9 – 11 July 2008
Wellington Convention Centre
Wellington, New Zealand

Symposium Handbook

www.phillips08.org.nz
www.esam08.org.nz

• The 49th Annual Conference of the New Zealand Association of Economists
• The Australasian Meeting of the Econometric Society
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ORGANISERS AND COMMITTEE

STEERING COMMITTEE

Grant M Scobie (Co-chair) The Treasury, New Zealand
John Yeabsley (Co-chair) New Zealand Institute of Economic Research, New Zealand
Peter Bushnell The Treasury, New Zealand
Rob Cameron Cameron and Co., New Zealand
John Gallagher Consultant, New Zealand
Arthur Grimes Motu, New Zealand and Reserve Bank of New Zealand
Mary Hedges University of Auckland, New Zealand
Veronica Jacobsen Ministry of Justice, New Zealand
Kirdan Lees Reserve Bank of New Zealand
John McDermott Reserve Bank of New Zealand
Les Oxley University of Canterbury, New Zealand
Iain Rennie State Services Commission, New Zealand
John Stephenson New Zealand Institute of Economic Research, New Zealand

INTERNATIONAL ADVISORY BOARD

Alan Bollard (Chair) Governor, Reserve Bank of New Zealand
William Baumol Professor of Economics and Director, CV Starr Center for Applied Economics, New York University
Conrad Blyth Emeritus Professor, Department of Economics, University of Auckland
Stanley Fischer Governor, Bank of Israel
Robert G. Gregory Professor of Economics, Research School of Social Sciences, Australian National University
David F. Hendry Professor of Economics, Nuffield College, University of Oxford
Otmar Issing ex-member of the Executive Board, European Central Bank
Mervyn King Governor, Bank of England
Malcolm D. Knight General Manager, Bank for International Settlements
Donald L. Kohn Vice Chair, Federal Reserve Board of Governors
Anne Krueger First Deputy Managing Director, International Monetary Fund
Glenn Stevens Governor, Reserve Bank of Australia
Peter C. B. Phillips Sterling Professor of Economics and Professor of Statistics, Yale University and Alumni Distinguished Professor of Economics, University of Auckland
Robert M. Solow Emeritus Professor, Department of Economics, Massachusetts Institute of Technology (MIT)
John Sutton Sir John Hicks Professor of Economics, London School of Economics
Lars E. O. Svensson Professor of Economics, Princeton University
Stephen Turnovsky Castor Professor of Economics, Department of Economics, University of Washington
Axel A. Weber President, Deutsche Bundesbank

PROGRAMME COMMITTEE

Bob Buckle (Co-chair) Victoria University of Wellington, New Zealand
John Gibson (Co-chair) University of Waikato, New Zealand
Nicholas Barr London School of Economics, United Kingdom
Glenn Boyle Victoria University of Wellington, New Zealand
Bill Griffiths University of Melbourne, Australia
Viv Hall Victoria University of Wellington, New Zealand
Gary Hawke Victoria University of Wellington, New Zealand
Dean Hyslop Department of Labour, New Zealand
Ian King University of Melbourne, Australia
Robert Leeson Murdoch University, Australia
Sholeh Maani University of Auckland, New Zealand
Phillip McCann University of Waikato, New Zealand
Warwick McKibbin Australian National University, CAMA and Lowy Institute, Australia
Les Oxley University of Canterbury, New Zealand
Rohan Pitchford University of Sydney, Australia
Basil Sharp University of Auckland, New Zealand
Brian Silverstone University of Waikato, New Zealand
John McDermott Reserve Bank of New Zealand
Stephen Turnovsky University of Washington, USA

CONFERENCE ORGANISERS

The Conference Company
PO Box 9772, Wellington, 6141
Ph: +64 4 385 9191
Fax: +64 4 385 9195
Email: phillips08@tcc.co.nz
VENUE

Wellington Convention Centre
Michael Fowler Centre and Wellington Town Hall
111 Wakefield Street
Wellington, New Zealand

West Plaza Hotel
110 - 116 Wakefield Street,
Wellington, New Zealand

Registration and Internet Café  Fletcher Challenge Foyer
Posters and Catering  Renouf Foyer
Plenary Sessions  Town Hall Auditorium
Contributed Sessions  Ilot Theatre, Lion Harbourview

Speakers Preview Room  Lounge, Civic Suite 1,
Contributed Sessions  Civic Suite 2, Civic Suite 3,
                     Square Affair 1, Square Affair 2,
                     Green Room

Contributed Sessions  Cornish Suite (West Plaza Hotel)

1. West Court (Lounge area)
2. Promenade
3. Ilott Foyer
4. Ilott Theatre (Contributed Sessions)
5. Town Hall Auditorium, Stalls (Plenary Sessions)
6. Green Room (Contributed Sessions)
7. Square Affair 1 & 2 (Contributed Sessions)
8. Town Hall Foyer Ground
9. Town Hall Main Entry
10. Fletcher Challenge Foyer (Registration & Internet Café)
11. Speaker Preview
12. Ticketek

13. West Gallery
14. Town Hall Auditorium, Gallery
15. Promenade
16. Council Chamber Foyer
17. Council Chamber
18. Town Hall Foyer
19. Mayors Office
20. Frank Taplin Room
21. M.F.C. Auditorium, Stalls
22. Promenade
23. Renouf Foyer (Catering, Posters)

24. Civic Suite 1 & 2 (Contributed Sessions)
25. Civic Suite Foyer
26. Lantern Area
27. Civic Suite 3 (Contributed Sessions)
28. Link Bridge
29. Lion Harbourview A & B (Contributed Sessions)
30. Promenade
31. M.F.C. Auditorium, Gallery
32. V.I.P Room

Reception is located in the Fletcher Challenge Foyer. Public phones are located in both the Town Hall and Fletcher Challenge Foyers and there are toilets throughout the venue as marked on the maps. When in the venue please note your nearest EXIT in case of emergency.
The following information is offered to make your attendance at the conference as pleasant and as trouble-free as possible. If you require help, please call at the Registration and Information Desk and we will do everything we can to assist you.

Accommodation
For those registrants who have reserved hotel accommodation through The Conference Company, please ensure that accounts are settled in full prior to your departure.

Badges
All conference attendees will receive a name badge on registration. This badge should be worn at all conference sessions.

Carparking
Parking is available in the James Smith Car Park in Wakefield Street (across the road from the Wellington Convention Centre and beside the Duxton Hotel).

Early Bird Daily Rate: $12 per day (entry before 8am exit by 8pm)
Daily Rate: $18 per day (12 hrs)
Casual Rate: $3 per hour

Conference Assistants
Conference Assistants will be wearing turquoise polo shirts and are there to help you if you require any assistance.

Internet Café
An internet café is located in the Fletcher Challenge Foyer of the Michael Fowler Centre. The use of this facility is complimentary to delegates.

Medical Services
Emergency medical services are available from 8am to 11pm on a 7 day basis at the Accident & Urgent Medical Centre, 17 Adelaide Rd, Newtown, Wellington, telephone: 384 4944.

In an emergency dial 111 for an ambulance, the police or the fire department.

Messages
If you wish to have a message left for you or a facsimile sent to you during the conference the numbers for those sending the message or the facsimile are:

Telephone: 462 8444
Facsimile: 462 8413 and mark the facsimile “For the attention of the ESAM/NZAE 08 conference Registration and Information Desk

Pharmacies
After Hours Pharmacy
17 Adelaide Road, Newtown
Telephone: 385 8810
Hours: Monday-Friday 17.00-23.00
Saturday 08.00-23.00

Posters
Posters will be located in the Renouf Foyer. Dedicated poster sessions will take place at following times:
Poster Session 1 Thursday 10 July 14.10-15.40
Poster Session 2 Friday 11 July 11.40-13.10

Prizes
The following prizes will be awarded at the Conference Dinner:

• Frisch Medal
• Jan Whitwell Prize
• NZIER/NZAE Poster Prize Award
• UTS Teaching Award

Refreshments
Lunch, morning tea and afternoon tea are included in your registration fee and are provided during the programmed breaks in the Renouf Foyer.

Registration Desk
The Registration Desk is located in the Fletcher Challenge Foyer of the Wellington Convention Centre. The registration opening hours are as follows:
Tuesday 8th July 14.00 – 18.00
Wednesday 9th July 07.30 – 19.30
Thursday 10th July 07.30 – 18.00
Friday 11th July 07.30 – 18.00

Smoking
The Wellington Convention Centre is a smoke free building. Delegates are requested to observe this policy.
Speakers’ Preview Room
The speakers’ preview room is located in the Reception Meeting room off the Fletcher Challenge Foyer. The speakers preview room is open at the following times:

Tuesday 8th July  14.00 – 18.00
Wednesday 9th July  07.30 – 19.30
Thursday 10th July  07.30 – 18.00
Friday 11th July  07.30 – 18.00

All speakers should check in their presentation to the speakers preview room at least 2 hours before their session is due to begin.

Special Dietary Requirements
If you have advised any special dietary requirements on your registration form, your lunch will be available at a special diet table.

Taxis
Taxis are usually available outside the main entrance to the Wellington Convention Centre. Alternatively please see numbers below.

Wellington Transportation
Wellington Airport is located 25 minutes from the central city and the conference venue. A taxi fare is approximately $30.00 one way.

The Airport Shuttle bus costs $15 for the first person then $5 per person thereafter. Hire of the van for up to 10 people costs $50 per person. The shuttle must be pre booked. Telephone 0800 959595.

Wireless Internet Access
Wireless access is available throughout the centre. You should log into Windows Explorer and follow the instructions. The cost is approximately $10 a day and you can pay by credit card.

TELEPHONE DIRECTORY

<table>
<thead>
<tr>
<th>Emergency Services</th>
<th>111 (fire/police/ambulance)</th>
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<tr>
<td>Registration and Information Desk</td>
<td>Telephone: 462 8444 Facsimile: 462 8413</td>
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<tr>
<td>Accident &amp; Medical Clinic</td>
<td>384 4944</td>
</tr>
<tr>
<td>After Hours Pharmacy</td>
<td>385 8810</td>
</tr>
<tr>
<td>Airport Shuttle</td>
<td>0800 959595</td>
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<tr>
<td>Wellington Visitors Centre</td>
<td>802 4860</td>
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<td>Avis Rent A Car</td>
<td>802 1088</td>
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<tr>
<td>Telephone Directory Enquires</td>
<td>National 018 International 0172</td>
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<td>Taxi Services</td>
<td>Corporate Cabs 387 4600 Wellington Combined Taxis 384 4444</td>
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<tr>
<td>Air New Zealand</td>
<td>0800 737 000</td>
<td>388 9900</td>
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<td>Qantas</td>
<td>0800 808 767</td>
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<th>Hotels</th>
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<td>Duxton Hotel</td>
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<td>Holiday Inn</td>
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<td>Intercontinental Hotel</td>
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<tr>
<td>Museum Hotel</td>
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<tr>
<td>YHA Wellington City</td>
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</table>

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Wireless access is available throughout the centre. You should log into Windows Explorer and follow the instructions. The cost is approximately $10 a day and you can pay by credit card.
LSE Alumni Reception
Date: Tuesday 8 July, 2008
Time: 6.00pm
Venue: Reserve Bank Museum, Reserve Bank of New Zealand, 2 The Terrace, Wellington
Tickets: $40.00 per person includes all food, drinks and entertainment

The Wellington LSE alumni group invites all LSE alumni, current and former staff and their partners attending the Phillips Symposium to a gala reception on the evening of Tuesday 8 July 2008. This will be a great opportunity to network with LSE alumni from New Zealand and celebrate the life of Bill Phillips.

The reception will be held in the Reserve Bank of New Zealand Museum which holds a working version of Bill Phillip’s Moniac machine. Other memorabilia of Bill Phillip’s life will also be on display. Refreshments and food will be available and entertainment will be provided.

LSE Archives & the Phillips Papers

The Archives Division of the Library of the London School of Economics and Political Science has recently moved its collection of Phillips’ papers out of its Miscellaneous Collections series and renamed it the Phillips papers.

The L.S.E. Archives would welcome contributions to its holdings on Phillips. The following types of material would all be potentially valuable additions to the collection: correspondence, reminiscences of Phillips from colleagues, students and friends, lecture notes from classes or seminars, photographs etc. (L.S.E. Archives does not normally collect published materials (including press cuttings) or photocopies of documents, so these latter types of material are unlikely to be of interest.)

Please email document@lse.ac.uk with details before sending materials so that the staff can assess their suitability for the collection.
Welcome Reception

Date: Wednesday 9 July
Time: 19.00 – 20.00
Venue: Renouf Foyer, Wellington Convention Centre
Delegate: One ticket is included in the full registration fee
Guest ticket: $45.00

An informal Welcome Reception will take place on Wednesday evening, allowing delegates to relax and socialise, renewing old friendships and making new ones. Drinks and canapés will be served.

NZIER Symposium Dinner

Date: Thursday 10 July
Time: 19.30 – 23.00
Venue: Wellington Town Hall
Tickets: $125.00 per person

Join colleagues for dinner. The evening speaker is Dr Alan Bollard, Governor, Reserve Bank of New Zealand, New Zealand speaking on Bill Phillips: Man, Money & Machine. The following prizes will be presented at the dinner:

- The Frisch Medal
- The Jan Whitwell Prize
- NZIER/NZAE Poster Prize Award
- UTS Teaching Award

TOUR PROGRAMME

DAY TRIP - Phillips Family Farm Tour
especially prepared for the AWH Phillips Symposium
Saturday 12 July 2008

7.30am Depart Wellington travelling through the city's western suburbs around Porirua Harbour and the rugged Paekakariki shoreline to the Kapiti Coast. Pass through the townships of Waikanae and Otaki before turning inland at Levin across the Manawatu Plains to Palmerston North where a brief morning tea stop is made. Continue north through the Manawatu Gorge into the northern Wairarapa. Time permitting, you will get a close up view of the Tararua Wind farm turbines before arriving at the Phillips Farm around 11.00am for a 90-minute farm visit.

12.30pm Depart the farm for the iconic Tui Brewery at Mangatainoka where lunch is included.

2.15pm Depart the brewery heading south through the Wairarapa Region centres of Woodville, Pahiatua and Masterton to the area around Martinborough in the southern Wairarapa, renowned for its fine wine production. Visits will be made to two vineyards for wine tastings before returning to Wellington over the Rimutaka Range and through the Hutt Valley.

7.00 pm Arrive back in Wellington.

COST: NZ$225 per person
AERU, Lincoln University

Postal Address: PO Box 84, Lincoln 7647, NEW ZEALAND
Ph: +64 3 325 2811 extn 8280
Fax: +64 3 325 3679
Email: cunnint1@lincoln.ac.nz
Contact Person: Professor Caroline Saunders
Website: www.lincoln.ac.nz/aeru

The Agribusiness and Economics Research Unit (AERU) operates from Lincoln University providing research expertise for a wide range of organizations. AERU research focuses on agribusiness, resource, environment, and social issues.

Founded as the Agricultural Economics Research Unit in 1962, the AERU has evolved to become an independent, major source of business and economic research expertise.

The AERU has four main areas of focus. These areas are trade and environment; economic development; non-market valuation, and social research.

Research clients include Government Departments, both within New Zealand and from other countries, international agencies, New Zealand companies and organisations, individuals and farmers.

ARC Economic Design Network

Postal Address: Department of Economics, The University of Melbourne, Parkville, VIC, 3010 AUSTRALIA
Ph: +61 3 8344 6391
Fax: +61 3 8344 6899
Email: p.bardsley@unimelb.edu.au
Contact Person: EDN Convenor - Professor Peter Bardsley
Website: http://pluto.ecom.unimelb.edu.au/ednetwork/

The ARC Economic Design Network is a research network funded by the Australian Research Council to support research and scholarship in economic theory and experimental economics, and in their application to the design of economic policy.

By encouraging interdisciplinary research and policy innovation, using state of the art techniques in economic theory and experimental economics, it will create practical tools that can be used to solve complex social and economic problems.

