



Introduction to Behavioural Economics for Policy

Course outline August 2018

1. Names and contact details

Course Presenter: Dr. Marcos Pelenur
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2. Course learning objectives

Behavioural economics is an increasingly important part of modern policy analysis and economics. It allows policy makers to use psychological insights to increase the explanatory power of economic analysis.

The objective of this course is to provide participants with an appreciation of the principles of behavioural economics and demonstrate how these principles can be used in public policy analysis. To do this the course will help participants understand:

- the strengths and limitations of the standard model of economics (e.g., expected utility or exponential discounting) and how alternative models informed by behavioural economics (e.g., prospect theory or present bias) complement and extend these classical theories;
- the main principles of behavioural economics and how they apply to policy problems, such as: choice under uncertainty (risk preferences); choice over time (time preferences); choice over interpersonal allocations (social preferences); and judgment under uncertainty (probability assessments); and
- how to apply these principles to policy analysis through the use of empiricism and evaluation.

Detailed case studies will be reviewed with practical frameworks that participants will be able to use by the end of the course.

3. Learning outcomes

On completion of this course participants will:

- have an understanding of key behavioural economics terms and concepts;
- be able to apply behavioural economic thinking to current policy issues;
- be able to apply existing behavioural frameworks and toolkits to policy analysis;
- understand the basics of how to test policy interventions in the field; and
- appreciate how behavioural economics can be used in many areas in the public sector

4. Target audience

This course will be most helpful to policy advisors with little or no experience of behavioural economics. No prior economics experience is required, but this course is also useful for policy advisors with economic training who are looking to include the principles of behavioural economics in their toolkit.

5. Relationship to other subjects

No previous knowledge of economics is assumed and there are no pre-requisites for this course. Policy advisors not trained in economics are able to enroll.

6. Overview of session topics

1. Principles of behavioural economics

- 1.1. Behavioural economic basics
- 1.2. Comparison with standard model of economics
- 1.3. Behavioural economic principles for public policy
 - 1.3.1. Choice under uncertainty
 - 1.3.1.1. Prospect theory
 - 1.3.1.2. Reference-dependence
 - 1.3.2. Choice over time
 - 1.3.2.1. Time discounting
 - 1.3.2.2. Time preferences
 - 1.3.3. Choice over interpersonal allocations
 - 1.3.3.1. Fairness in economics
 - 1.3.3.2. The role of self-serving biases
 - 1.3.4. Judgment under uncertainty
 - 1.3.4.1. Heuristics and biases (e.g. availability bias and anchoring)

2. Applications of behavioural economics

- 2.1. Behavioural economics in public policy
 - 2.1.1. Health case study
 - 2.1.2. Unemployment case study
 - 2.1.3. Tax case study
 - 2.1.4. Energy case study
- 2.2. Behavioural economic frameworks
 - 2.2.1. MINDSPACE
 - 2.2.2. EAST
- 2.3. Evaluating behavioural economics in public policy
 - 2.3.1. Randomised controlled trials

2.3.2. Quasi-experimental methods

7. Teaching and learning methods

The material covered by the course includes principles across economics and insights from psychology, which is often taught as a stand-alone full semester university course.

The breadth of the material means the teaching is lecture style, but will be focused on discussing practical policy case studies where principles from behavioural economics were successfully applied. The lectures are interactive and active participant engagement in classes is expected.

8. Class details

| Session | Date | Times | Venue |
|---------|--------------|-----------------|---|
| 1 | Tue 7 Aug 18 | 9.00am - 4.30pm | Meeting room G01, 15 Stout Street, Wellington |
| 2 | Wed 8 Aug 18 | 9.00am - 4.30pm | Meeting room G01, 15 Stout Street, Wellington |

No need to report to the reception, meeting rooms are located on the ground floor of the MBIE, 15 Stout Street, Wellington.

There will be a 45 minute break for lunch and 15 minute morning and afternoon break in each session. Lunch, coffee and tea will be provided.

9. Course costs

This course is provided by the Government Economics Network (GEN) at a cost of \$450 plus GST per person.

10. Course materials

10.01 Recommended text

The following textbook is recommended, although other textbooks can be used:

Camerer, Colin; Loewenstein, George; Rabin, Matthew (2004) *Advances in Behavioral Economics*. (Princeton, New Jersey: Princeton University Press)

As the textbook relates to advances in the field of behavioural economics, it omits many seminal articles. It is recommended that course participants also familiarise themselves with the additional readings.

The following chapters of *Advances in Behavioural Economics* will be assigned as readings for each session.

| Session | Topic | Reading |
|---------|---------------------------------------|--|
| 1 | Principles of behavioural economics | Camerer Ch 1 – 11 |
| 2 | Applications of behavioural economics | MINDSPACE, EAST, 'Test Learn Adapt' from additional readings |

10.2 Additional reading

For participants interested in exploring the more academic side to behavioural economics, they are encouraged to read the following articles:

- Beshears, J., Choi, J., Harris, C., Laibson, D., Madrian, B., & Sakong, J. (2013). Self-Control and Liquidity: How to Design a Commitment Contract.
- Hossain, T., & List, J. (2012). The Behaviouralist Visits the Factory: Increasing Productivity Using Simple Framing Manipulations. *Management Science*, 58(12) 2151-67.
- Kahneman, D., & Tversky, A. (1979). Prospect Theory: An Analysis of Decision under Risk. *Econometrica*, 47(2) 263-91.
- Laibson, D. (1997). Golden Eggs and Hyperbolic Discounting. *Quarterly Journal of Economics*, 112(2) 443-77.
- Laibson, D., & List, J. (2015-105(5)). Principles of (Behavioral) Economics. *American Economic Review: Papers & Proceedings*, 385-390.
- List, J. (2003). Does Market Experience Eliminate Market Anomalies. *Quarterly Journal of Economics*, 118(1) 41-71.
- O'Donoghue, T., & Rabin, M. (1999). Doing it Now or Later. *American Economic Review*, 89(1) 103-24.
- OECD (2017). Behavioural Insights and Public Policy: Lessons from Around the World
- Read, D., & van Leeuwen, B. (1998). Predicting Hunger: The Effects of Appetite and Delay on Choice. *Organisational Behavior and Human Decision Processes*, 76(2) 189-205.
- Thaler, R. (1980). Toward a Positive Theory of Consumer Choice. *Journal of Economic Behavior and Organisation*, 1(1) 39-60.

