BRITISH COLUMBIA UTILITIES COMMISSION

ORDER NUMBER G-106-91

IN THE MATTER OF the Utilities Commission Act, S.B.C. 1980, c. 60, as amended

and

IN THE MATTER OF An Inquiry into Industrial Interruptible Service Rates on the Pacific Northern Gas Ltd. System

BEFORE: J.D.V. Newlands, Deputy Chairman; N. Martin, Commissioner; and K.L. Hall, Commissioner) October 31, 1991

ORDER

WHEREAS:

A. Commission Decision and Order No. G-23-91 dated February 27, 1991 required Pacific Northern Gas Ltd. ("PNG") to enter into price negotiations with its large industrial interruptible customers, to be completed prior to July 1, 1991; and

B. On June 28, 1991 PNG advised the Commission that its large industrial customers desired to maintain interruptible rates at existing levels rather than attempt to negotiate value of service rates; and

C. Commission Order No. G-65-91 dated July 10, 1991 required Commission staff member Ms. D.W. Emes to review the matter of industrial rates on the PNG system and report to the Commission by October 31, 1991, pursuant to Section 93 (2) of the Utilities Commission Act; and

D. The Inquiry Officer prepared her Report and Recommendation ("the Report") dated October 24, 1991.

NOW THEREFORE the Commission adopts the Report as submitted and orders PNG as follows:

1. The Commission adopts the Report, attached as Appendix A, and accepts in these circumstances the current industrial interruptible service rates on the PNG system as being in accordance with the value of service pricing and accepts the margin in the interruptible rates as the criterion to determine the priority of interruption for interruptible service.

DATED at the City of Vancouver, in the Province of British Columbia, this 4th day of November, 1991.

BY ORDER

J.D.V. Newlands
Deputy Chairman

RJP/ssc
Attach.

BCUC/Orders/PNG-Inquiry Indust.Rates

October 24, 1991

TO THE BRITISH COLUMBIA UTILITIES COMMISSION

Pursuant to Section 93(2) of the Utilities Commission Act and Commission Order No. G-65-91, an Inquiry was conducted into the value of service pricing for the industrial interruptible service rates in the Pacific Northern Gas Ltd. system.

I submit the Report and Recommendation.

Respectfully,

Deborah Emes

Deborah W. Emes
Senior Planner and Inquiry Officer
British Columbia Utilities Commission

Introduction

By Commission Order No. G-65-91, the Commission directed that an inquiry under Section 93(2) of the Utilities Commission Act ("the Act") be conducted into the matter of value of service pricing for industrial interruptible rates on the PNG system. The terms of reference for the inquiry were set as follows:

(a) Review the manner in which the interruptible rates for gas service on the PNG transportation system were set to determine if the rates are in accord with Order No. G-23-91.

(b) Determine the views and concerns of firm and interruptible customers with respect to value of service based on interruptible rates.

(c) Assess whether the proposed rates provide fair and adequate compensation to firm service customers for the service provided.

(d) Report to the Commission on this subject.

This memo will serve as that report.

History of Events

On January 17, 1990, Ocelot Chemicals Inc. ("Ocelot") filed a complaint pursuant to Section 64 of the Act, alleging that PNG's service rates were unjust, unreasonable and unduly discriminatory. By Order No. G-20-90, the Commission set the matter down for public hearing into PNG's rate design which commenced August 21, 1990. After a hearing of the evidence, the Commission issued Order No. G-23-91 in which the following determinations with respect to interruptible industrial service were made.

