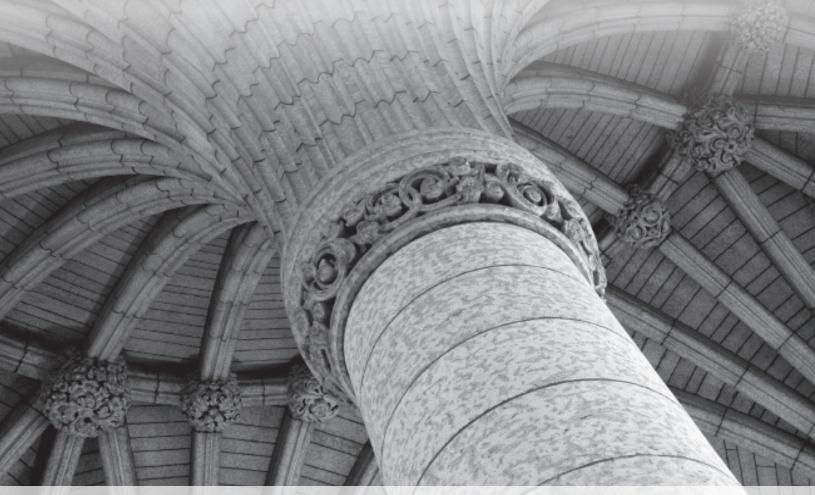


REPORT 4, REPLACING MONTRÉAL'S CHAMPLAIN BRIDGE—INFRASTRUCTURE CANADA, OF THE 2018 SPRING REPORTS OF THE AUDITOR GENERAL OF CANADA

Report of the Standing Committee on Public Accounts

The Honourable Kevin Sorenson, Chair



OCTOBER 2018
42nd PARLIAMENT, 1st SESSION

Published under the authority of the Speaker of the House of Commons

SPEAKER'S PERMISSION

The proceedings of the House of Commons and its Committees are hereby made available to provide greater public access. The parliamentary privilege of the House of Commons to control the publication and broadcast of the proceedings of the House of Commons and its Committees is nonetheless reserved. All copyrights therein are also reserved.

Reproduction of the proceedings of the House of Commons and its Committees, in whole or in part and in any medium, is hereby permitted provided that the reproduction is accurate and is not presented as official. This permission does not extend to reproduction, distribution or use for commercial purpose of financial gain. Reproduction or use outside this permission or without authorization may be treated as copyright infringement in accordance with the *Copyright Act*. Authorization may be obtained on written application to the Office of the Speaker of the House of Commons.

Reproduction in accordance with this permission does not constitute publication under the authority of the House of Commons. The absolute privilege that applies to the proceedings of the House of Commons does not extend to these permitted reproductions. Where a reproduction includes briefs to a Standing Committee of the House of Commons, authorization for reproduction may be required from the authors in accordance with the *Copyright Act*.

Nothing in this permission abrogates or derogates from the privileges, powers, immunities and rights of the House of Commons and its Committees. For greater certainty, this permission does not affect the prohibition against impeaching or questioning the proceedings of the House of Commons in courts or otherwise. The House of Commons retains the right and privilege to find users in contempt of Parliament if a reproduction or use is not in accordance with this permission.

Also available on the House of Commons website at the following address: www.ourcommons.ca

REPORT 4, REPLACING MONTRÉAL'S CHAMPLAIN BRIDGE—INFRASTRUCTURE CANADA, OF THE 2018 SPRING REPORTS OF THE AUDITOR GENERAL OF CANADA

Report of the Standing Committee on Public Accounts

Hon. Kevin Sorenson Chair

OCTOBER 2018
42nd PARLIAMENT, 1st SESSION

NOTICE TO READER	
Reports from committee presented to the House of Commons	
Presenting a report to the House is the way a committee makes public its findings and recommendation on a particular topic. Substantive reports on a subject-matter study usually contain a synopsis of the testimony heard, the recommendations made by the committee, as well as the reasons for those recommendations.	S

STANDING COMMITTEE ON PUBLIC ACCOUNTS

CHAIR

Hon. Kevin Sorenson

VICE-CHAIRS

Alexandra Mendès David Christopherson

MEMBERS

Chandra Arya Joyce Murray*

Shaun Chen Alexander Nuttall

Pat Kelly Randeep Sarai

Steven Mackinnon* Jean Yip

Rémi Massé

Doug Eyolfson

OTHER MEMBERS OF PARLIAMENT WHO PARTICIPATED

Hon. Michael D. Chong Pam Goldsmith-Jones

Brigitte Sansoucy

Gérard Deltell Robert Kitchen

Anju Dhillon Marc Miller

Fayçal El-Khoury Brenda Shanahan

^{*} Non-voting member, pursuant to Standing Order 104(5).