Australian Bureau of Statistics

Postal Address: Locked Bag 10, Belconnen ACT 2616, AUSTRALIA
Ph: +61 2 6252 5000
Fax: +61 2 6252 5566
Email: client.services@abs.govt.au
Website: www.abs.gov.au

The Australian Bureau of Statistics provides statistics that are used to inform research, discussion and decision making within governments and the community.

In mid 2007 the ABS refocused its analytical resources to build a stronger capacity for analysis across social, economic and environmental issues. The Economic Analysis and Reporting, Social Analysis and Reporting and Analytical Services Branches form the core of the ABS Analytical Community. The ABS Analytical Community brings technical, methodological and analytical capabilities to the ABS and provides capacity and opportunity for the ABS to produce increased value-added statistical outputs.

Business and Economic Research Limited (BERL)

Postal Address: BERL House, PO Box 10 277, Wellington 6143, NEW ZEALAND
Ph: +64 4 931 9200
Fax: +64 4 931 9202
Email: info@berl.co.nz
Contact Person: Sue Ferris
Website: www.berl.co.nz

BERL pioneered the provision of forecasts of the New Zealand economy and last year celebrated 50 years in the business of forecasting. BERL is a privately-owned New Zealand company providing independent practical business advice, research, analysis and consultancy services. Its services now cover a range of fields including economic impact assessments, profiles and forecasts to businesses, industries, councils and other agencies.

BERL's staff collaborate with a network of consultants and specialists to access the best expertise relevant to the projects it tackles. The provision of sound, practical, independent business and economic advice continues to be the hallmark of BERL's work.
**Castalia**

Postal Address: PO Box 102 25, Wellington, NEW ZEALAND  
Ph: +64 4 913 2800  
Fax: +64 4 913 2808  
Email: wellington@castalia.fr  
Contact Person: Alex Sundakov  
Website: www.castalia.fr  

Castalia is an advisory firm specialising in the interface between commerce and public policy. We help businesses and governments to solve problems of vital public interest, focusing on energy, water, transport, telecommunications, the environment, agri-business, health and competition policy. In all these areas, a careful blend of private business initiative and community control is needed to deliver the best results for people. Getting that blend right is Castalia’s specialty. Through our tight focus, our global reach, and our highly skilled multi-disciplinary team we aspire to world leadership in our chosen fields.

**The Centre for Applied Macroeconomic Analysis (CAMA)**

Postal Address: ANU College of Business & Economics, Sir Roland Wilson Building #120, The Australian National University, Canberra ACT 0200, AUSTRALIA  
Ph: +61 2 6125 4442  
Fax: +61 2 6125 4895  
Email: cama.admin@anu.edu.au  
Contact Person: Professor Warwick McKibbin  
Website: http://www.cama.anu.edu.au  

The Centre for Applied Macroeconomic Analysis has been established to build strong links between professional macroeconomists. It provides a forum for quality research and discussion of policy issues between academia, government and the private sector. The Centre Director is Warwick McKibbin and the Deputy Director is Heather Anderson. For more information on the Centre’s activities, see http://www.cama.anu.edu.au

**MAF - Ministry of Agriculture and Forestry**

Postal Address: PO Box 2526, Wellington, NEW ZEALAND  
Ph: +64 4 894 0100  
Fax: +64 4 894 0720  
Email: info@maf.govt.nz  
Website: www.maf.govt.nz  

MAF is a sustainable development agency that delivers policy advice, regulation and service delivery on agriculture, forestry, and biosecurity in New Zealand. Our vision is for New Zealanders to celebrate dynamic, scientifically sophisticated and prosperous agriculture, forestry and related industries leading growth and innovation in the economy, while achieving the economy, environment and society to which New Zealanders aspire. We have a significant, and influential, mandate.

Our role stretches across the whole lifecycle of New Zealand’s resource-based production from natural resource use, to production and processing, to trade (and travel) and its associated risks.

**College of Business, Massey University**

Postal Address: Department of Economics & Finance, Massey University, NEW ZEALAND  
Ph: +64 6 350 5371  
Fax: +64 6 350 5660  
Email: a.meister@massey.ac.nz  
Contact Person: Professor Anton D Meister  
Website: http://business.massey.ac.nz/  

The College of Business at Massey University is the largest business school in New Zealand. The College is a leading provider of tertiary education, research and training in business and management. With a distinct “can-do” and flexible approach, it is an innovator in its field. The College attracts students from throughout New Zealand and from 120 countries around the world. The College faculty are recognised for their international qualifications and record of scholarship and are geared to help students at Massey take full advantage of the University’s rich, diverse and first-class educational programmes, facilities and research capability.
The Policy Advice Division of Inland Revenue advises the New Zealand Government on all aspects of tax law and reform and on social policy measures that interact with the tax system. Tax policy is developed in accordance with the Generic Tax Policy Process. This is a process designed to ensure better, more effective tax policy development through early consideration of all aspects - and likely impacts - of proposals, and increased opportunities for public consultation. The Policy Advice Division also drafts tax legislation, forecasts tax revenues, and negotiates, interprets and maintains New Zealand’s network of double tax agreements with other countries.

The Ministry of Economic Development is the Government’s lead advisor in its work to achieve a step change in sustainable economic growth. Our role is to help the Government develop and implement business and consumer policies and services. This includes leading the government’s economic development efforts, providing advice, delivering services to business, and playing an advisory and monitoring role in relation to a number of Crown entities.

We do all this with the aim of helping New Zealand develop an internationally-competitive and sustainable economy. The Ministry includes the Ministry of Consumer Affairs and the Ministry of Tourism, and it works for Ministers in eight portfolio areas.

The Ministry of Foreign Affairs and Trade (MFAT) is the Government’s principal adviser and negotiator on foreign and trade policy issues.

The Ministry’s primary role is to recognise and understand international trends, opportunities and risks that affect New Zealand, and offer the Government advice on how best to protect and advance New Zealand’s well-being. In this way it contributes to the Government’s overall objective of transforming New Zealand into a dynamic, knowledge-based economy and society, underpinned by the values of fairness, opportunity and security for all.

MFAT offers the chance to work in New Zealand and overseas in a rich variety of fields including trade negotiations, economics, international law, environmental issues, disarmament, security and more.

The Ministry of Justice works closely with other agencies in the justice sector such as New Zealand Police, the Department of Corrections and the Ministry of Social Development, to advance the sector’s common goal of a safe and just society for New Zealand.

The Ministry of Justice administers legislation and provides services to contribute to safer communities and a fairer, more credible and more effective justice system by:

- developing robust policy advice that influences the direction of justice in New Zealand
- supporting an efficient and accessible court system that is trusted by New Zealanders
- providing effective services to support independent judicial decision making
- settling Treaty of Waitangi claims in a fair and durable way
- managing parliamentary elections and referenda effectively, to maintain public confidence in electoral processes;
- working with communities to enhance safety and wellbeing.

The Minister of Justice administers legislation and provides services to contribute to safer communities and a fairer, more credible and more effective justice system by:

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- settling Treaty of Waitangi claims in a fair and durable way
- managing parliamentary elections and referenda effectively, to maintain public confidence in electoral processes;
- working with communities to enhance safety and wellbeing.

The Ministry's approximately 2,900 staff work in 103 different locations around New Zealand delivering a wide variety of services from court services and fines collection to policy advice, negotiation of Treaty of Waitangi claims and running the parliamentary elections.
Motu Economic and Public Policy Research
Postal Address: PO Box 24390, Manners Street, Wellington, NEW ZEALAND
Ph: +64 4 939 4250
Fax: +64 4 939 4251
Email: Marianna.kennedy@motu.org.nz
Contact Person: Marianna Kennedy
Website: www.motu.org.nz

Motu Economic and Public Policy Research is an independent economic research institute in Wellington, which never advocates an expressed ideology or political position. A charitable trust, Motu is founded on the belief that sound public policy depends on sound research accompanied by rigorous public debate. Motu is committed to publishing and widely disseminating its research findings. It is non-competitive and works to build research capacity in New Zealand for national benefit.

Please see www.motu.org.nz for further details.

New Zealand Institute for the Study of Competition & Regulation (ISCR)
Postal Address: PO Box 600, Wellington, NEW ZEALAND
Ph: +64 4 463 5562
Fax: +64 4 463 5566
Email: iscr@vuw.ac.nz
Contact Person: Glenn Boyle
Website: www.iscr.org.nz

ISCR is New Zealand’s leading centre for research on the economics of competition, regulation, markets, and industrial organisation. Since its establishment in 1996, it has built an outstanding record of academic research, policy, publications, public engagement and graduate supervision. Its principal research interests include:

- how markets and organisations operate;
- the role of markets in providing appropriate incentives and disciplines for organisations;
- the limitations of markets, and the role of regulation in addressing these limitations;
- the role of property rights and institutional structures in facilitating the effectiveness of markets, organisations, competition, and regulation in New Zealand.

Guardians of New Zealand Superannuation (New Zealand Superannuation Fund)
Postal Address: PO Box 106607, Auckland
Ph: +64 9 300 6980
Fax: +64 9 300 6981
Email: kfox@nzsuperfund.co.nz
Contact Person: Dr Karine Fox
Website: www.nzsuperfund.co.nz

The Guardians of New Zealand Superannuation are an autonomous Crown entity established under the New Zealand Superannuation and Retirement Income Act 2001. The Guardians manage, administer, and invest the New Zealand Superannuation Fund. The Fund was also established under the Act, and is a pool of financial assets that form part of the Government’s core balance sheet. The Fund is designed to act as a ‘buffer’ to help future Governments make retirement income payments to New Zealanders. The Guardians must invest the Fund on a prudent, commercial basis and, in doing so, manage and administer the Fund in a manner consistent with best-practice portfolio management; maximising return without undue risk to the Fund as a whole; and avoiding prejudice to New Zealand’s reputation as a responsible member of the world community.

Productivity Commission
Postal Address: PO Box 1428, Canberra City ACT, AUSTRALIA 2601
Ph: +61 2 6240 3200
Fax: +61 2 6240 3399
Email: webmaster@pc.gov.au
Contact Person: Bernard Wonder, Head of Office
Website: www.pc.gov.au

The Productivity Commission is the Australian Government’s independent research and advisory body on a range of economic, social and environmental issues affecting the welfare of Australians. Its role is to make help make better policies, in the long term interests of the Australian community.
The Reserve Bank of Australia’s main responsibility is for the formulation and implementation of monetary policy. Policy decisions are made by the Reserve Bank Board with the objective of achieving low and stable inflation over the medium term. Other major roles are maintaining financial system stability and promoting the safety and efficiency of the payments systems. The Bank is an active participant in financial markets, manages Australia’s foreign reserves, issues Australian currency notes and acts as banker to the Australian Government.

Russell McVeagh

Widely regarded as New Zealand’s premier law firm. Russell McVeagh is a 250 lawyer firm with offices in Auckland and Wellington.

The firm’s Public Law and Policy team comprises leading practitioners in constitutional and administrative law. With our extensive cumulative experience, our team is well versed in policy and legislative process and maintains a strong network of senior level government contacts including Ministers, Members of Parliament, Ministerial advisors and officials.

The team assists corporate clients in their interactions with Government and advises a range of state sector agencies on statutory compliance, competition and regulatory issues, public law and policy development.

Statistics New Zealand

Statistics New Zealand is the country’s national statistical office and provides a wealth of information about New Zealand: who we are, where we live and what we do.

Statistics New Zealand leads the Official Statistical System and is the major producer of Official Statistics.

For further information visit: www.stats.govt.nz

Department of Economics, The University of Auckland

The Department of Economics at the University of Auckland is the largest such department in the country, with a current establishment of thirty research and teaching faculty, all with PhDs, most from leading international universities. Faculty publish in the top international journals, as well as contributing actively to New Zealand policy issues. The department offers a full range of undergraduate and postgraduate courses and programmes, including the BCom, the BA, the BCom(Honours) and the BA(Honours), the MCom and MA and the PhD. Its graduates hold positions in business, finance, government and academia across New Zealand and around the world.
The academic study of business and economics has a long and distinguished history at Canterbury. The College of Business and Economics comprises the Accounting Finance and Information Systems Department (AFIS) which has 29 academic staff members; the Department of Economics which has an establishment of 17 academic staff; the Department of Management which has a complement of 28 teaching staff and The National Centre for Research on Europe. In 2006 we celebrated the centenary of the establishment of the Bachelor of Commerce degree at Canterbury which makes it one of the oldest such qualifications in the world.

University of Otago, Department of Economics

The Department of Economics at the University of Otago is one of the premier teaching and research departments in New Zealand. The Department has 18 faculty members and offers around 40 papers at the undergraduate and postgraduate levels. In the research evaluation exercise carried out by the NZ Tertiary Education Commission for 2001-2006, the University of Otago was ranked first overall and first in Economics. Areas of research specialism include International Trade, Development Economics, Macroeconometrics, Decision Analysis, Labour Economics, Urban Economics and Health Economics. A number of Economics Ph.D. scholarships are awarded regularly; please e-mail the Department for more information.

Waikato Management School, The University of Waikato

Waikato Management School is distinctive among New Zealand business schools for its relevance and rigour, and for its belief that business and enterprise are most successful when it improves the communities, societies and nations in which it operates. The School has achieved the coveted ‘triple crown’ of international accreditation with AACSB International, AMBA and EQUIS, putting it in the top 1% of business schools worldwide. In New Zealand, the School is ranked the number one research-led business school in the subject areas of Accounting and Finance, and Management, Human Resources, Industrial Relations, International Business and Other Business.

The School has more than 94% of academically or professionally qualified teaching staff. The School has 4,496 students from more than 40 countries, and offers qualifications at undergraduate, postgraduate and doctoral level, with a vibrant and comparatively large PhD programme.

The School of Economics and Finance, Victoria University of Wellington

The School of Economics and Finance spans the areas of economics, econometrics, finance and economic history. It provides courses for Bachelors, (graduate) Honours, Masters and PhD degrees, as well the Victoria International Applied Finance programme offering specialised post-experience courses.

The School has very strong links with the business and financial community and, being located in the capital city, with a range of government departments, the Reserve Bank of New Zealand, research agencies (such as BERL, NZIER and Motu) and the New Zealand Institute for the Study of Competition and Regulation.
Westpac Institutional Bank

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Westpac Institutional Bank is a leading provider of financial services to corporate, institutional, and government clients in Australasia.

Westpac Institutional Bank works in teams made up of relationship managers, specialist industry analysts, and product experts to tailor optimum solutions for their clients across the entire financial services spectrum including: financing and capital raising; financial risk management and hedging; and transactional and payments services.

Westpac Institutional Bank’s 1,200 employees are based throughout Australasia, in offices in London, New York, and Asia, and operate as a seamless business globally. This enables Westpac to lead the market in assisting New Zealand’s companies with both their local and offshore banking requirements.

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The ABS releases data through standard products and also produces customised data tables on a consultancy basis. However, as these outputs cannot meet all user needs or fully utilise the potential of the data, the ABS seeks to add value and extend the range of statistical outputs produced. Specifically:

- research and development into the production of complex statistical measures such as measures of human capital, socio-economic indexes and seasonal or calendar series adjustment;
- conducting and publishing the results of policy-relevant analyses of unit record data, which, due to confidentiality constraints, are not widely available for analysis;
- bringing data together to produce modelled, synthesised or enhanced statistics; and
- exploring relationships in statistics to ensure the quality of ABS outputs, and to understand the movements and trends in various series.

In mid 2007 the ABS refocused its analytical resources to build a stronger capacity for analysis across social, economic and environmental issues. This initiative brings enhanced technical, methodological and analytical capability to the ABS and offers an opportunity for the ABS to produce increased value-added statistical outputs.
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Matt Benge, Assistant Deputy Commissioner of the Policy Advice Division.
He's here at the conference.
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Make a difference
David Audretsch

David B. Audretsch is the Director of the Max Planck Institute of Economics in Jena, Germany and a Distinguished Professor and Ameritech Chair of Economic Development and Director of the Institute for Development Strategies at Indiana University. He also serves as a Scholar-in-Residence at the Ewing Marion Kauffman Foundation.

