

30 July 2021

Joshua Runciman
Australian Competition and Consumer Commission
ACCC LNG Netback Price Series Review Committee

(via email to: LNGnetbackreview@acc.gov.au)

LNG NETBACK PRICE SERIES DRAFT DECISION – CONFIDENTIAL SUBMISSION

Dear Sir,

GLNG Operations Pty Ltd (GLNG) supports ACCC's efforts to develop price series which reflect the opportunity cost to LNG producers supplying uncontracted gas into the domestic market. GLNG also welcomes the opportunity to provide comments on the ACCC's proposed approach to calculating the LNG netback price series as out lined in the draft decision.

GLNG generally supports the ACCC's draft decision for the LNG Netback Series. GLNG believes that it is appropriate for the ACCC to continue to publish the short-term LNG netback series and use the JKM forward curve adjusted by avoidable export costs as a benchmark for shorter term transactions.

ACCC's intention to further explore methods to develop a price benchmark for longer duration contracts is also supported. In this respect, GLNG endorses the recommendation from Wood Mackenzie that longer term Asian LNG contracts are typically based on oil indexation which should form the basis for any long-term series. Given the number of considerations required to develop a appropriate long-term netback price series, GLNG recommends that further industry consultation be conducted as the ACCC continues to advance this methodology.

Annexure A provides further more detailed responses to each of the specific questions raised in the ACCC draft decision.

Please contact Adam Stannard from GLNG via email at [REDACTED] or via telephone on [REDACTED]

Yours sincerely

[REDACTED]
Stephen Harty
Chief Executive Officer
GLNG Operations Pty Ltd

P: +61 7 3838 3000
F: +61 7 3838 3350
E: gln.secretariat@glng.com

GLNG Operations Pty Ltd
ACN 132 321 192

Santos Place
Level 22 / 32 Turbot Street
Brisbane Q 4000 Australia

GLNG is a Santos PETRONAS Total KOGAS venture.



ANNEXURE A

LNG NETBACK PRICE SERIES DRAFT DECISION GLNG RESPONSE – CONFIDENTIAL SUBMISSION

THE LENGTH OF THE FORWARD LNG NETBACK PRICE SERIES

1. Is the ACCC's draft decision to continue publishing a 2-year forward LNG netback price series appropriate? Should the ACCC continue to publish a 2-year forward LNG netback price series?

GLNG agrees it is appropriate for the ACCC to continue to publish a 2 year forward LNG netback series on the current JKM based calculation basis. It should however be noted that liquidity in JKM futures significantly reduces beyond 12 months as highlighted in the Woodmac "ACCC – LNG Netback Price Series Review – Preliminary Report" dated 24 June 2021, so there is the potential that its utility diminishes beyond 12 months.

2. Is the ACCC's draft decision to publish additional longer-term forward LNG netback prices appropriate? Should the ACCC publish additional longer-term forward LNG netback prices?

GLNG acknowledges the publishing of a longer-term forward LNG netback may be helpful to market participants. However, it is critical that it is reflective of the actual Asian LNG long term contract market and therefore should be based on an oil index as recommended in the Woodmac "ACCC – LNG Netback Price Series Review – Preliminary Report" dated 24 June 2021.

As confirmed in the 'Woodmac' report, a significant majority of LNG sales contracts into Asia continue to be based on a percentage of oil (typically using JCC). Determining the forecast of a slope that will be reflective of the forward contract market and potential long term LNG sales pricing from lean LNG sold from Queensland, will be complex. It is also important to note that

the pricing formula for longer term LNG also generally includes a constant in addition to the slope. Generally, this constant is a proxy for shipping costs.

There is potential for a longer term LNG netback series to be misleading to the market if it does not appropriately reflect an LNG producers alternative for long term LNG sales. GLNG recommends that further industry consultation be conducted as the ACCC further develops the methodology for this longer term LNG netback series.

3. Over what length of time should the ACCC publish additional longer-term forward LNG netback prices (such as 3 or 5 years)?

GLNG does not hold a strong view on the appropriate duration of a long term price series.

4. What other issues should be considered when publishing longer-term forward LNG netback prices.

Like the determination of the JKM LNG netback series, a longer term LNG netback series must represent the point of indifference for an LNG producer and, in particular a Queensland LNG producer, to execute a sales arrangement for gas into the domestic market verses a sale of LNG into the Asian market.

GLNG supports the recommendation that this be based on an oil index however the critical element will be the determination of the relevant percentage “slope” for that oil index. This slope should be reflective of longer term LNG contracts for supply into Asia and should include any premium expected for lean LNG of the type produced by the Queensland producers.

GLNG recommends that the relevant LNG markets to be considered include Japan, South Korea, China and Malaysia, which remain the main markets both on a spot and long term basis for Queensland LNG.

As discussed above, the LNG pricing formula for longer term LNG contracts also generally includes a constant in addition to the slope. This constant is a proxy for shipping costs. It will be important that any determination of a longer term LNG netback price

includes an assessment of this constant particularly in the case that shipping costs will be deducted in the calculation of the netback series.

In terms of the Queensland LNG producers where the liquefaction capital costs have already been sunk, a true point of indifference is only achieved where only variable costs are deducted in the same manner as the JKM netback series methodology. These variable costs are LNG shipping costs and plant fuel.

In considering the relevance of the longer term LNG netback series consideration should also be given to the additional flexibility and embedded optionality provided to Domestic buyers under the typical gas sales agreement, such as volume flexibility, extension rights, gas banking and alternate delivery points.

