



BRITISH COLUMBIA  
FERRY COMMISSION

ORDER  
NUMBER: 12-03

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**IN THE MATTER OF**

Establishment of Fuel Deferral Accounts Pursuant to Section 41.1 of the *Coastal Ferry Act*

**BEFORE:** Gordon Macatee, BC Ferries Commissioner  
Sheldon Stoilen, BC Ferries Deputy Commissioner

**ORDER**

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**WHEREAS:**

- A. The *Coastal Ferry Act* (the “Act”) was amended effective June 25, 2012, and now includes a provision under Section 41.1 authorizing the establishment of fuel deferral accounts;
- B. Section 41.1 of the Act provides as follows:
  - (1) The commissioner may
    - (a) require a ferry operator to establish a fuel deferral account in relation to one or more route groups; and
    - (b) establish terms and conditions for the use of any fuel deferral account established by the ferry operator;
  - (2) The commissioner may, on any conditions the commissioner may specify,
    - (a) allow a ferry operator to add a temporary fuel surcharge, or
    - (b) require the ferry operator to provide a temporary discount to reflect fluctuations in the fuel deferral account for any period;
- C. The ferry operator (“BC Ferries”) submitted an application dated June 21, 2012 (the “Application”) pursuant to section 41.1 of the Act to establish a fuel price deferral mechanism. The commissioners published the Application on their website and

invited comments from the public within 30 days. The Application is in Appendix A to this order.

- D. In the Application, BC Ferries submits that the proposed fuel price deferral mechanism is consistent with regulatory principles and industry practice and advances the following principles:
- (1) fairness and equity for both ferry users and BC Ferries by ensuring that actual fuel costs are recovered from ferry users over time;
  - (2) fare stability and predictability enhanced through the use of surcharges and rebates;
  - (3) transparency and accountability with BC Ferries having the ability to manage fuel deferral account balances at its discretion subject to certain conditions;
- E. BC Ferries also submits in the Application that because fuel oil prices are market driven, they have no control over crude oil prices or refiner margins and are not able to accurately forecast the cost of fuel over the four years of a performance term and the potential variance between the forecast and actual cost is material;
- F. BC Ferries has proposed in the Application that the “bandwidth” provisions set out in Memorandum 24B, which was applicable in the second performance term, be eliminated and all variances from the set price for fuel accrue to the fuel deferral accounts;
- G. Fuel procurement costs for BC Ferries represent the second largest expenditure after labour and were approximately \$121 million or 20 per cent of BC Ferries direct operating costs for fiscal 2012. A one-cent increase in the per-litre cost of marine diesel increases BC Ferries’ fuel cost by \$1.2 million on an annual basis;
- H. Fuel price volatility represents a significant risk to the financial sustainability of BC Ferries if they were not able to fully recover these costs;
- I. The Coastal Ferry Services Contract, as amended by agreement dated April 1, 2012, provides for the payment or recovery by the Province if BC Ferries’ actual price of fuel varies more than 5 cents per litre from the set price of fuel as established by the commissioner for the third performance term on routes 10, 11 and 40.

**NOW THEREFORE** the commissioners order that:

1. Pursuant to section 41.1(1)(a) of the Act, BC Ferries is authorized to establish two fuel deferral accounts, including one account for routes 10, 11 and 40 and another for all other routes (the “Fuel Deferral Accounts”). The commissioners may consider further subdivisions of the Fuel Deferral Accounts from time to time. The terms and conditions for Fuel Deferral Accounts, hereby authorized, to take effect as of June 25<sup>th</sup>, 2012;

2. Pursuant to section 41.1(1)(b) of the Act, the following terms and conditions for the use of the Fuel Deferral Accounts by BC Ferries are established:
  - (a) the balances from pre-existing fuel deferral accounts for all route groups will be recorded in the applicable Fuel Deferral Account;
  - (b) the set prices for fuel for Performance Term Three is as follows:
    - (i) FY 2013 - \$0.933 / litre
    - (ii) FY 2014 - \$0.952 / litre
    - (iii) FY 2015 - \$0.971 / litre
    - (iv) FY 2016 - \$0.990 / litre
  - (c) all variances between the set prices for fuel and the delivered price for fuel will be recorded to the respective Fuel Deferral Account, and there will be no further provisions for a “bandwidth” as defined in Commission Memorandum 24B which is replaced by this Order;
  - (d) the Fuel Deferral Account balances will be reported to the commissioner on a monthly basis in the form similar to the present reporting, and in a manner that is consistent with applicable securities laws regarding disclosure of information;
  - (e) interest shall not be applied on balances in the Fuel Deferral Accounts;
  - (f) BC Ferries must obtain prior approval to apply fuel surcharges or rebates on routes 10, 11 and 40. The commissioner may order BC Ferries to apply fuel surcharges or rebates on these routes if the Fuel Deferral Account balance is deemed to be excessive.
3. Pursuant to section 41.1(2)(a) and 41.1(2)(b) of the Act, the following conditions for use of temporary fuel surcharges and temporary rebates are established:
  - (a) Except for routes 10,11 and 40, BC Ferries may implement, adjust or remove fuel surcharges or rebates at any time and at its discretion, subject to the following conditions:
    - (i) if the month-end balance in any Fuel Deferral Account is a debit balance which exceeds 2 per cent of the annual pre-surge tariff revenue (“the 2 per cent trigger”) for the applicable all route groups, BC Ferries will adjust the fuel surcharge to target the elimination of the Fuel Deferral Account debit balance, including the expected growth in the balance, over the following 12 months;
    - (ii) if the month-end balance in the Fuel Deferral Account is a credit balance which exceeds the 2 per cent trigger, BC Ferries will have a grace period of two quarters to reduce the credit balance below the 2 per cent trigger;

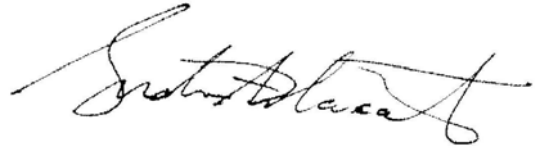
- (iii) BC Ferries shall ensure that the balance in each Fuel Deferral Account reaches \$0.00 (zero dollars) at least once every 24 months; the time period within which BC Ferries is required to zero the balance of the Fuel Deferral Account shall be reset each time the respective Fuel Deferral Account balance reaches \$0.00;
- (iv) surcharges and rebates will be applied as a percentage of fares equally across all routes applicable to each Fuel Deferral Account;
- (v) without the approval of the commissioner, fuel surcharges applied by BC Ferries cannot exceed a maximum of 10 per cent of the tariffs in effect for a route;
- (vi) if fuel surcharges above 10 per cent are approved by the commissioner, additional conditions may be put in place; and
- (vii) BC Ferries continues to meet fuel consumption reduction targets.

(b) BC Ferries shall provide 15 days public notice of any increase in fares which results from:

- (i) the imposition of a fuel surcharge;
  - (ii) an increase in a fuel surcharge;
  - (iii) the removal of an existing rebate; or
  - (iv) a decrease in the amount of an existing rebate.
4. For each fiscal year of Performance Term Three (PT3), BC Ferries shall submit a plan for approval by the commissioner setting out targets for fuel consumption reduction and shall report annually on the results of its fuel consumption reduction measures. BC Ferries shall also update the commissioner annually with its plan to transition to use of alternate fuels. For the current fiscal year a plan must be submitted within 30 days of this Order. For the remaining fiscal years of PT3, a plan must be submitted 30 days prior to the start of the next fiscal year.
5. For each fiscal year of PT3, BC Ferries shall submit a plan for approval by the commissioner setting out their strategies for cost effective fuel procurement, and shall report annually on the effectiveness of their strategies. For the current fiscal year, a plan must be submitted within 30 days of this Order. For the remaining fiscal years of PT3, a plan must be submitted 30 days prior to the start of the next fiscal year.

6. **DATED** at Victoria in the Province of British Columbia, this 30th day of September, 2012.

BY ORDER

A handwritten signature in black ink, appearing to read "Gordon Macatee". The signature is fluid and cursive, with a long horizontal stroke at the end.

Gordon Macatee  
BC Ferries Commissioner

A handwritten signature in black ink, appearing to read "S. Stoilen". The signature is cursive and somewhat stylized.

Sheldon Stoilen  
BC Ferries Deputy Commissioner

# APPENDIX A

An Application Pursuant to Section 41.1 of the *Coastal Ferry Act* to Establish a Fuel Price Deferral Mechanism

Submitted to the BC Ferry Commission  
by the  
British Columbia Ferry Services Inc.



**BRITISH COLUMBIA FERRY SERVICES INC. ("BCFS")**

**AN APPLICATION PURSUANT TO  
SECTION 41.1 OF THE *COASTAL FERRY ACT*  
TO ESTABLISH A FUEL PRICE DEFERRAL MECHANISM**

**JUNE 21, 2012**

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## I. INTRODUCTION AND EXECUTIVE SUMMARY

### A. Introduction

1. Fuel procurement costs currently represent BCFS' second largest expenditure after labour, and were approximately \$121.1 million for fiscal 2012. BCFS' fuel costs are a function of the volume consumed as well as the market price of fuel oil.<sup>1</sup> BCFS has a degree of influence, within limits, over the volumes consumed; however, BCFS has no ability to influence or control market prices. Since the beginning of the first Performance Term in 2003, BCFS has experienced rapid increases in fuel prices and a high degree of price volatility. In recognition of the uncontrollable nature of fuel prices, in 2004, the Commissioner authorized the use of fuel price deferral accounts to manage price volatility. Since that time, BCFS has used approved deferral mechanisms to manage fuel price volatility.

2. The recent addition of section 41.1 to the *Coastal Ferry Act*, S.B.C. 2003, c. 14 (the "Act"), which addresses deferral accounts, makes this an opportune time to revisit the design of BCFS' fuel price deferral mechanisms. In this application (the "Application"), BCFS seeks approval under section 41.1 for a new fuel price deferral mechanism (the "Fuel Price Deferral Mechanism"), involving the use of a single deferral account for multiple route groups, and the necessary mechanisms to permit BCFS to manage the deferral account balance within defined limits.

3. BCFS has taken a "bottom up" approach to designing the Fuel Price Deferral Mechanism. The Fuel Price Deferral Mechanism is designed to reflect the recent amendments to the Act, which underscore the Commissioner's role in balancing the interests of ferry users and the financial sustainability of ferry operators.<sup>2</sup> The Fuel Price Deferral Mechanism benefits both ferry users and BCFS. It advances the following principles:

- (a) **Fairness and equity** - The proposed Fuel Price Deferral Mechanism is fair to both ferry users and BCFS. It will ensure that ferry users pay the actual price of fuel, no more and no less. It is also equitable as among ferry users of different route groups. It consolidates the existing deferral accounts for

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<sup>1</sup> BCFS' fleet runs on marine diesel fuel, and in this Application a reference to "fuel", "fuel cost" or "fuel oil price" is a reference to marine diesel fuel or the price of marine diesel fuel.

<sup>2</sup> The revision to section 38 also requires the Commissioner to consider the interests of taxpayers; however, the issue of fuel deferral mechanisms primarily concerns the interests of ferry users and BCFS.

multiple route groups into a single “pooled” deferral account. The balance in the account will be managed through the use of fuel surcharges and rebates calculated based on the same percentage for all fares.

- (b) **Fare stability and predictability** – The Fuel Price Deferral Mechanism contemplates that BCFS will manage the balances through the use of rebates and surcharges within a range. This promotes rate stability and predictability because it allows BCFS to implement rebates or surcharges as required, as opposed to having to wait until a pre-determined trigger mechanism is engaged. The latter approach can result in large balances accruing, or conversely, frequent fare changes. If a balance builds during a peak time, and the trigger for a surcharge is not engaged until on off-peak time, such an approach can result in deferral account balances being shifted onto fewer ferry users in the form of larger surcharges.
- (c) **Transparency and accountability** - While BCFS will have the ability to manage the deferral account balances in its discretion so as to encourage fare stability and predictability, BCFS will be subject to a balance ceiling. In the event that the balances reach the designated ceiling, BCFS will be required to clear the accounts within a defined time period. BCFS will continue to report the deferral account balance to the Commissioner on a monthly basis in the same manner as in recent years.

4. BCFS has retained EES Consulting, who are experts in rate design for regulated entities, to advise on industry practice, the regulatory rationale for fuel deferral accounts, and the desired features of a fuel deferral mechanism. EES Consulting has confirmed that fuel deferral mechanisms are consistent with regulatory principles and industry practice, and they have endorsed the proposed Fuel Price Deferral Mechanism. The EES Consulting Report is attached as **Appendix “B”**.

5. BCFS respectfully requests that the proposed Fuel Price Deferral Mechanism be approved on the terms set out in **Appendix “C”**.

## B. Executive Summary

6. The Government introduced *Bill 47 – 2012 Coastal Ferry Amendment Act, 2012* for First Reading on May 9, 2012. It received Royal Assent on May 31, 2012, and will come into force by Regulation.<sup>3</sup> As a result of the passing of *Bill 47*, the *Coastal Ferry Act* now expressly provides for the use of deferral accounts in a new section 41.1:

41.1 (1) The commissioner may

(a) require a ferry operator to establish a fuel deferral account in relation to one or more route groups, and

(b) establish terms and conditions for the use of any fuel deferral account established by the ferry operator.

(2) The commissioner may, on any conditions the commissioner may specify,

(a) allow a ferry operator to add a temporary fuel surcharge, or

(b) require the ferry operator to provide a temporary discount,

to reflect fluctuations in the fuel deferral account for any period.

