

COURSE INFORMATION

Course title:	Public-Private Partnerships	Credits:	1.5
Course code:	BAPA580	Class location:	HA133
Session, term, period:	2019W1, Period 7	Class times:	Wed. 6:00 to 9:30 pm
Section(s):	001	Pre-requisites:	MBA Core or Permission of Instructor/Coordinator
Course duration:	October 28 – December 7, 2019	Co-requisites:	n/a
Division:	Strategy & Business Economics		
Program:	MBA		

INSTRUCTOR INFORMATION

Instructor:	Thomas W. Ross	Office location:	HA280
Phone:	604 822-8478	Office hours:	Wednesdays 2:00 to 4:00 pm or by appointment
Email:	tom.ross@sauder.ubc.ca		

COURSE DESCRIPTION

Governments across Canada and around the world have been looking at public-private partnerships (PPPs or P3s) as ways to provide for an expanded involvement of the private sector in the delivery of public services such as roads, public transit, schools, hospitals and prisons. The stated objective is to harness the forces of competition and the innovative potential of the private sector to deliver services of high quality to citizens at lower costs to taxpayers. Many of these projects have been controversial, with opponents arguing that they have handed important decision-making authority to the unelected private sector with compromised accountability and little evidence that real savings will be realized. This course will examine both the costs and benefits of P3s as alternative public procurement methods, will contrast these with other procurement modes, and will consider various P3 design issues. The course material will be delivered by a team including UBC professors from the Sauder School and the Department of Civil Engineering; as well as prominent members of the P3 industry, from both the public and private sectors. Topics covered will include: (i) drivers and theories for P3s: what are the purported costs and benefits and how do these compare with other procurement models?; (ii) the financing of P3s; (iii) identifying, pricing and allocating risks in P3 projects; (iv) preparing a sustainable long-term concession agreement; and (v) assessing “value for money” in P3 arrangements.

COURSE FORMAT

Classes will be in lecture format with much time allocated for class discussion. Each session will be led by experts in the topic area.

LEARNING OBJECTIVES

From this course students will develop an understanding of how public-private partnerships are being used to provide critical infrastructure in many countries. Specifically, they will learn about:

- (a) The various forms P3s can take.
- (b) The claimed advantages and disadvantages of the P3 model for the delivery of infrastructure.
- (c) The best ways to organize a P3 program from a government’s perspective
- (d) The various ways in which P3s are financed.
- (e) The challenges associated with preparing effective long-term P3 contracts.
- (f) The various approaches to identifying allocating the key risks in P3 infrastructure projects.

Some Important Questions:

We suggest students consider the following questions as they hear from each of the instructors about their particular areas of expertise. These questions are also to be addressed in the Briefs students will prepare (see below):

1. For complex projects like many of those in health care and education, what services should be assigned to the P3 proponent and which ones should be retained by the public sector client?
2. How do other public policy objectives – e.g. sustainability, opportunities for indigenous communities, training for refugees, etc., fit a P3 approach and how should bids be evaluated?
3. Can the different components of a P3 – the Design-build contract, Operations, Financing and Rehabilitation be procured and contracted for separately by government so that the value of a P3 is captured? (Stated another way, is the value of integration ascribed to a P3 real or just an illusion?)
4. Is private financing necessary to create an effective P3? If yes, how much private sector financing (equity and debt) is necessary? And, in providing the balance of the financing required, can government really act like a bank in terms of demanding performance by the concessionaire?
5. What is the factual evidence that P3s deliver better value and are the metrics used the right ones as a function of project type? Is this evidence made transparent with public disclosure? What reliance should be put on value for money studies? Are they truly unbiased documents?
6. Is the quantum assigned to the risk transferred to, or shared with, the private sector partner in the value for money assessment process reflective of reality? What is the evidence in support of the assertion that it is? Stated another way, what data is available about extras, change orders and claims associated with P3 projects?
7. Do the transaction costs, complexity and risks of P3's outweigh the benefits?
8. What is the evidence in support of the assertion that traditional delivery (design-bid-build) coupled with either government delivery or contracted out facilities management offers the best value?
9. From a societal/value-added perspective, what projects are best suited for P3 delivery (which projects in the economics infrastructure class, and which projects in the social infrastructure class)?