CLERK OF THE COMMITTEE

Angela Crandall

LIBRARY OF PARLIAMENT

Parliamentary Information and Research Service

André Léonard, Analyst Dillan Theckedath, Analyst

THE STANDING COMMITTEE ON PUBLIC ACCOUNTS

has the honour to present its

FIFTY-FIRST REPORT

Pursuant to its mandate under Standing Order 108(3)(g), the Committee has studied the Report 4, Replacing Montréal's Champlain Bridge—Infrastructure Canada, of the 2018 Spring Reports of the Auditor General of Canada, and has agreed to report the following:



REPORT 4, REPLACING MONTRÉAL'S CHAMPLAIN BRIDGE—INFRASTRUCTURE CANADA, OF THE 2018 SPRING REPORTS OF THE AUDITOR GENERAL OF CANADA

INTRODUCTION

In October 2011, the federal government announced the construction of a new bridge to replace the Champlain Bridge, which links the island of Montréal with the south shore of the St. Lawrence River.¹ The existing bridge came into use in 1962, and quickly deteriorated for a number of reasons.² According to the Office of the Auditor General of Canada (OAG), "[heavy] investments were required to repair and maintain it." Furthermore, if "a structural problem forced the bridge to close, the four other river crossings in the area could not accommodate the displaced traffic without significant congestion."³

The Jacques Cartier and Champlain Bridges Incorporated (JCCBI) has owned the bridge since the Crown corporation was created in 1978; between 1998 and 2014, it was "a subsidiary of the Federal Bridge Corporation [Limited, FBCL] under the responsibility of the Minister of Transport."⁴

As shown in Figure 1, the new Champlain Bridge project includes several elements:

 "Construction of a replacement for the existing Champlain Bridge. The new bridge will be a cable-stayed structure that is 3.4 kilometres long. It will have two decks supporting three lanes of highway traffic in each direction; a third, central deck supporting a mass transit system; and a multi-use path.

Office of the Auditor General of Canada (OAG), <u>Replacing Montréal's Champlain Bridge — Infrastructure Canada</u>, Report 4 of the 2018 Spring Reports of the Auditor General of Canada, para. 4.1.

² Ibid., para. 4.21.

³ Ibid., para. 4.2.

⁴ Ibid., para. 4.3.



- Demolition and replacement of the L'Île-des-Sœurs Bridge connecting L'Île-des-Sœurs to Montréal. The replacement will be 470 metres long and will include two decks for traffic, as well as a multi-use path.
- Reconstruction and widening of the federal portion of Autoroute 15, with three lanes in each direction.
- Reconstruction of Autoroute 10, and improvement of the ramps on the south shore between Route 132 and Autoroute 10."5

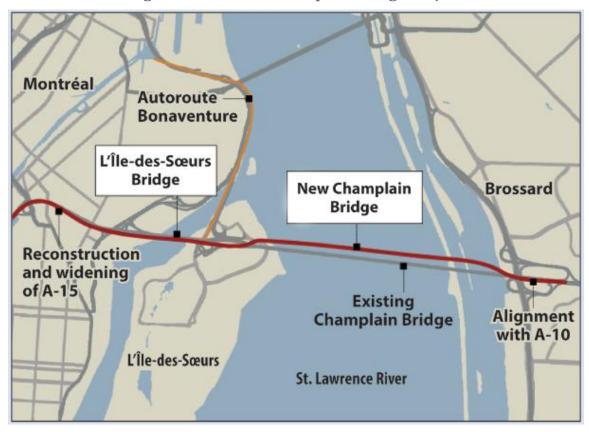


Figure 1—The New Champlain Bridge Project

Source: Figure taken from OAG, Replacing Montréal's Champlain Bridge — Infrastructure Canada, Report 4 of the 2018 Spring Reports of the Auditor General of Canada, Exhibit 4.2.

On 16 June 2015, the federal government signed a contract with a private partner—Signature on the Saint Lawrence Group (SSL), a consortium of various companies—to complete the project. SSL undertook to deliver the project for just under \$4 billion,

⁵ Ibid., para. 4.4.

"excluding the government's project management and land acquisition costs," and to have the bridge open to traffic on 1 December 2018. The 42-month construction period would be followed by a 30-year operation and maintenance period. After that time, the bridge would "be transferred back to the government in a predefined condition," to ensure "that the private partner used high-quality materials and adequately operated and maintained the bridge."

An integrated team of officials was drawn from five federal organizations to manage the project:

- "From 2011 to 2014, Transport Canada was responsible for planning for the replacement of the existing Champlain Bridge.
- Infrastructure Canada took over in 2014, when the Minister of Infrastructure was given responsibility for the project. Infrastructure Canada became responsible for all technical matters related to procurement, contracting, and construction.
- Public Services and Procurement Canada was the federal contracting authority for the project. It was responsible for administering the procurement process and managing contracts, including any amendments.
- PPP Canada, a Crown corporation, was the commercial and financial adviser to the project team. It played an active role in selecting the private partner, up to the signing of the contract. Its responsibilities for the project ended in May 2017.
- The Department of Justice Canada is the government's legal adviser on the project."⁷

In the spring of 2018, the OAG released a performance audit whose purpose was to determine "whether Infrastructure Canada managed selected aspects of the new Champlain Bridge project to meet the objective of delivering a durable bridge on time and in a cost-effective manner." The audit assessed:

⁶ Ibid., para. 4.5.

