

Level 11, 1 King William Street
Adelaide SA 5000
GPO Box 922
Adelaide SA 5001
tel: (08) 8213 3444
www.aer.gov.au

Our Ref: 14105323
Your Ref: ERC0339
Contact Officer: Chris Ridings
Contact Phone: 08 8213 3487

21 July 2022

Ms Anna Collyer
Chair – Australian Energy Market Commission
PO BOX A2449
SYDNEY SOUTH, NSW, 1235

Dear Ms Collyer

Essential system services and inertia in the NEM – AEMO/AEMC Joint Paper

The Australian Energy Regulator (**AER**) welcomes the opportunity to comment on the recent joint paper released by the Australian Energy Market Commission (**AEMC**) and the Australian Energy Market Operator (**AEMO**) regarding the reforms underway for the provision of essential system services in the National Electricity Market (**NEM**).

While the paper provides an update on the status of reforms underway, we note that this paper is linked to a recent rule change request submitted by the Australian Energy Council (**AEC**) proposing the implementation of an inertia spot market.

The AER has been closely involved with the development of essential system services reforms, both through the Post-NEM 2025 process, and ongoing work with the AEMC and AEMO. We acknowledge the importance of continuing to unbundle and, where feasible, implementing markets for the provision of these services. However, we urge caution when considering the timing of consultation for this rule change, noting the substantial amount of reform already underway and the desire to engage stakeholders as meaningfully as possible during consultation.

Procurement of inertia

We consider that the development of a spot market for inertia could result in efficiencies for service provision and dispatch, which could result in a reduction of costs for consumers. However, these potential benefits need to be weighed against:

- 1) the overlap with provision of existing services, particularly fast frequency response; and,
- 2) the cost and complexity of the development and implementation of a new spot market.

In evaluating the need for an inertia spot market, the AEMC and AEMO may wish to consider whether contracting for the provision of inertia poses a potential transitional solution. This option would allow for transitioning into a spot market framework, similar to the

arrangements for the provision of frequency control at the beginning of the NEM, before these services were co-optimised with energy. Additionally, as noted in the paper, the AEMC is currently consulting on the development of an Operational Security Mechanism (**OSM**) which may provide additionally flexibility in how these contracts are procured, scheduled, and dispatched.

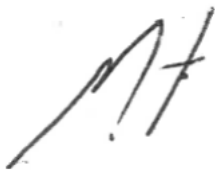
Aligning inertia and system strength planning and procurement

We consider that a more pressing reform to the provision of inertia involves harmonising the existing inertia shortfall and procurement framework with the updated system strength framework. Under the current inertia framework, AEMO must first declare an inertia gap in a region, then direct a Transmission Network Service Provider (**TNSP**) to procure services to meet that gap. This contrasts with the current system strength framework¹ which was updated in 2021 to involve more proactive forecasting and procurement of system strength services. We consider that harmonising these two frameworks is important as a likely procurement option for both system strength and inertia will be the use of synchronous condensers with the addition of flywheels to provide inertia. Under the current frameworks, a TNSP may procure a synchronous condenser to meet future system strength requirements with no or limited ability to include a flywheel for the future provision of inertia. At a later date, the TNSP may then be directed to provide inertia support where it may have no option but to procure new plant at a high cost. If the two frameworks were harmonised, the TNSP may then have the ability to include the flywheel (or the option for later augmentation) in its initial procurement at a lower overall cost.

While we understand that this is likely beyond the scope of what will be covered by the inertia rule change proposal, we consider that this is an example of a competing reform which may present more immediate or material benefits.

We thank the AEMC and AEMO for the opportunity to comment on this joint paper. If you have any questions about our submission, please contact Chris Ridings on 08 8213 3487.

Yours sincerely



Mark Feather
General Manager, Strategic Policy and Energy Systems Innovation
Australian Energy Regulator

¹ AEMC, *Efficient management of system strength in the NEM*, 2021:
<https://www.aemc.gov.au/rule-changes/efficient-management-system-strength-power-system>