7. The Commissioner's price cap setting jurisdiction under the *Coastal Ferry Act* has always implicitly included, as part and parcel of its price cap setting powers, the ability to order the use of deferral mechanisms to address fuel price volatility. The effect of the new section 41.1 is to make this jurisdiction express and embodied in a separate, stand-alone provision. Given this recent amendment, it is an appropriate time to bring forward this Application for the Fuel Price Deferral Mechanism for use going forward. *Bill 47* also amended the *Coastal Ferry Act* in other ways that are relevant to this Application. These amendments are discussed further below in the context of the specific aspects of BCFS' proposal, on which they have an impact.

8. In **Part II** of this Application, BCFS addresses the rationale for the deferral mechanism in the context of BCFS. EES Consulting has advised that fuel price deferral accounts are common in rate regulated industries.<sup>4</sup> They also identified generally accepted principles for the use of a deferral account, which include:

(a) the cost cannot be reasonably controlled;

(b) the regulated company is not able to accurately forecast the cost; and

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<sup>3</sup> *Coastal Ferry Amendment Act, 2012*, S.B.C. 2012, c. 28.

<sup>4</sup> See Appendix "B", pp. 3 to 6.

(c) the potential variance between the forecast and actual cost is material.<sup>5</sup>

9. BCFS has no control over the price it pays for fuel. It is also not possible to accurately forecast fuel prices, and variances are inevitable. Variances between the forecast and actual costs of delivered fuel have been material over both PT1 and PT2. It is highly likely that variances will continue to be material for the foreseeable future. In the absence of a deferral account mechanism, these variances represent a windfall for either ferry users or BCFS. The fairest approach is for ferry users to pay the actual price of fuel, no more and no less. The proposed Fuel Price Deferral Mechanism accomplishes this objective in an effective and transparent manner that encourages rate stability and predictability.

10. In **Part III** of this Application BCFS describes the proposed design of the Fuel Price Deferral Mechanism, including the pooled deferral account for multiple route groups, the recording of interest on debit and credit balances, and the mechanisms for managing the balance and clearing the account. EES Consulting endorses the proposed design.

11. **Appendix "A"** summarizes the Commissioner's previous orders in respect of fuel price deferral accounts. Several of the elements of the proposed Fuel Price Deferral Mechanism are already reflected in the existing approved deferral mechanism.

12. **Appendix "B"** is the EES Consulting report.

13. **Appendix "C"** sets out the orders sought.

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<sup>5</sup> See Appendix "B", pp. 3 to 4.

## **II. RATIONALE FOR THE FUEL PRICE DEFERRAL MECHANISM**

14. Cost deferral accounts are commonly approved for use by regulated entities for the purpose of capturing material forecast variances for cost inputs that are volatile and difficult to forecast. Fuel prices fit this description. In this Part of the Application, BCFS discusses:

- (a) general principles that are used by regulators to determine when deferral accounts should be used for cost inputs;
- (b) why, in light of the inherent volatility of fuel oil market prices, mechanisms such as fuel price hedging are not a substitute for fuel price deferral mechanisms; and
- (c) how the general principles support the adoption of the proposed Fuel Price Deferral Mechanism.

EES Consulting's report (**Appendix "B"**) includes further information on industry practice and regulatory principles applicable to deferral accounts that supports BCFS' Application.<sup>6</sup>

### **A. General Principles Regarding the Use of Cost Deferral Accounts**

15. Cost deferral accounts record variances between forecast and actual costs incurred for a particular commodity or other expense during a defined period. A "debit" balance in a deferral account means that a particular cost has been under-recovered through rates or fares, and will have to be recovered from customers/ratepayers at a later date. A "credit" balance in a deferral account means that a particular cost has been over-recovered through rates, and will have to be returned to customers at a later date. In approving the use of a deferral account, the regulator will typically establish rules governing the use of the account, including how and when the balance in an account is to be reflected in future rates.

16. Cost deferral mechanisms address volatility, not the underlying price of the commodity or cost input. They act to "true up" forecast prices to actual prices. Over time, the regulated company pays the actual costs, no more and no less. Likewise, customers (in this case, ferry users) pay the actual costs of the commodity, no more and no less, over time. For this reason, deferral account treatment is seen as a fair way to address volatility in cost inputs. The use of cost deferral accounts is widely accepted by economic regulators

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<sup>6</sup> See Appendix "B", pp. 3 to 6.

such as the British Columbia Utilities Commission, and has been sanctioned by various courts, including the Supreme Court of Canada. EES Consulting states:

It is EES Consulting's opinion that the use of a deferral account mechanism to manage volatility in costs or revenue inputs is consistent with industry practices in rate-regulated industries. Both in Canada and the United States, electric and gas utilities, which are good examples of regulated entities that are exposed to uncontrollable cost inputs, use deferral accounts to manage volatility related to fuel cost uncertainty. Some examples of deferral account and FAC [Fuel Adjustment Clause] designs are provided below.

...

... deferral accounts are consistent with industry practice, and are widely used by regulated entities in circumstances very similar to the circumstances faced by BCFS regarding the price of fuel.<sup>7</sup>

17. As described above, section 41.1 of the *Coastal Ferry Act* now expressly authorizes the use of fuel deferral accounts by ferry operators.

18. EES describes the commonly accepted principles for the use of a cost deferral account as follows:

- (a) the cost cannot be reasonably controlled;
- (b) the regulated company is not able to accurately forecast the cost; and
- (c) the potential variance between the forecast and actual cost is material.<sup>8</sup>

19. As described below, the proposed Fuel Price Deferral Mechanism fits within the three criteria generally employed to assess when deferral account treatment is warranted for cost inputs. The fuel oil prices paid by BCFS are market-driven and cannot be controlled. History has demonstrated that neither BCFS, nor the Commissioner, is able to accurately forecast fuel prices for the purposes of setting price caps. Past variances from the set price have been material and resulted in very significant deferral account balances at times. In the absence of deferral accounts, these variances would have represented windfalls for either BCFS or ferry users.

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<sup>7</sup> Appendix "B", pp. 4 and 6.

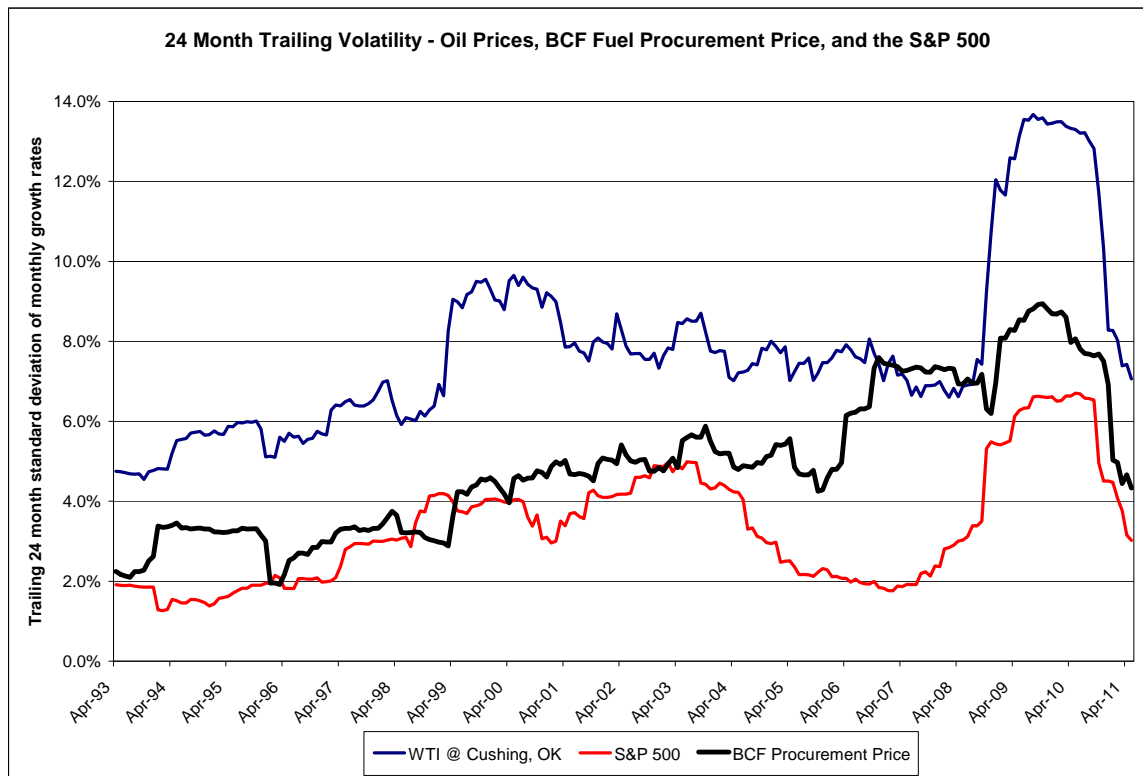
<sup>8</sup> Appendix "B", p. 3 to 4.

20. The significant volatility in fuel market prices and the infeasibility of accurate price forecasting provide a sound basis for approving the proposed Fuel Price Deferral Mechanism.

**B. Fuel Oil Prices Are Market-Driven and Deferral Mechanisms Complement Other Mitigative Measures**

21. The price of the marine diesel (or fuel oil) that BCFS uses to fuel its fleet is market-driven and cannot be controlled by BCFS. Since marine diesel is derived from crude oil, the price volatility of BCFS' fuel oil is a function of the volatility of crude oil prices, refiner margins and the US/CAD foreign exchange rate.

22. Viewing crude oil prices against the S&P 500 index illustrates the degree of volatility in crude oil prices and BCFS' cost of marine diesel.<sup>9</sup> Despite several significant stock market corrections and recoveries since the mid-1980s, WTI crude oil and BCFS' cost of diesel has shown consistently higher price volatility than the S&P 500 index.



<sup>9</sup> For clarity, this figure is to illustrate relative volatility only. It is not intended to suggest any correlation between the S&P 500 and crude oil prices.

23. BCFS has taken three measures in conjunction with employing deferral accounts to mitigate the impact of fuel price volatility on ferry users. These measures, which target both price and volume, are:

- (a) using a competitive procurement process to acquire fuel at fair market prices;
- (b) using a hedging strategy to mitigate the volatility of price that BCFS pays for marine diesel; and
- (c) fuel consumption reduction measures.

As discussed below, while these measures help to mitigate fuel price volatility impacts on ferry users, they are best used in tandem with a Fuel Price Deferral Mechanism.

### ***Fuel Procurement Practices***

24. BCFS runs a competitive procurement process for the supply of fuel to ensure that it receives the best market pricing for the fuel and for delivery of fuel to the Company's ships. While competitive fuel procurement processes help to ensure that BCFS acquires its fuel at competitive prices, no amount of competitive procurement can insulate BCFS from market volatility.

25. In theory, BCFS could mitigate the impact of fuel price volatility by entering into fixed-price contracts with its fuel suppliers for the length of each performance term. A fixed cost per litre for the entire performance term could then be used in the calculation of price caps, eliminating any need for fuel surcharges or rebates. There are two issues with this approach in practice. First, cost-effective fixed-price contracts have not been available to BCFS. Historically, and for the foreseeable future, fuel suppliers are unwilling to lock into pricing for the necessary volumes for any significant period of time. (This is a reflection of the difficulty of forecasting forward prices of fuel oil, which is the same difficulty encountered by BCFS.) Second, in cases where a supplier will offer pricing over longer periods, the pricing has been cost prohibitive. The supplier must include a significant risk premium in its pricing to account for the inherent volatility in the market price of fuel oil.

26. A fuel price deferral account is a means of addressing volatility in market prices in a manner that still promotes relative stability and predictability in fares.



### ***Fuel Price Hedging***

27. With affordable long-term fixed pricing unavailable directly from suppliers, the nearest alternative to mitigate fuel price volatility is hedging in the derivatives market. Derivative contracts can, to some extent, be used to fix the near-term price of fuel. While hedging is a common practice and a prudent method of managing risk, there are limitations, costs and risks associated with hedging that must be considered. First, marine diesel is not available in the capital markets as a financially traded commodity; BCFS must hedge fuel price risk by using a market traded commodity with a high correlation to marine diesel prices. The important point is that a perfect hedge is not possible, and there will always be residual price risk on hedges. Second, there is a transactional cost to hedging; ferry users will always pay a premium for the greater stability that hedging brings. Third, hedging involves risk to ferry users; the corollary of reducing the risk of higher fuel prices through hedging is that there is less potential for ferry users to benefit from lower fuel prices. In this sense, hedging itself can result in an unnecessary surcharge for ferry users. For this reason, BCFS takes a cautious and opportunistic approach to hedging.

28. In short, hedging can be beneficial but, due to its inherent limitations, still leaves room for ferry users to benefit from a fuel price deferral mechanism.