⁷ Ibid., para. 4.6.

⁸ Ibid., para. 4.7.



- the planning for the replacement of the existing Champlain Bridge;
- costs of major maintenance repairs of the existing bridge;
- the selection of the procurement model to be used for the new Champlain Bridge project;
- the federal government's analysis and mitigation of key procurement risks;
- the proponents' technical proposals, as well as the management of project changes; and
- the likelihood that the new bridge would attain the desired 125-year service life.⁹

On 7 June 2018, the House of Commons Standing Committee on Public Accounts (the Committee) held a hearing on this audit. The following witnesses appeared: from the OAG, Michael Ferguson, Auditor General of Canada, and Philippe Le Goff, Principal. From Infrastructure Canada, Kelly Gillis, Deputy Minister; Marc Fortin, Assistant Deputy Minister, Program Operations; and, Natalie Bossé, Director General, Major Bridges. 10

FINDINGS AND RECOMMENDATIONS

A. Planning for the Replacement of the Existing Champlain Bridge

1. Delays in Decision Making

As early as 2004, "the JCCBI expressed concerns in the FBCL's corporate plan about the shortening of the remaining service life of the existing bridge. However, the JCCBI did not share information about the bridge degradation and structural problems with Transport Canada. Consequently, the government did not begin considering replacement of the existing bridge at that time." 11

⁹ Ibid., About the Audit, Scope and Approach.

House of Commons Standing Committee on Public Accounts, Evidence, 1st Session, 42nd Parliament, 7 June 2018, Meeting No. 103.

OAG, Replacing Montréal's Champlain Bridge — Infrastructure Canada, Report 4 of the 2018 Spring Reports of the Auditor General of Canada, para. 4.25.

According to the OAG, in February 2006, "the JCCBI obtained results of its independent financial analysis. The analysis stated that maintaining and repairing the existing bridge over its remaining service life would cost more than the investment needed to build a new bridge for delivery in 2020."¹²

As a result, in fiscal year 2006—2007, "the JCCBI officially communicated to the Minister of Transport that replacement would be more cost-effective than continuing to repair the bridge. The corporate plan stated, 'The planning for the construction of the new bridge should be put in place now to have an operational crossing by 2021.'...

Nevertheless, it was only in late 2011 that the government approved the replacement of the bridge with a new structure, initially set for delivery by 2021. This decision marked the start of the planning process. Two years later, in 2013, an accelerated construction schedule of 42 months was adopted and the completion date was advanced to 2018 because of new major structural concerns with the existing bridge." 13

According to the OAG, "it would have been judicious for the government to react to the JCCBI's conclusions presented in the FBCL's corporate plan for 2006—07, and to start planning for the bridge replacement soon afterward. A new bridge could have been delivered by early 2015 if the JCCBI had provided timely information to Transport Canada, indicating the need to replace the existing bridge. The delays in planning, communicating, and deciding entailed avoidable government expenditures of over \$500 million from the 2015—16 fiscal year to the date of delivery of the new bridge: \$306 million for major repairs to the existing bridge ... and \$235 million to the private partner for additional resources and transportation costs caused by load restrictions on the existing bridge." 14

In response to a question about the exact information given regarding the need to replace the bridge in 2007, Michael Ferguson, Auditor General of Canada, stated the following:

... JCCBI indicated that it was necessary to begin planning the construction of a new bridge so that it would be operational by 2021. JCCBI stated that it was necessary to begin the planning for a new bridge but did not clearly describe the deteriorating

¹² Ibid., para. 4.24.

¹³ Ibid., paras 4.26 and 4.27.

¹⁴ Ibid., para. 4.28.



condition of the bridge. Given the communications between JCCBI and the department, it was somewhat difficult to grasp just how urgent the situation was.¹⁵

Although the bridge's state of disrepair may not have been clear, according to a news article, on 18 August 2008, Lawrence Cannon, then Minister of Transport, announced that "we are starting to plan the construction of a new bridge in the Montreal area." The reasons given in the article were the conclusions in the FBCL report: it would be more cost-effective to build a new bridge than to continue repairing the existing one. In addition, according to the OAG, between 2007 and 2008, the "Minister of Transport announced the need to replace the bridge." The reasons given in the article were the conclusions in the FBCL report: it would be more cost-effective to build a new bridge than to continue repairing the existing one. In addition, according to the OAG, between 2007 and 2008, the "Minister of Transport announced the need to replace the bridge."

