

SUBMISSION BY NORTH WEST SHELF GAS PTY LTD TO THE WA INDEPENDENT GAS PIPELINES ACCESS REGULATOR REGARDING THE PROPOSED ACCESS ARRANGEMENT FOR THE DAMPIER TO BUNBURY NATURAL GAS PIPELINE.

1. Overview

North West Shelf Gas Pty Ltd (NWSG) is pleased to make the following submission to the Western Australian Independent Gas Pipelines Access Regulator (the Regulator) regarding the draft Access Arrangement (AA) for the Dampier to Bunbury Natural Gas Pipeline (DBNGP) proposed by Epic Energy (WA) Transmission Pty Ltd (Epic Energy).

NWSG acts as agent for the six North West Shelf Joint Venturers (NWSJVs) these being: Woodside Energy Ltd; Shell Development (Australia) Proprietary Limited; BP Developments Australia Pty Ltd; BHP Petroleum (North West Shelf) Pty Ltd; Chevron Australia Pty Ltd; and Japan Australia LNG (MIMI) Pty Ltd.

NWSG has contracts with Epic Energy to transport gas from the NWSJV plant near Dampier via the DBNGP to three of the NWSJVs' customers namely Edison Mission at Kwinana and Hamersley Iron (HI) and Robe River Iron (Robe) in the Pilbara. The NWSJVs each also sell gas to AlintaGas, Alcoa and Western Power who each arrange their own DBNGP transport requirements directly with Epic Energy.

We will restrict our comments to the following material areas. The absence of any comment on a particular aspect of the proposed AA should not be interpreted that NWSG agrees with or supports any aspect not commented on.

2. Tariff Structure

In the proposed AA, the Firm Service offered is for either forward haul or back haul. The same tariff rate and structure are proposed for either forward haul or back haul. All six gas producers will thus be able to ship gas at the same cost to any Delivery Point on the DBNGP. This arrangement appears to deliver a 'level playing field' for all six gas producers.

NWSG are legitimately concerned that as proposed, the AA tariff structure means that the NWSJVs will lose their present geographical advantage with respect to the cost of gas transport of the NWSJV plant being only about 9 km from HI's Delivery Point and about 22 km from Robe's Delivery Point. Notwithstanding this concern, NWSG is willing to support the zonal structure as we believe that it will help to provide 'level playing field' conditions which should promote effective gas producer on gas producer competition for the gas requirements of customers, both in the Pilbara and in the south west. NWSG's main objection in this area is that the cost of the part haul tariffs proposed for deliveries in Zone 1 is excessive ie the 'playing field' is too high in the Pilbara.

We note however that the 'level playing field' produced by the Inlet Zone structure in the DBNGP AA does not appear to extend to all gas producers who might seek to access gas customers served by the Goldfields Gas Transmission Pipeline (GGTP). This is a point of discrimination and a disadvantage to competition.

The zonal tariff structure appears to recognise (but does not reward) the fact that the operation of the first section of the DBNGP from the NWSJV plant to Compressor Station No. 1 (CS#1) relies upon the delivery of gas by the NWSJVs at a pressure around 8.2 to 8.48 MPa(g). In effect, the NWSJV plant compression is CS#0 for the DBNGP. Apache Energy delivers gas at much lower pressures around 6.5 to 7.0 MPa(g) into the suction of CS#1 whilst we understand that the Onslow area producers deliver gas at similar pressures to the NWSJV to the discharge of CS#2.

The high delivery pressure from the NWSJV plant requires considerable compression of the gas after treatment. This was reflected in the large amount of capital required to be invested by the NWSJV for compression and the ongoing use of significant quantities of fuel gas to drive the compression. Given that the NWSJV and Onslow area gas producers deliver gas at high pressure, it would seem unfair that the costs of CS#1 and CS#2 should add to the tariff barrier that will effectively prevent these gas producers from accessing the GGTP.

The five-part tariff structure has added a layer of complication that does not improve the transparency of the overall level of tariffs proposed.

The Gas Receipt Charge would appear to be designed to recover all of the overhead costs for the DBNGP and is levied uniformly upon all Shippers based on aggregate Maximum Daily Quantities (MDQs). From the very small amount of information on these costs provided in the AA documents, it is not possible to form a reasonable view on whether the proposed A\$0.0698 per GJ recovers or over-recovers these costs. In particular the split of overheads between Epic Energy's various pipelines is worth considering and the Regulator should determine what has been claimed for these other pipelines. We request that the Regulator satisfy himself that the costs are justified, are as low as reasonably practicable and that measures to reduce these costs are in place.