### ***Fuel Volume Consumed***

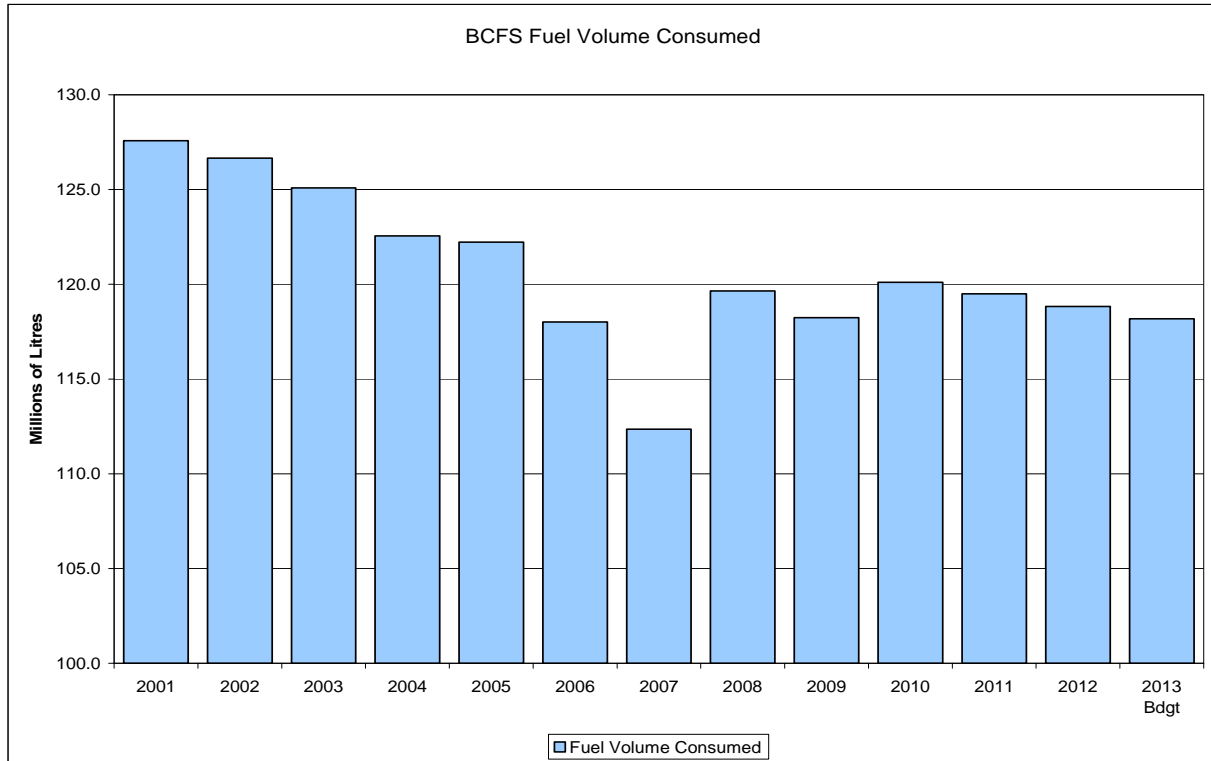
29. BCFS consumes about 118 million litres of marine diesel each year. Fuel is the Company's second largest operating expense. The procurement cost of fuel for fiscal year 2012 was over \$121 million.<sup>10</sup> A 1 cent move in the per-litre cost of diesel will have (approximately) a \$1.2 million impact on the annual procurement cost. During fiscal year 2011, the price of diesel fluctuated by as much as 16 cents per litre. In fiscal year 2012, the price fluctuated by 21 cents per litre. Fuel price volatility can have a significant impact on pricing for ferry users as a result of fuel surcharges and rebates. It can also have an impact on the financial performance of the Company through any ensuing impact on ridership.

30. The following table illustrates BCFS' fuel volume consumed since 2001 and through 2013 (budgeted):<sup>11</sup>

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<sup>10</sup> Note that as the pricing of diesel can be highly volatile, any fuel expense forecast will be subject to change.

<sup>11</sup> Note that the drop in fuel volume consumed showing in FY2007 was a result of the interruption of service associated with the sinking of the Queen of the North.



31. The table above shows that, since fiscal year 2003, fuel consumption has been reduced from over 125 million litres to approximately 120 million litres. The 4% drop was achieved while maintaining the same level of service. At the same time, the cost of fuel has increased by over 2.4 times from \$50 million to the over \$120 million discussed above.

32. In adjudicating final price caps, the Commissioner sets a level of fuel consumption that can be recovered through fares. BCFS is incented to improve on that consumption level. If, for example, BCFS is less efficient and uses more fuel than the amount set in the price cap process, then the amount over the set consumption level is multiplied by the set price for fuel, and BCFS is at risk for that amount (i.e. cannot recover the excess consumption through fares). On the other hand, if BCFS can improve efficiency and consume less than the amount set in the price cap process, then the value of the efficiency is retained by BCFS during the current performance term. The Commissioner will recognize any efficiency gains on a go-forward basis in future performance terms. Accordingly, the issue of establishing appropriate fuel consumption levels for BCFS, and the related issue of how BCFS is incented to use fuel efficiently, is something that is addressed in the price cap setting process, and in BCFS' submission is not a matter that should be considered in an application brought under the new section 41.1.

33. BCFS has taken appropriate steps to manage volumes in past years. BCFS will continue to take these measures. However, these measures do not eliminate the need for a fuel price deferral account. BCFS' operations are fuel intensive. Despite BCFS' successful efforts to reduce volumes, fuel remains a very significant operating expense. Fuel prices are subject to significant volatility. The Fuel Price Deferral Mechanism will help to smooth the inherent volatility in fuel costs for the benefit of ferry users. The issue of BCFS' fuel consumption levels is a matter to be addressed in the price cap setting process and not in the context of this application.

### ***Conclusion***

34. As set out above, one of the commonly accepted criteria for the use of a cost deferral account is that the regulated company cannot control the cost input. The Commissioner has accepted that BCFS has no control over fuel prices since it issued Order 04-02 in 2004. The circumstances that justified the original deferral account mechanism are still present and will remain so for the foreseeable future. BCFS has employed the three measures described above to mitigate the impacts of volatile fuel prices on ferry users. It is not possible, however, to eliminate fuel price volatility. The Fuel Price Deferral Mechanism is an appropriate tool to further moderate the impacts of marine diesel price changes.

### **C. Inherent Difficulty in Forecasting Fuel Prices**

35. Fuel prices are inherently volatile and market prices are unpredictable. Oil prices, to which the price of BCFS' marine diesel is related, have been highly volatile for a prolonged period of time. The available evidence suggests that the volatility will continue. The difficulty of forecasting fuel prices provides the second rationale for the proposed deferral account.

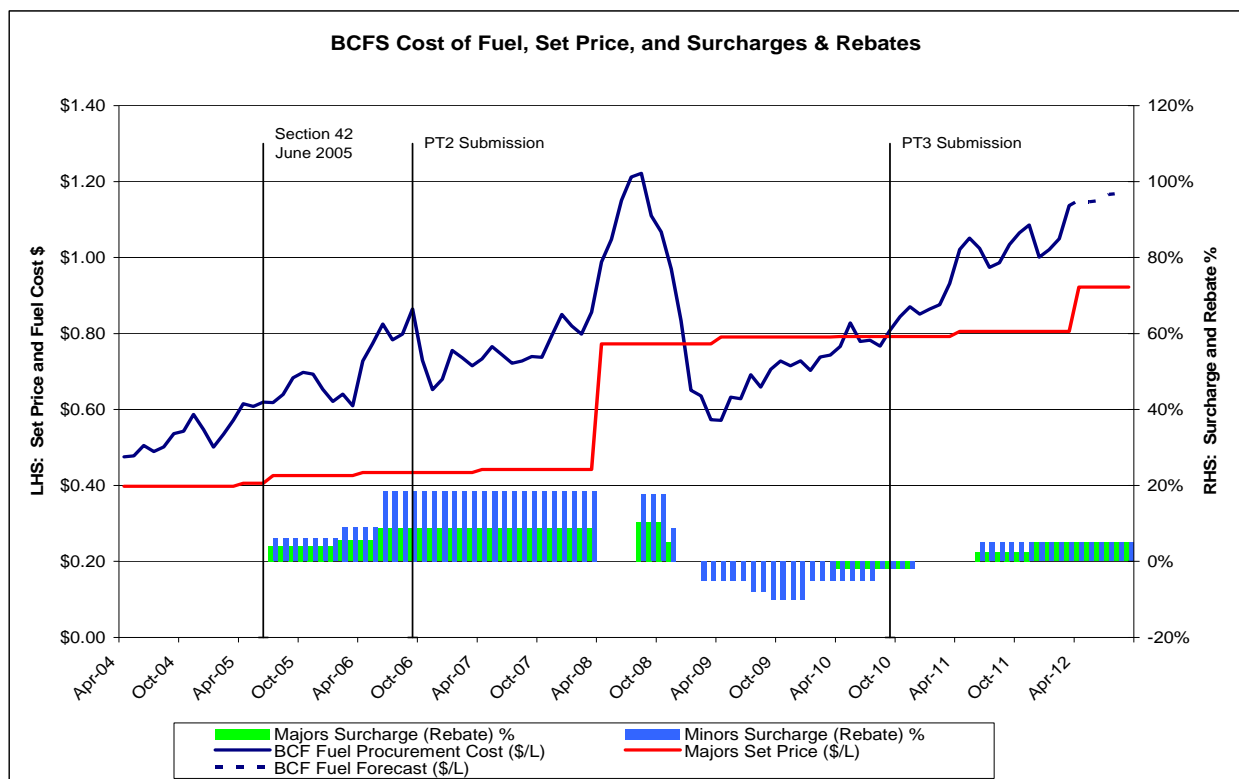
36. The inherent difficulty in forecasting is illustrated by BCFS' past experience. Expert forecasts were used to determine the set price for fuel for each of the three performance terms. Despite the use of these forecasts, there have been material variances between the set price and the realized procurement price. BCFS brought two section 42 applications in the space of four months in 2005 (July 24, 2005 and November 28, 2005), both of which were based on fuel price forecasts from Purvin & Gertz, Inc. (PGI<sup>12</sup>) that proved to be

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<sup>12</sup> Purvin & Gertz, Inc. founded in 1947, is a globally recognized independent energy consultancy with headquarters in Houston, Texas and an international network of offices in the United States, Canada, Europe, the Middle East, Russia and Asia. PGI provides key market information, in-depth analysis and forecasts for supply, demand and pricing of energy products. In November 2011, PGI was acquired by IHS Inc.

dramatically off the mark.<sup>13</sup> The PT2 set price was similarly based on a PGI forecast, and significant variances accrued to the deferral accounts during PT2. The Performance Term Three (“PT3”) set price, as outlined in Commissioner Order 11-02, was based on a blended forecast containing a long-term forecast from Consensus Economics (a survey of professional institutional forecasters), three additional independent forecasters, and the futures curve prevailing at the time leading up to the PT3 submission. This, too, was off the mark.

37. The chart below demonstrates that, since the set price was initiated in April of 2004, there has been significant variation between the expert forecast price for fuel and the delivered fuel price. Fuel prices were lower than the set price for the period spanning from December 2008 to September 2010. The fuel procurement cost for BCFS has been considerably higher than the set prices at other times.



38. A set price must necessarily be founded on a forecast of prices for several years into the future. Yet, it is unreasonable to expect that anyone, even experts like PGI, can ever forecast fuel prices four years out with 100% accuracy. There will always be a variance. In

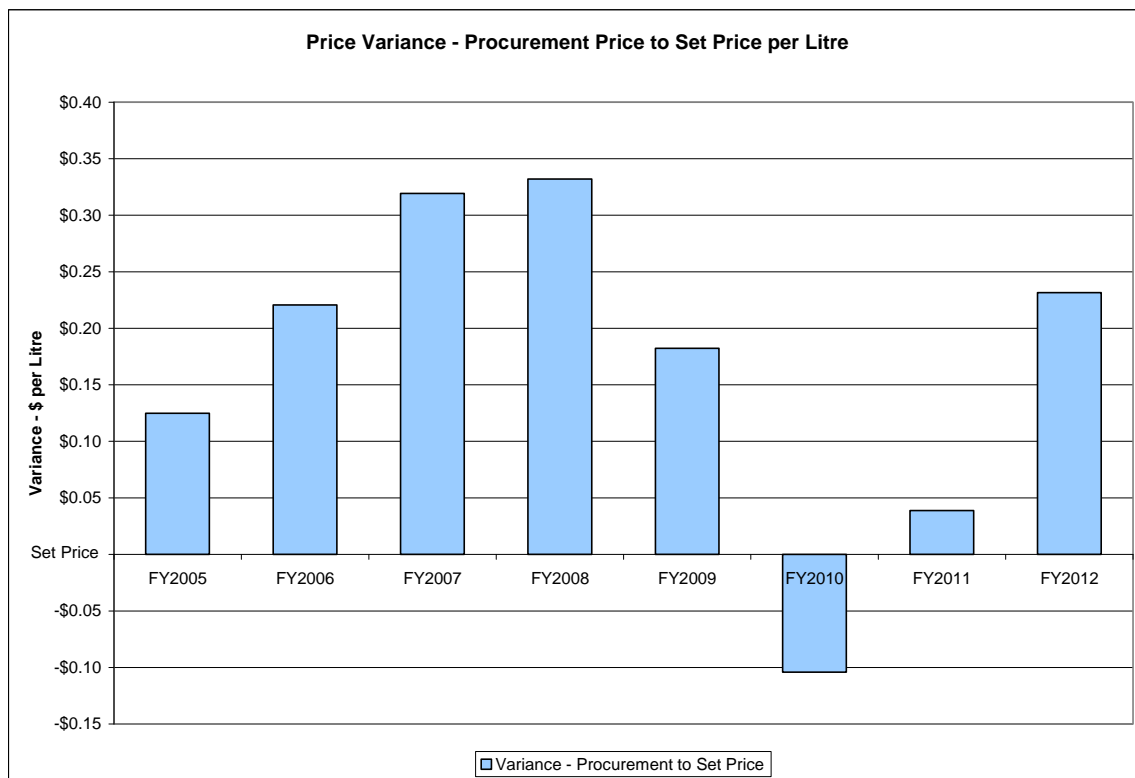
<sup>13</sup> For the July 24th surcharges, which was the result of a June 2005 Section 42 application, the Commissioner also considered forecasts from major Canadian banks.

the absence of a deferral mechanism, ferry users would obtain a windfall where fuel prices exceed the set price. BCFS would receive a windfall where the actual price falls below the set price. The fairest approach for both ferry users and BCFS is one where there are no windfalls, i.e. when both BCFS and ferry users pay for the actual price of fuel, no more and no less. The proposed Fuel Price Deferral Mechanism will achieve this equitable outcome.

