



# Keeping the lights on & enabling a renewable energy revolution in Wimmera Southern Mallee



Federal and state governments have an unquestionable responsibility to keep the lights on in homes and businesses. Without additional generation and transmission capacity in the Wimmera Southern Mallee (WSM) area of western Victoria will go dark when the Yallourn power station closes in 2028.<sup>1</sup>

There are solutions to both this looming generation crisis when Yallourn closes, and the existing power unreliability in the region.

These measures will also enable the realisation of the economic potential of the area, as part of the clean energy revolution, and resolve the cemented-in community roadblock to the critical Victoria-NSW Interconnect West (VNI-West) link.

Additional transmission and renewable power generation capacity are well supported by industry, regional development organisations, and communities. With respectful good faith consultation, and appropriate compensation, the WSM Regional Energy Zones (REZ) will solve four critical power issues.

We strongly urge AEMO and the Victorian Government to support the proposed solutions.

This report draws on regional experience, investor perspectives and new economic modelling done by the Wimmera Development Association (WDA).

# **Executive Summary**

### The Power Issues

#### Existing problems - exiting fossil-fuel generation and insufficient transmission

The Yallourn power station is scheduled to close in 2028, removing 4 GW of generation from the national grid. To ensure Victoria meets its targets of 65 per cent renewables by 2030 and 95 per cent by 2035, the government is sending a clear signal that replacement generation must be from renewable sources.<sup>2</sup>

Western Victoria's wind and solar resources are large and reliable — there is potentially 10 GW of renewable capacity in the region.<sup>3</sup> Enough to keep the lights on in WSM and more.

However, the existing transmission capacity is constrained and insufficient. There are already power reliability issues, and it does not allow full connection of existing renewable facilities,<sup>4</sup> let alone new generation. And, there is no way that the potential generation can be become a reality without confidence in transmission capacity.

Without at least 3.5 GW of generation from the REZ in the region, and new transmission to connect it, the lights will go out. This is the ultimate realisation of a significant existing issue of power unreliability in the WSM region because of constraints in the transmission capacity.

While several critical transmission projects are planned, investors, project developers, communities, and development organisations, are worried that the proposed options will entrench sub-optimal capacity — by gigawatts — and inflame community opposition.

<sup>1</sup> https://aemo.com.au/-/media/files/major-publications/isp/2022/2022-documents/2022-integrated-system-plan-isp.pdf (p. 49)

<sup>2</sup> https://www.energy.vic.gov.au/renewable-energy/victorian-renewable-energy-and-storage-targets

<sup>3</sup> Based on publicly available and confidential information

<sup>4</sup> https://reneweconomy.com.au/victoria-pushes-ahead-with-1-5gw-network-upgrade-in-windy-south-west/

#### Unrealised economic potential

The Western Victoria region is geographically and topographically suited to being part of the renewable energy revolution that is needed to achieved Australia's clean energy transition. There is an abundance of reliable solar and wind resources.

As a proof point to this, there are over 19 renewable energy projects, totalling over 10 GW, under consideration in this area. However, without additional transmission, they could not be connected.

As such, without commitment to new and upgraded transmission that will fully support connection, the investments in generation will not be made.

The community understands the economic growth and jobs that would flow from making the region a renewable energy hub, and that they are at risk of being missed. (See 'Assessment' section below.)

#### **VNI–West roadblocks**

The VNI West link is a critical part of Australian Electricity Market Operator's (AEMO) 2022 Integrated System Plan (ISP).

The existing proposed route is bogged down with community opposition and is unlikely to be realised in a timely way, if ever.

The WSM communities understand the need for new transmission. They live with the issue of constrained transmission every day and understand the significant impact on people and businesses. As such, these communities are uniquely placed to be part of the wider solution for Victorian power, as the alternative route for the VNI–West link.

With respectful good faith consultation, and appropriate compensation, the WSM communities could solve a critical power issue for Victoria as a whole.

This would dovetail with solving the regional transmission problems and harnessing the opportunities, as outlined above.

### **The Solutions**

There are three proposed new transmission projects in Victoria that have the potential to solve these critical issues – Project Energy Connect (PEC), Victoria–NSW Interconnect (VNI) West, and the Western Renewables Link (WRL). Upgrading capacity and making changes to the proposed routes will, in concert, make them the viable solution.

WDA analysis shows transmission routes that are appropriate, have — or can build — social licence in a timely manner, and that will enable the expedited and long-term development and delivery of substantial renewable energy resources in western Victoria.

#### We believe the following options should be investigated:

- Move the VNI West route to Bulgana (away from Bendigo).
- Move the terminal station from North Ballarat and relocate it at or near Bulgana.
- Build a 500 kV double circuit overhead line for the full 190 km of the WRL project from Bulgana to Sydenham.

# Keeping the lights on and enabling a renewable energy revolution in WSM

AEMO reported in 2022, that Yallourn power station will likely close by 2028, removing 4 GW of capacity from Victoria.<sup>5</sup> To address the power gap an accelerated build of renewable energy generation, storage capacity, and new transmission is required to a parallel timetable.

In addition, despite the designation of three REZ in western Victoria, and the significant interest in and resources to support development of renewable energy projects in the WSM region, capacity constraints in Victoria's energy grid means that even the wind and solar energy already being produced within western Victoria cannot get to the customers because there is not enough capacity in the existing network.<sup>6</sup> And there is simply no capacity for additional projects in the transmission network. This leaves the region with the 'power issues' described above.

These capacity constraints are not just an issue for existing and new generators, they are preventing industry from electrifying and expanding their businesses and discouraging new investment into the region. The problems will also delay the achievement of Victoria's net zero and renewable generation targets.

#### Proposed transmission projects and their problems

There are three proposed new transmission projects — Project Energy Connect (PEC), Victoria–NSW Interconnect (VNI) West, and the Western Renewables Link (WRL) (see box 1 below for details), which are welcomed.

However, there are major issues with what is proposed for two of them, VNI West and WRL, that could exacerbate rather than alleviate grid capacity issues. They include:

- limited transmission capacity and terminal station options
- investor uncertainty
- social licence and community opposition.

<sup>5</sup> https://aemo.com.au/-/media/files/major-publications/isp/2022/2022-documents/2022-integrated-system-plan-isp.pdf (p. 49) 6 https://www.theage.com.au/national/victoria/gridlock-on-the-grid-stalls-the-transition-to-renewables-20210528-p57w6q.html

### Box 1 – Detail on proposed transmission projects

New transmission lines and capacity upgrades are being planning which would connect the grid in western Victoria to NSW and South Australia in the north, and south–east into Melbourne. These are shown in Figure 1:

- Project Energy Connect (PEC)
- Victoria-NSW Interconnect (VNI) West
- Green dashed line ---

Red dashed line --- and Orange dashed line ---

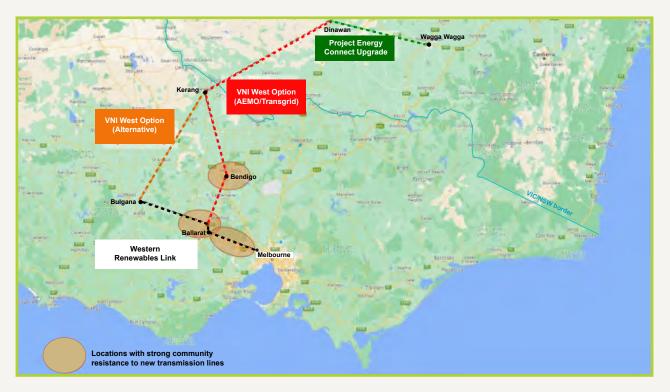
• Western Renewables Link (WRL)

Black dashed line ---

While PEC is mainly going through NSW and into South Australia, it will also connect to the western Victoria grid via Kerang. The connecting link from Kerang to the south will unlock grid capacity for the REZ areas in the west.

Options under consideration for those links are critical to addressing present and future grid capacity problems.

#### Figure 1: Proposed REZ Transmission Links



#### Proposed Victoria-NSW Interconnect West (VNI West)

VNI West is a proposed high–capacity 500kV double–circuit overhead transmission line. The intention is that it will be built by 2031, earlier if there is additional support.<sup>7</sup> VNI West will provide a connection between the Western Renewables Link (WRL) in Victoria and Project Energy Connect (PEC) in NSW.