ASSESSMENTS

Summary

<u>Component</u>	<u>Weight</u>
Project	45%
Presentation	20%
Short brief	25%
Participation	<u>10%</u>
Total	<u>100%</u>

Details of Assessments

Project: Students will work in groups to prepare a paper evaluating an actual P3, identifying important lessons learned (i.e. things that could have been done better by the parties.) The P3 cannot be in British Columbia. (This is worth 45% of the course grade.) Please note that all reference material used in

preparing the report should be properly cited. There are a lot of unsubstantiated opinion pieces on P3s out there and much that is ideologically-driven without real analysis. Such sources are to be avoided. Groups must consist of 5 members each and should have members from different programs (e.g. not all be MBA students or all Public Policy students).

Presentation: Students will also have to make a group presentation of their paper in the evaluation week. (20% of the grade)

NOTE: we need to know what groups you have formed and what P3 you will be studying by the end of the second session (November 7). No two groups can take on the same P3 and so the first group to claim a P3 will get it. There may be some restrictions on group make-up, TBA.

The Project Paper and Presentation slide deck must be delivered via email to tom.ross@sauder.ubc.ca by 9:00 am on the morning of the presentations (TBA).

Short brief: Each student is to prepare a 5 page (maximum) brief in support of a pro or con position on the question assigned to them. Questions eligible for consideration are those on page 2 of this outline. Questions will be assigned randomly (by the coordinators) by the second lecture, with a maximum of 4 students assigned to any question. Your brief should be carefully crafted and properly referenced, including key contributions by previous writers. The focus should be on tangible evidence, not opinion. The issue is: what is a belief function versus what is supported by compelling evidence? In some cases, you may find that there is a paucity of hard evidence. If that is the case, discuss the implications of such a finding. The anticipated level of effort is 2 days of work maximum. The brief is due by 6:00 pm (PST) November 27, 2019 by email to tom.ross@sauder.ubc.ca. (25% of course grade.)

Constructive class participation is worth 10% of the course grade.

COURSE READINGS

The required readings will either be available online (including through the UBC Library) or through the course Canvas page. They are indicated below with an asterisk (*).

There is no required text, but the instructors agree that the following two books offers very good coverage of the P3 issues considered in this course. You will have access to these books online via Canvas reserves.

E. R. Yescombe and E. Farquharson, *Public-Private Partnerships: Principles of Policy and Finance*, 2nd Edition, Oxford, U.K., Butterworth-Heinemann (Elsevier), 2018. (Hereafter "Yescombe & Farquharson") (Note: the 1st edition is very different.) This book is available through the library as an e-book.

Jeffrey Delman, *Public-Private Partnership Projects in Infrastructure: An Essential Guide for Policy Makers*, 2nd Edition, New York, Cambridge University Press, 2017. (Hereafter "Delman") This book is available through the library as an e-book.

Week 1 (Ross):

Yescombe & Farquharson, Chapters 1-2.

Delman, Chapter 1

* de Bettignies, J.-E. and T. Ross, "The Economics of Public-Private Partnerships", Vol. 30, *Canadian Public Policy*, 2004, 135-154.

* Canadian Centre for Policy Alternatives, *The (Real) Bottom Line- Public Private Partnerships*, August 2004.

* Siemiatycki, M., "Public-Private Partnerships in Canada: Reflections on twenty years of practice", Vol. 58, *Canadian Public Administration*, 2015, 343-362.

Boardman, A. and A. Vining, "Public-Private Partnerships in Canada: Theory and Evidence", Vol. 51, *Canadian Public Administration*, 2008, 9-44.

Hodge, G.A. and C. Greve, "Public-Private Partnerships: An International Review", *Public Administration Review*, Vol. 67, May / June 2007, 545-558.

Vining, A. and A. Boardman, "Public-Private Partnerships: Eight Rules for Government", Vol. 13, *Public Works Management Policy*, 149-161.

Pollock, A.M., D. Price and S. Player, "An Examination of the UK Treasury's Evidence Base for Cost and Time Overrun Data in UK Value-for-Money Policy and Appraisal", *Public Money and Management*, April 2007, 127-133.

Parks, R. and R. Terhart, *Evaluation of Public Private Partnerships: Costing and Evaluation Methodology*, Report prepared for Canadian Union of Public Employees, Blair Mackay Mynett Valuations, January 5, 2009.

Week 2 (Blain and Farrell):

Yescombe & Farquharson, Chapters 3-10.