**D. Forecast Variances Have Been “Material”**

39. The materiality of the variances between forecast and actual fuel prices further supports the use of the proposed Fuel Price Deferral Mechanism.

40. The following figure uses the set price per litre as a proxy for fuel price forecasts. Since the deferral accounts and set price were established, there has been only one year (FY2011) in which the annual forecast error has been less than 5 cents per litre on average. Even during FY2011, the price fluctuated by as much as 16 cents per litre.



41. Given BCFS’ significant fuel consumption, the dollar impact of a forecast error of the magnitude illustrated above is substantial. Using actual volume purchased, the excess cost of fuel procurement over the set price was approximately \$29 million in PT1. The PT2

variance was \$10 million over the set price despite containing a year with a positive variance to set price.

42. The material variances are likely to continue. Among the 63 professional forecasters surveyed by Consensus Economics, the April 2013 forecast price for WTI ranged from a low of US \$85 per barrel to a high of US \$125 per barrel.<sup>14</sup> The disparity of opinion is indicative of the difficulty in prediction as well as the expectation of continued volatility. It speaks to the likelihood of material variances from the set price. In the absence of a deferral mechanism, these variances will represent a windfall for either the BCFS or ferry users. The Fuel Price Deferral Account achieves a more equitable result.

#### **E. Conclusion**

43. BCFS' operations are fuel intensive and BCFS cannot reasonably control marine diesel prices. It is not reasonable that anyone, including BCFS and the Commissioner, can accurately forecast prices and arrive at an accurate set price that avoids material variances. In these circumstances, a fuel deferral account is necessary and achieves a fair outcome for both ferry users and BCFS. In the following section, BCFS outlines the features of the proposed Fuel Price Deferral Mechanism.

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<sup>14</sup> Consensus Economics Inc., May 14, 2012, Consensus Forecast.

### **III. ELEMENTS OF THE PROPOSED FUEL PRICE DEFERRAL MECHANISM**

44. This section outlines the features of the proposed Fuel Price Deferral Mechanism. BCFS reassessed the current deferral account design “from the ground up”, with input from EES Consulting. BCFS has determined that aspects of the framework put in place by Memorandum 24B remain appropriate and should not be changed. However, the proposed Fuel Price Deferral Mechanism reflects some important enhancements. Overall, BCFS believes that the proposed Fuel Price Deferral Mechanism:

- (a) is fair and equitable to both ferry users and the Company;
- (b) ensures that actual fuel costs are recovered from ferry users over time in a way that promotes fare stability and predictability; and
- (c) provides transparency and accountability.

45. The key elements of the proposed Fuel Price Deferral Mechanism are as follows:

- (a) a single fuel price deferral account for all route groups, subject to further order of the Commissioner to segregate particular routes or route groups;
- (b) a set price for fuel;
- (c) all variances from the set price for fuel will be transferred to the fuel price deferral account;
- (d) the fuel price deferral account balance will be reported to the Commissioner on a monthly basis;
- (e) interest will be charged/credited to ferry users on the deferred balances;
- (f) flexibility for BCFS to apply, adjust or remove fuel surcharges or rebates as it considers appropriate, subject to an upper limit threshold on the deferral account balance (a “trigger”), which if reached requires BCFS to clear the balance in the account within a specified amount of time;
- (g) BCFS shall ensure that the balance in the fuel deferral account reaches \$0.00 (zero dollars) at least once every 24 months; the time period within which

BCFS is required to zero the balance of the deferral account shall be reset each time the deferral account balance reaches \$0.00;

- (h) a percentage cap on the amount of any fuel surcharge appearing on fares; and
- (i) a communications protocol for the implementation of surcharges.

46. The specific order sought is set out in **Appendix "C"**.

**A. A Single Fuel Deferral Account For All Route Groups**

47. BCFS' proposal is to use a single fuel deferral account for all route groups.

48. The fuel price deferral accounts in place since 2004 have each been associated with a particular route group. The basis for this approach was sections 38(1)(e) and 41(4) of the *Coastal Ferry Act*, which provided as follows:

38(1)(e) cross subsidization from major routes to other designated ferry routes is

- (i) to be eliminated within the first performance term of the first Coastal Ferry Services Contract to be entered into under this Act, and
- (ii) before its elimination, to be minimized;

...

41(4) The commissioner must set the price cap for each route group without reference to the price cap set for any other route group operated by the ferry operator.

49. These provisions necessitated separate deferral accounts for each route group. Separate deferral accounts were required to ensure that, for example, a major route group that had a significant credit balance did not subsidize another designated ferry route that would otherwise have a deferral account with a debit balance. Separate deferral accounts also facilitated compliance with the requirement that price caps were to be set for each route group without reference to the price cap set for any other route group because the accounts kept the fuel costs for each group segregated.



50. Both of these provisions of the Act have been repealed by *Bill 47*.<sup>15</sup> There is no longer any need or justification for separate deferral accounts. On the contrary, the removal of these provisions demonstrates a legislative intent to allow for cross-subsidization among route groups where appropriate. Section 41.1 expressly provides that a fuel deferral account may be established “in relation to one *or more* route groups”. BCFS sees value in a single deferral account that “pools” the impact of price volatility, as it permits BCFS to share the balances more equitably among all ferry users. The equitable recovery mechanism is discussed later in this Application.

51. The order sought recognizes the potential for the Commissioner to create a sub-account should the need arise.

52. A debit balance in the fuel deferral account will mean that fuel costs have been deferred, in that fuel already consumed is still to be paid for, e.g. by surcharges levied on future customers. This can occur, for instance, in the context of rapidly rising prices, where fuel surcharges have yet to be implemented to offset the price increases. Under the proposed Fuel Price Deferral Mechanism, BCFS has the ability to delay or advance the implementation of a surcharge where it makes sense to do so, for instance to achieve a more equitable distribution of the balance among ferry users or enhance fare stability.

53. A credit balance is to be returned to customers. A credit balance might accrue for a variety of reasons. For instance, a credit balance will accrue if the actual delivered price of fuel is less than the set price. A credit balance might accrue if fares have more than paid for fuel consumed in the past. A credit balance might also accrue if BCFS levies a surcharge in anticipation of rising prices, for the purposes of smoothing fares or distributing the impact among ferry users in an equitable manner. Other circumstances might exist.

54. Deferral account balances will include realized gains and losses from fuel hedging, and will exclude unrealized gains or losses on fuel hedging contracts.

## **B. Continued Use of Set Price for Fuel**

55. The Fuel Price Deferral Mechanism includes the use of a “set price” for fuel to determine the amount of fuel costs charged to operations. The use of a set price is necessary in order to provide the baseline against which fuel price variances are

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<sup>15</sup> See sections 2(c) and 4(a) of *Bill 47*.

established. The current deferral mechanisms approved in Memorandum 24B also use a set price. The set price for fuel will be as specified by the Commissioner.

### **C. Variances Recorded in the Deferral Account**

56. BCFS is proposing that all variances from the set price for fuel accrue to the deferral account. This represents a change from the existing framework under Memorandum 24B. Memorandum 24B incorporates a “bandwidth”, the effect of which is to require BCFS to remain at risk for a portion of the differential between the set price of fuel and the actual price of fuel. Fuel price fluctuations from the set price of up to 5 cents per litre were to be shared with ferry users.<sup>16</sup> BCFS submits that the rationale for putting a deferral account in place also speaks to the fairness of charging the full variance to the deferral account.

57. The bandwidth implicitly assumes that the set price forecast was accurate, and *requires* the Commissioner to forecast with reasonable accuracy in establishing a set price to avoid unfair consequences for ferry users or BCFS. If the set price for fuel is too low, then BCFS will absorb its share of the bandwidth and will never receive the offsetting benefit of a windfall. If the set price for fuel is set too high, then BCFS will receive a windfall and will not have to absorb any portion of costs over the set price. The problem with this situation is that, as history has demonstrated, it is not possible to forecast fuel prices with any degree of certainty. There have been material variances between the delivered price of fuel and the set price of fuel in every year since the set price has been in use. The delivered price of fuel has been over the set price for a majority of the time since 2004. In short, the bandwidth places an extraordinary burden on the Commissioner to establish a “fair” set price, which experience has demonstrated cannot be done with any reasonable amount of accuracy.

58. While ferry users can be, and in fact have been, short-term beneficiaries of the use of the bandwidth, the nature of markets are such that ferry users could just as easily be subject to overpaying for fuel under the bandwidth mechanism in future years. Furthermore, the short-term benefit of the bandwidth to ferry users has long term implications that are not in the interests of ferry users. Sustained losses as a result of the bandwidth can lead to the erosion of BCFS’ equity, which can result in higher borrowing costs to BCFS that have to be recovered through fares. The fairest outcome for ferry users and the Company, and the outcome that is in the long-term interests of all concerned, is to avoid windfalls by requiring ferry users to pay no more and no less for fuel than its delivered price.

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<sup>16</sup> Memorandum 24B, p. 2.

59. The current fuel price volatility that BCFS is experiencing is expected to continue, making it all the more important that the bandwidth is eliminated.

60. The original rationale for the bandwidth no longer holds. In Order 05-02, the Commissioner stated that BCFS should absorb a portion of increased fuel costs as an “ordinary increase” that would not be flowed through to customers.<sup>17</sup> This rationale was premised on adjustments only being authorized as extraordinary price cap increases under section 42 of the Act. While BCFS considered this rationale to be invalid at the time, the passage of section 41.1 now confirms that a fuel deferral account can be used for routine (or “ordinary”) variances in fuel costs, and that there is no legislative “requirement” (BCFS does not believe there ever was one) for BCFS to absorb “ordinary” variances.

61. The Commissioner’s original rationale for the bandwidth in PT1 was also that, with a full flow-through of costs to ferry users, “BC Ferries loses the incentive to use fuels more efficiently”.<sup>18</sup> As described above, BCFS has already taken measures to reduce fuel consumption. The main option available to BCFS to respond to price variances within a performance term, short of proposing to reduce services, is to hedge greater portions of its fuel requirements at any amount less than the set price, regardless of whether that is in the long-term best interests of ferry users. BCFS does not believe that the bandwidth “incentive” was intended to have this effect. BCFS respectfully submits that the bandwidth can no longer be justified on these bases.

62. The Act is premised on ferry operators being able to recover their costs, subject only to the efficiency factor.<sup>19</sup> BCFS currently uses marine diesel fuel to run its fleet. BCFS procures its fuel through a competitive process that is designed to ensure that BCFS acquires its fuel at competitive prices, and it employs a prudent hedging strategy. BCFS should be able to recover costs prudently incurred when fuel prices are high, and ferry users should not be deprived of the benefit when fuel prices are low. Recording the full variance from the set price in the deferral account achieves a fair result for both ferry users and BCFS.

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<sup>17</sup> Order 05-02, Schedule A, p. 8 of 11.

<sup>18</sup> Order 05-02, Schedule A, p. 7 of 11: “If changes in fuel prices are allowed full pass-through to ferry customers, then BC Ferries loses the incentive to use fuels more efficiently. An increase in the price of fuel is the means by which a market economy signals the need for greater efficiency. The intent of price cap regulation has been to allow market price signals to operate as much as possible on regulated firms, while preventing exploitative returns. Thus, a regulatory policy which would remove any incentive for efficiency on the part of BC Ferries would seem to be counter to the purpose of price cap regulation.”

<sup>19</sup> Section 41(2)(a)(i).

63. BCFS is proposing that, as part of the adoption of the Fuel Price Deferral Mechanism, the opening deferral account balance be adjusted to reflect the full variance from the set price during the initial months of the current Review Performance Term up to the date of the Commissioner's Order on this Application.

64. EES Consulting confirms that BCFS' proposal to eliminate the bandwidth is consistent with standard regulatory practice:

EES Consulting is not aware of any other regulated entity that is subject to a dead-band and sharing mechanism similar to the one put in place by Memorandum 24B for BCFS. In all situations, the fuel cost deferral accounting mechanism is designed such that the regulated entity receives a dollar for dollar adjustment through the deferral mechanism, so that the customer pays no more and no less than the fuel cost. As discussed in the next section, full recovery without any dead-band makes much more sense in the context of general rate making principles.

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The most important principle that should be reflected in the design of an effective deferral account mechanism is the principle that BCFS should be allowed to recover sufficient revenues to meet costs. Generally speaking, regulators only deny a regulated entity full cost recovery in rare situations, such as where the expenditure at issue was not part of normal operations of the entity and the regulated entity did not request prior approval where required to do so, or if the regulated entity incurred a cost imprudently. A determination of imprudence implicitly requires that the regulated entity has the ability to reasonably impact the cost. This is not normally going to be the case with inputs determined by market prices. As such, it is common for deferral account mechanisms to be used to ensure that the regulatory principle of full cost recovery is respected. In BCFS' case the price of fuel should be a flow through if it is to be consistent with regulatory principles. It is not standard regulatory practice to disallow recovery of operating costs, such as fuel costs.<sup>20</sup>

#### **D. Monthly Reporting**

65. BCFS is proposing to report the fuel deferral account balance to the Commissioner on a monthly basis in a form similar to the reporting currently provided. Monthly reporting will provide transparency and ensure that the Commissioner has the information necessary to meet his obligations under the *Coastal Ferry Act*.<sup>21</sup>

#### **E. Interest on Deferral Account Balances**

66. BCFS proposes to charge interest on the debit balances in the deferral accounts, and credit ferry users with interest on credit balances. The interest on debit balances

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<sup>20</sup> Appendix "B", pp. 6 and 7.

