

**Australian Competition and
Consumer Commission**

Northern Territory Electricity & Gas Review

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**“Competitive Issues Arising from the
Deregulation of the Territory’s
Electricity Market”**

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The ACCC role in electricity reform

The ACCC has taken a significant role in ensuring that electricity reform occurs in a competitive environment particularly through its authorisations of the National Electricity Code, its approval of the National Electricity Code as an access code, and its role as regulator of transmission revenues.

Authorisation of National Electricity Code

The ACCC authorised the National Electricity Code in December 1997, and accepted the access arrangements in the Code later in 1998. These approvals covered such matters as market trading arrangements, connection and access, revenue regulation and network pricing.

Since then the ACCC has played a lead role in examining and authorising National Electricity Code changes as a result of different reviews. Examples include the test for regulated interconnectors, proposed network pricing arrangements, and the current VoLL authorisation.

With its interest in promoting and monitoring competition, the ACCC also has advised governments, bidders and vendors in relation to mergers, acquisitions and privatisation of electricity assets. It has also taken an active role in monitoring market behaviour and market power issues.

Through the Code and other authorisations the ACCC has scrutinised transitional arrangements. These include State and Territory derogations from the Code to accommodate local conditions and interim pricing arrangements such as vesting contracts.

Although the Northern Territory for physical reasons will not participate in the NEM, the principles and mechanisms developed for the NEM and its Code provide a useful benchmark and framework for electricity reform in Australia.

Revenue regulation

Over the next few years the ACCC will become the regulator of transmission revenues for each of the network providers in the NEM. This will involve close examination of such issues as asset valuation, cost of capital, depreciation, operating and capital expenditure, as they relate to the commercial incentives of regulated networks.

In May 1999 the Commission released the *Draft Statement of Principles for the Regulation of Transmission Revenues*. This document sets out the ACCC's current thinking on key regulatory issues including:

- the valuation of the asset base;
- asset base roll forward;
- determination of the WACC; and
- design of an incentive regime.

In addition the ACCC has made important decisions in its determinations on the transmission revenues for TransGrid (NSW) and Energy Australian, and in its authorisation of aspects of the South Australian pricing order.

The ACCC is currently considering the proposed changes to network pricing which emerged from the review undertaken by NECA in 1998-99. Again this raises vital

issues such as who should pay for network services and how unregulated interconnectors should operate in the market.

The Commission is aware of the application by the NT Government to the NCC for a recommendation on the effectiveness of the Electricity Networks (Third Party Access) Code.

In examining the Government's submission, I believe that there are a number of lessons/experiences of the Commission that are relevant to the NT, which I will come to shortly.

The ACCC role in gas reform

Under the *Gas Pipelines Access Law* the Commission is the relevant regulator for access to services provided by transmission pipelines in all States and Territories except Western Australia. Access to services provided by distribution networks is regulated by independent State-based regulators, except in the Northern Territory, which has requested the ACCC to regulate both its transmission and distribution pipelines.

The National Third Party Access Code for Natural Gas Pipeline Systems (the Gas Code) establishes the rights and obligations of pipeline operators and users in relation to access to the transmission and distribution of natural gas. It is designed to achieve more economically efficient outcomes where there are monopoly pipeline facilities.

The Gas Access Regime aims to encourage the establishment of a uniform national framework for third party access to natural gas pipelines that:

- facilitates the development and operation of a national market for natural gas;
- prevents the abuse of monopoly power;
- promotes a competitive market for natural gas in which customers may choose suppliers, including producers, retailers and traders;
- provides a right of access to natural gas pipelines on conditions that are fair and reasonable for both Service Providers and Users; and
- provides for dispute resolution.

The ACCC has identified a number of factors that would be considered indicative of a market that encouraged trade in natural gas. These factors include:

- a significant increase in the number of customers;
- additional transportation options;
- gas storage facilities;
- the entry of brokers/aggregators;
- the development of substantial short term spot markets;
- the creation of gas related financial markets; and
- the entry of new competitive suppliers.

Having a competitive upstream sector is crucial to gas reform being successful. In the US gas market, for example, it was a highly diverse gas supply industry that really drove competitive reform of the entire industry. Once third party access to essential facilities was provided (critically to pipelines and distribution networks, as processing

facilities are typically run independently from gas exploration and production businesses), producers began vigorously competing to sell their gas and prices fell significantly and services improved. Brokers appeared who had no physical assets but provided an aggregation service. They grouped customers' demand to allow significant bulk discounts to be achieved or buy up and combine cheap small production quantities to create marketable parcels of gas.

Until Australia develops a more competitive upstream gas sector, many of the potential benefits from gas reform will either not be realised or will be captured by the upstream industry.