The current plan for this project is that it will connect to the WRL at a new terminal station north of Ballarat.

The current VNI West route runs via Ballarat and the Ballarat–Bendigo corridor. This route, particularly around Bendigo and Ballarat, is contentious with communities and there is already a highly mobilised group opposing transmission<sup>8</sup>.

#### **Proposed Western Renewables Link**

#### WRL as currently proposed:

- Option 1: A 220 kV double circuit overhead line from Bulgana (near Stawell) to a new terminal station (potentially at Waubra or north of Ballarat), and a 500 kV double circuit overhead line from that new terminal station to Sydenham
- Option 2: A 500 kV double circuit overhead line for the full 190 km of the project, from Bulgana to Sydenham.

The WDA understands that the WRL base case was assessed as requiring a capacity of 9 GW — over time.<sup>9</sup> The current proposal for the WRL is for it to be built by 2027, with capacity of 2 GW. The WRL is also subject to objections from the local community about the proposed route and locations of terminal stations.

In total, over 80 per cent of the complaints received by the Australian Energy Infrastructure Commissioner in 2021 were regarding Victorian transmission project terminal stations.<sup>10,11</sup>

#### Limited transmission capacity and terminal station options

Within the Western Victoria REZ there are at least 3 GW of proposed projects, based on publicly available and confidentially shared information.

If the WRL is built to a lower capacity (Option 1 - 220kV) in the western section, existing proposed projects mean that the capacity would be immediately over–subscribed. This would not only leave proposed renewable projects in the Western Victoria REZ stranded in development, but it would also disable future investment.

If the WRL is built to 500 kV (Option 2), this would open up an option for VNI West to connect to Bulgana, rather than going through Bendigo, and allow for the existing terminal station north of Ballarat to be re-positioned. While the cost for Option 2 is unknown, the benefit is significant as a full 500kV transmission line provides a potential 127% energy transmission capacity increase over Option 1.

Moving the terminal station from urban, dense, high–intensity agricultural areas to more sparsely populated, broad acre agricultural areas like Bulgana is likely to be welcomed by the local community. This option is also supported by industry.<sup>12</sup>

#### Investor uncertainty

Renewable energy project investors are holding on to opportunities in Western Victoria that require transmission capacity upgrades to progress. Investors require confidence that the transmission needs will be satisfied before they take their projects forward.<sup>13,14</sup>

Developers are well aware that poor community engagement approaches and practices can foment community opposition, and that this may translate to costly delays.<sup>15</sup> This group of stakeholders is very concerned that the proposed VNI West route (See red dashed line route in Figure 1) is driving community opposition and that this will directly impact the viability of their projects.

Equally, developers are concerned that the planned capacity for the WRL route will be insufficient for them to connect into without being curtailed by AEMO, significantly impacting their return on investment.

#### Social licence and community opposition

Community opposition already exists to the proposed key transmission route options through Bendigo (VNI West) and North Ballarat (VNI West and WRL). There are also community concerns about the terminal station proposed for North Ballarat. This existing opposition is entrenched and difficult to resolve.<sup>16</sup>

We note, however, that these communities are supportive of transmission upgrades via the alternative route through Bulgana (see attached Letters of Support).

This is highly problematic for regulators, transmission operators, and investors, as well as local governments and development associations in the region. Such strong opposition could significantly impact generally the broad community support that exists for renewable energy investment.

In contrast, social licence for renewable energy in the WSM region is already strong, as evidenced by support for existing renewable energy projects<sup>17</sup> and for the WRL transmission upgrade.

<sup>7</sup> https://www.transgrid.com.au/media/0m3ivwsm/vni-west-padr-faq\_website\_final-pdf.pdf

<sup>8</sup> https://aemo.com.au/-/media/files/electricity/nem/planning\_and\_forecasting/victorian\_transmission/vni-west-rit-t/report-submissions/ausnet-services-submission-to-the-pscr.pdf

<sup>9</sup> Based on publicly available and confidential information

<sup>10</sup> https://www.aeic.gov.au/sites/default/files/documents/2022-07/aeic-2021-Annual-Report.pdf

<sup>11</sup> https://reneweconomy.com.au/social-licence-transmission-projects-push-community-complaints-to-record-high/

<sup>12</sup> https://aemo.com.au/-/media/files/electricity/nem/planning\_and\_forecasting/victorian\_transmission/vni-west-rit-t/non-confidential-

submissions/ausnet-services----submission-to-vni-west-padr.pdf?la=en

<sup>13</sup> https://reneweconomy.com.au/wind-solar-projects-warned-of-seven-year-delays-in-victoria-nsw-36095/

<sup>14</sup> https://www.transgrid.com.au/media/0m3ivwsm/vni-west-padr-faq\_website\_final-pdf.pdf

<sup>15</sup> https://ceig.org.au/wp-content/uploads/2022/08/Baringa\_CEIG\_Advice-on-Transmission-Reform\_Report\_FINAL.pdf

<sup>16</sup> https://www.abc.net.au/news/2020-08-02/victorian-farmer-ploughs-message-to-ausnet-powerlines-myrniong/12516126

<sup>17</sup> https://assets.sustainability.vic.gov.au/susvic/Report-CCSR-Regional-Report-Wimmera-Southern-Mallee.pdf

Bulgana and its surrounding areas has lower-density population centres, broad acre cropping and less environmental barriers to transmission, which is less likely to raise the ire of local communities.

It is increasingly clear from community organisations like Re–Alliance that social licence for transmission is not guaranteed and requires genuine engagement and consultative processes that respond to community concerns. As shown in NSW in 2022, movement on benefit sharing for transmission projects<sup>18</sup> can shift in response to changed community expectations and advocacy.<sup>19</sup> However, this is not a substitute for genuine engagement.<sup>20</sup> Equally, where there is deep opposition, engagement may be extremely difficult.<sup>21</sup>

#### WSM Community support

Communities in the WSM region are supportive of addressing climate change with nearly 70 per cent wanting to see action, and close to 80 per cent supporting targets to reduce emissions and increase renewable generation.

Residents in the WSM region are supportive of new wind and solar generation developments in their area, with 80 per cent supporting new wind projects and 86 per cent supporting new solar projects.<sup>22</sup>

The WDA, representing the communities in the region, is strongly supportive of transmission infrastructure upgrades in the WSM region to unlock the economic opportunities flowing from both proposed and future renewable generation capacity.<sup>23,24</sup>

### Local stakeholder perspectives

Recent market research<sup>25</sup> shows there is 'high levels of support for the Western Renewables Link' and that local residents see this project as 'the opportunity to solve...some of our regional supply issues'.

These issues are very large for local business and economic development experience. As noted by one participant '...while there had been initial assurances from the electricity suppliers [of] sufficient supply, when [...] the estate sought connection, all of a sudden, they can't actually commit to the supply that [we're] going to need.' And another lamented the opportunity costs that inevitably arise in such circumstances, saying 'We've got some key developers that want to develop in this area [but] their insecurity of power [...] means they're looking elsewhere'.

Businesses and community members in the region see this situation as exemplifying energy poverty. This extends beyond economic development, to operational impacts now and restrictions on future opportunities. As noted by another person 'there's a [food industry] business here in Horsham, and their equipment is all electronically monitored. If they get a surge in power, it will shut down the batch and then they lose two hours to a full clean out and [also lose] that batch'. Critically, this impacts the capacity of local businesses to expand — i.e. businesses looking to grow cannot add additional facilities/equipment. This restricts both business operation and, importantly, the creation of new jobs.

Local stakeholders see the energy poverty and the risk of more 'opportunities squandered' as leaving them in a Catch-22 situation 'the region has the capacity to be a renewable energy super-power for Victoria, but can't capitalise on that because of its poor energy infrastructure/supply'.