To improve infrastructure replacement planning, the OAG gave the following recommendation:

To avoid service disruptions and unnecessary expenditures, Infrastructure Canada should analyze the life-cycle costs of the infrastructure assets in its portfolio and should plan effectively for timely replacements.¹⁸

Kelly Gillis, Deputy Minister, recognized "the importance of life-cycle asset management" and new technology to improve asset management, such as sensors to understand the state and behaviour of a bridge in real time. ¹⁹ In Infrastructure Canada's Detailed Action Plan, the Department indicated that it would produce a strategic plan by the spring of 2020 with a long-term plan, schedule, budget and business case based on the projected lifespan of each JCCBI structure. ²⁰ However, the OAG's recommendation addressed not only JCCBI structures, but all structures in Infrastructure Canada's portfolio.

Therefore, the Committee recommends:

Recommendation 1 — Regarding infrastructure life-cycle cost analysis

That, by 31 March 2019, the *Office of Infrastructure of Canada* provide the House of Commons Standing Committee on Public Accounts with a progress report on its

House of Commons Standing Committee on Public Accounts, *Evidence*, 1st Session, 42nd Parliament, 7 June 2018, Meeting No. 103, 1610.

¹⁶ Mathieu Bélanger, "Un pont tout neuf," Le Journal de Montréal, 18 August 2008 [TRANSLATION].

OAG, Replacing Montréal's Champlain Bridge — Infrastructure Canada, Report 4 of the 2018 Spring Reports of the Auditor General of Canada, Exhibit 4.6.

¹⁸ Ibid., para. 4.29.

House of Commons Standing Committee on Public Accounts, *Evidence*, 1st Session, 42nd Parliament, 7 June 2018, Meeting No. 103, 1545.

²⁰ Infrastructure Canada, <u>Detailed Action Plan</u>, p. 1.

comprehensive strategic plan, including a long-term plan, a schedule, a budget and a business case based on the projected lifespan of each structure for which *Jacques Cartier and Champlain Bridges Inc.* is responsible; a full report should also be provided to the Committee by 15 June 2020.

2. The Chosen Procurement Model: A Public-Private Partnership

According to the OAG, prior to "deciding on a public-private partnership [P3 or PPP], federal organizations are required to perform qualitative and value-for-money analyses based on the practices established by PPP Canada." Also, the OAG "found that the government selected the P3 model in 2011, before it had completed its analyses."²¹

According to Kelly Gillis, after the decision to replace the bridge was made in 2011, the decision to move forward with a P3 funding model was announced in December 2013:

Given the complexity of this project, in 2012 private sector experts were engaged to support a multi-departmental team of professionals who developed a business case to determine the best delivery method for the replacement of the bridge. Based on their analysis, the government announced the decision to move with a P3 procurement model in December 2013[.]²²

When faced with what appears to be a contradiction, it is important to find other sources that indicate at what time the decision was made to pursue a P3 model: either in 2011 (before the analyses had been completed) or in 2013.

In a Government of Canada news release published on 7 February 2013, a timeline of events for the replacement of the Champlain Bridge was given. It states: "October 5, 2011: Announcement of the construction of a new bridge for the St. Lawrence in Montreal to replace the Champlain Bridge. It will be built in a public-private partnership and there will be tolls."²³

In addition, on 6 October 2011, the day after the announcement was made that the bridge would be replaced, an article stated that it would be a new bridge (not a tunnel)

²¹ Ibid., para. 4.35.

House of Commons Standing Committee on Public Accounts, *Evidence*, 1st Session, 42nd Parliament, 7 June 2018, Meeting No. 103, 1535.

Government of Canada "New bridge for the St. Lawrence - The federal government will continue to consult with its partners - Chronology," Backgrounder, 7 February 2013.



built through a P3, costing a maximum of \$5 billion and that it would be ready within 10 years.²⁴

Therefore, both the OAG's report and a government news release indicate that the decision to use a P3 model was made in 2011, a fact that is also supported by the news article. Deputy Minister Kelly Gillis may have stated that the decision was made in December 2013 because that is when the government announced the accelerated timeline to replace the bridge in 2018, and the analyses carried out in 2012 and 2013 addressed the best way to complete the project quickly.

"In 2014, Infrastructure Canada completed a high-level qualitative analysis for the new Champlain Bridge project. ... The analysis supported a conclusion in favour of the P3 model, identifying several advantages," including the fact that "the private partner would assume responsibility for more construction- and operation-related risks, such as technical defects, cost overruns, and delays."²⁵

The OAG noted that "the qualitative analysis was incomplete because the Department did not examine previous construction projects, nor did it analyze other possible forms that a P3 model could take, with varying levels of federal government involvement. Furthermore, the Department did not assess and consider some aspects of the project."²⁶

According to the OAG, in January 2014, "the Department finalized a value-for-money analysis to quantify the savings of a P3 model, compared with the traditional procurement model. ... The analysis indicated that a public-private partnership would generate estimated savings of \$227 million, compared with a public-sector approach. PPP Canada reviewed the analysis and communicated issues and recommendations to Infrastructure Canada. However, the Department did not make all necessary adjustments."²⁷

In July 2015, "Infrastructure Canada updated its value-for-money analysis, which originally showed \$227 million in savings for the P3 model. The update was based on the financial proposal of the private partner and updated values for the traditional model, and it was conducted after the contract had been signed. The updated analysis indicated

²⁴ Kathleen Lévesque, "Pont Champlain — Ottawa a oublié le transport collectif," Le Devoir, 6 October 2011 [AVAILABLE IN FRENCH ONLY].