<sup>21</sup> BCFS is a reporting issuer subject to securities regulation, and as such must provide the off-quarter reports on a confidential basis in order to ensure compliance with securities regulations.

compensates BCFS for the carrying costs on fuel purchases for which it has yet to recover from ferry users. The interest on the credit balances recognizes that BCFS will have access to funds collected from ferry users that must be repaid.

67. Reciprocal treatment, based on the same interest rate for both credit and debit balances, is equitable to ferry users and BCFS.

68. The proposed interest rate is the weighted average effective interest rate of the debt portfolio, excluding loans entered into to support the procurement of specific assets, as at the previous fiscal year end. This reflects a fair and reasonable estimate of the annual cost of general borrowing that BCFS will incur over the next twelve months. The use of the year end rate will be easily calculated through information available in the financial statements, and thus enhances the transparency of the process.

#### **F. Account Clearing**

69. BCFS' experience with fuel cost volatility has demonstrated the importance of BCFS having the discretion to apply, adjust or remove fuel surcharges or rebates without having to wait for a specific date or target balance in order to begin clearing the deferral account. Under the original mechanism established by the Commissioner for PT2<sup>22</sup>, BCFS could not implement surcharges until the deferral account balance(s) hit a trigger of 2% of revenue. The problem with this approach emerged in Q1 of 2009 when there was an unprecedented rise in fuel prices. BCFS found that, while the deferral account balances increased rapidly, it was going to take some time before they would reach the trigger of 2% of revenue. The build up of the fuel deferral accounts during summer and fall of 2009 with no offsetting fuel surcharges for several months would have triggered substantial fuel surcharges by December 2008 (an off-peak time) under the mechanism.

70. Relying solely on a trigger mechanism that automatically implements a surcharge or rebate upon hitting a particular threshold amount can result in undesirable lag in the imposition of a surcharge or rebates. It can result in BCFS having to impose surcharges or rebates in an off-peak time when the balance accrued as a result of fuel consumption during a peak time, which means that the surcharges or rebates necessary to clear the deferral accounts must be higher because there are fewer ferry users during off peak times. It is therefore important for BCFS to have the flexibility to apply rebates or surcharges in its discretion so that BCFS can manage the balances with timely surcharges and rebates that

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<sup>22</sup> Memorandum 24.

encourage relative rate stability and predictability and are not unduly burdensome on ferry users. BCFS' proposed Fuel Price Deferral Mechanism contemplates that BCFS should continue to apply, adjust or remove fuel surcharges or rebates at any time and in its discretion.

71. As described in **Appendix "A"**, the Commissioner issued further orders (Memoranda 24A and 24B) to adjust the deferral mechanisms to respond to these difficulties. The solution adopted by the Commissioner was to also give BCFS flexibility to manage the deferral account balances within a defined range. BCFS was thus able to impose surcharges and rebates as required to promote rate stability and predictability and manage the size of the balances. It is not in the interest of ferry users to return to the inflexibility inherent in the original deferral mechanism outlined in Memorandum 24; there is considerable value for ferry users in BCFS continuing to exercise prudent management of the balances through surcharges and rebates.

72. Although BCFS has discretion under the Fuel Price Deferral Mechanism to implement rebates and surcharges without prior consent of the Commissioner, there are appropriate checks and balances. The first check is the trigger mechanism. It remains in place as the outside limit on the balance. The trigger encourages accountability and transparency, as it provides both ferry users and the Commissioner with an assurance in the form of a legal requirement that BCFS will manage the deferral account balances so that they do not get too large. Other checks include the monthly reporting discussed in section III.D, and the cap on the size of rebates and surcharges that is discussed in section III.G below.

73. The structure of the proposed trigger mechanism is as follows:

- (a) if the month end balance in the fuel deferral account is a debit balance which exceeds X% of the annual pre-surge tariff revenue ("the X% trigger") for all route groups, BCFS will adjust the fuel surcharge/rebate to eliminate the fuel deferral account balance, including the expected growth in the balance, over the following 12 months;
- (b) if the month end balance in the fuel deferral account is a credit balance which exceeds the X% trigger, BCFS will have a grace period of one quarter to reduce the credit balance below the X% trigger; and

- (c) BCFS shall ensure that the balance in the fuel deferral account reaches \$0.00 (zero dollars) at least once every 24 months; the time period within which BCFS is required to zero the balance of the deferral account shall be reset each time the deferral account balance reaches \$0.00.

74. These triggers will function as ceilings that are intended only to place an upper limit on the deferral account balance. BCFS' intention is to manage the deferral account balance within (i.e. below) the trigger and to not let a situation arise where the trigger is engaged. In this way, the trigger is intended to function as a safeguard for ferry users.

75. The difference in the times required to clear debit and credit balances that is reflected in the above proposal reflects past practice. Should the Commissioner see value in having a symmetrical approach to the time periods that are required for clearing balances when the triggers are reached, then an alternative would be for a credit balance to be cleared over the following 12 months (as opposed to a period of one quarter). BCFS believes that the alternative approach would afford the company more opportunity to apply fuel rebates in a more strategic manner to encourage traffic growth, without creating a significant intergenerational transfer.

76. BCFS has considered the appropriate percentage to use for the trigger mechanism. A 2% trigger has worked well to date, as it provides BCFS with a reasonable amount of flexibility within which to manage the balances, while still providing a reasonable outside limit on the size of the balances. This was the rationale for why 2% was originally adopted by the Commissioner. BCFS has determined that a trigger of 1% should not be adopted, as it unduly limits BCFS' flexibility to impose surcharges and rebates at times, and in the amounts, that best encourages fare stability and predictability over time. BCFS believes that a 1% trigger will lead to similar issues that were experienced with the initial mechanism established by Memorandum 24. The implication of a change from 2% to 3% is that there will likely be fewer surcharges and rebates. This brings the benefit of greater rate stability for ferry users. The flipside is that a 3% trigger allows for bigger deferral account balances to accrue before the implementation of a forced surcharge or credit. As a result, while there may be fewer surcharges/rebates, they may end up being larger if and when applied. As there are pros and cons with both a 2% trigger and a 3% trigger, BCFS does not take a position as to which of these two approaches should be adopted. Regardless of the trigger selected, as stated above BCFS will endeavour at all times to manage the deferral account balance without engaging the trigger.

77. BCFS' proposed approach to managing the deferral account balance benefits both ferry users and BCFS. First, BCFS' flexibility to align fuel surcharges and rebates with the timing of the cause of the surcharge (i.e. a price spike) will permit BCFS to keep the amounts of the surcharges lower than they would otherwise be with a more rigid trigger mechanism in place. This should result in more stable and predictable fares, which benefits ferry users. The ability to reduce fare volatility can ultimately have a beneficial impact on ridership, which is in the interests of both BCFS and ferry users. Second, aligning the surcharge or rebate with the event that is giving rise to the rebate or surcharge is equitable. It will help to reduce the understandable frustration and confusion among ferry users who must pay a fuel surcharge months after a price spike.

#### **G. Uniform Fuel Surcharges Within Fuel Surcharge Cap**

78. BCFS' proposal is that surcharges and rebates will be applied as a percentage of fares that applies equally to all routes, and that BCFS will have the ability to apply, adjust or remove fuel surcharges to a maximum of 15% of fares.

79. BCFS' proposal that surcharges and rebates be applied equally to all routes means that any ferry user, regardless of the route on which he or she travels on a given day, will pay a fuel surcharge/receive a rebate based on the same percentage of the ticket price paid. For example, in response to a spike in the price of fuel cost, BCFS may apply a 5% surcharge. In that situation, a surcharge equal to 5% of the fares for all routes in operation at that time would be imposed across the board (i.e. to all routes). The proposed approach is equitable and fair to all ferry users, as the price volatility that is driving the surcharge or rebate is affecting every route in the same way.

80. The proposed 15% surcharge cap is another mechanism that imposes a check on the discretion conferred on BCFS to manage the account effectively within the triggers. The surcharge cap is a feature of the existing framework in place pursuant to Memorandum 24B. The existing caps are 10% for the Major Routes and Route 3 and 15% for the Minor Routes. Memorandum 24B requires that BCFS bring an application to the Commission for approval of any fuel surcharge over these amounts. The intent is to ensure that the Commissioner retains a level of control over the amount of fuel surcharges, and that any surcharges needed for extraordinary fuel price increases are dealt with through a transparent regulatory process. BCFS believes that the rationale for the use of fuel surcharge caps is sound. It is in the interests of ferry users and BCFS alike that the use of surcharge caps be continued as part of the Fuel Price Deferral Mechanism.



81. BCFS will bring an application for any increase in fuel surcharges above the fuel surcharge caps established as a result of this Application.

#### **H. Notice Period for Surcharge/Rebate Adjustments**

82. It is important from the perspective of transparency for ferry users that they receive reasonable notice of fare increases. BCFS proposes that it should be required to give at least 15 days public notice of: (i) the imposition of a fuel surcharge, (ii) an increase in fuel surcharges, (iii) the removal of an existing rebate, or (iv) a decrease in the amount of an existing rebate.

83. BCFS proposes to forego public notice of decreases associated with: (i) the removal of a surcharge, (ii) a reduction in the amount of a surcharge, or (iii) the introduction of a rebate, or (iv) an increase in the amount of a rebate. Decreases in fares do not give rise to the same concerns among ferry users as increases in fares.

84. BCFS believes that this notice provision is appropriate and fair to the public and should be adopted.

#### **I. EES Consulting Review of Fuel Price Deferral Mechanism**

85. BCFS engaged EES Consulting to review its proposed Fuel Price Deferral Mechanism, and to provide its independent expert opinion on whether the proposed design is fair and reasonable to ferry users and to BCFS. As part of its considerations, EES Consulting was asked to discuss the ratemaking considerations and principles that should be reflected in the design of an effective deferral mechanism to address fuel prices.<sup>23</sup>

86. In its report, EES Consulting lists seven guiding principles that should be reflected in the design of an effective deferral mechanism for fuel price costs.<sup>24</sup> EES Consulting's assessment of the Fuel Price Deferral Mechanism is as follows:

Based on the seven principles above, BCFS' proposed deferral account mechanism is fair and reasonable and in the interest of both the ferry users and BCFS. It is recommended that BCFS continue the use of a fuel cost deferral account for regulatory purposes. In addition, it is recommended that the full forecast variance from the set price accrues to the deferral account for recovery from/return to ferry users.<sup>25</sup>

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<sup>23</sup> EES Consulting was also asked to discuss whether the use of cost-based deferral account mechanisms to manage volatility in cost inputs is consistent with industry practice in rate-regulated industries. EES Consulting's conclusions on that issue have been discussed above.

<sup>24</sup> The seven principles are listed at pp. 6 to 7 of the EES Consulting Report (Appendix "B").

<sup>25</sup> Appendix "B", p. 8.

87. For EES Consulting's detailed assessment of how the Fuel Price Deferral Mechanism reflects the seven principles listed in its Report, please see pages 7 to 10 of the EES Report found at **Appendix "B"**.

#### **IV. CONCLUSION**

88. BCFS' operations are fuel intensive, and BCFS cannot reasonably control fuel prices. The Commissioner cannot reasonably be expected to forecast fuel prices accurately in determining a set price. The variances between the set and delivered prices for fuel from 2005 through 2012 have been significant. The existing deferral mechanism has helped to address fuel price volatility and encourage rate stability and predictability; however, there is room for improvement.

89. The Fuel Price Deferral Mechanism advances important principles for the mutual benefit of ferry users and BCFS:

- (a) **Fair and equitable as between ferry users and BCFS** - The full forecast variance is captured in the deferral account. Ferry users pay the actual price of fuel, no more and no less. BCFS receives the actual price of fuel, no more and no less.
- (b) **Fair and equitable as among ferry users** - The deferred balances are pooled, and ferry users on all routes pay the same percentage surcharge on their fare / receive a rebate in the same percentage of their fare. The flexibility accorded to BCFS to manage the timing and size of surcharges and rebates allows for a closer link between the cause of the deferred balances and the ferry users from whom the balance is recovered.
- (c) **Promotes fare stability and predictability** - A deferral account reduces the need for immediate price changes in periods of volatile fuel prices. BCFS will have flexibility to implement surcharges and rebates, rather than employing an automatic trigger that permits larger balances to accrue or requires balances to be recovered during off-peak times when surcharges and rebates must be larger.
- (d) **Provides for transparency and accountability** - BCFS reports monthly to the Commissioner. There are caps on both the size of the balances and the amount of surcharges. Notice is provided to ferry users of all increases in fares.

90. EES Consulting has confirmed that fuel deferral mechanisms are consistent with regulatory principles and industry practice, and they have endorsed the proposed Fuel Price Deferral Mechanism. The specific orders sought in this Application are set out in **Appendix "C"**. BCFS respectfully submits that the orders sought in this Application should be approved.

