

PEARL

# Hideo Akabayashi's Seminar

—Education, Family, and Policy Evaluation using Econometrics and Experiments—

## 1. Field of study

In this seminar class, we mainly study applied microeconomics, with special attention to topics in areas of education, the family, and policy evaluation.

The economics of education and family economics began as sub-fields of labor economics and have come into their own as distinct fields of economics. Labor economics covers wider issues such as overall wage inequality and labor dynamics. Policy evaluation is a field that uses empirical methodology to evaluate the effectiveness of broad social policies in the real world from the perspectives of economics and statistics. We also study economic experiments on families and children. Together we use all the modern analytical tools to understand education, family, and labor from economic points of views.

This seminar is organized on the assumption that students will participate for all four semesters of the third and fourth years of their studies. However, we welcome shorter-term enrollments, participation by students who study abroad during these two years, or auditing by those students with an

interest in education and the family who have a strong background in economics and statistics.

Although this seminar will be conducted in both Japanese and English, about 75% will be conducted in English. Depending on the readiness of the Japanese speaking participants, however, some in-class presentations and discussions may be conducted in Japanese. We welcome non-Japanese speaking students who are comfortable with this bilingual setting. The current student composition is four 4th year students and six 3rd year students among which there is one PEARL student and three students who joined the seminar in summer after studying abroad. PEARL students and students studying abroad during Spring semester are expected to put effort to participate in the seminar online. About half students are female. We also have a regular participation of Japanese and foreign graduate/research students. We also provide students chances to participate in projects of our research group at Keio University.

Please visit our Facebook Page for further information on the activities and application procedure of our seminar class. <http://www.facebook.com/hideo.akabayashi.seminar.keio>

## 2. Expectation for students

Students are expected to learn and use statistical and experimental methods to link theoretical predictions and empirical evidence on the effects of various policies. We learn to combine simple price theory and econometric and experimental methods to interpret the real world. Throughout the seminar students are exposed to economic theories, statistical methods, and experimental methods that are used globally in government, business, and academia. For econometrical analysis, we use Stata. Therefore, we recommend students to have their own Stata license. English speaking students are required to take "Economics of Family and Education" taught by the instructor. There may be other requirements (such as intermediate microeconomics and econometrics)

## 3. Admission

### 1 Quota

We expect to accommodate about 10 students a year. No quotas will be assigned for the number of A/B students and the number of PEARL students.

### 2 Exam

Applicants will be required to submit a short report to the instructor before the day for selections. The topics for the report will be announced on the seminar's Facebook Page around Jan 20, 2020. Selections will be conducted only in the first round. Type A/B students and PEARL students will be

selected together.

3 Whether or not accept PEARL students or students from other faculties? We accept PEARL students.

We accept students from other faculties.

## 4. Criteria

Students will be evaluated on the basis of their application documents, their reports, their academic records at Keio, and interviews conducted in English by the instructor.

If you are interested in attending this seminar class on a semester basis, it is strongly recommended that you contact the instructor before making an application for this seminar in order to find out whether this seminar meets your expectations.

Instructor's email address:

[hakab@econ.keio.ac.jp](mailto:hakab@econ.keio.ac.jp)

Student representative for recruiting new seminar participants. Mr. Yoshihiro Abe. email address:

[ay14362@keio.jp](mailto:ay14362@keio.jp)

## Fukuhara Masahiro Research Seminar

— (Fintech & People Analytics) —

### 1. Field of study

In Fukuhara Research Seminar we study the decision-making processes in Fintech and People Analytics. Both fields utilize emerging technologies, such as blockchain and artificial intelligence (AI), as solutions for improved efficiency and are growing topics amongst today's companies and organizations.

This seminar values discussion-based sessions to come up with answers to questions like: "How can we manage workers from different countries to achieve maximum profit?" and "How can companies provide global financial services with the use of fintech?". To help support our argument and to further understand these issues, we also study econometrics through the use of Eviews, Python, and R programming.

### 2. Expectation for students

We welcome students who:

- 1) Are a self-starter
- 2) Are full of academic curiosity and strive for growth
- 3) Are open to new ideas and people
- 4) Can contribute to our seminar for the growth of all members.

※ We do not require students to have a

strong background on statistics and econometrics.

### 3. Admission

#### 1 Quota

Max 10 students

#### 2 Exam

- Report -

Candidates will be provided with a case study and a data set to write a report on.

- Group Discussion -

Candidates will have to prepare for a group discussion with other applicants on the case study report he or she has written.

- Individual Interview -

The current seminar members will conduct an interview and ask general questions such as interests and hobbies to get to know each student and their goals and motivations.

#### 3 Whether or not accept

PEARL students or students from other faculties? We accept students from both PEARL and other faculties.

### 4. Criteria

Students that can :

- 1) Speak fluent English
- 2) Express their opinions and ideas in a logical and collaborative way
- 3) Challenge themselves to analyze issues quantitatively and qualitatively in order to make decisions.

