31 January, 2003

Mr G Henry
Queensland Competition Authority
GPO Box 2257
Brisbane QLD 4001

Dear Mr Henry

Re: Monitoring Service Quality Discussion Paper

The Queensland Competition Authority ('QCA') has issued a discussion paper titled *Gas Distribution: Monitoring Service Quality* dated November 2002. The QCA is seeking comment on service quality issues prior to establishing a service quality monitoring scheme.

Envestra supports service quality monitoring as long as the benefits of any such monitoring program exceed the costs and the information being collected has operational relevance for the distribution businesses and its customers. Envestra's detailed comments on the issues raised in the QCA *Monitoring Service Quality* discussion paper are attached in Appendix A.

Should you wish to discuss any aspect of this submission please call me on (08) 8227 1500.

Yours sincerely

Andrew Staniford
National Manager, Regulatory Affairs

APPENDIX A

1 Introduction

Electricity is an essential energy source for homes and businesses alike, with virtually all connected to the electricity distribution (or direct to the transmission) system. Conversely, natural gas is a fuel of choice primarily used for heating and cooking in the home or as a feedstock for industry. There are a number of substitutes for natural gas in the energy market, such as electricity, wood, solar and LPG. In Queensland natural gas is not routinely used for heating due to the warmer climate relative to the more temperate regions of Australia like Victoria and South Australia.

The outcome of this competitive tension in the Queensland energy market is such that (i) gas distributors do not have unfettered monopoly power, indeed they have little market power, and (ii) providing high quality customer service is fundamental to the success of the Queensland gas distribution businesses ('DBs'). Further, the commercial incentives upon DBs to grow gas load means that the swift connection of gas End Users is in the interests of the DBs and End Users.

Safety requirements surrounding the transport of natural gas drive the already high levels of supply reliability and service quality. The Department of Natural Resources and Mines in Queensland is the technical regulator and is responsible for administering these regulations. The safety and reliability record of the Queensland gas distributors is excellent, with only one unplanned supply curtailment in 2001/02, which was the result of a third party damaging a pipe.

The implication is that a service quality monitoring regime must be designed that minimises additional costs and obligations on the Queensland gas DBs. Envestra has reviewed the QCA proposal and notes the following suggestions that are consistent with this overarching principle.

2 Design of a Service Quality Monitoring Regime

2.1 the particular aspects of service quality that are of value to users and how best to collect information on these measures;

Collecting and presenting information on service quality is a costly exercise. Significant time and money can be wasted if obligations are placed on DBs to collect and lodge information that is neither relevant to efficient operation of the business nor related to customer service issues. Envestra is opposed to any quality monitoring regime that adds costs to the business unnecessarily. This is particularly important for Queensland where the competitive position of natural gas relative to other fuel types is finely balanced. Hence, the starting point is to look at what information Envestra currently collects to determine if that information is sufficient to monitor service quality.

The key service a DB provides that is valued by an End User is a constant pressure and continuous flow of gas. It is important to note that Envestra cannot differentiate services between one End User and another. That is, the pressure and flow are supplied over entire suburbs and cannot be altered for any particular End User.

2.2 whether service quality measures should be restricted to those directly under the control of the service provider and whether selected measures should be qualified to exclude extraneous events, and how these might be defined

The discussion paper rightly points out that the overwhelming majority of gas distribution outages are caused by third party damage to the network. Our data indicates that in 2001/02 only one incident of an outage occurred to more than five End Users, and it was caused by a third party whilst making repairs to a road near Bundaberg (i.e. a Non-Covered Pipeline). Gas distributors take great care in marking pipeline routes and provide the *Queensland Call Before You Dig* service (of which Envestra and OEAM were foundation members) to assist people locate gas pipelines around where they are excavating. As third party damage is out of the control of the DBs its impact on service quality should be excluded from performance reports. Equally it is not appropriate to include outages caused by upstream events (as per the Longford incident in Victoria), as incidents outside of the distribution network are outside the control of the DB. All other unplanned outages are appropriate service-quality measures.

2.3 the relative merits of adopting minimum or average service quality measures

Average service quality measures are recommended. Minimum service quality measures would require a sophisticated IT system to track and report incidents on a meter by meter basis. This is far beyond the capabilities of our current systems and would be costly to develop and implement. Concerns that individual consumers could be exposed to extended periods of poor service could be monitored by the number and type of complaints received by the DB – a service quality measure suggested by Envestra in section 2.1. Monitoring the number of recurrent complaints would indicate the level of service quality being provided to individual End Users.

