

ISSUES PAPER

Renewable Energy & Agriculture in NSW

Review of the adequacy of the existing framework to manage issues and opportunities from the forecast growth in the renewable energy and agriculture sector in NSW.

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Renewable Energy & Agriculture in NSW

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Review of the adequacy of the existing framework to manage issues and opportunities from the forecast growth in the renewable energy and agriculture sectors in NSW.

On 8 March 2022, the NSW Minister for Energy and the NSW Minister for Agriculture and Western NSW announced a Task Force to review the framework for managing issues and opportunities from the forecast growth in the renewable energy and the agricultural sectors in NSW (the Review).

The renewable energy and agriculture sectors are both important to the State's prosperity and growth, and the Task Force has been asked to make recommendations (having regard to the [Terms of Reference](#)) on whether the existing framework for renewable energy could be improved to support the growth of both sectors. The Review will be led by the NSW Agriculture Commissioner, Mr Daryl Quinlivan.

The conversion of agricultural land for residential and industrial development and associated land use conflict has already been reviewed in the NSW Agriculture Commissioner's report [Improving the Prospects for Agriculture and Regional Australia in the NSW Planning System](#). It made several recommendations to improve the upfront consideration of agricultural interests, reduce land use conflicts and provide greater clarity and guidance on how potential impacts to agriculture are considered in the planning framework.

As part of that review, the potential for conflict from the use of agricultural land for the development of large-scale renewable energy facilities was raised.

The NSW population is growing, with increasing demands for food and fibre production, housing, industrial development, energy, and public infrastructure. These different sources of economic development represent significant opportunities for the State, but typically require different patterns of land use and can be a source of land use conflict.

The substantial and rapid investment in renewable energy infrastructure has the potential to support thousands of jobs and billions of dollars in investment. Nevertheless, this infrastructure does have the potential to create or exacerbate existing land use conflicts and impact the provision of services if not planned and managed appropriately.

Have your say

All parties involved in or, impacted by the development of the agricultural and or renewable energy sectors are invited to provide submissions.

The Task Force is now seeking written submissions based on the [Terms of Reference](#) and the questions in this paper which aim to focus on the main issues of the Review. Wherever possible, provide sufficient details about any specific examples, including the scale of the development or case studies which will help the Task Force understand the issue.

Submissions are due by 5pm Wednesday 11 May 2022 and should be emailed to agcommissioner@dpi.nsw.gov.au. For more information on how to have your say go to: www.dpi.nsw.gov.au/agriculture/lup.

How renewable energy is regulated in NSW

The [NSW Planning System](#) sets the framework for the assessment and approval of renewable energy developments, including solar and wind energy systems. Renewable energy development is permitted on any land zoned for a rural, industrial or special use.

To develop a renewable energy project in NSW, a proponent must lodge a development application that assesses the likely impacts of the development.

The assessment pathway for consideration of renewable energy proposals depends on the scale of the proposed developments, with larger scale developments, with a capital investment value of more than \$30 million being considered a [State Significant Development](#) (assessed by the Department of Planning and Environment (DPE) and determined by either the Minister for Planning or the Independent Planning Commission of NSW). Smaller scale proposals are typically assessed by the Local Council and determined by a Regional Planning Panel. The decision maker will consider the social, environmental, and economic impacts of a project in deciding whether it should be approved.

The NSW Government's [Large-Scale Solar Energy Guidelines](#) and [Wind Energy Guideline](#) provide guidance on key assessment issues and land use conflicts including impacts to visual amenity, impacts from noise and more. The Department of Planning and Environment recently sought submissions on an amended Large-Scale Solar Energy Guideline that seeks to address concerns about visual impacts and agricultural land use conflict. It will soon undertake consultation on a revised Wind Energy Guideline.

Electricity Infrastructure Roadmap

The NSW Government's [Electricity Infrastructure Roadmap](#) sets out a plan to encourage coordinated investment in new energy generation, storage and transmission infrastructure.

As part of the Roadmap, the NSW Government introduced [Renewable Energy Zones](#) (REZs) to expand transmission and energy generation capabilities in strategic areas in NSW

including the Central-West Orana, Illawarra, New England, South-West and Hunter-Central Coast regions. While the NSW Government will be encouraging development in the REZs, ongoing renewable energy development will continue to be required outside these areas to support a transition to clean energy.