Professor Audretsch is ranked as the 21st most cited scholar in economics and business, 1996-2006. He was awarded the 2001 International Award for Entrepreneurship and Small Business Research by the Swedish Foundation for Small Business Research. In 2008, he received an honorary doctorate degree from the University of Augsburg.

George J. Borjas

George J. Borjas is the Robert W. Scrivner Professor of Economics and Social Policy at the John F. Kennedy School of Government, Harvard University. He is also a Research Associate at the National Bureau of Economic Research.

Professor Borjas received his Ph.D. in economics from Columbia University. Professor Borjas was elected a fellow of the Econometric Society in 1998 and a fellow of the Society of Labor Economists in 2004. Professor Borjas was an editor of the Review of Economics and Statistics, and has been on the editorial boards of the Quarterly Journal of Economics and the International Migration Review. Professor Borjas’s research on the economic impact of immigration is widely perceived as playing a central role in the debate over immigration policy in the United States and abroad.

Martin Browning

Martin Browning is Professor of Economics, University of Oxford; Fellow, Nuffield College; Director, Centre for Applied Microeconometrics, Copenhagen and a Research Fellow of the Institute for Fiscal Studies. He is a Fellow of the Econometric Society. He has been editor or co-editor on several journals. His research interests are the economics of the family with special emphasis on intrahousehold decision making; demand, consumption and saving; modelling individual behaviour with lots of heterogeneity.

Robert J. Gordon

Robert J. Gordon is Stanley G. Harris Professor in the Social Sciences and Professor of Economics at Northwestern University. He is one of the world’s leading experts on inflation, unemployment, and productivity growth. His recent work on the rise and fall of the New Economy, the revival and “explosion” of U. S. productivity growth, the stalling of European productivity growth, and the widening of the U. S. income distribution, have been widely cited. Gordon is author of Macroeconomics, eleventh edition, which has been translated into eight languages, and of The Measurement of Durable Goods Prices, The American Business Cycle, and The Economics of New Goods. His book of collected essays, Productivity Growth, Inflation, and Unemployment, was published by the Cambridge University Press in 2004. Gordon did his undergraduate work at Harvard and then attended Oxford University on a Marshall Scholarship. He received his Ph.D. in 1967 at M.I.T. and taught at Harvard and the University of Chicago before coming to Northwestern in 1973. He is a Research Associate of the National Bureau of Economic Research, a Research Fellow of the Centre for Economic Policy Research (London) and the Observatoire Français des Conjunctures Economiques (Paris), and an economic adviser to the Congressional Budget Office and the Bureau of Economic Analysis.

Clive Granger

Clive Granger obtained his BA in Mathematics at the University of Nottingham in 1955 and his Ph.D. from Nottingham in 1959. He held a Harkness Fellowship at Princeton in 1960 and positions of Assistant Lecturer, Lecturer, Reader, and Professor in the Departments of Economics and Mathematics at Nottingham from 1956 to 1974. From 1974 he has been Professor of Economics at the University of California, San Diego. In 1995 he was Visiting Fellow at All Souls College, Oxford and in 1996 he held the position of Visiting Fellow Commoner at Trinity College, Cambridge. He has been a Guggenheim Fellow, is a Fellow of the American Academy of Arts and Sciences, of the Econometric Society, and of the International Institute of Forecasters. He was recently named a “Distinguished Fellow of the American Economic Association.” His interests are largely in time series analysis, forecasting, applied econometrics and finance, and he has roughly 200 publications or submitted papers, including ten books. In 2003 he was awarded the Nobel Prize for Economics and in 2004 he was knighted by Queen Elizabeth II.
Avner Greif

Avner Greif, Stanford University (since 1989). The Bowman Family Endowed Professor in Humanities and Sciences, Professor of Economics, Fellow of Freeman Spogli Institute, the American Academy of Arts and Sciences, the Canadian Institute for Advanced Research, and the Econometrics Society, and a MacArthur Foundation Fellow. Research interest: economic history and institutional development. Published in, for example, the JEH, AER, JPE, APSR, CJIL, among other journals. Main recent publication: Institutions and the Path to the Modern Economy: Lessons from Medieval Trade. 2006. “Commitment, Coercion, and Markets: The Nature and Dynamics of Institutions Supporting Exchange.” 2005. The Handbook for New Institutional Economics.

Stephen Morris

Stephen Morris received his B.A. from Cambridge University and his Ph.D. from Yale University. He is currently Alexander Stewart 1886 Professor of Economics at Princeton University. Previously he held positions at the Universities of Pennsylvania and Yale University. He is a Fellow and Council Member of the Econometric Society, a Fellow of the American Academy of Arts and Sciences, a Council Member of the Game Theory Society and received a Guggenheim Fellowship in 2005-2006. He is currently editor of Econometrica and was previously foreign editor of the Review of Economic Studies, a member of the Board of Editors of the American Economic Review and has served on the editorial boards of several other journals. His main area of research is game theory, combining foundational work with applications in various applied economic areas.

Torsten Persson

Torsten Persson is Director of the IIES at Stockholm University, Centennial Professor at the London School of Economics, and has held visiting positions at leading universities as Harvard, Princeton and Berkeley. Persson is the 2008 President of the Econometric Society, and was President of the European Economic Association in 2003. His scientific prizes include the 1997 Yrjö Jahnsson Medal, given biannually to “the best young economist in Europe”. Persson’s work has spanned different areas, but he is most well-known for his articles and books on political economics. His current research focuses on development, civil war, and climate change.

Tom Sargent

Thomas John “Tom” Sargent is an American economist specializing in the fields of macroeconomics, monetary economics and time series econometrics. He is known as “one of the leaders of the rational expectations revolution” and the author of numerous path-breaking papers.

Sargent earned his B.A. from the University of California, Berkeley in 1964, being the University Medalist as Most Distinguished Scholar in Class of 1964, and his Ph.D. from Harvard in 1968. He has held teaching positions at the University of Pennsylvania, University of Minnesota, University of Chicago, Stanford University, and is currently the Berkley Professor of Economics and Business at New York University. He is a Fellow of the Econometric Society since 1976 and, since 1987, a Senior Fellow of the Hoover Institution at Stanford University.

Joel B Slemrod

Joel Slemrod has been a professor of economics at the University of Michigan since 1987. Professor Slemrod received a Ph.D. in economics from Harvard University in 1980, and joined the economics department at the University of Minnesota in 1979. In 1983-84 he was a National Fellow at the Hoover Institution and in 1984-85 he was the senior staff economist for tax policy at the President’s Council of Economic Advisers. He has written widely on taxation, and is co-author with Jon Bakija of Taxing Ourselves: A Citizen’s Guide to the Debate over Taxes, now in its fourth edition.

Allan Timmermann

Allan Timmermann holds the Atkinson/Epstein chair at the Rady School and is a professor of Economics at UCSD. His current work deals with forecasting methods which he applies to topics in finance and macroeconomics. His past research includes work on topics in time-series econometrics, including regime switching models, learning in stock markets and predictability of financial returns. Dr Timmermann obtained his phd from University of Cambridge and he has taught at Birkbeck College, London School of Economics and Stanford.

Stephen Turnovsky

Stephen Turnovsky received his M.A. from VUW and his Ph.D. from Harvard University. He is currently Castor Professor of Economics at the University of Washington. Previously he held positions at the Universities of Pennsylvania, Toronto, Illinois, and ANU. In 1981 he was elected Fellow of the Econometric Society and was Co-Chair of the Program Committee of the Eighth World Congress of the Econometric Society in 2000. He was President of the Society of Economic Dynamics and Control from 1982-84 and of the Society for Computational Economics from 2004-2006. He is a past Editor of the Journal of Economic Dynamics and Control, and also serves on several other editorial boards. His main area of research is macroeconomic dynamics and growth.
Wing Thye Woo

Wing Thye Woo holds the New Century Chair in Trade and International Economics at The Brookings Institution. He is also Professor at the University of California at Davis, Yangtze River Professor at the Central University of Finance and Economics (Beijing), and Director of the East Asia Program within The Earth Institute at Columbia University. He specialises in the economic issues of East Asia (particularly, China and Indonesia), international financial architecture, sustainable economic growth, and comparative economics. In 2001, he helped establish the Asian Economic Panel, a forum of 50 Asia experts that meets biannually; and whose selected proceedings are published in Asian Economic Papers (MIT Press) that he edits.

Special Invited Speaker

Ian Foster

Ian Foster, Computation Institute Director, and Arthur Holly Compton Distinguished Service Professor of Computer Science is considered one of the founders of the international Grid community and has written many influential documents on Grid architecture and principles. He created the Distributed Systems Lab at Argonne and the University of Chicago, which has pioneered key Grid concepts, developed Globus software, the most widely deployed Grid software, and led the development of successful Grid applications across the sciences. An internationally recognized and widely cited researcher, Foster, a New Zealander, is a fellow of the American Association for the Advancement of Science and the British Computer Society.

ECONOMIC DESIGN NETWORK SPONSORED SPEAKERS

Dr David Abrams, University of Chicago Law School

Professor Eric Bond, Department of Economics, Vanderbilt University

Professor Bernard Cornet, Paris School of Economics

Professor Enrique Fatas, LINEEX - University of Valencia

Dr Sven Feldmann, Melbourne Business School

Professor Simon Gaechter, CeDEx, University of Nottingham

Professor Andy McLennan, University of Queensland

Professor Andrea Patacconi, Department of Economics, Oxford University

Professor Heikki Rantakari, USC Marshall School of Business

Professor Karmal Saggi, Department of Economics, Southern Methodist University

Nina Walton, Department of Economics, UCLA
PROGRAMME
WEDNESDAY 9 JULY

**Symposium Official Opening**
Session Chair: Professor Frank Scrimgeour, President, New Zealand Association of Economists, Dean Waikato Management School, University of Waikato, New Zealand
Speaker: **Dr Michael Cullen**, Deputy Prime Minister and Minister of Finance, New Zealand
Time: 08.30-09.00
Location: Town Hall Auditorium

**(KN1) Plenary Session: Opening Address - AWH Phillips Lecture**
Session Chair: Professor Frank Scrimgeour, President, New Zealand Association of Economists; Dean Waikato Management School, University of Waikato, New Zealand
Speaker: **Professor Thomas Sargent**, Professor of Economics, New York University
Senior Fellow, Hoover Institution, Stanford, United States of America
Time: 09.00-10.00
Location: Town Hall Auditorium
Sponsored by the Econometrics Society

**Tea/Coffee Break**
Time: 10.00-10.30
Location: Renouf Foyer

**(KN2) Plenary Session: Thematic Lecture 1 – The Phillips Curve 50 Years On**
Session Chair: Dr John McDermott, Assistant Governor and Head of Economics, Reserve Bank of New Zealand
Speaker: **Sir Clive Granger**, Department of Economics, University of California, San Diego, United States of America
Time: 10.30-11.25
Location: Town Hall Auditorium
Sponsored by the University of Canterbury

**Contributed Paper Sessions**
Time: 11.30-13.00

**Time Series: New Keynesian Models and the Phillips Curve**
Iott Theatre
(1.1) The Phillips Curve and Long-Term Unemployment
Llaudes, Ricardo
(1.2) Studying the Short-Run Dynamics of Inflation: Estimating a Hybrid New-Keynesian Phillips Curve for Argentina (1993-2007)
Garegnani, Maria Lorena

**EDN: Game Theory I**
Lion Harbourview A
(2.1) Undominated (and) Perfect Equilibria in Poisson Games
Pimienta, Carlos
(2.2) Relying on Non-Selfserving Statements: Full Information Revelation in Cheap-Talk Games With Multiple Senders
Feldmann, Sven
(2.3) A New Sufficient Condition for Uniqueness in Continuous Games
Hogan, Seamus

**Microeconomics: Networks**
Lion Harbourview B
(3.1) Email Pricing
Meriluoto, Laura
(3.2) Competition Schemes and Investment in Network Infrastructure Under Uncertainty
Mizuno, Keizo
(3.3) Peer Evaluation in Networks
Yuan, Kuo-chih

**Econometric Theory: Distribution Theory**
Civic Suite 1
(4.1) Mixed Methods for Fitting the Gev Distribution
Thomson, Peter
(4.2) The Asymptotic Distribution of Nagar’s Bias-Adjusted TSLS Estimator and the Jive Estimator with Many Instruments Under Partial Identification
Forchini, Giovanni

Footnote:
Presenters please note that the following lengths of presentation are required:
Sessions with 3 papers: 30 minutes (20 min presentation and 10 min discussion)
Sessions with 4 papers: 23 minutes (17 minutes presentation and 6 minutes discussion)
Sessions with 2 papers: 30 minutes (20 min presentation and 10 min discussion) This will leave delegates free to attend 3rd papers in another slot.
### Wednesday 9 July

#### Econometric Issues and the Phillips Curve

(6.1) Identification of New Keynesian Phillips Curves From a Global Perspective  
Smith, Vanessa

(6.2) Two Geometric Representations of Confidence Intervals for Ratios of Linear Combinations of Regression Parameters: Application to the NAIRU  
Lye, Jenny

#### Environmental Economics: Emissions and Resources

(7.1) Using Micro-Data for the Assessment of Carbon Emissions in the New Zealand Manufacturing Industry  
Brown-Santirso, Martin

(7.2) Greenhouse Gases and Nutrients: The Interactions Between Concurrent New Zealand Trading Systems  
Kerr, Suzi

(7.3) Transactions Costs and Fisheries Self Governance in New Zealand  
Townsend, Ralph

#### Development: Microfinance and Gender

(8.1) Health Shocks and Consumption Smoothing in Rural Households: Does Microcredit Have a Role to Play?  
Maitra, Pushkar

(8.2) Determinants of Gender Inequality in Child Mortality in India: Does God(S) Matter?  
Robitaille, Marie-Claire

(8.3) Medium and Long-Term Participation in Microfinance: Evaluation Using Large Panel Data Set from Bangladesh  
Islam, Asadul

#### Environmental Economics: Energy and Resources

(9.1) Using Micro-Data for the Assessment of Carbon Emissions in the New Zealand Manufacturing Industry  
Brown-Santirso, Martin

(9.2) Greenhouse Gases and Nutrients: The Interactions Between Concurrent New Zealand Trading Systems  
Kerr, Suzi

(9.3) Transactions Costs and Fisheries Self Governance in New Zealand  
Townsend, Ralph

#### Environmental Economics: Public Economics

(10.1) The Identification of Fiscal and Monetary Policy in a Structural VAR  
Fry, Renee

(10.2) Variable GST: A Tool for Monetary Policy in New Zealand?  
Claus, Iris

#### Lunch

Time: 13.00-14.00  
Location: Renouf Foyer

#### Contributed Paper Sessions

Time: 14.00-15.30

#### Time Series: Forecasting, Data Construction and Breaks

(11.1) Forecasting Combination Under Structural Break Uncertainty  
Tan, Jing

(11.2) Forecasting with Weighted Smooth Transition Regression Models  
Becker, Ralf

(11.3) Constructing Historical Euro Area Data  
Anderson, Heather

(11.4) Empirical Study of Break Point Detection on Seasonal Change in External Migration Series  
Zheng, Guan Yu

#### EDN: Game Theory II

(12.1) Infinite Horizon Hydroelectricity Games  
Robles, Jack

(12.2) Coordinating Collective Resistance Through Communication and Repeated Interaction  
Mui, Vai-Lam

(12.3) Manipulation in Elections with Uncertain Preferences  
McLennan, Andrew

#### Microeconomics: Theory

(13.1) A Shirking Theory of Referrals  
Eldridge, Damien

(13.2) The Evolution of Time Preference With Aggregate Uncertainty  
Robson, Arthur

(13.3) Half Empty, Half Full and the Possibility of Agreeing to Disagree  
Zimper, Alexander

#### Econometric Theory: Hypothesis Testing and Model Selection

(14.1) Efficient Semiparametric Detection of Changes in Trend  
Goh, Chuan

(14.2) Hypothesis Testing via Multivariate Kernel Density with an Application to the Information Matrix Test  
Akram, Muhammad

