1	\$1,500	1	\$1,500
Administration expenses	Item	1	\$10,000	\$10,000	1	\$7,500	1	\$2,500
Aboriginal Heritage Consultation	Item	1	\$20,000	\$20,000	1	\$12,529		\$7,471
Specific Works Sub-Total				\$505,982		\$391,270		\$114,712
SUB-TOTAL								
Contingency for cost escalation	Item	1		\$317,232	1	218,732		\$98,500
TOTAL ESTIMATE				\$3,500,000		\$2,400,000		\$1,100,000

7.4.2 MAINTENANCE AND RENEWAL OF VERMIN PROOF FENCE

Estimated maintenance costs have been obtained from the MRVC based on recent contracts for the maintenance of the existing No 2 Vermin Proof Fence.

A summary of the forecast maintenance costs over a 10 year period is shown in the Table below.

DESCRIPTION	YEAR 1	YEAR 2	YEAR 3	YEAR 4	YEAR 5	YEAR 6	YEAR 7	YEAR 8	YEAR 9	YEAR 10
Materials for maintenance	\$1,000	\$1,000	\$2,000	\$2,000	\$3,000	\$3,000	\$4,000	\$4,000	\$6,000	\$7,000

Maintenance contractor	\$4,800	\$4,800	\$6,400	\$6,400	\$7,200	\$7,200	\$8,000	\$8,000	\$9,600	\$9,600
Field coordinator inspections	\$3,400	\$3,400	\$3,400	\$3,400	\$5,100	\$5,100	\$5,100	\$5,100	\$5,100	\$5,100
Maintenance grade and clear access track	\$0	\$0	\$8,000	\$0	\$0	\$20,800	\$0	\$0	\$8,000	\$0
Clear fence line and maintain firebreak	\$0	\$0	\$0	\$0	\$7,000	\$0	\$0	\$0	\$0	\$40,000
Provision for potential damage caused by flood/fire	\$1,600	\$1,600	\$1,600	\$1,600	\$1,600	\$1,600	\$1,600	\$1,600	\$1,600	\$1,600
Administration costs	\$2,500	\$2,500	\$2,500	\$2,500	\$2,500	\$2,500	\$2,500	\$2,500	\$2,500	\$2,500
TOTAL	\$13,000	\$13,000	\$23,900	\$15,900	\$26,400	\$40,200	\$21,200	\$21,200	\$32,800	\$65,800

A 10 year average of maintenance costs is \$27,400.

7.4.3 RENEWAL AND REPLACEMENT OF VERMIN PROOF FENCE

Estimated annual renewal and replacement costs for the proposed 326km section of the Vermin Proof Fence has been developed utilizing a future value for the fence of \$3,965,401. The future value was calculated by using the following assumptions:

- Inflation interest rate of 3%;
- Life span of 50 years; and
- Original construction cost of \$3,500,000.

Rather than using a straight line depreciation method to determine an estimated annual cash provision required over the estimated economic working life of the fence, a sinking fund approach has been developed. The following assumptions have been used to build the sinking fund model:

- Life span of the fence of 50 years;
- Cash interest rate over the life of the fence of 3% per annum; and
- Interest compounded with principal over the 50 year life.

The sinking fund model shows that an annualized cash provision of \$35,156 would be required to attain the full replacement cost of the fence of \$3,965,401 at the end of the 50 year period.

This differs from what is detailed in the Asset Management Plan, as the Asset Management Plan models renewal of the total fence length, costed at \$12.47 per lineal metre. This Plan only deals with the proposed new 326 kilometre section.

7.5 VERMIN PROOF FENCE FUNDING MECHANISMS

7.5.1 FUNDING SOURCES FOR THE PROJECT

Pursuant to the proposed amendments to the MRVC establishment agreement, the regional local government is required to prepare a project business plan and determine the proposed funding streams for the project from a construction and operational/maintenance perspective. Subject to the project business plan being approved by the participating member local governments, and inclusive of an agreement being reached by the project participants in relation to their contribution, the MRVC will then recover the relevant contributions from each project participant.

The sources of funding that are available to the MRVC include-

(1) Government grants

An application to Commonwealth and state government grant programs can be submitted to assist with the construction costs of the vermin proof fence.

This Plan proposes that \$2,900,000 be funded from this source.

(2) Project participant contributions

Member local governments of the MRVC that decide to become a project participant can make a capital contribution towards the construction cost of the vermin proof fence.

This Plan proposes that the project participants contribute the following:

Shire of Cue \$37,500

Shire of Mount Magnet \$37,500

Shire of Yalgoo \$25,000

Member local governments of the MRVC that decide to become a project participant can make an annual contribution towards the maintenance and replacement costs of the vermin proof fence.

(3) In-kind contributions from pastoralists

Pastoralists can make in-kind contributions, in the form of on ground works such as site line clearing, and also in the form of existing boundary fencing that runs along the selected site line.

(4) Loan funds (if permitted in the revised Establishment Agreement)

The MRVC can raise a loan to fund the balance of construction costs associated with the vermin proof fence, with the repayment

of the loan being funded via member local government project participant contributions.

This Plan proposes that a loan of \$500,000 be raised by the MRVC. The loan term will be for 20 years, with six monthly repayments at a 4.5% annual interest rate. Repayments are estimated to be \$38,177 per annum. Total interest charged over the life of the loan is estimated to be \$263,548.

7.6.2 PROJECT FUNDING

(a) Project Component Funding

The table below details the proposed funding requirements and timing for the construction of the project-

COMPONENT	Stage 1	Stage 2	TOTAL
Site clearing and fence construction of 326 kms of new fencing	\$2,400,000	\$1,100,000	\$3,500,000
TOTAL	\$2,400,000	\$1,100,000	\$3,500,000

(b) Funding Sources

The table below details the proposed funding sources and partners for the construction of the project-

FUNDING SOURCE	Stage 1	Stage 2	TOTAL
Government Grant	\$0	\$1,100,000	\$1,100,000
Government Grant	\$1,800,000	\$0	\$1,800,000
Shire of Cue Contribution	\$37,500	\$0	\$37,500
Shire of Mount Magnet	\$37,500	\$0	\$37,500
Shire of Yalgoo	\$25,000	\$0	\$25,000
Loan Borrowings MRVC	\$500,000	\$0	\$500,000
TOTAL	\$2,400,000	\$1,100,000	\$3,500,000

7.6.3 PROJECT PARTICIPANT FUNDING MECHANISMS

The individual member local government project participants may fund their respective contributions by-

- (1) Imposing a Specified Area Rate under section 6.37 of the *Local Government Act 1995*.

In utilizing this mechanism the following statutory provisions apply-

6.37. Specified area rates

- (1) *The Imposition of a Specified Area Rate on rateable land within a portion of its district for the purpose of meeting the*

- cost of the provision by it of a specific work, service or facility if the local government considers that the ratepayers or residents within that area —*
- (a) have benefited or will benefit from; or*
 - (b) have access to or will have access to; or*
 - (c) have contributed or will contribute to the need for, that work, service or facility.*
- (2) A local government is required to —*
- (a) use the money from a specified area rate for the purpose for which the rate is imposed in the financial year in which the rate is imposed; or*
 - (b) to place it in a reserve account established under section 6.11 for that purpose.*
- (3) Where money has been placed in a reserve account under subsection (2)(b), the local government is not to —*
- (a) change the purpose of the reserve account; or*
 - (b) use the money in the reserve account for a purpose other than the service for which the specified area rate was imposed,*
- and section 6.11(2), (3) and (4) do not apply to such a reserve account.*
- (4) A local government may only use the money raised from a specified area rate —*
- (a) to meet the cost of providing the specific work, service or facility for which the rate was imposed; or*
 - (b) to repay money borrowed for anything referred to in paragraph (a) and interest on that money.*
- (5) If a local government receives more money than it requires from a specified area rate on any land or if the money received from the rate is no longer required for the work, service or facility the local government —*
- (a) may, and if so requested by the owner of the land is required to, make a refund to that owner which is proportionate to the contributions received by the local government; or*
 - (b) is required to allow a credit of an amount proportionate to the contribution received by the local government in relation to the land on which the rate was imposed against future liabilities for rates or service charges in respect of that land.*

(2) Municipal Fund

A direct contribution from the municipal fund authorized by a resolution of the local government.