## 1. Field of study

This seminar will focus on fintech and data science. The term “fintech” refers to a vast array of technologies and innovations which have potential to improve efficiency and usability of financial services such as lending, settlement, brokerage and investment. Data science, on the other hand, is a research field about quantitative methods and information processing to extract useful knowledge from extremely large data (“big data”). In this seminar, we will study about quantitative methods for fintech such as Bayesian modeling and machine learning, and their applications to practical issues in finance such as asset management and firm valuation. Although finance is our primary field of study, students can freely choose their own research topic in data science. This seminar consists of three main activities: regular seminar (honzemi), elective seminar (sabu-zemi) and independent study for the Mita-Sai paper and the undergraduate thesis. The regular seminar, as its name suggests, will be held weekly as a regular course. In the regular seminar, students are expected to present academic papers on fintech, data science or related fields, and take part in discussions on the contents of the papers and related topics. In the selective seminar, which is completely optional, students will study about more

advanced topics such as quantitative finance (“quants”), Bayesian statistics and computer programming in depth. All students in this seminar are required to write original research papers (the Mita-Sai paper in the 3rd year and the undergraduate thesis in the 4th year) by themselves. It may be a painstaking task for inexperienced undergraduate students to complete an academic work alone, but it should be a valuable experience for them. 2.

## 2. Expectation for students

This seminar welcomes students who have keen curiosity about the real world and eagerness to study about tough subjects by themselves. All students in this seminar are expected to have basic knowledge of asset classes (stocks, bonds, foreign currencies, etc.) and their trading in the markets. Students who plan to study data science need to study mathematics and computer programming. They are also expected to fully understand topics covered in Statistics 1 & 2 and Introduction to Econometrics offered in the Hiyoshi campus. Students who plan to study corporate finance are not necessarily required to study advanced mathematics. Instead, they need to learn how to read, interpret and apply numbers in financial statements for firm valuation with a spreadsheet.

## 3. Admission

1 Quota approximately 15

2 Exam

(1) Statement of purpose

(2) Transcript

(3) Presentation about financial analysis,  
data science or fintech (on site or via Skype)

(4) Interview (on site or via Skype)

Please access the official website  
(<https://nakatsuma.com/>) for more  
information.

3 Whether or not accept PEARL  
students or students from other  
faculties? Yes, we welcome  
PEARL students.

Yes, we welcome students from other  
faculties.

4. Criteria

(1) basic knowledge in finance and  
statistics; programming skills  
(optional)

(2) Eagerness to participate in the  
seminar

(3) Good character

## 1. Field of study

We examine economic and policy issues related to urban and regional "space" by using GIS (geographic information systems) and spatial data. With GIS, we can visualize, create, and analyze spatial information. With the increasing availability of spatial data, GIS applications have received growing attention in economic and policy research. By using GIS and spatial data, we aim to shed new light on the spatial dimensions of urban and regional economic and policy issues.

## 2. Expectation for students

We welcome students who are interested in examining the spatial dimensions of economic and policy issues using GIS. Attendance and class participation are important in our seminar

## 3. Admission

### 1 Quota

Approximately 15

### 2 Exam

First stage: written exam on statistics and microeconomics; students can bring nonelectronic textbooks and documents. Second stage: interviews for those who

passed the firststage exam. Please bring your latest grade transcript.

### 3 Whether or not accept PEARL students or students from other faculties?

We accept PEARL students who understand basic Japanese.

We accept students from other faculties.

## 4. Criteria

Application, written exam, and interview. Grade transcript if necessary. For the latest information on our entrance exam, please see our seminar homepage and twitter:

<https://sites.google.com/keio.jp/mizuki-seminar/>

[https://twitter.com/kwbt\\_seminar](https://twitter.com/kwbt_seminar)



### 1. Field of study

Open economy macroeconomics,  
European Economies

### 2. Expectation for students

Independent thinking, Openness,  
Intellectual curiosity

### 3. Admission

#### 1 Quota

About ten

#### 2 Exam

Written examination in English on  
macroeconomics and microeconomics, oral  
exam

(interview) with the professor and current  
students

#### 3 Whether or not accept PEARL

students or students from other  
faculties? We also admit qualified  
students from PEARL and other  
faculties

### 4. Criteria

Applicants who meet the criteria for  
entering PCP take only the oral examination,  
regardless of whether they apply to PCP.

# Yasunari Tamada Seminar

-Microeconomics, Incentive/Contract Theory, Industrial Organization

## 1. Fields of research

### **Research subjects**

Microeconomics has succeeded in expanding its range of analysis enormously by introducing game theory and incentive/contract theory, in addition to the traditional price theory. This covers all the fields in the study of the economics, and as keywords, we can list "incentives", "strategy", "information", "competition and cooperation". Moreover, we can clearly imagine that these keywords are closely related to each other, and this seminar will mainly focus on analyzing how we can provide appropriate incentives to the economic parties. This is mainly because the information we can use in the scenes of markets, organizations, and business relations are usually imbalanced, and if the economic parties strategically utilize them, problems such as moral hazard and adverse selection arise, leading to less efficiency in the economy. This can be seen in the recent corporate scandals. As these have a high

correlation with the problems regarding incentives, we will analyze it from two dimensions: theory and the reality.