2.4 any other matters that should be taken into account in designing a service quality monitoring regime

The most important issues with the service quality monitoring regime are to avoid additional costs on consumers. Achieving this means that additional costs on DBs must be minimised through drawing upon data that is currently collected and focusing on those areas that are controllable.

The Customer Value section of the discussion paper refers to customer preferences and the way demographics influence End Users' willingness to pay for gas distribution services. This discussion appears to be heavily influenced by concepts relevant to electricity distribution. The physical differences in the nature and method of delivering of electricity and natural gas do not allow gas distributors to differentiate between individual End Users. Therefore, the relevance of willingness to pay for different service levels needs reconsideration by the QCA.

2.5 it should seek to adopt measures that are comparable with those collected in other jurisdictions

In Queensland service quality monitoring costs will be much higher relative to other jurisdictions on a per unit basis. For example, Envestra in Victoria has over 445,000 consumers with average

domestic consumption of 56GJ/pa whereas in Queensland it has just over 70,000 consumers and average domestic consumption of 11GJ/pa. Envestra agrees that measures adopted in Queensland should be consistent with those in other jurisdictions in so far as it minimises costs.

2.6 Aligning Service Quality Measures with Electricity Distribution

The physical differences in the nature and method of delivering of electricity and natural gas mean that different service-quality measures are required for gas and electricity. The gas distribution system is far more reliable than the electricity system as gas can be stored and is not subject to lightening damage, wind damage, transformer failures, car accidents, spikes, generator failures, peak demands, etc.

An example of the reliability of a gas distribution system is easily emphasised by the excellent record of gas distribution in Brisbane. All records and known history of the North Brisbane's gas distribution system points to the fact that it has not suffered any major outage since its introduction during the 1870s - 130 years of constant supply. Obviously some very minor outages have occurred, that were caused by flooding and third party damage, however the majority of homes and businesses in Brisbane have had a constant supply for the full period. Therefore the service quality indicators applicable to electricity will generally not be applicable to gas.

2.7 the nature of service quality related information, if any, that is currently collected by service providers;

Envestra collects operational data that assists it to maintain the high safety, reliability and service levels. Below is a list of the service quality related information that is currently collected by Envestra for its Queensland network.

1. Number of hours of lost gas supply from planned interruptions
2. Number of unplanned interruptions to gas supply affecting more than five End Users
3. Number of hours of lost gas supply from unplanned interruptions
4. Actionable calls from Call Centre

The costs of bringing together this information are already embedded in Envestra's cost structure. As recognised in the discussion paper, any additional data gathering obligations would attribute higher costs to the network and these would ultimately need to be recovered in Reference Tariffs.

2.8 The possible data collection costs associated with the measures proposed in Appendix C.

A preliminary assessment of the expected costs of complying with the data requirements contained in Appendix C to the discussion paper is $0.1 million per annum, however depending on the sophistication of the information systems required the actual cost could be higher. Attachment 1 provides a schedule of service quality measures that would not impose any additional costs on Envestra. We recommend that these be the measures if a service quality monitoring regime is implemented.

3 Service Quality Measures

The QCA has identified the following variables as service quality indicators:

1. Reliability of gas supply
2. Quality of gas supply; and
3. Customer service/relations

As discussed in section 2.1 safety, continuous supply at the required pressure (excluding third party damage and upstream interruptions) and complaints relating to poor service is what experience has shown to be what End Users value in gas distribution. These correspond to reliability of gas supply and customer service/relations identified by the QCA.

The quality of gas supply refers to the technical standard or specification of gas supplied. Distribution networks have no control over gas quality (see 3.3 below). Gas quality indicators are therefore not relevant measures of distribution service levels.

3.1 which measures of reliability are relevant to the Queensland gas distribution networks

Reliability can be measured as the number of hours of gas supply unavailable, excluding third party damage and upstream interruptions. Existing data collection system can provide this data at no additional cost to consumers.

3.2 whether there is a need to distinguish between the reliability of different pressure sections of the network.

Given the high reliability of the network and the low frequency of planned and unplanned outages there is no need to distinguish between various sections of the network. As discussed in section 2.3 average service quality measures will provide the appropriate service quality indicators.

3.3 The Authority seeks comments on whether measures of technical quality could usefully be included in the monitoring regime and, if so, what measures would be most appropriate.