The [Energy Corporation of NSW \(EnergyCo\)](#) is a NSW Government statutory authority responsible for overseeing the strategic planning and delivery of REZs in NSW. EnergyCo has a key role in leading engagement with communities, investors, and other regulators to coordinate investment in REZ infrastructure and ensure the zones are delivered in ways that support regional communities.

Agricultural growth and regional development

The \$20.9 billion NSW primary industries sector is a major contributor to the economic and social fabric of NSW. It supports the food security of Australia and our trading partners. NSW primary industries provide 86,000 direct jobs and a further 67,000 jobs in manufacturing.

Cleared agricultural land is often seen as suitable for renewable energy development. These developments can present opportunities for landholders, including increased self-sufficiency and additional income streams. However, with the amount of wind and solar energy generated in NSW more than doubling from 2015-2020, it is timely to consider how this growth and development will impact the agriculture sector and regional communities in the years to come.

Issues and opportunities for the agriculture sector and regional communities. Please tell us your views on:

The existing regulatory and policy framework

1. Do you have any comments on the current framework for applying for, assessing, and determining renewable energy projects?
2. Could the current planning framework more effectively consider the interests of the agriculture sector and regional economies, and if so how?
3. Do you believe there is adequate transparency in decision-making?
4. Does the planning process adequately manage or mitigate impacts and land use conflicts arising from renewable energy development?
5. Whether there is sufficient publicly available information about projects that have been approved, projects that are proceeding to development and projects that may be withdrawn?

Consultation

6. Do current community consultation and engagement processes for renewable energy developments and REZs provide sufficient opportunities for interested and affected parties to influence outcomes and make their views known? How could they be strengthened?
7. Is sufficient information available for communities to understand the factors that inform decision-making? If not, what additional information would be needed to effectively consider the interests of the agriculture sector and regional communities?
8. Are local councils sufficiently consulted about the REZs and opportunities for renewable energy development in their region?

Operation of renewable energy sites and infrastructure

9. Have you experienced disruptions to agriculture operations resulting from the construction or operation of a renewable energy development? If so, what was the nature and extent of this disruption and how was the issue rectified?
10. Has your agriculture production business benefited from the operation of a renewable energy development?
11. Are the compliance processes to manage approved impacts and/or potential conflicts once a project has been operationalised adequate?
12. The NSW government requires renewable energy projects to be decommissioned at the end of their operational life and the land returned to its pre-existing condition.

Are these requirements adequate in dealing with the decommissioning and rehabilitation of renewable energy developments? If not, where can it be strengthened?

Third party impacts

13. Does the planning system take potential impacts on communities and regional infrastructure and services into account sufficiently in assessing project proposals? If not, what more could be done within and separate from the consent process to do so?
14. Have you experienced or do you anticipate any disruption to local supply chains or access to infrastructure and services because of renewable energy development?
15. Apart from agriculture, what other sectors of the NSW regional economy are affected positively or negatively by the construction and/or operation of these facilities? Could you provide examples?

Compensation and benefit sharing

16. Are the compensation payments for hosting transmission infrastructure under the *Land Acquisition (Just Terms Compensation) Act 1991* sufficiently based on the loss of land value resulting from restrictions in land use options on easements?
17. Would it be beneficial for these payments to be made either up front or provided as an annual income stream, and should landowners be able to negotiate the form of this payment?
18. Landowners located close to renewable energy facilities have claimed that it has affected the value of surrounding properties and agricultural operations. Some landowners claim that they have been negatively impacted by these types of developments and others have claimed that these developments have driven up the cost of properties and insurance and priced out local communities from expanding their operations. Are you aware of any evidence to support these claims?
19. How do the direct and indirect benefits of the construction and operation of renewable generation facilities benefit regional communities?
20. Do you understand what the terms 'direct benefit' and 'indirect benefit' mean? If not, what information or term would make it easier to understand?
21. Is the way benefits are shared for the projects sufficiently clear? If not, which elements should be further clarified?
22. How could community benefit sharing programs be used to maximise benefits for local communities? What initiatives, programs or infrastructure could these programs focus on to help improve agricultural operations (e.g., access to improved mobile cell

coverage or mains power for processing) and quality of life for regional communities?