(3) Loan Funds

The raising of a loan under section 6.20 of the *Local Government Act 1995*. In utilizing this mechanism the following statutory provisions apply-

6.20. Power to borrow

(1) *Subject to this Act, a local government may —*

(a) *borrow or re-borrow money; or*

(b) *obtain credit; or*

(c) *arrange for financial accommodation to be extended to the local government in ways additional to or other than borrowing money or obtaining credit, to enable the local government to perform the functions and exercise the powers conferred on it under this Act or any other written law.*

(2) *Where, in any financial year, a local government proposes to exercise a power under subsection (1) (power to borrow) and details of that proposal have not been included in the annual budget for that financial year —*

(a) *unless the proposal is of a prescribed kind, the local government must give one month's local public notice of the proposal; and*

(b) *the resolution to exercise that power is to be by absolute majority.*

(3) *Where a local government has exercised a power to borrow and —*

(a) *it does not wish to proceed with the performance of the function or the exercise of the power for which the power to borrow was exercised; or*

(b) *after having completed the performance of the function or the exercise of the power for which the power to borrow was exercised, any part of the money borrowed, credit obtained or financial accommodation arranged has not been expended or utilized, the local government may resolve* to expend the money or utilize the credit or financial accommodation for another purpose if one month's local public notice is given of the proposed change of purpose.*

*** Absolute majority required.**

(4) *A local government is not required to give local public notice under subsection (3) —*

- (a) *where the change of purpose has been disclosed in the annual budget of the local government for the relevant financial year; or*
- (b) *in such other circumstances as are prescribed.*
- (5) *A change of purpose referred to in subsection (3) is to be disclosed in the annual financial report for the year in which the change occurs.*
- (4) A combination of any, or all, of the above.

7.7 MEEKATHARRA RANGELANDS BIOSECURITY ASSOCIATION VERMIN CONTROL MEASURES

The Meekatharra Rangelands Biosecurity Association (MRBA) was established in 2008 under the *Biosecurity and Agriculture Management Act 2007* in response to pastoralists' concern about declared pests, in particular wild dogs. The Recognised Biosecurity Group (RBG) framework provides WA communities with a legislated opportunity (through the *Biosecurity and Agriculture Management Act 2007* [BAM Act]) to work in partnership with the WA State Government to address declared pest issues over large areas. The RBG framework is based on the concept that pests are not restricted to individual property boundaries; therefore practical management requires landholders and government to work together to coordinate control efforts.

The BAM Act offers a mechanism to raise funds from pastoral leaseholders, which are matched dollar-for-dollar by the state government, in order to control declared pests. Individual RBGs identify their priority pests, then plan and coordinate efforts to address their priorities using funds raised via rates and government funding.

The MRBA covers 83 pastoral leases covering over 13 million hectares. Ownership of the pastoral leases includes pastoralists, mining companies, Department of Parks and Wildlife, and Indigenous groups. There are also other conservation reserves and shire-owned lands within the MRBA area. All pastoral leaseholders in the MRBA area pay Declared Pest Rates for the control of declared pests. The MRBA determines priorities in the area, and with the assistance of a part time administrative assistant coordinates and implements control activities.

Within the MRBA area there are several high profile declared pests including camels, wild dogs, donkeys, horses and several species of declared plants. Wild dogs are a key priority for landholders in the area and they currently account for approximately 85 per cent of the MRBA expenditure. Control of wild dogs in the area includes developing, coordinating and administering a baiting program for the deployment of approximately 280,000 baits each year and the employment and coordination of five doggers in the area. Individual members of the MRBA take responsibility for each component of the bait delivery, manufacture and contracting, with some assistance provided by government.

The proposed vermin proof fence will allow the MRBA to conduct their planned activities on reducing wild dog numbers within an enclosed cell.

7.8 MURCHISON REGION VERMIN CELL REVITALISATION PROGRAM

Environmental issues, productivity and natural resource management – including pest management – are challenges that will not disappear overnight. Dealing with them is the central question to ensure long-term sustainability and productivity of the Murchison Regional Vermin Cell. These issues and / or challenges are people issues. Any actions that can assist in illuminating the socio-economic and environmental outcomes of interventions, while at the same time assisting pastoralists to be more meaningfully and constructively engaged in decisions and actions which affect them, is the cornerstone of the Revitalisation Program.

The Revitalisation Program sets out to establish a framework from which pastoralists within the proposed Cell can address those problems facing them in a manner that will encourage interconnectivity within and between cluster groups, and in the long-term, achieve transformative potential, achieving those adjustment practices which will ensure sustainable pastoralism futures.

Social Innovations have developed a Murchison Region Vermin Cell Revitalisation Plan (MRVCRP), which is attached to this Business Plan (refer to 15.1.) In summary the MRVCRP addresses the following issues.

7.8.1 REVITALISATION OF THE CELL

A major component of the revitalisation process is to implement a regime of management practices – those that are 'leading practice' and which result in:

- excellent animal husbandry to facilitate productivity improvements;
- the ability to nurture the rangeland such that the carrying capacity increases, becomes more robust and provides the nutrition which enables livestock to express their full genetic potential;
- building a business and enterprise structure that reduces the impact of wild dogs.

7.8.2 PRINCIPLES OF LEADING PRACTICE

Leading practice integrates environmental, economic and social aspects through all elements of production, including supply and value chains. The concept of leading practice is simply the best possible way of conducting activities for a given industry with relation to its location. As new challenges emerge and new solutions are developed, or better solutions are devised for existing issues, it is important that leading practice be flexible and innovative in developing solutions that match industry/community/environmental conditions-

requirements. Although there are underpinning principles, leading practice is as much about approach and attitude as it is about a fixed set of practices or a particular technology.

Leading practice systems seek to manage financial and sovereign risk by considering and engaging all stakeholders so that outcomes are expressed not just as the financial bottom line but rather holistically, ensuring positive financial, social, safety, efficiency and environmental outcomes for all stakeholders.

Pastoralists within the proposed Cell are committed to contributing to the sustained growth and prosperity of current and future generations through the integration of economic progress, responsible social development and effective environmental management. This will be achieved through the formation of groups/clusters within the Cell, who work collaboratively to achieve their shared goals.

7.8.3 STRUCTURE OF THE CELL

In terms of the Revitalisation program, the Cell will comprise a Revitalisation Committee and Independent Groups. The Groups will undertake project(s) within their group and between groups. It is planned, purpose groups will form time to time establish, consisting of a number of individuals who want to undertake a project across several stations, reporting back to their primary group on project progress and impact(s).

The Yalgoo Leading Practice and Innovation Group and the Mt Magnet Food and Fibre Group. Station managers from the other Shires participating in the Cell project, have indicated that they are keen to either form their own industry-community group(s), or join either, the Yalgoo or Mt Magnet groups. These groups represent two major clusters within the cell. A cluster for the purpose of this report is a group of stations linked by affiliation to a group and which are not necessarily bounded by an internal fence.

Overtime it is likely that the two major clusters will decrease in size as smaller clusters emerge within the Cell. The likelihood of smaller clusters (described as 'honeycomb' in the recent draft WA Wild Dog Action Plan) makes for long term sustainable outcomes for the small livestock industries as well as communities neighbouring the Cell.