There is no need for any measure of technical quality to be used for gas distribution networks. The reasons for this are as follows:

- The DB does not purchase gas from the producer. The Retailer purchases gas and must guarantee the quality of that gas to both the End User and the DB to ensure that it complies with the Gas Act.
- The Department of Natural Resources and Mines, monitors and ensures that natural gas entering gas distribution systems is in accordance with the specification outlined in the Queensland Gas Act. Qld is in a very fortunate situation where there is a very large number of gas producers who all provide natural as per the required specification. As all gas from various sources is commingled within the transmission pipelines it is extremely unlikely that any out of specification gas would enter the distribution networks. To our knowledge no unapproved natural gas has entered a distribution network in Queensland or has caused a combustion problem to gas consumers in Queensland. Therefore, the DB has no control over poor combustion issues.

Furthermore, the technical regulator audits odourant monitoring and the EPA ensures environmental compliance.

3.4 how users interact with network operators in relation to customer service

High network reliability means that End Users rarely (if ever) have a need to contact a gas distributor directly. Retailers are the first point of contact as they have the relationship with the End User. Any contact between an End User and the DB is strongly discouraged by Retailers as End Users and DBs do not have a commercial relationship. The DBs' contractual obligations are to Retailers as is consistent with the regulatory framework (Code). Retailers filter End User inquiries/complaints related to the network (e.g. gas leaks) to the appropriate DB. We see no reason to change these arrangements.

3.5 whether customer service is an aspect of service quality that should be included in a monitoring regime; and, if so, what measures of customer service should be considered.

The Australian Gas Association customer service measures of:

- Average price of gas ($/GJ)
- Average sales per customer (GJ)
- Real price change (%) between consecutive years

that are included in the discussion paper (page 9) are irrelevant to gas distribution. The average price of gas is an amalgam of well head, transmission, retail, taxes, distribution, distance of gas fields from End Users etc. Distribution is only one of a number of inputs into the delivered price of gas making the average price of gas and real price change (%) between consecutive years irrelevant to customer service level performance indicators. Similarly, average sales per customer is a function of weather, network marketing, energy density, retail marketing, gas and electricity appliance price differentials and the level of competition in the energy market. These are therefore not relevant indicators of service quality for gas distribution.

Customer service is an important element of the Reference Services provided by DBs. However, safety considerations drive many of the operational decisions related to service quality. The very competitive nature of the Queensland energy market means that the market mechanisms are working to achieve the best outcomes for consumers. As outlined in section 2.1, customer service can be monitored as the number of complaints relating to poor service. This is the most appropriate and cost effective measure of customer service quality.

4 Other Jurisdictions

The discussion paper touches on the issue of the guaranteed service level ('GSL') scheme that was introduced in the recent Victorian gas access arrangement review. It should be highlighted that Envestra objected to the introduction of GSLs throughout the access arrangement review on cost benefit grounds. The expected costs of GSL payments and the related IT systems were included in the Victorian DBs' 2003-05 Non-Capital Costs ($0.2m pa) and New Facilities

Investment ($0.4m) allowances. Any discussion on the issue of GSLs needs to include the costs that will be imposed on End Users. In Envestra's view the case for GSLs in Victoria is not strong. Given Queensland gas market conditions, the already high standards of reliability and low consumption levels, the additional costs of a GSL scheme, such as that imposed in Victoria, are not justified.

5 Data Collection and Reporting

5.1 the appropriateness of the information contained in the data collection outline (Appendix C) and associated definitions;

Attachment 1 contains the information which we believe will provide acceptable service quality measures at least cost. Further data collection will add costs that we believe are not warranted in the current circumstances.

5.2 whether any additional information should be included;

Additional information should not be included in the service quality monitoring framework as it will increase costs that we believe are not warranted in the current circumstances.

5.3 how often such information should be reported to the Authority.

Service-quality reporting should be annual to be consistent with our other reporting obligations.

5.4 The Authority seeks comments on whether there is value in publishing service quality information reported by service providers and if any of the information sought in Appendix C is likely to be commercially sensitive.

The service quality information contained in Appendix C to the discussion paper does not appear to be commercially sensitive because it is aggregate data and does not identify any End Users by name or location. Similarly for the information proposed in Attachment 1.

5.5 The Authority seeks comments on the quality of the information that should be provided for service quality monitoring purposes.

Origin Energy Asset Management ('OEAM') is Envestra's operating and maintenance contractor for the Queensland network. OEAM is a quality assured company to ISO 9001:2000. As part of the quality system, OEAM has carried out its own performance monitoring for some time and already produces most of the expected performance monitoring criteria. Given that this level of reporting is exposed to both internal and external auditing by quality assurance accredited personnel, the QCA can be assured that the data being provided will be extremely accurate.

6 Other Considerations

6.1 The Authority seeks comment on whether there is a need to go beyond service quality monitoring and consider implementing a service quality incentive regime for gas distribution.

