Moomba to Adelaide Pipeline System: Standing price information

The Gas Transportation Agreement published on Epic's website contains standing terms for pipeline services on the Moomba to Adelaide Pipeline System (MAPS), including the standing prices for services.

The standing prices have been calculated using a methodology following a Cost-based approach. This methodology considers a number of inputs that are used to calculate a "revenue requirement" for each year. As the standing terms for pipeline services are for a 5-year term, a revenue requirement for a 5-year period is calculated. This revenue requirement is then divided by the forecast demand for a 5-year period, which gives a per GJ/day tariff.

Inputs used

Input	Description	Explanation
Indexation of the asset base	The value of the asset base has been calculated by applying the Recovered Capital Method defined in the Financial Reporting Guidelines for Non-Scheme Pipelines issued by the AER on 19 December 2017. The value has been calculated by: • Taking the value for the asset base as determined when the MAPS was previously regulated under an Access Arrangement by the ACCC in 2001-2005; • Rolling this forward using the Recovered Capital Method to 30 June 2023 • Rolling the asset base value forward for each of the years during the period 2024 to 2028. This includes the reduction of the asset base for return of capital included in the revenue requirement calculated for each year. To calculate the indexation, the value of the asset base in each of the relevant years has been indexed by forecast CPI.	The asset value used is disclosed in the Financial Reporting Template and is subject to annual Limited Assurance (ASAE 3000 Assurance Engagements Other than Audits or Reviews of Historical Financial Information). CPI used to calculate indexation is consistent with the midpoint RBA inflation target over the medium to long term.
Return on capital	The return on capital has been calculated as a benchmark weighted average of the return on equity and return on debt. This return is applied to the value of the asset base in each of	A number of inputs to the return on capital calculation are observable and by using the Sharpe-Linter Capital Asset Pricing Model

	the relevant years to give the return on capital. The return on equity has been calculated using the SLCAPM method applied by the AER as the foundation model for estimated return of equity. An equity beta of 1.0 has been applied, consistent with the MAPS being an unregulated pipeline subject to competition. The return on debt has been calculated using the method applied by the AER, which is to calculate the simple average of the Bloomberg and Reserve Bank of Australia fair value yields for the broad BBB credit rating band at a term to maturity of ten years. This cost has been averaged over a ten-year period ending in March 2023.	(SLCAPM) method it is possible to calculate and replicate the return on capital in any period.
Return of capital	Return of capital or depreciation has been calculated on a straight-line basis by rolling forward depreciation schedules from the 2001-2005 Access Arrangement updated for capital expenditure and disposals. The end of life for the MAPS has been maintained as 31 December 2052 consistent with the 2001-2005 Access Arrangement.	Return of capital is based on a profile consistent with the 2001-2005 Access Arrangement that has also been used as the starting point for the Recovered Capital Method calculation and disclosure.
Estimated cost of corporate income tax	A statutory income tax rate of 30% has been used. Tax losses and depreciation have been rolled forwards from the 2001-2005 access arrangement. A value for gamma of 0.4 has been used. This is consistent with the value the AER adopted at the time this methodology was created.	The income tax calculation incorporates depreciation consistent with the 2001-2005 Access Arrangement that has also been used as the starting point for the Recovered Capital Method calculation and disclosure.
Forecast operating expenditure	Forecast operating expenditure for the MAPS is used based on a long-term forecast.	The forecast operating expenditure is consistent with Epic's long term business plans and

		periodically reviewed and approved by its Board.
Forecast demand	Forecast demand for transportation services on the MAPS is used based on a long-term forecast.	The forecast demand for services is consistent with Epic's long term business plans and periodically reviewed and approved by its Board.

Calculations

For each period, a revenue requirement is calculated based on:

- Indexation of the asset base;
- Return of capital;
- Return on capital;
- Estimated cost of corporate income tax; and
- Forecast operating expenditure.

The revenue requirement is then smoothed over a 5-year period to match the tenor of the standing terms offered. This smoothed revenue requirement is divided by forecast demand, also smoothed over the same 5-year period, to derive a GJ/day tariff.

Results

This results in a fixed firm tariff for a five-year term of $0.8991 per GJ/day in $2023. Other tariffs have been calculated with reference to a premium or discount to this fixed firm tariff, as described in Standing Price Principles below.

The Service Provider considers that applying the Recovered Capital Method alongside this cost-based pricing methodology is consistent with pricing principles set out in the NGR including facilitating access to pipeline services on reasonable terms, which is taken to mean at prices on terms and conditions that, so far as practical, reflect the outcomes of a workably competitive market The application of this cost-based pricing methodology results in a tariffs that are reasonably consistent with current and historic prices as disclosed (noting that each contract disclosed may have different non-price terms including volume, tenor and flexibility).

