SUBMISSION TO THE PRODUCTIVITY COMMISSION ON THE GAS ACCESS REGIME

29 August 2003

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1. Introduction

Envestra Limited welcomes the release of the Issues Paper prepared by the Productivity Commission for the "*Review of the Gas Access Regime".*

Envestra is the largest gas distribution company in Australia operating distribution networks in Victoria, South Australia, Queensland, New South Wales and Northern Territory. Envestra supplies natural gas to over 905,000 customers in five jurisdictions through 17,900kms of distribution network. We also own 1,100kms of transmission pipelines.

The gas access regime, through the National Third Party Access Code for Natural Gas Pipelines Systems (the "*Code",)* establishes the framework under which regulated gas distributors such as Envestra invest and operate. It is therefore critical to our business. More widely, the Code applies to some $9 billion of regulated pipelines and networks throughout Australia. For these pipelines and networks, the Code has significant implications for investment in new infrastructure and reinvestment in existing systems.

The Productivity Commission review is therefore of incredible importance to the future development of the natural gas industry in Australia. Envestra's view is that there are significant deficiencies with the current regime that need to be corrected. We anticipate that through this review, the Productivity Commission will develop recommendations that will assist governments, regulators and industry to develop a more efficient gas access regime that stimulates infrastructure investment.

This submission is structured in two parts. Part A provides:

- Background to the development of the gas access regime;
- What is at stake if the gas access regime is not improved;
- The positive attributes of the existing regime;
- The deficiencies of the existing regime; and
- Proposed modifications to the Code.

Part B provides a response to the specific issues raised in the Productivity Commission's issues paper released in July 2003.

2. Background to the Development of the Gas Access Regime

The development of the current gas access regime dates back to the early 1990s when the Australian and New Zealand Minerals and Energy Council (ANZMEC) Gas Industry Advisory Group (GIAG) initiated discussions on the development of open access for pipelines. This culminated in the release of a discussion paper in July 1992 which canvassed options for providing open access to natural gas pipelines. The paper concluded that an industry Code of Practice would provide the most effective and equitable open access regime in Australia. A task force was subsequently established to develop the Code of Practice which was released in February 1994 (Attachment A).

The Code of Practice proposed a framework whereby users would have open access to pipelines with terms and conditions of use determined by commercial negotiation. The Code of Practice also contained a dispute mechanism that would operate in the event of an access dispute.

Implementation of open access to gas pipelines was then handed over to the Council of Australian Governments (COAG) as part of a broader microeconomic reform program that was to be developed in response to the Hilmer report[1]. At a meeting on 25 February 1994, COAG agreed to introduce complementary legislation so that a uniform national framework would apply for access to natural gas pipelines both between and within jurisdictions. The Gas Reform Implementation Group (GRIG) comprising representatives of the Commonwealth, States and Territories was established to further develop these arrangements.

GRIG considered the Code of Practice developed by the Gas Industry Advisory Group but concluded that its negotiate-arbitrate foundations were likely to result in expensive access disputes. An alternative concept for providing third party access was developed whereby regulated businesses would submit an access arrangement to the regulator for approval. The access arrangement would set out the commercial terms and conditions for obtaining access to the pipeline. Users would be free to negotiate terms and conditions of access different to those in the access arrangement. However, if there was a dispute, an arbitrator would be appointed, and would use the terms and conditions in the approved access arrangement as the basis for resolving the dispute.

In effect the access arrangement was to be a default agreement that a user could "buy off the shelf" or use as a basis for negotiating different terms. This framework for developing access arrangements and implementing the gas access regime was the foundation for the Code.

The current gas access regime was established on 7 November 1997 when Commonwealth, State and Territory Ministers signed the Natural Gas Pipelines Access Agreement. The objectives of the Agreement were to:

- facilitate the development and operation of a national market for natural gas;
- prevent abuse of monopoly power;
- promote a competitive market for natural gas in which customers may choose suppliers including producers, retailers and traders;
- provide rights of access to natural gas pipelines on conditions that are fair and reasonable for both service providers and users; and
- provide for resolution of disputes.

Key features of the current regime are:

- Gas Access Law – This legislation was developed and passed by the South Australian Parliament in July 1998. All other jurisdictions (except Western Australia) passed application of laws legislation that enabled the South Australian law to be enacted in those jurisdictions. Western Australia developed its own State-based legislation to be consistent with the South Australian legislation;
- Consistency between the Gas Access Law and State-based legislation - All jurisdictions were required to review existing legislation and repeal, amend or modify

[1] Hilmer Committee (1993), Independent Committee Inquiry into Competition Policy in Australia.

any legislation that was inconsistent with or that would alter the effect, scope or operation of the Gas Access Law;
- The Code was implemented through incorporating it as a schedule to the South Australian Gas Access Law. It also provided for the establishment of appeal processes;
- The National Gas Pipelines Access Committee (NGPAC) was established to provide a mechanism for processing changes to the Code;
- Regulators – The ACCC was made responsible for regulation of transmission pipelines. Jurisdictions were required to establish independent regulators to regulate distribution pipelines/networks;
- Transitional mechanisms – Some transitional measures were agreed including a time frame for the introduction of retail contestability;
- Franchising principles were established to remove the ability for franchises to be a barrier to trade in natural gas; and
- Licensing principles were agreed to remove legislative or regulatory barriers to trade in natural gas.

A key observation from this discussion is that the features of the gas access regime implemented in 1997 were significantly different from those originally proposed by the Gas Industry Advisory Group in 1994. It is therefore appropriate that this review by the Productivity Commission is undertaken. Experience with operation of the regime is that very few users have sought to negotiate terms and conditions different to those approved by the regulator. In other words, the tariffs and terms and conditions that have been applied for access to gas distribution infrastructure throughout Australia have generally been those approved by the regulator in the distributor's access arrangement.

One task for the Commission is to re-examine the regime to determine if the current arrangements are those that best replicate a workably competitive market. Envestra's view is that the current regime is heavy-handed and that this intrusiveness is having an adverse impact on the industry, with a focus on providing short-term benefits to consumers.

3. The Challenge for the Gas Access Regime

The gas access regime is critically important to the businesses that have invested in the natural gas industry. As mentioned above, the Code currently applies to regulated assets in Australia valued at some $9 billion. Decisions made under the Code will therefore have a direct effect on new investment, and on reinvestment in existing pipelines and distribution networks. Business decisions made as a result of the regime will ultimately impact:

- existing consumers of natural gas;
- potential consumers of natural gas, where decisions relate to expansion of infrastructure; and
- investors (shareholders).

More broadly, natural gas has a crucial role to play in meeting Australia's future energy needs. Natural gas is a premium fuel used extensively throughout the economy in manufacturing, minerals processing, water heating, space heating, cooking, transport, power generation, etc.

Natural gas is also an environmentally friendly fuel. Increased use of natural gas will assist Australia reduce greenhouse gas emissions. It is also a highly efficient fuel. Natural gas is converted to energy at the point of consumption. This reduces losses associated with transmitting energy over long distances. Moreover, new technologies are being developed that are expected to further increase consumption of natural gas, e.g. fuel cells, cooling, microturbines.

Given these features, ABARE has forecast that natural gas will be the fastest growing primary energy source in Australia over the next twenty years. Natural gas currently accounts for 20% of Australia's primary energy. It is forecast to increase to 24% by 2019/20 (Figure 1)[2].

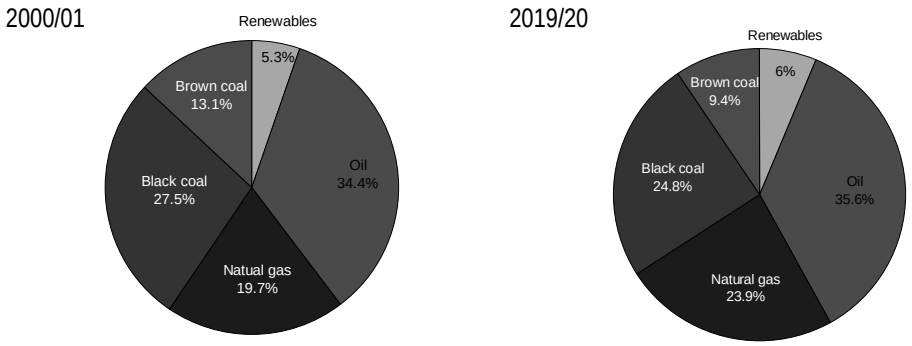

Figure 1: Source of Primary Energy

Australia is fortunate in having ample supplies of natural gas (Figure 2). On the basis of current reserves, it is estimated that there is over 100 years of supply in Australia. However, these supplies are typically some distance from where gas is used.

Figure 2: Gas Supply Sources

A key challenge for the gas industry in the short to medium term is to undertake sufficient investment to enable Australia to maximise the value from its extensive gas reserves. This will

[2] ABARE has recently updated this forecast. Gas is now forecast to provide 26% of primary energy in 2020 (Paper by Andrew Dickson to the AGA Gas Industry Forum on 24 June 2003).

require significant investment in new transmission pipelines to transport gas from reserves to end users. It will also entail increased investment in distribution infrastructure to allow a greater share of the population to benefit from access to natural gas. This investment is necessary to provide customers with greater fuel choice and to further increase competition in the energy sector. The industry also needs to invest in its existing assets to ensure they are adequately maintained and that they continue to provide a platform for further development.

The current gas access regime does not provide the regulatory certainty necessary to facilitate these investments and to maximise the contribution of natural gas to the economy. More importantly, there is a risk that adverse regulatory decisions will impede investment and prevent natural gas from making its full contribution to the economy (see section 6.2).

4. Positive Attributes of the Regime

While the gas access regime has produced positive economic benefits for Australia the main beneficiaries have been large gas users. The cost of gas for these customers has been reduced through the unwinding of cross subsidies. Smaller customers have experienced price increases which have been exacerbated by the costs of introducing full retail contestability.

The requirement for network owners to provide third party access for retailers and end users to pipelines and networks establishes a framework which allows retailers to compete to supply natural gas. This process is also beneficial in that it encourages increased competition and development of value-adding services for customers.

The regime has also required network businesses to be ring fenced from related retail businesses. All business have responded to this requirement by restructuring to establish specialised network businesses. In some cases network businesses have no retailing associates, eg Envestra. In other cases, the retailer is established as a ring fenced company eg TXU Networks and TXU Retail are separate companies with common ownership. The restructuring arising from these ring fencing requirements has provided a clear focus for network businesses that has enabled them to pursue activities that add value to the network sector without being compromised by their position in other parts of the supply chain.

5. What is wrong with the Regime?

Five critical deficiencies of the current regime are as follows:

- Network regulation is costly and time consuming;
- Regulators have favoured short-term price reductions which have adversely affected investment;
- The regime has generated significant regulatory risk which impacts day to day business operations;
- Governments are supplementing the Code with State-based legislation and license conditions increasing complexity and regulatory costs; and
- Some aspects of the proposed gas access regime have not been implemented.

Each of these deficiencies is discussed in turn below.

5.1 Network regulation is costly and time consuming

A key objective in 1997 when the Gas Code was developed was to put in place a light-handed incentive based regulatory regime. There is substantial evidence available now to demonstrate that the current regime is not light-handed.

Since the Code was enacted, Envestra has been involved in three major access arrangements[3]. The average time span required to have these access arrangements approved was 3.2 years (Table 1). This includes the time taken to prepare Envestra's initial submission and to participate in the regulatory process set out in the Code.

Access Arrangement	Commencement Date	Implementation Date	Time (years)
South Australia	July 1998	July 2003	5
Queensland	January 2000	January 2002	2
Victoria	June 2001	January 2003	2.5
Average			3.2

Table 1: Access Arrangement time frames

The access arrangement approval process in the current regime is also very information intensive. Table 2 depicts:

- the number of pieces of correspondence exchanged between the regulator and the Envestra during each access arrangement process;
- the number of reports issued by the regulator during each process; and
- the number of pages in the final decision.

