Gasoline and Diesel Prices Inquiry
August 2019
About the BCUC

The British Columbia Utilities Commission (BCUC) is an independent regulatory agency of the Government of British Columbia that is responsible for regulating BC’s energy utilities, the Insurance Corporation of BC’s compulsory automobile insurance rates, intra-provincial pipelines, and the reliability of the electrical transmission grid. Our jurisdiction and authority are legislated under the Utilities Commission Act (UCA) and the Clean Energy Act. We have responsibility to ensure that British Columbians get value from their utilities with safe, reliable energy services and fair energy and basic auto insurance rates, while ensuring the entities we regulate have the opportunity to earn a fair return on their capital investments. The BCUC is established as the sole independent regulator for energy services in the province of BC.

Under section 5 of the UCA, the Lieutenant Governor in Council may direct the BCUC to advise them on a particular matter regardless of whether or not the BCUC has jurisdiction.

About the Inquiry

On May 21, 2019, the Lieutenant Governor in Council, under section 5(1) of the Utilities Commission Act (UCA), requested the British Columbia Utilities Commission (BCUC) provide advice to the BC Government on the price of wholesale and retail gasoline and diesel in British Columbia. The Terms of Reference for the Inquiry are outlined in Order in Council (OIC) No. 254. The BCUC established an Inquiry process on May 24, 2019 by Order G-112-19.

Per the Terms of Reference, established by the BC Government, the Inquiry explored factors that may be influencing gasoline and diesel prices in BC since 2015, including:

- the differences, if any, in refining and retail margins compared to other jurisdictions in Canada. Additionally, for retail, among different regions in BC;
- factors that contribute to both retail and wholesale price fluctuations such as access of refineries in BC to crude oil, the amount of fuel in storage, refinery usage and pipeline capacity, market size and demand, distribution methods and seasonal variations;
- how competition impacts pricing; and
- what other jurisdictions are doing to enhance fuel price transparency.

The BCUC was also asked to explore mechanisms the province could use to moderate gasoline and diesel price fluctuations and increases.
Responses to Inquiry Questions

The following are in response to the questions stated in the scope of the Inquiry.

Differences in Refining Margins

- There is an unexplained difference in wholesale price of approximately 13 cents per litre (cpl) between Metro Vancouver and the US Pacific Northwest. We cannot find a specific trigger in 2015 that would explain the beginning of this disconnect.
- The difference between Vancouver and Seattle wholesale prices is not entirely explained by differences in the cost of producing and delivering the product.
- The Panel finds that the prices in the Metro Vancouver area are higher than would be expected under more competitive conditions. The higher price differential cannot be explained by economic theory or justified by known factors in the market.
- There was no disconnect found in diesel prices between BC and the rest of Canada.

Differences in Retail Margins

- Retail margins for gasoline sold in BC are higher than other parts of Canada and, with respect to Western Canada, this divergence has increased since 2015.
- The Panel found that due to issues related to the calculation of the retail margin and their effect on the validity of the retail margin numbers being reported, only limited weight can be placed on the magnitude of reported differences in retail margins between regions.
- The Panel finds that while the value of land is not a direct driver of prices or margin, the opportunity cost related to it can be used to justify a higher retail margin than in other regions with lower land values.
- Evidence shows that retail margins in Kamloops follow the trend in the Western Canada Region quite closely, while Vancouver appears to have outpaced the growth in retail margin in Western Canada starting around 2015.
- This would indicate that in recent years, higher retail margins are skewed toward the south coast and specifically the city of Vancouver.
## Factors Contributing to Price Fluctuations

### Refinery Access to Crude

- There are two refineries in BC (Parkland and Husky) and they supply approximately 30% of the BC gasoline and diesel market. The remainder of supply is provided largely by Alberta-based refiners and refiners in Washington state. Other sources of supply include the American Midwest, the Gulf Coast and other countries.
- Husky Energy obtains crude oil from Northern BC through the Pembina pipeline and there is no evidence of any crude supply shortages affecting Husky Energy.
- Parkland provided evidence that there may have been issues with access to crude by Parkland through the Trans Mountain Pipeline (TMPL).
- However, Parkland states that it has not affected BC gasoline prices as it is an infra-marginal supplier, and therefore can only charge a competitive price and must absorb any costs associated with crude supply challenges.