(14.3) On an Expression of Generalised Information Criterion  
Lu, Zeng Hua

#### The Phillips Curve in the Long Run

(16.1) The Long-Run Determinants of UK Wages, 1860–2004  
Hendry, David
### WEDNESDAY 9 JULY

#### Environmental Economics, Conservation and Recreation
- **(17.1)** Can Differences in the Quality of Social Institutions and Social Capital Explain Cross-Country Environmental Performance
  - Author: Knowles, Stephen
- **(17.2)** Effectiveness and Cost Effectiveness of Yellow-Eyed Penguin Restoration Treatments
  - Author: Cullen, Ross
- **(17.3)** Average Subjective Well-Being and the Wealth of Nations: Some Insights Derived From the World Bank’s Millennium Capital Assessment
  - Author: Engelbrecht, Hans-Juergen
- **(17.4)** Evaluation of Tourist’s Perceptions of Relationship Marketing and Recreation Benefits in Festival Development
  - Author: Lee, Chun-Hung

#### Development: China
  - Author: Peng, Xiujian
- **(18.2)** Modeling Spatial Dimensions of Poverty in China
  - Author: Olivia, Susan
- **(18.3)** Estimation of Firm Level Energy Efficiency in China’s Energy Sector
  - Author: Hu, Baiding

#### Public Economics: Social Security and Welfare Participation
- **(19.1)** Poverty Traps and Marriage Penalties in New Zealand’s Tax-Benefit Interface
  - Author: Nolan, Patrick
- **(19.2)** Public Pension Reforms and Private Savings
  - Author: Hong, Minki
- **(19.3)** A Spatial-Econometric Perspective on Regional Labour Market Adjustment and Social Security Benefit Uptake in New Zealand
  - Author: Poot, Jacques
- **(19.4)** Teenage Mothers’ Income Support, Education and Paid Work: the Dynamics of Welfare Participation
  - Author: Kalb, Guyonne

#### Stabilisation: Optimal Monetary Policy
- **(20.1)** Monopolistic Banks and Fixed Rate Contracts:
  - Author: Lees, Kirdan
- **(20.2)** Learning and Active Control of Autoregression with Unknown Slope and Persistence
  - Author: Morozov, Sergei
- **(20.3)** Tests of Optimal Monetary Policy
  - Author: Otto, Glenn

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**(KN3) Plenary Session: Thematic Lecture 2 – Stabilisation Policy and Policy Modelling**

**Session Chair:** Professor Viv Hall, McCarthy Chair of Victoria University of Wellington, New Zealand

**Speaker:** Professor Stephen Turnovsky, Castor Professor of Economics, University of Washington, United States of America

**Time:** 15.40-16.35

**Location:** Town Hall Auditorium

**Tea/Coffee Break**

**Time:** 16.35-17.00

**Location:** Renouf Foyer

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**(KN4) Plenary Session: Thematic Lecture 3 – China: Implications for the World**

**Session Chair:** Professor Warwick McKibbin, Director, Centre for Applied Macroeconomic Analysis (CAMA), Australian National University; Professorial Fellow, Lowy Institute for International Policy, Sydney, Australia; Non-Resident Senior Fellow, The Brookings Institution, Washington DC, United States of America

**Speaker:** Professor Wing Thye Woo, The New Century Chair in International Trade and Economics; Senior Fellow, Global Economy and Development Program and John L Thornton China Center; Foreign Studies Program Brookings Institution, Washington DC, United States of America

**Time:** 17.00-18.00

**Location:** Town Hall Auditorium

**Sponsored by Centre for Applied Macroeconomics Analysis CAMA**

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**(KN5) Plenary Session: Econometric Society Presidential Address**

**Session Chair:** Professor Trevor Breusch, Chair, Australasian Standing Committee, Econometric Society; Professor of Econometrics, Australian National University, Australia

**Speaker:** Professor Torsten Persson, President, Econometric Society; Director and Professor of Economics, Institute for International Economic Studies, Sweden; Centennial Professor, London School of Economics, United Kingdom

**Time:** 18.00-19.00

**Location:** Town Hall Auditorium

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**Welcome Reception**

**Time:** 19.00-20.00

**Location:** Renouf Foyer

**Sponsored by Westpac**
THURSDAY 10 JULY

Contributed Paper Sessions

Time: 08.30-10.00

Time Series: Testing for Autoregressions
(21.1) A New Test in Parametric Linear Models With Nonparametric Autoregressive Errors
(21.2) Testing for Uncorrelated Errors in ARMA Models
(21.3) A Simple Hybrid Bootstrap Test for Predictive Ability Based on Autoregressions
Ilott Theatre
Gao, Jiti
Nankervis, John
Kuo, Biing-Shen

EDN: International Trade
(22.1) Steepest Ascent Tariff Reforms
(22.2) Credit Rationing, Macro Volatility, and Industry Evolution in Developing Countries
(22.3) Intellectual Property Provisions in North-South Trade Agreements
Lion Harbourview A
Woodland, Alan
Bond, Eric
Saggi, Kamal

Experimental Economics
(23.1) Revisiting Kindness and Confusion in Public Goods Experiments: A Note
(23.2) Relational Contracts and Exogenous Revenue Effects: An Experimental Study
(23.3) Credence Goods Markets: An Experimental Analysis
Lion Harbourview B
Bayer, Ralph
Servatka, Maros
Dulleck, Uwe

Finance: Theoretical Asset Pricing and Financial System Risk
(24.2) Behavioural Scenarios for Derivative Pricing in Incomplete Markets: A Dynamical System Approach
(24.3) Value-At-Risk Evaluations in Malaysian Stock Exchange: Heavy-Tailed And Long-Memory-ARCH Approaches
Civic Suite 1
Thorp, Susan
Pinto, Alberto
Chin, Wencheong

Macroeconomics: Macro-Finance
(5.1) Nesting Yield Curve Shifts and Rotations in a Model of Monetary Policy Shocks
(5.2) Contagion in Financial Networks
(5.3) A Macroeconomic Foundation for the Nelson and Siegel Class of Yield Curve Models
Civic Suite 2
Claus, Edda
Gai, Prasanna
Krippner, Leo

Econometric Theory: GMM Estimation
(26.1) GMM Estimation of Short Dynamic Panel Data Models with Error Cross Section Dependence
(26.2) Efficient Estimation of Non-Linear Dynamic Panel Data Models with Application to Smooth Transition Models
(26.3) First and Second Order Asymptotics of Covariance Structure Models
Civic Suite 3
Sarafidis, Vasilis
Skeels, Christopher
Prokhorov, Artem

Innovation: Firm Performance
(27.1) Just Good Friends? Relationship Banking and Access to Finance in New Zealand Firms
(27.2) The “Suite” Smell of Success: Complementary Personnel Practices and Firm Performance
(27.3) Market Choices of New Zealand Firms
Square Affair 1
Stevens, Philip
Fabling, Richard
Sanderson, Lynda

Development Economics
(28.2) Food and Oil Prices, and their Implications for Rural Poverty
(28.3) Calculating Poverty and Pro-Poor Measures from the Beta Income Distribution
Square Affair 2
Saha, Shrabani
Imai, Katsushi
Chotikapanich, Duangkamon

Public Economics: Tax
(29.1) The Role of Individual Tax Deferred Savings Accounts in Retirement Financing: Evidence From Canada
(29.2) Tax Law Asymmetries and Income Shifting: Evidence from Japanese Capital Keiretsu
(29.3) Tax Evasion, Tax Morale and Institutions
Green Room
Jeon, Sung-Hee
Onji, Kazuki
Torgler, Benno

Stabilisation: Monetary and Financial System Stability
(30.1) Structural Var Approach to Malaysian Monetary Policy Framework: Evidence From Pre- And Post-Asian Crisis Periods
(30.2) Practical Monetary Policies
(30.3) Effectiveness and Feasibility of Cycle-Stabilising Capital Requirements: The Case of New Zealand Housing Lending
Cornish Suite (West Plaza Hotel)
Raghavan, Mala
Guender, Alfred
Ng, Tim

Tea/Coffee Break
Time: 10.00-10.30
Location: Renouf Foyer
Sponsored by Russell McVeagh
(KN6) Plenary Session: Colin Clark Lecture
Session Chair: Professor Rohan Pitchford, Professor of Economics, University of Sydney, Australia
Speaker: Professor Stephen Morris, Professor of Economics, Princeton University, United States of America
Time: 10.30-11.30
Location: Town Hall Auditorium

Contributed Paper Sessions
Time: 11.40-13.10

Time Series: Nowcasting and Monetary Policy
(31.1) Combining Forecast Densities from VARs With Uncertain Instabilities
(31.2) A Large BVAR for New Zealand: A Useful Tool for Analysing Shock Transmission in a Data-Rich Environment
(31.3) Nowcasting, Business Cycle Dating and the Identification of Policy Shocks Using Information Available in Real Time
(31.4) Combining Multivariate Density Forecasts Using Predictive Criteria

EDN: Experimental Economics
(32.1) House Allocation with Existing Tenants: Theory vs. Experiments
(32.2) Globalization and Cooperation. An International Field Study
(32.3) Performance Incentives and the Dynamics of Voluntary Cooperation

Finance: Asset Pricing and Empirical Finance
(34.1) Mispricing in the Japanese Corporate Bond Market
(34.2) An Examination of Systematic Risk in a Scaled Market Model
(34.3) Tests of Conditional Asset Pricing Models in Emerging Markets: Empirical Evidence From Pakistan

Macroeconomics: International Finance
(15.1) Macroeconomic Impacts of Foreign Exchange Reserve Accumulation: A Theory and Some International Evidence
(15.2) The Relative Size of New Zealand Exchange Rate and Interest Rate Responses to News

Econometric Theory: Estimation in Finance
(36.1) Semiparametric Estimation of Duration Models when the Parameters are Subject to Inequality Constraints and the Error Distribution
(36.2) Semiparametric Estimation of the Tail of the Error Distribution in Multivariate Regressions
(36.3) Robust Rank Regression for Limited Dependent Variable

Microeconometrics: Methods
(37.1) Inferential Methods for Elasticity Estimates
(37.2) On Assessing the Specification of Propensity Score Models
(37.3) How to Pick the Best Regression Equation: A Monte Carlo Analysis of Alternative Model Selection Criteria
(37.4) Estimating Probability Density Functions for Exact Index Numbers

Education: Incentives and Spillovers
(38.1) Sorting, Achievement, and Utility in the Presence of Social Spillovers in Education
(38.2) Does Raising Teacher Pay Boost Student Achievement? A Regression Discontinuity Approach
(38.3) Has PBRF Raised the Returns to Publication Quality in the New Zealand Market for Academic Economists?

Public Economics: Tax Policy
(39.1) The Welfare and Distributional Effects of the Tax-Free Threshold in Australia
(39.2) How Useful are Equity and Efficiency Measures of Tax-Transfer Systems for Tax Policy Advice?
(39.3) A Decade of Personal Tax And Transfer Reforms in the UK: in Search of Equity or Efficiency?

(SI1) Special Invited Lecture: Computation and Economics: Opportunities and Experiments
Session Chair: Dr Grant Scobie, The Treasury, New Zealand
Speaker: Professor Ian Foster, Computation Institute Director and Arthur Holly Compton Distinguished Service Professor of Computer Science, Argonne National Laboratory and University of Chicago, Chicago, United States of America
Time: 11.40-12.40
Location: Cornish Suite (West Plaza Hotel)
## THURSDAY 10 JULY

### Lunch
**Time:** 13.10-14.10  
**Location:** Renouf Foyer

### Contributed Paper Sessions
**Time:** 14.10-15.40

#### Time Series: Macro-level Event Effects
- **(40.1)** Elucidating Easter Economic Effects  
  *Ilott Theatre*  
  *Créquer, John*
- **(40.2)** How do Public Announcements Affect the Frequency of Trading in Stocks?  
  *Nowak, Sylvia*

#### EDN: Law and Economics
- **(41.1)** The Location of Crime  
  *Lion Harbourview A*  
  *de Fontenay, Catherine*
- **(41.2)** Authority and Knowledge Based Liability Rules and the Internal Structure of the Firm  
  *Pitchford, Rohan*
- **(41.3)** Do Judges Vary in Their Treatment of Race?  
  *Abrams, David*

#### IO: Market Organisation
- **(42.1)** Preferred Suppliers and Vertical Integration in Auction Markets  
  *Lion Harbourview B*  
  *Burguet, Roberto*
- **(42.2)** Comparing Bertrand and Cournot Outcomes in the Presence of Public Firms  
  *Ghosh, Arghya*
- **(42.3)** Dynamic Moral Hazard With History-Dependent Reservation Utilities  
  *Morfov, Stanimir*

#### Finance: International Finance
- **(43.1)** Bond Market Development in Emerging Economies: The Role of Socio-economic and Institutional Factors  
  *Civic Suite 1*  
  *Khalid, Ahmed*
- **(43.2)** Booms and Busts as Exchange Options: Valuing the Decision to Enter and Exit from an Emerging Market  
  *Miller, Stephen*
- **(43.3)** Multinational Ownership and Subsidiary Investment  
  *Carlin, Wendy*

#### Macroeconomics: Money, Frictions, Matching and Migration
- **(44.1)** Money, Capital and Unemployment  
  *Civic Suite 2*  
  *Dutu, Richard*
- **(44.2)** Modelling Regime-Shifting Beveridge Curves  
  *Holmes, Mark*
- **(44.3)** Gains From Migration in a New-Keynesian Framework  
  *Engler, Philipp*

#### Phillips Curves in Europe and USA
- **(45.1)** Instability and Nonlinearity in the Euro Area Phillips Curve  
  *Civic Suite 3*  
  *Stracca, Livio*
- **(45.2)** The Impact of Evolving Labor Practices and Demographics on U.S., Inflation and Unemployment  
  *Campbell, Carl*
- **(45.3)** Two Concerns for the Phillips Curve  
  *Siklos, Pierre*

#### Microeconometrics: Measurement Error
- **(46.1)** Using Engel’s Law to Estimate Income Under-Reporting By the Self Employed  
  *Square Affair 1*  
  *Kim, Bonggeun*
- **(46.2)** Using Engel Curves to Estimate the Bias in the Australian CPI  
  *Barrett, Garry*
- **(46.3)** Comparing Subjective and Objective Measures of Health: Evidence From Hypertension for the Income/Health Gradient  
  *Shields, Michael*

#### Education: Supply and Demand for Skills
- **(47.1)** Assessing Graduate Employment in the Presence of Endogeneity and Sample Selection Bias  
  *Square Affair 2*  
  *Blacklow, Paul*
- **(47.2)** The Effect of Home Computer Use on Children’s Cognitive and Non-Cognitive Skills  
  *Fiorini, Mario*
- **(47.3)** Credential Changes and Education Earnings Premia in Australia  
  *Coelli, Michael*

### Poster Session 1
**Time:** 14.10-15.40  
Refer to page 33 for further details
THURSDAY 10 JULY

(KN7) Plenary Session: Thematic Lecture 4 – Microeconometrics
Session Chair: Professor Bill Griffiths, Professor of Econometrics, University of Melbourne, Australia
Speaker: Professor Martin Browning, Professor of Economics, Nuffield College, University of Oxford, United Kingdom
Time: 15.50-16.50
Location: Ilott Theatre

Tea/Coffee Break
Time: 16.50-17.20
Location: Renouf Foyer Sponsored by Russell McVeagh

(KN8) Plenary Session: Thematic Lecture 5 – Public Economics
Session Chair: Dr Matthew Benge, Inland Revenue Department, New Zealand
Speaker: Professor Joel Slemrod, Paul W McCracken Collegiate Professor; Professor of Business Economics and Public Policy; Professor of Economics, University of Michigan Economics Department, United States of America; Director, Office of Tax Policy Research, Research Associate, National Bureau of Economic Research; United States of America
Time: 17.20-18.20
Location: Ilott Theatre Sponsored by Inland Revenue, New Zealand