25 Redbridge market research conducted for Ausnet, February 2023 - included with Ausnet's permission.

<sup>18</sup> https://www.re-alliance.org.au/nsw\_payment\_scheme\_transmission

<sup>19</sup> https://www.re-alliance.org.au/no\_transition\_without\_transmission

<sup>20</sup> https://www.re-alliance.org.au/renewable\_energy\_transmission

<sup>21</sup> Hall, N., Ashworth, P., and Shaw, H. (2012) Exploring Community Acceptance of Rural Wind Farms in Australia

<sup>22</sup> https://assets.sustainability.vic.gov.au/susvic/Report-CCSR-Regional-Report-Wimmera-Southern-Mallee.pdf

<sup>23</sup> https://www.aph.gov.au/DocumentStore.ashx?id=c2ade8b5-57e4-4553-81c7-57edbfa0adf3&subId=510646

<sup>24</sup> https://www.aemo.com.au/-/media/files/electricity/nem/planning\_and\_forecasting/victorian\_transmission/2019/submissions/wimmera-

development-association-submission-to-the-padr.pdf?la=en&hash=D24503CB767E402B1C1A1E63FBDF74F5

#### **Policy alignment**

Renewable energy activation in the WSM region is aligned with State Government's Victorian Renewable Energy Targets (VRET), Renewable Energy Development Zone Plans (RDP), Regional Partnership priorities and priorities for the Grampians New Energy Taskforce.

### The solutions

It is evident that expanding and upgrading grid capacity is critical if western Victoria is to become a renewable energy powerhouse. To ensure the most opportunities can be realised, with the strongest community support<sup>26</sup>, and thus at the fastest rate, the Wimmera Development Association is calling on the Victorian Government and AEMO to support a proposal to:

- build the planned Western Renewables Link with an increased capacity as a 500 kV double circuit overhead line between Bulgana and Sydenham
- re-route the VNI West option from Ballarat and Bendigo to Bulgana to Kerang
- locate a terminal station at Bulgana
- expedite the decision to move the transmission substation upgrade<sup>27</sup> so that the economic benefits for the WSM region and its communities can be realised sooner.

#### These options would:

- provide confidence in future grid capacity for renewable energy developers and investors.
- provide potentially 127 per cent more transmission capacity over the present option ('Option 1') to connect proposed and future wind and solar generation projects.
- alleviate community concerns associated with the Bendigo and North Ballarat transmission routes and terminal station.
- deliver significant economic and environmental benefits to these regions by supporting the electrification and expansion of local businesses and industry.

These actions will support both the WRL project and the Victoria–NSW Interconnector West and significantly fast track Victoria's renewable energy targets and investment outcomes.

With respectful good faith consultation, and appropriate compensation, the new transmission projects in WSM will solve critical power issues, unlock a region's economic potential, and help Victoria and Australia meet its clean energy and emissions targets.

### **Our Commitment**

The WDA and its member councils are prepared to be public (and vocal) supporters of any decision that involves moving the terminal station to Bulgana.

We would like the opportunity to partner with government on promoting the wider opportunities that renewable energy investment can deliver in repositioning the Wimmera Southern Mallee regional economy.

<sup>26</sup> We note, further community consultation and engagement is required to confirm support and to nurture ongoing social licence. 27 https://nexaadvisory.com.au/removing\_transmission\_roadblocks/

# Assessment of the economic potential of renewable energy in WSM

Wimmera Southern–Mallee (WSM) has a long and proud history as an agricultural region. It retains a reliance on traditional agriculture and manufacturing industries as the mainstays of its economic activity.

However, in recent times while the WSM region has experienced declining economic output (although employment has been stable).<sup>28</sup> Like many regions, the WSM region needs to diversify to support population growth, create new jobs and enhance the viability of the local economy.

#### **Regional Energy Zones in WSM**

The WSM region is endowed with significant natural resources, including a climate that would support reliable wind and solar power.<sup>29</sup> It is already home to several operating wind and solar projects, and in 2021 the Victorian Government designated three Renewable Energy Zones (REZs) in western Victoria as part of its REZ Development Plan.<sup>30</sup> These are:

- Murray River from Red Cliffs in the north-west to Bendigo
- Western Victoria from west of Horsham to Ballarat
- South West from west of Heywood to Meredith, west of Geelong.



#### Figure 2: A map of the Victorian Renewable Energy Zones

28 https://www.rdv.vic.gov.au/\_data/assets/pdf\_file/0008/2063906/Wimmera–Southern–Mallee–REDS–2022–Supporting–Analysis.pdf 29 https://www.rdv.vic.gov.au/\_data/assets/pdf\_file/0008/2063915/Wimmera–Southern–Mallee–REDS–2022.pdf 30 https://www.energy.vic.gov.au/\_data/assets/pdf\_file/0028/580618/Victorian–Renewable–energy–zones–development

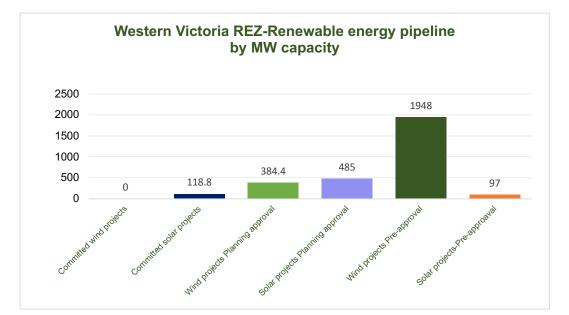
<sup>30</sup> https://www.energy.vic.gov.au/\_\_data/assets/pdf\_file/0028/580618/Victorian-Renewable-energy-zones-developr -plan-directions-paper.pdf

The designation of these REZ areas has already attracted a large number of proposals from wind, solar and battery storage project developers, with the potential for more if the right investment settings are provided.

The Victorian Government has received proposals for at least 19 projects across the three western Victoria regions, comprising 5.06 GW of solar generation and 4.393 GW of wind.<sup>31</sup>

The Western Victoria REZ, alone, has more than 700 MW of solar generation projects and 2.3 GW of wind generation projects in the pipeline (Figure 3). $^{32}$ 







31 Based on publicly available information.32 Based on publicly available information.

## Jobs and growth

Economic modelling by the WDA shows the solutions outlined above could realise the following benefits for the WSM region:

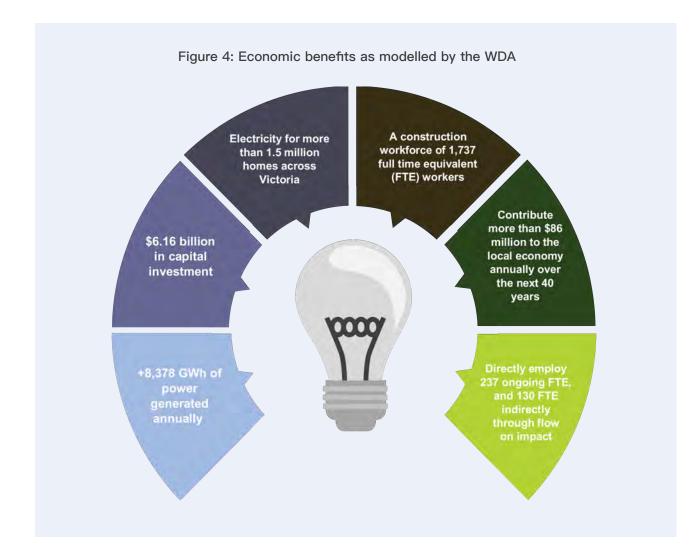
- Local renewable generation capacity of 3 GW from
  - o 700 MW in solar generation capacity across twelve projects ranging from 5 MW up to 235 MW
  - o 2.33 GW in wind generation capacity across seven projects ranging from 8.4 MW up to 1.5 GW

These western Victoria REZ projects represent over \$6.16 billion potential direct capital investment and 1,737 direct construction jobs and 237 ongoing roles.

In addition, it has been estimated that second round, indirect, effects (from flow on supply chain activity and inward migration) would result in the gain of a further 3,082 jobs. (This represents a Type 1 employment multiplier of 2.052 based on REMPLAN modelling (see Appendix 1 – WSM REMPLAN Report).

The increase in direct and indirect output and the corresponding creation of jobs in the region would be expected to result an increased in the level of wages, and associated consumption, in the local economy. It has been estimated that these third round consumption effects would further boost employment by 1,254 jobs.

In total, it has been estimated that the direct, supply–chain and consumption effects of the Western Vitoria REZ would make an economic contribution of ~\$86.65 million per year be and up to 4,819 jobs. This represents a Type 2 Employment multiplier of 2.774.



**REMPLAN Modelling** 



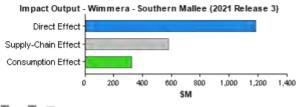
# Impact Report for Wimmera - Southern Mallee

Including the Northern Grampians, Horsham Rural City, West Wimmera, Hindmarsh, Yarriambiack, and Buloke Local Government areas.