7.8.4 BUILDING KNOWLEDGE AND SKILLS THROUGH GROUP/CLUSTER PROJECTS

The immediate challenge for the pastoralists is to transform what is in some places a degraded landscape to one that fuels sustainable industries. Members of the Cell recognised the need to develop a sustainable development paradigm: one that encourages more ecological, biodiverse, sustainable, and socially responsible form of pastoralism.

Pastoralists will be encouraged to adopt a Participatory Action Research (PAR) and Learning process for managing predation and natural resource management within the Cell. PAR & L is an established methodology for interactive learning and the management of complex processes of change.

7.8.5 FUNDING OF REVITALISATION PROGRAM WITHIN THE CELL

It is planned that groups/clusters will seek funding from organisations and Government departments to undertake on ground projects, site trials and scientific research with tertiary institutions.

7.8.6 ISSUES OF SCALE

Issues of scale are critically important when examining the dynamics and adaptive capacity of the Cell to address wild dog predation and the subsequent revitalisation of the landscape within the Cell. Socio-ecological systems exist at a number of scales in time, space and levels of organisations. For example, cross scale effects are of great significance in the dynamics of socio-ecological system of the Cell. Where it is not possible to understand a system at only one scale, aspects of resilience and capacity to change are influenced by what is happening not only at the local scale but scales above the scale of interest. For this reason, it is important that the Cell Revitalisation Program is managed holistically.

Comparing individual properties within a cluster arrangement may create difficulties should the properties utilise a variety of property management strategies. In order to achieve economies of scale, properties included in the cluster should remain similar in their general requirements. Notwithstanding, it will be necessary for project managers to acknowledge that the property management strategies of landholders vary, with some preferring different arrangements. As a mechanism to compare improvement in biodiversity values to that of individual properties, those involved in the cluster should contain similar ecosystems and pasture types.

7.8.7 ESTABLISHMENT OF THE CELL THROUGH A TRIPLE BOTTOM LINE

By adopting the three most popular dimensions of sustainability - ecological, economic and social (Pepperdine, 2000, Robinson and Tinker, 1996, O'Toole et al., 2006, Gareau, 2007), it will be possible to understand those ecological dimensions that underline the socio-economic and environmental benefits of those pastoralists engaged in cluster management.

For example, the ecological dimensions of sustainability are:

- ecosystem integrity is preserved
- biological diversity is maintained
- rates of use of renewable resources do not exceed regeneration rates
- rates of waste generation or pollution emission do not exceed the assimilative capacities of the environment

The economic dimension has to do with the extent to which economic systems are capable of continuing for the long term. Examples of this dimension of sustainability are:

- systems of production, exchange and consumption can continue
- satisfactory standards of living for all are being achieved now and can be maintained
- rates of use of non-renewable resources do not exceed the rate at which sustainable renewable substitutes are developed
- economic systems are able to adapt to various contingencies, such as fluctuating environmental conditions (for example, rainfall, temperature, geothermal activity), demographic changes and technological developments

The social dimension of sustainability, has to do with the extent to which social values, social identities, social relationships and social institutions are able to be maintained into the future. This dimension of sustainability with relation to landholders within the proposed Cell can be demonstrated by the extent to which:

- there are some widely excepted and enduring norms and values, such as reciprocity, procedural equity and respect for the law
- both individual identity and cultural diversity can be maintained
- social institutions are able to make a continuing contribution to the fulfilment of people's needs
- social institutions are able to adapt to various contingencies, such as fluctuating environmental conditions, economic changes and technological developments to address these issues

7.8.8 BENEFITS OF ESTABLISHING THE CELL

Private benefit of the project, whilst centrally focused on improving productivity, is expected to increase the efficiency and profitability of various sector enterprises in the region. Changes in management strategies, through effective management of wild dog predation and environmentally sustainable grazing practices, allow landholders to gain knowledge and experience in managing contingency scenarios, and therefore, long-term property planning and development. In these instances, whilst initially there exists a strong private benefit, it is public sector who achieves the significant long-term benefits through efficient production, lower debt levels, and overall reduced reliance on government support.

The benefits of this project do not only accrue to the pastoral industry. There will be significant multiplier benefits to the economic and social viability of the local region and to communities through the creation of new jobs in the pastoral industry. Other industries will also benefit, such as transport, shearing, service sectors, and the re-opening of a local abattoir, which closed due in part to a reduction in the supply of livestock for processing.

The increase in employment in the region overtime, will lead to a population increase in local communities, which in turn serves to rejuvenate town businesses and enables the rebuilding of the social fabric of these communities. Organisations that provide a vital service in remote communities, (e.g. St John's Ambulance, Fire and Rescue Services) will once again have a viable pool of people from which volunteers will emerge.

The benefit of the fenced Cell is three fold; it offers long-term viability of the industry, the environment and the community. The proposed Cell will not only address wild dog predation, it will also provide a bounded environment in which to trial innovative projects for managing natural resources and increasing which in turn will provide for more sustainable stocking rates.

In the long term it is imperative that the industry can grow profitability by adopting new business models and improved value and supply chains to increase returns to all participants within the Cell. This can be done by empowering pastoralists to:

- Manage invasive pests, particularly wild dogs in a more collaborative and sustainable effort.
- Restore rangeland condition and productivity, and in particular perennial grasses, while maintaining an economic level of production.
- Successfully controlling total grazing pressure and bio-security threats at a district as well as property level,
- Significantly increasing meat sheep marking rates from ~80% p.a. to 120% p.a. on a year in year out basis, and
- Restore confidence in community development and future regional economic development.

Enduring social capital is pivotal for the success of the long term sustainability and social benefits of the Cell. In many cases, those pastoralists whose stations fall within the Cell have built networks and relationships that are not based on the strict reciprocal and immediate exchange. Membership within the proposed Cell groups/clusters) are homogenous groups of actors, closely connected among themselves and only loosely connected to other groups. It is proposed that the groups/ clusters offer network externalities, and share knowledge and skills gained through projects within the Cell to those outside the Cell, thus conferring cascading benefits on stakeholders contained within the Clusters as well as, beyond the Cell.

The relationships formed within and between the groups/cluster are likely to be the result of adaptations designed to generate mutual benefits to the pastoralists involved. Literature demonstrates that information and knowledge transfer derived from these relationships will yield net benefits in some form, even if in some cases, pastoralists do not keep conscious track of this information.

Within the Triple Bottom Line (TBL), it is difficult to neatly define contributions by economic, environmental or social activities. By their nature almost all actions have broad impacts, and this is particularly relevant when understanding and defining the 'social' dimensions of pastoralism's contribution to the region. Perhaps the best recognised of these TBL inter-relationships is between economic measures and

social dimensions. For example, in most cases direct economic growth contributes to positive employment outcomes ~ a social benefit. Equally, improved environmental outcomes largely have positive social dimensions – either directly by way of improved human health, or perhaps indirectly through improved recreational or leisure pursuits.

Broadly speaking, social benefits perhaps are better described as 'quality of life' measures, have multiple dimensions, including:

- the basic material for a good life, such as secure and adequate livelihoods, enough food at all times;
- shelter, clothing, and access to goods;
- health, including feeling well and having a healthy physical environment, such as clean air and access to clean water;
- good social relations, including social cohesion, mutual respect, and the ability to help others and provide for children;
- security, including secure access to natural and other resources, personal safety, and security from natural and human-made disasters, and
- freedom of choice and action, including the opportunity to achieve what an individual values doing and being. Which, in turn, is influenced by other constituents of quality of life (as well as by other factors, notably education) and is also a precondition for achieving other components of social well-being, particularly with respect to equity and fairness.

Increasing productivity and yields delivers economic benefits i.e. Achieving higher prices for commodities, market development and generating higher profits for producers. Benefits include:

- reduced production costs
- improved supply chain and markets
- increased demand for primary product
- increased yield
- improved efficiency
- increased industry value adding
- labour savings
- increased investment
- capital savings

- market development.