No information would appear to have been presented to justify why the Receipt Point Charge is levied on MDQs rather than actual quantities shipped. Some of the operating costs are likely to be variable although this is difficult to determine given the scarcity of information in the AA documents.

Basing the Gas Receipt Charge on MDQs (and it being payable in advance at the beginning of a month) also increases the fixed component of the overall tariff. Given that the capital base allows for working capital, the pre-payment of charges should be scrutinised to ensure that this does not have the effect of 'double dipping'.

The Pipeline Capacity Charge is proposed to be based on MDQs and payable monthly in advance. This is another fixed charge component of the tariff. The Compressor Capacity Charge is similar. The costs underlying some of these charges is likely to be variable depending on pipeline throughput eg maintenance of compressors is usually based on hours of operation and thus is likely to be dependent on overall pipeline throughput.

The overall fixed component charges based on MDQs (reservation charges) of the proposed pipeline tariff total A\$1.0302 per GJ for full haul to Zone 10. This represents about 95.4% of the total A\$1.08 per GJ tariff proposed. This is much higher than the approximately 72.8% of fixed tariff component currently paid under the Gas

Transmission Regulations 1994 (GTRs) or the later *Dampier to Bunbury Pipeline Regulations 1998* (DBPRs). The overall affect is to reduce the risk taken by Epic Energy in operating the DBNGP and to transfer that risk to Shippers. This is an inequitable proposal and would not seem to be reflected in the betas and other parameters used in calculating the Weighted Average Cost of Capital (WACC) for the DBNGP.

Two variable charges (commodity charges) are proposed. The first is a Compressor Fuel Charge which is proposed to be levied monthly in arrears based on a Shipper's actual throughput through a Zone. To apportion the costs on the basis of throughput seems reasonable. The charge is proposed to be based on forecast compressor fuel gas use rather than actual use. This proposed basis for the charge ignores the fact that actual fuel gas use at each compressor station is metered and therefore actual quantities will be known at the end of the month when invoices are sent out. Often a compressor station or stations are not run at all times, for instance it is understood that in 1999 CS#9 was hardly used and CS#10 is yet to be used at all. Compressors are routinely idled at low speed during pipeline upsets or low demand to minimise fuel use. At some compressor stations two machines of different sizes (and therefore different power and fuel consumption) are installed.

Indeed with the sophisticated information gathering systems Epic Energy has installed it might be possible for the daily gas usage of each Shipper to be apportioned to the actual fuel gas consumption of each compressor. In this way a Shipper who ships larger quantities in the DBNGP during a period of high demand would pay for the extra fuel gas that that event caused to be used, rather than having the fuel gas spread out across all Shippers over a month.

To have the Compressor Fuel Charge levied on forecast consumption levels will not encourage Epic Energy to operate the pipeline and the compressors in an efficient manner. It might be far better for this charge to be based on actual usage subject to a maximum cap which could be benchmarked against the lower of historical performance or an industry norm.

The last charge proposed is a Delivery Point Charge to be levied monthly in arrears based on a fixed A\$ per day amount. These Delivery Point Charges appear to only recover depreciation and return on capital for the specific Delivery Point facilities used by a Shipper (or Shippers where the Delivery Point is shared). No detail has been provided in the AA documents on the capital costs of the specific Delivery Point facilities at each Delivery Point, nor on the depreciation schedules for the specific facilities at each Delivery Point. As such, an interested party is unable to determine whether the proposed charges are reasonable. We request the Regulator to require Epic Energy to provide these details.

The cost of these Delivery Point Charges are very significant in the case of small users, comprising between 20% and 32% of the overall tariff in the case of some of NWSG's smaller customers. In attempting to put these charges as an 'extra' outside the A\$1.00 to A\$1.08 per GJ full haul charge, Epic Energy would appear to be attempting to maximise their tariff revenue whilst still appearing to maintain their position opposite the Government.

It is not clear whether the 'user specific' operating and maintenance costs currently paid by Shippers for Epic Energy to operate and maintain user specific delivery facilities will

still be paid under the proposed AA or whether these are included in the Gas Receipt Charge.

3. Delivery Zone 1A Tariffs

A comparison of existing tariffs for NWSG's customers in the Pilbara and those Delivery Zone 1A tariffs proposed in the AA are shown in the table below.

Charges	Hamersley Iron			Robe River Iron		
	Existing	Proposed		Existing	Proposed	
	c/GJ	c/GJ	increase	c/GJ	c/GJ	increase
Fixed	0.4858	9.782	20.1 times	1.1405	10.690	9.4 times
Variable	0.1817			0.4264		
Average	0.8294	13.049	15.7 times	2.0853	15.549	7.5 times

The existing tariffs shown are based on the current part haul rates under the A\$1.00 per GJ full haul tariff recently regulated in the DBPRs. Increases in average tariffs per GJ of the magnitude proposed are material, excessive and unfair.