#### **Impact Scenario**

Industry Sector	Direct Change Jobs	Direct Change Output (\$M)
Heavy & Civil Engineering Construction	1,737	

#### Impact on Output



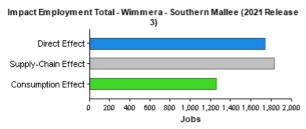
#### 4 E M P L = M

From a direct increase in output of \$1,182.544 million it is estimated that the demand for intermediate goods and services would rise by \$578.084 million. This represents a Type 1 Output multiplier of 1.489. These supply-chain effects include multiple rounds of flow-on effects, as servicing sectors increase their own output and demand for local goods and services in response to the direct change to the economy.

The increases in direct and indirect output would typically correspond to the creation of jobs in the economy. Corresponding to this change in employment would be an increase in the total of wages and salaries paid to employees. A proportion of these wages and salaries are typically spent on consumption and a proportion of this expenditure is captured in the local economy. The consumption effects under this scenario are estimated at \$322.358 million.

Total output, including all direct, supply-chain and consumption effects is estimated to increase by up to \$2,082.986 million. This represents a Type 2 Output multiplier of 1.761.

#### Impact on Employment



#### REMPLAN

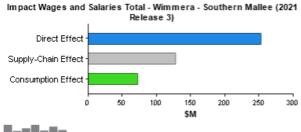
From a direct increase in output of \$1,182.544 million the corresponding creation of direct jobs is estimated at 1,737 jobs. From this direct expansion in the economy, flow–on supply–chain effects in terms of local purchases of goods and services are anticipated, and it is estimated that these indirect impacts would result in the gain of a further 1,828 jobs. This represents a Type 1 Employment multiplier of 2.052.

The increase in direct and indirect output and the corresponding creation of jobs in the economy are expected to result in an increase in the wages and salaries paid to employees. A proportion of these wages and salaries are typically spent on consumption and a proportion of this expenditure is captured in the local economy. The consumption effects under this scenario are estimated to further boost employment by 1,254 jobs.



Total employment, including all direct, supplychain and consumption effects is estimated to increase by up to 4,819 j obs. This represents a Type 2 Employment multiplier of 2.774.

#### Impact on Wages and Salaries



#### REMPLAN

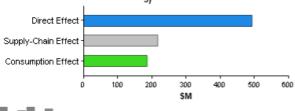
From a direct increase in output of \$1,182.544 million it is estimated that direct wages and salaries would increase by \$252.645 million. From this direct expansion in the economy, flow–on supply–chain effects in terms of local purchases of goods and services are anticipated, and it is estimated that these indirect impacts would result in the gain of a further 1,828 jobs and a further increase in wages and salaries of \$127.743 million. This represents a Type 1 Wages and Salaries multiplier of 1.506.

The increase in direct and indirect output and the corresponding creation of jobs in the economy are expected to result in an increase in the wages and salaries paid to employees. A proportion of these wages and salaries are typically spent on consumption and a proportion of this expenditure is captured in the local economy. The consumption effects under this scenario are expected to further boost employment in sectors such as retail therefore further increasing wages and salaries by \$72.396 million.

Total wages and salaries, including all direct, supply-chain and consumption effects is estimated to increase by up to \$452.784 million. This represents a Type 2 Wages and Salaries multiplier of 1.792.

#### Impact on Value-Added

Impact Value-Added Total - Wimmera - Southern Mallee (2021 Release 3)



#### REMPLAN

From a direct increase in output of \$1,182.544 million the corresponding increase in direct value– added is estimated at \$492.523 million. From this direct expansion in the economy, flow–on supply–chain effects in terms of local purchases of goods and services are anticipated, and it is estimated that these indirect impacts would result in a further increase to value–added of \$216.542 million. This represents a Type 1 Value–added multiplier of 1.440.

The increase in direct and indirect output and the corresponding boost to jobs in the economy are expected to result in an increase in the wages and salaries paid to employees. A proportion of these wages and salaries are typically spent on consumption and a proportion of this expenditure is captured in the local economy. The consumption effects under this scenario are expected to further boost value–added by \$185.141 million.

Total value–added, including all direct, supplychain and consumption effects is estimated to increase by up to \$894.205 million. This represents a Type 2 Value–added multiplier of 1.816.

### Impact Summary

	Direct Effect	Supply– Chain Effect	Consumption Effect	Total Effect	Type 1 Multiplier	Type 2 Multiplier
Output (\$M)	\$1,182.544	\$578.084	\$322.358	\$2,082.986	1.489	1.761
Employment (Jobs)	1,737	1,828	1,254	4,819	2.052	2.774
Wages and Salaries (\$M)	\$252.645	\$127.743	\$72.396	\$452.784	1.506	1.792
Value– added (\$M)	\$492.523	\$216.542	\$185.141	\$894.205	1.440	1.816

### Disclaimer

All figures, data and commentary presented in this report are based on data sourced from the Australian Bureau of Statistics (ABS), most of which relates to the 2016, 2011, 2006 and 2001 Censuses.

Using ABS datasets and an input / output methodology industrial economic data estimates for defined geographic regions are generated.

This report is provided in good faith with every effort made to provide accurate data and apply comprehensive knowledge. However, REMPLAN does not guarantee the accuracy of data nor the conclusions drawn from this information. A decision to pursue any action in any way related to the figures, data and commentary presented in this report is wholly the responsibility of the party concerned. REMPLAN advises any party to conduct detailed feasibility studies and seek professional advice before proceeding with any such action and accept no responsibility for the consequences of pursuing any such action.





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Wimmera Development Association acknowledges the Traditional Owners of the land on which we work. We pay our respects to their culture and to Elders past, present and emerging.



Letters of support



#### TO WHOM IT MAY CONCERN

#### RE: Support for Wimmera Southern Mallee & Western Victoria REZ transmission upgrades

Committee for Ballarat's Purpose is to inspire diverse thought leadership and unlock potential. Our Vision is for a thriving and vibrant regional community, known for its Liveability, Sustainability and Inclusiveness.

As a member-based organisation, we represent over 120 businesses and individuals from across every sector of the region's economy and community. Our members seek to work with the three layers of government to advocate for the key issues that impact our long-term social, economic and environmental future.

On behalf of Committee for Ballarat, I am pleased to provide a letter in support of the Wimmera Southern Mallee (WSM) and Western Victoria REZ transmission upgrades which are an important step in Victoria's energy transformation and the preservation of strong, vibrant local communities.

The WSM region, and the whole of western Victoria, has significant and reliable wind and solar resources. The Western Victoria REZ region has more than 700 MW of solar generation projects and 2.3 GW of wind generation projects in the pipeline. There are significant economic, social and environmental benefits that come from these projects.

Despite the designation of three REZs in western Victoria and the significant interest and resources to support investment in renewable energy projects in the WSM region, existing capacity constraints in Victoria's energy grid mean that Victoria's transition to renewable energy is being seriously constrained.

Increasing transmission grid capacity into the WSM region is the only way to realise the maximum potential benefit from renewable energy generation. Potential benefits available from an upgrade at 500kV, with a route that goes west through Bulgana and connects into Sydenham, will address present and future grid capacity issues while accelerating investment, extending project diversity, growing job opportunities and building social licence with surrounding communities.

The Wimmera Southern Mallee & Western Victoria REZ transmission upgrades are vital for the future prosperity of the region.

Michael Poulton Chief Executive Officer

9 February 2023

admin@committeeforballarat.com t 03 5332 1240 www.committeeforballarat.com

ALL ENQUIRIES: Ph: (03) 5478 0100 Email: buloke@buloke.vic.gov.au



#### 13 February 2023

Chris Sounness Federation University Campus Level 1, Building C 289 Baillie Street HORSHAM VIC 3400

#### Email: Chris@wda.org.au

#### RE: Support for Wimmera Southern Mallee & Western Victoria REZ transmission upgrades

Dear Chris,

I write on behalf of the Buloke Shire Council in support of the **Wimmera Southern Mallee & Western Victoria REZ transmission upgrades**.

The Victorian Government has committed to the development of its Renewable Energy Zones (REZs) as part of the State's commitments to achieve lower carbon emissions. The REZs will allow new renewable energy projects, achieving better energy affordability and reliability outcomes for consumers, and furthering regional economic development goals. There are six REZs identified of which Western Victoria is one.