Environmental benefits included increasing water use efficiency, improving biodiversity outcomes, reducing greenhouse gas emissions, reducing chemical use and waste, improving land use and reducing erosion.

7.8.9 MEASURING BENEFITS

Despite the obvious difficulties in quantifying the actual losses caused by wild dogs in a rangeland environment, the economic and financial analysis of these stations clearly highlight the poor profitability, productivity and low turnover; and a significant proportion of this is caused by the impact of wild dogs (see Bartle 2012)

The situation today is that any landholder (in the proposed Cell site) who still has stock (sheep) is reduced to a flock that is less than 20% of current DSE stocking recommendations. With a MRVC Fence and eradication of dogs, all stations should be able to return to recommended DSEs, which will be at a conservative estimate at least a 5-fold increase on current numbers. This is the practical outlook from landholders who have worked with the 'dog problem' over the past 5 years (Wark, 2016).

A cost-benefit analysis (CBA) is commonly prepared by individuals, businesses and government bodies to analyse and evaluate alternative approaches to projects or decisions. For example, it is used to:

- Determine if the project or decision is a sound investment or decision (i.e., a justification of feasibility or advantage).
- Provide a basis for comparing projects or decisions. It involves comparing the total expected cost of each option against the total expected benefits, to see whether the benefits outweigh the costs, and by how much.

With the wild dogs controlled and improved station management in place, the profitability of these stations is predicted to increase substantially. Return on Assets is predicted to increase from -10.6% to 7.9%. This increase in profitability will come about in five main areas.

1. Asset Turnover Ratio has increased.
2. Overhead costs have been reduced.
3. Gross margins will increase.
4. Reproduction rates will rise.
5. Wool cuts will rise.

Similar to a Social Impact Assessment, Social Return of Investment (SRoI) considers both the cost and benefit of projects and or decisions made by organisations (i.e. mining and or governments on communities). Results of a SRoI analysis are more useful when they are presented qualitatively and quantitatively; providing a narrative to explain the results.

There are two types of SRoI:

- Evaluative, which is conducted retrospectively and based on actual outcomes that have already taken place either with the current cohort or with a similar cohort undergoing similar impacts (in this case pastoralists in SW Queensland).
- Forecast, which predicts how much social value will be created if the activities.

The following areas are highlighted as future socio-economic and environmental measurable units. It is suggested that projects that are undertaken within the Cell are evaluated on an ongoing basis, providing longitudinal/historical data as to the effects/contributions that the Cell has on the overall economic, social and environmental outcomes of the region.

Action	Social/Environmental	Private	Expected Issues
Pest and weed control	<ul style="list-style-type: none"> ▪ Eradication of pests to facilitate native flora and fauna growth. ▪ Estimations may be made through number of pests and weeds currently in area and damage to native species or groundcover held. 	<ul style="list-style-type: none"> ▪ Eradication of pests to allow for reduced mortalities of livestock and decreased grazing pressure. ▪ Estimations may be made through number of pests and pasture consumption patterns and mortality rates. ▪ Measurement can also occur as a direct comparison to other control methods currently in place 	<ul style="list-style-type: none"> ▪ Existing data relates to methods currently employed to minimise weeds – require pasture analysis of productivity change through growth of native species. ▪ Existing data for controlling feral animals is industry based with wide assumptions on costs. Important to narrow these costs down to individual property level and also costs relevant to region.
Water capture	<ul style="list-style-type: none"> ▪ Groundcover improvement and minimisation of dust through rotational grazing. ▪ Reduction in soil erosion and improvement of water quality in river systems. 	<ul style="list-style-type: none"> ▪ Pasture improvement through replenishment of perennial grass species. ▪ Livestock gains through increased access to more 	<ul style="list-style-type: none"> ▪ Data from existing studies may be useful with a collation of data based on relevant pasture and species types in the region.

Action	Social/Environmental	Private	Expected Issues
	<ul style="list-style-type: none"> ▪ Replenishment of native flora due to reduced grazing pressure. 	<ul style="list-style-type: none"> palatable and nutrient based pasture. ▪ Improved access to water – normally the limiting factor in livestock nutrition. ▪ Ability to carry mixed herd or primarily sheep. ▪ Improved opportunity for lease renewal. 	
Opportunity to operate sheep grazing	<ul style="list-style-type: none"> ▪ Increased workforce through shearing with additional benefits to tourism and town spending. ▪ Diversity in business sector ▪ Community development 	<ul style="list-style-type: none"> ▪ Increased station income ▪ Less financial stress ▪ Return to industry/stock composition. 	<ul style="list-style-type: none"> ▪ Social benefits and costs to the reestablishment of the sheep industry in the region are strong. Refer to Bartle (2014).
Increased production and environmental awareness and knowledge transfer	<ul style="list-style-type: none"> ▪ Reduction in landholder need for government assistance through improved planning. 	<ul style="list-style-type: none"> ▪ Improvement of bottom line productivity and management of drought situations. ▪ Identified through estimated reductions in government assistance. 	<ul style="list-style-type: none"> ▪ Data in this area is very circumstantial and may be more beneficial to include as additional information rather than for inclusion in analysis.
Dust management and ground cover	<ul style="list-style-type: none"> ▪ Community based initiatives such as Dust Watch wind erosion monitoring may provide suitable opportunity to measuring and assessing changes in ground and dust cover. 	<ul style="list-style-type: none"> ▪ Identified in the increased number of NRM activities funded throughout the region. ▪ Access to local networks and information 	<ul style="list-style-type: none"> ▪ Current Data may not be available ▪ Some groups may be more responsive to information sharing than others.

Action	Social/Environmental	Private	Expected Issues
	<ul style="list-style-type: none"> ▪ Building human capital ▪ Transfer information and knowledge ▪ Building social capital through the establishment knowledge and information networks. 	<ul style="list-style-type: none"> ▪ Opportunities for Indigenous employment and training. 	<ul style="list-style-type: none"> ▪ Some groups may need intensive support in the first instance in group project tasks.

A full copy of the Murchison Region Vermin Cell Revitalisation Program is attached refer to 15.1

7.8.10 THE ROLE OF THE MRVC IN THE REVITALISATION PROGRAM

Its proposed that the MRVC will engage a program co-ordinator on a part time basis to manage the revitalisation program and co-ordinate the projects across the cell. A provisional sum of approximately \$50,000 pa has been allocated in the MRVC annual operating costs for the purpose. The cost to be met by participate local governments and recovered from pastoralists in total or in part by the local governments via specified area rates.

8.0 STAFFING

8.1 MRVC VERMIN PROOF FENCE PROJECT

The construction and maintenance of the vermin proof fence project will be administered by the MRVC, with assistance from other consultants as required.

Any additional technical expertise that may be required will be sourced from the member local governments of the MRVC, or engaged as external contractors and consultants.

8.2 MRBA VERMIN CONTROL

The conduct of the vermin control program will be coordinated and administered by the MRBA, in conjunction with the pastoral leaseholders.

8.3 REVITALISATION PROGRAM BY INDEPENDENT GROUPS

The delivery of the revitalization programs will be undertaken by the Independent Groups formed for the purpose of each strategy/activity, with assistance obtained from external consultants/contractors as required. Its proposed that a Co-ordinator will be engaged by MRVC to manage the revitalisation program.