* Discussion Paper: Quantitative Analysis Methodology: [http://www.partnershipsbcc.ca/files-4/documents/Methodology%20for%20Quantitative%20Procurement%20Options%20Analysis%20\(2014%20update\).pdf](http://www.partnershipsbcc.ca/files-4/documents/Methodology%20for%20Quantitative%20Procurement%20Options%20Analysis%20(2014%20update).pdf)

* Disclosure Guidance: http://www.partnershipsbcc.ca/files-4/documents/2012-08_Procurement-Related-Disclosure-for-Major-Infrastructure-Projects.pdf

* Conference Board of Canada, *Dispelling the Myths: A Pan-Canadian Assessment of Public-Private Partnerships for Infrastructure Investments*, <http://www.conferenceboard.ca/documents.aspx?did=3431> .

*Project Report: Penticton Regional Hospital Patient Care Tower Project: http://www.partnershipsbcc.ca/files-4/documents/20160818_PBC_PRH_Project-Report.pdf

Siemiatycki, M., Cost Overruns on Infrastructure Projects: Patterns, Causes and Cures, Institute on Municipal Finance & Governance, Munk School of Global Affairs, University of Toronto, November 2015: <http://www.partnershipsbcc.ca/wp/wp-content/uploads/2017/03/Cost-Overruns-on-Infrastructure-Projects-Patterns-Causes-and-Cures.pdf>

Week 3 (Hann and Turnbull):

Yescombe & Farquharson , Chapters 20-26.

* Deloitte Research, *Closing the Infrastructure Gap: the Role of Public – Private Partnerships*, 2006:
<https://www2.deloitte.com/ie/en/pages/finance/articles/closing-the-infrastructure-gap.html>

* Canadian Union of Public Employees (CUPE), *How to Make the Public Sector Advantage Disappear: Presentation to the Municipal Finance Authority*, March 14, 2007.

Canadian Union of Public Employees (CUPE): Submission to the House of Commons on the Canada Infrastructure Bank, March 22 2017

Canadian Council for Public Private Partnerships, *Project Finance: An Introductory Manual for Canadian PPP Project Managers and Advisors*, November 2006

DBRS Inc, *Rating Public-Private Partnerships*, August 23, 2019: ([Note:

Moody's Investor Service, *Construction Risk in Privately Financed Public Infrastructure (PFI/PPP/P3) Projects*, July 19, 2019

Moody's Investor Service, *Operational Privately Financed Public Infrastructure (PFI/PPP/P3) Projects*, October 25, 2018

Note on the Moody's and DBRS documents: You need not have a subscription to access the Moody's info online but you do need to register with them (at no cost). DBRS requires no registration for the methodology document and it is readily available on line.

Week 3 Case Studies: Sea to Sky Highway and Golden Ears Bridge

Course participants are encouraged to review a range of publications on a particular PPP project. The Sea to Sky Highway Improvement Project has been selected because it is local, demonstrates a number of interesting features and has been the subject of a wider variety of published materials than many other PPPs. Similar resources to those below can be found for other PPP projects such as the Abbotsford Hospital, the Diamond Health Centre at Vancouver General Hospital, the Britannia Beach Mine Project, the Golden Ears Bridge, the Canada Line and the South East Anthony Henday Ring Road.

Canadian Transportation Public Private Partnerships: Case Study-the Sea to Sky Highway Improvement Project – Nicholas Hann in Transportation Finance Review 2005/2006, Euromoney Yearbooks

Sea to Sky Highway , British Columbia – 2005 Gold Award for Project Financing- in Canadian Council for Public Private Partnerships – 2005 National Award Case Studies www.pppcouncil.ca/publications.asp

Project Report: Achieving Value for Money Sea to Sky Highway Improvement Project– Partnerships BC December 2005 (website)

Discussion on the accounting treatment of Sea to Sky - in BC Legislature – Public Accounts Committee 38th Parliament, - www.leg.bc.ca/cmt/38thparl/session-3/pac/hansard/hansindx/pa12.htm

Sea to Sky: Expensive and Overbuilt – Strategic Thought 2004

Golden Ears Bridge , British Columbia – 2006 Gold Award for Project Financing- in Canadian Council for Public Private Partnerships – 2006 National Award Case Studies

Golden Ears Bridge Project Illustrates New Strategies for Canadian Surface Transportation Finance – Moody's Investors Service August 2006

Week 3: Questions for consideration

How important is private sector financing to a P3? What roles does private sector financing play? Should a DBOM project be regarded as a P3? What are the advantages/disadvantages of DBOM compared to a DBFO?

How do the payment mechanisms used by the public sector determine the financing structure?