This presents an incredible opportunity for the Western region of Victoria.

The WSM region, and the whole of western Victoria, has significant and reliable wind and solar resources. The Western Victoria REZ region has more than 700 MW of solar generation projects and 2.3 GW of wind generation projects in the pipeline. There are significant economic, social and environmental benefits that will come from these projects.

Despite the designation of three REZs in western Victoria, and the significant interest and resources to support investment in renewable energy projects in the WSM region, there is a critical problem. Existing capacity constraints in Victoria's energy grid mean that Victoria's transition to renewable energy is being seriously constricted.

Just like the rest of Australia, transmission infrastructure in the region has not kept pace with the new energy generation and storage projects coming online. There is limited, if any transmission capacity, for new electricity being generated to make its way into the grid. This is not just an issue for new generation, but it is preventing existing industry from electrifying and expanding their businesses as well as discouraging new investment into the region.

Increasing transmission grid capacity into the WSM region is the only way to realise the maximum potential benefit from renewable energy generation. Of all the regions in Victoria, WSM has the best alignment of community support, policy support, and economic opportunity.

The potential benefits available from an upgrade at 500kV with a route that goes west, through Bulgana and connects into Sydenham, will address present and future grid capacity issues while

accelerating investment, extending project diversity, growing job opportunities and building social licence with surrounding communities.

The Buloke Shire Council sees every day the impacts and benefits of such infrastructure and services for the Western Victorian community.

Thank you for the opportunity to show our support for this important step in Victoria's energy transformation and the preservation of strong local communities.

Yours sincerely

Wayne O'Toole

Chief Executive Officer



3 February 2023 BayWa r.e. Projects Australia Pty Ltd Suite 1, Part Level 13 356 Collins St Melbourne, Vic, 3000

#### RE: Support for Wimmera Southern Mallee & Western Victoria REZ transmission upgrades

Dear CEO, Wimmera Development Association

I write on behalf of BayWa r.e. Projects Australia Pty Ltd in support of the **Wimmera Southern Mallee (WSM) & Western Victoria REZ transmission upgrades**. BayWa r.e. delivers renewable projects and services such as asset and operations management around the world. BayWa r.e. has developed and sold more than 5 GW of operational assets worldwide.

The Victorian Government has committed to the development of its Renewable Energy Zones (REZs) as part of the State's commitments to achieve lower carbon environment. The REZs will allow new renewable energy projects, achieving better energy affordability and reliability outcomes for consumers, and furthering regional economic development goals. There are six REZs identified of which Western Victoria is one.

This presents an incredible opportunity for the Western region of Victoria.

The WSM region, and the whole of western Victoria, has significant and reliable wind and solar resources. The Western Victoria REZ region has more than 700 MW of solar generation projects and 2.3 GW of wind generation projects in the pipeline. This translates to more than \$3 billion of industry investment and more than \$300 million of market benefits. There are significant economic, social and environmental benefits that come from these projects.

Despite the designation of three REZs in western Victoria, and the significant interest and resources to support investment in renewable energy projects in the WSM region, there is a critical problem. Existing capacity constraints in Victoria's energy grid mean that Victoria's transition to renewable energy is being seriously constrained.

Just like the rest of Australia, transmission infrastructure in the region has not kept pace with the new energy generation and storage projects coming online. There is limited, if any transmission capacity, for new electricity being generated to make its way into the grid. This is not just an issue for new generation, but it is preventing existing industry from electrifying and expanding their businesses as well as discouraging new investment into the region.



Increasing transmission grid capacity into the WSM region is the only way to realise the maximum potential benefit from renewable energy generation. Of all the regions in Victoria, WSM has the best alignment of community support, policy support, and economic opportunity.

The potential benefits available from an upgrade at 500kV with a route that goes west, through Bulgana and connects into Sydenham, will address present and future grid capacity issues while accelerating investment, extending project diversity, growing job opportunities and building social licence with surrounding communities.

BayWa r.e. Projects Australia sees every day the impacts and benefits of such infrastructure and services for the Western Victorian community.

Thank you for the opportunity to show our support for this important step in Victoria's energy transformation and the preservation of strong local communities.

Yours sincerely

Fleur Yaxley

Managing Director



7 February 2023

To Whom It May Concern,

# RE: Support for Wimmera Southern Mallee & Western Victoria REZ transmission upgrades

I write on behalf of ESCO Pacific in support of the **Wimmera Southern Mallee &** Western Victoria REZ transmission upgrades.

The Victorian Government has committed to the development of its Renewable Energy Zones (REZs) as part of the State's commitments to achieve lower carbon environment. The REZs will allow new renewable energy projects, achieving better energy affordability and reliability outcomes for consumers, and furthering regional economic development goals. There are six REZs identified of which Western Victoria is one. This presents an incredible opportunity for the Western region of Victoria.

The WSM region, and the whole of western Victoria, has significant and reliable wind and solar resources. The Western Victoria REZ region has more than 700 MW of solar generation projects and 2.3 GW of wind generation projects in the pipeline. There are significant economic, social and environmental benefits that come from these projects.

Despite the designation of three REZs in western Victoria, and the significant interest and resources to support investment in renewable energy projects in the WSM region, there is a critical problem. Existing capacity constraints in Victoria's energy grid mean that Victoria's transition to renewable energy is being seriously constrained.

Just like the rest of Australia, transmission infrastructure in the region has not kept pace with the new energy generation and storage projects coming online. There is limited transmission capacity for additional new electricity being generated to make its way into the grid. This is not just an issue for new generation, but it is preventing existing industry from electrifying and expanding their businesses as well as discouraging new investment into the region.

Increasing transmission grid capacity into the WSM region is the only way to realise the maximum potential benefit from renewable energy generation. Of all the regions in Victoria, WSM has the best alignment of community support, policy support, and economic opportunity.

The potential benefits available from an upgrade at 500kV with a route that goes west, through Bulgana and connects into Sydenham, will address present and future grid capacity issues while accelerating investment, extending project diversity, growing job opportunities, and building social license with surrounding communities.

ESCO Pacific sees every day the impacts and benefits of such infrastructure and services for the Western Victorian community.

phone +61 3 8595 2406 email info@escopacific.com.au website www.escopacific.com.au



Thank you for the opportunity to show our support for this important step in Victoria's energy transformation and the preservation of strong local communities.

Yours sincerely

Rhiannon Olle Head of Development

#### 10 February 2023



Administration Centre

PO Box 250 92 Nelson Street Nhill VIC 3418 Ph: (03) 5391 4444 Fax: (03) 5391 1376

email: info@hindmarsh.vic.gov.au

website: www.hindmarsh.vic.gov.au

ABN 26 550 541 746

Customer Service Centres

Jeparit 10 Roy Street JEPARIT VIC 3423 Ph: (03) 5391 4450 Fax: (03) 5397 2263

#### Dimboola

101 Lloyd Street DIMBOOLA VIC 3414 Ph: (03) 5391 4452 Fax: (03) 5389 1734

Rainbow

15 Federal Street RAINBOW VIC 3424 Ph: (03) 5391 4451 Fax: (03) 5395 1436 Chris Sounness Chief Executive Officer Wimmera Development Association Federation University Campus Level 1, Building C 289 Baillie Street HORSHAM VIC 3400

**Dear Chris** 

# Re: Support for Wimmera Southern Mallee & Western Victoria REZ transmission upgrades

I write on behalf of Hindmarsh Shire Council in support of the Wimmera Southern Mallee & Western Victoria REZ transmission upgrades.

The Victorian Government has committed to the development of its Renewable Energy Zones (REZs) as part of the State's commitments to achieve lower carbon emissions. The REZs will allow new renewable energy projects, achieving better energy affordability and reliability outcomes for consumers, and furthering regional economic development goals. There are six REZs identified of which Western Victoria is one.

This presents an incredible opportunity for the Western region of Victoria. The WSM region, and the whole of western Victoria, has significant and reliable wind and solar resources. The Western Victoria REZ region has more than 700 MW of solar generation projects and 2.3 GW of wind generation projects in the pipeline. There are significant economic, social and environmental benefits that will come from these projects.

Despite the designation of three REZs in western Victoria, and the significant interest and resources to support investment in renewable energy projects in the WSM region, there is a critical problem. Existing capacity constraints in Victoria's energy grid mean that Victoria's transition to renewable energy is being seriously constricted.

