Santos
GLNG

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Australian Energy Market Commission
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GPR0003: Pipeline Access Discussion Paper – East Coast Wholesale Gas Market and Pipeline Frameworks Review

GLNG Operations Pty Ltd (**GLNG**) welcomes the opportunity to provide the following submission on the Australian Energy Market Commission's (**AEMC**'s) supplementary Pipeline Access Discussion Paper, as part of the East Coast Wholesale Gas Market and Pipeline Frameworks Review.

1. INTRODUCTION

1.1. Context for this submission: AEMC's recommendation to adopt a mandatory auction of contracted but un-nominated capacity

The AEMC in the *Stage 2 Draft Report* has recommended that a mandatory "auction for contracted but un-nominated capacity with a regulated reserve price be introduced on all pipelines" (the **Auction Proposal**)[1] in order to provide a more transparent, efficient, competitively-priced and non-discriminatory means of access to un-nominated pipeline capacity.[2]

The AEMC initially acknowledged that it may not be appropriate to apply the Auction Proposal to pipelines that have been granted a "greenfields pipeline incentive" in the form of a 15-year no-coverage determination under Chapter 5 of the National Gas Law (**NGL**), pipelines that serve a single facility and pipelines that are not fully contracted.[3]

However the AEMC's Discussion Paper, which considers the Auction Proposal in detail, gives only brief consideration to the question of what pipelines should be subject to the Auction Proposal – it notes the possibility of exempting pipelines that serve a single facility or are not fully contracted, but does not confirm exemption of pipelines that are subject to no-

1 AEMC, *East Coast Wholesale Gas Market and Pipelines Frameworks Review, Stage 2 Draft Report*, December 2015, 4.2 (Recommendation 1: Auction for contracted but un-nominated capacity) page 53.

2 AEMC, *East Coast Wholesale Gas Market and Pipelines Frameworks Review, Stage 2 Draft Report*, December 2015, 4.2.1 (Rationale for recommendation) page 55-57; AEMC, *Pipeline Access Discussion Paper, East Coast Wholesale Gas Market and Pipelines Frameworks Review*, March 2016, 5.1 (Rationale for auction) page 42-43.

3 AEMC, East Coast *Wholesale Gas Market and Pipelines Frameworks Review, Stage 2 Draft Report*, December 2015, 4.2.4 (Design considerations) page 61-63.

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coverage determinations (noting its previous commitment to address the interaction of the Auction Proposal with "the existing regulatory coverage regime"[4]).

1.2. Summary of submission

GLNG is concerned by the AEMC's recommendation of the Auction Proposal, with respect to the potential to apply this to pipelines that are subject to no-coverage determinations or single facility or not fully contracted pipelines, and the currently potentially limited analysis of material policy and commercial issues associated with the Auction Proposal.

GLNG makes two submissions:

(a) That infrastructure that is the subject of a no-coverage determination under the NGL should not be subject to the Auction Proposal or any reforms implemented in relation to it. GLNG notes that AEMC raised this issue in its Draft Report but was silent on it in the Discussion Paper, which raises concern for GLNG.

(b) That pipeline and compressor infrastructure which is developed for the purpose of, or is dedicated to, servicing a single project should not be subject to the Auction Proposal or any reforms implemented in relation to it. GLNG recognises that AEMC has identified this rationale in its Discussion Paper, and GLNG makes observations to support this below.

An auction mechanism which did not exempt these categories of pipelines would materially deter efficient investment in pipelines and associated infrastructure, and disrupt substantial investments that have already been made in pipelines and the projects that depend on them.

However, exempting these categories of pipelines and infrastructure would promote the National Gas Objective and be consistent with the AEMC's terms of reference for the East Coast Wholesale Gas Market and Pipelines Framework Review.

2. THE GLNG PROJECT

2.1. Description of the GLNG Project

GLNG makes this submission on behalf of Santos GLNG Pty Ltd, PAPL (Downstream) Pty Limited, KGLNG Liquefaction Pty Ltd and Total GLNG Australia (each **Participants**).

The Participants and certain of their related bodies corporate (**GLNG Upstream Entities**) are developing the "Santos GLNG project" (**GLNG Project**), whereby coal seam gas (**CSG**) produced from gas fields (**Gas Fields**) held by the GLNG Upstream Entities and their joint venture partners is transported, along with gas purchased from third parties, over 400km to a two-train liquefied natural gas (**LNG**) facility on Curtis Island (**LNG Facility**) for liquefaction and export to international markets. The first shipment of LNG from the GLNG Project occurred in October 2015.