How should the public sector account for 1) an availability payment transaction 2) a user pay transaction?

What is the most appropriate method to determine equity returns?

What are the main investment risks in a P3 and how are they mitigated?

What should be the public sector's level of knowledge of and involvement in the private sector financing?

What are the major differences between a bond and bank financing?

What should or does happen in the event P3 Projects experience challenges and potential defaults?

What is the relationship between the Debt Service Coverage Ratio, the Debt Equity Ratio and the equity return?

What is the purpose of the different types of Debt Service Coverage Ratio?

What would influence governments to use public sector debt within a P3 structure?

What were the unique features of the Sea to Sky Project and how did these benefit or disadvantage the transaction? What were the accounting issues with Sea to Sky?

Would Golden Ears Bridge have been a better P3 if Translink had passed demand risk to the private sector partner?

Week 4 (Haythorne and Stewart):

Yescombe & Farquharson, Chapters 15-19.

Delman, Chapter 8

* Canada Line Concession Agreement, available from Partnerships BC home page:

https://www.translink.ca/-/media/Documents/rider_guide/canada_line/comp_selection_process_agreements/concession_agreement/Concession-Agreement.pdf or at www.partnershipsbc.ca

Newman, J., *Governing Public-Private Partnerships*, Montreal: McGill/Queen's University Press, 2017.

Week 5 (Russell):

* Yescombe & Farquharson, Chapters 11-14

* Public-Private Partnership Projects – What, Why & How is Risk Allocated, June 2016, Navigant Construction Forum <https://www.cmaanet.org/sites/default/files/resource/Public-Private%20Partnership%20Projects.pdf>

* Construction Risk in Privately-Financed Public Infrastructure (PFI/PPP/P3) Projects, 29 June 2016, Moody's Investors Service <https://www.globalinfrastructure.org/sites/gif/files/Moody%27s-Rating%20Methodology%20-%20Construction%20Risk%20in%20PPP%20projects.pdf>

COURSE-SPECIFIC POLICIES AND RESOURCES

Missed or late assignments, and regrading of assessments

Late submissions will not be accepted and will receive a grade of zero.

Academic Concessions

If extenuating circumstances arise, please contact the RHL Graduate School program office as early as reasonably possible, and submit an [Academic Concession Request & Declaration Form](https://webforms.sauder.ubc.ca/academic-concession-rhlee) <https://webforms.sauder.ubc.ca/academic-concession-rhlee>. If an academic concession is granted during the course, the student will be provided options by RHL, or by the instructor in consultation with RHL, per [UBC's policy on Academic Concession](#).

POLICIES APPLICABLE TO COURSES IN THE ROBERT H. LEE GRADUATE SCHOOL

Attendance

Excepting extenuating circumstances, students are expected to attend 100% of their scheduled class hours. Absent students limit their own academic potential, and that of their classmates, and cause unnecessary disruption to the learning environment. Students missing more than 20% of the total scheduled class hours for a course (including classes held during the add/drop period) without having received an academic concession will be withdrawn from that course. Withdrawals, depending on timing, could result in a "W" or an "F" standing on the transcript.

Punctuality

Students are expected to arrive for classes and activities on time and fully prepared to engage. Late arrivals may be refused entry at the discretion of the instructor or activity lead. Students arriving later than halfway through a scheduled class will be treated as absent for that class.

Electronic Devices

Devices such as laptops, tablets, and cell phones are not permitted to be used in class unless directed by the instructor for in-class activities. Students who do not follow the School's policy in this regard may be required to leave the room for the remainder of the class, so that they do not distract others. Research shows that students' use of laptops in class has negative implications for the learning environment, including reducing their own grades and the grades of those sitting around them.

Citation Style

Please use the American Psychological Association (APA) reference style to cite your sources.

Details of the above policies and other RHL Policies are available at:

<http://www.calendar.ubc.ca/vancouver/index.cfm?tree=12,199,506,1625>

UNIVERSITY POLICIES AND RESOURCES

UBC provides resources to support student learning and to maintain healthy lifestyles but recognizes that sometimes crises arise and so there are additional resources to access including those for survivors of sexual violence. UBC values respect for the person and ideas of all members of the academic community. Harassment and discrimination are not tolerated nor is suppression of academic freedom. UBC provides appropriate accommodation for students with disabilities and for religious observances.