(KN9) Plenary Session: Thematic Lecture 6 – Institutions and Economic Performance
Session Chair: Professor Gary Hawke, Emeritus Professor, Victoria University of Wellington, New Zealand
Speaker: Professor Avner Greif, Bowman Family Professor in the Humanities and Sciences Department of Economics, Stanford University, United States of America; Fellow Canadian Institute for Advanced Research, Canada; Fellow American Academy of Arts and Sciences, United States of America
Time: 18.20-19.20
Location: Ilott Theatre Sponsored by New Zealand Business Round Table

Symposium Dinner
Bill Phillips: Man, Money & Machine
Host: Professor Frank Scrimgeour, President, NZ Association of Economists, New Zealand
Speaker: Dr Allan Bollard, Governor, Reserve Bank of New Zealand, Wellington, New Zealand
Time: 19.30-22.30
Location: Town Hall Auditorium
Contributed Paper Sessions

Time: 08.30-10.00

Time Series: Forecasting: Applications  Ilott Theatre
(50.1) A Comparison of Methods for Spatial-Temporal Forecasting with an Application to Real Estate Prices  Rambaldi, Alicia
(50.2) Forecasting Business Cycles in a Small Open Economy: A Dynamic Factor Model for Singapore  Chow, Hwee Kwan
(50.3) Combining Inflation Density Forecasts: Some Cross-Country Evidence  Kascha, Christian

EDN: Theory of the Firm  Lion Harbourview A
(51.1) A Property Rights Theory of Capital Structure  Bel, Roland
(51.2) Advice, Information and the Reputation of CEOs  Walton, Nina

Trade: Investment and Innovation  Lion Harbourview B
(52.1) The FDI Chain: From Host to Parent an Empirical Analysis  Ragoussis, Alexandros
(52.2) Innovation and Trade with Heterogeneous Firms  Stähler, Frank

Finance: Empirical Finance  Civic Suite 1
(73.1) Reversing the Lead, or a Series of Unfortunate Events  Kofman, Paul
(73.2) Are Men More Optimistic?  Jacobsen, Ben
(73.3) The Econometrics for Estimating Unexpected Accruals  Christodoulou, Demetris

Bayesian Econometrics  Civic Suite 2
(54.1) Background Risk and Household Portfolio Choice: Bayesian Analysis of a Generalized Selection Model  Stavrunova, Olena
(54.2) Posterior Distributions for Welfare Changes in Agricultural Commodity Markets  Griffiths, William
(54.3) Hard Drug Uptake Among Cannabis Users: A Bayesian Analysis  Jacobi, Liana

The Phillips Curve in a Bounded-rationality Environment  Civic Suite 3
(65.1) Output-Inflation Tradeoffs With State-Dependent Information  Balta, Narcissa
(65.2) Estimating NAIRU in Small Open Economies: Models with Adaptive and Rational Expectations  Nemec, Daniel
(65.3) Inference in Models With Adaptive Learning  Mavroeidis, Sophocles

Innovation: R&D and Government  Square Affair 1
(56.1) Business Expenditure on Research and Development in New Zealand – Future Potential and Future Industries  Williams, Julian
(56.2) Multi-product Exporters and Product Switching Behaviour of New Zealand Firms  Adalet, Muge
(56.3) Will a BERD Model Fly? Estimating Aggregate R&D Expenditure Using a Micro Model  Fabling, Richard

Migration and Labour Mobility  Square Affair 2
(57.1) Migration and Trade in a World of Technological Differences: Theory With an Application to Eastern-Western European Integration  Iranzo, Susana
(57.2) Workforces on the Move: An Examination of Commuting Patterns to the Cities of Auckland, Wellington and Christchurch  Goodyear, Rosemary
(57.3) Network Effects on Domestic Migration Flows Across Germany – A Spatial Autoregressive Perspective with Spatially Structured Origin and Destination Effects and Heteroskedastic Innovations  Zimmer, Markus

Labour Economics: Wages  Green Room
(48.1) Cyclical Earnings Variation and the Composition of Employment  Hyslop, Dean
(48.2) Relative Income Position, Reference Groups, and Performance  Torgler, Benno
(48.3) Wage Gaps in the New Zealand Labour Market  Genç, Murat

Growth: Technology and Growth  Cornish Suite (West Plaza Hotel)
(59.2) New Evidence on the Marginal Product of Capital  Swan, Anthony
(59.3) Progress and Challenges in the Measurement of Productivity  Fox, Kevin

Tea/Coffee Break
Time: 10.00-10.30
Location: Renouf Foyer
### FRIDAY 11 JULY

**Session Chair:** Professor Ian King, Chair in Economics, Director, Centre for Macroeconomics, University of Melbourne, Australia

**Speaker:** Professor Allan Timmermann, Atkinson/Epstein Chair of Management Leadership, Professor of Management and Economics, University of California, San Diego, United States of America

**Time:** 10.30-11.30

**Location:** Town Hall Auditorium

**Contributed Paper Sessions**

**Time:** 11.40-13.10

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<td>(60.1) Econometric Analysis of Structural Systems with Permanent and Transitory Shocks</td>
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<td>(60.2) Local and Global Identification of DSGE Models: A Simultaneous-Equation Approach</td>
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<td><strong>EDN: Microeconomics of Financial Markets</strong></td>
<td>(61.1) Does Competition Reduce the Risk of Bank Failure?</td>
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<td><strong>Trade</strong></td>
<td>(62.1) Modelling International Trade Flows Between Eastern European Countries and Oecd Countries</td>
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<td>(62.2) Demography, Financial Openness, National Savings and External Balance</td>
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<td>(62.3) Asymmetric Trade Integration, Expectations, and Growth</td>
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<td><strong>Macroeconomics: Multi-country Macroeconomics</strong></td>
<td>(64.1) Forecasting Euro Area Quarterly Real GDP: Optimal Pooling of Information</td>
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<td>(55.2) Understanding the Flattening Phillips Curve</td>
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<td>(55.3) Evaluating the German (New Keynesian) Phillips Curve</td>
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<td><strong>Innovation: Co-ordination</strong></td>
<td>(66.1) Coordination Costs: A Drawback for Research Joint Ventures?</td>
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<td>(66.2) Intellectual Property Clearinghouses and Investment in R&amp;D</td>
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<td><strong>Migration: Assimilation and Wealth</strong></td>
<td>(67.1) Job Durations and Immigrant Labour Market Assimilation</td>
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<td>(67.2) Wealth and Asset Holdings of Immigrants in Germany</td>
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<td>(67.3) Housing Markets and Migration: Evidence from New Zealand</td>
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<td><strong>Labour Economics: Employment &amp; Unemployment</strong></td>
<td>(58.1) The Effects of a Minimum Wage Increase in a Model with Multiple Unemployment Equilibria</td>
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<td>(58.2) Age Effects on Equilibrium Unemployment</td>
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<td>(58.3) Employment Protection Legislation and Housing Market Regulations</td>
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<td><strong>Growth: Sustained Growth and Inequality: Transfers &amp; Financial</strong></td>
<td>(69.1) Is Diversity Bad for Economic Growth? Evidence From State-level Data in the US</td>
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<td>(69.2) What Makes Growth Sustained?</td>
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<td>(69.3) Foreign Direct Investment and Economic Growth: Evidence from Quantile Regression</td>
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**Poster Session 2**

**Time:** 11.40-13.10

Refer to page 35 for further details
FRIDAY 11 JULY

Lunch
Time:  13.10-14.10
Location:  Renouf Foyer

Contributed Paper Sessions
Time:  14.10-15.40

Time Series: Persistence and Thresholds  Ilott Theatre
(70.1) Spurious Regressions in Time Series with Long Memory  Wang, Gaowen
(70.2) Gaussian Tests for Unit Roots and Cointegration with More Power with a Re-Examination of PPP  Rajaguru, Gulasekaran
(70.3) Threshold Model of the Exchange Rate Pass Through Effect: The Case of Croatia  Tica, Josip
(70.4) Self-Exciting Threshold Autoregressive Models for Testing Asymmetric Roots: Extensions and Empirical Evidence From G7  Parveen, Tahera

EDN: Organisational Design  Lion Harbourview A
(71.1) Big Decisions and Little Fish: Theory and Evidence on Competition, Uncertainty and Delegation in Firms  Meagher, Kieron
(71.2) Organizational Design and Environmental Volatility  Rantakiri, Heikki
(71.3) Firm Size and Innovation: Evidence from European Panel Data  Patacconi, Andrea

Trade: New Zealand Applications  Lion Harbourview B
(72.1) Impacts of the ‘Food Miles’ Movement on the NZ Economy: A General Equilibrium Analysis  Ballingall, John
(72.2) Forecasting New Zealand’s Patterns of Comparative Advantage  Lattimore, Ralph
(72.3) Shifting the ‘Goal Posts’: Optimising the Allocation of Competition Points for Sporting Contests  Winchester, Niven

Finance: Exchange Rate Issues  Civic Suite 1
(53.1) Informational Efficiency, Expectation Heterogeneity and Signaling Effects of Foreign Exchange Interventions  Iwatsubo, Kentaro
(53.2) Over The Hedge or Under it? Exporters’ Optimal and Selective Hedging Choices  Grimes, Arthur
(53.3) Estimating Short Term Exchange Rate Exposure for New Zealand Firms  Randal, John

Macroeconomics: Fiscal & Cycles  Civic Suite 2
(74.1) A Panel VAR Approach With Switching Policy Reaction Functions and Program Participation Equation Substitution Between Public and Private Consumption in Australian States  Wells, Graeme
(74.2) In Search of an Optimising Agent with Cyclical Behaviour  Stemp, Peter

Country Studies of the Phillips Curve  Civic Suite 3
(75.1) The Phillips Curve and the Italian Lira, 1861-1998  Trecroci, Carmine
(75.2) Estimating Open Economy Phillips Curves for the Euro Area With Directly Measured Expectations  Paloviita, Maritta

Innovation: Knowledge Spillovers  Square Affair 1
(76.1) Human Capital, Graduate Migration and Innovation in British Regions  Orzechowska-Fischer, Ewa
(76.2) An Analysis of Developments in Skills Shortages that Hampered Innovation Using the 2003 and 2005 Australian Innovation Surveys  McCann, Philip
(76.3) The Impact of R&D Alliance on the Survival and Profitability of Newly Listed High Tech Firms  Valencia, Vicar

Migration : Wages and Skills  Square Affair 2
(77.1) Does Immigration Reduce the Wages of Thai Workers  Bryant, John
(77.2) Labour Market Outcomes of High Capital Immigration Policy on the Native Born Wage: Evidence from New Zealand  Maani, Sholeh
(77.3) A Microeconomic Analysis of Brain Drain Versus Brain Gain: New Survey Evidence From the Tonga and New Zealand  Gibson, John

Labour Economics: Health and Victimisation  Green Room
(78.1) Family Formation and the Demand for Private Health Insurance  Fiebig, Denzil
(78.2) Demand for Hospital Care and Private Health Insurance in a Mixed Public-Private System: Evidence From Australia  Cheng, Terence
(78.3) Longitudinal Evidence on the Impact of Victimisation on Labour Market Outcomes and General Well-Being  Velamuri, Malathi

Growth Cornish Suite (West Plaza Hotel)
(79.1) System GMM Estimation for Economic Growth Equations  Soto, Marcelo
(79.2) Prospects for Thailand’s Growth: A Labor-Market Perspective  Nakornthab, Don
(79.3) The Contribution of Foreign Borrowing to the New Zealand Economy  Zhang, Wei
### FRIDAY 11 JULY

#### (KN11) Plenary Session: Thematic Lecture 7 – Innovation and Technology: Entrepreneurship  
**Session Chair:** Professor Phillip McCann, Professor of Economics, Waikato University, Hamilton, New Zealand  
**Speaker:**  
**Professor David Audretsch**, Distinguished Professor and the Ameritech Chair of Economic Development; Director of the Institute for Development Strategies, Indiana University, United States of America  
**Time:** 15.50-16.50  
**Location:** Town Hall Auditorium  
**Sponsored by the Ministry of Economic Development, New Zealand**

#### Tea/Coffee Break  
**Time:** 16.50-17.20  
**Location:** Renouf Foyer

#### (KN12) Plenary Session: Thematic Lecture 8 – Migration, Diaspora and Human Capital  
**Session Chair:** Dr Suzi Kerr, Director and Senior Fellow, Motu Economic and Public Policy Research, Wellington, New Zealand  
**Speaker:**  
**Professor George Borjas**, Robert W Scrivner Professor of Economics and Social Policy, Kennedy School of Government, Harvard University, United States of America  
**Time:** 17.20-18.20  
**Location:** Town Hall Auditorium  
**Sponsored by Motu Economic and Public Policy Research**

#### (KN13) Plenary Session: Closing Address – A History of the Phillips Curve  
**Session Chair:** Dr Alan Bollard, Governor, Reserve Bank of New Zealand  
**Speaker:**  
**Professor Robert Gordon**, Stanley G Harris Professor of the Social Sciences, North Western University, United States of America  
**Time:** 18.20-19.20  
**Location:** Town Hall Auditorium  
**Sponsored by Fulbright New Zealand**
Poster presenters should be beside their poster at the poster session times noted below. This will give delegates the opportunity to raise questions with the presenter. Poster presenters are also free to be beside their poster during breaks.

**Poster Session 1**

**Date:** Thursday 10 July

**Time:** 14.10 – 15.40

**Location:** Renouf Foyer

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**P1.1** Testing for Price Convergence in Chinese Energy Markets  
*Ma H*  
University of Canterbury

**P1.2** The Economic Impact of Foreign Domestic Workers in Malaysia: Estimates from Induced Labour Market Activity  
*Leong Tan P, Gibson J*  
University of Waikato

**P1.3** Ready (or not) to get Engaged or get Married? Co-movement Towards a Monetary or Currency Union Amongst Pacific Island Countries  
*Lahari W*  
Economics Department, University of Otago

**P1.4** Evaluating Government Business Assistance Programmes  
*Morris M, Stevens P*  
Ministry of Economic Development

**P1.5** Keynesian Microeconomics and Institutional Change  
*Kesting S*  
Auckland University of Technology

**P1.6** Do returns to Schooling go up During Transition? Evidence from Vietnam  
*Doan T, Gibson J, Holmes M*  
University of Waikato

**P1.7** Understanding Regional Economic Growth, Development and Well Being in a Globalizing Economy: An Empirical Analysis  
*Arora R*  
University of Auckland

**P1.8** Assessing Design Options for a Nutrient Trading System using an Integrated Model  
*Kerr S, Lock K*  
Motu Economic and Public Policy Research

**P1.9** Modelling the Effects of Socio-economic Characteristics on Survey Trust  
*Etang A*  
University of Otago

**P1.10** Finding the Invisible Hand: An Objective Model of Financial Markets  
*McLeod D*  
RedSky Systems Corporation
P1.11 On the Trade Balance Effects of Free Trade Agreements Between the EU-15 and the CEEC-4 Countries
Sova, S 1, Rault, C 2, Sova, R 3
1 CES, Sorbonne University and E.B.R.C, 2 LEO, University of Orleans and IZA, Germany, and William Davidson Institute at the University of Michigan 3 CES, Sorbonne University, E.B.R.C and A.S.E

P1.12 Regional Energy Demand: An Analysis of Substitution Possibilities for China
Ma H 1, Oxley L 1, Gibson J 2
1 University of Canterbury, 2 University of Waikato

P1.13 A Word of Caution on Indices
Birks S
Massey University

P1.14 Australian and New Zealand Standard Research Classification (ANZSRC): Impact on Collection and Analysis of Economic Research Data
Hancock A
Statistics New Zealand

P1.15 Forecasting using Discrete Event Simulation for Capacity Planning in the NZ Prison System
Wang J
Ministry of Justice

P1.16 Earnings Mobility in Korea
Oh J
Sungkyunkwan University

P1.17 Poverty Mapping in China: Do Environmental Variables Matter?
Olivia S 1, Gibson J 2, Rozelle S 3, Huang J 4, Deng X 5
1 University of California, Davis, 2 University of Waikato, 3 Stanford University, 4 Chinese Academy of Science