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[4] AEMC, *Pipeline Access Discussion Paper, East Coast Wholesale Gas Market and Pipelines Frameworks Review*, March 2016, chapter 6 (Implementing the auction) page 58.

The development of the GLNG Project involved substantial investment in pipeline and associated pipeline compression stations, including:

(a) the following major pipelines (which are supported by other, relatively more minor, laterals and other pipeline infrastructure):

 (i) the 420km GLNG gas transmission pipeline (**GLNG GTP**) which transports gas from the GLNG GTP inlet and various points along its route to the LNG Facility; the GLNG GTP is the subject of a no-coverage determination under the NGL;

 (ii) the 119km Comet Ridge to Wallumbilla Pipeline Loop (**CRWP Loop**), which connects the Gas Fields, the Participants' underground gas storage facility at Roma (**Roma Underground Gas Storage Facility**) and the hub located near the township of Wallumbilla (**Wallumbilla Gas Hub**) to the GLNG GTP; the CRWP Loop is the subject of a no-coverage determination under the NGL; and

 (iii) the 127km Comet Ridge to Wallumbilla Pipeline (**CRWP**), which follows a similar route to the CRWP Loop; and

(b) pipeline compression stations located at Wallumbilla, including the following compressor stations:

 (i) "WCS", which was developed and is wholly-owned by the Participants; and

 (ii) "WCS-3", which is owned by APA Group; the capacity in WCS-3 was underwritten by GLNG as the sole foundation customer.

This infrastructure is an integral part of the GLNG Project.

The Participants have appointed GLNG as the Operator of the infrastructure described above (excluding WCS-3).

2.2. Important features of the GLNG Project relevant to the Auction Proposal

Flexibility

Pipelines

Dedicated pipeline infrastructure plays a critical role in the GLNG Project, not solely in transporting gas to the LNG Facility, but also in providing critical operational flexibility.

The need for operational flexibility arises because for many wells in the Gas Fields, it is difficult to cease or turn down production at short notice without jeopardising future production. For example, this means that if there is a complete or partial shutdown at the LNG Facility, it is not possibly simply to "ramp down" gas production to match the extent of the shutdown.

Accordingly, it is critical that GLNG is able to maintain flexibility to manage gas supply and storage in real time, in order to support the GLNG Project. GLNG's dedicated pipeline infrastructure plays an essential role in this respect, as its capacity can be used both for transporting and storing gas. Indeed the purpose of this infrastructure is to support the GLNG Project, in order to enable the Project to deliver the LNG volumes committed under customer offtake agreements. The availability of pipeline capacity for both of these purposes is essential, in order to reduce the impact of any planned or unplanned reduction in demand for gas from the LNG Facility. Specifically, this capacity has provided and continues to provide the GLNG Project with the flexibility required:

(a) to accommodate variable gas supply requirements during the LNG Facility commissioning phase;

(b) to manage Gas Fields ramp up during the initial years of the LNG Facility operation; and

(c) to manage the GLNG Project in the event of planned or unplanned LNG Facility maintenance and other shutdowns, including prior to commissioning of Train 2.

Without these options, GLNG may need, in some instances, to flare upstream gas production in the Gas Fields or, to the extent possible, turn down gas wells. This would involve wasted production opportunities, and, ultimately, foregone sales.

The design, scale and configuration of the GLNG Project, including the infrastructure it relies on, reflects the Participants' decision to make substantial investments to deliver necessary operational flexibility, thereby limiting the potential for the lost production and sales that could be expected to be associated with a lower degree of operational flexibility.

If the Auction Proposal was applied to the pipeline infrastructure that is dedicated to serving the GLNG Project, this would materially interfere with the operational flexibility that this infrastructure provides to GLNG, and would materially disrupt the investment the Participants have made in this infrastructure in order to provide this flexibility.

The GLNG Project and associated infrastructure is not designed to accommodate a wide range of gas specifications

As described in GLNG's applications for no-coverage determination for the GLNG GTP and CRWP Loop, the LNG Facility, including contaminant removal units (ie acid gas removal units and mercury removal units), has been designed to receive gas with the average specification of the gas expected to be produced at the Gas Fields, being a much narrower gas specification than the range of specifications that can comply with AS 4564. The GLNG GTP and CRWP Loop similarly is not designed to transport the full range of gas that may comply with AS 4564 Australian Standard Specification for General Purpose Natural Gas (which is the general Australian Standard for gas used in most production processes).