There is no need to go beyond monitoring

1. the number of hours of gas supply unavailable, excluding third party damage and upstream interruptions;
2. Complaints relating to poor service

As previously discussed safety considerations drive many of the operational factors that are related to service quality. Add to this the already high customer service focus in Queensland due to the very competitive nature of the market means that market mechanisms are working adequately. Financial rewards/penalties will be costly to introduce and, given the high level of reliability, would have little impact on service quality.

The viability of a service quality incentive regime was discussed as part of the 2003 Gas Access Arrangement Review the Victorian Essential Services Commission. Taking into account high performance levels and difficulties associated with quantifying the value of reliability, the ESC concluded that a service quality incentive scheme was not warranted.

> "*The S-factor introduced in electricity applies to aggregate reliability performance for each year taking account of a number of different reliability indicators for CBD, urban and rural customer categories.[14] Most submissions and workshop participants did not support the introduction of an S-factor approach for gas distribution. In particular, they argued that:*
>
> - *gas distributors' aggregate reliability performance is already relatively high;*
> - *it would expose distributors to risks associated with third party incidents, which distributors claim account for a significant portion of unplanned supply outages; and*
> - *there are significant practical and implementation issues associated with estimating marginal costs associated with additional reliability.*
>
> *As noted in the previous section, the gas distributors' current aggregate reliability performance is relatively high and the Office does not have sufficient time series data to assess the extent to which aggregate reliability performance has tended to vary over time. As a result, the Office's current position is that there is insufficient evidence to justify the introduction of an S-factor adjustment to the price controls in the forthcoming regulatory period."*[1]
>
> *"Commission has noted in this Final Decision that it does not intend to introduce a service incentive mechanism within the price control for this access arrangement period."*[2]

[1] Office of the Regulator-General, *2003 Review Of Gas Access Arrangements Position Paper*, September 2001, pp11

[2] Essential Services Commission, *Review Of Gas Access Arrangements Final Decision*, October 2002, pp248

Given the high performance levels in Queensland, which are similar to those in Victoria, we recommend that the QCA not seek to implement service quality incentives.

7 Summary

- Safety requirements surrounding the transport of natural gas drive the already high levels of supply reliability and service quality.

- Competitive tension in the Queensland energy market will produce high quality customer service. Further, the commercial incentives upon DBs to grow gas load means that the swift connection of gas End Users and their satisfaction is in the interests of the DBs and End Users.

- The overwhelming majority of unplanned interruptions to gas supply are caused by third parties damaging pipeline assets. Envestra already employs best practice in minimising such incidents. Third party damage related impacts on service quality should be excluded from performance reports.

- DBs, at best, can only provide the required pressure and constant flow of gas to the End User. DBs cannot differentiate services between one End User and another because pressure and flow are supplied over entire suburbs and cannot be altered for any particular End User. The willingness to pay for different service levels is of no relevance in gas distribution.

- Service quality information collected in Queensland should be no more onerous than that specified in Attachment 1.

- Annual service quality reporting periods are most appropriate

- The value of implementing a formal service quality monitoring regime that requires data beyond that already collected is not justified

- End Users would not benefit from the introduction of service quality incentive regimes

ATTACHMENT 1 – Least cost Service Quality measures

DATA FIELD	DEFINITION
Background	
Start date	First day of reporting period
End date	Last day of reporting period
Supply Area	By operating regions
Length of distribution mains (km)	For entire licence area
Distribution customers – total	Distribution customer defined as any supply point through which gas is delivered from a distribution network identified as a separate account for billing purposes.
End Users consuming <10TJ/a	All customers subject to Tariff V price constraint in access arrangement..
End Users consuming >10TJ/a	All customers subject to Tariff D price constraint in access arrangement.
Unaccounted for gas (TJ)	Difference between total measurements of gas injected into and withdrawn from the distribution network (Pipeline systems), with correction for changes in quantity of gas stored in pipeline over measurement period
Reliability of Supply	
Planned customer interruptions	Reported as: Total number of hours lost from planned customer interruptions; and
Number of unplanned outages	Any unplanned outage affecting 5+ consumers. (excluding third party damage)
Number of customers affected by unplanned outages	Any unplanned outage affecting 5+ consumers. (excluding third party damage)
Number of hours of gas supply lost through unplanned outages	Any unplanned outage affecting 5+ consumers. (excluding third party damage)
Enquiries and Complaints	
Calls to call centre fault line	Total number of calls to centre dispatched actionable class allocated to distribution company