23. What would assist communities developing community energy projects in NSW?

Workforce availability

Many sectors of the NSW rural economy are experiencing challenges securing a workforce. Large scale development in regional areas has the potential to add to these challenges.

24. Are sufficiently skilled workers available in the regions where renewable energy development is occurring? And if not, which skills are or will be the ones incurring the greatest challenges? For these, what are the opportunities to grow and develop a regional skilled workforce?

25. Will any leakage across sectors because of these developments have a significant impact on the agriculture sector or other sectors of these regional economies?

26. If renewable energy projects have been established in your region, have you found that existing employment patterns in the community altered or stayed the same? If they have changed, how, and what was the impact on the community?

Land use change and coexistence

27. Rural communities have historically sought broader and more resilient economies. What contribution can energy generation activities, landholder lease payments, regional infrastructure investments and local supply chains make to the diversification of regional economies and individual farms and businesses operating in those regions?

28. Do you believe important agricultural land is no longer available due to renewable energy projects? If so, can you quantify the area and how this loss could have been reduced?

29. What opportunities exist to optimise the use of project sites and/or transmission easements and ensure the continued productivity of this land?

30. Are there alternative sites for these developments that warrant greater consideration? If so, please provide examples.

31. Are you aware of any renewable energy projects that have demonstrated successful coexistence of agricultural production and renewable energy developments (e.g., grazing under PV panels, PV on dams)?

32. What further opportunities exist to support effective co-existence of renewable energy developments and the agriculture sector in regional NSW? Are there any barriers currently inhibiting the effectiveness and achievement of this co-existence?

33. What opportunities do you see arising from developments in science and technology for the relationship between agriculture and renewable energy?
34. How could technology (e.g., AgTech; data collection, analysis and sharing; Artificial Intelligence; online tools and processes) facilitate the development of the agricultural renewable energy sector?

Local infrastructure and services

The NSW Government has identified that some regional communities have experienced a loss of younger generations who leave in search of work, training and tertiary education. However, other regional communities have experienced significant increases in migration from urban areas and other regions, which has placed increasing pressure on housing supply in these communities.

35. What challenges and opportunities do you believe regional communities will face from the growth of both the renewable energy and agriculture sectors?
36. In addition to the agricultural sector, what other sectors of the NSW regional economy have the potential to benefit from the opportunities associated with the investment in renewable energy development, regional infrastructure, and supply chains? What potential constraints (such as supply chains and housing supply) exist that could negatively affect these sectors? Please provide examples where possible.
37. Are there measures that the state or local governments could take to improve responsiveness to new housing demand in these communities in the short term?
38. What impacts are these projects having on local housing access during their construction phase when employment is at its highest?

Market signals, investments, and industry development

39. Is sufficient clarity provided on risks and potential mitigations to the development of renewable energy projects? What role could the NSW Government play to further de-risk investments and projects?
40. Are the interests of the various players within the renewable energy sector aligned (e.g., developers, investors and commercial operators, landowners, regional communities)? If not, what elements require alignment?
41. Do the current policies and frameworks provide sufficient clarity and market signals for businesses and investors to foster the development of the agricultural renewable energy sector? If not, how could they be improved?
42. How could the NSW Government ensure an attractive investment environment in this sector? Which methods would be most effective, and should the NSW Government prioritise?

- 43.** Are you aware of examples of cross-sector collaboration (e.g., between industry players, academia/research, or others) that could support the development of the renewable energy sector? What role could the NSW Government play in facilitating these collaborations?

Open questions

- 44.** Are you aware of examples (from other jurisdictions or from overseas) to facilitate, support and accelerate the renewable energy sector that could be applicable and of benefit to the NSW context? If so, please elaborate.
- 45.** Is there any other risk, barrier, or concern in relation to the development of the agricultural renewable energy sector that you would like to raise? If so, what role should the NSW Government play to mitigate these?
- 46.** Is there any other opportunity in relation to the development of the renewable energy or agricultural sectors that you would like to raise? If so, what role should the NSW Government play to facilitate these?