## **APPENDIX "A" – PAST ORDERS**

91. This Appendix provides a review of past orders relating to fuel price volatility for background purposes. The process to arrive at effective deferral mechanisms has been one of trial and error, and continuing refinement. The deferral accounts themselves have been unchanged since they were established in 2004. The focus of the refinements has been on ensuring that the deferral accounts can be cleared in a timely manner, while preserving relative fare stability and predictability. Most of the elements of the proposed deferral accounts are already incorporated in the existing mechanism.

92. Performance Term One ("PT1") commenced on April 1, 2003.

93. In September of 2004, as a result of increasing volatility in world fuel oil prices, BCFS filed a proposal with the Commissioner for approval of a regulatory deferral account mechanism. By Order 04-02, issued September 28, 2004, the Commissioner authorized BCFS to establish fuel deferral accounts that operated as described in Schedule A to that Order. Schedule A provided that for the year commencing April 1, 2004, ferry operators shall charge to operating expenses, by route group, fuel oil costs calculated as the delivered price per litre budgeted for 2004/05 (the "set price") multiplied by the actual litres consumed, with the variance between the set price for fuel oil established for each route group and the actual delivered price per litre to be held, by route group, in the deferral accounts. The balances in the deferral accounts at the end of PT1 would be taken into account in setting the allowable price cap increases for Performance Term Two ("PT2").

94. In a memorandum to BCFS dated April 28, 2005 ("Memorandum 13"), the Commissioner advised that he was concerned about increasing fuel costs leading to significant balances in the deferral accounts, which would need to be recovered in PT2. To address this concern, the Commissioner suggested that BCFS file a section 42 application for an extraordinary price cap increase.

95. In response to Memorandum 13, on June 10, 2005, BCFS filed a section 42 application for extraordinary price cap increases of 8% for Route Group 1 and 13% for Route Groups 2, 3, 4, 5 and 6 that would be recovered through the use of fuel surcharges added on to passenger fares. In the application, BCFS reported that due to extraordinary increases in fuel oil prices the aggregate balance in the deferral accounts had reached \$8.0 million for F2004/2005, which was significantly more than the \$5.3 million negative balance that was forecast when the deferral accounts were established. BCFS forecast that if

the price caps and proposed fuel surcharges were not implemented, then the aggregate balance in the accounts would reach \$53.9 million by the expiry of PT1.

96. By Order 05-02, issued July 24, 2005, the Commissioner determined that an extraordinary situation existed due to the extraordinary increase in fuel costs. He granted an extraordinary price cap increase of 4% for Route Group 1, and 6% for Route Groups 2 through 6, effective July 25, 2005, and approved the use of fuel surcharges to recover the increases. In the reasons for decision accompanying Order 05-02, the Commissioner stated that BCFS should absorb a portion of increased fuel costs into its operations statement as an "ordinary increase" that would not be flowed through to customers. The Commissioner's determination was that BCFS' portion of fuel price increases that should be absorbed by the company is a 5% variance above the originally expected price as defined by the set price in Order 04-02.

97. The price of fuel oil in the summer of 2005 was significantly higher than the April 2005 forecast fuel oil price upon which the June 2005 section 42 application was based. As a result, notwithstanding the extraordinary price cap increases authorized by Order 05-02 and the fuel surcharges implemented immediately thereafter, the aggregate deferral account balance for the six route groups (which was \$8 million as of April 1, 2005 and \$15.2 million as of July 31, 2005) increased to \$18.3 million as of October 31, 2005. This represented an increase of 20% from July, whereas it had been anticipated that the fuel surcharges implemented on July 25, 2005 would limit the increase to 3% during that same period.

98. As a result of increasing fuel oil prices, on November 28, 2005, BCFS filed another section 42 extraordinary price cap increase application. On the basis of the fuel oil prices since Order 05-02 and BCFS' forecast of fuel oil costs to 2008, BCFS forecast that the aggregate deferral account balance as at March 31, 2008, would be \$33.2 million, rather than being reduced to or moving towards zero as contemplated in Order 05-02. BCFS proposed price cap increases and corresponding fuel surcharge increases sufficient, based on then current forecasts, to reduce the balance in the deferral accounts to (or close to) zero by March 31, 2008. By Order 05-06, issued January 20, 2006, the Commissioner determined that an extraordinary situation existed due to the extraordinary increase in fuel prices, and granted an extraordinary price cap increase of 1.5% for Route Group 1, and 3% for Route Groups 2 through 6, effective February 1, 2006. Order 05-06 also provided that the price caps could be further increased by operation of a formula described in the

Order, subject to the Commissioner receiving from BCFS a filing comparing actual and forecast fuel prices by no later than June 7, 2006.

99. Consistent with Order 05-06, BCFS presented to the Commissioner fuel forecasts that demonstrated market expectation of continued high fuel prices through PT1.

Order 06-03, issued June 19, 2006, increased the price caps for all route groups according to the formula that the Commissioner had established in Order 05-06. The increase for Route Group 1 was 3.2% and for Routes Groups 2, 3, 4 and 6 the increase was 9.6%.

100. The learning from PT1 was that an automatic surcharge mechanism was necessary to manage the fuel deferral account balances. This idea was reflected in Memorandum 24, which was issued by the Commissioner on March 30, 2007, as part of his preliminary price cap determination for PT2. Memorandum 24 continued the use of a "set price" for fuel to determine the amount of fuel costs charged to operations for price cap purposes with a "bandwidth" for fluctuations of up to 5 cents/litre to be absorbed by BCFS. The fuel deferral accounts for the route groups were maintained, and the cost of price fluctuations beyond one half of the range of 5 cents/litre above or below the set price, calculated on a monthly basis, were to be transferred to deferral accounts by route group. The Commissioner also established an automatic adjustment mechanism for implementing fuel rebates and surcharges.

101. PT2 commenced on April 1, 2008.

102. The set price for fuel was adjusted up for PT2 to reflect the experience and the expert view at the time of future fuel prices. Unfortunately, the process established by Memorandum 24 did not provide adequate flexibility to address the unprecedented rise in fuel prices in Q1 of fiscal year 2009 (spring 2008) when fuel hit a price of over \$1.20 a litre in August of 2008. Deferral account balances increased rapidly but were still below the Memorandum 24 trigger of 2% of revenue. The build up of the fuel deferral accounts with no offsetting fuel surcharges for several months would have triggered substantial fuel surcharges by December 2008 under the mechanism set out in Memorandum 24, during off-peak times.

103. As a result, the Commissioner issued Memorandum 24A on July 22, 2008, to provide increased flexibility and timeliness in responding to rapid and dramatic changes in fuel prices. However, it was subsequently determined that the mechanism provided by Memorandum 24A did not accomplish its intended purpose. BCFS was still restricted from

adjusting surcharges until after the triggers were reached. Given the fall in pricing that was experienced in the fall of 2008 it became apparent that this lag feature of the surcharge mechanism meant that BCFS was still unable to respond to rapid and dramatic changes in fuel prices.

104. On October 16, 2008, the Commissioner suspended the application of Memorandum 24A regarding fuel surcharges for 30 days (subsequently extended to November 30, 2008) to allow BCFS to implement immediate reductions in fuel surcharges given the dramatic and rapid decline in crude oil prices that was occurring at the time. On November 30, 2008, the Commissioner issued Memorandum 24B, which established a revised mechanism to address fuel price volatility that provided greater flexibility and timeliness in adjusting fuel surcharges for the balance of PT2. Essentially, Memorandum 24B provided that so long as the account balances remained between the trigger bandwidth, BCFS could adjust the surcharges/rebates as appropriate provided that the defined communication protocol was followed. This enabled the company to respond to rapid changes in pricing thereby better aligning the surcharge with the fuel cost as it was incurred and allowing BCFS a greater ability to manage fare price volatility.

105. The key elements of the Memorandum 24B framework, which was maintained throughout the remainder of PT2, was as follows:

- (a) The use of separate deferral accounts for each route group.
- (b) A set price for fuel included in the price caps established for PT2 was used to determine the amount of fuel costs to be charged to operations with a “band width” for fluctuations of up to 5 cents/litre to be shared equally between BCFS and fare payers. The fare payers’ share was charged/credited to the fuel deferral accounts.
- (c) The cost of price fluctuations beyond the range of 5 cents/litre above or below the set price, calculated on a monthly basis, was transferred to the fuel deferral accounts, except for the Northern Route Group for which the Province agreed to take the price risk beyond the five cents/litre range.
- (d) BCFS was given the ability to apply, adjust or remove fuel surcharges or rebates to a maximum percentage of the price cap level that will be in effect April 1, 2009, called a fuel surcharge cap. The percentages were: Major



Routes 10%, Minor Routes 15% and Route Three 10%. BCFS was required to apply to the Commission before applying a fuel surcharge on the Northern routes.

- (e) A 2% trigger was established to govern when BCFS was required to adjust surcharges so as to eliminate debit and/or credit balances in the deferral accounts.

106. The process outlined in 24B has been maintained and consequently BCFS has been able to manage the balances within the trigger bandwidths without dramatic changes in the surcharge/rebate levels.

107. By Order 11-02, issued March 31, 2011, the Commissioner made his preliminary price cap decision for PT3. The Commissioner made the following preliminary determination regarding the continued use of the fuel deferral accounts and surcharges in PT3:

The commissioner will permit the continuation through the third performance term of fuel cost deferral accounts, accompanied by a trigger mechanism for fuel surcharges and rebates on ferry fares; and, for the operation of the deferral accounts, he has determined a "set" price per litre for marine diesel fuel as a reasonable forecast of the actual delivered price that BCFS will pay for fuel, and that shall be included in BCFS' operating expenses in the third performance term;<sup>26</sup>

108. On June 2, 2011, prior to the final determination of price caps for PT3, the government passed Bill 14, *Coastal Ferry Act, 2011*, which established price cap increases of 4.15% for all route groups for the period beginning April 1, 2012 and ending March 31, 2013 (a period termed the "Review Performance Term"), and left the price caps for the remainder of PT3 to be determined at a later date. The price cap increases for the Review Performance Term were based on the Commissioner's preliminary determination for PT3.

109. The deferral mechanisms established under Memorandum 24B have remained in place for the Review Performance Term.

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<sup>26</sup> Order 11-02, Recital I.

**APPENDIX "B" – EES CONSULTING REPORT**



June 20, 2012

Mr. Matthew Ghikas  
Fasken Martineau DuMoulin LLP  
2900 – 550 Burrard Street  
Vancouver, B.C. V6C 0A3

**Subject:** BCFS Fuel Deferral Account Mechanism

Dear Mr. Ghikas:

Fasken Martineau DuMoulin LLP, on behalf of British Columbia Ferry Services Ltd. (“BCFS”), engaged EES Consulting to provide an independent expert report for inclusion with a filing by BCFS with the British Columbia Ferries Commissioner (Commissioner). EES Consulting was asked to provide our independent and objective opinion with respect to the following questions:

1. Is the use of cost-based deferral account mechanisms to manage volatility in cost or revenue inputs consistent with industry practice in rate-regulated industries?
2. What ratemaking considerations and principles should be reflected in the design of an effective deferral account mechanism for fuel price variances from forecast?
3. Based on your opinion in question two, is BCFS’ proposed design of the deferral account mechanisms fair and reasonable to (a) ferry users and (b) BCFS?

In order to provide our expert opinion, the documents listed in Appendix B, which include the pertinent directions of the Commissioner, were reviewed.

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570 Kirkland Way, Suite 200  
Kirkland, Washington 98033

Telephone: 425 889-2700      Facsimile: 425 889-2725

A registered professional engineering corporation with offices in  
Kirkland, WA and Portland, OR

## **EES Consulting**

EES Consulting is a multidisciplinary management consulting and professional engineering firm that provides a variety of project solutions to clients involved with electric power, natural gas, transportation, telecommunications, water, wastewater and other energy and natural resource related businesses. EES Consulting's professional staff members have backgrounds in the areas of economics, finance, financial analysis, engineering, public administration, operations, research and corporate management. The company's clients are found all across the United States and Canada.

EES Consulting staff has performed and reviewed numerous electric, natural gas, water, transportation, wastewater and storm water rate studies throughout the United States and Canada. EES Consulting staff has taught Cost Allocation and Rate Analysis technical seminars for over 30 years and is known internationally as utility rate experts. Our professionals have provided the expert witness and litigation support over 500 times before such forums as the Federal Energy Regulatory Commission, the National Energy Board, state public service commissions, provincial public utility boards, the Bonneville Power Administration, state and federal courts and the American Arbitration Association.

## **BCFS Deferral Account Background**

The BCFS Fuel Deferral Mechanism was first put in place for the purpose of price cap regulation in Performance Term 1. The fuel deferral mechanism currently in place, set out in the Commissioner's memorandum 24B, was established for performance term 2. The current deferral mechanism uses a "set price" for fuel to determine the amount of fuel costs charged to operations and included in price caps. The BCFS fuel deferral accounts capture a variance between the set price and actual fuel cost. However, only half of the variance within a 5 cent/litre "bandwidth" is recoverable by BCFS through the deferral accounts. The recovery of debit balances in the deferral accounts has been accomplished through a pre-determined surcharge capacity.

BCFS is now proposing to adopt a deferral account mechanism that is similar, but not identical, to the current mechanism. At a high level:

- a) There will be a single deferral account, which will capture variances from a set price fixed by the commissioner at the beginning of each performance term<sup>1</sup>.

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<sup>1</sup> The single deferral account description was not included the retainer letter sent to EES Consulting. However, based on updated information from BCFS, this deferral account design was taken into account for this evaluation.

