

Policy Research Center
Research Project Accomplishment Report

Date: 2018/2/26

	Name	Title	Affiliation
Project Leader:	Ponpoje Porapakkarm	Associate Professor	GRIPS

Research Project Title: Macroeconomics of Health, and Mandatory Retirement in Japan

Project duration:
2016/4/1 ~ 2018/3/31 2年間

	Name	Title	Affiliation
Project Participants:			
Leader	Ponpoje Porapakkarm	Associate Professor	GRIPS
Participant 1	Mariacristina De Nardi	Professor	University College London, and Federal Reserve Bank of Chicago
Participant 2	Svetlana Pashchenko	Assistant Professor	University of Georgia
Participant 3	Md. Arifur Rahman	Ph.D. student	GRIPS
Participant 4			

Project aims and goals:

I and the team member examine two research projects. The first project is related to an emerging interest in health related inequality in the context of macroeconomics. Specifically, it has been well documented that people in worse health tend to have a lower socioeconomic status, e.g. lower income and accumulated much less wealth. Our project is to offer a deeper insight into the underlying mechanism and to quantify the relative importance of various channels, namely, labor market channel, medical cost channel, and survival channel. In the second project, we examine factors influencing retirement behavior and how it interacts with social security claim decision. Retirement and social security claim are an important joint decision among people near retirement. However, most existing literature tends to consider them separately. So we intend to fill this short coming and examine how the two decisions interact. This includes its implication for social security reform.

Accomplishment of Project(in 400 words):

The first project, joint with Dr. De Nardi, and Dr. Pashchenko, results in a final paper titled "The Lifetime Cost of Bad Health". Our first novel finding is that not only is the direct causality between bad health and economic outcome, e.g. earning loss and high medical expense due to bad health, important to explain health-induced inequality, taking into account the composition difference between the health and the unhealthy is also as equally as important. For example, the earning loss and high medical expenses can explain only 40% of the difference in accumulated median wealth between the healthy and the unhealthy aged between 60 and 64. The remaining 60% is due to the larger proportion of the unhealthy having a low marginal propensity to save. Second we use our estimated life cycle model to examine the pecuniary and non-pecuniary costs of health shocks. Specifically, the pecuniary cost is earning losses and medical losses while the non-pecuniary cost is the shorter life expectancy due to the lower survival probability if being unhealthy. We find that the lifetime pecuniary costs of bad health are highly concentrated, with the largest component of these costs being the loss in labor earnings. In addition, the non-pecuniary costs of bad health are very important along two dimensions. *i.)* individuals value good health mostly because it extends life expectancy. *ii.)* health uncertainty substantially increases lifetime inequality once taking into account that unhealthy people have a shorter lifespan. In the second project, I and Dr. Pashchenko, first, documented some stylized facts relating to social security claims behaviors and propose a life cycle model to explain the observed behaviors. Then, using a calibrated lifecycle model, our preliminary findings show that a low rate of time preference (patience) is needed to explained the early social security claim behavior. Given the preliminary findings, we are now extending the lifecycle model by incorporating heterogeneous rates of time preference and allowing for retirement decision. The model will be used to examine the interaction between retirement and social security claim in a unified framework.

Accomplishment:

[Please fill in the list of Accomplishment](#)

Other things to report:

1) The final paper from the first project, titled "The Lifetime Cost of Bad Health" is published as a NBER working paper and will be submitted to *Review of Economic Studies* (one of the top five economic journal). I also presented our findings in several seminars/conferences, both inside and outside Japan as listed in the other sheet. 2) The preliminary findings from the second project was used to support my application for an external grant (Kakenhi, General B) in Oct 2017.

List of Accomplishment
(including forthcoming)

Article

Academic papers (including those published in general journals)

*For collaboratively authored papers, please underline your name.

Author	0 in total Title	Publisher	The number of referred article Vol/No/ Page	0 Date of Publications	Start page	Finish page	Referee Report	0 Internationa 1 joint	DOI	Open Access
1						-				
2						-				
3						-				

Book

*For collaboratively edited or authored books, please underline your name.

*If you are an author of a chapter in a book, please report in "Article" category.

Author	0 in total Title	Publisher	Date of Publications	Total pages
1				
2				
3				

Verbal Report

*Please report peer-reviewed academic conference papers in "Article" category. Please report non-peer-reviewed academic conference papers "Verbal Report" category.

Name	1 in total Title	Name of the workshop	Report Date	Venue
<i>non-peer reviewed academic paper</i>				
1	Mariacristina De Nardi, Svetlana Pashchenko, Ponpoje Porapakarm	The Lifetime Costs of Bad Health NBER working paper	No. 23963 2017/10/1	- yes yes
<i>Seminars/conference presentation in 2017 Fiscal Year</i>				
2	The Lifetime Costs of Bad Health	IFS seminar, Institute for Fiscal Studies	2018/2/22	UK
3	"	Facing Demographic Change in a Challenging Economic Environment*	2017/10/27	CA
4	"	Research seminar, Federal Reserve Bank of Atlanta	2017/9/2	US
5	"	Macroeconomics workshop, University of Connecticut	2017/9/15	US
6	"	Lunch seminar, Federal Reserve Bank of Chicago	2017/8/29	US
7	"	Asian Meeting of Econometric Society*	2017/6/4	HK
8	"	Macro-labor workshop, Chinese University of Hong Kong*	2017/3/11	HK
9	"	Economics seminar, University of Macau	2017/3/10	China

*Note: Conferences are marked with **