Just like the rest of Australia, transmission infrastructure in the region has not kept pace with the new energy generation and storage projects coming online. There is limited, if any transmission capacity, for new electricity being generated to make its way into the grid. This is not just an issue for new generation, but it is preventing existing industry from electrifying and expanding their businesses as well as discouraging new investment into the region.

Increasing transmission grid capacity into the WSM region is the only way to realise the maximum potential benefit from renewable energy generation. Of all the regions in Victoria, WSM has the best alignment of community support, policy support, and economic opportunity.

The potential benefits available from an upgrade at 500kV with a route that goes west, through Bulgana and connects into Sydenham, will address present and future grid capacity issues while accelerating investment, extending project diversity, growing job opportunities and building social licence with surrounding communities.

Our Council sees every day the impacts and benefits of such infrastructure and services for the Western Victorian community.

Thank you for the opportunity to show our support for this important step in Victoria's energy transformation and the preservation of strong local communities.

Yours sincerely

Greg Wood Chief Executive Officer



10 February 2023

Wimmera Development Association

Att. Chris Sounness

#### RE: Support for Wimmera Southern Mallee & Western Victoria REZ transmission upgrades

#### Dear Chris

I write on behalf of Horsham Rural City Council in support of the **Wimmera Southern Mallee &** Western Victoria REZ transmission upgrades.

The Victorian Government has committed to the development of its Renewable Energy Zones (REZs) as part of the State's commitments to achieve lower carbon emissions. The REZs will allow new renewable energy projects, achieving better energy affordability and reliability outcomes for consumers, and furthering regional economic development goals. There are six REZs identified of which Western Victoria is one.

This presents an incredible opportunity for the Western region of Victoria.

The WSM region, and the whole of western Victoria, has significant and reliable wind and solar resources. The Western Victoria REZ region has more than 700 MW of solar generation projects and 2.3 GW of wind generation projects in the pipeline. There are significant economic, social and environmental benefits that will come from these projects.

Despite the designation of three REZs in western Victoria, and the significant interest and resources to support investment in renewable energy projects in the WSM region, there is a critical problem. Existing capacity constraints in Victoria's energy grid mean that Victoria's transition to renewable energy is being seriously constricted.

Just like the rest of Australia, transmission infrastructure in the region has not kept pace with the new energy generation and storage projects coming online. There is limited, if any transmission capacity, for new electricity being generated to make its way into the grid. This is not just an issue for new generation, but it is preventing existing industry from electrifying and expanding their businesses as well as discouraging new investment into the region.

Increasing transmission grid capacity into the WSM region is the only way to realise the maximum potential benefit from renewable energy generation. Of all the regions in Victoria, WSM has the best alignment of community support, policy support, and economic opportunity.

The potential benefits available from an upgrade at 500kV with a route that goes west, through Bulgana and connects into Sydenham, will address present and future grid capacity issues while accelerating investment, extending project diversity, growing job opportunities and building social licence with surrounding communities.



Our Council sees every day the impacts and benefits of such infrastructure and services for the Western Victorian community.

Thank you for the opportunity to show our support for this important step in Victoria's energy transformation and the preservation of strong local communities.

Yours sincerely

SUNIL BHALLA Chief Executive Officer 8/2/2022 Ray Kingston 68 Phelans Rd Riachella 3385

#### RE: Support for Wimmera Southern Mallee & Western Victoria REZ transmission upgrades

Dear Chris, CEO, WDA

I write as a landholder, a long-time regional advocate and a farmer concerned about the impacts of climate change in support of the **Wimmera Southern Mallee & Western Victoria REZ transmission upgrades**.

The Victorian Government has committed to the development of its Renewable Energy Zones (REZs) as part of the State's commitments to achieve a lower carbon environment. The REZs will allow new renewable energy projects, achieving better energy affordability and reliability outcomes for consumers, and furthering regional economic development goals. There are six REZs identified of which Western Victoria is one.

This presents an incredible opportunity for the Western region of Victoria. The WSM region, and the whole of western Victoria, has significant and reliable wind and solar resources. The Western Victoria REZ region has more than 700 MW of solar generation projects and 2.3 GW of wind generation projects in the pipeline. There are significant economic, social and environmental benefits that come from these projects.

Despite the designation of three REZs in western Victoria, and the significant interest and resources to support investment in renewable energy projects in the WSM region, there is a critical problem. Existing capacity constraints in Victoria's energy grid mean that Victoria's transition to renewable energy is being seriously constrained.

Increasing transmission grid capacity into the WSM region is the only way to realise the maximum potential benefit from renewable energy generation. Of all the regions in Victoria, WSM has the best alignment of community support, policy support, and economic opportunity.

The potential benefits available from an upgrade at 500kV with a route that goes west, through Bulgana and connects into Sydenham, will address present and future grid capacity issues while accelerating investment, extending project diversity, growing job opportunities and building social licence with surrounding communities.

In the event of severe weather, disease or market fluctuations, leasing land for solar, wind or battery facilities would provide a sustainable revenue stream to augment agricultural and pastoral incomes.

Thank you for the opportunity to demonstrate our support for this important step in Victoria's energy transformation and the preservation of strong local communities.

Yours sincerely

**Ray Kingston** 

### **Hopefield Farm**

Tom Hamilton 107 Rabls Road Murtoa

To Whom It May Concern,

#### RE: Support Transmission Upgrade to Wimmera Southern Mallee & Western Victoria REZ

I am a Wimmera farmer and write on behalf of Hopefield Farm in support of the **Wimmera Southern** Mallee & Western Victoria REZ transmission upgrades.

I am confident that increasing transmission grid capacity into the Wimmera will maximise the benefit from renewable energy generation for the whole of Victoria. This Wimmera area has extensive community support, policy support, and economic opportunity for region and State collectively.

The Victorian Government has committed to the development of its Renewable Energy Zones (REZs) as part of the State's commitments to achieve lower carbon environment. The REZs will allow new renewable energy projects, achieving better energy affordability and reliability outcomes for consumers and furthering regional economic development goals.

This presents a great opportunity for the Wimmera, as part of western Victoria Renewable Energy Zones, where we have extensive and reliable wind and solar resources. The Western Victoria REZ region has more than 700 MW of solar generation projects and 2.3 GW of wind generation projects in the pipeline. There are significant economic, social and environmental benefits that come from these projects.

The critical challenge facing in western Victoria is not the great interest and resources to support investment in renewable energy projects in this part of the State, it is the current capacity constraints in Victoria's energy grid that seriously limits Victoria's transition to renewable energy.

The potential benefits available from an upgrade at 500kV with a west route, which goes through Bulgana and connects into Sydenham, will address present and future grid capacity issues while accelerating investment, extending project diversity, growing job opportunities and building social licence with surrounding communities.

The land lease for solar, wind or battery facilities provides a sustainable revenue stream to augment agricultural incomes, which supports primary producers through severe weather, disease or market fluctuations. While my farm is not leased for these facilities, I support the opportunity now and into the future for my family, farm business, community and region.

Thank you for this opportunity to share my support for this vital step in Victoria's energy transformation and the preservation of strong local communities.

Yours sincerely,

Tom Hamilton Director

10 February 2023



5 February 2023

to the Victorian State Government and AEMO

via Wimmera Development Association Federation University Campus Level 1, Building C 289 Baillie Street, Horsham VIC 3400

# **RE:** Support for Wimmera Southern Mallee & Western Victoria REZ transmission upgrades

Dear Sir / Madam,

I write on behalf of NewEn Australia Pty Ltd in support of the **Wimmera Southern Mallee & Western Victoria REZ transmission upgrades**.

The Victorian Government has committed to the development of its Renewable Energy Zones (REZs) as part of the State's commitments to achieve lower carbon environment. The REZs will allow new renewable energy projects, achieving better energy affordability and reliability outcomes for consumers, and furthering regional economic development goals. There are six REZs identified of which Western Victoria is one.

This presents an incredible opportunity for the Western region of Victoria. The WSM region, and the whole of western Victoria, has significant and reliable wind and solar resources. The Western Victoria REZ region has more than 700 MW of solar generation projects and 2.3 GW of wind generation projects in the pipeline. There are significant economic, social and environmental benefits that come from these projects.