- b) The full forecast variance from the set price accrues to the deferral account for recovery from/return to ferry users.

This implicitly requires the elimination of the 5 cents/litre “bandwidth” and sharing mechanism described in Item 2 of Memorandum 24B.

- c) BCFS will manage the balance in the deferral account by adjusting fares through the use of surcharges and credits. BCFS will ensure that the deferral account balance reaches zero at least once every 24 months.
- d) There is a trigger mechanism that acts as a cap on any balances, and if reached causes the balances to be reduced through surcharges or rebates.

### **Fuel Cost Deferral Accounts**

Fuel adjustment clauses (FAC) or power cost adjustments (PCA) are common in many regulatory settings. Although the details differ from jurisdiction to jurisdiction, the basic operation is to hold regulated entities harmless from the financial effect of fuel costs variability and at the same time ensure that the customer pay the actual as opposed to forecast fuel costs. The terms frequently used with a FAC (or PCA) are that fuel costs *flow through* or *pass through* to consumers.

The adjustable charges are usually implemented in situations where fuel prices are volatile, based on market conditions, difficult to forecast and the regulated entity does not have influence on the level of prices. Because the regulatory process is slow to respond to volatility in fuel prices, the efficiency of utilities can be hampered when there are no mechanisms to more promptly respond to price fluctuations. Formal rate hearings are costly and time consuming, thus automatic rate adjustment to address fuel costs are allowed in most jurisdictions. Many electric and gas utilities in the United States include a FAC in their rate design. In Canada, many gas utilities pass fuel costs directly to customers using a variable fuel charge.

To minimize price volatility to customers, utilities often use deferral accounts to absorb some of the price volatility of fuel costs and update the FAC on a less frequent basis. This is particularly the case when fuel costs have a material impact on total cost. The deferral account is then used to collect the surplus or deficiency in revenues due to the delay in updated pricing. Deferral accounts are utilized in situations where:

- a. The regulated entity has no control over the fuel price, i.e the utility is a price taker;

- b. Fuel costs are volatile and difficult to forecast; and
- c. The variance between actual fuel costs and forecast are material.

The deferral account thus allows the regulated entity to collect revenues to meet uncontrollable costs, while mitigating impacts to customers.

Based on EES Consulting's expertise and the results of a survey of utilities in Canada and the United States, the three questions posed to EES Consulting by BCFS are answered below.

***Question 1: Is the use of deferral account mechanisms to manage volatility in cost or revenue inputs consistent with industry practice in rate regulated industries?***

It is EES Consulting's opinion that the use of a deferral account mechanism to manage volatility in costs or revenue inputs is consistent with industry practices in rate-regulated industries. Both in Canada and the United States, electric and gas utilities, which are good examples of regulated entities that are exposed to uncontrollable cost inputs, use deferral accounts to manage volatility related to fuel cost uncertainty. Some examples of deferral account and FAC designs are provided below.

***Gas utilities***

In British Columbia, FortisBC Energy has a Cost of Gas charge which is updated on a quarterly basis. The Commodity Cost Reconciliation Account (CCRA) and the Midstream Cost Reconciliation Account (MCRA) accumulate differences between actual natural gas costs and forecast natural gas costs as recovered in base rates. The MCRA captures the gas cost variances applicable to all customers while the CCRA accumulates gas cost variances applicable to all residential customers and certain industrial customers for whom Fortis acquires gas supply. The MCRA and CCRA are recovered through rates over a 12-month period. Recovery of the rate stabilization accounts is dependent upon annually approved rates and actual gas consumption volumes. FortisBC Energy files quarterly calculations with the British Columbia Utilities Commission, along with a quarterly review of costs and commodity rates, to determine whether customer rate adjustments are needed to reflect prevailing market prices for natural gas costs.

In Alberta, ATCO Gas and AltaGas Utilities, two large natural gas utilities, also have a cost of gas charge. The base gas charge (Gas Cost Flow-Through Rate (GCFR)) is calculated on a monthly flow-through basis, approved every month by the Alberta Utilities Commission. The GCFR equals the under/over recovered balance from the Deferred Gas Account (DGA) carried forward from the previous month plus the actual

monthly gas costs. The DGA recovers "gas-related" cost differences between forecast and actual costs and ensures that customers pay for the actual costs of gas consumed by them under a regulated rate and that the utility incurs neither profit nor loss related to such sales of gas.

Finally, in Saskatchewan, SaskEnergy's commodity rate that includes all costs of obtaining gas at TransGas Energy Pool (TEP). In addition to the "raw" cost of the commodity, the Commodity Rate includes the effect of natural gas price risk management transactions, administrative costs of acquiring the gas, transporting gas to TEP and financing of gas inventory in storage. As is standard regulatory practice, SaskEnergy passes on the cost of natural gas to customers at the same price it pays suppliers, including all expenses. SaskEnergy monitors its cost of gas throughout the year and targets its Commodity Rate adjustments for the fall for the upcoming gas year, November through October, followed by a spring review. The Commodity Rate is adjusted based on forecasts of future gas costs, which includes the balance of the Gas Cost Variance Account (GCVA). The Commodity Rate changes yearly. Purchased Gas Variance Accounts (PGVA) are maintained to recover/refund differences between the actual cost of gas and the cost of gas incorporated into rates charged to customers as approved by the Public Utilities Board. The difference between the recorded costs of natural gas and the actual cost of natural gas is carried as an account receivable/payable, and recovered or refunded in future rates.

### ***Electric Utilities***

Electric utilities often generate electricity by consuming natural gas and have mechanisms in place to address volatility in the cost of natural gas.

Total Authorized Fuel and Purchased Power Revenue Requirement for Southern California Edison (SCE) is the current Commission-adopted revenue requirement in rate levels associated with SCE fuel and purchased power expenses. The Energy Resource Recovery Account (ERRA) records ERRA revenue, Utility Retained Generation (URG) fuel costs, and purchased power-related expenses. SCE files its ERRA application to the California Public Utilities Commission annually every April. The ERRA balance forecast (either over- or under-collected on December 31st of the current year) is included in the Generation revenue requirement to either be returned to or recovered from SCE's retail electric customers. A rate change application must be filed as a result of a "trigger" mechanism if the ERRA balance reaches four percent in excess of prior year's annual fuel and purchased power costs, and is expected to reach five percent.

### ***Research Conclusions***

There are several conclusions that can be made based on our research.

First, deferral accounts are consistent with industry practice, and are widely used by regulated entities in circumstances very similar to the circumstances faced by BCFS regarding the price of fuel.

Second, in each of the cases described above, and as general rule with fuel charge deferral accounts, the deferral account and fuel cost mechanism are designed to collect the full cost of fuel from customers and rate payers. EES Consulting is not aware of any other regulated entity that is subject to a dead-band and sharing mechanism similar to the one put in place by Memorandum 24B for BCFS. In all situations, the fuel cost deferral accounting mechanism is designed such that the regulated entity receives a dollar for dollar adjustment through the deferral mechanism, so that the customer pays no more and no less than the fuel cost. As discussed in the next section, full recovery without any dead-band makes much more sense in the context of general rate making principles.

Third, most fuel cost adjustment and deferral accounts are reviewed on a monthly or quarterly basis. We have not found any situations where the deferral account balance can keep building without a reasonable time limit, such as one year or less.

### ***Question 2: What ratemaking considerations and principles should be reflected in the design of an effective deferral account mechanism for fuel price variances from forecast?***

Based on EES Consulting's experience with regulated entities, the following guiding principles, which are based on generally accepted rate setting principles, should be used when designing an effective deferral account mechanism for fuel price variation from forecast.

1. Revenues should meet allowable costs
2. Rates should be cost based
3. Design should be fair and equitable to customers and the Company
4. Rates should provide revenue stability to the regulated entity and rate stability to the ferry users, thus minimize price volatility to the ferry users
5. Rates and design should be easy to understand and administer
6. Should conform to general accepted rate setting techniques



7. Rates should maintain inter-temporal equity<sup>2</sup>

The most important principle that should be reflected in the design of an effective deferral account mechanism is the principle that BCFS should be allowed to recover sufficient revenues to meet costs. Generally speaking, regulators only deny a regulated entity full cost recovery in rare situations, such as where the expenditure at issue was not part of normal operations of the entity and the regulated entity did not request prior approval where required to do so, or if the regulated entity incurred a cost imprudently. A determination of imprudence implicitly requires that the regulated entity has the ability to reasonably impact the cost. This is not normally going to be the case with inputs determined by market prices. As such, it is common for deferral account mechanisms to be used to ensure that the regulatory principle of full cost recovery is respected. In BCFS' case the price of fuel should be a flow through if it is to be consistent with regulatory principles. It is not standard regulatory practice to disallow recovery of operating costs, such as fuel costs.

The principle that rates should provide revenue stability both to BCFS and the ferry users is another important principle to incorporate when addressing the deferral account mechanism, and one that is key to the interest of the ferry users. The deferral account mechanism reduces the price volatility that could be experienced by ferry users if the actual fuel cost is directly passed through rates. In addition, the deferral account allows BCFS to recover the cost of providing ferry service to users.

Finally, an important consideration when designing a deferral account mechanism is maintaining inter-temporal equity. In theory, cost causers should be cost payers. Thus from a theoretical standpoint, the fuel price should be passed on immediately to ferry users, such that ferry users during the winter would not have to pay for high fuel prices that occurred during the summer. However, giving consideration to the principle of reducing price volatility to ferry users and keeping rates simple to understand and administer, it is a balancing act to determine the appropriate mechanism for collecting revenues to fully cover fuel costs. Thus, we generally see in the case of regulated entities, such as the examples discussed previously, some mechanism put in place that acts to trigger the disposition of the balance in the accounts after a particulate period of time.

***Question 3: Based on your opinion in question two, is BCFS' proposed design of the deferral account mechanisms (as described in the attached Statement of Assumptions) fair and reasonable to (a) ferry users and (b) BCFS?***

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<sup>2</sup> This is further explained below

Based on the seven principles above, BCFS' proposed deferral account mechanism is fair and reasonable and in the interest of both the ferry users and BCFS. It is recommended that BCFS continue the use of a fuel cost deferral account for regulatory purposes. In addition, it is recommended that the full forecast variance from the set price accrues to the deferral account for recovery from/return to ferry users.

*Revenues should meet allowable costs*

The most basic rate setting principle for any regulated entity is that revenues should meet allowable costs. The proposed deferral account mechanism meets this requirement by allowing BCFS to collect revenues to meet, not the estimated fuel cost, but the **actual** fuel costs. The current dead-band and sharing mechanism does not allow for this basic principle to be met.

*Rates should be cost based*

Not only should collected revenues meet costs, but rates should be cost based. BCFS is currently managing the deferral account balance at its discretion, within certain limitations, by imposing surcharges or credits as appropriate. Based on the principle that rates should be cost based, this adjustment mechanism provides price signals to ferry users and it is consistent with the cost based principle for rates. In order to meet the cost based principle, it is important that the deferral account balance does not continue to grow. The proposed mechanism to ensure disposition of the deferral account balance once every 24 months is consistent with this principle.

*Design should be fair and equitable to customers and the Company*

The current dead-band and sharing mechanism is not fair and equitable to BCFS, thus not meeting this principle, as BCFS is required to fund a portion of the uncontrollable costs. BCFS is a price taker, i.e. has no control over the cost of fuel, and should be allowed to collect revenues sufficient to meet the uncontrollable cost of fuel. The proposed deferral account mechanism, however, will provide a balanced and equitable mechanism to minimize the impact of uncontrollable fuel price volatility on both customers and BCFS.

*Rates should provide revenue stability to the regulated entity and rate stability to the ferry users, thus minimize price volatility to the ferry users*

Regulated entities often struggle with balancing cost-based rates with this stability principle. The proposed deferral account mechanism addresses this

principle by mitigating the fuel price volatility to customers, while allowing BCFS to recover sufficient revenues, including carrying costs, to meet allowable costs.

*Rates and design should be easy to understand and administer*

The proposed mechanism, while mitigating fuel price volatility impacts to ferry users, simplifies the process for passing-through actual fuel costs to ferry users. In addition, proposed mechanism will be much easier to administer for BCFS.

*Should conform to general accepted rate setting techniques*

Generally accepted rate setting principles refer to the process of analyzing how BCFS incur costs and what factors causes costs to change. This information is then used to allocate costs to user groups and/or routes. In the context of fuel cost and the deferral account, this analysis is fairly simple, as the volatility and fuel price changes is due to market forces. The proposed mechanism includes the calculation of a set price based on current information and then frequent updates based on actual fuel costs incurred. This mechanism is consistent with generally accepted rate setting techniques.

*Rates should maintain inter-temporal equity*

As the summary of other fuel deferral accounts show, frequent review of the deferral account balance and update of rates based on updated fuel forecasts are essential to ensure full recovery of costs and fair and equitable treatment of ferry users. The ferry service is a seasonal business, and if the fuel costs are deferred too long, increased fuel costs in the summer may have to be collected by winter ferry users. BCFS is currently managing the deferral account balance at its discretion, within certain limitations, by imposing surcharges or credits as appropriate. By allowing flexibility in passing through actual fuel costs, BCFS can ensure that surcharges and credits reach the actual users incurring the costs, while balancing all other rate setting principles. The proposed disposition of the deferral account balance once every 24 months is also supported by this principle by shortening the potential deferral of cost collections.