OAG, Replacing Montréal's Champlain Bridge — Infrastructure Canada, Report 4 of the 2018 Spring Reports of the Auditor General of Canada, para. 4.36.

²⁶ Ibid., para. 4.37.

²⁷ Ibid., para. 4.38.

that proceeding with the selected proposal would yield savings of \$1.75 billion, compared with the traditional procurement model—that is, \$1.5 billion above the estimated savings in the Department's 2014 analysis. In the updated analysis, however, [the OAG] found weaknesses favouring the P3 model."²⁸

According to the OAG, "the value-for-money analyses were of little use to decision makers because they contained many flaws favouring the P3 model." Moreover, "the Department's analyses indicated savings that were unrealistic." ²⁹

For example, the estimated construction costs for the project "had a high variability, due to the Department's use of comparatively imprecise estimates, which were based on a design that was only 5% completed. PPP Canada was concerned about the low level of design completion. Best practices recommend the use of a design that is at least 30% completed for more precise cost estimates, especially when project complexity is high."

Philippe Le Goff, Principal (OAG) talked about the advantages of the traditional approach (fully public) and the P3 model:

[The] cost of borrowing ... is lower for the state than for a private partner, for example. Usually, money is saved by going that route. However, a private partner may have expertise the department does not. So it is possible to achieve a higher efficiency rate by choosing a public-private partnership.³¹

The OAG therefore made the following recommendation:

Before deciding which procurement model to adopt for future large infrastructure projects, Infrastructure Canada should:

- analyze the key project-specific aspects when conducting a qualitative analysis, and evaluate their costs;
- use best practices, sound assumptions, and evidence-based data from relevant past projects to better evaluate the risks and assumptions used in the value-for-money analysis;

²⁸ Ibid., para. 4.42.

²⁹ Ibid., para. 4.43.

³⁰ Ibid., para. 4.38.

House of Commons Standing Committee on Public Accounts, *Evidence*, 1st Session, 42nd Parliament, 7 June 2018, Meeting No. 103, 1600.



 perform a sound sensitivity analysis to inform decision makers about the variability of expected costs and benefits.³²

According to Infrastructure Canada's Detailed Action Plan, a "clearly defined decision-making process for the selection of future project procurement models informed by a structured lessons exercise in order to promote the recurrence of desirable outcomes and preclude the recurrence of undesirable outcomes" would be prepared by the fall of 2020 and communicated to departmental decision makers.³³

Therefore, the Committee recommends:

Recommendation 2 — Regarding the chosen procurement model

That, by 15 June 2019, the *Office of Infrastructure of Canada* provide the House of Commons Standing Committee on Public Accounts with the progress report on the decision-making process for the selection of future project procurement models, including the lessons learned from the decisions that led to the chosen procurement model for the new Champlain Bridge project; a full report should also be provided by 31 December 2020.

The OAG made another recommendation on this matter:

After completing the construction of the new Champlain Bridge, Infrastructure Canada should create realistic benchmarks for construction costs, risk evaluation, and efficiency rates in value-for-money analyses, for use in future requests for proposals for infrastructure projects.³⁴

In its Detailed Action Plan, Infrastructure Canada stated that it would prepare a benchmark study, in collaboration with Public Services and Procurement Canada, that would include "a repository of data collected from the [new Champlain Bridge] project and other infrastructure projects"³⁵ by the winter of 2020.

Therefore, the Committee recommends:

32 OAG, Replacing Montréal's Champlain Bridge — Infrastructure Canada, Report 4 of the 2018 Spring Reports of the Auditor General of Canada, para. 4.44.

33 Infrastructure Canada, <u>Detailed Action Plan</u>, pp. 1—2.

OAG, <u>Replacing Montréal's Champlain Bridge — Infrastructure Canada</u>, Report 4 of the 2018 Spring Reports of the Auditor General of Canada, para. 4.45.

35 Infrastructure Canada, <u>Detailed Action Plan</u>, pp. 2—3.

Recommendation 3 — Regarding benchmarks for value-for-money analyses

That, by 15 June 2019, the *Office of Infrastructure of Canada* provide the House of Commons Standing Committee on Public Accounts a progress report on its benchmark study with benchmarks for value-for-money analyses to assess infrastructure projects; and that a full report be provided by 31 March 2020.