In light of these narrower specifications, gas supplied to GLNG from outside the Gas Fields which does not meet these specifications requires careful management and blending as part of the operation of the GLNG Project. Pipelines that are subject to no-coverage determinations should be exempt from the Auction Proposal.

GLNG submits that pipelines that are the subject of a current "greenfields pipeline incentive" in the form of a no-coverage determination under the NGL should be exempt from the Auction Proposal and any reform implemented in relation to it.

3. THRESHOLD ISSUE: THE AUCTION PROPOSAL WOULD RAISE MATERIAL ISSUES OF SOVEREIGN RISK REGARDING INVESTMENT IN AUSTRALIAN INFRASTRUCTURE

The AEMC previously acknowledged that it would be important to consider whether the Auction Proposal should apply to pipeline infrastructure that is the subject of a no-coverage determination.[5] However the Discussion Paper makes no further reference to this critical issue.

The purpose of the regime for no-coverage determinations is to provide investors with confidence that infrastructure that qualifies for those incentives will not be subject to coverage under the NGL for a 15 year period (see discussion in part 3.1 below): this means the difference between the investor being able to make its own decisions about use and pricing of the infrastructure, and the investor having to cede those decisions to a regulatory regime. Accordingly, the availability of no-coverage determinations can be significant to the decision to invest in pipeline infrastructure, and this importance is reflected in the substantial time, cost and resources committed by GLNG in preparing detailed submissions for, and twice completing, the extensive process required to obtain a no-coverage determination from the Minister.

If applied to all pipelines, the AEMC's Auction Proposal would effectively revoke the benefits granted by a no-coverage determination, by mandating that the pipeline operator permit third parties to use the pipeline infrastructure at a regulated price. The Auction Proposal is precisely the type of access and price intervention and regulation which a no-coverage determination is intended to provide exemption and protection from such that application of the Auction Proposal is directly at odds with the stated purpose of a no-coverage determination. GLNG is concerned that a failure to explicitly exempt at the outset pipelines that are the subject of a no-coverage determination in any discussion of the Auction Proposal may suggest a lack of regard is being paid to the rights afforded by a no-coverage determination granted by the Minister under the NGL and the associated sovereign risk issues.

3.1. Inconsistency with the legislative intention underpinning the framework for no-coverage determinations under the NGL

The framework for granting "greenfields pipelines incentives" under the NGL, including no-coverage determinations, was introduced for the purpose of promoting investment in pipelines. It was designed to do this by providing regulatory certainty to investors that the pipeline capacity they invested in would not be subject to price or access regulation under the NGL for an introductory 15 year period, thereby encouraging efficient pipeline investments.

This rationale is clear from the relevant legislative history, where it was stated that incentives such as no-coverage determinations would "aid the development of a strong, interconnected

[5] AEMC, East Coast *Wholesale Gas Market and Pipelines Frameworks Review, Stage 2 Draft Report*, December 2015, 4.2.4 (Design considerations) page 61-63.

gas transmission network which is essential to the reliable supply of gas and improving competition in the gas market".[6] This rationale is also clear from the extensive public review processes that led to the adoption of the framework for no-coverage determinations. For example, in 2006, the Ministerial Council on Energy accepted the Productivity Commission's finding in 2004 that "greater certainty about the coverage status of a proposed pipeline would reduce regulatory risk ... and therefore encourage further investment".[7] The same benefit was recognised by the 2002 Council of Australian Governments' (**COAG**) "Parer Review" of Energy Market Directions, which considered that the introduction of 15-year coverage exemptions was an important means of "reducing regulatory uncertainty".[8]

The application of a regulated reserve price to capacity on pipelines the subject of a no-coverage determination would be inconsistent with the rationale underpinning the framework for greenfields incentives in general, and no-coverage determinations in particular. It would undermine the certainty that the no-coverage determination framework is designed to deliver to greenfields projects.

3.2. Applying the Auction Proposal to pipelines that are subject to no-coverage determinations would materially chill incentives for efficient investment in pipelines

The simple reason why the framework for no-coverage determinations promotes efficient investment is that it provides critical regulatory certainty to an investor in greenfields pipeline infrastructure that they will be able to determine to whom, and on what basis, access to pipeline capacity is provided for 15 years. Without this assurance, an investor faces significant uncertainty about the extent to which their investment will be available for their own use, and the extent to which, and price and other terms on which, they will be required to allow others to make use of their investment. In the face of the risks created by this uncertainty, a rational investor may limit the scope of their investment, or decide not to invest at all.