It is also important to note that jurisdiction over licensing for exploration and production of natural gas (on shore) is held by State Governments. Hence State and Territory government policy regarding production and exploration has a significant influence on the pace of upstream reform.

Northern Territory Electricity

Other speakers have provided more detail on the NT energy reforms but I will briefly recap what the ACCC sees as significant features of the energy market and areas the Commission is involved in.

Structural reform

PAWA will remain a vertically integrated public enterprise but with a more commercial focus and with certain functions (such as the networks, retail and power system operator) ring-fenced to separate monopoly elements from competitive activities.

Third party access to PAWA Networks

Under the access arrangements, third parties (such as new generators and retailers) will be able to use the existing network to trade their contracted electricity, on the basis of access agreements and network charges. The Utilities Commission will regulate these charges as well as service standards in accordance with the Network Access Code.

Progressive introduction of customer contestability

Customers will progressively have the right to choose their electricity supplier. Initially this will apply to large customers using 4 GWh or more but will eventually extend to customers using 750MWh per year (such as supermarkets, cold-stores and small hotels).

Limits on customer contestability

Contestability at this stage will extend to 750 MWh customers or above. We understand that the NT Government does not consider it feasible to have full retail contestability, and prefers to first observe experience in the States on the extension of choice of supplier to residential and small business customers.

In the Eastern states the jurisdictions are committed to open access for all customers by January 2001. While the Minister must review the NT arrangements before 30 June 2003, the Commission urges the Government to consider the competition and public benefits from contestability beyond the 750 MWh limit.

Downstream competition is vital to passing on to customers the benefits of competition derived from generation, and for providing the pressure for the regulated businesses to minimise tariffs charged.

Licensed entry of new retail suppliers

For the contestable customers, in addition to PAWA Retail, new retail suppliers will be licensed to enter the NT market and compete. Along with access and contestability, the Utilities Commission will undertake this licencing role.

Trading based on contracts and out-of-balance arrangements

Trading among suppliers and customers will principally be on the basis of contracts. There will not be a gross pool such as in the NEM but dispatch will be designed to take account of contract requirements. Excess generation or shortfalls will be managed by 'balancing' arrangements overseen by the Utilities Commission.

Northern Territory Gas

In the NT almost 100 per cent of gas consumption is used in electricity generation. In order to increase competition in the NT electricity industry, third party access to gas pipelines is crucial.

In 1999 the Commission settled an action with the NT Government over anti-competitive provisions of a gas transportation agreement with PAWA and Gasgo. The Commission believes this outcome is a step in the right direction towards ensuring third parties are given access to gas transportation on reasonable terms.

The ACCC is currently in the process of drafting its decision on the proposed Access Arrangement for the Amadeus Basin to Darwin Pipeline submitted by Northern Territory (NT) Gas.

The ACCC expects to release its Draft Decision by the end of April.

One of the key issues relevant to this Access Arrangement is the potential for future asset stranding, and how this should be incorporated into a five year regulatory decision. NT Gas have argued that Timor Sea gas prospects and the expiration of its foundation contract with PAWA may result in the pipeline being stranded in approximately ten years time. In order to recover its investment prior to this, NT Gas have proposed a 'kinked' depreciation schedule which accelerates depreciation of the pipeline over the next ten years. This proposal adds approximately \$1 per GJ to reference tariffs in the first regulatory period.

The ABDP Access Arrangement presents an interesting challenge to the ACCC – that is, assessing tariffs to apply over the next five years, where these tariffs are influenced by events which may or may not occur ten or twenty years from now.

Lessons and Challenges

The ACCC is well under way in its regulatory role and is currently in the process of assessing a number of access arrangements for several transmission systems. I would like to share with you some of the challenges we as regulators presently face.

Incentive Regulation

Incentive mechanisms should encourage efficiency while ensuring reasonable pass through of savings to users and should encourage revelation over time of actual costs.

The NEC mandates and the National Gas Code recommends that the Commission use CPI-X regulation, or some incentive based variant of CPI –X. Under CPI-X the revenue cap set for each regulated Service Provider will increase each year in line with general price increases (as measured by CPI) and be offset each year by the X factor, an efficiency factor determined by the Commission.

The incentive facing the regulated Service Provider is the drive to increasing efficiency beyond the X factor, so that it can retain the higher level of profits for the remainder of the regulatory period. The strength of the incentive effect will be determined in part by both the level of the X and the type and timing of sharing arrangements that the Regulator puts into place.

A counter incentive is that the regulated business may try to reduce costs and increase profits through reducing service standards. Therefore to produce the correct incentives the regulated revenue cap must reference an explicit set of service standards.

A Service Provider's input costs typically do not rise as fast as the CPI, due to productivity growth, economies of scale and increased competition in the prices of inputs, such as labour. The proposed regulatory framework does not seek to measure all these effects, but incorporates a broadly determined X factor to capture the general features of market behaviour during the course of the regulatory period.