Furthermore, from the keywords that were listed earlier, the research subjects can be broadened to corporate strategy, industrial organization, law and economics, public economics, and labor economics. Students in this seminar choose their research subjects based on their interests. In a broad sense, the research field of this seminar is microeconomic theory and its application to reality.

### **The goal of the seminar and management method**

The goal of this seminar is "the acquisition of economics as specialized knowledge and analysis of real economy". If education is to be the relation to people and society, the two important pillars are "establishment of a viewpoint" and "expansion of horizons". It is important to broaden our vision of the real economy and cultivate problem

consciousness, but problem consciousness that is not backed up by a viewpoint often leads to conclusions relying only on intuition. Economic thinking is intuitively correct, but what seems intuitively appropriate is not necessarily correct. In order to find and analyze problems from the real economy full of mysteries, it is essential to establish a viewpoint that unravels the mysteries. On the other hand, even if you establish a point of view, it is the same as not seeing anything if you do not broaden your vision and have a problem consciousness. In this seminar, microeconomic theory is the "viewpoint", and the "horizons" cover all real economic phenomena. By mastering economic theory, you will be able to see real economic phenomena with universal eyes, and stand on a common foundation established internationally.

This seminar aims at an accurate understanding of game theory, industrial organization, and contract theory using textbooks. We will also read literature that theoretically analyzes real economic

phenomena. In addition, the third year students will participate in the sub-seminar and part-seminar. The sub-seminar is positioned to supplement the seminar, by reading textbooks in turn. In the partseminar, students will be divided into groups with specific research topics, and they will present the results in a Mita festival thesis and in the inter-seminar. Fourth year students will write a graduation thesis. The graduation thesis will be written based on knowledge of economics and the specific concerns of the student, and is the goal of the activities of the seminar. There is a lot of flexibility in choosing the theme.

## 2. What's demanded from the students

- ① Being able to respect academic work, and having interests in reality. Students that can work with enthusiasm in the seminar are strongly welcomed.
- ② Having no resistance to thinking logically. Students taking this seminar must be able to think that microeconomics and macroeconomics classes are interesting subjects.
- ③ A willingness to make the knowledge of economics a personal strength.

### 3. Selection Information

i. Number of people to be recruited: 17 students. Only first round selections will be held ii.

Selection process: ①

Written exam: 60%

② Research Plan (15 lines to be written on A4 paper during the exam. We advise you to prepare in advance) +Content of the Application form + interview: 40%

In the research plan, examinees are to select one subject that they would like to research on after entering the seminar. Please include the reasons that made you want to research that subject, and what kind of conclusion you would want to reach.

## 1. Field of Study

My specialty is in modern European intellectual history (history of social thought), especially David Hume, Jean-Jacques Rousseau and other Enlightenment thinkers. Hume was one of the closest friends of Adam Smith, the founder of modern economics. Hume not only wrote some important economic essays, but is also known as an important philosopher and the author of *History of England*. Jean-Jacques Rousseau is famous (or notorious) for his fierce criticisms of modern civilization and inequality in private property. Neither philosopher can squarely fall into any particular discipline of highly compartmentalized social sciences. In a similar vein, our seminar addresses the relationship between economics and other disciplines, such as philosophy, ethics, law and politics. In a sense, the theme of this seminar is philosophy in its broader sense—more specifically political philosophy and economic thought. Our subject matter is not limited in the past centuries, but we deal with various contemporary philosophical positions—utilitarianism, liberalism, libertarianism, or communitarianism. You might have a rough image of the topics dealt with in this seminar if you read Michael Sandel, *Justice: What's the Right Thing to Do?* (Penguin: 2010; Japanese translation is also available).

I hope that, through the activities in this seminar, you will learn that economics is inseparable from other branches of social

sciences. You are also expected to understand seemingly purely theoretical topics in economics are often related to the issue of how we are to live in modern capitalist society. In our regular seminar, we read and discuss on some classical or contemporary books related to socio-philosophical issues. These classics range from the 18th century (e.g., Jean Jacques Rousseau's *Origin of Inequality*) to contemporary books (Peter Singer, *How are We to Live?*). At the end of each semester, you are required to submit a term paper (you can submit this in English).

Discussions in this seminar are conducted basically in Japanese (but I will help you to express yourself when arguments become complex). This requires you to have a basic competency to understand everyday conversation in Japanese.

2. Expectation for students You are expected to attend this seminar regularly and punctually, and to actively participate discussions. If you fail to submit a term paper by the deadline, it would affect your grading significantly.

## 3. Admission

1 Quota: a few for PEARL students.

2 Exam: Paper exam and interview.

Applicants of PEARL can take the exam in English (Details will be announced in due course).

3 Whether or not accept PEARL students or students from other faculties?: This seminar is open to both PEARL students and those of other faculties

4 Criteria: Paper exam tests your reading knowledge. The interview will include questions related to your motivation for applying for this seminar and your academic interest.

\* This seminar is held every Tuesday on the 4th and 5th periods.