The Auction Proposal would re-introduce precisely these risks: it would mean that investors assessing a business case for investment in pipeline infrastructure, *particularly* in the context of pipelines developed to support a specific project such as the GLNG Project, would face significant uncertainty about the extent to which they would be able to use their own investment, and hence their ability to earn a return on that investment. Faced with this risk, AEMC should expect that the Auction Proposal would deter rather than promote efficient investments in pipelines such as those developed by GLNG which are currently subject to no-coverage determinations.

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6 Second reading speech to the Gas Pipelines Access (Greenfields Pipeline Incentives) Amendment Bill 2006 by Hon P.F. Conlon MP (11 May 2006, House of Assembly Hansard page 276). See also the Second Reading Speech for the National Gas (South Australia) Bill 2008, Hon. P.F. Conlon MP (9 April 2008, House of Assembly Hansard page 2891).

7 Ministerial Council on Energy, Final Decision on Review of the National Gas Pipelines Access Regime (May 2006) page 15; Productivity Commission, Review of the Gas Access Regime: Inquiry Report No. 31 (11 June 2004) page XXXIX-XL39.

8 Council of Australian Governments' Independent Review of Energy Market Directions (20 December 2002) page 211.

3.3. Applying the Auction Proposal to pipelines that are subject to no-coverage determinations would disrupt substantial investments that have already been made in pipelines that are subject to those determinations

The Participants have made substantial greenfields investments on the understanding that the GLNG Project would have the benefit of the no-coverage determinations, including the assurance of operational flexibility. GLNG's investment in capacity has been made for the entirely pro-competitive purpose of facilitating the efficient operation of the GLNG Project.

However if the Auction Proposal was implemented, capacity which was "contracted" to be used for the GLNG Project would be mandatorily made available at a regulated reserve price to third parties if it had not been "nominated" for use during a particular period. The consequences of such a mechanism could be material, particularly if it had the effect that:

(a) GLNG no longer had the pipeline capacity it required to achieve operational flexibility;

(b) GLNG was forced to manage pipeline capacity on a "nominated" or "day ahead" basis, rather than in real time; and/or

(c) off-specification third party gas outside the applicable design parameters entered the GTP pipeline, the CRWP Loop pipeline or the LNG Facility. The potential consequences of this were provided by GLNG to the NCC on a confidential basis as part of the applications for no-coverage determinations.

In these circumstances, the application of the Auction Proposal (or any reform implemented in relation to it) to the CRWP Loop and the GLNG GTP would materially disrupt the GLNG Project.

4. INFRASTRUCTURE DEVELOPED FOR THE PURPOSE OF SERVICING A SINGLE PROJECT SHOULD BE EXEMPT FROM THE AUCTION PROPOSAL

The Auction Proposal (or any reform implemented in relation to it) should not apply to pipelines or associated pipeline compressor infrastructure that was constructed or is operated for the purpose of servicing a single project or facility for the reasons that:

(a) none of the benefits which the AEMC has advanced for the Auction Proposal would be obtained by its application to such pipelines or compressor infrastructure; and

(b) applying the Auction Proposal to this infrastructure would materially disrupt the projects for which that infrastructure was developed.

4.1. The AEMC's stated rationale for recommending the Auction Proposal has no application to pipelines or associated compression infrastructure developed for the purpose of servicing a single project

The Auction Proposal is designed to address the AEMC's concern that high prices for contracted but un-nominated capacity, in conjunction with limited incentives to trade, "may be resulting in inefficient outcomes".[9] In particular, the AEMC's Discussion Paper emphasises the need "to improve the liquidity of gas trading at hubs, by promoting shorter-term trades in pipeline capacity".[10] These concerns have no relevance to pipelines or associated compression infrastructure that serve a single project.