B. Management of Procurement Risks

1. Approach for Evaluating Technical Proposals

The OAG "found that the Department had put measures in place to evaluate the technical proposals consistently and fairly," and that "of the three proposals considered in Step 2, the Department concluded that all had met the mandatory criteria, and that they had obtained at least the minimum score required on two rated criteria and the overall score required for all seven rated criteria." However, "the evaluation did not provide the Department with a sufficient understanding of certain aspects of the bidders' proposals." ³⁶

Furthermore, "after awarding the contract, Infrastructure Canada made several changes to the project, some of them major, to respond to the needs of surrounding communities and stakeholders. The negotiations on these changes, which were ongoing at the time [the OAG report] was published, have been time-consuming."³⁷

The OAG also found that, "to avoid lengthening the procurement period and adding costs to bidders' proposals, the Department chose to verify that designs met the expected service life requirement of 125 years after it awarded the contract." 38

As a result, without "obtaining results of durability analyses in advance, Infrastructure Canada could not know whether the proposed bridge designs would meet the expected service life requirement before it signed a contract with the selected bidder." For example, "the durability analyses ... did not fully assess several deterioration mechanisms [such as] frost damage and the compounding effect of all deterioration

OAG, <u>Replacing Montréal's Champlain Bridge — Infrastructure Canada</u>, Report 4 of the 2018 Spring Reports of the Auditor General of Canada, para. 4.57.

³⁷ Ibid., para. 4.47.

³⁸ Ibid., para. 4.60.

³⁹ Ibid.



mechanisms. Consequently, [the OAG] performed comprehensive durability analyses on the designs of key non-replaceable components of the new bridge. [The OAG] did not find design problems that would affect the examined components' ability to meet their expected service life."⁴⁰

Thus, the OAG made the following recommendation:

When evaluating proposals for public-private partnership contracts under its responsibility, Infrastructure Canada should develop an evaluation approach that includes

- specifying the appropriate weights and minimum scores for assessing important technical project requirements, and
- requiring bidders to provide analysis or evidence that their proposals meet all critical technical requirements.⁴¹

According to Infrastructure Canada's Detailed Action Plan, "Infrastructure Canada will work with [Public Services and Procurement Canada]," and will capture "lessons learned in a central repository" by the winter of 2020.

As the response to this recommendation and the OAG's next recommendation led to the same response in the Department's Detailed Action Plan, the Committee will only make one recommendation to address both of these OAG recommendations.

2. Actual and projected costs

The OAG found that, "while the governance was generally sound, Infrastructure Canada issued more than 20 project change notices, which were accepted by the private partner. Given the aggressive construction schedule, size, and complexity of the new Champlain Bridge project, we also found that the changes introduced additional risks of delays and cost overruns." Furthermore, according to PPP Canada, "it is not advisable to make extensive changes to a P3 project." 44

41 Ibid., para. 4.62.

⁴⁰ Ibid., para. 4.61.

⁴² Infrastructure Canada, <u>Detailed Action Plan</u>, pp. 2—3.

⁴³ OAG, Replacing Montréal's Champlain Bridge — Infrastructure Canada, Report 4 of the 2018 Spring Reports of the Auditor General of Canada, para. 4.68.

⁴⁴ Ibid., para. 4.69.

The OAG also noted that "Infrastructure Canada was slow to finalize the project changes. According to the Department, it followed a thorough approach for analyzing the project changes to ensure that they were technically sound and that prices were reasonable. The private partner had alerted the Department about the growing risk of delays because of the unapproved project changes. However, two years after the start of construction, Infrastructure Canada had still not approved any of the changes."

According to the OAG, in 2011, "the Government of Canada announced construction of the new Champlain Bridge, with toll collection as a way of recovering costs. ... In November 2015, however, the government decided that the new Champlain Bridge would be toll-free." The OAG indicated that the decision to remove toll collection "had significant implications for the project, and reaching agreement on it proved time-consuming." The oak of the project, and reaching agreement on the proved time-consuming.

Among other things, eliminating tolls was expected to increase traffic volumes by approximately 20%, which would increase wear and tear on the bridge structure, resulting in higher operation and maintenance costs.⁴⁸

These costs are not yet known, according to Natalie Bossé, Director General, since the Department is still negotiating, parties have not yet agreed to the exact amounts that will be paid to SSL.⁴⁹

The OAG also found that "some project risks had materialized and the federal government was assuming more costs than originally planned. This meant that the full expected savings would not be achieved." ⁵⁰

In the summer of 2017, "the private partner reported to the Department that the project was about eight months behind schedule, but that it was still possible to meet the completion deadline through acceleration measures. In March 2018, the Department and the private partner negotiated a global settlement, which included an

⁴⁵ Ibid., para. 4.71.

⁴⁶ Ibid., Exhibit 4.9.

⁴⁷ Ibid., para. 4.72.

⁴⁸ Ibid., Exhibit 4.9.