Access Arrangement	No of pieces of correspondence	No of reports from the regulator	Length of Final Decision (pages)
South Australia	203	4	283
Queensland	142	5	385
Victoria	110	6	445

Table 2: Access Arrangement Correspondence

These data demonstrate that the machinations of the current gas access regime are information intensive.

It follows that the cost of preparing an access arrangement and obtaining regulator approval is high. Envestra estimates that its own cost of preparing an access arrangement varies from $250,000 for a small network (eg Albury Gas Company) to $2 million for a larger network (eg Victoria).

[3] Envestra has prepared eight access arrangements since the Code was implemented. Some of these relate to small networks eg Albury Gas Company, Mildura distribution system. Two access arrangements were submitted for regulator approval but prior to a final decision being handed down Envestra successfully sought revocation of coverage pursuant to the Gas Access Law (Riverland and Mildura transmission pipelines).

Regulators and other interested parties that participate in an access arrangement review also incur costs in assessing access arrangements. Regulator's costs are typically recovered through licence fees levied on the regulated business and are substantial. In 2002-03, Envestra paid annual licence fees of $1.1m and $1.2m for our South Australian and Victorian networks respectively. In addition there are costs to other parties of participating in access arrangement reviews (eg retailers, end users).

Network regulation under the current gas access regime is costly, and this cost has been borne by the intended beneficiaries of the regime, the consumers. Envestra is of the view that had a more light-handed regulatory regime been implemented, such as that proposed by the GIAG (see section 2), regulation costs would be significantly lower than they are today.

5.2 Regulators have favoured short-term price reductions which have adversely affected investment

A key task of regulators is to set regulated revenues such that they balance the interests of investors and consumers. However, the reductions in revenue imposed on businesses have been savage. Envestra's revenue has been reduced by up to 22% compared to that initially sought (Table 3).

	Revenue proposed by Envestra ($M)	Revenue Approved ($M)	Reduction (%)
Victoria	$130.6	$110.2	-16%
South Australia	$125.3	$105.5	-16%
Queensland	$37.1	$28.8	-22%

Table 3: Access Arrangement Revenue Cuts

One interpretation of these outcomes is that the reductions imposed by regulators have unduly favoured consumers rather than balancing the needs of investors. Regulators have argued that the price reductions imposed have not adversely affected investment.

However, a characteristic of the fixed cost nature of a natural monopoly distributor is that in the short-term the business plan can be adapted to cope with reduced revenue by delaying certain activities and/or reducing non-safety related expenditure. While the direct effects from these adjustments may be not be apparent, in the longer term, the cumulative effects of continuing reductions will be diminishing load growth followed by negative growth. The result is a downward spiralling effect, whereby a lower number of consumers will eventually bear increasing costs, with the regime being self-defeating.

Evidence is presented in section 6.2 that demonstrates the reduction in revenue imposed on Envestra by regulators has reduced investment.

5.3 The Regime has Generated Significant Regulatory Risk

The Code was purposively drafted to provide a large amount of flexibility to regulators when approving access arrangements. The rationale for this inbuilt flexibility was that the Code needed to cater for the variety of networks and pipelines to which it was expected to apply.

However, in implementing the Code, regulators have used the discretion available to them to significantly modify forecasts and regulatory approaches proposed by the distributor when approving an access arrangement. Examples where this has occurred are:

i) Rate of return - The first access arrangements were based on a real pre-tax WACC. With the evolution of the regime, regulators are gradually changing their approach and imposing a post-tax WACC on distributors (see Attachment B). As a consequence the margin over risk-free rates has declined and returns to businesses have been reduced[4];
ii) Return on assets - The methodology used by the Victorian ESC in the 2003 access arrangement review is different to that used in its 1998 process and significantly reduces the dollar value of each distributor's return on assets by up to $2m per annum. This change in approach was not anticipated by the regulated businesses;
iii) GST – The GST pass-through amounts, which were independently calculated and verified, were arbitrarily reduced by the ESC in 2000. Since then the regulator's determination has subsequently been shown to be wrong. Consumers benefited via lower prices at the expense of distributors;
iv) Efficiency sharing - An efficiency sharing methodology that only allows businesses to retain 30% of any efficiency benefits achieved when expectations at the time of approval of access arrangements was that efficiency gains would be shared equally (50:50); and
v) Truncation - The ESC has a practice of truncating or rounding down Reference Tariffs at the annual re-set instead of the usual business practice of rounding. This reflects a blatant bias on the part of "independent" regulators.

Discretion applied by regulators has significantly reduced revenue to regulated businesses. This has required adjustments to business plans to accommodate the reduced revenue. More importantly, the capacity of the regulator to exercise discretion and approve large reductions in revenue is perceived by the investor community as a high regulatory risk.

Envestra now has in place approved access arrangements for all of its major networks. However, prior to these access arrangements being finalised, various investment analysts were concerned about the potential impact of regulatory risk on Envestra's revenue. As a result they downgraded our investment status.

For example, in November 2000, JB Were, who is one of Australia's most significant investment institutions, valued Envestra securities at 60 cents. They stated that the Company operated in "a heavy regulated environment" and was exposed to "regulatory risks". Once the final decision on Envestra's remaining unapproved South Australian access arrangement was released, the valuation was increased to 80 cents. At this time JB Were stated that the final regulatory ruling gave Envestra an "increased certainty". This is a clear example of the impact of regulatory risk on the perceived value of the company.

Another source of regulatory risk arises from the different time horizons used by regulators relative to the life of the assets that regulated businesses build. The typical regulatory period is five years whereas the life of the assets constructed can vary from 60 to 120 years. At the time of construction, distribution businesses make a decision to invest using the best forecasts available. However the Code empowers the regulator to modify the parameters affecting how

[4] AGA (2003) Submission to the Productivity Commission Review of the Gas Access Regime, 29 August

the investment will be appraised by the regulator at some later date. For example, the regulator could determine that the investment is not prudent and remove it from the regulated asset base. Alternatively he could reduce the rate of return able to be earned from the asset.

Pierpont highlighted this risk in the Financial Review on 29 August 2003. He noted that the Victorian government floated United Energy for $400m in 1998. Soon after the Victorian Office of Regulator General and the ACCC determined that gas distributors should earn "rates of return 31 percent lower than previously". Pierpont concludes by saying that:

> *"there would seem no reason to believe that the energy distribution companies…..would be safe from regulatory meddling". Page 54.*

The existence of regulatory risk has serious implications for business activities such as investment planning, debt and capital raising. In extreme cases, adverse regulatory decisions may result in the credit worthiness of companies being downgraded with consequent increases in the cost of funding.

It is inappropriate for the viability of companies to be so dependent on decisions made by a regulator. While the Code needs to be sufficiently flexible to preserve the original objective of catering for a diverse set of networks, regulators need to provide greater certainty on how they will regulate in the future to reduce regulatory risk faced by businesses. If this is not done, investment in gas distribution will be reduced.

5.4 Regulatory Arrangements are Unduly Complex

A trend that is becoming widespread is for State governments, in issuing licences under their State-based acts, to establish various codes that include conditions that supplement those specified in the access arrangements approved under the Gas Access Law. For example, the Victorian Essential Services Commission (ESC) has issued a Gas Distribution Code containing obligations *inter alia* relating to the operation of the distribution system (eg system maintenance, Unaccounted for Gas) and the provision and testing of meters[5]. The Essential Services Commission of South Australia (ESCOSA) recently suggested that it may be appropriate to establish service standards for the distributor relating to reliability and quality of supply through a series of codes established pursuant to section 28 of the ESC Act.[6]

The main argument for including these obligations in separate codes (rather than in say access arrangements) is that they are easier to alter if modifications are required. Such codes are typically able to be amended by the regulator at any time. This not only undermines the nexus between reference tariffs and service standards or obligations, but imposes a further layer of regulation in addition to the Gas Access Law.

Envestra's experience is that network users (and all users of regulatory instruments) have a preference for avoiding and minimising the cross-referencing of instruments. The proliferation of regulatory instruments increases the cost and complexity of doing business, thereby also increasing barriers to entry of smaller market participants. Multi-jurisdictional retailers have been critical in the past of the several thousand regulations and regulatory instruments affecting their participation in the energy market.

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[5] Essential Services Commission (2003) Gas Distribution Code Version 8.0

[6] AGA (2003) Submission to the Productivity Commission Review of the Gas Access Regime, 29 August.

Envestra would prefer to see the Code mandate a comprehensive approach to developing access-related regulations such that all relevant information is as far as possible contained in the access arrangement rather than various regulatory instruments. Such an approach simplifies the regulatory regime by reducing the proliferation of regulatory documentation and provides for a truly national approach, in keeping with the intent of the national Code and Gas Access Law. All commercial terms and conditions including the definition of services and service standards on the regulated network should be included only in the access arrangement. This is essential to ensure that the tariff for providing these services is consistent with the terms and conditions under which the services are provided.

There is also a need for consistency of policy across the areas of government. A number of Governments are developing "other" policies often under the guise of energy efficiency that conflict with the objectives of the gas access regime. These policies actually impede investment in the natural gas industry.

For example, the Victorian Government is implementing its "5 Star" program[7]. The objective of the program is to improve energy efficiency and reduce water consumption in residential houses. This is achieved by defining a number of performance criteria by which houses can be rated. To achieve a high rating, houses are required to adopt certain technologies such as solar water heating. Typically, developers comply with these policies by mandating electrically boosted solar hot water heating on all houses. These are cheaper to install than an equivalent gas boosted system.

However, by disallowing natural gas for water heating, potential gas loads in each house are dramatically reduced. In some circumstances, the reduction in load will render the connection uneconomic from the gas distributor's perspective.

A decision not to reticulate gas clearly reduces competition in the energy market in those estates and is therefore in conflict with the objectives of the gas access regime. Moreover, from an environmental perspective, installation of an electrically boosted hot water system will produce more greenhouse gas emissions than a natural gas hot water system (Table 4).

Water heater type	**Greenhouse gas emissions per year* (tonnes)**
Electric	4.8
Solar - electric (warm climate)	1.2
Solar - electric (cool climate)	1.9
Two star natural gas	1.6
Five star natural gas	1.3
Solar - gas (warm climate)	0.3
Solar - gas (cool climate)	0.5

* based on 200 litres of daily water use

Source: AGA Research Paper No.16, *Reducing Greenhouse Emissions from Water Heating: Natural Gas as a Cost-effective Option, November 2002*, pp21

Table 4: Appliance greenhouse gas emissions

[7] Details of the program can be found at www.seav.vic.gov.au

In other words, because there is no cost attributed to carbon emissions, the market solution favours an electrically boosted solar system. This is an example of market failure. Not only is investment in the gas industry impeded and competition reduced, but greenhouse gas emissions are increased. The effect of market failure is exacerbated by the policies being implemented by governments which either mandate or subsidise other energy sources. Implementation of such policies prevents natural gas from making its full contribution to the economy, and is inconsistent with a key objective of the gas access regime – to develop a competitive market for natural gas.

5.5 Complementary Reforms have been Delayed

A key objective of the gas access regime was to develop a competitive market for natural gas. Key market participants involved in supplying gas to consumers are depicted in Figure 3. To date, gas industry reform has been applied in an inconsistent manner across the supply chain. This has impeded the development of a competitive natural gas market in Australia.