Moomba to Adelaide Pipeline System- Standing Price Principles				
Pipeline Service	**Priority**	**Standing Terms[i]**	**Standing Price $2023**	**Methodology**
Firm Transportation	1	Clause 5.1	$0.8991/GJ/Day of Firm Service MDQ	Cost based approach has been utilised to determine the standing price for the Firm Transportation Service. Details of the methodology is outlined above.
Firm Bi-Directional	1	Clause 5.1	$0.4496/GJ/Day of Firm Bi-Directional MDQ	Standing price is calculated based on a discount to the Firm Transportation standing price reflecting a capacity reservation in both northern and southern directions. Firm Bi-Directional is an additional tariff on top of Firm Transportation as shipper have the flexibility to flow gas in both northerly and southerly direction. Standing price is discounted as shippers will not be flowing both directions simultaneously. Firm Transportation Tariff multiplied by Discount Factor Discount factor utilised is 50% representing a reduced utilisation of the alternate flow direction. ($0.8991 x 0.50 = $0.4496)
Non-Firm Bi-Directional	1[ii]	Clause 5.1	$0.5845/GJ	Standing price is calculated based on a premium to the Firm Bi-Directional standing price. The premium reflects the flexibility benefits available to shippers under this service as compared to take-or-pay services and the risk for Epic of not having certainty over revenues. Firm Bi-Directional Tariff multiplied by Premium Factor

				Premium factor utilised is 130% ($0.4496 x 1.30 = $0.5845)
As Available	2	Clause 5.2	$1.7982/GJ	Standing price is calculated based on a premium to the Firm Transportation standing price. The premium reflects the flexibility benefits available to shippers under this service and the firm nature of the product when scheduled as compared to take-or-pay services and the risk for Epic of not having certainty over revenues. Firm Transportation Tariff multiplied by Premium Factor Premium factor utilised is 200% ($0.8991 x 2.00 = $1.7982)
Interruptible	4	Clause 5.3	$1.1689	Standing price is calculated based on a premium to the Firm Transportation standing price. The premium reflects the flexibility benefits available to shippers under this service as compared to take-or-pay services and the risk for Epic of not having certainty over revenues but lower than as available as the service does not become firm. Firm Transportation Tariff multiplied by Premium Factor Premium factor utilised is 130% ($0.8991 x 1.30 = $1.1689)
Moomba to Adelaide Pipeline Laterals (Angaston and Iron Triangle)				
Firm Lateral	1	Clause 5.1	$0.3597/GJ/Day of Contracted Delivery	Standing price is calculated based on a discount to the Firm Transportation standing price and is based on negotiated outcomes.

			Point MDQ located on a Lateral	Revenue from the Firm Lateral charge is applied against the Firm Transportation Cost Based Approach. Firm Transportation Tariff multiplied by Discount Factor of firm transportation tariff. Discount factor utilised is 40% ($0.8991 x 0.40 = $0.3597)
Non-Firm Lateral	2	Clause 5.1	$0.4677/GJ	Standing price is calculated based on a premium to the Firm Lateral standing price. The premium reflects the flexibility benefits available to shippers under this service as compared to take-or-pay services and the risk for Epic of not having certainty over cash flows. Firm Lateral Tariff multiplied by Premium Factor Premium factor utilised is 130% ($0.3597 x 1.30 = $0.4677)
Moomba to Adelaide Pipeline Storage				
Firm Storage	1	Clause 6 or 17	$0.4496/GJ/Day of Firm MDQ	Standing price is calculated based on a discount to the Firm Transportation standing price and is based on negotiated outcomes. Revenue from the Firm Storage charge is applied against the Firm Transportation Cost Based Approach to reduce the Firm Transportation tariff. Firm Transportation Tariff multiplied by Discount Factor

				Discount factor utilised is 50% ($0.8991 x 0.50 = $0.4496)
Non-Firm Storage	2	Clause 17.4	$0.5845/GJ	Standing price is calculated based on a premium to the Firm Storage standing price. The premium reflects the flexibility benefits available to shippers under this service as compared to take-or-pay services and the risk for Epic of not having certainty over revenues. Firm Storage Tariff multiplied by Premium Factor Premium factor utilised is 130% ($0.4496 x 1.30 = $0.5845)

[i] Standing Terms for each pipeline service includes all the terms and conditions under the MAPS Gas Transportation Agreement. Standing Terms for each service are referenced by the MAPS GTA however must be read in conjunction with all terms of the MPAS GTA.
[ii] Non-Firm Bi-Directional is priority 1 subject to capacity being available after all Firm Bi-Directional receipts are scheduled.