11. Assessment

The course will be assessed and participants who pass the course will receive a certificate of achievement. The weighing for the assessment is as follows:

| Assessment task | |
|-----------------|------------|
| Essay | 100 |
| Total | 100 |

Group essay

Participants are required to write a group essay that applies behavioural economics and thinking to a policy issue of their choice. Participants will be assigned to groups.

The purpose of the essay is to (1) deepen understanding of applying behavioural economic thinking to public policy questions and (2) stimulate reflection on both the strengths and shortcomings of behavioural economic interventions.

A wide range of policy issues could be suitable topics for the essay, but the selected topic should be amenable to economic analysis. It could include a current policy issue being considered in an agency.

Proposals should start by raising a clearly stated policy question. Thus, to give an example, the essay should not just consist of writing all about “personal savings”, but of using behavioural economics to tackle a clear policy question such as “Are commitment devices effective in increasing personal savings?” Being clear about the objectives is indeed a “hard part” of the exercise.

Proposals for the essay topic must be submitted to the Course Presenter for approval by 12.30pm on **9 August 2018**. Participants may wish to have thought in advance of proposals for topics.

The essay should:

- Define the problem and the underlying economic issue and rationale for government intervention
- Apply behavioural economic theory and reasoning to analyse the issue
- Draw on (and cite) both New Zealand and international literature and case studies and empirical evidence where possible
- Identify and evaluate at least 2 policy options for dealing with the issue
- Discuss how the policy options could be evaluated in the field
- Identify the strengths and limitations of a behavioural economic approach to the topic

All members of the group who contribute to the essay will be given the same mark. Group management is a matter for the group itself, including issues of free-rider behaviour.

Participants may wish to note the email addresses of each member of the group as they will need to do further preparation and communicate as the essay is developed.

The word limit is 3,000 words (not including any footnotes and appendices). Words in excess of the stipulated word length will be ignored by the marker. Grading criteria are indicated in the assessment matrix below.

| Criterion | Mark |
|---|------------|
| Identification of the problem | 20 |
| Application of behavioural economic theory | 20 |
| Relevant use of literature and evidence | 20 |
| Critical evaluation of options | 20 |
| Strengths and weaknesses of the approach | 10 |
| Quality of writing and overall presentation | 10 |
| Total | 100 |

The essay should be typed or neatly presented and submitted in hard copy and by email to the Course Administrator by close of business on the date **due 10 September 2018**. Participants should keep a copy of all submitted work.

Referencing

A well prepared essay should contain at least 15-20 pertinent references. It is critical to read widely for the essay and cite correctly the material drawn on.

Full acknowledgement of sources used is required – both for general referencing and for quotation. This includes acknowledgement of any internal documents or web sources relied upon. Where extracts are used directly these must be quoted and cited, where ideas are relied upon more broadly referencing is still needed.

Include a full reference list at the end of the assignment, listing in alphabetical order all references cited in the assignment, and in a standard format. The Harvard citation style is preferred and can be found at <http://www.lc.unsw.edu.au/onlib/ref1.html>. Do not use *op. cit.* *ibid*, do not place references in footnotes and do not cite the lecture notes.

Plagiarism

Plagiarism is unacceptable in any format. Participants should be aware that software (e.g. “Turn-it-in”) may be used at the discretion of GEN to review material submitted. Serious penalties may be applied in cases of plagiarism.

12. Attendance requirements

Full attendance by participants is expected and a record of attendance will be maintained in this subject. Where absence is unavoidable, notification to the Course Administrator as soon as possible is required.

13. Withdrawal from Course

If a participant is unable to attend, the registration may be transferred to another person by advising the Course Administrator in writing at least 2 days before the start of the course.

14. Course Lecturer



Dr Marcos Pelenur (PhD MPhil BSc CEng MIET MIPENZ) is the Resource Markets Policy Manager at the Ministry of Business, Innovation and Employment in New Zealand.

Marcos also works across the Ministry and supports other agencies to apply insights from behavioural science to improve policy outcomes. Marcos teaches Behavioural Economics as a guest Lecturer for the Victoria University course ECON307/PUBL303 Public Sector Economics.

Prior to joining MBIE, Marcos was the Head of Energy and Sustainability at the Behavioural Insights Team with the UK Cabinet Office, and worked as an engineering manager within the New Zealand electricity sector.

Marcos holds a PhD and Masters in Engineering for Sustainable Development from the University of Cambridge and is a professional member of IPENZ and registered as a Chartered Engineer with the UK Institution of Engineering and Technology (IET).

15. About the Government Economics Network

The Government Economics Network was established in 2011 to promote the better use of economics in the public sector in New Zealand. The network has three aims:

- 1) support economics training and professional development;
- 2) develop linkages between economists; and
- 3) strengthen economic advice to government.

For further information please visit our website: www.gen.org.nz.