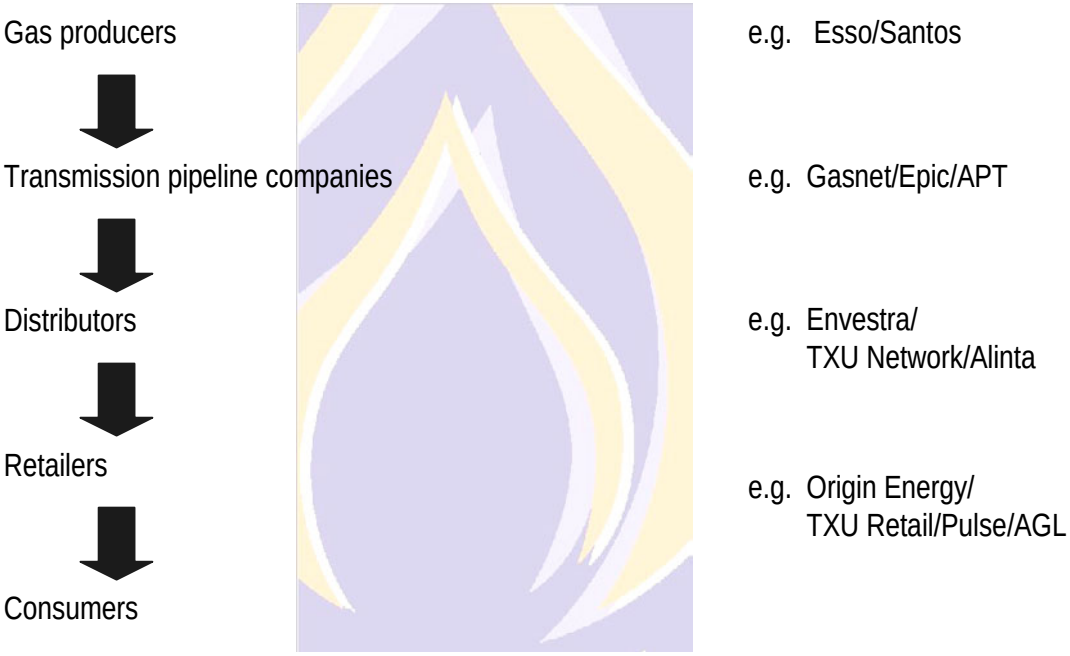

Figure 3: Participants involved in supplying natural gas

The gas access regime has had its greatest impact on the segment, with all major distribution pipelines covered by the Gas Code and subject to regulatory determinations by the relevant State-based regulator. In some cases, these networks have been through two regulatory determinations, e.g. the three Victorian distribution networks.

The irony of this focus on the distribution segment is that the Code was initially developed to apply to transmission operators. The initial objective was to achieve free and fair trade in gas by providing access to gas transmission pipelines both within and between jurisdictions. However, for very legitimate reasons, transmission operators were either derogated from the Code when the Natural Gas Pipeline Agreement was finalised, or have been successful in achieving revocation of coverage pursuant to the Code. Regulation of distribution assets was only included in the Code at a late stage in the drafting process.

As a consequence, the Code contained some clauses that were more appropriate for transmission operators than distribution businesses eg capacity trading, queuing policy. Some of these inconsistencies have been subsequently amended.

While distribution networks have been the focus of the gas access regime, reform of upstream markets has virtually been non-existent. Upstream participants appear to have used the regulatory process associated with gas distribution, and to a lesser extent gas transmission, to reduce regulated network prices. This has assisted them to maintain or improve the competitiveness of their product while ameliorating the cost pressures in their segment of the market. We understand that some of these issues are now being addressed through the Ministerial Council on Mineral and Petroleum Resources.

A final example of delays in implementing the regime is the regulation of retail prices. Contrary to our initial expectations, State governments have continued to maintain legislation providing an ongoing role for regulators in setting retail prices. This has resulted in perverse outcomes.

For example, in Queensland the regulator (Queensland Competition Authority) determined a price path for Envestra's distribution network. However, the Government set retail prices such that the retailers were unable to recover the full costs of increases in network charges. The resultant decline in retail margins has a direct impact on Envestra. Because the retailer's margin on natural gas is reduced, it is more likely to promote other fuels with its new customers than natural gas. This again reduces network utilisation in Queensland and in the longer term will increase network prices to users of the network. If this trend continues, natural gas will soon not be viable in Queensland. This is a good example of short-term benefits to consumers with no recognition of the detrimental long-term effects.

In developing its recommendations for reform of the gas access regime, the Commission must look at each segment involved in the supply of natural gas to ensure that the framework is in place that will facilitate the development of a competitive market.

Envestra suggests that the greatest net benefits from reform are likely to lie in the upstream sector of the supply chain. The figure below provides a stylised depiction of the cost of supplying natural gas to two classes of consumer.

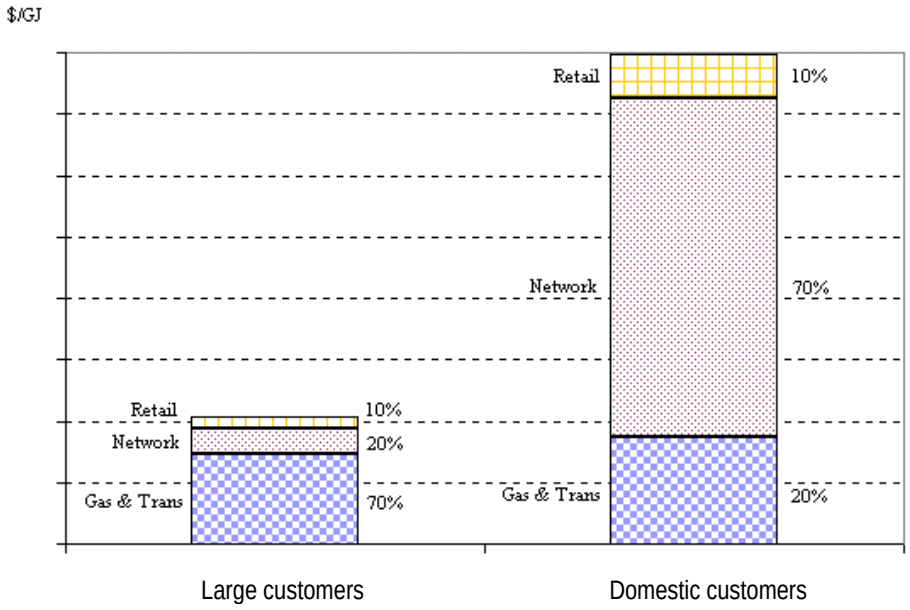

Figure 4: Typical Tariff Components

Some 70% of the cost of natural gas to large customers is attributed to the cost of wellhead gas. The network component of the gas tariff for this category represents only about 20% of the customer's cost of gas. The number of customers falling into this category is small (approximately 0.05% of Envestra's total customers) while total gas consumption of this class of customer is large (about 60% of the total volume of gas distributed through Envestra's network). Using these assumptions, a 5% reduction in network prices is likely to reduce the end cost of gas for these users by 1%. In contrast, a 5% reduction in upstream costs would reduce end user prices by 3.5%.

For domestic customers, network costs could account for up to 70% of the customer's cost of natural gas. This reflects the greater length of pipe required to distribute gas throughout built-up areas. However, the number of customers connected to the network is large. As a result, a 5% reduction in network revenue would be equivalent to a saving per customer of less than $12 per annum – a cup of coffee every three months.

Thus, from an allocative efficiency point, the greatest efficiency gains from further reform of the natural gas industry are likely to be achieved by focussing on upstream participants.

6. Key Modifications to the Code

In this section, we identify four key changes to the Code that are required to assist correct the deficiencies outlined above and to move the gas access regime, as it applies to distribution networks, to a more light-handed approach. The four changes are:

- Improve regulatory processes;
- Provide improved incentives for investment;

- Increase the range of access pricing models provided for in the Code; and
- Minimise the role of regulators in commercial matters that are most effectively managed by businesses.

6.1 Improved Regulatory Processes

The process for undertaking an access arrangement review is set out in the Code. However, there are a number of aspects of the current process that need modification.

First the objectives and access pricing principles in the Code need to be strengthened to provide better guidance to the regulator in making a determination. The regulator is currently required to take into account a plethora of objectives in:

- the Code;
- the State-based legislation that establishes the regulator; and
- the State-based legislation establishing the regulatory framework for the industry e.g. the relevant Gas Act.

This multiplicity of objectives unnecessarily complicates the task of the regulator and may result in him placing emphasis on inappropriate factors. An example of this is the decision of OffGar on the Dampier to Bunberry Pipeline where the court found that the regulator had erred on matters of law and that he had failed to take into account certain relevant factors.

This issue has been fully canvassed in the AGA submission to the Productivity Commission[8]. However, the impact of ambiguity in objectives and pricing principles is that regulators are encouraged to give greater emphasis to short-term price reductions to consumers rather than the long-term interests of investors.

For example, both the South Australia and Victorian Essential Services Commissions have a specific obligation under their respective legislation[9] making a primary objective "the protection of the long-term interests of consumers with respect to the price, quality and reliability of essential services". This obligation affects how the regulator approaches the task of regulating gas distribution businesses. This overriding objective under emphasizes the role of investment.

As mentioned in section 3, if natural gas is to make its full contribution to future economic growth, significant continuing investment in infrastructure is required. Clear objectives and pricing principles need to be included in the Code so as to remove any doubt about the importance of investment when making a regulatory determination.

Indeed, given the asymmetry between the costs of investment not occurring compared to the costs of monopoly pricing, the primary objective of the Gas Code should be to facilitate investment, with the protection of long-term customer interests being a subsidiary objective. This is a complete reversal of the current approach to regulation of network assets.

In addition to these conflicting objectives, regulators are also required to undertake dual roles under the Code. They analyse the businesses' proposals and then make a regulatory

[8] AGA (2003) Submission to the Productivity Commission Review of the Gas Access Regime, 29 August.
[9] Victoria: *Essential Services Commission Act 2001*
South Australia: *Essential Services Commission Act 2002*

determination. That is, regulators act as the consumers' advocate, as well as the judge and jury in the regulatory process. The conflict arising from this dual role has been manifested as a bias in the regulators' office to rely on its own work, or that of consultants, rather than that undertaken by the distribution businesses. Invariably, regulators have favoured short-term price reductions for consumers more so than providing for the interest of investors.

One such example is in Queensland where Envestra proposed demand growth in its initial access arrangement of about 2.5% per annum. The regulator engaged a consultant to review Envestra's demand forecasts. The consultant advised that the forecasts were low and that they should be increased to just over 4% per annum. Envestra's view was that the demand forecasts we had proposed were already challenging but necessary to improve network utilisation and the competitive position of gas in the Queensland market. To do this we proposed a program to increase network utilisation which was costed at $1.3 million per annum.

The final decision of the regulator was to reject Envestra's demand forecasts adopting the high demand forecasts proposed by the consultant. Furthermore, the regulator determined expenditure on network utilisation would be reduced to $0.5 million per annum, making it even more difficult for Envestra to achieve the required growth.

In line with Envestra's representations to the regulator during the access arrangement process it is now clear that the regulator's forecasts were wrong. Demand growth since the determination has been about 1.5% per annum well short of that proposed by the regulator. Part of the reason for the slower growth was the reduction in expenditure allowed for programs to increase network utilisation. The implication of this at the next price reset will be that network prices will be higher than they would otherwise have been.

Part of the problem here is that the dual role the regulator has in developing the "prosecution case" for consumers, and acting as a judge in weighing up that evidence with that provided by Envestra, compromises their independence. There would be merit in separating these two roles as is conventional in most adversarial systems.

A related aspect of this dual role is that regulators have sometimes changed their position on an issue between a draft and final decision without flagging the change to the businesses. A case in point is the treatment of distributors' financing costs in the 2003 ESC decision. In the draft decision, the regulator accepted these costs. As a consequence, our submissions to the regulator on the draft decision did not provide any additional information to support these costs. However, in the final decision the costs were, without warning, excluded.