NWSG as a Shipper of gas (and our customers HI and Robe) has a reasonable expectation that pipeline transportation tariffs in the Pilbara would fall under a regulated onshore gas transmission pipeline regime. This expectation was in line with the general expectations of the community that DBNGP tariffs would reduce by the year 2000 and would continue to reduce in real terms, as promised by the Government during the sale process for the DBNGP. The extremely large increases in part haul tariffs proposed in the AA are not in line with those reasonable expectations.

The proposed charges for Zone 1A delivery points comprise 100% fixed charges compared to the approximately 72.8% fixed capacity reservation charge and 27.2% variable commodity charge presently paid (based on 100% load factor). This is significant given the generally low load factors of HI and Robe and the relatively large seasonal swing between summer and winter. The net affect is to increase average cost per GJ transported. The change in tariff split also transfers risk away from Epic Energy to the customers and Shippers.

The daily Delivery Point Charge at each Delivery Point is proposed by Epic Energy to be split between Shippers in proportion to the use of that Delivery Point by the Shippers sharing that Delivery Point. In the Pilbara the HI and Robe Delivery Points are used by both NWSG who sell gas directly to HI and Robe for their own power generation requirements and Western Power who contract HI and Robe to generate power for Western Power's use in the region using gas supplied by Western Power.

Gas used by the HI and Robe power stations is apportioned between NWSG and Western Power according to the ratio of power sent out from each power station for the relevant mining company's own use and that used by Western Power's customers. This apportionment is done on an estimated use basis each month and then reconciled every three months once individual household and business electricity meters are read. On any particular day it is not possible to determine what the split of gas between NWSG

and Western Power may be. It is therefore not possible to determine how the Delivery Point Charge should be split on a daily basis.

Indeed in the event of either NWSG or Western Power having an actual overrun of their booked capacity (MDQ) at either the HI or Robe Delivery Points, it would not be possible to tell if this were the case because there is no way on the day to determine which Shipper was using the capacity. The same applies at Edison Mission at Kwinana, where the delivery point is shared by Western Power and NWSG and gas used is apportioned in a similar way based on sent out electricity.

From our recent discussions with HI, Robe and Western Power on these issues we know that these parties generally share our concerns about the proposed tariffs in the Pilbara to HI and Robe.

In summary, the part haul tariffs proposed for customers in the Pilbara are inequitable and unreasonable. Customers and Shippers in the Pilbara have a reasonable expectation that regulation of the DBNGP will result in a reduced pipeline transportation tariff, not enormous increases.

4. Pilbara Delivery Zone Structure

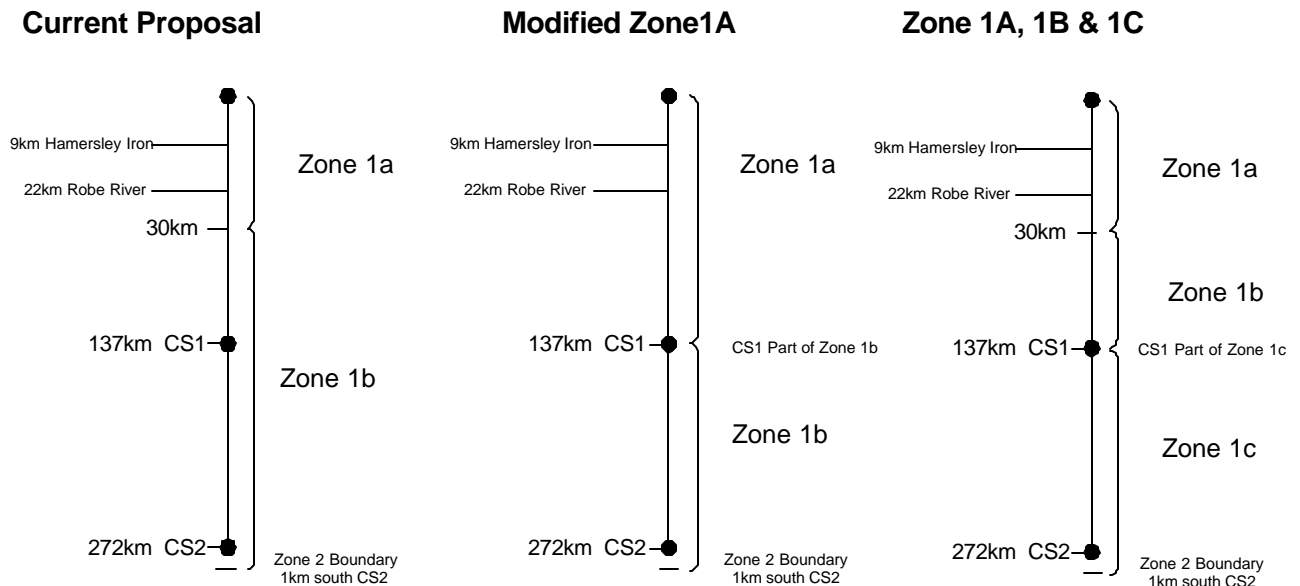
NWSG also supports the principle of back haul to Delivery Points in Zone 1 being the same cost as forward haul to Delivery Points in Zone 1. If back haul were to be offered at a lower cost than forward haul, it would destroy the 'level playing field' in favour of gas producers further south on the DBNGP. Such a situation would fail to recognise the role of the NWSJVs in developing the gas reserves of the north west shelf to underpin the construction of the DBNGP in the first place.