### Storage

- All the Oil Companies stated that they have sized their infrastructure to meet the needs of the marketers and retailers with whom they have signed supply contracts.
- The Inquiry requested, but was not provided with, the throughput or inventory levels of product in the Oil Companies terminals.
- Given the statements that they are operating at, or close to, capacity, it appears that the amount of storage (or change since 2015) has not been a factor in price changes.

### Use of Refinery and Pipeline Capacity

- There has been no change in refinery capacity and no change in utilization since 2015 that would affect prices.
- The evidence received demonstrates that changes in cost for BC refineries does not affect wholesale prices. Even if they could produce gasoline at no cost, the wholesale price would be unaffected.
- Starting in 2015, there has been a reduction in pipeline capacity for refined products and an increase in crude. However, as the wholesale price is based on the Pacific Northwest spot price, this has not affected gasoline prices.

### Market Sizes and Demand

- Since 2014, BC’s total Refined Petroleum Products demand has been relatively constant.
- Gasoline and diesel demand is expected to decline over time.
- The wholesale and refiner market size has not changed significantly since 2015.
- Four firms (Parkland, Suncor, Imperial Oil and Shell) control approximately 90% of the market in Southern BC. Therefore, the wholesale gasoline and diesel market is an oligopoly.
Factors Contributing to Price Fluctuations

Distribution of Gas and Diesel to Retailers

- If BC had to replace refined products that are currently supplied by the TMPL, there is inadequate infrastructure in BC to transport, receive, store and distribute large quantities of refined fuels from any market other than Alberta.
- The wholesalers currently control all the Primary Terminals in the province and, along with Federated Co-op Limited, control all the Bulk Terminals. Given the significant barriers to entry, this oligopolistic wholesale market has the characteristics of a natural monopoly.
- This is a potential key factor in the rise of wholesale prices and if additional infrastructure is developed, consideration should be given to making it open to allow additional participants to enter the market.

Seasonal Variations

- Gasoline demand is greater in summer and diesel demand is greater in winter.
- There is no evidence to suggest that seasonal variations in supply and demand of gasoline have changed significantly since 2015, and therefore, are not expected to have contributed to the growing differential between retail and wholesale margins in BC and the rest of Canada.
- The supply for gasoline and diesel does not appear to be seasonal as refiners try to operate at a constant volume to be economically efficient.
- One significant seasonal variation in BC which affects supply is the switch between the selling of winter gasoline and summer gasoline.
### Competition Impacts

#### Wholesale

- The fact that prices remain persistently higher in Vancouver suggests that it is not functioning as a fully competitive market.
- There are elements of a natural monopoly in the wholesale market.
- If a marketer wanted to import gasoline into the BC market they would need a Primary Terminal facility.
- There are significant barriers to entry.
- Five refiner-marketers (Parkland, Suncor, Imperial Oil, Shell and Husky) have the ability to influence retail price.
- There is evidence that actual wholesale prices do not track the reported sources of marginal supply.
- Rack pricing is determined by the firms that control the wholesale distribution network. Their customers cannot obtain alternate supply.
- With refineries running at close to capacity, there is little incentive to reduce prices, because volumes cannot be increased.

#### Retail

- Service stations monitor competitors and react quickly to price changes.
- This volatility may not be in the interests of BC consumers as it causes frustration.
- The Panel finds there is no evidence to suggest that collusion among the retail operators exists nor is there evidence of cartel behaviour.
- Prices go up and down in a manner that looks like a functioning competitive market. It is also possible this pricing behaviour is tacitly choreographed such that there are numerous price changes throughout the day.
- Refiner-marketers, including Parkland, Suncor, Shell, and Husky, have greater direct control over pricing in BC’s retail stations when compared to the Canadian average. However, the Panel finds there is no evidence to suggest market power is being exercised.