Despite the designation of three REZs in western Victoria, and the significant interest and resources to support investment in renewable energy projects in the WSM region, there is a critical problem. Existing capacity constraints in Victoria's energy grid mean that Victoria's transition to renewable energy is being seriously constrained.

Just like the rest of Australia, transmission infrastructure in the region has not kept pace with the new energy generation and storage projects coming online. There is limited, if any transmission capacity, for new electricity being generated to make its way into the grid. This is not just an issue for new generation, but it is preventing existing industry from electrifying and expanding their businesses as well as discouraging new investment into the region.

Increasing transmission grid capacity into the WSM region is the only way to realize the maximum potential benefit from renewable energy generation. Of all the regions in Victoria, WSM has the best alignment of community support, policy support, and economic opportunity.

The potential benefits available from an upgrade at 500kV with a route that goes west, through Bulgana and connects into Sydenham, will address present and future grid capacity issues while accelerating investment, extending project diversity, growing job opportunities and building social licence with surrounding communities.

NewEn Australia believes that the impacts and benefits of such infrastructure and services will be substantial for the Western Victorian community.

Thank you for the opportunity to show our support for this important step in Victoria's energy transformation and the preservation of strong local communities.

Yours sincerely,

Ernst Weyhausen Director



PO Box 175 Horsham Vic 3400 Mobile: 0412 185 645

February 10<sup>th</sup> 2023

Mr Chris Sounness CEO Wimmera Development Association Ltd Email: <u>chris@wda.org.au</u>

#### RE: Support for Wimmera Southern Mallee & Western Victoria REZ transmission upgrades

Dear Chris,

I am writing on behalf of Northern Poultry Cluster in support of the Wimmera Southern Mallee and Western Victoria REZ transmission upgrades.

Northern Poultry Cluster was established "to enhance the long-term sustainability of poultry production, processing and value-adding in Northern Victoria, and to maximise the attractiveness of the region as a location for investment in sustainable and biologically secure poultry business operations".

Intensive animal industry restructuring and market trends over the past two decades have clearly favoured production, and other supply chain investment in the Wimmera Southern Mallee and Loddon region. Major locational issues such as biosecurity, access to feed grain, and lower urban development pressure have all led to intensive livestock operators seeking the security of investment which is offered by the Wimmera Southern Mallee's broadacre environments.

The poultry industry is one of few regional agribusiness sectors that have experienced sustained growth over the past 15-20 years, throughout drought, floods and economic crises. NPC stakeholders have increased their average annual direct regional economic contribution by around 10% per annum. Total direct and indirect annual contribution to the region exceeds \$1 billion in the production, processing, manufacturing, logistics and service sectors within the region. Capital investment by the industry has also been impressive over the decade, with more than \$300 million in new capital expenditure and infrastructure (including new pipelines providing water security).

We understand the Victorian Government has committed to the development of Renewable Energy Zones (REZs) as part of the State's undertaking to achieve a lower carbon environment. The REZs will allow new renewable energy projects, achieving better energy affordability and reliability outcomes for consumers, and furthering regional economic development goals. There are six REZs identified of which Western Victoria is one.

The REZ in Western Victoria presents an outstanding opportunity for Western Victoria to become a heartland for intensive livestock: Offering new diversification options for existing agribusinesses and biosecure locations for new operators.

Wimmera Southern Mallee (WSM) region, and the whole of western Victoria, has significant and reliable wind and solar resources. The Western Victoria REZ region has more than 700 MW of solar generation projects and 2.3 GW of wind generation projects in the pipeline. There are significant economic, social and environmental benefits that come from these projects.

Despite the designation of three REZs in western Victoria, and the significant interest and resources to support investment in renewable energy projects in the WSM region, there is a critical problem. Existing capacity constraints in Victoria's energy grid mean that Victoria's transition to renewable energy is being seriously constrained.

We believe that, similar to other parts of Australia, transmission infrastructure in WSM region has not kept pace with the new energy generation and storage projects coming online. There is limited, if any transmission capacity, for new electricity being generated to make its way into the grid. This is not just an issue for new generation, but it is preventing existing industry from electrifying and expanding their businesses as well as discouraging new investment into the region.

Increasing transmission grid capacity into the WSM region is the only way to realise the maximum potential benefit from renewable energy generation. Of all the regions in Victoria, WSM has the best alignment of community support, policy support, and economic opportunity.

Benefits to accrue from an upgrade at 500kV with a route that goes west, through Bulgana and connects into Sydenham, will address present and future grid capacity issues while accelerating investment, extending project diversity, growing job opportunities and building social licence with surrounding communities.

NPC is convinced that sustainable energy infrastructure and solutions will be a further major investment incentive in building on the region's comparative advantages for intensive livestock production.

We strongly support for this important step in Victoria's energy transformation and believe it will make a substantial contribution to Victoria's competitiveness in intensive livestock industries.

Yours sincerely

Wayne Street General Manager



08/02/2023

**Chris Sounness** 

CEO Wimmera Development Association

#### RE: Support for Wimmera Southern Mallee & Western Victoria REZ transmission upgrades

Dear Chris

I write on behalf of the Wimmera Southern Mallee community and as a farmer in support of the Wimmera Southern Mallee & Western Victoria REZ transmission upgrades.

The Victorian Government has committed to the development of its Renewable Energy Zones (REZs) as part of the State's commitments to achieve lower carbon environment. The REZs will allow new renewable energy projects, achieving better energy affordability and reliability outcomes for consumers, and furthering regional economic development goals. There are six REZs identified of which Western Victoria is one.

This presents an incredible opportunity for the Western region of Victoria. The WSM region, and the whole of western Victoria, has significant and reliable wind and solar resources. The Western Victoria REZ region has more than 700 MW of solar generation projects and 2.3 GW of wind generation projects in the pipeline. There are significant economic, social and environmental benefits that come from these projects.

Despite the designation of three REZs in western Victoria, and the significant interest and resources to support investment in renewable energy projects in the WSM region, there is a critical problem. Existing capacity constraints in Victoria's energy grid mean that Victoria's transition to renewable energy is being seriously constrained.

Increasing transmission grid capacity into the WSM region is the only way to realise the maximum potential benefit from renewable energy generation. Of all the regions in Victoria, WSM has the best alignment of community support, policy support, and economic opportunity.

The potential benefits available from an upgrade at 500kV with a route that goes west, through Bulgana and connects into Sydenham, will address present and future grid capacity issues while accelerating investment, extending project diversity, growing job opportunities and building social licence with surrounding communities.

In the event of severe weather, disease or market fluctuations, leasing land for solar, wind or battery facilities would provide a sustainable revenue stream to augment agricultural and pastoral incomes.

Thank you for the opportunity to demonstrate our support for this important step in Victoria's energy transformation and the preservation of strong local communities.

Yours sincerely Emelia Sudholz Horsham



Using clean energy & innovation to bring light to people's lives.

#### WestWind Energy Pty Ltd ABN 94 109 132 201 Office 4, Nexus Centre, 17 Goode Street Gisborne VIC 3437 Telephone: 03 5421 9999

10 February 2023

ATT : Mr. Chris Sounness Chief Executive Officer - Wimmera Development Association 289 Baillie Street HORSHAM VIC 3400

#### RE: Support for Wimmera Southern Mallee & Western Victoria REZ transmission upgrades

Dear Mr Sounness,

I write on behalf of WestWind Energy Pty Ltd in support of the Wimmera Southern Mallee & Western Victoria REZ transmission upgrades.

The Victorian Government has committed to the development of its Renewable Energy Zones (REZs) as part of the State's commitments to achieve a lower carbon environment. The REZs will allow new renewable energy projects, achieving better energy affordability and reliability outcomes for consumers, and furthering regional economic development goals. There are six REZs identified of which Western Victoria is one. This presents an incredible opportunity for the Western region of Victoria.

The WSM region, and the whole of western Victoria, has significant and reliable wind and solar resources. The Western Victoria REZ region has more than 700 MW of solar generation projects and 2.3 GW of wind generation projects in the pipeline. There are significant economic, social and environmental benefits that come from these projects.

Despite the designation of three REZs in western Victoria, and the significant interest and resources to support investment in renewable energy projects in the WSM region, there is a critical problem. Existing capacity constraints in Victoria's energy grid mean that Victoria's transition to renewable energy is being seriously constrained.