The Code should be amended to ensure that the regulator consults adequately with the regulated business on any matter on which the regulator changes his position after issuing a draft decision. This would be achieved if the "customer advocate" part of the regulator's office was required to put the case to an independent regulator who then weighed that up with evidence put forward by the business.

An alternative option that may assist to provide a better balance between consumers and investors would be to add a low cost arbitration step between the regulator's final approval and an appeal. This would provide an opportunity for the business and the regulator to put their respective cases to an independent arbiter before embarking on an expensive appeal process.

The benefit of adding this step is that any issue would be fully debated before a formal appeal was instigated.

6.2 Create Incentives for Investment

As discussed in section 3, increased investment is critical to the future development of the natural gas industry. Envestra is aware through its own circumstances, and anecdotally from others, that the current regime is impeding investment. This is occurring through either reductions in the absolute level of investment or deferral of investment as a result of regulatory processes. Examples where investment is being curtailed under each of these situations are provided below.

6.2.1 Where is Investment being Impeded?

To examine where investment is being impeded, it is necessary to define different categories of investment in gas distribution. In this submission, investment activities are grouped into five categories:

- Greenfields projects (either new transmission pipelines or reticulation of new towns);
- Organic growth in existing networks;
- Maintenance of existing networks;
- Network utilisation to increase load growth on the system (eg maximising connections); and
- Research and development to increase the range of appliances and uses for natural gas.

It will be demonstrated that in three of these five categories there is evidence to suggest that the current access regime is impeding investment.

6.2.1.1 Greenfields

There is clear evidence that the Code process for facilitating greenfields investment via a competitive tender is ineffective. All of the new transmission pipelines that have been developed since the inception of the Code (apart from the Central West and the Victorian interconnect, which were subject to extenuating circumstances) are outside of the Code. With regard to distribution assets, a number of competitive tenders have been undertaken (Tasmania, Yarra Ranges, East Gippsland). However, to date no investment has been made in any of these projects as provided for in the Code. The conclusion is that, despite the contention of various regulators, the evidence is that the Regime is ineffective in facilitating greenfields investment.

6.2.1.2 Organic Growth

The impact of the regime on organic growth in networks is more difficult to quantify. New estates within existing distribution networks continue to be reticulated with natural gas implying that investment is occurring. However, less effort is being spent on connecting new customers on line of main. This is because these customers are generally more expensive to locate and connect, and consumption (return) is often lower than in new estates. This trend will be exacerbated if returns approved by regulators continue to decline.

A further example of where organic growth may be constrained is in new developments where governments are implementing energy efficiency programs. The "5 Star" program implemented by the Victorian government is a case in point (see section 5). Implementation of these programs has potential to preclude investment in gas distribution infrastructure in some subdivisions.

6.2.1.3 Investment in maintenance on existing networks

There is no evidence that investment on maintenance of existing networks is insufficient. Indeed gas distribution companies place a lot of emphasis on ensuring that networks remain safe and reliable. However, asset failure events related to insufficient investment generally take many years to manifest themselves, as we have seen recently with the blackouts in the US and Canada which cost those countries an estimated $US 30 billion in lost GDP[10]. Given the similarities of the electricity and gas regulatory regime Australian regulators, and policy makers, should heed the recent warning about under-investment in energy infrastructure issued by the Federal Energy Regulatory Commission:

> *"….If we draw any conclusions from this blackout, it is the urgent need for more investment in the nations transmission grid….Clearly we need more regulatory certainty and other incentives for investment."*[11]

Again this provides further evidence of the need to be mindful of investor requirements rather than a simply short-term consumer focus in handing down regulatory determinations. As seen above, facilitating investment is in the long-term interest of consumers as well as investors.

6.2.1.4 Network Utilisation

There is no doubt that investment in network utilisation has been reduced as a result of the regulatory regime. A major issue facing the downstream natural gas industry is not only the need to grow the utilisation of gas distribution networks in a fully contestable market, but also maintain current utilisation levels. This is because the major competitor of gas, electricity, has several inherent advantages:

- gas is a fuel of choice that is not automatically provided to all properties;
- unlike electricity, gas must be reticulated in new subdivisions at the cost of the network owner;
- gas appliances and installation are generally more expensive than their electrical counterparts;
- arranging gas connection and appliance installation is more complex (eg fluing is normally required indoors in contrast to electrical appliances that can be plugged into a power point); and
- there are a greater range of electrical appliances (and electrical retailers) available.

For these reasons, gas utilities have devoted significant resources in the past to increasing appliance sales and, thereby, gas consumption. In fact, until the early 1970s, Australian gas companies provided appliance service and repair free of charge to their customers. Such activities were economically justified on the basis that they added value over time, through increased gas sales and revenue.

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[10] AFR 18-8-03 pp??

[11] Federal Energy Regulatory Commission, *On the Power Failure in the US and Canada*, 15 August 2003

Many of the activities associated with increasing gas utilisation have traditionally been associated with the retail function. This is because historically it was the retail part of the utility that collected revenue and that had the contact with customers and other key industry influencers.

However, while it was retail personnel that managed this function, the primary driver for the activity was increased gas sales, which improved network utilisation, thereby allowing gas companies to increase economies of scale and minimise prices to consumers.

Unbundling of utilities has resulted in retailers having little interest in pursuing load growth to increase network utilisation. The primary objective of retailers is to maximise margin on a range of products and services, which includes electricity as well as gas. Retailers are more interested in marketing a brand to entice consumers from other retailers rather than increasing utilisation of a network that will result in price reductions for customers (and other retailers' customers) in the longer term. This means that expenditure aimed at increasing network utilisation has become the sole responsibility of the network owner.

Expenditure on network utilisation is thus a legitimate cost of networks and is necessary to increase gas penetration rates and load. In the longer term, consumers will benefit from increased networks utilisation, as increased loads minimise the average price of gas to end users.

Envestra proposed programs to improve network utilisation in each access arrangement. In Victoria and Queensland, however, regulators reduced the expenditure for these programs by up to 62% (Table5)

	Envestra proposal ($M)	**Regulator Approval ($M)**	**Reduction (%)**
Victoria	2.7	1.3	52
Queensland	1.3	0.5	62

Table 5: Network Utilisation Expenditure Cuts

As a result of these decisions, Envestra has been forced to reduce expenditure on these programs in line with the regulators' decisions. However, given the competitive challenge facing natural gas, Envestra believes that this reduction in expenditure will manifest itself in the future as declining penetration and consumption levels that will reduce load growth to the detriment of the industry and future customers.

6.2.1.5 Research and Development

Investment in research and development to increase the range of appliances and uses for natural gas eg natural gas for vehicles (NGV), fuel cells, microturbines, gas cooling has also decreased under the gas access regime. This research was traditionally funded by gas businesses. With disaggregation of the industry and reduced funding available through regulatory decisions, programs such as NGV and gas cooling have been curtailed. This has long-term implications for development in these areas.

6.2.2 Where is Investment Being Deferred?

There is also evidence to demonstrate that the current gas access regime contributes to deferral of investment.

A patent example is the Code process for gaining regulatory approval of greenfields projects. The process requires a competitive tender pursuant to the Code. The Code process lengthens the time required to gain regulatory approval, introduces the element of regulatory risk and also increases the cost of the project. Combined with the inherent risks of greenfields projects, it can be seen that the regulatory regime does little to enhance the viability of such projects.

Even in more trivial cases, regulatory processes are deferring investment. For example, Envestra sought guidance from the regulator on 31 May 2003 on the regulatory treatment of an investment to reticulate natural gas to the regional town of Bairnsdale. The regulator had previously approved an access arrangement to provide for such extensions. Envestra required clarification on the regulatory treatment of the extension so that we had confidence to invest in the project. We were targeting supply of gas to Bairnsdale for winter 2004.

At the time of writing, we have still not heard from the regulator on these issues. While this investment may still occur, the regulatory process has delayed investment to the point that gas in unlikely to be available before the winter of 2005.

The implication is that regulation always adds costs and time delays that will defer or inhibit investment. The costs of deferral or curtailment of investment are paid by customers who are deprived access to natural gas.

These examples demonstrate that the gas access regime has reduced investment in the industry (greenfields projects are being built outside of the regime, expenditure to increase network utilisation has been reduced, expenditure on research and development has reduced). It has also delayed investment.

Moreover we stress that the costs of failing to remove the last cent of monopoly profit from network tariffs is small relative to the costs of reduced investment. For this reason the Code should be amended to be biased towards investment. The incremental costs from an investment bias are likely to be dwarfed by the risks that result from under-investment in new facilities and degradation to existing assets. This is consistent with the PC's own views:

> "*The [Productivity] Commission's recent inquiries have revealed a need to re-balance the emphasis away from achieving immediate gains for users and consumers from existing infrastructure – much of it government owned or previously government owned – to a regulatory framework that will also facilitate efficient investment in augmented and new facilities. In this way, pro-competition regulation is more likely to ensure that Australia has modern infrastructure which is provided and used efficiently, with long-term benefits to the Australian community.*"[12]

6.3 Increase the Range of Access Pricing Models Provided for in the Code

The current gas access regime provides two options:

[12] Productivity Commission, *2000-01 Annual Report*, pp 15-16

- Non-coverage whereby the network is unregulated; and
- Coverage in which case the Gas Code requires regulators to adopt a cost of service approach in determining revenue.

The appropriateness of each of these options is now evaluated, together with an alternative coverage model.

6.3.1 Non-Coverage

There will always be some networks for which, on the basis of an assessment of benefits and costs, regulation is not warranted. This includes:

- small regional networks;
- networks where there is sufficient competition in the market for energy such that there is little potential for the network owner to have significant market power or abuse market power; and
- greenfields pipelines/networks where in the short to medium term the transmission or network owner has minimal market power due to the need to grow load by competing with existing/alternative fuels. The concept of non-coverage of greenfields pipelines is entirely consistent with the Commission's proposal for access holidays.

For this reason, the gas access regime must continue to provide for non-coverage of networks.

The key issues for the Commission to consider is whether the current criteria in the Code for evaluating coverage are appropriate and whether the current arrangements are likely to deter investment.

A problem with the current Code in relation to coverage is that any person can apply to have a pipeline or network covered (or uncovered) at any time. This requirement generates some uncertainty about the length of time for which an uncovered pipeline would remain uncovered. This is a source of regulatory risk which may have a chilling effect on investment.

Envestra recommends that there would be benefit in amending the Code to clarify the conditions under which pipelines/networks would remain uncovered. This would help to ensure there are no adverse impacts on investment from uncertainty over the future status of network coverage.

It is recommended that once coverage of a network is revoked, a minimum period of 15 years applies during which time no applications for coverage can be made.

6.3.2 Current Coverage Criteria and Model

The Commission, as well as industry participants, has raised the question of whether the current criteria for coverage is appropriate. The current coverage criteria (section 1.9 of the Code) are based on declaration criteria in section 44(G)(2)(a) of the Trade Practices Act 1974. Envestra supports aligning the coverage criteria in the Gas Code with the test in the Trade Practices Act as this provides for consistency of regulation across infrastructure industries.

Envestra notes that the Productivity Commission Review of the National Access Regime proposed amending the Act such that facilities should only be declared if this would lead to a "substantial" increase in competition in other markets[13]. Envestra recommends that this should also be the appropriate test for coverage under the Code as it will help to ensure that regulation is only implemented where the benefits outweigh the costs.

Where a pipeline is covered a major drawback of the Code is that only one form of regulation - the 'cost of service' approach is available.

While section 8.4 of the Code allows for an IRR or NPV approach as well as Cost of Service, the reality is that each of the methods is based on what is commonly called the building block methodology. This methodology requires regulators to determine the allowed revenue by summing up the costs as defined in the Code. This methodology precludes adoption of more light handed approaches. In addition, the Code provides regulators with large discretion in making determinations on access arrangements within the framework of the cost of service model. The Code therefore provides network owners with very little flexibility and regulators with significant discretion. This recipe has not allowed a light-handed regime to develop in response to varying market requirements.