### Transparency in Other Jurisdictions

- Subscription services are widely available for most markets across North America.
- Jurisdictions such as California require refiners, producers, transporters, marketers, pipeline and terminal operators to report on product volumes, transportation modes and sources on a weekly, monthly and annual basis to its regulator on a confidential basis.
- Washington state’s Office of the Attorney General produces a quarterly gasoline report which uses public information to communicate to consumers the factors that contribute to gasoline prices.
- Washington State’s Department of Transportation regularly publishes a Fuel and Vehicle Trends report, which provides a summary of the latest fuel prices and other oil industry statistics. This report also summarizes articles appearing in popular, business and technical media referring to fuel price, production and supplies, as well as vehicle sales and registration trends.
Mechanisms to Moderate Price Fluctuations and Increases

- The rationale for implementing price regulation in provinces across Canada is based on a number of reasons including:
  - To ensure the continuous supply of petroleum products, reducing price volatility;
  - Stabilizing the price of petroleum products; and
  - Protecting consumers from uncompetitive wholesale fuel prices.

- Where regulation is in place provinces may regulate wholesale margins, minimum and maximum retail prices, transport costs and taxes.
- Prince Edward Island, Nova Scotia and Quebec also use minimum price floors to protect small retailers and prevent predatory pricing.

Regulating Supply Chain Access

- As an alternative to price regulation, access to various points in the supply chain can be regulated. This could reduce the market concentration in the wholesale sector, thereby providing more motivation for competitive pricing.

- If BC is to invest in more refining capacity, this could result in security of gasoline supply, economies of scale, jobs, and gasoline exports to the Pacific Northwest (thereby potentially driving down prices).
Inquiry Process

On May 24, 2019, the BCUC issued Order G-112-19 which established a regulatory timetable for the Inquiry and all invited participants were requested to register as interveners and complete a questionnaire about their respective roles in the gasoline and diesel supply chain.

The Panel thanks all the interveners that participated and attended the workshops on short notice when many had limited resources available to do so.
Participation

The BCUC Panel heard from many parties who are actively involved in the gasoline and diesel industry, including; refiners, transportation companies, terminal operators, wholesalers, distributors, marketers, retailers, government and regulators.

In addition to the evidence from interveners, letters of comment were received from interested parties and members of the public. The Panel acknowledges the contributions made by all participants in the Inquiry and thanks them for doing so. All comments were considered in preparing findings as set out in the final Report.

11 Registered Interveners
All interveners actively and voluntarily participated in the Inquiry process and provided a broad cross-section of perspectives and evidence for the Panel to consider. 8 of 11 interveners represent major gasoline and diesel companies in the refining and retail business in BC. In addition, all interveners made themselves available for Panel questions during the Oral Workshop.

3 Independent Consultant Reports
Two reports were prepared by the Deetken Group, providing an overview of the BC gasoline and diesel market and an analysis into the factors that contributed to the difference in refining and margins between BC and other Canadian markets since 2015. One report was prepared by Navius Research Inc., looking at the jurisdictional differences between BC and other areas of Canada and North America.

83 73 Letters of Comment and 10 Interested Parties
73 members of the public took the time to write and submit letters of comment for the Panel's consideration, in addition to 10 interested parties.

3,207 Pages of Evidence and Transcripts
The Panel received 2,142 pages of evidence on the public record to review and consider from interveners during this Inquiry process, as well as an additional 1,065 pages of transcripts from the Oral Workshop.
Gasoline and diesel are refined petroleum products sourced from crude oil. After crude oil is removed from the ground, it is sent to a refinery where different parts of the crude oil are separated into useable petroleum products. These petroleum products include gasoline, distillates such as diesel fuel and heating oil, jet fuel, and other products.