We are concerned that other gas producers would still have the ability to negotiate with Epic Energy to secure lower back haul tariffs (than the AA forward haul tariff) to customers in Zone 1A that are geographically close to the NWSJVs' plant. In this case the AA would have transformed NWSG's present geographical transport advantage to a transport disadvantage which would seem to be an inequitable outcome given the role of the NWSJV in establishing the DBNGP.

The length of Zone 1A is proposed to be 30 km. Given that the Delivery Points to Robe and Port Hedland are at about the 22 km mark, we cannot understand the rationale for the proposed boundary between Zone 1A and Zone 1B being at the 30 km mark other than it is stated in the AA documents that this is due to existing contractual arrangements. The tariff levels for a Delivery Point in Zone 1B are considerably higher than in Zone 1A and we would request that the Regulator determine the driver for the location of this boundary.

Indeed one could make a case that Zone 1A should extend to the suction of CS#1 so that all potential future loads such as those at Austeel's proposed iron to steel project near Cape Preston (at about the 70km mark) and a future connection from the DBNGP to the GGTP would be covered by Zone 1A. Alternatively, a third sub zone could be created such that Zone 1A covered up to the proposed 30km mark, Zone 1B covered the DBNGP from the 30 km mark to the suction of CS#1 and Zone 1C covered the remainder of Zone 1. These alternative arrangements proposed are shown in Figure 1 below.

Figure 1. Proposed Zone 1 Delivery Sub Zones



In this way the benefit and value of the compression and delivery pressure of the gas delivered by the NWSJV at the start of Zone 1A could be made available to future users and only those seeking a Delivery Point in Zone 1 south of CS#1 would pay for CS#1 and the pipe downstream of CS#1. Such a structure would also ensure lower priced access to the GGTP for the other four north west producers (including the NWSJVs) who unlike the Apache Energy operated East Spar JVs and Harriet JVs are not directly connected to the GGTP.

NWSG are concerned that the excessive proposed part haul tariffs in the Pilbara will add to the cost of energy both for mining companies and electricity producers and consumers. Future development of value adding (but energy intensive) secondary processing of iron ore may be inhibited by the increased cost of delivered gas. This is not consistent with the intention that the regulation of onshore gas transmission pipelines such as the DBNGP is intended to promote efficient and desirable outcomes for the national economy.

5. Goldfields Access

The proposed part haul tariffs in the Pilbara would seem to establish an 'even playing field' for all gas producers and customers in Zone 1. As stated above, NWSG has no in principle objection to such a concept provided that it is extended to allow equivalent access to other potential customers such as those in the Eastern Pilbara and Goldfields.

The GGTP originates very close to the suction of CS#1 on the DBNGP but at present there is no interconnection of the two pipelines available to third parties. The proposed

DBNGP AA does not provide for a Delivery Point from the DBNGP to the GGTP. We request that the Regulator require Epic Energy to make allowance for such a Delivery Point in the DBNGP AA.

The proposed part haul tariff to CS#1 in Zone 1B is approximately A\$0.2411 per GJ. Currently the forward part haul tariff to CS#1 is approximately A\$0.0979 per GJ so the part haul tariff is proposed to increase by 146%. The proposed part haul Zone 1B tariff will effectively continue to prevent access to the GGTP by producers other than Apache Energy (who are directly connected to the GGTP) by putting those other producers at a significant price handicap. The benefits of effective gas producer on gas producer competition will continue to be denied to customers located in the Goldfields. Further, the overall security of supply would be significantly reduced in the Goldfields.