The Commission stated that :

> *"... interruptible customers should not be allocated capacity supply costs.*
>
> *However the fact that interruptible customers are not properly allocated capacity costs does not mean that rates for interruptible service should be set without regard to capacity usage considerations. Although interruptible customers do not impose capacity costs, it is clear that they benefit from using the capacity installed and paid for by firm service customers. To the extent that this usage is valued by interruptible customers, it is fair that interruptible customer rates should be set so that this value is captured."*

Accordingly, the Commission ordered that:

> *"PNG is instructed to enter into price negotiations with its large industrial interruptible customers, such negotiations to be completed on or before July 1, 1991."*

The Commission expanded upon its Order in its Reasons for Decision when it stated:

> *"The absolute value of interruptible rates must be a matter for negotiation between the utility and its customers. However, until such time as negotiations can take place the Commission sets the rates for interruptible service at the existing levels.*
>
> *"Negotiations must be completed by July 1, 1991 and presented to the Commission for consideration on or before this date. To ensure equitable treatment of firm customers, PNG will be required to provide evidence that it has achieved market value prior to approval of the interruptible rates. Upon approval of the negotiated rates by the Commission, adjustments to the interruptible rates will be made. In the absence of negotiated rates by July 1, 1991, the Commission will fix the rates following a summary inquiry or hearing."*

By letter dated June 28, 1991 PNG instructed the Commission that it had held a single meeting on May 15, 1991 with its large industrial customers concerning value of service interruptible rates. At that meeting, these customers expressed a desire to keep the rates at existing levels rather than attempt to negotiate value of service interruptible rates. The customers appear to have been concerned that value of service rates would lead to excessive rate instability. In particular, they appear to have interpreted value of service-based rates to imply strong sensitivity to short-term market factors either directly through a bidding process or indirectly through linkages to price indices. The customers indicated that such instability would be detrimental to their operations and could lead to adverse impacts on the PNG system either through an erroneous apparent increase in firm demand which would lead to an increase in invested capital or through a decrease in the use of gas as an incremental fuel. This position was confirmed by each of the industrial interruptible customers in letters which accompanied PNG's submission.

Also discussed at the meeting was order of service for interruptible gas. Each of the customers indicated that the current two-tier structure which results in Ocelot paying a substantially lower price for interruptible service in exchange for receiving a lower quality of service was acceptable.

Therefore, PNG recommended the following to the Commission:

1. Rates for large industrial interruptible service be set at existing levels; and

2. The large industrial customers' priority to interruptible service be clearly defined to ensure that Ocelot have the lowest priority to interruptible service and that Eurocan Pulp and Paper Ltd., Skeena Cellulose Ltd., and Alcan Smelters and Chemicals Ltd. have the same priority to interruptible service.

This ordering of priority reflects the margins paid by customers on interruptible service, with low margin customers receiving the least priority.

After receipt of the PNG letter, the Commission requested and obtained a legal opinion with respect to the above matter. In a letter dated July 4, 1991, Mr. D.L. Rice (Lawson Lundell), concluded that PNG should not be held to have failed to comply with the Commission Order respecting value of service interruptible rates since:

1. The Order could be interpreted as other than mandatory since the Commission foresaw the possibility of failure in the negotiations and had prescribed a remedy should that occur; and

2. PNG's ability to negotiate value of service rates was proscribed by the willingness of the industrial customers with which it had to negotiate.

The opinion set out three options for the Commission to pursue with regard to this matter. They were:

1. The issuance of a further directive to PNG clarifying the Commission's wishes with respect to interruptible rates and requesting PNG to renegotiate;

2. The holding of a summary inquiry or hearing to explore the desire of the interruptible customers to retain the existing rates rather than attempt to negotiate value of service interruptible rates, with the results of the inquiry determining future Commission directions; or

3. The determination that, despite PNG's statement that it had failed to negotiate value of service interruptible rates, the current rates are negotiated and reflect the value of service to the interruptible customers.

The second course of action was chosen by the Commission and Order No. G-65-91 was issued accordingly.

Current Status

On September 17, 1991 a meeting was held to discuss value of service rates for large industrial interruptible customers on the PNG system. Attending the meeting were representatives of PNG, Ocelot, Alcan, Skeena Cellulose and B.C. Hydro as well as Commission staff. Eurocan was also asked to send a representative but was unable to comply.

Discussion at the meeting focused on what was meant by value of service rates, how they might be achieved,and potential problems with the concept. The following points were made:

1. Based on the material presented to the large industrial customers at the May 15, 1991 meeting, the large industrial customers had considered value of service rates to imply rates which would be very responsive to short-term market forces, leading to instability and unpredictability. For example, they had considered value of service rates to be only those rates which would be indexed to product prices for example or alternatively set by a (i.e. monthly) bidding process.