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9.0 RESEARCH

In compiling this Plan, the following research was conducted-

- (1) Murchison Region Vermin Cell Feasibility Study, compiled by RSM Bird Cameron in December 2010.
- (2) Business Case for the Completion of the Murchison Region Vermin Cell submitted to the Department of Regional Development for funding under the Royalties for Regions program.
- (3) Director General Reference Group Agency comments of 4 February 2014 in relation to the Murchison Region Vermin Cell business case proposal.
- (4) WA Treasury comments in response to the draft Cabinet submission and business case concerning the Murchison Region Vermin Cell project.
- (5) New Establishment Agreement.
- (6) Project Participants Agreement.
- (7) Other studies referred to include-
 - (a) Gascoyne Murchison Strategy Benchmarking, Financial Advice and Business Review Project Report compiled by Resource Consulting Services Pty Ltd in 2004;
 - (b) Benefit Cost Analysis of Biosecurity Fence Options to Protect Southern Rangelands from Wild Dog Impacts compiled by URS; and
 - (c) Review of the Economic and Ecological Sustainability of Pastoralism in the Southern Rangelands of Western Australia 2009 (SRPAG), compiled by the Rangelands Pastoral Advisory Group, commonly known as 'The Duncan Review'.
 - (d) The Projected Financial and Economic Benefits to Pastoral Businesses of the Proposed Murchison Region Vermin Cell Report prepared by R Bartle (2012).
 - (e) A Financial Benchmarking Project 1999-2000 to 2001-02 Report prepared by R Bartle (2001).
 - (f) Wild Dog Action Plan (2016-2021) updated November 2016)

The updated WA Wild Dog Action Plan 2016-2021 states that one of the objectives of the Plan is to target control appropriate to the local area and wild dog pressure determined by impact on assets and recommendation 11 contained in the Plan states.

"Development of Exclusion or Cluster Fencing including co-funding investment models for cell fencing in strategic regions of

WA.

Be prepared to identify competitive co-funding opportunities when funds are available (i.e. future cluster/cell fencing).

That the WA Wild Dog Alliance makes available a contestable fund of \$1.5M to support initial cell proposals. The optimal cell size is considered to be a neighbouring group of landholders who would benefit in reasonably equal proportion from an exclusion fence and where landholders are willing to commit to contribute at least 50% of the construction cost and all of the on-going maintenance and replacement costs”.

Item 6 of the WA Wild Dog Action Plan Budget Notes details the following:

“185km of new fencing per annum – private investment by landholders in dog proof fencing at \$8,000/km.

Development of exclusion or cluster fencing including co-funding investment models for cell fencing in strategic regions of WA.

Using the proposed funding announced by Federal Minister to matching R4R grant to provide a contestable fund of \$1.5 m and distributed as 6 x \$500K grants. Create a pilot opportunity for the Southern Rangeland Revitalisation Strategy with MWDC and respective investors to develop a defined single cell or cells inside the current MRVC, which will be part of a supply chain direct to processors.”

Murchison Regional Vermin Cell

“Completion of the proposed Murchison Regional Vermin Cell is expected to require an upfront construction cost of \$2.6M (328 kms at \$8,000/km) and an upfront station re-development cost of \$14.5M across the whole region. Annual costs therefore would include \$0.5M/year in landholders management costs and \$0.3M/year in RBG management costs. Maintenance would continue to be \$300/km/year for the fence, accruing after 10 years for the newly constructed sections”.

The vermin proof fence is required to join the existing No 2 Vermin Fence with the State Barrier Fence, which will result in 6,536,198 ha of land, 52 pastoral stations and 6 properties owned by the Department of Parks and Wildlife (DPaW), being enclosed within the Murchison Region Vermin Cell. The length of fencing for the entire Murchison Region Vermin Cell is approximately 1,400 km, of which 1,072 km is already in place and has recently been upgraded to full vermin proof standard. The fence will allow for the management of predation and bring stakeholders together to undertake projects that will bring about the revitalisation of the landscape.

10.0 FINANCIAL ANALYSIS

10.1 CAPITAL EXPENDITURE

The following table details the capital cost of construction for the proposed vermin proof fence.

DESCRIPTION	UNIT	QTY	RATE \$	COST \$	STAGE 1		STAGE 2	
					QTY	COST \$	QTY	COST \$
Construction Costs per Kilometre								
Contract Field Coordinator	Km	326	\$279	\$90,954	218	\$60,822	108	\$30,132
Clearing and Grading Contractor	Km	326	\$602	\$196,252	218	\$131,236	108	\$65,016
Fencing Materials	Km	326	\$4,466	\$1,455,916	218	\$973,588	108	\$482,328
Fencing Contractor	Km	326	\$2,864	\$933,664	218	\$624,352	108	\$309,312
Construction Costs Sub-Total				\$2,676,786		\$1,789,998		\$886,788
Site Specific Works								
Surveying costs (including as constructed drawings)	Item	1	\$30,000	\$30,000	1	\$20,000	1	\$10,000
Grids								
- 2 gravel road grids	Item	2	\$93,241	\$186,482	1	\$93,241	1	\$93,241
- 1 sealed road grid	Item	1	\$125,000	\$125,000	1	\$125,000	0	\$0
River crossings								
- Sanford River	Item	1	\$50,000	\$50,000	1	\$50,000	0	\$0
- Greenough River	Item	1	\$80,000	\$80,000	1	\$80,000	0	\$0
Advertising costs	Item	1	\$1,500	\$1,500	1	\$1,500	0	\$0
Audit Fees	Item	1	\$3,000	\$3,000	1	\$1,500	1	\$1,500
Administration expenses	Item	1	\$10,000	\$10,000	1	\$7,500	1	\$2,500
Aboriginal Heritage Consultation	Item	1	\$20,000	\$20,000	1	\$12,529		\$7,471
Specific Works Sub-Total				\$505,982		\$391,270		\$114,712
SUB-TOTAL								
Contingency for cost escalation	Item	1		\$317,232	1	218,732		\$98,500
TOTAL ESTIMATE				\$3,500,000		\$2,400,000		\$1,100,000

10.2 SOURCE AND APPLICATION OF FUNDS

The following statement provides an overview of the financial forecasts for the five (5) year period of the Plan.