UBC values academic honesty and students are expected to acknowledge the ideas generated by others and to uphold the highest academic standards in all of their actions. Details of the policies and how to access support are available on the UBC Senate website at <https://senate.ubc.ca/policies-resources-support-student-success>.

Academic Integrity

The academic enterprise is founded on honesty, civility, and integrity. As members of this enterprise, all students are expected to know, understand, and follow the codes of conduct regarding academic integrity. At the most basic level, this means submitting only original work done by you and acknowledging all sources of information or ideas and attributing them to others as required. This also means you should not cheat, copy, or mislead others about what is your work. Violations of academic integrity (i.e., misconduct) lead to the breakdown of the academic enterprise, and therefore serious consequences arise and harsh sanctions are imposed. For example, incidences of plagiarism or cheating may result in a mark of zero on the assignment or exam and more serious consequences may apply if the matter is referred to the President’s Advisory Committee on Student Discipline. Careful records are kept in order to monitor and prevent recurrences.

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ACKNOWLEDGEMENT

UBC’s Point Grey Campus is located on the traditional, ancestral, and unceded territory of the xwməθkwəyəm (Musqueam) people, who for millennia have passed on their culture, history, and traditions from one generation to the next on this site.

COURSE SCHEDULE

(Subject to change with class consultation)

Class#	CLASS TOPICS	ACTIVITIES / READINGS	ASSIGNMENTS / DELIVERABLES
Class 1	Introduction and Overview of P3 October 30, 2019	<ul style="list-style-type: none"> • Providing public services – various models and philosophies • Defining P3 – just a business deal? • Possible advantages/disadvantages in general • Right reasons for P3s, wrong reasons • The P3 industry – companies, countries, history • Examples of P3s – BC, Canada and foreign • P3s in developing countries • Theories of P3s • Lessons learned <p>Lead Instructor: Tom Ross – Sauder School of Business, UBC</p>	

Class 2	<p>The P3 Process and Value for Money; The State of P3s in Canada and in the Developing World November 6, 2019</p>	<p>The P3 Process</p> <ul style="list-style-type: none"> • Step-by-step through a P3 – the client/government perspective • Establishing transparency and fairness of process <p>Value for Money</p> <ul style="list-style-type: none"> • How does government evaluate value for money • Public sector comparator • Other views – e.g. multi-criteria analysis • Accounting issues • Competitive neutrality and tax issues <p>The State of PPPs in Canada</p> <p>The State of PPPs in the Developing World</p> <p>Lead Instructors: Larry Blain, advisor to the World Bank on infrastructure (former CEO, Partnerships BC) and Amanda Farrell, President and CEO, Transportation Investment Corporation (former CEO, Partnerships BC)</p>	
Class 3	<p>Financing and paying for P3s November 13, 2019</p>	<ul style="list-style-type: none"> • Study of various financing mechanisms, including contribution agreements • Study various ways for sponsor to pay for P3s (e.g. tolls, shadow tolls, availability payments etc.) • Who can borrow more cheaply – government or private sector • The essence of a financing agreement <p>Lead Instructors: Nicholas Hann, former Head of Investments, Canada Infrastructure Bank, and Vickie Turnbull, Managing Director and Co-Head, Infrastructure Finance, RBC Capital Markets</p>	
Class 4	<p>Project / Concession Agreements November 20, 2019</p>	<ul style="list-style-type: none"> • Designing long-term contracts • Aligning interests • Measuring and enforcing performance • Coping with change • Operating period issues <p>Lead Instructors: John Haythorne, Partner, Dentons, Vancouver and Anne Stewart, Q.C., Senior Counsel, Blakes, Vancouver</p>	
Class 5	<p>Allocating Risks in P3 projects and P3s: Lessons Learned November 27, 2019</p>	<p>Allocating Risks in P3 projects</p> <ul style="list-style-type: none"> • Dimensions of the risk management process, from identification through to capturing lessons learned • Risk at the level of the project vs. level of the firm • Reflections on current practices and the private sector's appetite for risk • Whose got what at stake 	<p>Student briefs due by 6:00 pm today – deliver by email to tom.ross@sauder.ubc.ca</p>

		<ul style="list-style-type: none"> • The role of risk in decision making at various project stages • Identifying risks and organizing the risk register • Assessing outcomes • Aggregating / measuring risks at the level of the project – the need for time and cost models • Responding to risk <p>Lead Instructor: Alan Russell – Department of Civil Engineering, UBC</p>	
Class 6		Exact date in week 6 to be determined by RH Lee School	Student Presentations