The main reason for the significant increase in the cost of part haul to the suction of CS#1 would appear to be the inclusion of the costs of CS#1, CS#2 and the pipeline between these two compressors to the cost of part haul to the suction of CS#1. This situation is to the detriment of all gas producers who are not directly connected to the GGTP and ultimately to the detriment of gas consumers on the GGTP.

The only option for other producers would be to route gas to the Goldfields via a proposed, but yet to be built, pipeline east from Geraldton to Mount Margaret (the GEMM Pipeline). The feasibility or otherwise of the GEMM Pipeline depends very much on what happens with the current very high tariffs on the GGTP and thus the availability of this route to the Goldfields is far from certain. The GEMM would also be unlikely to provide an economic or competitive route to the Eastern Pilbara. The high A\$0.2411 per GJ part haul tariff to the suction of CS#1 is likely to act as a barrier to gas producers (other than Apache Energy) wishing to attempt to sell gas to customers serviced by the GGTP. In addition the proposed DBNGP part haul tariff to Geraldton of approximately A\$0.774 per GJ would be 'trapped' by the DBNGP, revenue leakage to the GGTP would be avoided and the revenue position of Epic Energy enhanced.

Whilst the aggregate tariff from the north west to the Goldfields via the GEMM route may ultimately be less than that for part haul to CS#1 and then down the GGTP, it will still not allow a 'level playing field' for all north west producers into the Goldfields as the Apache Energy operated fields are likely to continue to have a transportation price advantage via the direct GGTP route.

The most competitive outcome that will be of benefit to GGTP customers and Western Australia's economy is likely to be one where the Regulator ensures that the DBNGP tariff to CS#1 is kept as low as practicable in order to facilitate equitable access by all north west producers to the GGTP. To this end, we would repeat our suggestion that the Regulator require that Zone 1 to be divided into three delivery sub zones with the middle sub zone extending to the suction of CS#1.

6. Access to the Parmelia Pipeline

The tariff proposed to be charged for part haul to Mondara (where Shippers might choose to route their gas to the south west via the Parmelia Pipeline) is approximately A\$0.774 per GJ. DBNGP full haul tariffs to Zones 9 and 10 are proposed to be A\$1.00 per GJ and A\$1.08 per GJ respectively. The part haul tariff to Mondara effectively

precludes any DBNGP Shipper from routing gas via the Parmelia Pipeline. At the proposed A\$0.55 per GJ Parmelia Pipeline tariff, the aggregate full haul tariff would be A\$1.324 per GJ.

Thus the position of the DBNGP is retained and the benefits of pipeline on pipeline competition are effectively denied to Shippers, unless the owners of the Parmelia Pipeline are prepared to cut between A\$0.244 (44.4%) and A\$0.324 (58.9%) per GJ from their standard regulated tariff. The benefits (such as they may be) of using gas storage at Mondara or elsewhere in the Perth Basin may also be rendered uneconomic. This may have negative implications for overall development of the gas supply industry.

7. Full Haul Tariffs

The tariffs of A\$1.00 and A\$1.08 per GJ for transport are proposed for Zones 9 and 10 respectively. The boundary between Zone 9 and Zone 10 would appear to have been drawn in order to maximise the quantity of gas which is subject to the A\$1.08 per GJ tariff. Most of the industrial consumers of gas in the Kwinana area are south of the proposed Zone 9 to 10 boundary.

During the sale of the DBNGP, statements were made that “firm full haul (Dampier to Bunbury) tariff at 100 percent load factor will fall from A\$1.19 per GJ to A\$1.00 per GJ by the year 2000”.

It has been suggested by some that most of the Delivery Points in the Kwinana area downstream of Kwinana Junction are not in the Perth Metropolitan area. This does not concur with the Office of Energy publication “Understanding Gas Trading and Distribution Licences in Western Australia” which on page 7 states that the Kwinana local government area is to be considered part of the Perth Metropolitan area.

If a tariff distinction is to be made at all between Delivery Points in Zone 9 and Zone 10 then NWSG believe that the suction of CS#10 is a more logical point at which to locate the boundary of Zone 10, as it is those customers south of CS#10 who may benefit from this compressor and the pipe south of this point.

One could contend that it was the Government’s intention that the A\$1.00 per GJ tariff should be applied to all full haul customers including those south of the Perth Metropolitan region. Indeed the recently promulgated regulations for the period between 1 January 2000 and the start date of the new DBNGP AA have been set by the Minister at A\$1.00 per GJ full haul ie including Zone 10. To allow an 8% increase as a result of the AA would seem retrograde and unfair.