STATEMENT OF SOURCE AND APPLICATION OF FUNDS - MRVC

	MRVC CURRENT OPERATIONS					NEW 326 KM FENCE PROJECT					CO-ORDINATION OF REVITALISATION PROGRAM					TOTAL OPERATIONS					
	ESTIMATE					ESTIMATE					ESTIMATE					ESTIMATE					
	YEAR 1	YEAR 2	YEAR 3	YEAR 4	YEAR 5	YEAR 1	YEAR 2	YEAR 3	YEAR 4	YEAR 5	YEAR 1	YEAR 2	YEAR 3	YEAR 4	YEAR 5	YEAR 1	YEAR 2	YEAR 3	YEAR 4	YEAR 5	
	\$	\$	\$	\$	\$	\$	\$	\$	\$	\$	\$	\$	\$	\$	\$	\$	\$	\$	\$	\$	
INCOME																					
General Purpose Funds																					
-MRBA Contributions	28,000	28,000	28,000	28,000	28,000	0	0	0	0	0	0	0	0	0	0	28,000	28,000	28,000	28,000	28,000	
-Interest Received	7,000	7,000	7,000	7,000	7,000	0	0	0	0	0	0	0	0	0	0	7,000	7,000	7,000	7,000	7,000	
-Sale of Materials	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
Sub Total	35,000	35,000	35,000	35,000	35,000	0	0	0	0	0	0	0	0	0	0	35,000	35,000	35,000	35,000	35,000	
Reimbursements																					
-Murchison Aviation	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
Sub Total	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
Member Contributions																					
-Precepts																					
Shire of Yalgoo	18,453	19,007	19,577	20,164	20,769	21,583	21,583	24,309	22,309	24,933	0	0	12,259	12,627	13,005	40,036	40,590	56,145	55,100	58,707	
Shire of Sandstone	4,270	4,398	4,530	4,666	4,806	0	0	0	0	0	0	0	0	0	0	4,270	4,398	4,530	4,666	4,806	
Shire of Mt Magnet	12,770	13,153	13,548	13,954	14,373	32,375	32,375	36,462	33,462	37,400	0	0	18,388	18,940	19,508	45,145	45,528	68,398	66,356	71,281	
Shire of Meekatharra	18,644	19,203	19,779	20,373	20,984	0	0	0	0	0	0	0	0	0	0	18,644	19,203	19,779	20,373	20,984	
Shire of Cue	11,633	11,982	12,341	12,712	13,093	32,375	32,375	36,462	33,462	37,400	0	0	18,388	18,940	19,508	44,008	44,357	67,192	65,113	70,001	
Sub Total	65,770	67,743	69,775	71,869	74,025	86,333	86,333	97,233	89,233	99,733	0	0	49,035	50,506	52,021	152,103	154,076	216,043	211,608	225,779	
Rent																					
-Rental Fences	6,026	6,026	6,026	6,026	6,026	0	0	0	0	0	0	0	0	0	0	6,026	6,026	6,026	6,026	6,026	
Sub Total	6,026	6,026	6,026	6,026	6,026	0	0	0	0	0	0	0	0	0	0	6,026	6,026	6,026	6,026	6,026	
TOTAL INCOME	106,796	108,769	110,801	112,895	115,051	86,333	86,333	97,233	89,233	99,733	0	0	49,035	50,506	52,021	193,129	195,102	257,069	252,634	266,805	
EXPENDITURE																					
Governance																					
-Meeting Fees	-9,000	-9,270	-9,548	-9,835	-10,130	0	0	0	0	0	0	0	0	0	0	-9,000	-9,270	-9,548	-9,835	-10,130	
-President Allowance	-508	-523	-539	-555	-572	0	0	0	0	0	0	0	0	0	0	-508	-523	-539	-555	-572	
-Meeting Expenses	-1,200	-1,236	-1,273	-1,311	-1,351	0	0	0	0	0	0	0	0	0	0	-1,200	-1,236	-1,273	-1,311	-1,351	
Administration																					
-Bank Fees	-100	-103	-106	-109	-113	0	0	0	0	0	0	0	0	0	0	-100	-103	-106	-109	-113	
-Administration	-3,000	-3,090	-3,183	-3,278	-3,377	0	0	0	0	0	0	0	0	0	0	-3,000	-3,090	-3,183	-3,278	-3,377	
-Salaries	-19,500	-20,085	-20,688	-21,308	-21,947	0	0	0	0	0	0	0	-33,000	-33,990	-35,010	-19,500	-20,085	-53,688	-55,298	-56,957	
-Superannuation	-1,853	-1,908	-1,965	-2,024	-2,085	0	0	0	0	0	0	0	-3,135	-3,229	-3,326	-1,853	-1,908	-5,100	-5,253	-5,411	
-Insurance	-1,500	-1,545	-1,591	-1,639	-1,688	0	0	0	0	0	0	0	-500	-515	-530	-1,500	-1,545	-2,091	-2,154	-2,219	
-Accounting Fees	-8,000	-8,240	-8,487	-8,742	-9,004	0	0	0	0	0	0	0	-2,000	-2,060	-2,122	-8,000	-8,240	-10,487	-10,802	-11,126	
-Audit Fees	-4,713	-4,854	-5,000	-5,150	-5,305	0	0	0	0	0	0	0	-2,000	-2,060	-2,122	-4,713	-4,854	-7,000	-7,210	-7,426	
-Telephone	-1,000	-1,030	-1,061	-1,093	-1,126	0	0	0	0	0	0	0	-400	-412	-424	-1,000	-1,030	-1,461	-1,505	-1,550	
-Advertising	-750	-773	-796	-820	-844	0	0	0	0	0	0	0	-400	-412	-424	-750	-773	-1,196	-1,232	-1,268	
-Travel Costs	-5,000	-5,150	-5,305	-5,464	-5,628	0	0	0	0	0	0	0	-6,600	-6,798	-7,002	-5,000	-5,150	-11,905	-12,262	-12,629	
-Sundry Expenses.	-5,000	-5,150	-5,305	-5,464	-5,628	0	0	0	0	0	0	0	-1,000	-1,030	-1,061	-5,000	-5,150	-6,305	-6,494	-6,688	
Less Admin Allocation to Projects	2,500	2,500	2,500	2,500	2,500	-2,500	-2,500	-2,500	-2,500	-2,500	0	0	0	0	0	0	0	0	0	0	
Works and Services																					
-Fence Maintenance	-38,173	-38,312	-38,455	-38,604	-38,756	-10,500	-10,500	-21,400	-13,400	-23,900	0	0	0	0	0	-48,673	-48,812	-59,855	-52,003	-62,656	

STATEMENT OF SOURCE AND APPLICATION OF FUNDS - MRVC

	MRVC CURRENT OPERATIONS					NEW 326 KM FENCE PROJECT					CO- ORDINATION OF REVITALISATION PROGAM					TOTAL OPERATIONS				
	ESTIMATE					ESTIMATE					ESTIMATE					ESTIMATE				
	YEAR 1	YEAR 2	YEAR 3	YEAR 4	YEAR 5	YEAR 1	YEAR 2	YEAR 3	YEAR 4	YEAR 5	YEAR 1	YEAR 2	YEAR 3	YEAR 4	YEAR 5	YEAR 1	YEAR 2	YEAR 3	YEAR 4	YEAR 5
	\$	\$	\$	\$	\$	\$	\$	\$	\$	\$	\$	\$	\$	\$	\$	\$	\$	\$	\$	\$
Finance Costs																				
-Interest on Loan	0	0	0	0	0	-22,324	-21,602	-20,848	-20,059	-19,235	0	0	0	0	0	-22,324	-21,602	-20,848	-20,059	-19,235
Non Cash Items																				
-Depreciation	-149,805	-149,805	-149,805	-149,805	-149,805	-48,000	-70,000	-70,000	-70,000	-70,000	0	0	0	0	0	-197,805	-219,805	-219,805	-219,805	-219,805
TOTAL EXPENDITURE	-246,601	-248,574	-250,606	-252,700	-254,856	-83,324	-104,602	-114,748	-105,959	-115,635	0	0	-49,035	-50,506	-52,021	-329,925	-353,176	-414,389	-409,164	-422,512
NET RESULT	-139,805	-139,805	-139,805	-139,805	-139,805	3,009	-18,269	-17,515	-16,726	-15,902	0	0	0	0	0	-136,796	-158,074	-157,319	-156,531	-155,707
Plus Non Cash Items																				
-Depreciation	149,805	149,805	149,805	149,805	149,805	48,000	70,000	70,000	70,000	70,000	0	0	0	0	0	197,805	219,805	219,805	219,805	219,805
Sub Total	149,805	149,805	149,805	149,805	149,805	48,000	70,000	70,000	70,000	70,000	0	0	0	0	0	197,805	219,805	219,805	219,805	219,805
Less																				
-Principal Repayments	0	0	0	0	0	-15,854	-16,575	-17,329	-18,118	-18,943	0	0	0	0	0	-15,854	-16,575	-17,329	-18,118	-18,943
- Capital Expenditure																				
Construction Costs - Fence	0	0	0	0	0	-2,400,000	-1,100,000	0	0	0	0	0	0	0	0	-2,400,000	-1,100,000	0	0	0
- Transfer To Fence Reserve	-10,000	-10,000	-10,000	-10,000	-10,000	-35,156	-35,156	-35,156	-35,156	-35,156	0	0	0	0	0	-45,156	-45,156	-45,156	-45,156	-45,156
Sub Total	-10,000	-10,000	-10,000	-10,000	-10,000	-2,451,010	-1,151,731	-52,485	-53,274	-54,099	0	0	0	0	0	-2,461,010	-1,161,731	-62,485	-63,274	-64,099
Plus																				
-Capital Funding - 326 km Fence																				
Government Grants	0	0	0	0	0	1,800,000	0	0	0	0	0	0	0	0	0	1,800,000	0	0	0	0
Royalties For Regions	0	0	0	0	0	0	1,100,000	0	0	0	0	0	0	0	0	0	1,100,000	0	0	0
Participants Contributions	0	0	0	0	0	100,000	0	0	0	0	0	0	0	0	0	100,000	0	0	0	0
-Loan Borrowings - MRVC	0	0	0	0	0	500,000	0	0	0	0	0	0	0	0	0	500,000	0	0	0	0
Sub Total	0	0	0	0	0	2,400,000	1,100,000	0	0	0	0	0	0	0	0	2,400,000	1,100,000	0	0	0
NET SURPLUS /DEFICIT	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0

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11.0 COSTS AND BENEFITS

11.1 COSTS

The capital cost for the construction of the new 326kms section of vermin proof cell fence is estimated at \$3,500,000. Operational costs over the 5 year projection period range between \$83,324 in Year 1 to \$115,634 in Year 5.