Just like the rest of Australia, transmission infrastructure in the region has not kept pace with the new energy generation and storage projects coming online or going through the development process. There is limited, if any transmission capacity, for new electricity being generated to make its way into the grid. This is not just an issue for new generation, but it is preventing existing industry from electrifying and expanding their businesses as well as discouraging new investment into the region.

Increasing transmission grid capacity into the WSM region is the only way to realise the maximum potential benefit from renewable energy generation. Of all the regions in Victoria, WSM has the best alignment of community support, policy support, natural resources and economic opportunity.

The potential benefits available from an upgrade to the proposed Western Renewables Link to 500kV all the way from Sydenham to Bulgana will address present and future grid capacity issues while accelerating investment, extending project diversity, growing job opportunities and building social

licence with surrounding communities. WestWind Energy Pty Ltd sees every day the positive impacts and benefits of such infrastructure and services for the Western Victorian community.

Thank you for the opportunity to show our support for this important step in Victoria's energy transformation and the preservation of strong local communities.

Yours sincerely,

Tobias Geiger Managing Director OFFICIAL



13 February 2023

Mr Chris Sounness Executive Director Wimmera Development Association Ltd BY EMAIL chris@wda.org.au

Dear Chris

# RE: Support for Wimmera Southern Mallee & Western Victoria REZ Transmission Upgrades

I write on behalf of the Wimmera Southern Mallee Regional Partnership (WSMRP) in support of the **Wimmera Southern Mallee & Western Victoria REZ transmission upgrades**.

The Victorian Government has committed to the development of its Renewable Energy Zones (REZs) as part of the State's commitment to achieve a lower carbon environment. The REZs will allow new renewable energy projects, achieving better energy af fordability and reliability outcomes for consumers, and furthering our regional economic development goals. There are six REZs identified of which Western Victoria is one. This presents an incredible opportunity for the Western regions of Victoria.

the Wimmera Southern Mallee (WSM) region, like the whole of Western Victoria, has very significant and reliable wind and solar resources. The Western Victoria REZ has more than 700 MW of solar generation projects and 2.3 GW of wind generation projects currently in the pipeline. There are very significant economic, social and environmental benefits that will come from these projects, including an estimated construction workforce of 1800 people in WSM alone – providing immediate economic flow-on benefits to regional businesses and our regional economy. While much of renewable energy being transported via an upgraded Western Victoria REZ transmission line will flow to Melbourne there are very significant opportunities for our regional communities to use some of this energy to power new opportunities in food and industrial manufacturing, as well as behind the meter community energy projects. Enabling the full potential for renewable energy generation in Western Victoria will also assist WSM in reaching its vision of net zero regional emissions by 2052.

However, despite the very significant investment pipeline of new renewable energy projects in the WSM region, we are only too aware that existing capacity constraints in Victoria's energy grid means Victoria's transition to renewable energy is being seriously constrained. This is a critical problem that must be urgently resolved.

Just like the rest of Australia, transmission infrastructure in this region has not kept pace with the new energy generation and storage projects coming online. There is limited, if any, current transmission capacity for new electricity being generated to make its way into the grid. This is not just an issue in enabling new generation, but it is preventing existing industry from





electrifying and expanding their businesses and is discouraging new business investment in the region.

Increasing transmission grid capacity in the WSM region is the only way to realise the maximum potential benefits from new and existing renewable energy generation. Of all the regions in Victoria, WSM has the best alignment of community support, policy support, and economic opportunity.

The potential benefits available from an upgrade of power transmission to 500kV through a transmission line that tracks southeast through the Bulgana wind energy precinct and connects into Sydenham in metropolitan Melbourne, will address present and future grid capacity issues, while accelerating regional investment, diversifying renewable power generation, growing new regional job opportunities and building social licence with surrounding communities. This upgraded transmission line is absolutely vital to the future of WSM.

The WSMRP welcomes the opportunity to express our strongest support for this most important and urgent step in Victoria's energy transformation and the building and preserving of strong local communities within WSM.

Yours Sincerely

Kendra Clegg A/Deputy Chair WSM Regional Partnership







10 February 2023

Chris Sounness 289 Baillie Street Horsham VIC 3400

# **RE: Support for Wimmera Southern Mallee & Western Victoria REZ transmission upgrades**

Dear Chris,

I write on behalf of West Wimmera Shire Council in support of the **Wimmera Southern Mallee & Western Victoria REZ transmission upgrades**.

The Victorian Government has committed to the development of its Renewable Energy Zones (REZs) as part of the State's commitments to achieve lower carbon emissions. The REZs will allow new renewable energy projects, achieving better energy affordability and reliability outcomes for consumers, and furthering regional economic development goals. There are six REZs identified of which Western Victoria is one.

This presents an incredible opportunity for the Western region of Victoria.

The WSM region, and the whole of western Victoria, has significant and reliable wind and solar resources. The Western Victoria REZ region has more than 700 MW of solar generation projects and 2.3 GW of wind generation projects in the pipeline. There are significant economic, social and environmental benefits that will come from these projects.

Despite the designation of three REZs in western Victoria, and the significant interest and resources to support investment in renewable energy projects in the WSM region, there is a critical problem. Existing capacity constraints in Victoria's energy grid mean that Victoria's transition to renewable energy is being seriously constricted.

Just like the rest of Australia, transmission infrastructure in the region has not kept pace with the new energy generation and storage projects coming online. There is limited, if any transmission capacity, for new electricity being generated to make its way into the grid. This is not just an issue for new generation, but it is preventing existing industry from electrifying and expanding their businesses as well as discouraging new investment into the region.



Increasing transmission grid capacity into the WSM region is the only way to realise the maximum potential benefit from renewable energy generation. Of all the regions in Victoria, WSM has the best alignment of community support, policy support, and economic opportunity.

The potential benefits available from an upgrade at 500kV with a route that goes west, through Bulgana and connects into Sydenham, will address present and future grid capacity issues while accelerating investment, extending project diversity, growing job opportunities and building social licence with surrounding communities.

Thank you for the opportunity to show our support for this important step in Victoria's energy transformation and the preservation of strong local communities.

Yours sincerely,

David Bezuidenhout, Chief Executive Officer



Providing a viable, sustainable, and vibrant future for the communities in Yarriambiack Shire

11 February 2023

Wimmera Development Association Chief Executive Officer Chris Sounness Federation University Campus Level 1, Building C 289 Baillie Street Horsham Vic 3400

Dear Chris,

#### <u>RE: Support for Wimmera Southern Mallee & Western Victoria REZ transmission</u> <u>upgrades</u>

I write on behalf of Yarriambiack Shire Council in support of the **Wimmera Southern Mallee** and Western Victoria REZ transmission upgrades.

The Victorian Government has committed to the development of its Renewable Energy Zones (REZs) as part of the State's commitments to achieve lower carbon emissions. The REZs will allow new renewable energy projects, achieving better energy affordability and reliability outcomes for consumers, and furthering regional economic development goals. There are six REZs identified of which Western Victoria is one.

This presents an incredible opportunity for the Western region of Victoria, which includes Yarriambiack Shire.

The Wimmera Southern Mallee (WSM) region, and the whole of Western Victoria, has significant and reliable wind and solar resources. The Western Victoria REZ region has more than 700 MW of solar generation projects and 2.3 GW of wind generation projects in the pipeline. There are significant economic, social and environmental benefits that will come from these projects.

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PO Box 243 Warracknabeal Vic 3393 Telephone: (03) 5398 0100 Freecall: 1800 065 647 info@yarriambiack.vic.gov.au www.yarriambiack.vic.gov.au



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The potential benefits available from an upgrade at 500kV with a route that goes west, through Bulgana and connects into Sydenham, will address present and future grid capacity issues while accelerating investment, extending project diversity, growing job opportunities and building social licence with surrounding communities.

Yarriambiack Shire sees every day the impacts and benefits of such infrastructure and services for the Western Victorian community.

Our Shire has potential for wind farm growth, with the Warracknabeal Energy Park in the planning phase and RWE Renewables exploring opportunities within our Shire. The establishment of such projects and the economic development benefits will not be realised without the investment into the 500kV route.

Thank you for the opportunity to show our support for this important step in Victoria's energy transformation and the preservation of strong local communities.

Yours sincerely

Tammy Smith Chief Executive Officer



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