Customers in Zone 10 had a very real and reasonable expectation that full haul tariffs to their delivery points in 2000, would attract no more than a A\$1.00 per GJ tariff and would decrease in real terms thereafter. Indeed some, including Worsley Alumina (refer to their submission on the DBNGP AA) made significant investment decisions to expand their operations with the firm belief that full haul tariffs would be no more than A\$1.00 per GJ.

Our customer Edison Mission at Kwinana (who does not use CS#10) will be materially affected by the imposition of an extra 7.48% in the proposed AA tariff and NWSG’s

share of the A\$143.38 per day Delivery Point Charge which would result in approximately an extra transportation charges of about A\$270,000 per annum. The change in the proportion of fixed charges paid monthly in advance from 72.8% to 95.5% (at 100% load factor excluding the Delivery Point Charge) would have an impact on cash flows timings as well. In addition, extra penalty charges that are likely to arise from unavoidable variations in our customer's operation may add as much more again if the onerous A\$15 per GJ level penalty charges proposed were to be accepted.

In any case, we are confident that when a reasonable initial capital base in the range between Depreciated Actual Cost (DAC) and Depreciated Optimised Replacement Cost (DORC) and a reasonable WACC are used to determine the tariff that a full haul tariff of less than A\$1.00 per GJ can be obtained.

8. Type of Service Offered

The Firm Service proposed by Epic Energy as the only Standard Service is unlikely to be attractive to NWSG as a Shipper of gas in the DBNGP. We understand that this is likely to be the case for most other existing Shippers who have grandfathered transportation arrangements under either the GTRs or DBPRs. The Firm Service proposed in DBNGP AA would therefore appear to not satisfy the requirement of the *National Third Party Access Code for Natural Gas Pipeline Systems* (the Code) which include that the service provider offer a standard service which is likely to be required by a significant portion of users of the pipeline.

The T1, T2, T3 and AT3 Reference Services offered under the aforementioned Regulations were formulated after an extensive consultation process involving all stakeholders including NWSG in the Gas Transportation Consultative Committee (GTCC). As such the existing Reference Services represent a set of services which are tried and proven and which have been arrived at after considerable debate and detailed consideration of the legitimate requirements of all stakeholders. To replace these widely accepted services with the proposed Firm Service and a range of yet to be specified Non Reference Services would seem to be a retrograde step and a waste of the considerable time and resources spent by all parties during the GTCC process.

The submissions made by AlintaGas and Western Power on this issue have examined in some detail the differences between the existing T1, T2, T3 and AT3 Reference Services and the proposed Firm Service in the AA. NWSG are in broad agreement with the points raised by AlintaGas and Western Power on this issue and support their request that the Regulator require Epic Energy to modify the AA to offer a Standard Service or set of Standard Services for which the service elements are materially equivalent to the present GTR/DBPR Reference Services.

9. Capital Base

Epic Energy has used a value derived from the purchase price paid for the DBNGP as the capital base for the calculation of tariffs. This approach may not be consistent with the requirements of the Code wherein the Code states that the initial Capital Base should not normally fall outside the range of values given by the DAC and the DORC.

To justify their selection of the purchase price as the Initial Capital Base, Epic Energy appear to have relied upon section 8.10(j) of the Code where the use of the purchase price of 'assets' for determining the Initial Capital Base is referred to. If one notes that section 8.10(j) refers to 'assets' with a small 'a', it might therefore be suggested that the term 'asset' used in section 8.10(j) may not have been intended to cover the 'Pipeline' which is a defined term in the Code referring to the 'Pipeline' to be covered by the Code and the third party access arrangements. One could argue that the intent of section 8.10(j) is intended to refer to the recent acquisition (relative to the time of submission of the proposed AA) of pipeline 'assets' of different classes such as buildings, vehicles, compressors, laterals etc and was not intended to refer to the entire 'Pipeline' as defined in the Code.

Indeed the acceptance by the Regulator of a purchase price which is higher than the DORC as the basis for the Initial Capital Base would set a precedent outside of the normal regime of regulators in other Australian States. The logical consequence would mean that extremely high purchase prices would be paid for transmission assets as purchase price would be the basis for establishing tariffs. Epic Energy should be required to justify why the purchase price is a fair and reasonable basis for the Initial Capital Base. Customers and Shippers should not pay for the "winners curse". This is clearly demonstrated in that the purchase price paid by Epic Energy is understood to have been some A\$500 million higher than the next highest bid.

The values of DORC and DAC for the DGNBP have not been disclosed in the AA Information. NWSG supports AlintaGas's request of the Regulator that Epic Energy make available their estimates of DAC and DORC for the DBNGP. It is quite possible that the tariffs derived from a lower Initial Capital Base between DAC and DORC may be significantly lower than the A\$1.00 to A\$1.08 per GJ for full haul currently proposed by Epic Energy.