⁴⁹ House of Commons Standing Committee on Public Accounts, *Evidence*, 1st Session, 42nd Parliament, 7 June 2018, Meeting No. 103, 1625.

⁵⁰ OAG, <u>Replacing Montréal's Champlain Bridge — Infrastructure Canada</u>, Report 4 of the 2018 Spring Reports of the Auditor General of Canada, para. 4.73.



extension to 21 December 2018 for completing the bridge construction, and an amount of \$235 million."51

Michael Ferguson noted that "the \$235 million was broken down into two items: \$63 million for the settlement of all existing claims related to transportation and \$172 million for additional acceleration measures. The second item may include the impact from the strike, but I don't have the exact details on that." Kelly Gillis clarified that it was "the iron workers' strike [and] the public service engineers' strike."

According to the OAG, "the project will not be delivered within the original budget. Even with additional construction resources or new construction methods, meeting the revised construction completion date of 21 December 2018 appears very challenging." ⁵⁴

Kelly Gillis confirmed that "Infrastructure Canada will continue to work closely with [its] private sector partner, SSL, which has committed to delivering the bridge in December 2018 as planned." 55 She added that, "every day the project is late during the first week, the group will be fined \$100,000. After seven days, the fine goes up to \$400,000 per day, up to a maximum of \$150 million." 56

The OAG concluded that "the problems [it] noted in [this] audit—such as over-optimistic risk evaluation, an accelerated procurement process, and a high number of project changes—are typical problems noted by experts in connection with P3 infrastructure projects in Canada. Lessons learned from the new Champlain Bridge project are important because the government intends to deliver more P3 infrastructure projects in the future."⁵⁷

The OAG therefore made the following recommendation:

⁵¹ Ibid., para. 4.75.

House of Commons Standing Committee on Public Accounts, *Evidence*, 1st Session, 42nd Parliament, 7 June 2018, Meeting No. 103, 1625.

⁵³ Ibid., 1630.

OAG, <u>Replacing Montréal's Champlain Bridge — Infrastructure Canada</u>, Report 4 of the 2018 Spring Reports of the Auditor General of Canada, para. 4.76.

House of Commons Standing Committee on Public Accounts, *Evidence*, 1st Session, 42nd Parliament, 7 June 2018, Meeting No. 103, 1535.

⁵⁶ Ibid., 1605.

⁵⁷ OAG, Replacing Montréal's Champlain Bridge — Infrastructure Canada, Report 4 of the 2018 Spring Reports of the Auditor General of Canada, para. 4.78.

In future public-private partnership projects, Infrastructure Canada should minimize the number of project changes and approve them in a timely manner, to reduce the risk of cost overruns and delays.⁵⁸

As the Department's responses to the OAG's recommendations in paragraphs 4.62 and 4.79 were similar, the Committee recommends:

Recommendation 4 — Regarding the evaluation of proposals for public-private partnerships and changes made to infrastructure projects

That, by 31 March 2020, the *Office of Infrastructure of Canada* provide the House of Commons Standing Committee on Public Accounts a report detailing the positive and negative lessons learned about evaluating proposals following the new Champlain Bridge project, particularly as regards: 1) the errors identified by the *Office of the Auditor General of Canada* regarding the inadequate weighted assessment criteria; 2) the lack of evidence showing that the proposals satisfy all critical technical requirements; and 3) the many project changes and how to minimize these changes in the future.

ADDITIONAL COMMENT

The OAG reported that eliminating the toll would increase traffic on the bridge by 20%, which would increase wear and tear on the bridge structure and lead to higher operation and maintenance costs.⁵⁹ Philippe Le Goff confirmed that this "information came from departmental documents."⁶⁰

Although the matter was not addressed directly in the audit, it would be interesting to determine whether the 20% increase in maintenance costs would be balanced out by a reduction in traffic over other federal or provincial bridges, and thus lower maintenance costs for these bridges. Some studies indicated that the toll would increase traffic on other bridges in the area, such as the Jacques-Cartier and Victoria bridges. ⁶¹

The Committee does not want to examine the information on the higher maintenance costs for the new Champlain Bridge or on the lower maintenance costs, if applicable, for other federal structures and bridges in the Montreal area until after the negotiations

⁵⁸ Ibid., para. 4.79.

⁵⁹ Ibid., Exhibit 4.9.

House of Commons Standing Committee on Public Accounts, *Evidence*, 1st Session, 42nd Parliament, 7 June 2018, Meeting No. 103, 1620.