Refined products are transported to storage terminals where they are stored and blended with brand-specific performance and efficiency enhancing additives, as well as ethanol in accordance with government regulations.

From terminals, gasoline and diesel is transported to gas stations. The key components of the gasoline and diesel supply chain are illustrated in the diagram below.

Factors affecting fuel prices include crude oil prices, wholesale prices, retail markup, and taxes. As a commodity that is traded in world markets, crude oil prices fluctuate depending on economic conditions, the quality of crude and supply and demand.

The above graphic illustrates the various components of the BC gasoline and diesel supply chain.
Where does the gasoline and diesel sold in BC come from?
There are two refineries in BC, one located in Prince George owned by Husky and one owned by Parkland located on Burrard Inlet in Burnaby. The maximum capacity of these two refineries account for about 30% of BC gasoline demand.

The remaining 70% of gasoline that isn’t refined in the province is imported. BC historically relies on refined diesel and gasoline imported from Edmonton and the U.S. Pacific Northwest.

BC also has 15 primary terminals and 54 bulk terminals to store fuel before it is delivered to end customers. Of the primary terminals, nine have blending capabilities to meet BC’s requirements.
Next Steps & Discussion

Wholesale

• There is a significant unexplained difference in price when comparing Vancouver wholesale gasoline vs US Pacific Northwest wholesale gasoline – the acknowledged predominant marginal source of supply.

• The Panel found the wholesale market is not truly competitive. Retail margins are higher than the rest of Canada with no clear explanation for the difference.

• Price regulation could control the margins earned by market participants and "smooth" the variation in prices over a period of time.

• The rack price in Edmonton (for Kamloops) and the Pacific Northwest spot prices (for the Lower Mainland) could be used as a reference price for regulation, with a margin added to cover defined costs and an appropriate profit to get the product to the various markets. This approach could potentially bring prices in line with the rest of Canada with minimal market disruption.

• A drawback is that there are contracts between suppliers and the marketers/retailers that have a large variety of discounts/premiums for a variety of business reasons. There are also many business models used to cost the delivery of product to the retail locations with a corresponding variety of price points.

• There are uncertainties as to whether a regulator will do a better job than is currently being done by the oil companies.

Retail

• Similar to other systems in Canada, retail price regulation could reduce the retail margins to what is earned in the rest of Canada; and minimize retail price variability over a period (weekly, bi-monthly) of time.

• A concern is that the “reward” for less volatility may be much less than the “cost” of regulation and low-cost providers to leave the market.

Regulating Supply Chain Access

• Opening up terminal infrastructure could potentially reduce the market concentration in the wholesale sector, thereby providing more impetus for competitive pricing.

• Given the small number of market participants, it would be relatively easy to drop rack prices for sufficient period of time to prevent new participants from entering.
### Data Transparency
- Further study should be initiated to determine those factors which are most important to provide market oversight and what information is best provided by an outside information service provider and information that is best provided by Oil Companies directly or market-retailers.

### Market Changes
- With forecast electric vehicle adoption, gasoline and diesel demand could be flat or decline over time.

### Transportation/TransMountain Pipeline
- The BC government should ensure there is infrastructure for more refined product to flow to BC.

### Fuel Quality
- Harmonizing the federal vaporizing standard.

### Diesel
- Demand for diesel is more elastic than the demand for gasoline. Further investigation may be warranted to assess the possible difference that may have caused gasoline and diesel prices to behave differently.

### Comments on Report
The Panel recommends a one-month comment period, to give an opportunity for the Inquiry’s participants to submit additional evidence relevant to questions posed in the OIC.

The exercise will ensure that the BC Government is presented with the most comprehensive information available to make an informed decision.

### Disclaimer
This document is a summary of the Gasoline and Diesel Prices Inquiry Report. If there are any discrepancies or differences between this summary and the Final Report, the Final Report shall prevail.

For more information about the Inquiry or to review the Final Report, please visit bcuc.com/ApplicationView.aspx?ApplicationId=681