P1.18 Vocational Education and Poverty Exit in Korea
Ha T
Sungkyunkwan University

P1.19 Water, Water Somewhere: The Value of Water in a Drought-Prone Farming Region
Grimes A 1, 2, Aitken A 1
1 Motu Economic & Public Policy Research, 2 University of Waikato

P1.20 The Impact of The Terms of Trade Shocks on Malaysian Economy: A General Equilibrium Analysis
Pradesha A
International Islamic University Malaysia

P1.21 Opinion Divergence and Post-Earning-Announcement Drift
Chen, M, Hsu, J
Department of Finance, National Chung Hsing University

P1.22 Credible Assignments and Incentives in the Minimum Effort Coordination Game
Paichayontvijit, T, Chaudhuri, A
University of Auckland
Poster Session 2

Date: Friday 11 July
Time: 11.40 – 13.10
Location: Renouf Foyer

P2.1 Fiscal Shocks and Real Exchange Rate Dynamics: Some Evidence from Latin America
Caporale G 1, Ciferri D 2, Girardi A 3
1 Brunel University, 2 University Tor Vergata, Rome, 3 Institute for Economic Studies and Analyses

P2.2 Long Run and Cyclical Dynamics in the US Stock Market
Caporale G 1, Gil-Alana L 2
1 Brunel University, 2 University of Navarra

P2.3 The Effect of Taxation and Inflation on Housing Markets in a Lifecycle Model with Credit Constraints
Coleman A
Motu Economics

P2.4 The Quantity Theory of Money in Historical Perspective
Graff M 1,2
1 KOF Swiss Economic Institute at ETH Zurich, 2 University of Queensland, School of Economics

P2.5 How Reliable are Household Expenditures as a Proxy for Permanent Income? Implications for the Income-Nutrition Relationship
Kim B 1, Gibson J 2
1 Sungkyunkwan University, 2 University of Waikato

P2.6 Optimal Capital Taxation under Limited Commitment
Lee J 1, Chien Y 2
1 The Australian National University, 2 Purdue University

P2.7 Political Events and Financial Market Volatility: Investigating the Link Using Markov Switching Process
Khalid A, Rajaguru G
1 Bond University

P2.8 It Never Rains but it Pours: Modelling the Persistence of Spikes in Electricity Prices
Christensen T 1, Hurn S 1, Lindsay K 2
1 Queensland University of Technology, 2 University of Glasgow

P2.9 Unhappiness Effects of Risk and Duration of Unemployment
Ochsen C 1, Welsch H 2
1 University of Rostock, 2 University of Oldenburg

P2.10 An Empirical Test of Methods for Estimating Price Elasticities from Household Survey Data
Kim B 1, Gibson J 2, Rozelle S 3
1 Sungkyunkwan University, 2 University of Waikato, 3 Stanford University

P2.11 Trends in Tourist Expenditure Measured in Volume Terms
Tantirigama T, Taniguchi M
Statistics New Zealand
P2.12 National Accounts: An Optimisation Approach for Balancing Supply and use Tables
Kole J
Statistics New Zealand

P2.13 Statistical Significance and Policy Significance
Birks S
Massey University

P2.14 The Distributional Impact of KiwiSaver Incentives
Hector C 1, Le T 2, Gibson J 1
1 Waikato Management School, 2 NZ Institute of Economic Research

P2.16 An Efficiency Wage - Imperfect Information Model of the Phillips Curve
Campbell C
Northern Illinois University

P2.17 How the Distribution of Unemployment by Duration Affects the Unemployment Rate
Ochsen C
University of Rostock

P2.18 State Space Model for Coincident and Leadings Indices of Economic Activity
de Souza R, Issler J
Getulio Vargas Foundation

P2.19 Did Wages Become Stickier Between the World Wars?
Dighe R, Schmitt E
State University of New York at Oswego
Abstract:
Reinterpreting most of the market price of risk as a price of model uncertainty eradicates a link between asset prices and measures of the welfare costs of aggregate fluctuations that was proposed by Tallarini and Alvarez and Jermann. Prices of model uncertainty contain information about the benefits of removing model uncertainty, not the consumption fluctuations that Lucas studied in 1987 and 2003. A max-min expected utility theory lets us reinterpret Tallarini’s risk-aversion parameter as measuring a representative consumer’s doubts about the model specification. We use model detection instead of risk-aversion experiments to calibrate that parameter. Plausible values of detection error probabilities give prices of model uncertainty that approach a Hansen-Jagannathan bound. Fixed detection error probabilities give rise to virtually identical asset prices for Tallarini’s two models of consumption growth.

Abstract:
Phillips (1958) original curve involved a nonlinear relationship between inflation and unemployment, estimated by using the United Kingdom data from a few early years (1861-1913), and then visually compared to data for later periods (up to 1957), often getting remarkably good fits. We continue this process by considering how the original results change due to updated theoretic and empirical studies, increased computer power, enlarged data sets, increased in data frequency and developed time-series econometric models. Using the linear models in annual data in the U.K., the U.S. Australia, Turkey as well as the monthly data U.S., it is basically found that there was little or very weak causation from unemployment to inflation. Rather than using any of the many non-linear models that are now available, we adopt a time-varying parameter linear model as their convenient proxy of non-linear models for testing the non-causality of unemployment on inflation.

Abstract:
Bill Phillips was a pioneer in the development of dynamic stabilization policy. His contributions were manifest in two seemingly different, but highly inter-related, areas. The first was contained in two papers published in the Economic Journal in the 1950’s. These papers draw upon his engineering background and are the first papers to apply feedback control methods to macroeconomic stabilization. Using simple aggregate dynamic models, Phillips showed how, if one introduces a government that, instead of remaining passive, intervenes actively, it will be able to influence the dynamic time path of the economy. The second contribution shows how the introduction of the Phillips curve into the macroeconomic system has potentially profound consequences for stabilization policy.

This paper discusses the impact of Phillips’ seminal work on subsequent developments in macroeconomic stabilization policy. We begin by reviewing the various stabilization rules adopted by Phillips and show how these relate to optimal stabilization rules that emerge from linear-quadratic optimization problems developed in control engineers. Most of the early stabilization literature was associated with “backward looking” variables. The development of rational expectations in the 1960’s and 1970’s posed a challenge for stabilization policy. This arose from the role of “forward-looking” inflationary expectations in the Phillips curve, and the effect this had on the design of optimal stabilization rules, through issues such as the “Lucas Critique” and the “time consistency” of policy. We also briefly comment on a long-standing debate, pertaining to the merits of fixed policy rules versus discretionary or optimal policy. The latter part of the paper discusses some of the more contemporary aspects of stabilization policy, thereby serving to illustrate the durability of Phillips’ contributions.
Abstract:

Optimistic analysts have predicted that China’s re-emergence as an independent growth pole would create a new web of synergistic relationships that would unleash greater global prosperity. On the other hand, pessimistic analysts have pointed out that the new rising powers in the 20th Century had inevitably come into conflict with the existing powers: Germany and First World War, the Japan-Germany axis and Second World War, and the Soviet Union and the Cold War.

It is actually naive to think that conflict is inevitable because the most important power to rise and prevail in the 20th Century was the United States and it has in general been a stabilizing force in the international order. Averting the pessimistic outcome requires adherence to the multilateralist principle of the existing powers accommodating rising powers, and the latter becoming responsible stakeholders in the international system.

In the last few years, China has been accused of exchange rate manipulation that has decreased US unemployment and wages. Given the strident assertions by foreign economists that the trade imbalances are undermining China’s economic stability and efficiency, it seems almost a moral imperative for the US to use tariffs to force an RMB appreciation for China’s own good.

The truth, however, is that:

• The claim that a large appreciation of the Renminbi (RMB) would reduce the U.S. trade deficit represents the triumph of hope over experience. The almost 50% appreciation of the Yen in 1985-88 had only marginal impact on the U.S. trade deficit marginally because of competing imports from other Asian economies.

• The claim that China’s balance of payments surplus had caused the Chinese central bank to lose some control of credit growth (and inflation) is wrong. Chinese banks face credit quotas, and high credit growth would be possible if not for the continual upward adjustments of the credit quotas. The reason is not technical inability to control money growth but the political reality of factional politics.

• The alleged negative effects on U.S. labor from the trade imbalances are greatly exaggerated. The average unemployment rate in 1999-06 is lower than in 1991-98; and the total compensation (including benefits) for US blue-collar workers rose throughout the 2001-06 period when the US trade deficit soared. Beside accelerated globalization, accelerated technological innovation was another important trend in this period, and it produced large productivity gains that enabled labor income to rise despite the greater competition from imports.

The optimum solution to the present trade tensions is a policy package that emphasizes multilateral adjustment and cooperation on a broad front. It is bad economics and bad politics to focus on only one party (China alone must change), on only one instrument (RMB appreciation alone), and on only one policy objective (current account balance).

The continued strong growth of China and India will push the world to the limits of environmental sustainability, and accelerate climate change. Solutions are a lot more difficult to achieve because much of the science is still unknown, and the scale and complexity of the required global cooperation is unprecedented.

Enhanced global prosperity requires extensive cooperation on many issues between China and the rest of the world. An important first step in fostering cooperation is to save the world from lapsing into protectionism. Failure on this easier task is unlikely to bode well for future cooperation to slow climate change, stop nuclear proliferation, fight global terrorism, and contain pandemic diseases.
We report on an on-going project, which asks a number of questions relevant to the study of state capacity. What are the main economic and political determinants of the state’s capacity to raise revenue and support private markets? How do risks of violent conflict affect the incentives to invest in state building? Does it matter whether conflicts are external or internal to the state? When are large states associated with higher income levels and growth rates than small states? What relations should we expect between resource rents, civil wars and economic development? The paper is organized into three main sections: 1. The origins of state capacity, 2. The genius of taxation, and 3. The strategy of conflict. Each of these begins with a specific motivation. A simple model is formulated to analyze the determinants of state capacity in the first section, and modified to address the new issues that arise in subsequent sections. The theoretical results are summarized in six propositions. We discuss the implications of the theory, comment on its relation to existing literature, and explore a few of its empirical predictions.

This lecture surveys work on when common knowledge of rationality justifies the rational expectations hypothesis about forward prices in competitive markets. In doing so, I clarify the relationship between a literature on ‘eductive stability in economics’ initiated by Guesnerie (1992) and the “global games” literature initiated by Carlsson and van Damme (1993). In particular, I report new results on global games with strategic substitutability.

Most microeconometric schemes to allow for heterogeneity in micro behaviour have two drawbacks: they do not fit the data and they rule out interesting economic models. In this paper we present an estimator for the time homogeneous first order Markov (HFOM) model that allows for maximal heterogeneity. That is, the modelling of the heterogeneity does not impose anything on the data (except the HFOM assumption for each agent) and it allows for any theory model (that gives a HFOM process for an individual observable variable). ‘Maximal’ means that the joint distribution of initial values and the two transition probabilities is unrestricted. We establish exact conditions for the point identification of our heterogeneity structure and show how it depends on the length of the panel. We derive tests for a variety of subsidiary hypotheses such as the conventional assumption that marginal dynamic effects are homogeneous.

We apply the techniques we develop to a long panel of Danish workers who are very homogeneous in terms of observables. We show that individual unemployment dynamics are very heterogeneous, even for such a homogeneous group. We also show that the impact of cyclical variables on individual unemployment probabilities differs widely across workers. Some workers have unemployment dynamics that are independent of the cycle whereas others are highly sensitive to macro shocks.
Abstract:
A tax system
1) defines what events or states of the world trigger tax liability, and the magnitude of that liability (tax bases and rates).
2) defines who or what entity must remit that tax liability, and when (remittance rules), and
3) defines the procedures that facilitate and ensure compliance with the remittance rules, including information reporting requirements and the consequences of not remitting the liability in a timely fashion (the administrative and enforcement rules).
Most modern economic analysis of taxation presumes that tax liability can be ascertained and collected costlessly, in which case 2) is irrelevant and 3) is unnecessary. But, in reality, governments have limited administrative capacity to measure, monitor, and enforce tax liability so that evasion and avoidance are ubiquitous and administrative and compliance costs are not trivial.
A theory of tax systems goes beyond the optimal tax base and the optimal rates to address such things as what fraction of tax returns to audit and what structure of penalties to apply to detected evasion as well as whether employers or employees remit labor income tax.
Two “correspondence principles” should obtain. First, the theory should apply to both developed and developing countries, where the two settings differ in the cost of acquiring information about tax liability. Second, it should apply both to sophisticated taxpayers with a wide range of avoidance opportunities as well as to individuals whose income tax liability is remitted by his/her employer and for whom any sales tax triggered by purchase is remitted by a business.

Abstract:
What has led to transitions from pre-modern economies to modern economies? In multiple-equilibria growth models, a low-growth economy is a stable equilibrium because decreasing relative risk aversion implies that agents are too risk-averse to choose the modern, high-risk technology. A transition occurs due to a positive random shocks. In endogenous-transition models, low-growth equilibria are unstable and transitions are an inevitable outcome because time-dependent changes in relative prices, technology, or wealth trigger a transition. These models have been criticized, respectively, for failing to explain transitions because they either invoked accidents or generate a transition by assumption on some time-dependent variable.
This paper theoretically analyzes and historically evaluates the role of risk-sharing institutions in endogenous transitions in the absence of changes in fortune, time-dependent variables, or even knowledge of modern technology. A higher investment in the formation of new, productivity-enhancing knowledge initiates a transition. Yet, individual-level risk and positive externalities imply a market failure and under-provision of new knowledge. Distinct risk-sharing institutions - even those providing the same level of insurance - can lead to different growth trajectories. Risk-sharing institutions, however, were historically selected irrespectively of their growth implications. A simulation of England’s and China’s pre-modern risk-sharing institutions predicts a transition only in England. The analysis builds on the existing literature but departs from it by emphasizing market failure, new knowledge, and institutions. Similarly, our analysis is the first ‘pure’ choice-based model of transition in the sense that it neither depends on an exogenous shock nor on time-dependent state variables.
We develop an econometric framework for understanding how agents form expectations about economic variables with a partially predictable component. Our model incorporates the effect of measurement errors and heterogeneity in individual forecasters' prior beliefs and their information signals and also accounts for agents learning in real time about past, current and future values of economic variables. We use the model to develop insights into the properties of optimal forecasts across forecast horizons (the ‘term structure’ of forecasts), and test its implications on a data set comprising survey forecasts of annual GDP growth and inflation with horizons ranging from 1 to 24 months. The model is found to closely match the term structure of forecast errors for consensus beliefs and is able to replicate the cross-sectional dispersion in forecasts of GDP growth but not for inflation - the latter appearing to be too high in the data at short horizons. Our analysis also suggests that agents systematically underestimated the persistent component of GDP growth but overestimated it for inflation during most of the 1990s.