LNG PRICE MARKERS TO CALCULATE THE LNG NETBACK PRICE SERIES

5. Is the ACCC's draft decision to continue using JKM to publish historical and short-term forward LNG netback prices appropriate?

GLNG supports the ACCC's draft decision to continue to publish the historical and short-term forward LNG netback prices using the current methodology.

6. What is the minimum level of liquidity needed in JKM futures to extend the current forward LNG netback price beyond 2 years?

At a minimum, open market positions in JKM futures beyond 2 years should be similar to levels currently observed within the next 2 years.

7. Is the ACCC's draft decision to use prices in medium-term oil-linked LNG contracts to calculate additional longer-term forward LNG netback prices appropriate? Should the ACCC publish additional longer-term forward LNG netback prices based on oil-indexes?

To the extent the ACCC wishes to publish a longer term LNG netback series GLNG believes it should be based on an oil index.

8. Is the ACCC's draft decision to use consultant estimates of an appropriate percentage, or slope, of the oil price to calculate longer-term forward LNG netback prices appropriate?

As discussed above, determining an appropriate representative percentage of oil will be important as is a determination of an applicable and representative constant to ensure the index is not misleading. GLNG believes to calculate this percentage slope and relevant constant, it will be critical that the ACCC utilizes a recognised leading global LNG industry consultant. GLNG recommends that there be further industry consultation as the methodology matures prior to being finalized.

9. What other issues should be considered in calculating shorter and longer-term forward LNG netback prices?

GLNG believes that the key issues have already been identified within its response.

EXPORT COSTS DEDUCTED TO CALCULATE THE LNG NETBACK PRICE SERIES

10. Is the ACCC's draft decision to use the current approach to calculating forward LNG freight costs, for period up to 24 months, appropriate? Should the ACCC use an alternative approach?

GLNG supports the ACCC's current approach for determining the LNG freight costs for the near term JKM based netback series.

11. Is the ACCC's draft decision to use consultant estimates of longer-term forward LNG freight costs appropriate? Alternatively, should the ACCC
- (a) determine an indicative daily charter rate based on an estimate of the long-run marginal costs (LRMC) of building new LNG freight vessels
 - (b) estimate the extended forward LNG freight cost based on an average of the historical or short-term forward LNG freight costs, and how should the average period be determined
 - (c) estimate the extended forward LNG freight cost as a percentage of the extended forward LNG netback price, and how should that percentage amount be determined?

GLNG supports using consultant estimates for longer term LNG freight costs. It would be critical however that consultant used is a recognized leading global LNG industry consultant. It is likely that the consultant will forecast length and shortness in the shipping market and include that along with assessment of long-run marginal costs (LRMC) of building new LNG freight vessels as appropriate.

As an alternative however and as discussed above, long term LNG contract pricing generally includes a slope and a constant where the constant commonly is reflective of shipping costs, it may therefore be appropriate to simply assume both are equal and exclude both from the netback calculation where a representative constant is difficult to determine.

12. What other issues should be considered in estimating future LNG freight costs?

In determining the appropriate shipping costs for longer term LNG contracts consideration needs to be given to length and shortness in the market along with cost of new builds, as appropriate. As part of this assessment, it will be important to consider only vessels of a size that are appropriate for loading at the Queensland LNG terminals and offloading at the key Asian receiving terminals.

13. Is the ACCC's draft decision to use its current approach to deducting liquefaction costs to calculate additional longer-term forward LNG netback prices appropriate?

GLNG supports the ACCC's proposed approach where only variable costs are deducted for the longer term LNG netback price series. Like the near term JKM based netback series it is important that any longer term LNG netback series represent the point of indifference for a Queensland LNG producer. Therefore, sunk costs including original investments should not be considered as these would not be considered by a Queensland LNG producer in deciding whether to sell longer term into the domestic market versus a longer term LNG sale. In terms of the variable costs for liquefaction, these remain essentially plant fuel.

14. What other issues should be considered when estimating and deducting LNG liquefaction costs?

GLNG believes that the key issues have already been identified within its response.

15. Is the ACCC's draft decision to use its current approach to deducting pipeline transportation costs to calculate additional longer-term forward LNG netback prices appropriate?

GLNG highlights that its gas pipelines, that transport gas to its liquefaction plant, are essentially purely sunk capital costs with non-variable operating costs. Gas is produced from our fields as high pressure gas suitable for transporting to the LNG Plant but this pressure would need to be boosted in order to deliver this gas to the domestic market at Wallumbilla. GLNG believes

that any additional costs for transporting gas to the domestic market should be added to the LNG netback series to truly reflect the alternative to the Queensland LNG producers.

16. What other issues should be considered when deducting pipeline transportation costs?

As detailed in our response to Question 15, the LNG producer pipeline systems were primarily designed to deliver gas to the LNG plants and therefore there is likely to be additional compression fuel and costs required in order to deliver gas to the domestic market. There may also be physical restrictions to deliver gas to the domestic market.

REVIEWING THE LNG NETBACK PRICE SERIES IN 2024

17. Is the ACCC's draft decision to undertake another review of the LNG netback price series in 2024 appropriate?

GLNG believes it appropriate for the LNG netback series decision to be revisited in 2024. There could be substantial changes in the east coast market by 2024 with the potential for LNG import terminals which may significantly change the gas market landscape and the relevance of the LNG netback series.

Feedback is also sought on the preliminary report provided by Wood Mackenzie published on the inquiry webpage.

GLNG believes the Woodmac preliminary report, as we would have expected from an internationally respected consultancy with significant gas and LNG market experience, is a balanced and informative report. GLNG generally agrees with the Woodmac reports findings and recommendations.