A major problem with the cost of service approach is that it requires the regulator to make assessments of the efficient costs of the business. This is very difficult and it is likely that the regulator will make an error. One example of this relates to Envestra's South Australian Access Arrangement and the regulator's view of forecast efficient costs in relation to insurance. Despite market evidence to the contrary, the regulator determined that insurance premiums would decrease. This has obviously proved to be incorrect. Furthermore, as the Commission has pointed out[14], the consequences of making errors are asymmetric, with far more harm caused to society by regulators setting prices too low than too high. Over reliance on this one approach to regulation is likely to result in excessively high regulatory costs, reducing investment in the industry. This issue is discussed more fully in section 5.1.

6.3.3 Proposed Coverage Model

There are a number of other regulatory models that might be more appropriate under certain circumstances. Indeed one can envisage a continuum of regulatory approaches ranging from the current relatively heavy-handed cost of service approach to the light-handed negotiate-arbitrate model. It is proposed that the Code be amended to provide flexibility to enable alternative regulatory approaches to be adopted in covered networks. Some alternatives are depicted in the table below.

[13] Productivity Commission (2001), p141.
[14] Productivity Commission (2002) Review of Gas Access Regime, p

	Access Pricing Model for Covered Pipelines			
	Cost of service	External Benchmarks	Price Monitoring	Non-Price Monitoring
Method of regulation	Cost based price cap with price path	Non-cost based price path with X set by general productivity measure	Published prices for reference services	Negotiate/arbitrate; Published terms; ring fencing & other non-price requirements
Role of the Regulator				
• Monitor service standards	Yes	Yes	Yes	Yes
• Approve tariffs annually	Yes	Yes	No	No
• Undertake fixed period review	Yes	Only when there is a significant change in market conditions	Only when tariffs breach agreed covenant	On recommendation of an arbiter
Criterion for adoption	Substantial potential for anti-competitive behaviour	Moderate potential for anti-competitive behaviour	Small potential for anti-competitive behaviour	Minimal potential for anti-competitive behaviour

Table 6: Access Pricing Models

The key characteristics of each regulatory approach are summarised in the table. The level of regulatory intervention in setting tariffs decreases from left to right across the table. A mandatory requirement of networks that are covered under any of these regulatory approaches should be that the network owner will publish access prices and relevant terms and conditions. This is necessary to facilitate competition in the natural gas market.

Adoption of less interventionist access pricing models would reduce the costs and risks of regulation thereby stimulating investment. While the role of the regulator in tariff setting would reduce with the adoption of more light-handed approaches, service standards would continue to be monitored by the regulator to ensure that consumers are adequately protected.

These alternative arrangements would be most effectively implemented by amending the Code so that the service provider is able to propose, to an independent body such as the Productivity Commission, the access pricing model to apply to a particular network. A proposal to adopt a less onerous regulation such as price monitoring or the negotiate/arbitrate model would need to be supported by the Commission's analysis of the market, and the potential for the business to exert anti-competitive behaviour, such as withholding access or exploiting market power.

The Code would also need to provide for definition of the circumstances under which the regulator could intervene at a future date. Intervention may be required if market conditions changed or evidence of anti-competitive behaviour emerges. It may be that a lighter form of regulation is conditional upon the regulator being provided with a reserve power to re-regulate under certain trigger conditions. The conditions under which re-regulation would occur would need to be clearly defined and agreed in the regulatory compact before the more light-handed access pricing approach was implemented.

This approach would provide service providers with more flexibility to develop alternative regulatory approaches that might be more appropriate for specific network circumstances.

6.4 Minimise the Role of Regulators in Commercial Matters

The Code currently requires regulators to approve Reference Tariffs. However some regulators adopt an intrusive approach in approving Reference Tariffs that further distorts investment incentives and energy market outcomes.

For example, the QCA inappropriately intervened in the setting of Envestra's Reference Tariffs in the December 2001 Access Arrangement Review. Envestra had proposed a series of tariffs to the regulator that gave a smooth price path over the full consumption range. The regulator required Envestra to reduce tariffs to domestic customers and increase them for medium volume industrial and commercial customers. This change created an inefficient distortion in the market. This is demonstrated by the graph below.

The regulator's tariffs resulted in customers using say 9.9 TJ per annum (tariff V customers) paying tariffs 24% higher than a customer using just over 10.1 TJ per annum (tariff D customer). This of course creates perverse incentives for customers around the 10TJ consumption level to change from tariff V to tariff D to achieve lower prices. In addition, any such changes are not reflected in the demand forecasts implying that revenue able to be recovered by Envestra would be lower than the regulated revenue approved by the regulator.

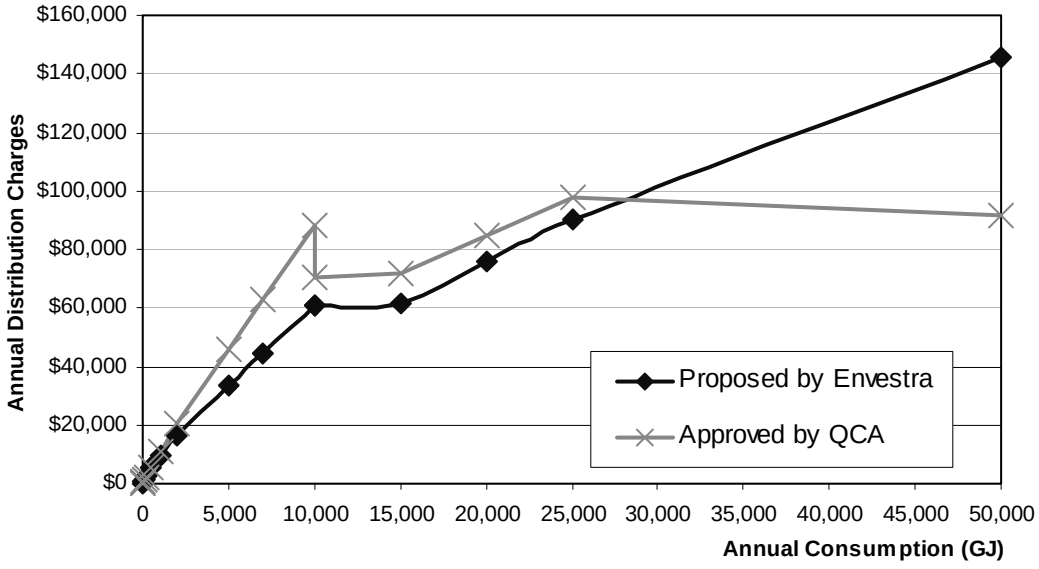

Figure 5: Envestra Queensland Network Tariffs (2000/01)

In general, regulators are ill-equipped to make commercial judgements on tariffs. They do not have a sufficient understanding of the dynamics of the market to make informed commercial decisions. Moreover, it is not necessary for them to have that role when regulating to prevent anti-competitive behaviour.

Also in Queensland, Envestra proposed overrun charges that would apply when a Tariff D customer exceeded its contracted capacity. While such charges are expected to rarely come into effect, they are necessary in the market place to ensure an efficient market. Without overrun charges, there is potential for customers/users to understate capacity requirements for network utilisation. While the South Australian regulator allowed overrun charges for this purpose, the Queensland regulator mandated that no such charges should apply. Such commercial matters should not be at the discretion of regulators.

To avoid the regulatory errors that follow from this unnecessary intervention, it is recommended that the Code be amended to give primacy to service providers in making decisions on commercial matters. Specifically, regulators should only be able to reject tariffs if they are economically inefficient. This means that before requiring the business to amend tariffs, the regulator would need to demonstrate that tariffs proposed by the service provide either:

- do not satisfy the price control; or
- do not fall within the range of economically efficient tariffs i.e. between marginal and stand-alone cost.

Regulators have also concerned themselves to a higher degree than necessary with a numerous commercial matters contained in Access Arrangement's terms and conditions, such as those dealing with:

- credit policy requirements for retailers;
- commercial liability and indemnity;
- contract termination; and
- frequency of payment for charges.

In some cases, regulators have dictated specific amendments to clauses (e.g. liability), with no regard or recognition of consequential cost impacts on reference tariffs.

The regulator imposed changes have also resulted in differences in terms and conditions across jurisdictions. Envestra believes it would be more efficient if it was able to have a standard set of terms and conditions that would apply in each state in which we operate. If individual retailers have specific needs, commercial negotiations could be used to develop mutually acceptable terms and conditions.

Finally, regulators have made arbitrary and ill-informed decisions concerning the commercial issue of network utilisation. Following decades of commercial decisions by experienced managers on the level of expenditure in this area, it is inappropriate for regulators to make such commercial decisions, especially when such decisions have no sound basis.

PART B
RESPONSES TO ISSUES PAPER QUESTIONS

7. Benefits and costs of the existing regime

7.1 How has the Gas Access Regime affected upstream and downstream industries? To what extent has the Regime promoted competition in these markets?

The regime has had no effect on upstream industries. Until there is reform in the gas production segment of the industry and third party access to processing facilities, producers will continue to maintain a degree of power over wellhead prices.

In the downstream industries, benefits are beginning to flow from full retail competition rather than from the Gas Access Regime. The main impact of the Regime has been on gas distribution and transmission networks, where rates of return have been reduced and regulatory uncertainty introduced (see section 5 of this submission).

In relation to distribution networks the Regime has been focused on the removal of perceived monopoly pricing rather than promoting competition. While the Regime provides a mechanism for enforcing open and non-discriminatory access to the gas delivery system, these requirements could have been met without the current Regime (through light-handed regulation).

7.2 To what extent does the Regime facilitate the development of a national market for natural gas and energy in general?

Open access to distribution systems has provided retailers with the means of entry to various markets. However, a national market for natural gas can only develop when participants are able to have gas transported with minimal constraints through various transmission pipelines and hubs, without the need to create bypass connections and inefficient duplications of infrastructure. On this basis, the Regime has not facilitated the development of a national market. Despite the Regime, however, a national market for gas is slowly developing.

In order to facilitate a national market, the Regime needs to acknowledge investment risks and provide adequate commercial returns to pipeline owners and investors. Ultimately it is the prospect, and attainment, of commercial returns by industry participants that will drive its development. Gas transmission needs to be complemented with distribution investment to deliver the gas to end-users. Hence, an environment conducive to investment is needed to expand natural gas transmission and distribution networks and develop a truly national market.

7.3 What has been the impact of the Regime on end-user gas consumers? What is the evidence that the Regime leads to lower prices and/or improved quality and range of service for gas and energy consumers?

Pricing

The requirement of the Regime for cost reflectivity has meant the unwinding of cross subsidies and the rebalancing of tariffs. In some cases the requirement for cost reflective pricing has led to tariffs based on the customers' physical location within a network. For those customers adversely affected, the 'level playing field' or the 'rules' have been changed as far as they are concerned.

For example, in the Adelaide network, the transmission pipeline from Moomba enters the distribution system from the north of the city. The zonal pricing structure required price increases for industrial consumers in the southern suburbs of Adelaide. Rather than promoting competition, the regime had the undesirable effect of increasing the gas price for one of Adelaide's two car manufacturers (Mitsubishi, located south of Adelaide) and decreasing it for the other (Holden Motor Company, located north of Adelaide).

As mentioned previously, the Regime has focused on the removal of perceived "monopoly rent", generally resulting in lower prices to large customers. These short-term gains come at the expense of medium to longer term benefits that would have accrued to other consumers from an otherwise expanded energy distribution system.