The prevailing theories of entrepreneurship have typically revolved around the ability of individuals to recognize opportunities and then to act on them by starting a new venture. This has generated a literature asking why entrepreneurial behaviour varies across individuals with different characteristics while implicitly holding the external context in which the individual finds herself to be constant. Thus, where the opportunities come from, or the source of entrepreneurial opportunities, are also implicitly taken as given. By contrast, in this paper, we identify at least one source of entrepreneurial opportunity - new knowledge and ideas that are not fully commercialized by the organization actually investing in the creation of that knowledge. The knowledge spillover theory of entrepreneurship holds individual characteristics as given but rather lets the context vary. In particular, we consider how the knowledge context will impact the cognitive process underlying the entrepreneurial choice model. The result is a theory of endogenous entrepreneurship, where (knowledge) workers respond to opportunities generated by new knowledge by starting a new venture. In this view entrepreneurship is a rational choice made by economic agents to appropriate the expected value of their endowment of knowledge. The knowledge spillover theory of entrepreneurship is tested by linking the propensity for people to start a new venture to the degree to which new knowledge is created and commercialized. Based on the recent literature identifying that knowledge spillovers are spatially bounded, we select a spatial context. The empirical findings are generally consistent with the knowledge spillover theory of entrepreneurship. In particular, high knowledge contexts are found to generate more entrepreneurial opportunities, where the entrepreneur serves as a conduit for knowledge spillovers. By contrast, impoverished knowledge contexts are found to generate fewer entrepreneurial opportunities. Thus, while the prevalent and traditional theories of entrepreneurship have typically held the context constant and then examined how characteristics specific to the individual impact the cognitive process inherent in the model of entrepreneurial choice, this paper holds the individual attributes constant and instead focuses on variations in the context. The empirical evidence suggests that the knowledge context will impact the cognitive process underlying the entrepreneurial choice model. Thus, the evidence is consistent with the theory of endogenous entrepreneurship, where (knowledge) workers respond to opportunities generated by new knowledge by starting a new firm. Those contexts with greater investment in knowledge should also experience a higher degree of entrepreneurship, ceteris paribus. By endogenously facilitating the spillover of knowledge created in a different organization and perhaps for a different application, entrepreneurship may serve as the missing link to economic growth. Thus, the knowledge spillover theory of entrepreneurship provides not just an explanation of why entrepreneurship has become more prevalent as the factor of knowledge has emerged as a crucial source for comparative advantage, but also why entrepreneurship plays a vital role in generating economic growth. Entrepreneurship is an important mechanism permeating the knowledge filter to facilitate the spillover of knowledge and ultimately generate economic growth.
Abstract:
The employment rate of black men, and particularly of low-skill black men, fell precipitously from 1960 to 2000. At the same time, the incarceration rate of black men rose markedly. This paper examines the relation between immigration and these trends in black employment and incarceration. Using data drawn from the 1960-2000 U.S. Censuses, we find a strong correlation between immigration, black wages, black employment rates, and black incarceration rates. As immigrants disproportionately increased the supply of workers in a particular skill group, the wage of black workers in that group fell, the employment rate declined, and the incarceration rate rose. Our analysis suggests that a 10 percent immigrant-induced increase in the supply of a particular skill group reduced the black wage by 4 percent, lowered the employment rate of black men by 3.5 percentage points, and increased the incarceration rate of blacks by almost a full percentage point.

Abstract:
This history of the Phillips Curve adopts an American perspective, which is appropriate both because the literature has been dominated by Americans and because the empirical applications have been largely to American data. Another more profound reason limits us to an American perspective, because the Phillips Curve appears to be a relevant empirical data characterization of the US since 1950, but not for many other times and places. The Phillips Curve relationship between the rate of inflation and the level of unemployment or the output gap does not apply to US data in most of pre-1950 history, does not apply to many episodes in which rapid inflations started or stopped (including Sargent’s “the end of four big inflations”), nor to inflation convergence in Europe after 1980.

The early history of the US Phillips curve is well known, including the christening of the term by Samuelson-Solow, the introduction of long-term neutrality by Friedman, Lucas, and Phelps, and the apparent “wreckage” of the Phillips Curve evident in the positive correlation between inflation and unemployment in the 1970s. Less well understood is the resurrection of the Phillips Curve as a symmetric dynamic model of aggregate demand and supply shocks and the remarkable success of the “mainstream” econometric inflation model in tracking the evolution of inflation through the twin peaks of inflation and unemployment in the 1970s and the valley of inflation and unemployment in the late 1990s.

Substantial attention is given to the empirical performance of the mainstream model from three perspectives. The first is the New-Keynesian Phillips Curve (NKPC), which takes a radically different approach to modeling US inflation behavior. The second is the work of Stock and Watson, which raises important questions about the robustness of inflation forecasting across several models. Finally, the behavior of US inflation in the past half-decade raises interesting questions in the context of the mainstream model: has the slope of the Phillips Curve flattened, has the influence of supply shocks weakened, and why has a sharp jump in oil and food prices not yet flowed through from headline to core inflation?
Abstract:
Rapid developments in data, computing, and networking are transforming both practice and understanding in many scientific disciplines. The impact on economics has been less marked. In an attempt to spur discussion concerning potential new approaches, I review ways in which data-intensive computing, high-performance computing, open source software, and large-scale collaboration may be applied to problems in economics. I illustrate my presentation with examples from a variety of sources, including work within the Computational Economics group within the Computation Institute at the University of Chicago and Argonne National Laboratory.

Abstract:
This paper studies the role of long-term unemployment in the determination of prices and wages. Labor market theories such as insider-outsider models predict that this type of unemployed is less relevant in the wage formation process than the newly unemployed. This paper looks for evidence of this behavior in a set of 19 OECD countries. For this purpose, I propose a new specification of the Phillips Curve that allows for different unemployment lengths to enter the model in a time-varying NAIRU framework. This is done by constructing an index of unemployment that assigns different weights to the unemployed based on the length of their unemployment spell. Optimal weights are determined by estimation of the model by maximum likelihood using the Kalman Filter. The results show that unemployment duration matters in the determination of prices and wages, and that a smaller weight ought to be given to the long-term unemployed. Cross-country differences in the results can be explained by a number of labor market institutions, such as employment protection and unionization levels. This modified model has important implications for the policy maker: it produces more accurate forecasts of inflation and more precise estimates of the NAIRU.
Paper ID: 1.2  
Authors: Garegnani M 1, D’Amato L  
1 Central Bank of Argentina, 2 Central Bank of Argentina  
Presenter: Garegnani M  
Abstract:  
A distinctive feature of the modeling of inflation dynamics in the short-run is the introduction of some nominal rigidity in the context of inter-temporal optimizing behavior by non-competitive forward-looking firms (Taylor, 1980; Calvo, 1983). Galí and Gertler (1999) extend the model, allowing for a portion of the firms to follow a backward-looking rule to set prices and obtain a “Hybrid New-Keynesian Phillips Curve”. Recent developments consider a positive trend inflation in the standard Neo-Keynesian Phillips Curve (Ascari and Ropele, 2007; Kiley, 2007).  
We use the Generalized Methods of Moments to estimate a “Hybrid New-Keynesian Phillips curve” for Argentina between 1993 and 2007. We extend the model to a small open economy, considering separately the influence of nominal devaluation and foreign inflation on domestic prices.  
For the whole sample, the results indicate that forward and backward looking components are relevant to explain the dynamics of domestic prices, although the backward-looking term weights more in determining inflation dynamics. Nominal devaluation and foreign inflation are also significant to explain domestic inflation behavior, being the response of inflation to the second more intense. The output gap, although weak, has a significant effect on inflation.  
Given the change in the monetary regime of 2002, we test for parameter stability. In line with the recent theoretical literature on trend inflation, we find that the influence of the output gap weakens in the managed float period. Along with the observed increase in trend inflation, the Phillips Curve becomes more forward looking.

Paper ID: 2.1  
Title of Paper: Undominated (and) Perfect Equilibria in Poisson Games  
Authors: Pimienta C 1, De Sinopoli F 2  
1 The University of New South Wales, 2 Universidad Carlos III de Madrid  
Presenter: Pimienta C  
Abstract:  
Models of population uncertainty have been introduced by Myerson (1998, 2000) and Milchtaich (2004), in order to describe situations in which players do not know the number of opponents. Among these games, a special attention has been reserved to Poisson games, where the number of players is a Poisson random variable with a given mean and where the players’ types are independent identically distributed random variables. Myerson (1998) extends the definition of Nash equilibrium and shows its existence. The existing literature on equilibrium refinements in noncooperative game theory warns that we should be cautious about the strategic stability of the Nash equilibrium concept. If this concern is well founded, we can ask which Nash equilibria are self-enforcing in this setting. Our analysis is focused on Poisson games. However, we must point out that none of the implications that we derive relies on the specific shape of the Poisson distribution. They are a consequence of a symmetry assumption that is embodied in the description of games of population uncertainty. Poisson games are taken as a reference because, together with their comparative computational simplicity, they are the most used subclass within this type of games. In normal form games perfect equilibria selects only undominated strategies. However, in games with population uncertainty (e.g. Poisson games) this is not true in general. We define undominated perfect equilibria for Poisson games as strategy combinations that are limits of sequences of undominated equilibria of perturbed Poisson games. We prove that every Poisson game has at least one undominated perfect equilibrium and that the set of undominated perfect equilibria is exactly the set of perfect equilibria which are also undominated.
Paper ID: 2.2
Title of Paper: Relying on Non-Selfserving Statements: Full Information Revelation in Cheap-Talk Games with Multiple Senders
Authors: Feldmann S
Melbourne Business School
Presenter: Feldmann S
Abstract:
This paper analyzes sender–receiver cheap-talk games with two senders and a multidimensional state space. In this environment, where the typical equilibrium refinements are powerless, we require that messages are believed only if they are (weakly) non-selfserving, i.e., messages about the state are believable only if they make the sender no better off than the state communicated by the other sender. We construct a truthful, fully revealing equilibrium that is supported by reasonable out-of-equilibrium beliefs satisfying this restriction. The resulting equilibrium has properties that make it a simple and plausible solution for full revelation in multi-sender cheap-talk games; in particular, equilibrium messages are robust to any “forward inductive” argument by the senders. Furthermore, the equilibrium is robust to small unexpected perturbations in the information of the senders, and it holds for all sender biases, including collinear biases. The equilibrium is orthogonal to the construction proposed by Battaglini (2002) for similar environments.

Paper ID: 2.3
Title of Paper: A New Sufficient Condition for Uniqueness in Continuous Games
Authors: Hogan S
University of Canterbury
Presenter: Hogan S
Abstract:
Consider the class of games in which each player chooses a strategy from a connected subset of the real line. Many oligopoly models fall into this class. In many of these applications, it would be useful to show that an equilibrium was unique, or at least to have a set of conditions under which uniqueness would hold. In this paper, we first prove a uniqueness theorem that is slightly less restrictive than the contraction mapping theorem for mappings from the subsets of the real line onto itself, and then show how uniqueness in the general game can be shown by proving uniqueness using an iterative sequence of R to R mappings. This iterative approach works by considering the equilibrium for an m-player game holding the strategies of all other players fixed, starting with a two-player game. If one can show that the m-player game has a unique equilibrium for all possible values for the remaining players strategies, then one can add one player at a time and consider the R to R mapping from that player’s strategy on to the unique equilibrium of the first m players and back onto the (m+1)th player’s strategy. We then show how a general condition for each one of this sequence of mappings to have a unique equilibrium is that the Jacobean matrix of best-response functions be positive semi definite, and how this general condition encompasses and generalizes some existing uniqueness theorems for particular games.
We study how the nature of email technology affects the level of efficient and profit-maximizing prices as well as the optimal mix between sender pays and receiver pays pricing. We find that consumers cannot be induced to read efficient messages with negative receiver prices and that there is a cap in the size of the subsidy that can induce senders to send efficient messages, implying that the first-best outcome may not be achievable even with perfectly discriminatory prices. We study efficient uniform sender and receiver prices and find that the sender price decreases to the negative of the sender’s processing cost and the receiver price decreases to zero as the maxima in the preference distributions increase. Senders (receivers) tend to pay more than receivers (senders) when the message preference distribution has a lot of mass for messages with higher sender (receiver) value and low receiver (sender) value. Perhaps more surprisingly, we find that even with perfectly symmetric message preference distributions, the optimal uniform prices are asymmetric in that the receiver pays more than the sender. The sum of the efficient uniform receiver and sender prices never cover the all message costs nor do they cover ISP costs when both the maxima in the message preference distributions are sufficiently large. The efficient prices given ISP break-even constraint and the profit-maximizing prices are also asymmetric in that receivers pay more than the senders when the message preference distributions are symmetric.

This paper compares two specific types of competition schemes—service-based and facility-based competition—by focusing on a firm’s incentive to invest in network infrastructure. We show that when monopoly rent is large, facility-based competition means that the initial introduction of infrastructure is made earlier than under service-based competition. However, when monopoly rent and the degree of uncertainty are both small, service-based competition brings about an earlier initial introduction of infrastructure than under facility-based competition. The paper includes discussion of the policy implications of these findings.
Peer evaluation, as a new alternative to traditional performance appraisal, has recently become one of the major evaluation approaches. Despite peer evaluations growing use and potentially high validity, research has yet developed a fundamental framework for analyzing the economic behavior of individuals as both evaluators (raters) and objects of evaluation (ratees) in an evaluation network. Our research aims to study the relationship between the agents behavior and the structure of peer evaluation network. Raters appraisals may weigh differently according to the evaluators positions in the network. We propose a two-stage game approach and analyze the equilibrium outcomes with two different allocation rules, Simple Weighted Allocation Rule (SWAR) and Myerson Weighted Allocation Rule (MWAR), under a variety of network structures. We have proven the existence and uniqueness of equilibrium effort. We also found that the number of a players neighbors may increase or decrease her equilibrium effort level, and some players may increase their equilibrium efforts but some may decrease when the game switches from SWAR to MWAR. The second part of our paper forces on the set of pair-wise stable networks. The evaluation network now becomes endogenous. We extend our previous setting and construct a three-stage game. Players first form an evaluation network, and then they choose their efforts and appraise others performance. Under the concept of pair-wise stability, we found that the complete network is the unique equilibrium outcome when the number of players is not large. However, there might be multiple pair-wise stable networks when the number of players is over a threshold. Finally, we extend our approach with several possible concepts, which includes costly connections and capacity of connections.

The generalised extreme-value (GEV) distribution is widely used for modelling and characterising extremes. It is a flexible 3-parameter distribution that combines three extreme-value distributions within a single framework: the Gumbel, Frechet and Weibull. Common methods used for estimating the GEV parameters are the method of maximum likelihood and the method of L-moments. In this paper we generalise a mixed maximum likelihood and L-moments estimation procedure proposed by Morrison and Smith (2002) and derive the asymptotic properties of the resulting estimates. Analytic expressions are given for the asymptotic covariance matrices in a number of important cases, including the estimators proposed by Morrison and Smith (2002). These expressions are verified by simulation and the efficiencies of the various estimators established. The asymptotic results are compared to those obtained for small samples, and the properties of the various estimators, including full maximum likelihood estimators and L-moment estimators, are considered. The corresponding quantile estimators are also assessed for accuracy and bias. Finally, these methods are applied to an analysis of Wellington maximum daily rainfall data, and graphical tools are developed, using simplified constraints for the support of the log-likelihood, which assist with the determination of the estimates in practice.
The recent literature on structural equations models has shown interest in Nagar (1959)'s bias-adjusted two stage least squares estimator and in the JIVE estimators of Angrist, Imbens and Krueger (1999). These are equivalent to the two stage least squares estimator under classical asymptotics, but in contrast to the two stage least squares estimator, they are consistent when the number of instruments grows as the same rate as the sample size. It is well known that partial identification in the sense of Phillips (1989) and Choi and Phillips (1992) may affect the distribution of the estimator of interest in fundamental ways. For example, Forchini (2005) shows that, for a fixed number of instruments, the asymptotic distribution the limited information maximum likelihood (LIML) estimator of both the identified and the unidentified structural parameters does not have integer moments. However, it is well known that the LIML is asymptotically normal when all the structural parameters are identified. This paper studies the Nagar's bias-adjusted two stage least squares estimator and in the JIVE estimator when the number of instruments is large under partial identification in the sense of Phillips (1989) and Choi and Phillips (1992).

Nesting yield curve shifts and rotations in a model of monetary policy shocks Edda Claus (presenter) MIAESR (The University of Melbourne), CAMA (Australian National University), and IIIS (Trinity College) Mardi Dungey CERF (University of Cambridge) and CAMA (Australian National University) February 2008 Abstract. In response to monetary policy shocks, the term structure generally shifts but sometimes rotates. This paper produces an empirically implementable model for nesting both responses. Estimates from data on the United States, Canada, Australia, and New Zealand, using latent factor models and identification through heteroskedasticity offer informational advantages over event studies. The results strongly support the hypothesis that differing term structure responses are reactions to different types of monetary policy shock, rather than differing reactions to the same policy shock. Model simulations produce results that closely resemble actual outcomes.