In the AA Information, the Capital Base is forecast to rise to A\$3,199 million by the end of 2004. We are very concerned about the implications of this rising Capital Base for pipeline gas transportation tariffs in the longer term. There would seem to be no assurance that tariffs will not rise significantly during the period of the second (or subsequent) revisions of the AA from 2005 onwards in order to allow the pipeline owner to earn a rate of return on the new higher capital base. At very best, in the situation where significant load growth does occur, the inflated Capital Base would mean that tariff would be maintained at the proposed levels for a considerable period (perhaps decades) before the depreciated Capital Base were to fall sufficiently to allow for a decrease in tariffs.

We request that the Regulator require Epic Energy to make available to all stakeholders Epic Energy's estimate of the values of DAC and DORC so that interested parties might form a view as to what the Initial Capital Base should be. We further request that the Regulator reject Epic Energy's proposed use of their purchase price of the DBNGP as the basis for the Initial Capital Base.

10. Rates of Return

The WACC proposed by Epic Energy for the DBNGP is a pre tax real rate of return of 8.5%. This is considerably higher than the 7.0 to 7.75% found reasonable by pipeline regulators in other Australian States and the 8.3% determined by the Regulator for the Parmelia Pipeline. There does not appear to be any substantive reason why the DBNGP has a higher risk profile than any other pipeline that might justify such a difference. In many ways the DBNGP has lower risks than many other Australian pipelines as it has six producers which deliver a very high level of gas availability. The reserves of the north west shelf region are world class and the largest in Australia. Other Australian pipelines transport gas from only one producer and the reserves of some of the more mature producing regions serviced by other Australian pipelines are limited and in decline. Furthermore, the DBNGP has a very high load factor compared to many other pipelines in the eastern States due to the largely blue chip industrial load base and relatively small seasonal load changes.

In calculating the value of WACC, Epic Energy has used values for each of the input values which are towards the upper end of the range that might be expected.

All of the above mentioned factors suggest that the risk level for the DBNGP is overstated in the AA Information and that the proposed value of the equity beta for the DBNGP of 1.15 is too high. A more realistic and accepted equity beta value of around 0.65 to 0.85 as widely used in other regulatory decisions for onshore gas transmission pipelines in the USA and Australia should be adopted.

Work undertaken by Professor R.R. Officer and Professor N. Hathaway (Melbourne University) tracking the long term average Market Risk Premium, suggests that the Market Risk Premium is 6%. Epic Energy has used 6.5%.

The cost of debt at 7.6% is much higher than accepted in previous determinations for regulated pipelines. The debt margin of 1.2% is much higher than has been allowed in previous regulated outcomes for onshore gas transmission pipelines. The work of the Office of the Regulator General of Victoria (ORGV) suggested that the cost of debt should be 0.75% to 1.0% higher than the risk free rate. The Commonwealth Bank, Westpac Bank and CSFB confirmed this opinion.

The proposed debt to equity ratio of 55 : 45 differs from other regulatory decisions where a ratio of 60 : 40 has been widely accepted as the optimum gearing ratio for most other regulated onshore gas transmission pipelines in Australia. A lower gearing ratio increases the WACC and Epic Energy have in our view not adequately demonstrated why such a lower gearing ratio should be allowed for the DBNGP.

The value of gamma proposed is 44% rather than the 50% widely used in other regulated outcomes for onshore gas transmission pipelines such as the work of ORGV.

The dividend payout ratio is 70% compared to the normal 50%.

The company taxation rate proposed to be used is 36% rather than the 30% which is most likely to be paid during the majority of the AA period (34% from 1 July 2000 and 30% from 1 July 2001) as a result of the Federal Government's proposed changes to the company taxation rate.

It would appear that in arriving at the proposed WACC for the DBNGP of 8.5% real pre tax that the input values to the calculation have been selected at values from the end of the range of values that would result in a higher final WACC output.

Overall the proposed WACC of 8.5% real pre tax is considerably higher than the 7.0% to 7.75% real pre tax found applicable to other regulated pipelines. We request that the Regulator determine a fair and reasonable WACC value for the DBNGP in line with that determined for other regulated onshore gas transmission pipelines.

11. Efficiency Incentive

The price path proposed by in the AA is for tariffs to be escalated at 67% of CPI rather than 100% CPI. The 33% reduction in CPI indexation appears to be designed to encourage Epic Energy to improve the efficiency of the operation of the pipeline as is required by the Code. NWSG note and commend Epic Energy for the improvements in the operation of the DBNGP that have been made since its acquisition. There would appear to still be many aspects of the pipelines operations that may be improved and to this end we are aware that Epic Energy has reorganised its operational personnel and now operates all its Australian pipelines from the one control room in Perth.