The current deferral mechanism, including the dead-band and sharing mechanism, is intended to encourage BCFS to minimize fuel costs. However, BCFS does not have any control over fuel costs and in fact the current mechanism encourages a high forecast and requires fuel price speculation by BCFS. Allowing full recovery of actual costs will

Mr. Matthew Ghikas

June 20, 2012

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result in greater cost control and certainty to the ferry users that they are paying fair and equitable rates.

Sincerely

A handwritten signature in blue ink that reads "Gary S. Saleba". The signature is written in a cursive style with a large initial "G".

Gary Saleba  
President

**Appendix A**  
**Gary Saleba Testimony CV**

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## PROFESSIONAL EXPERIENCE AND BACKGROUND OF

### GARY S. SALEBA

#### EDUCATION

MBA, Finance  
Butler University  
Indianapolis, Indiana

BA, Economics and Mathematics  
Franklin College  
Franklin, Indiana

#### EMPLOYMENT

October 1978 to Present  
EES Consulting, Inc.  
570 Kirkland Way, Suite 200  
Kirkland, Washington 98033  
Registered Professional Engineering and Management  
Consulting Firm

Position: President

Responsibilities: Overall supervision and quality control responsibilities for all of EES Consulting's electric, water, wastewater and natural gas engagements in the areas of strategic planning, financial analysis, cost of service, valuations, mergers and acquisitions, rate design, load forecasting, load research, management evaluation studies, bond financing, integrated resource planning and overall utility operations. Overall responsibility for firm's offices in Kirkland, Portland, Bellingham and southern California.

Activities: Numerous testimony presentations before regulatory bodies on utility economics, strategic planning, finance and utility operations. Supervised several integrated resource planning studies, average embedded and marginal cost of service studies, technical assessments and financial planning studies for electric, water, gas and wastewater utility clients. Participated in comprehensive resource acquisition, strategic planning and demand side management analyses. Developed and verified interclass usage data. Conceptualized and implemented compliance programs for the Public Utility Regulatory Policies Act and the Energy Policy Act of 1992. Contract negotiation and energy conservation assessments. Presentation of management audit, forecasting, cost of service, integrated resource planning, financial management, and rate design seminars for the American Public Power Association, Electricity Distributors Association of Ontario, American Water Works Association, and Northwest Public Power Association. Past Board member of Northwest Public Power Association and ENERconnect, Ltd. Past

Chairman of Financial Management Committee and Management Division of the American Water Works Association. Project manager for construction of 248 MW gas turbine, and acquisition of over \$500 million of utility service territory and equipment. Supervised engineer's report for over \$5 billion in revenue bonds.

October 1977 to  
October 1978

National Management Consulting Firm

Position: Supervising Economist

Responsibilities: Analyzed various energy related topics to determine economic impacts. Reviewed utility financial activities.

Activities: Participated in several utility rate/financial regulatory proceedings. Provided clients with critique of issues, position papers and expert testimony on the topics of cost of service, rate design, utility finance, automatic adjustment factors, sales perspectives and class load characteristics. Conceptualized load forecasting models and assisted in economic and environmental impact analyses.

June 1972 to  
October 1977

Indianapolis Power & Light Company  
P.O. Box 1595 B  
Indianapolis, Indiana 46206  
Investor-owned Utility

Position: Economist, Department of Rates and Regulatory Affairs

Responsibilities: Provided general economic and rate expertise in Rates, Regulatory Affairs, Customer Service and Engineering Design Departments.

Activities: Calculated retail and wholesale electric and steam class revenue requirements and rates. Prepared expert testimony and exhibits for state and federal agencies regarding rate design theory, application of rates and revenues generated from rates. Determined long range revenue and peak demand projections. Supervised comprehensive load research program. Supported thermal plant Environmental Impact Statements. Provided industrial liaison.

**PARTIAL LIST OF CLIENTS FOR WHOM FINANCIAL, OPERATIONAL, STRATEGIC  
PLANNING AND ALLOCATIONAL/RATE ANALYSES PROJECTS  
HAVE BEEN PERFORMED BY GARY S. SALEBA**

**UNITED STATES OF AMERICA**

Alabama

City of Birmingham Water and Wastewater

Alaska

City of Barrow  
City of Wrangell  
\*Alaska Public Service Commission  
\*Municipal Light and Power  
Alaska Village Electric Cooperative

Arizona

\*Tucson Electric Power  
City of Dodge  
City of Page  
Navopache Electric Cooperative

Arkansas

City of North Little Rock

California

City of Indian Wells  
City of Palm Desert  
City of Moreno Valley  
\*City of Corona  
City of Redding  
\*Sacramento Municipal Utilities Board  
City of Burbank  
\*State of California - Department of Water Resources  
\*Turlock Irrigation District  
\*City of Palo Alto  
City of Anaheim  
El Dorado Irrigation District  
City of Glendale  
\*City of Pasadena  
City of Roseville  
Yucaipa Valley Water District  
\*Los Angeles Department of Water and Power  
Nor-Cal Electric Authority  
Jefferson JPA  
City of San Marcos



California (cont'd)

City of Cerritos  
Coachella Valley Association of Governments  
California Power Authority  
Santa Clara Valley Water District

Colorado

\*CFI Steel  
\*Moon Lake Electric Association  
City of Denver - Wastewater  
\*Denver Water Board

Connecticut

City of Groton

Florida

City of Pompano Beach  
Florida Public Service Commission  
Dade County Water and Wastewater Utilities

Idaho

Kootenai Electric  
\*Northern Lights  
Salmon River Cooperative  
Prairie Power and Light  
\*Department of Energy  
City of Moscow  
Fall River Cooperative  
Lower Valley Power & Light  
\*Industrial Customers of Idaho Power  
Clearwater Power & Light  
City of Heyburn

Illinois

\*City of Highland  
City of Collinsville  
City of Peru  
City of Winnetka

Indiana

\*Indianapolis Power & Light Company

Iowa

\*City of Iowa City

Kentucky

\*Kentucky-American Water Company

Minnesota

Polk-Burnett Electric Coop

Missouri

\*General Motor, Inc.

Montana

PPL Montana  
Montana Associated Cooperatives  
Sun River Electric Cooperative  
\*Montana Power Company  
Colstrip Community Center  
Flathead Electric Cooperative  
Glacier Electric Cooperative  
Vigilante Electric Cooperative  
Montana Electric Cooperative Association  
Western Montana G&T  
Northwestern Energy, Inc.  
Yellowstone Valley Electric Cooperative

North Dakota

City of Watford City  
Garrison Diversion Conservancy District

Oregon

\*Emerald PUD  
Clackamas Water District  
Central Lincoln PUD  
\*Springfield Utility Board  
Tri-Cities Service District  
City of Portland  
City of Gladstone  
City of West Linn  
City of Oregon City  
\*Public Power Council  
Central Electric Cooperative  
Warm Springs Energy Cooperative  
Northern Wasco PUD  
West Oregon Cooperative

South Dakota

Black Hills Electric Cooperative

Texas

City of League City  
City of Brownsville  
\*City of Lubbock  
Pedernales Electric Cooperative  
City of San Antonio  
\*Texas Municipal Power Agency

Utah

\*Moon Lake Electric Association  
Utah Association of Municipal Power Systems

Washington

\*Western Public Agencies Group  
TrendWest Resorts  
Weyerhaeuser Corporation  
Costco  
\*Pend Oreille County PUD  
City of Richland  
Industrial Customers of Grant County  
\*Benton REA  
Seattle City Light  
\*Clark Public Utilities  
City of Blaine  
\*Snohomish County PUD  
\*City of Port Angeles  
\*Clallam County PUD  
Chelan County PUD  
\*City of Tacoma Electric, Water and Rail Utilities  
\*Mason County PUD No. 3  
\*Peninsula Light Company  
Washington Utilities and Transportation Commission  
\*Grays Harbor County PUD  
\*Pacific County PUD  
City of Gig Harbor  
Ferry County PUD  
\*City of Ellensburg  
City of Redmond  
Grant County PUD  
\*Klickitat County PUD  
Cascade Natural Gas  
\*Building Owner's Management Association  
City of Kennewick  
Daishowa Corporation  
Seattle Water Department

Washington (cont'd)

City of Bellingham

- \*US Ecology, Inc.
- \*Avista Corporation
- \*Cowlitz County PUD
- \*City of Cheney
- \*City of Yakima
- City of Bellevue
- City of Shoreline
- Douglas County PUD
- AT&T
- WorldCom
- City of Toppenish
- City of Shoreline

#### Wisconsin

- \*Wisconsin Manufacturing Association
- Polk-Burnett Cooperative

#### Wyoming

- \*Lower Valley Power and Light

### **CANADA**

#### Alberta

- \*University of Alberta
- \*City of Lethbridge
- \*City of Red Deer
- City of Medicine Hat
- Ocelot Chemicals
- Aqualta
- City of Calgary—Water and Wastewater Utilities

#### British Columbia

- \*Fortis, BC
- Alcan, Ltd.
- \*Princeton Power & Light
- \*West Kootenay Power
- \*Ministry of Fisheries
- Crows Nest Resources
- Highland Valley Cooperative
- \*Council of Forest Industries
- Crestbrook Industries
- Royal Oak Mines
- UtiliCorp Canada
- \*Joint Industrial Electric Steering Committee
- \*British Columbia Transmission Corporation
- \*Terasen Gas

Manitoba

\*Manitoba Legal Aid

Northwest Territories

\*Northwest Territories Power Corporation

Ontario

ENERconnect, Inc.

Ontario Hydro

\*Municipal Electric Association

North York Hydro

Toronto Hydro

\*Ottawa Hydro

Electricity Distributors Association

Ontario Energy Board

\*Association of Major Power Companies (AMPCO)

**OTHERS**

American Public Power Association

American Water Works Association

California Municipal Utilities Association

Northwest Public Power Association

\*Prepared Expert Testimony

## Appendix B Documents Reviewed

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#	Mm/dd/yr	Party	Document
1	09/2004	BC Ferries	Proposal to Establish Deferral Account
2	09/28/2004	Commissioner	Order 04-02
3	04/28/2005	Commissioner	Memorandum 13
4	06/10/2005	BC Ferries	Section 42 Application
5	07/24/2005	Commissioner	Order 05-02
6	11/28/2005	BC Ferries	Section 42 Application
7	1/20/2006	Commissioner	Order 05-06
8	6/19/2006	Commissioner	Order 06-03
9	09/30/2006	BC Ferries	PT2 Price Cap Submission (Excerpts)
10	3/30/2007	Commissioner	Memorandum 24
11	7/10/2008	BC Ferries	Letter
12	7/22/2008	Commissioner	Memorandum 24A
13	11/30/2008	Commissioner	Memorandum 24B
14	03/31/2011	Commissioner	Order 11-02

## **APPENDIX "C" - ORDERS SOUGHT**

BCFS respectfully requests the following approvals and orders, effective upon the date of the Order.

1. An order pursuant to section 41.1(1)(a) of the *Coastal Ferry Act*, permitting BCFS to establish a single fuel deferral account for all route groups, as described in the Application (the "Fuel Deferral Account") effective the date of this Order. The Commissioner may consider further sub-divisions of the Fuel Deferral Account from time to time.

2. An order Pursuant to section 41.1(1)(b) of the *Coastal Ferry Act*, approving the following terms and conditions for the use of the Fuel Deferral Account by BCFS:

- (a) the balances from the existing deferral accounts for all route groups as of the date of this Order, together with all excluded variances under the bandwidth from the start of the current Review Performance Term, will be recorded in the Fuel Deferral Account;
- (b) the set price for fuel will be as specified by the Commissioner;
- (c) all variances between the set price for fuel and the delivered price for fuel will be recorded to the Fuel Deferral Account;
- (d) the Fuel Deferral Account balance will be reported to the Commissioner on a monthly basis in the form similar to the present reporting, and in a manner that is consistent with applicable securities laws regarding disclosure of information; and
- (e) interest will be charged/credited on the Fuel Deferral Account balance, calculated in the manner described in the Application.

3. An order pursuant to section 41.1(2)(a) and 41.1(2)(b) of the *Coastal Ferry Act* approving the following conditions for the use of temporary fuel surcharges and temporary discounts:

- (a) BCFS may implement, adjust or remove fuel surcharges or rebates at any time and in its discretion, subject to the following conditions:

- (i) if the month end balance in the Fuel Deferral Account is a debit balance which exceeds X%<sup>27</sup> of the annual pre-surcharge tariff revenue ("the X% trigger") for all route groups combined, BCFS will adjust the fuel surcharge to target the elimination of the Fuel Deferral Account debit balance, including the expected growth in the balance, over the following 12 months;
  - (ii) if the month end balance in the Fuel Deferral Account is a credit balance which exceeds the X% trigger, BCFS will have a grace period of one quarter to reduce the credit balance below the X% trigger;
  - (iii) BCFS shall ensure that the balance in the Fuel Deferral Account reaches \$0.00 (zero dollars) at least once every 24 months; the time period within which BCFS is required to zero the balance of the Fuel Deferral Account shall be reset each time the deferral account balance reaches \$0.00;
  - (iv) surcharges and credits will be applied as a percentage of fares equally across all routes; and
  - (v) fuel surcharges applied by BCFS cannot exceed a maximum of 15% of a fare in effect for a route, except as required to comply with (a)(i) above.
- (b) BCFS shall provide 15 days public notice of any increase in fares that results from: (i) the imposition of a fuel surcharge; (ii) an increase in a fuel surcharge, (iii) the removal of an existing rebate, or (iv) a decrease in the amount of an existing rebate.

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<sup>27</sup> As explained in section III.F of the Application, BCFS believes that a trigger of either 2% or 3% is appropriate, and takes no position on which threshold should be approved.