The capacity of GLNG's pipeline and associated compression infrastructure is designed to accommodate the production capacity of the LNG Facility. GLNG's incentive is to maximise the efficient use of that infrastructure to maximise LNG production, which is not anti-competitive. GLNG has no incentive to withhold supply or engage in pricing behaviour which is inconsistent with the workably competitive market that the AEMC's recommendations endeavour to facilitate. Similarly, the Auction Proposal would not be likely to deliver any competitive or other market benefits insofar as it applied to GLNG's dedicated pipeline and compressor infrastructure, where the infrastructure has been developed to support the GLNG Project; it does not, for example, facilitate connections between trading hubs or domestic gas markets, and there is no basis to be concerned about "liquidity" in the trading of capacity on the infrastructure developed to support the GLNG Project.

Indeed, in the decisions to grant no-coverage determinations in respect of the CRWP Loop and GLNG GTP pipelines, the relevant Minister in each case was not satisfied that access to the pipelines would promote a material increase in competition within the meaning of section 15 of the NGL. The Minister concluded, in both decisions, that there would be little or insignificant incentives for GLNG to restrict LNG production or pipeline access.[11]

Accordingly, it is questionable whether there is likely to be any demand for use of any the infrastructure which supports the GLNG Project, and even if there was it is highly unlikely that the use of that infrastructure might achieve any benefits of the type sought to be achieved by the AEMC in recommending the Auction Proposal, or otherwise.

Accordingly, the rationale of the Auction Proposal is not applicable to pipelines or associated compression infrastructure that is dedicated to serving a single project.

4.2. Applying the Auction Proposal to infrastructure dedicated to a single facility would disrupt substantial investments that have already been made in that infrastructure, and hence in the GLNG Project

The Auction Proposal (or any reform implemented in relation to it) would materially disrupt the GLNG Project and the Participants' substantial investment in each of GLNG's pipelines and associated compression infrastructure.

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9 AEMC, *East Coast Wholesale Gas Market and Pipelines Frameworks Review, Stage 2 Draft Report*, December 2015, 4.2.1 (Rationale for auction) page 56.

10 AEMC, *Pipeline Access Discussion Paper, East Coast Wholesale Gas Market and Pipelines Frameworks Review*, March 2016, 5.1 (Rationale for auction) page 42.

11 Statement of Reasons of the Hon. Ian MacFarlane MP regarding the application by GLNG for a 15-year no-coverage determination concerning the CRWP Loop (26 May 2015) page 5; Statement of Reasons of the Hon. Gary Gray regarding the application by GLNG for a 15-year no-coverage determination concerning the GLNG GTP (20 June 2013) page 3.

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In making the investments in the pipeline compression stations relied on at the Wallumbilla Hub, GLNG has deliberately invested in reserve capacity based on an "N+1" approach (ie investment in a full or partial compression unit which is additional to the physical capacity that GLNG expects to be using to provide compression services at any one point in time).

This reserve capacity is not "spare" capacity, or capacity that ought logically be made available to third parties. Rather, investment in this reserve capacity plays an essential role in ensuring continuity of gas supply to the LNG Facility in the event that another compressor unit trips or requires maintenance. The availability of secure reserve capacity is therefore essential to both the short-term and long-term reliability of the overall transportation services which the GLNG Project requires and delivery of LNG cargoes within contracted windows.

However if the Auction Proposal was implemented, capacity which was "contracted" to be used for the GLNG Project would be mandatorily made available at a regulated reserve price to third parties if it had not been "nominated" for use during a particular period. The consequences of such a mechanism could be material with similar potential outcomes to section 3.4 plus in addition similarly with respect to pipeline compression stations.

5. ADOPTING GLNG'S SUBMISSIONS WOULD BE CONSISTENT WITH THE NATIONAL GAS OBJECTIVE AND THE AEMC'S TERMS OF REFERENCE FOR THIS REVIEW

In light of the analysis above, exempting pipelines that are subject to no-coverage determinations or are dedicated to a single project from the Auction Proposal would be consistent with the National Gas Objective and the AEMC's own objectives for its review by:

(a) promoting the National Gas Objective in section 23 of the NGL, by promoting the efficient investment in natural gas services; and

(b) strengthening signals and incentives for efficient investment in, access to, and use of pipeline capacity across Eastern Australia[12] as per Terms of Reference. The preservation of incentives for greenfields pipelines is consistent with this expectation and the broader COAG vision for Australia's gas market.

In contrast, applying the Auction Proposal to such pipelines would both frustrate the National Gas Objective, and be inconsistent with the Terms of Reference COAG has provided to the AEMC.

Yours sincerely

Rod Duke
Chief Executive Officer
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12 Page 3 (Signals and incentives for efficient access to and use of pipeline capacity).