



AGL Energy Limited

T 02 9921 2999

F 02 9921 2552

agl.com.au

ABN: 74 115 061 375

Level 24, 200 George St

Sydney NSW 2000

Locked Bag 1837

St Leonards NSW 2065

Mr Daniel Westerman
CEO, Australian Energy Market Operator
By email: ISP@aemo.com.au

28 March 2022

AGL Response to 2022 Draft ISP Addendum

AGL Energy (**AGL**) welcomes the opportunity to comment on the Australian Energy Market Operator's (**AEMO**) addendum to the draft 2022 Integrated System Plan (**ISP**).

AGL is a leading integrated essential service provider, with a proud 184-year history of innovation and a passionate belief in progress – human and technological. We deliver 4.2 million gas, electricity, and telecommunications services to our residential, small, and large business, and wholesale customers across Australia. We operate Australia's largest electricity generation portfolio, with an operated generation capacity of 11,208 MW, which accounts for approximately 20% of the total generation capacity within Australia's National Electricity Market (**NEM**).

Transparency Review

AEMO's biannual ISP process is critically important to support the NEM's energy transition. The development of new infrastructure projects in a timely and coordinated fashion is necessary to support the replacement of aging plant with a mix of low-cost and low-emissions new generation. We strongly support AEMO's efforts to deliver the ISP in a manner that is necessarily comprehensive and has been undertaken in broad consultation with the industry and consumer representatives.

On 7 January 2022, the AER completed a transparency review of the ISP, highlighting some aspects of the draft ISP where better explanations of how inputs and assumptions contribute to draft ISP outcomes would improve transparency. We agree with that the AER's conclusion that while AEMO had adequately explained the majority of its inputs and assumptions, some aspects of the ISP would further benefit from additional explanation on how key inputs and assumptions contributed to headline ISP outcomes.

AEMO's addendum to the draft ISP helps provide the additional transparency requested by the AER. In particular, we support the further information provided by AEMO in the addendum regarding modelling assumptions and how approaches contributed to forecast closures of plant in the short-term.

Modelled basis for coal plant retirements

Following the release of the draft ISP in December 2021, considerable attention was directed towards the forecast reduction in generation volumes from brown and black coal, in particular the modelled outcomes relating to coal generation in the Step Change scenario. As a major issue for many stakeholders, we agree with the AER's assessment that the ISP would benefit from further information as to how AEMO derived the assumptions and inputs regarding the revenue adequacy of coal plants and how this has contributed to modelled coal plant retirements across each scenario.



AEMO's addendum to the ISP emphasised AEMO's preferred approach to utilise differing modelling methods across the ISP scenarios, which had been consulted upon previously with stakeholders. For the Progressive Change scenario, AEMO employed a 'revenue forecasting and least-cost hybrid retirement approach', which allowed coal closures to be brought forward prior to 2030 by considering the wholesale market profitability of each generator.

In contrast, the remaining three scenarios (Slow Change, Step Change, and Hydrogen Superpower) employed a 'pure least-cost' approach, where the retirement trajectory was modelled to optimise the condition of meeting a long-term carbon constraint, in priority of other market conditions such as generator revenues.

The effect of this is that while the Slow Change, Step Change, and Hydrogen Superpower scenarios meet respective long-term emissions reduction targets at lowest cost, these scenarios rely on new project developments and asset closures that are likely to be sub-economic, especially in the short-term.

Because they do not adequately weight actual short-term revenues, these scenarios predict transmission projects that are unlikely to meet the requirements of investment tests to meet expected economic benefits¹, new generation projects that are unlikely to meet investment thresholds to meet necessary returns, and closures of assets that maintain adequate revenues to remain in operation.

While all scenarios seek to maximise long-term benefits, only the Progressive Change scenario maximises economic benefits in the short-term, before ramping up to meet the longer-term carbon constraint following 2030. This reflects the view that while policies and other drivers to support the energy transition will strengthen in the future, the existing structure of the energy market and policies in the sector do not currently support the rapid closure of assets and rapid buildout of sub-economic transmission and new generation projects.

Using the ISP to inform policy direction for the sector

This data from the ISP should provide useful policy insights for policymakers and other stakeholders. Scenarios such as the Step Change that meet long-term carbon targets at lowest overall cost provide a compelling basis to develop additional policies to support the energy transition, and to address critical issues such as the orderly closure of thermal assets and 'missing benefits' problems for projects that are likely to provide substantial long-term benefits but are unable to meet thresholds for investment in the short-term.

However, we do not agree with assigning relatively strong weightings to planning scenarios that present sub-economic outcomes in the short-term without a clear policy direction from the government to that effect. Fast-tracking transmission is likely to have material impacts on a number of stakeholder groups, including energy customers, landholders, regional communities, and energy

¹ Several transmission projects have struggled to meet the requirements of the RIT-T despite being identified by AEMO as priority projects for the purposes of the ISP. In our view, resolving this 'missing benefits' problem for transmission projects may be assisted by stronger policy regarding the pace and transition of decarbonisation in the energy sector. At the same time, transmission projects have also significantly underestimated costs, which has also undermined the benefits case for these developments.



market participants. Such a decision requires complementary policies and structures to support the increased pace of change that some of the ISP scenarios describe.

Rather than accepting aspirational outcomes for the NEM as a *fait accompli*, the disconnect between short-term costs and long-term benefits for future NEM projects should be addressed through additional policies that further consider how costs will be fairly allocated and distributed across all parties, and especially on energy customers, who face the risk of increased cost of living pressures in the near term.

In the absence of these considerations, ISP outcomes are likely to produce higher costs for customers and challenges to reliability that may have the effect of slowing down the transition rather than providing a basis for the rapid acceleration that must occur to ensure the NEM meets its long-term net zero target.

The ISP would be further improved by AEMO highlighting these issues to the growing number of stakeholders that are interested in the ISP process. For example, where an input assumption underpins a certain scenario that is not based on any legislated policy, AEMO should articulate how this trajectory would need to be supported by the market in the absence of government policy drivers.

In addition, where a scenario is supported by many stakeholders but presents sub-economic outcomes in the short-term, AEMO should provide further detail of these outcomes for governments and stakeholders to consider the merits of incurring short-term costs, even though these may be substantial.

AGL deeply values the ISP as a whole of system plan that is essential to support the energy transition. However, we encourage AEMO to ensure key aspects of the modelling process are clear when framing the ISP. This will help to ensure that all stakeholders are more aware of the various considerations that underpin headline statements, and that specific details in certain scenarios are not overemphasised as likely outcomes for the market when those outcomes rely on substantial policy action in the future, no matter how likely stakeholders might predict that to be.

If you have any queries about this submission, please contact Aleks Smits (Senior Manager Policy) at asmits@agl.com.au.

Yours sincerely,

Elizabeth Molyneux

GM Policy & Markets Regulation, AGL Energy