Range and Scope of Services

The core service of delivery of gas to a customer has not changed for decades and is not expected to change in the future. While gas distributors also perform some ancillary services, the range and scope of services covered by the Regime have not and will not fundamentally change. From the customer's perspective, however, retailers have commenced offering a range of services. This has been facilitated by the provision of third party access to networks.

Quality of Service

Although the quality of natural gas distribution services has historically been very high, improvements still occur due to new technologies, faster communications, etc. Such improvements cannot be attributed to the Regime.

For safety reasons, response times to customers' calls relating to network problems are necessarily of a high standard, with regulatory controls and standards also dictating minimum standards of service. These high standards have been recognised by regulators:

> *Overall, the reported information shows the gas distribution system to be highly reliable with customers rarely losing access to supply in 2002. This is consistent with the experience of the previous three years[15].*

7.4 What are the efficiency gains resulting from the Regime, as opposed to any transfers from pipeline owners to other market participants?

The majority of efficiency gains have been achieved through industry restructuring and privatisation which resulted from competition policy rather than the Regime. Disaggregation of businesses has enabled management to focus purely on gas distribution issues and achieve greater improvements in efficiency than otherwise

[15] Essential Services Commission, *Gas Industry Comparative Performance Report 2002*, June 2003.

would have been the case. For example, the cost of funds for distribution businesses now reflects those risks related to gas distribution, rather than an amalgam of retail, upstream and distribution as was the case with bundled businesses.

Private ownership places commercial incentives on distribution business owners to increase revenue, grow demand and minimise costs. Achieving these objectives means that the businesses are increasing allocative, technical and dynamic efficiency, or overall economic efficiency. However those gains have been offset by the Regulators' focus on short-term price reductions at the expense of long-term investment in the industry.

7.5 Are there benefits for pipeline owners, such as greater certainty? If so, how significant are these benefits?

Envestra is unable to identify any benefits that the Regime has delivered to network owners.

On the contrary, the Regime has increased regulatory risk due to the discretion available to regulators, and decreased funding available for investment in the business. For example, in the recent Final Decision for the Victorian Gas Access Arrangement Review the ESC determined that Envestra's tariffs needed to decrease by CPI minus 9.9% in 2003 and CPI minus 1% for the remainder of the regulatory period. In the ACCC's Final Decision for GasNet the real pre-tax WACC[16] was reduced by 145 basis points from 7.75% to 6.30%. On an asset base of $495m this equates to a $7.2m reduction in annual revenue, a significant decrement for a gas distribution business.

7.6 To what extent, if at all, has the Regime led to unmet demand, where consumers would be willing to pay more to increase supply but service providers are unwilling to make the necessary investment?

See section 6.2.2.

7.7 What is the cost of government administration of the Regime?

Administration costs of the Regime have increased significantly throughout the period the Regime has been in operation. Licence fees paid to governments and regulators have increased significantly to cover the cost of regulating the industry (e.g. regulatory authorities, ombudsmen and consumer advocacy groups). In Victoria the licence fee increased from $250k in 2000/01 to $1.2m in 2002/03 (this is only Envestra's share of the Victorian regulators costs). Similarly in South Australia 1999/00 was $600k and in 2002/03 it was $1.1m. These increases are ultimately borne by the end-users of natural gas.

[16] GasNet, Access Arrangement Information, 17 January 2003. The zero allowance for tax makes the 6.3% post-tax WACC determined by the ACCC is equivalent to a pre-tax WACC

7.8 What are the compliance costs for businesses? Are these costs likely to be significantly greater than the costs associated with unregulated commercial negotiations between pipeline owners/operators and users? Do compliance costs differ significantly between proposed and existing pipelines and between transmission pipelines and distribution networks?

A large portion of the compliance costs are fixed irrespective of the size of the network. Access Arrangement review costs are up to $2 million for networks owned by Envestra, whereas unregulated commercial negotiations would only cost a very small fraction of this. A light-handed regulatory approach would significantly reduce compliance costs.

Where regulators apply the Code in a heavy-handed and/or un-pragmatic manner, management must devote resources and costs to fulfilling regulatory requirements. Examples include:

i) The QCA Service Quality Monitoring regime, which requires information to be collected that Envestra has not found necessary for running the business and which is irrelevant in the industry (e.g. appointment times for new homes connections). Such statistics cannot be collected and maintained without significant cost;
ii) The QCA Accounting Guidelines. The QCA have requested distributors to provide information that is not required to monitor compliance with the Code during an Access Arrangement Period, such as directors responsibility statements, accounting information about unregulated assets and detailed capital expenditure information;
iii) The requirement by SAIPAR for the inclusion of a number of non-covered assets in Envestra's Access Arrangement[17]; and
iv) The requirement by the ESC of Guaranteed Service Level payments despite the fact that the costs of implementing a tracking and payment system far outweighed the benefits.

7.9 Are there any efficiency costs that arise from the constraints on pipeline owners to independently set the terms and conditions for providing services?

Envestra's has been unable to independently set the terms and conditions for providing services in different jurisdictions as those terms have been set by the relevant regulator. This means that different terms and conditions apply across different jurisdictions. This does not facilitate the promotion of a national market for gas, since most retailers with whom Envestra deals are now operating in a number of States, and different terms and conditions apply to the same retailer depending on the regulator/State.

Envestra would prefer to have a standard set of terms and conditions that apply in each State and then use commercial negotiations to build in variations that meet the needs of individual retailers.

[17] SAIPAR, Final Decision, Access Arrangement for Envestra Limited's South Australian Natural Gas Distribution System, December 2001, pp26-27

7.10 Are there costs that arise from strategic behaviour by pipeline owners or access seekers?

Envestra is not aware of material costs that have arisen from strategic behaviour by pipeline owners or access seekers.

7.11 Has the Regime led to inefficient investment (timing, levels) in pipelines? If so, what has caused this and what evidence is there? Do the effects differ between existing and greenfield pipelines and between transmission pipelines and distribution networks?

Refer to section 13.1.

7.12 What and how significant an effect does the Regime have on investment in upstream and downstream markets? Does it encourage efficient investment in these markets?

Refer to section 7.1.

7.13 Taking account of both benefits and costs, does the Regime provide a net benefit to Australia?

Refer to section 4 and 5.

7.14 To what extent does the Regime balance the interests of different parties, such as pipeline owners, end-users and gas producers?

Refer to section 6.1.

8. Objectives

8.1 Are improvements needed to the objectives specified in the preamble to the Gas Pipelines Access Act in order to ensure uniform third party access arrangements are implemented and applied on a consistent, national basis?

The preamble in the Gas Pipelines Access Act is open to interpretation and is non-binding. Hence, it does not provide sufficient certainty to service providers. What is needed is a binding 'Objects' clause that provides specific guidance on the objectives of the Regime, such as to:

- Require non-discriminatory third party access to pipelines that have excess capacity;
- Require non-discriminatory third party access to developable capacity where it is economically feasible;
- Recognise the long-term nature of gas pipeline investments;
- Convey the requirement for light-handed incentive regulation;
- Provide an environment conducive to investment, emphasising the requirement for certainty and pragmatism in the application of economic regulation; and

- Provide for resolution of disputes.

To the extent that there are inconsistencies between various sections of the Code or the Gas Pipelines Access Act then the Objects clause should provide interpretive guidance.

8.2 To what extent, if any, is there conflict between the objectives stated in the preamble to the Gas Pipelines Access Act? Have such conflicts been resolved satisfactorily by regulators, the courts, and other relevant parties? If not, what improvements could be made?

Envestra refers the Commission to the submission by the Australian Gas Association.

8.3 Are there any problems or ambiguities arising from the hierarchical structure of the various sets of objectives contained in the Gas Pipelines Access Acts and Code? Have these conflicts and ambiguities been resolved satisfactorily by regulators, the courts, and other relevant parties? If not, what improvements could be made?

Envestra refers the Commission to the submission by the Australian Gas Association.

9. Coverage

9.1 Is the current coverage test and its application appropriate? If not, why and how could the coverage test be improved?

See section 6.3.

9.2 To what extent has the option to revoke coverage been utilised? Are any improvements required?

Service providers have sought revocation only when the criteria contained in section 1.9 of the Code were certain to be satisfied. Consequently the National Competition Council has approved twenty applications for revocation[18] (reinforcing the view that blanket coverage was inappropriate).

It is Envestra's view, however, that the ability for the relevant Minister to veto National Competition Council revocation recommendations politicises the process. Revocation decisions by the National Competition Council based on competition and efficiency considerations should be sufficient to ensure revocation where it is applicable.

As discussed in section 6.3.1, regulatory certainty must apply once revocation (on non-coverage) has been granted, i.e. a defined period of time must be stipulated (15 years) during which no applications for coverage can be made.

[18] National Competition Council www.ncc.gov.au

9.3 What are the advantages and disadvantages of allowing regulators to apply for coverage of pipelines which they will regulate?

The regulators role is to deliberate on third party access issues for service providers that are covered by the Code, in accordance with statutory objectives. Further, it is an unnecessary market intervention that creates regulatory risk for current and potential gas pipeline investors. The regulators role is not to determine which assets are or are not subject to Code coverage.

9.4 How consistent should the Gas Code's coverage criteria be with the criteria for declaration in Part IIIA and coverage criteria in other industry-specific regimes? What changes might be needed to achieve the appropriate level of consistency?

The Gas Code's coverage criteria should be consistent with criteria for declaration in Part IIIA of the Trade Practices Act. Code coverage should only be appropriate where:

- Duplication of infrastructure is inefficient;
- Third party access provides a substantial increase in competition to an upstream or downstream market; and
- Third party access is economically efficient and safe.

9.5 Do you have any views on the Commission's recommendations on the National Access Regime (and the Government's interim response), particularly where they are relevant to the industry-specific access arrangements for gas pipelines?

Generally Envestra endorses the Productivity Commission's recommendations on the National Access Regime. We believe a genuinely light-handed approach to regulation with less emphasis on theoretical validation of decisions would be beneficial. A good example of the over-emphasis on theory is the regulatory cost of capital debate where regulators do not incorporate allowances for business specific (diversifiable) and regulatory risk, and make downwards adjustments for the unobservable value of dividend imputation. When determining the hurdle rate for an investment the business does allow for specific risks and does not adjust for imputation credits, which is contrary to the regulators' methodology. A pragmatic approach, that reflects industry practice, is required in order to provide an environment conducive to investment.

With respect to Access Arrangement reviews, the service provider should, under the relevant model, propose an Access Arrangement and the Regulator approve it if it is not inconsistent with the Code, rather than the current process where the Regulator dictates the scope and detail of an Access Arrangement.

10. Commercially negotiated outcomes

10.1 To what extent does the Gas Code promote the use of commercial negotiation between access seekers and service providers? Is that a desirable objective?

It has been Envestra's experience that relatively little commercial negotiation has occurred between service providers and access seekers. The high degree of

prescription that has evolved through the regulatory regime has meant that service providers have been required to provide reference tariffs for all commonly required services, together will detailed terms and conditions. Negotiations have therefore been limited to non-standard services. Envestra has been happy to do this where appropriate. It is desirable to allow commercial negotiation between parties, as this best replicates a competitive market. Regulatory mechanisms should only apply as defaults where there is market failure. In order to promote commercial negotiation, however, it is necessary for fundamental changes to be made to the Regime (see section 6.3.3 of this submission).

10.2 Does the presence of an access arrangement discourage commercial negotiation?

As mentioned above, the current Access Arrangement regime has mostly negated the need for commercial negotiation. While this has some benefits for both parties, this has been achieved at great expense and the same outcome can be derived using much lighter handed and significantly less costly regulatory models.

10.3 Do the dispute resolution procedures of the Code, combined with the prescription required in access arrangements — particularly with respect to reference tariffs — facilitate or hinder commercially negotiated outcomes?