11.2 BENEFITS

The benefits can be measured through the following analysis-

11.2.1 PRIMARY BENEFITS

- Fully enclosed area that will create a vermin proof cell.
- Ability to eradicate wild dogs, with the confidence that no new dogs will enter the cell.
- Construction of the fence will result in the segregation of the Cell from the environmental and production concerns of the region and create a bounded environment in which to trial innovative projects for managing natural resources.
- The vermin proof fence will allow pastoralists to implement a comprehensive revitalisation program with confidence.
- Ability of pastoralists to return to recommended Dry Sheep Equivalent (DSE) stocking rates, resulting in a five-fold increase on current numbers.
- The vermin cell fence will relieve wild dog pressures along an estimated 425 km of the state barrier fence reducing the number of wild dogs entering the adjacent agricultural areas.

11.2.2 SECONDARY BENEFITS

- Implementation of the revitalisation program involves the control of total grazing pressure through the construction of an exclusion fence, which will secure the environmental values within the Cell area.
- The revitalisation program will allow pastoralists to implement a range of 'leading' management practices that result in:
 - Excellent animal husbandry that will facilitate productivity improvements;
 - The ability to nurture the cell environment such that carrying capacity increases, becomes more robust and provided nutrition which enables livestock to reach their full genetic potential;
 - The ability to build a business and enterprise structure that is not impacted by wild dogs.

- High expectation for increases in efficiency and profitability of various enterprises in the Cell.
- Significant long term benefits through efficient production, lower debt levels, and overall reduced reliance on government support.
- There will be significant multiplier benefits to the economic and social viability of the local region through the creation of new jobs in the pastoral industry, such as transport, shearing, service sectors and potential re-opening of local abattoir.

11.2.3 BENEFIT OF ESTABLISHMENT OF CELL FENCE TO INDUSTRY AND REGION

Pastoralists from the Murchison region of Western Australia in 2012 undertook a field trip to Charleville in Queensland to amass information in relation to the wild dog problem and how pastoralists in Charleville were dealing with it. One piece of information that was gathered:

- For every \$1 invested into the merino sheep industry will create a social value of approximately \$4.

In order to ascertain whether this is a true representation, it was necessary to engage with a small sample of pastoralists to evaluate and measure the benefits.

11.2.3.1 Yoweragabbie Station Mt Magnet

The table below details the dollar benefits to the station and the region.

Benefits to Industry and Region					
Industry	Scenario 1 Minimum stock numbers	Scenario 2 Average stock numbers	Scenario 3 Maximum Stock numbers	\$ Benefit to Station	\$ Benefit to Region
Meat Sheep	2500	5000	7000	100k, 200k,300k	20-50k
Wool (Merino) Sheep	3000	6000	8000	130k, 250k, 350k	30-100k
Cattle	100	500	1000	30k, 150k,270k	10-50k

The above table makes the following assumptions.

1. Sheep prices being between \$40 - \$100 per sheep.
2. Price for bale of wool being \$1,000.
3. Cattle prices being between \$600 - \$1,000 per cattle.

4. Benefits to region based on the benefit to local mustering contractors, local aboriginal workers, fuel supply, groceries, roadhouses, pubs, local carting companies, shearing teams and the flow on in the community. It does not include benefits to live export companies, agents, abattoirs and transport companies other than local.
5. No income included from the sale of rangeland goats.

11.2.3.2 Meka Station, Cue, Murchison and Yalgoo

Meka Station is primarily a sheep station.

The table below details the dollar benefits to the station and the region.

Benefit of establishment of Cell Fence to industry and region							
Industry	Scenario 1 Minimum stock numbers	Scenario 2 Minimum stock numbers	Scenario 3 Minimum stock numbers	\$ Benefit to Station			\$ Benefit to Region
				min	average	maximum	average
Meat Sheep	8,000	18,000	7000	\$-300,000	\$400,000	\$800,000	\$600,000
Wool (Merino) Sheep	-	-	-	-	-	-	-
Cattle	-	-	-	-	-	-	-

11.3 EVALUATION

In order to fully enclose the Murchison Region Vermin Cell approximately 326 kilometres of fence needs to be constructed with an estimated cost of \$3,500,000. The operational costs associated with this portion of the fence are estimated at \$83,324 in year 1 to \$115,634 in year 5.

Enclosing the Vermin Cell will restrict feral animals entering the cluster area and create an environment that can be sustainably and efficiently managed by all pastoralists associated with the Cell. This will bring economic benefits to the pastoralists and the Region. Based on the information provided by the two (2) pastoral stations, Meka and Yoweragabbie, the estimated economic benefits range from \$260,000 to

\$860,000 per annum for each of the 52 pastoral stations in the cell or \$13.52M - \$44.72M per annum for the Cell. The benefits to the region range from \$60,000 - \$400,000 per pastoral station or \$3.12M to \$20.8M for the Cell.

11.4 ECONOMIC FEASIBILITY ANALYSIS

The MRVC engaged the services of Grant Consultants to prepare an Economic Feasibility Analysis on the implementation of the Murchison Regional Vermin Cell in order to obtain an independent analysis and support the benefits identified by the pastoralists refer item 11.2.3 and 11.3 of the plan.

The Economic Feasibility Analysis was undertaken to measure the economies of scale in implementing the proposed vermin cell and at the individuals property scale, as well as the potential returns on investments. The report states the following:

“Financial analysis demonstrates that wild dogs present significant economic costs to the region’s agricultural production. It is estimated throughout the proposed Cell area, wild dogs cost the producers and the community upwards of \$8,728,216 annually in lost production, management time, employment, community investment.

The report identifies that in conjunction with a strong revitalisation plan, the implementation of the Murchison Regional Vermin Cell has significant potential to restore profitability and productivity to the region through increased gross margin. Additionally, the project can generate substantial long term benefit to the wider community through increased employment and community investment.

Whilst the size of the proposed Cell is considered significantly larger than the optimal, the project’s required fence length relative to the total perimeter positions it as an important first step in removing wild dogs. With an estimated payback period, across different production structures, ranging from 0.53 to 15.4 years without funding assistance; the project’s payback however could be reduced to 0.2 to 2.2 years should government provide the requested assistance. Landholders in the region present a significantly limited ability to fund the project through cash flow or debt, and as such it is expected to not be implemented if assistance cannot be obtained.

Based on the analysis conducted, the report finds that the implementation of proposed Murchison Regional Vermin Cell is a very economically feasible option, and has the potential to generate significant private and public benefit. The major weakness of the project is that due to the size of the cell, future investment in subdividing the Cell would be required to ensure longevity to the strategy. The success of the project is also contingent on the implementation of a revitalisation plan to ensure the complete removal of wild dogs from the Cell area once enclosed”.