It would appear that a large proportion (95% plus) of the proposed tariff is based on fixed cost components designed to recover depreciation and return on capital assets and that only a small portion relates to overhead and variable operating cost. The effect of inflation is already allowed for in the WACC calculation of rate of return on the capital base. Thus for all tariff components to be indexed at 67% of CPI might represent some 'double dipping'. We request that the Regulator determine what proportion of the overall tariff is subject to inflationary pressures and to ensure that only this portion is indexed to CPI. In this case the proposed indexation factor of 67% may be appropriate to provide Epic Energy with an incentive to improve efficiency with respect to those portions of their operating costs.

12. Penalty Charges

The AA proposes a wide range of penalty charges all based on A\$15.00 per GJ. There is a concern that these are thinly disguised revenue raisers. Many of the proposed penalty charges appear unavoidable and at this very high level are unreasonable. Penalty charges should not be used as a source of punitive or extraordinary damages. The charges should only allow Epic Energy to recover their reasonable costs in accommodating the variations in pipeline use that give rise to the charges. It is concerning that the penalty charges proposed appear to seek to allow Epic Energy to profit from the necessary and unavoidable variations in operations of the customers' businesses.

The very high level of the penalty charges would appear to drive a Shipper to book an MDQ higher than really required for fear of incurring penalty charges. At the very least this will lead to higher average gas transportation costs, especially as 95% of the costs are fixed and payable on MDQ. In addition, overbooking may lead to inefficient economic outcomes if DBNGP capacity is prematurely 'sold out' preventing other

potential Shippers from accessing available capacity or to early and unjustified pipeline capacity expansion. Such a set of circumstances may also allow the pipeline owner to book more capacity than is really available in the knowledge that the aggregate booked capacity will likely never be used.

The proposed rebate structure for penalty charges and secondary market sales by Epic Energy would appear to simply distribute 40% of the rebate pool to the capital recovery account where it would be offset against Epic Energy's proposed inflated initial capital base and 15% paid directly to Epic Energy. This is in effect transferring most of the rebatable amounts to Epic Energy's benefit whilst giving the appearance that the pool is shared with those who paid the charges in the first place. As proposed, A\$2.25 per GJ of every penalty charge would flow to Epic Energy and A\$6.00 would be offset against the inflated DBNGP purchase price. This whole process would seem to be aimed at maximising revenues for the pipeliner.

13. Balancing and Overruns

The AA proposes that daily balancing within 2% will be required on a daily basis. This is much more onerous, and practically impossible to achieve, than the present 8% tolerance with balancing on a monthly basis, which is about the industry norm.

In addition, no authorised overruns are proposed to be allowed. This would appear to be aimed at stimulating activity in the proposed Secondary Market for pipeline capacity.

14. Gas Specification

The gas specification proposed for the DBNGP has a maximum inlet temperature of 50 degrees Celsius. This is not consistent with most of NWSJV's existing grandfathered contracts which specify a maximum of 60 degrees Celsius. Without significant modification to the NWSJV plant at very considerable cost, the NWSJVs will be unable to meet this reduced temperature specification in summer. We request that Epic Energy be required to modify the specification to allow a continuation of the existing temperature limit should NWSG or its customers choose to move to a AA based transportation arrangement.

15. Secondary Market

The AA documents do not provide sufficient detail to allow a reasonable assessment of the costs and practicalities of the proposed Secondary Market to be made. In particular the details on how full haul capacity entitlements might be translated into part haul entitlements to facilitate capacity trading are not explained in the AA.

There is a concern that Epic Energy propose to be both market organiser, participant and information broker / provider. It is difficult to see how these multiple roles are consistent with a well-informed and balanced market for daily pipeline capacity. In our view, if Epic Energy is to be involved as a trader in such a capacity market, then such a secondary market needs to be formed and organised by a third party and there be rules to allow for prompt distribution of information to all market participants. We request that

the Regulator review experience in other locations and that prior to approving such a secondary market, that the Regulator require Epic Energy to engage in thorough consultation with potential secondary market participants to discuss how such a market might operate.

16. Conclusion

On balance, whilst NWSG supports the overall zonal structure proposed, the AA is materially deficient and does not meet all the requirements of the Code. As such we would request that the Regulator not accept the AA in its current form.

In addition, the tariff proposed for part haul in the Pilbara and to the Mid West are unlikely to produce the competitive economic outcomes that should be expected from regulation of an onshore gas transmission pipeline.