2. Rates set in this fashion would be unacceptable to the large industrial customers for the reasons put forward in their earlier letters in support to PNG's existing rates. Specifically, the rates would be unstable leading to planning difficulties for the customers and could lead to adverse impacts on the PNG system either through the encouragement of uneconomic capital investment to provide firm service or an uneconomic decline in the use of gas as an incremental fuel.

3. If what the Commission meant by value of service rates were rates which were set above the cost of providing service, i.e. above variable cost, but (in most cases) below the cost of firm service so that interruptible customers made some contribution to firm customers for the use of the facility but were not specifically linked to some exogenous factor, then the customers indicated that they believed the current rates met the Commission direction and were appropriate. In fact, in a letter dated May 30, 1991 sent to PNG by Alcan's representative that specific suggestion was made.

    "As an alternative to Value of Service Based Interruptible Rates is a rate based on the cost of service, adjusted for a perceived value in the market and quality of the service."

4. At the meeting, PNG indicated that they were uncertain how the current interruptible rates had been set. However, in a letter dated September 24, 1991, PNG stated:

> *"PNG has historically determined interruptible rates through the application of a mix of cost based and value of service principles. Firstly, PNG would calculate its cost of providing interruptible service. Secondly, PNG would determine an amount that in its judgement was considered to be an appropriate contribution to fixed costs. Lastly, PNG would determine the value to the customer having regard to the prices prevailing for available alternative fuels. This calculated rate formed the basis of the negotiations that took place with each industrial customer."*

   Given the above, PNG maintains that the current rates are *"to a large extent, determined through the application of value of service pricing principles"* and should therefore be accepted by the Commission.

5. With respect to priority of service based on margin, there appeared to be general agreement that this was acceptable although Ocelot indicated that its low margin put it at greater risk of interruption. Ocelot indicated that depending on the frequency and amount of interruption, it might be forced to changed its strategy or position in the future.

Staff Assessment

Based on evidence presented at the hearing, discussions with PNG and the large industrial customers as well as an independent review of relevant literature, it appears that the value of interruptible service and therefore the appropriate rate to charge for interruptible service is determined by a number of factors. These include:

(i) The amount of excess capacity on the PNG system;
(ii) The cost of providing interruptible service, including wear and tear on the system;
(iii) The cost of providing firm service;
(iv) The cost and availability of alternative fuels;
(v) The price of products using gas; and
(vi) The demand for interruptible gas, i.e. number and size of potential users of interruptible gas and their manufacturing processes.

Although some of these factors can be measured precisely, the expected interplay between the factors is less amenable to precise measurement. Therefore, in my opinion, the determination of the value of service is more of an art than a science or, to state it another way, we can approximate the value of the service, but without the market efficiency of many buyers and sellers we can not be precise.

Based on the information provided by PNG and the large industrial customers, it appears that the factors listed above were intuitively taken into account in determining the current rates for interruptible service. Therefore, I believe that the current rates are, at the least, a reasonable approximation of the maximum value to the large industrial customers of interruptible service. Further, I agree that while the value of interruptible rates may change as product prices or the price of alternate fuels fluctuate, linking interruptible service rates to these factors on a weekly or monthly basis could lead to excessively unstable rates. This would be undesirable for the large industrial customers, as pointed out above, and would also lead to unstable revenues for the utility. In the long-run, this could also have undesirable impacts for firm service customers particularly if the demand for interruptible service declines or the system is used at less good load factors.

With respect to the second issue, i.e. priority of service, I believe that priority should reflect the margin on interruptible service with those customers who pay a semi-firm margin receiving semi-firm service.

As more interruptible customers come on the PNG system, I expect that the value of interruptible service will increase leading to a greater flowback to firm service customers.

Recommendation

The Commission accepts the current rates for industrial interruptible service on PNG's system as being in accord with value of service pricing and set margin as the criteria to determine priority of interruptible service.