Hence a combination of firm-specific and industry-wide performance measures will be needed to inform the Commission's judgement on each firm's potential for efficiency gains. In order to assist its judgement, the Commission invites Service Providers to submit in their regulatory review applications an assessment of achievable efficiencies and how these compare with benchmark data.

In the DRP the Commission set out a proposed incentive regime that provides for P0 and glidepaths to components of the building blocks – for one regulatory period beyond the current regulatory period.

- Rate of return – full P0 adjustment
- Operations and maintenance expenditure – glide path for 1 regulatory period
- Capital expenditures – full P0 adjustment (unless service provider convinces otherwise)
- Capital and depreciation - full P0 adjustment

Work undertaken to progress incentive regulation will involve working closely with the pipeline industry and other regulators to determine appropriate indicators for effective benchmarking. Well based and defensible benchmarks and key performance indicators are essential in assessing the performance of pipelines and in developing equitable sharing mechanisms to support positive incentive regulatory frameworks.

Post-tax Framework

One of the major challenges facing the ACCC is the move towards a post-tax regulatory framework.

The extensive debate and analysis surrounding the Victorian assessment identified the post-tax nominal versus pre tax real model as a highly contentious issue.

In the Draft Statement of Regulatory Principles, the Commission has advocated a post tax nominal approach to future regulatory assessments. I would like to take this opportunity to comment on this issue.

The Access Arrangements submitted to the ACCC for approval so far have all proposed a pre-tax real weighted average cost of capital (WACC). However, a number of problems surrounding the use of a pre-tax real framework became evident during the public consultation process for the Victorian assessment. In particular:

- Investors base their decisions on nominal post tax returns
- The pre-tax real framework requires the post-tax nominal WACC to be converted to a pre-tax real WACC. This is a complex and difficult task as no adequate formula exists to cover all transmission service providers.
- The pre-tax framework requires estimation of a long term effective tax rate. Calculating a long term effective tax rate is difficult and errors in estimating this rate can lead to over or under compensation in the rate of return and create perceptions of risk.
- Finally, there is the S-bend problem. This arises because of accelerated tax provisions, which see businesses paying little tax in the first few years of operation, with tax liabilities steadily rising over time. If the statutory tax rate is used in the WACC formula, the business will receive cash advances before their actual tax liabilities eventuate, thus being over-rewarded in the early years but under-rewarded later on.

These problems can be addressed by changing to a post-tax framework. The advantages of a post-tax framework are:

- A post-tax WACC is more easily understood by financial markets. A nominal WACC can be directly compared with other financial benchmarks such as interest rates, and the nominal return on equity. Financial markets typically express earnings and rates of return in nominal (post-tax) terms.
- There is no need to convert the post tax WACC to a pre-tax WACC as taxes are passed through in the cash flows. This avoids the use of controversial conversion formulae.
- Tax liabilities are recognised as a separate cost and are passed through in the cash flows, increasing transparency.

For all of these reasons, the ACCC believes that the post-tax nominal framework provides a better framework for regulating access to transmission systems. Not only does it provide greater simplicity and transparency, it is directly linked with the CAPM based benchmark rates of return, and more easily understood by financial markets.

The ACCC is concerned that the pre-tax versus post-tax debate has placed emphasis on the wrong figure, the WACC. It is important that industry and commentators begin to focus on bottom line revenue figures and the return on equity.

Key principles for Best Practice Regulation

Finally, I would like to mention the principles for best practice regulation that the Commission has adopted which will underpin its regulatory work.

The principles have been identified by the Regulators' Forum as essential elements required to achieve best practice regulation. The ACCC intends to be guided by these principles but where necessary will use its discretion in decision making, although always with the aim of achieving the best possible regulatory outcome in a transparent manner.

The key principles for best practice regulation are:

- **Consultation**

Effective communication and consultation should take place between the Regulator and all stakeholders, so as to encourage transparent decision making processes.

- **Predictability**

The regulatory process should be predictable, so regulated businesses can feel confident that consistent, well defined decision making criteria will be adopted by the Regulator.

- **Consistency**

The ACCC will make consistent regulatory decisions across industries, time and jurisdictions unless there are compelling arguments for pursuing different approaches.

- **Flexibility**

The regulatory approach should be flexible enough to allow for the regulatory approach to evolve over time in response to new developments and innovations.

Further, as transmission regulator, the Commission aim is to adopt a regulatory process which eliminates monopoly pricing, provides a fair return to network owners, and creates incentives for managers to pursue ongoing efficiency gains through cost reductions. In achieving these aims, the Commission is aware of the need to ensure compliance costs are minimised and that the regulatory process is objective, transparent and as light handed as possible.