Because there have been very few commercially negotiated outcomes, it is not possible to say whether the dispute resolution procedures have facilitated or hindered such outcomes.

For those outcomes that have been commercially negotiated, the dispute procedures have been of little relevance since the service provider has a commercial incentive to grow demand on the network and will always do so where either (i) spare capacity exists and/or (ii) the cost of expansion is economic.

10.4 What proportion of negotiations between access seekers and providers have involved a dispute that was resolved by the arbitrator? Do access seekers and providers use commercial negotiations as a legitimate step before seeking regulatory intervention?

Envestra has not been involved in any access disputes. As discussed above, the service provider always has the incentive to provide access and grow demand where economic.

10.5 What changes to the Gas Code might better facilitate its effectiveness in promoting commercial negotiations?

See section 6.3.3.

11. Effective upstream and downstream competition

11.1 Are changes required to the Gas Code to better facilitate its effectiveness in promoting competition in upstream and downstream markets?

Effective competition in the natural gas market requires competition across all segments of the industry (i.e. production, transmission distribution and retail). A combination of market based (i.e. commercial negotiation) and regulatory measures (the Regime) has provided third party access to the transmission and distribution monopoly infrastructure. Further economic benefits will be derived:

1. by greater investment in transmission infrastructure. This will facilitate basin on basin competition amongst the gas producers with flow on effects to end-users;
2. by facilitating third party access at gas production facilities, enabling intra-basin competition amongst gas producers. It is expected that lower wellhead prices would then flow onto end-users. (This is demonstrated in Western Australia where multiple producers are accessing the Dampier to Bunberry and Goldfields Gas Pipelines. WA has the lowest wellhead (ex-plant) price in Australia of $1.90/GJ ($1999) versus around $2.40/GJ ($1999) in the eastern States[19] where there is less wellhead competition;
3. by moving to a light-handed regulatory framework that creates an environment conducive to investment and development of the industry. The provision of and access to energy infrastructure is a precursor to economic development. For example, ACIL Consulting were commissioned to evaluate the economic benefits of the PNG Gas Pipeline[20] and found that, once operational, the project would increase net Gross State Product for Queensland by $575 million per year, create more than 2,900 full-time jobs in Australia[21] and generate a net annual gain in consumer welfare of $85 million[22]; and
4. by implementing policies and systems to achieve full retail competition, where there are real and net public benefits, and allowing those competitive markets to develop (i.e. without the artificial constraints of government price caps).

11.2 Does capacity trading facilitate upstream and downstream competition? Or is there scope for misuse of market power by upstream or downstream industries?

This issue is not applicable to natural gas distribution businesses.

11.3 To what extent, if any, does the Regime's impact on pipeline investment hinder the development of competition in upstream and downstream markets?

See section 11.1.

19 The ex-plant price in Victoria was quoted at $2.38/GJ and $2.40/GJ for NSW. Source: Australian Gas Association, Gas Statistics Australia 2001, pp 77

20 ACIL Consulting, The PNG Gas Project: Economic Impacts at National, State and Regional level in Australia, April 2002

21 These impacts were calculated by the University of Queensland Centre for Economic Policy Modelling using Regional Input–Output analysis.

22 Calculated by Econtech with the Computable General Equilibrium MM600+ model of the Australian economy. This approach assessed the allocative efficiency of the project.

12. Effective retail contestability

12.1 To what extent does the Gas Access Regime promote retail contestability on a consistent and timely basis?

See section 7.1.

12.2 What changes to the Regime might better facilitate its effectiveness in promoting retail contestability on a consistent and timely basis?

The Code enables non-discriminatory third party access to distribution infrastructure thereby providing the foundation for a competitive retail market. However, third party access is a necessary but not sufficient condition for full retail contestability. The Code has done as much as it can reasonably do to promote competition/contestability. The next stage in the evolution of a contestable retail market requires efficient information systems, effective operating protocols and consistency of retail licence conditions across jurisdictions. These are outside of the Code mandate.

13. Access regulation and new investment

13.1 Has the Gas Access Regime led to a level of investment in gas pipelines that is inefficient? Do the impacts differ between reinvestment in existing networks and the construction of new pipelines? Do the impacts differ between transmission pipelines and distribution networks? Please provide evidence to support your arguments.

Level of Investment in New Pipelines

Envestra considers projects and investments on a commercial basis, regardless of the Regime, and will not undertake inefficient investment.

The Regime, however, has hindered investment by truncating returns, focusing on short-term price reductions and not compensating for business specific and regulatory risk. Projects undertaken by regulated businesses since the introduction of the Regime in 1997 have been very low risk. Higher risk projects have proceeded on the basis that they would not be regulated (e.g. the SEAGas transmission pipeline and the Duke Eastern Gas Pipeline)

In relation to greenfields projects, the high cost of competitive tenders (e.g. surveying, engineering and forecasting), load risks, regulatory uncertainty and the focus on the lowest cost bid makes such projects unattractive from the tendering service providers' perspective. This explains why no competitive tender for a greenfields distribution project has progressed past the tender phase.

Level of Investment in Existing Network

Investment in gas distribution has two aspects:

i) The physical assets such as pipes and meters;
ii) Increasing consumers' use of natural gas (i.e. network utilisation); and
iii) Research and development.

Regulators have a general appreciation of the issues surrounding the physical investment in pipes and meters. However, they do not fully understand the importance of the latter two aspects above.

Unless there is sufficient investment in maintaining and increasing average consumption, network utilisation will decrease over time. In this sense, the low level of expenditure approved by regulators in this area may be identified as being below an efficient level. (See section 6.2.1.4 and 6.2.1.5 of this submission)

13.2 Does the Code create an incentive to delay investment and/or build smaller pipelines than optimal so as to minimise the possibility of pipeline investment being subject to access regulation? Again, it is important to provide concrete examples to support such a view.

Because the Regime has an intense focus on costs and there is undue emphasis by regulators on the perceived risks of "gold plating", it rewards service providers that delay or avoid investment. (See section 6.2)

13.3 To what extent have incentive mechanisms been used in practice?

The incentive of the price-cap and a fixed regulatory period has been used in all gas distribution Access Arrangements. More recently Efficiency Carryover Mechanisms have been implemented under the Incentive mechanisms section of the Code (section 8.44). These reward businesses for incremental cost reductions into the next Access Arrangement Period[23].

The incremental efficiency carryover mechanism is well defined in the Victorian Access Arrangement. SAIPAR chose to provide a set of guiding principles in the South Australian Access Arrangement and the QCA is in the process of developing an efficiency carryover mechanism for the Queensland networks.

However the mechanisms used by regulators are flawed as:

i) regulated businesses do not receive any of the benefits of gains made to achieve the regulator's imposed productivity improvement; and
ii) even if the business outperforms the regulators benchmark, the proportion of gains appropriated are only 30%.

This issue is discussed in the AGA submission to the inquiry. In summary, while efficiency sharing mechanisms are being used by regulators, the models are biased against businesses in favour of customers.

[23] For discussion see Essential Services Commission, *Review of Gas Access Arrangements – Final Decision*, October 2002, pp155-179

13.4 What impact do incentive mechanisms have on pipeline investment and maintenance? To what extent do they address concerns about the truncation of returns?

The objective of an incentive mechanism is to provide an incentive to improve efficiency, not ameliorate the truncation of returns caused by the Regime. Correctly formulated incentive mechanisms will promote efficient behaviour.

The incentives provided under an incremental efficiency carryover mechanism are skewed towards operating expenditure affecting technical efficiency. For example, a $10 incremental reduction in operating expenditure is retained by the business for five years ($50 in total). However, the same reduction in capital expenditure receives a much less reward - the regulatory WACC multiplied by the reduction i.e. $10 x WACC (say 7%) = 70 cents, which is retained for five years ($3.50 in total). This can have a negative effect on life-cycle maintenance costs. Moreover, these efficiency carryover mechanisms only provide service providers with 30%[24] of the benefits from efficiencies attained, passing 70% on to consumers. If the carryover period were to be extended, this would redistribute more of the efficiency gains to service providers, thereby strengthening the incentive to pursue efficiencies. A carryover period of ten years, instead of the current five years, would provide a sharing ratio of around 50%, which would be a much fairer sharing of the gains.

13.5 To what extent have these mechanisms helped overcome concerns about truncated returns?

Rewards for efficiency and truncation of returns are two separate issues. Efficiency carryover mechanisms should reward efficient behaviour and not seek to remedy other deficiencies in the Regime, such as truncated returns. Efficiency carryover mechanisms have not overcome any concerns about regulators truncating returns.

13.6 What would be the advantages and disadvantages of amending the Code to enable binding rulings on the coverage of pipelines prior to their construction?

It would increase certainty, reduce regulatory risk and facilitate investment. Envestra obtained a binding regulatory ruling for the reticulation of Cardinia in 1999 from the Victorian Essential Services Commission (then Office of the Regulator-General), which provided the required certainty for the project to proceed.

13.7 What would be the advantages and disadvantages of providing investors in a proposed transmission pipeline with the option of a 15 year (or some other fixed term) access holiday? What are the pros and cons of limiting access holidays to transmission pipelines?

Regulation free periods (access holidays) would mitigate the risk of truncated returns and leave the market to develop in a commercially sustainable manner without distortions caused by regulation.

[24] As calculated by the ESC using the Sharing Ratio.

Distribution pipelines connect consumers to transmission pipelines. Hence, the logic behind providing access holidays for transmission pipelines is also applicable to distribution networks.

13.8 Are further changes required to address the issue of regulatory truncation of potential returns from new investment? If so, what are they and why are they necessary?

A Fixed Principle is an element of the Reference Tariff Policy that cannot be changed without the agreement of the service provider. To reduce other uncertainties in the Regime, regulators could make greater use of Fixed Principles.

One of the major sources of regulatory risk and truncated returns is the potential for regulators to disallow capital expenditure to be rolled into the regulatory asset base under section 8.16 of the Code. Service providers are not rewarded for this risk in the regulatory rate of return (WACC) as regulators do not recognise that the risk exists. Not all regulators have communicated how they intend to apply the economic prudence test of the Code. If service providers had an *ex ante* appreciation of how regulators were to apply the test (i.e. a Fixed Principle) they would be able to manage this risk better.

14. Tender process

14.1 How effective have tender arrangements been in achieving appropriate and efficient prices? Does the tender process for setting reference tariffs for new pipelines facilitate or hinder investment in gas pipelines? Are there significant administrative and compliance costs involved in getting approvals prior to and following a tender process?

See section 13.1.

15. Ring fencing arrangements

15.1 Have the ring fencing arrangements been effective? If not, can you provide examples.

The ring fencing arrangements of the Code have, in Envestra's view, been effective. However, as with other sections of the Code, there are several ring fencing requirements that can be adopted in a light-handed or heavy-handed and intrusive manner. The Queensland regulator has chosen the latter, and imposed guidelines that, in Envestra's view, go beyond that necessary to implement ring fencing arrangements. These guidelines require the collection of a significant amount of detailed information and additional obligations on the service providers (e.g. Directors responsibility statement) that are not necessary. Moreover, for a small network operating in a competitive energy market, such as the Brisbane network, a heavy-handed approach is not necessary as the market constrains any monopoly pricing power natural gas may or

may not have. The Accounting Guidelines only serve to increase the cost of gas to consumers in an already competitive energy market.

The irony of the Queensland regulator imposing the most heavy-handed ring fencing approach amongst State regulators is that Queensland is the only State where full retail competition in gas will not occur. This is an example of regulators adopting a more heavy-handed style of regulation wherever such an option or interpretation is available.

15.2 What is the effect of the ring fencing provisions in the Code on the incentives to invest in gas pipelines? Are the investment effects similar for distribution and transmission pipelines?