A full copy of the Economic Feasibility Analysis in the implementation of the Murchison Regional Vermin Cell is attached refer to 15.3.

12.0 RISK ANALYSIS

It is important that the MRVC recognize that the construction of the 326 kilometre Vermin Fence to enclose the Cell is a risk activity subject to unpredictable outcomes. The Plan has addressed each of the following:

- Negotiation of a memorandum of Understanding between the key stakeholders
- Variation to the MRVC Establishment Agreement
- Preparation of a Project Agreement
- Legal instruments to provide access to pastoral properties
- Statutory Approvals
- Cost associated with the construction, maintenance and renewal of the fence
- Funding options
- Delivery of revitalization

In order to identify risk areas that need to be addressed to ensure the success of the project.

A range of risks have been identified that may impact on either the delivery of this project, or its ongoing management and have been assessed from an A54360 point of view, which examines the risk from a consequence and likelihood point of view to provide a risk rating.

RISK RATING					
Likelihood	CONSEQUENCES				
	Insignificant	Minor	Moderate	Major	Catastrophic
Almost	M	H	H	E	E
Likely	M	M	H	H	E
Possible	L	M	M	H	E
Unlikely	L	M	M	H	H
Rare	L	L	M	M	H

Risk Rating		Action Required
L	Low Risk	Managed by Routine Procedures
M	Medium Risk	Planned Action Required
H	High Risk	Prioritised Action Required
E	Extreme Risk	Immediate Corrective Action Required

12.1 FINANCE RISK

The plan reveals that the construction of the 326 kilometre vermin fence to enclose the Murchison Region Vermin Cell is dependent on government grants from State and Federal \$2.9M. No confirmation has been received at this stage. The MRVC intends to raise a loan amounting to \$500,000 to part fund the project, which will be subject to a guarantee from the participating member Shires.

Risk Rating	High (likelihood – Possible; Consequences – Major)
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12.2 COST OVERRUNS AND DELAYS

The costs estimates detailed in the Plan are based on actual costs for the construction of the most recent 123 km section of the vermin proof fence just completed by the MRVC. Escalation provisions amounting to \$317,232 have been included in the cost estimates. The MRVC will engage a suitable consultant to project manage the construction of the fence.

Risk Rating	Medium (likelihood – Possible; Consequences – Moderate)
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12.3 FLOOD RISK

Flood prone areas have been identified and the construction standard for the proposed fence addresses the materials to be used and method of construction.

Risk Rating	Medium (likelihood – Likely; Consequences – Moderate)
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12.4 LAND TENURE

Before the proposed fence can be constructed legal access to the land on which the fence will be placed needs to be arranged. The route identified for the fence is located on Crown Land that is subject to pastoral leases. Legal access to the land can be granted via easement, Licences, Reserves and Management Order. Easements in gross can be granted in favour of local governments in accordance with Section 195 of the Land Administration Act 1997.

Risk Rating	Medium (likelihood – Likely; Consequences – Insignificant)
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12.5 AMENDMENT TO ESTABLISHMENT AGREEMENT

In order that the MRVC undertake additional projects an amendment to the existing constitution needs to be drafted and approved by the participating member Local Governments and the Minister for Local Government. A draft Establishment Agreement has been prepared by the MRVC solicitors and will be referred as detailed above for approval.

Risk Rating	Medium (likelihood – Likely; Consequences – Insignificant)
-------------	--

12.6 STATUTORY APPROVALS

The MRVC will need to seek approval from the Director General of the Department of Agriculture and Food WA to join the proposed vermin proof fence to the State Barrier Fence in order to form the Murchison Region Vermin Cell.

Risk Rating	Medium (likelihood – Likely; Consequences – Minor)
-------------	--

12.7 ABORIGINAL HERITAGE APPROVAL

The Department of Aboriginal Affairs have advised in February 2014 that there were no adverse impacts for aboriginal heritage for the proposed vermin proof fence or in relation to aboriginal trust land. Consultation will be required with the traditional owners of the land.

Risk Rating	Medium (likelihood – Likely; Consequences – Minor)
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12.8 ENVIRONMENTAL APPROVALS

The site line for the proposed construction of the fence will need to be cleared and levelled. Clearing of leased land requires a permit from the Pastoral Lands Board, a pastoral leaseholder is required to obtain a clearing permit from the Department of Environment Regulation under the Environmental Protection Act 1986.

Risk Rating	Medium (likelihood – Likely; Consequences – Minor)
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13.0 ASSESSMENT

13.1 ISSUES

- **Do the services and facilities provided by the MRVC integrate and coordinate with those provided by government or public bodies?**

The services and facilities provided by the MRVC will integrate and coordinate with those provided by government and public bodies.

- **Do the services and facilities duplicate to an inappropriate extent, with those provided by government, any body or person, whether public or private?**

The services and facilities provided by the MRVC do not duplicate those provided by the government or others.

- **How can the MRVC be satisfied that the services and facilities are managed efficiently and effectively?**

An ongoing review of the MRVC's operations will ensure that the respective facilities are managed in an effective and efficient manner.

13.2 CAUSE AND EFFECTS

- **What is the expected effect of the proposal on the provision of services and facilities provided by MRVC?**

The construction of the vermin proof fence is an essential component to meeting the requirements creating the Murchison Region Vermin Cell.

- **What is the expected financial effect?**

The proposal to construct the 326 kilometre section of the vermin proof fence to enclose the Murchison Region Vermin Cell is estimated to cost \$3.5M to be funded from government grants \$2.90M, contributions from participating member local governments \$0.10M and loan borrowings of \$0.50M.

The participating member local governments will make annual contributions to meet the ongoing maintenance, renewals and loan repayments and may recoup this amount in total or in part by imposing a specified area rate on pastoral leases within their boundary and the cell.

These contributions range from \$86,333 to \$99,733 per annum over a five (5) year period.

- **Has the MRVC the ability to manage the service and facilities?**

The MRVC will engage appropriately qualified and experienced staff and consultants/contractors to ensure all proposals in this Business Plan will be implemented in a professional, effective and efficient manner.

- **What is the expected effect of the proposal on another person providing the service?**

The private sector does not provide these types of services or facilities. In relation to the vermin proof fence identified in the Plan, it will strengthen the economic viability of pastoral operations, and create employment opportunities for the local community.

14.0 PERFORMANCE MEASURES

The successful achievement of the aspirations contained within any plan is dependent upon ensuring that the operation and development phases are accomplished. The following indicators have been set to test whether or not these critical factors are achieved.

- Negotiation and signing of a Memorandum of Understanding between the key stakeholders.
- Consultation with Pastoralists and key government agencies regarding a preliminary draft of business plan
- Formalisation of new Establishment Agreement for the MRVC and approval by the Minister for Local Government and Communities by [date].
- Formalisation of Project Participants Agreement by participating member local governments and the MRVC by [date].
- Adoption of the Business Plan by the MRVC and participating member local governments by [date] for advertising purposes.
- Consider any submissions received on the Business plan and formally adopt business plan by [date].
- Submit application to funding bodies by [date].
- Approval of capital funding for project by [date].
- Signing of funding agreement with funding body by [date]
- MRVC to call tenders for the construction of project and award contract to successful party by [date].
- Commence construction of new vermin proof fence by [date].
- New vermin proof fence and vermin proof cell complete by [date].
- Control of vermin within cell and implementation of environmental management programs/strategies to improve productivity of pastoral industry within the Vermin Proof Cell.

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15.0 ATTACHMENTS

15.1 MURCHISON REGIONAL VERMIN CELL REVITALISATION PROGRAM

15.2 DRAFT MRVC ESTABLISHMENT AGREEMENT

15.3 ECONOMIC FEASIBILITY ANALYSIS ON THE IMPLEMENTATION OF THE MURCHISON REGIONAL VERMIN CELL