David Gentile, "Un péage sur le pont Champlain alourdirait la circulation dans la région," Radio-Canada, 5 May 2014 [AVAILABLE IN FRENCH ONLY].



with SSL have been completed, to ensure that the negotiations are not affected. However, the Committee recommends:

Recommendation 5 — Regarding the maintenance costs associated with eliminating bridge tolls for the new Champlain Bridge

That, 120 days after the *Office of Infrastructure of Canada* and Signature on the Saint-Lawrence Group (SSL) will have finalized the agreement pertaining to the compensation due to SSL for lost revenue from the elimination of tolls on the new Champlain Bridge, the *Office of Infrastructure of Canada* provide the House of Commons Standing Committee on Public Accounts a report on said compensation and, as reasonable: 1) an estimate of the maintenance costs of all the federally owned bridges linking the island of Montreal to the South Shore, without tolls on the new Champlain Bridge; and, 2) a comparative estimate of maintenance costs had the new bridge included tolls.

CONCLUSION

The Committee concludes that "Infrastructure Canada did not plan the replacement of the existing Champlain Bridge in a cost-effective manner." Furthermore, the Department "did not adequately manage selected procurement risks to mitigate cost overruns and delays."

The OAG noted that "the private partner's ability to meet the revised completion date of 21 December 2018 remained uncertain." However, Infrastructure Canada's Deputy Minister stated that the Department would "continue to work closely with [its] private sector partner, SSL, which has committed to delivering the bridge in December 2018 as planned." In addition, if the new bridge is not ready on time, SSL will have to pay large fines.

Therefore, the Committee has five recommendations for Infrastructure Canada to ensure that large federal government infrastructure projects are better managed.

⁶² OAG, Replacing Montréal's Champlain Bridge — Infrastructure Canada, Report 4 of the 2018 Spring Reports of the Auditor General of Canada, para. 4.80.

⁶³ Ibid., para. 4.81.

⁶⁴ Ibid.

House of Commons Standing Committee on Public Accounts, *Evidence*, 1st Session, 42nd Parliament, 7 June 2018, Meeting No. 103, 1535.

REPORT 4, REPLACING MONTRÉAL'S CHAMPLAIN BRIDGE— INFRASTRUCTURE CANADA, OF THE 2018 SPRING REPORTS OF THE AUDITOR GENERAL OF CANADA



SUMMARY OF RECOMMENDED ACTIONS AND ASSOCIATED DEADLINES

 $Table\ 1-Summary\ of\ Recommended\ Actions\ and\ Associated\ Deadlines$

Recommendation	Recommended Action	Deadline
Recommendation 1	The Office of Infrastructure of Canada (Infrastructure Canada) must present to the Committee a progress report on its comprehensive strategic plan, including a long-term plan, a schedule, a budget and a business case based on the projected lifespan of each structure for which Jacques Cartier and Champlain Bridges Inc. is responsible; a final report must also be presented to the Committee.	Progress Report: 31 March 2019 Final Report: 15 June2020
Recommendation 2	Infrastructure Canada must present to the Committee a progress report on the decision-making process for the selection of future project procurement models, including the lessons learned from the decisions that led to the chosen procurement model for the new Champlain Bridge project; a final report must also be presented to the Committee.	Progress Report: 15 June 2019 Final Report: 31 December 2020
Recommendation 3	Infrastructure Canada must present to the Committee a progress report on its benchmark study with benchmarks for value-for-money analyses to assess infrastructure projects; a final report must also be presented to the Committee.	Progress Report: 15 June 2019 Final Report: 31 March 2020

Recommendation	Recommended Action	Deadline
Recommendation 4	Infrastructure Canada must present to the Committee a report detailing the positive and negative lessons learned about evaluating proposals following the new Champlain Bridge project, particularly as regards: 1) the errors identified by the Office of the Auditor General of Canada regarding the inadequate weighted assessment criteria; 2) the lack of evidence showing that the proposals satisfy all critical technical requirements; and 3) the many project changes and how to minimize these changes in the future.	31 March 2020
Recommendation 5	Infrastructure Canada must present to the Committee a report on the compensation due to the Signature on the Saint-Lawrence Group (SSL) for lost revenue from the elimination of tolls on the new Champlain Bridge and, as reasonable: 1) an estimate of the maintenance costs of all the federally owned bridges linking the island of Montreal to the South Shore, without tolls on the new Champlain Bridge; and, 2) a comparative estimate of maintenance costs had the new bridge included tolls.	120 days after the finalization of an agreement between Infrastructure Canada and SSL

APPENDIX A LIST OF WITNESSES

Organizations and Individuals	Date	Meeting
Office of Infrastructure of Canada	2018/06/07	103
Natalie Bossé, Director General, Major Bridges		
Marc Fortin, Assistant Deputy Minister, Program Operations		
Kelly Gillis, Deputy Minister, Infrastructure and Communities		

Office of the Auditor General

Michael Ferguson, Auditor General of Canada Philippe Le Goff, Principal

REQUEST FOR GOVERNMENT RESPONSE

Pursuant to Standing Order 109, the Committee requests that the government table a comprehensive response to this Report.

A copy of the relevant *Minutes of Proceedings* (Meetings Nos. 103,108 and 109) is tabled.

Respectfully submitted,

Hon. Kevin Sorenson, P.C., MP Chair