The costs associated with ring fencing are ultimately borne by end-users. To the extent that these costs are unduly high or unwarranted, they represent a regulatory cost that will ultimately affect prices. A light-handed application of the ring fencing provisions in section 4 of the Code would not unduly affect the incentive to invest.

15.3 To what extent have regulators waived minimum ring fencing requirements or imposed additional obligations? Has the appeals mechanism been used to any great extent and, if so, with what implications for application of the Code?

See 15.1.

15.4 What, if any, have been the effects of limiting the scope for marketing staff to work for an associate in a related business?

Envestra does not have an associate in a related business.

15.5 Are there any changes that could be made to the operation of the Code to minimise any adverse effects of the ring fencing provisions on pipeline investment?

With regulators becoming increasingly intrusive it is clear that the Code needs to be amended to provide explicit limits on the extent of information that can be requested during an access arrangement period. The information requested must relate solely to ring fencing issues (if any) and not general information gathering.

16. Information gathering

16.1 Do the information gathering requirements of the Code significantly hinder investment? If so, what changes would ensure an appropriate balance between the interests of access seekers and providers, while not significantly discouraging infrastructure investment?

The information gathering requirements of the Code, if applied as intended in a light-handed manner, do not significantly hinder investment. This is because the information gathering requirements were meant to be applied at times of access arrangement submission/review, in accordance with the information requirements of Attachment A of

the Code. However, regulators are now (inappropriately) attempting to impose extensive information collection requirements under ring fencing guidelines that would require service providers to devote resources to regular reporting between access arrangement reviews.

To restore appropriate balance between access seekers and providers, the Code requires:

(i) limitation of information collection powers in accordance with the original intentions of the Code; and
(ii) the incorporation of a range of regulatory models that do not rely on intensive information collection and reporting (see section 6.3.3of Part A of this submission).

17. Extensions/expansions

17.1 To what extent have sections 6.22 and 6.23 of the Code (Obligation to Develop Capacity) been used? Could improvements be made to the operation of this part of the Code? If so, how?

Thus far sections 6.22 and 6.23 of the Code have not been used to develop capacity. Envestra will always expand the network where it is economic to do so.

17.2 Do the provisions for pipeline extensions and expansions hinder or facilitate investment? Please provide examples.

Sections 6.22 and 6.23 of the Code have not hindered investment. As discussed previously, regulatory risk, truncation of returns and heavy-handed regulation are the main hindrances to investment.

17.3 Does the possibility that service providers fund pipeline expansions create an asymmetry between access providers and users, such that risk is transferred from users to providers?

As long as the returns on investment are commensurate with the risks it does not distort the investment decision.

18. Access arrangements and 'light-handed' regulation

18.1 Do you think there is scope to improve the effectiveness and timeliness of the access arrangement process providing for an appeal on the merits of a regulator's decision earlier in the process? What are the advantages and disadvantages of doing so?

Regulatory decisions are inherently biased towards consumers, due to the statutory requirements imposed on a regulator. A mechanism where a non-judicial, low cost

independent merits-based assessment of service providers' proposals following a regulatory decision would moderate the inherent bias in regulators decision making by imposing a level of discipline that is currently lacking.

Providing an earlier avenue for appeal increases the chances of an early resolution of differences, and avoids the need to revisit areas that may have been subsequently been impacted by an incorrect decision. It is imperative, however, that such an appeal process must involve an appeal body that has sufficient powers to arbitrate and substitute decisions. The lack of such power would lead to situations akin to the recent West Australian Epic appeal, whereby the outcome still resulted in uncertainty and further time delays.

19. Reference tariffs

19.1 Are the reference tariff objectives specified in the Code appropriate? If not, what improvements could be made?

Envestra refers the Commission to the submission by the Australian Gas Association.

19.2 Do the multiple objectives assigned to reference tariffs, and the discretion regulators have to make tradeoffs between them, lead to any problems? For example, has there been unnecessary uncertainty or inconsistency?

Envestra refers the Commission to the submission by the Australian Gas Association.

19.3 Do the current arrangements for determining reference tariffs lead to inconsistencies and create an unnecessary level of uncertainty for pipeline owners/operators, particularly given the discretion provided to regulators? Do you think that the creation of a national energy regulator would address these problems?

See section 6.4.

19.4 Is the level of prescription provided in the Code on reference tariffs appropriate? If not, should it be increased or decreased and why?

See section 6.4.

19.5 What, if any, improvements should be made in determining reference tariffs? Are clearer reference tariff principles required in the Code?

Envestra refers the Commission to the submission by the Australian Gas Association.

19.6 Do reference tariffs set an upper bound on prices for access seekers in negotiations with a pipeline owner/operator? Is it feasible for access suppliers to negotiate lower prices than the reference tariff, if the reference tariff is set so as to recover no more than the efficient costs of providing a service?

Reference Tariffs do not, and should not, set the upper bound on prices for access seekers. The final negotiated price depends on the exact nature of the service being requested and the associated risks (see sections 10.1 to 10.5). This could be higher or lower than the Reference Tariff.

19.7 Should changes be made to the review procedures available for reference tariff decisions?

Regulators should not be able to make any decisions about reference tariffs other than whether or not they comply with the approved price control mechanism and whether they fall within the economically efficient range. All other considerations should remain the purview of the service provider.

20. More 'light-handed' regulation

20.1 Is there scope for more light-handed options within the regulatory Gas Access Regime? Should a more light-handed approach be applied to all gas pipelines, or is it more appropriate when coverage decisions are marginal? Are there differences between transmission or distribution pipelines, or jurisdictions that might justify a more light-handed approach in some cases but not others?

See section 6.3.3.

20.2 In considering the potential for more light-handed approaches, do you think such approaches would work better as an alternative to coverage (as discussed above) or as an option after coverage?

See section 6.3.3.

20.3 Which elements of the existing access arrangements might form part of a light-handed option?

The following elements of existing access arrangements/Code might apply depending on the circumstances:

i) published reference tariffs and terms and conditions, so that all users have access to the same price and service;
ii) timelines for responding to requests for access or provision of information;
iv) ring fencing obligations; and
v) dispute resolution procedure.

20.4 What new elements (such as monitoring) might be required?

Envestra has not given detailed consideration to additional elements of a light-handed regime.

20.5 What, if any, incentives might such an option provide to regulators in their decision to cover or not to cover under the Gas Code?

See section 6.3.3.

20.6 Could a more light-handed approach continue to balance effectively the interests of all parties and provide a fully competitive, open and transparent third party access service on a non-discriminatory and economically efficient basis?

Envestra believes the current Regime does not effectively balance the interests of all parties, but that this can effectively be achieved by a more light-handed approach as described in section 6.3.3 of this submission.

20.7 How effective are the light-handed approaches identified here (price monitoring and information disclosure)? Are there other approaches that might be more effective in the context of the Australian gas industry?

See section 6.3.3.

20.8 Are the current minimum requirements for access arrangements appropriate and effective?

While the current minimum requirements for an Access Arrangement (i.e. under the cost of service approach) are appropriate, the degree of flexibility that regulators have coupled with the ability to widely interpret various sections of the Code means that minimum Code requirements can result in highly prescriptive outcomes. Such "regulatory license" must be addressed if heavy-handed regulation is to be avoided.

Minimum requirements for more light-handed regulatory approaches should be less than currently prescribed (see section 6.3.3).

20.9 What changes to the current minimum requirements would improve the prospects that the Code enables pipeline and/or network owners and operators to provide a fully competitive, open and transparent third party access service on a non-discriminatory and economically efficient basis?

See section 20.8.

20.10 What scope is there to increase the use of incentive regulation? What are the barriers to its practical application? How might such barriers be overcome?

See section 13.4.

21. Institutional and governance arrangements

21.1 Are current and proposed institutional and governance arrangements appropriate?

Envestra refers the Commission to the submission by the Australian Gas Association.

21.2 How consistent are the roles and responsibilities of these entities under the Gas Code, Part IIIA of the Trade Practices Act 1974, and other specific industry regimes? What are the advantages and disadvantages of increasing consistency in roles and responsibilities?

Envestra refers the Commission to the submission by the Australian Gas Association.

21.3 Are different approaches used in practice to regulate access to gas transmission and distribution? What is the rationale for having State Government regulators oversee access arrangements for gas distribution, rather than a national regulator (as occurs for transmission in most jurisdictions)? Which approach is better?

It is evident by the different outcomes of different regulators applying the same Code that consistency of regulation will never be achieved while State regulators exist. While there are benefits in maintaining State regulators (development of a diversity of regulatory approaches, stimulation of debate, etc), there is evidence through the final decisions delivered to date that regulators use regulatory precedent selectively. The tendency for regulation to feed upon itself has obvious shortcomings. A particular flaw is that regulators have tended to selectively adopt elements of other regulator's decisions, regardless of their appropriateness to market circumstances, or compelling evidence that these precedents were themselves correct.

For example, the Queensland regulator was not convinced that the network utilisation expenditure proposed by Envestra in its access arrangement was reasonable. However, the regulator determined that what other regulators had determined was reasonable. An average of those figures was then applied to Envestra's network, however, not before the figure approved by IPART (for AGLN) was excluded – on the basis that it was abnormally high.

As mentioned earlier in this submission, Envestra has been required to implement different access arrangement terms and conditions in each jurisdiction. A national regulator would provide consistency and facilitate a truly national approach to the gas market as envisaged when the national Code was developed.

21.4 How timely are decisions made under the Gas Code? Do you think the process is unnecessarily protracted? If so, what has caused this and what do you think could be done to improve it?

See section 5.1.

While the Code mandates certain timeframes, these will always be exceeded for various reasons. While it is expected that future access arrangement reviews will be more timely, due to experience gained, it appears that regulators now wish to be more prepared – seeking more information, seeking such information earlier (ESC commenced consulting on the 2003 access arrangement in June 2001, fifteen months ahead of when Envestra was required to lodge its revision), and beginning the review process with stakeholders up to 18 months before the reset date (SAIPAR mandated a

submissions date for Envestra's South Australian Access Arrangement 18 months before the reset date).

This protracted regulatory process can be improved by moving to a light-handed regime that is not as information intensive as the cost of service approach, as described in section 6.3.3 of Part A of this submission.

Apart from the access arrangement review process, there are other regulatory decisions that should be dealt with in a more timely manner. For example, on the 30th of May 2003, Envestra formally outlined to the ESC its proposed regulatory treatment for a greenfield reticulation project located in south eastern Victoria. As part of that proposal a decision was requested by the 13th of June 2003 to enable the necessary planning and approvals to be obtained to enable construction to be finalised by winter 2004. As of the 25th of August 2003 Envestra had still not received formal notification of the regulatory treatment of that project. The project has had to be deferred due to the delay caused by the regulator.

To improve such processes, a clause similar to section 7.4 of the Code should be included where the regulator is deemed to have approved a service provider's proposal if the regulator does not formally notify the service provider that it does not approve the proposal. This would require the regulator to deal with requests in a timely manner and not deter investment.

21.5 Do you think the current institutional arrangements are appropriate? If not, why not and what can be done to improve them?

Envestra refers the Commission to the submission by the Australian Gas Association.

22. Other improvements

22.1 Are there other necessary changes to the Gas Access Regime, its objectives and its application, to ensure uniform third party access arrangements are implemented and applied on a consistent, national basis?

See section 6.3.3.

22.2 Are special measures required to encourage the extension of gas distribution to regional areas?

See section 6.2.1.1.

22.3 What, if any, has been the impact of requiring service providers to have associate contracts approved by the relevant regulator (sections 7.1 to 7.6 of the Code)?

Envestra does not have any associate contracts.

22.4 Are current arrangements for reviewing decisions by regulators appropriate? If not, what changes could be made and why would they be an improvement?

See section 18.1.

Attachment A

Pipeline Access Code
February 1994