This paper develops an analytical model of contagion in financial networks, identifying both its probability and potential impact. We explore how contagion risk is influenced by aggregate and idiosyncratic shocks, changes in network structure, and asset market liquidity. Our findings suggest that financial systems exhibit a robust-yet-fragile tendency: while the probability of contagion may be very low, the effects could be extremely widespread should problems occur. The resilience of the system to large shocks in the past is also unlikely to provide a reliable guide to future contagion.
Paper ID: 5.3
Title of Paper: A Macroeconomic Foundation for the Nelson and Siegel Class of Yield Curve Models
Authors: Krippner L
Presenter: Krippner L
Abstract:
The parsimonious yield curve models of the Nelson and Siegel (1987) class have proven themselves popular tools for finance-related applications. Providing Nelson and Siegel (NS) models with a formal macroeconomic foundation would readily extend their application to the field of macro-finance, an important and growing literature that explores the interlinkages, relationships, and information in common between financial markets and economic variables. Hence, this article uses a multi-factor version of the Cox, Ingersoll and Ross (1985) continuous-time general-equilibrium economy to establish a theoretical macroeconomic framework for the augmented NS (ANS) model of the yield curve from Krippner (2006). The ANS model is an arbitrage-free and intertemporally-consistent version of the NS model, but maintains the desirable property of parsimoniously representing the yield curve at any point in time by just three variables; i.e the Level, Slope, and Bow coefficients. The framework establishes that the Level coefficient of the ANS model, which essentially represents the long-maturity level of the yield curve, corresponds to perceived steady-state inflation plus steady-state output growth within the underlying economy. The Slope and Bow coefficients of the ANS model, which essentially represent the shape of the yield curve, together correspond to the expected profile (i.e the timing and magnitude) of future inflation plus output growth relative to their steady state levels. A simple empirical test of the framework is undertaken using 51 years of United States data. Firstly, the ANS Level coefficient is compared to inflation plus potential output growth, and the anticipated cointegrating relationship is confirmed. Secondly, regressions of the appropriate combinations of the ANS Slope and Bow coefficients against one-year and two-year ahead output growth are found to be statistically significant. The theoretical framework and its empirical application suggest that quantitative estimates of macroeconomic parameters of interest to policy makers may be inferred from the yield curve in real time.

Paper ID: 6.1
Title of Paper: Identification of New Keynesian Phillips Curves from a Global Perspective
Authors: Dees S 1, Pesaran M 2, Smith L 3, Smith R 4
1 European Central Bank, 2 Cambridge University and USC, 3 Cambridge University, 4 Birkbeck College, London
Presenter: Smith L V
Abstract:
New Keynesian Phillips Curves (NKPC) have been extensively used in the analysis of monetary policy, but yet there are a number of issues of concern about how they are estimated and then related to the underlying macroeconomic theory. The first is whether such equations are identified. To check identification requires specifying the process for the forcing variables (typically the output gap) and solving the model for inflation in terms of the observables. In practice, the equation is estimated by GMM, relying on statistical criteria to choose instruments. This may result in failure of identification or weak instruments. Secondly, the NKPC is usually derived as a part of a DSGE model, solved by log-linearising around a steady state and the variables are then measured in terms of deviations from the steady state. In practice the steady states, e.g. for output, are usually estimated by some statistical procedure such as the Hodrick-Prescott (HP) filter that might not be appropriate. Thirdly, there are arguments that other variables, e.g. interest rates, foreign inflation and foreign output gaps should enter the Phillips curve. This paper examines these three issues and argues that all three benefit from a global perspective. The global perspective provides additional instruments to alleviate the weak instrument problem, yields a theoretically consistent measure of the steady state and provides a natural route for foreign inflation or output gap to enter the NKPC.
Paper ID: 6.2
Title of Paper: Two Geometric Representations of Confidence Intervals for Ratios of Linear Combinations of Regression Parameters: An Application to the NAIRU
Authors: Lye J, Hirschberg J
Economics, University of Melbourne
Presenter: Lye J
Abstract: Drawing inferences from the ratio of regression coefficients is elemental to a number of econometric applications. Although the Fieller Method for the construction of confidence intervals for ratios of normally distributed random variables has been shown to be a superior method to the delta method it is infrequently used. We propose that the non-intuitive way in which the Fieller Method is traditionally presented as the solution to a quadratic equation is partly to blame for its infrequent use. In particular, we feel that researchers do not have an intuition as to how the Fieller Method operates and how to interpret the non-finite intervals that it may produce. In this note we present two simple geometric representations of the Fieller interval and demonstrate how they can be used to interpret the estimation of the NAIRU.

Paper ID: 7.1
Title of Paper: Using Micro-data for the Assessment of Carbon Emissions in the New Zealand Manufacturing Industry
Authors: Brown-Santirso M, Fu N
Statistics New Zealand
Presenter: Brown-Santirso
Abstract: In the years leading to the Kyoto Protocol Commitment Period commencing on 1 Jan 2008, the New Zealand Government has put forward a number of proposals intended to help the country meet its international obligations. This has led to a number of studies being carried out which attempt to determine the overall effect of implementing these proposals to the economy, including flow on effects on consumption and investment patterns. Using unit record data from the Manufacturing Energy Use Survey (MEUS) carried out by Statistics New Zealand in 2006, this study adds to this body of knowledge by calculating energy related carbon emissions down to the company level for the March 2006 year. This study also makes use of the Annual Enterprise Survey (AES) unit record data to directly compare the intermediate consumption values for each enterprise against costs of carbon emissions at several carbon price scenarios ($15, $25, $50 and $100 dollars per tonne). Thus, the study generates an estimate of the added cost of production that arises from energy related carbon emissions for each enterprise. The results are an estimate of the economic burden that a carbon pricing system will place on the manufacturing industry through direct added costs from energy use. The study does not venture into expanding the estimates to indirect costs, costs to the rest of the economy, make any projections, or speculate about how carbon costs will be absorbed or managed by the manufacturing industry.

Paper ID: 7.2
Title of Paper: Greenhouse Gases and Nutrients: The Interactions Between Concurrent New Zealand Trading Systems
Authors: Kerr S, Lock K
Motu Economic and Public Policy Research
Presenter: Kerr S
Abstract: In this paper, we model one specific nutrient trading system, proposed for the Lake Rotorua catchment and the agricultural component of the New Zealand emissions trading system and explore how the two will interact with a particular emphasis on compliance obligations and mitigation options available under different monitoring options for each system, and alternative allocation methods. This draws on our extensive policy research and integrated modelling work in each system. Our theoretical analysis is supported with empirical examples from representative farms.
New Zealand has used individual transferable quotas (ITQs) as the core of its fishery management system since 1986. While New Zealand's world-leadership in ITQ management is widely acknowledged, its experiences with engaging ITQ owners in management are less well appreciated. For a period, the Ministry was actively encouraging quota owners to assume self-governance responsibilities. But industry interest was tepid. (The Ministry has now moved away from self-governance towards Ministry-led fish plans.) This paper suggests four explanations, drawn from transactions costs, to help explain why industry did not respond to the Ministry initiatives to broaden fisheries self governance. First, the model of unanimous agreement among quota-owners for self-governance was a high transactions cost governance structure. Second, government did not clearly define what elements of governance might be devolved and what elements must be retained by government. The risk that industry management might be overruled by government was not specified. Third, government may have expected too much from self-governance. Government may have implicitly expected self-governance to solve not only the pool fisheries externalities, but also the downstream externalities such as sea bird impacts. This may have implied very high transactions costs to negotiate with third parties, such as environmental groups. Fourth, the potential benefits of self-governance may have seemed low in relation to these high transactions costs. This experience suggests several ways that governments interested in devolved fisheries governance can reduce the barriers to self governance.
Determinants of Gender Inequality in Child Mortality in India: Does God(s) Matter?

Marie-Claire Robitaille
Ph.D. student
Department of Economics
University of Otago

Abstract:
Determinants of Gender Inequality in Child Mortality in India: Does God(s) matter? Marie-Claire Robitaille Ph.D. student Department of Economics University of Otago Boys and girls do not face the same risk of dying prematurely in India, given their biological differences. Using data from the 1998 Indian DHS, this paper examines the factors that may lead some parents to gender discriminate against their female child. The main focus is on religion as a potential explanatory factor. In this paper, gender inequality is proxied using five different variables: the probability of a child surviving until age one, two nutritional measures (height-for-age and weight-for-age) and two measures of access to health care (the number of vaccines received and if parents have sought treatment/advice for their children suffering from diarrhoea). These five dependent variables are explained using five main categories of explanatory variables: the economic system, the cultural system, religion, resource constraints and parents’ preferences for gender equality. Multivariate analysis, Blinder-Oaxaca decomposition techniques, survey design, OLS and Logit are different estimation techniques that are applied in the empirical analysis. This paper extends the existing literature by including a wide range of explanatory variables, notably some reflecting the cultural system, and by specifically focusing on the role of religion. Consistent with the theoretical discussion on religion, we do find some evidence of variation in gender inequality by religious affiliation, with Sikhism being the only religious group clearly discriminating against girls.

Medium and Long-term Participation in Microfinance: Evaluation Using Large Panel Data Set from Bangladesh

Islam A
Department of Economics, Monash University

Abstract:
This paper measures the impact of medium- and long-term participation in microfinance on different indicators of household welfare (such as self-employment income, other income, consumption expenditure and assets) using a large-scale microfinance program implemented in rural Bangladesh. We use four waves of a panel dataset of treatment and control groups of microfinance collected over a period of eight years. The survey encompasses about 3000 households from 91 villages and covers 13 different sizes of MFIs in Bangladesh. We consider a variety of approaches to estimate the program impact on participants. Estimates obtained from using different methods often yield different parameters of interests, and hence they are interpreted accordingly. In the estimation strategy, we first employ different panel data models, such as fixed effects and random growth models with and without time varying coefficients for participation in microfinance. Then, we use a Difference-in-Difference-in-Difference (DDD) approach. Estimation results suggest a substantively different conclusion about the impacts of relative gains in programs for different participants. The results provide invaluable insights about the impacts of the microfinance program in Bangladesh.
Paper ID: 9.1
Title of Paper: Unequal Wages for Equal Utilities
Authors: Cremer H ¹, Pestieau P ², Racionero M ³
¹ GREMAQ and IDEI, University of Toulouse, ² CREPP, University of Liege, CORE, PSE and CEPR, ³ School of Economics, The Australian National University
Presenter: Racionero M
Abstract:
In a society where individuals only differ in productivity the laissez-faire distribution of utilities is closely linked to that of productivity. From a utilitarian viewpoint the ideal distribution of productivity is the most equal one. Does this proposition still hold if one can redistribute income? We show that in this case the most unequal distribution of productivity is that which implies the most equal distribution of utilities in the first-best. In the second-best, this conclusion holds under some plausible conditions.

Paper ID: 9.2
Title of Paper: Midwifery in New Zealand: Government Policies, Provider Choice, and Health Outcomes
Authors: Kutinova A
University of Canterbury
Presenter: Kutinova A
Abstract:
In New Zealand, about 80% of deliveries are fully taken care of by a midwife. This is at least partly due to government policies of the 1990’s financially favouring midwives. Following a series of reforms, a lead maternity carer (LMC) system was introduced in 1996. Under this system, each pregnant woman receives a fixed-dollar voucher from the government and chooses an LMC for her pregnancy and delivery: a midwife, a general practitioner (GP), or a specialist. This paper investigates the health care labour market changes following the introduction of LMCs (using data from 1998-2004) and evaluates the impact on birth outcomes (in 2003-2006). Importantly, the data identifies the LMC at first registration, i.e., the carer selected at the beginning of pregnancy. This is analogous to the intent-to-treat approach and removes much of the non-random selection in provider choice. Any remaining endogeneity is addressed in instrumental variable analyses. The findings indicate that the reforms of the 1990s lead to an increase in the number of direct-entry midwives and a reduction in the number of GPs providing maternity care. Controlling for observable individual and regional characteristics, GPs have a significantly greater percentage of very low birth weight babies but a lower neonatal mortality rate. When selection of LMCs along unobservable characteristics is controlled for, the GPs’ detrimental effects disappear but the beneficial effects in terms of reduced neonatal deaths persist. Given New Zealand’s social, economic, and demographic characteristics, lessons learned from the local natural experiment are applicable far beyond the region.
Paper ID: 9.3
Title of Paper: Impact of Restaurant Smoking Bans on Smokers' and Nonsmokers' Demand for Restaurant Food
Authors: Kenkel D 1, Wang H 2
1 Cornell University & NBER, 2 Cornell University
Presenter: Kenkel D
Abstract: Many governments have either recently enacted or are considering bans on smoking in restaurants, making this one of the most active areas of tobacco control policy. In addition to their public health benefits, restaurant smoking bans might change the restaurant-food consumption patterns of smokers and nonsmokers. Little is known about the bans' impact on consumer behavior. We estimate an econometric model of the impact of restaurant smoking bans on the demand for restaurant food by smokers and non-smokers. We develop an empirical model of consumer demand for four goods: food consumed in restaurants that allow smoking; food consumed in smoke-free restaurants; cigarettes consumed in restaurants; and cigarettes consumed elsewhere. The model allows for common corner solutions where many consumers choose to not smoke and/or to not visit restaurants. We use data from multiple waves of the U.S. Simmons National Consumer Survey (NCS) and the U.S. Consumer Expenditure Survey (CES) from 2000 – 2004. The combined waves of the NCS provide measures on the number of visits to family and fast food restaurants for a sample of over 110,000 adults. The combined waves of the CES provide a measure of expenditures on food away from home for a nationally representative sample of over 37,000 households. We use geocode information to merge the individual-level NCS and CES data with data on restaurant smoking bans in the respondents' state and locality.

Paper ID: 10.1
Title of Paper: The Identification of Fiscal and Monetary Policy in a Structural VAR
Authors: Fry R 1, 2, Dungey M 2,1
1 CAMA, ANU, 2 CERF, University of Cambridge
Presenter: Fry R
Abstract: Jointly identifying the effects of both fiscal and monetary policy shocks in an open economy structural VAR poses identification challenges. The innovations in this paper are to combine the methods of identification via sign restrictions, cointegration and traditional exclusion restrictions within a system which explicitly accounts for both stationary and non-stationary variables. This incorporates the recent identification of permanent and temporary shocks by Pagan and Pesaran (2007). We show how to produce impulse responses and historical decompositions under these circumstances. The application is to the small open economy of New Zealand, where policy makers are actively considering the interaction between monetary and fiscal policies. The results show that over the last 20 years the influence of the fiscal policy stance on output has sometimes been substantial, and generally outweighs the contribution of monetary policy shocks.

Paper ID: 10.2
Title of Paper: Variable GST: A Tool for Monetary Policy in New Zealand?
Authors: Claus I 1, Sloan B 2
1 Inland Revenue, 2 Centre for Applied Macroeconomic Analysis
Presenter: Claus I
Abstract: This paper argues that a variable goods and services tax (GST) would unlikely be a useful stabilisation tool for monetary policy in New Zealand. It first discusses some of the problems that would arise with the implementation of a variable GST rate. It then develops a stylised model of the New Zealand economy to assess the effects of using a variable GST rate as a monetary policy tool relative to the conventional instrument, an interest rate. The results show that a variable GST rate would be less effective in dampening business cycles than an interest rate. It would lead to larger adjustments in the policy instrument and fluctuations in the real economy and inflation. Moreover, a variable GST rate would lead to greater welfare losses from monetary policy than an interest rate tool.
Paper ID: 11.1
Title of Paper: Forecasting Combination under Structural Break Uncertainty
Authors: Tian J
School of Economics, College of Business and Economics, the Australian National University
Presenter: Tian J
Abstract:
This paper examines some existing forecasting techniques that can be used when the forecasting model has possibly undergone structural changes at unknown points in time. We also propose two new forecast methods that are designed to account for structural changes. The proposed combination forecasts are evaluated using Monte Carlo techniques, and they outperform forecasts based on other methods that try to account for structural change, including average forecasts weighted by the past forecasting performance and techniques that first estimate a break point and then forecast using the post break data. An empirical application based on a NAIRU Phillips curve model for the United States indicates that it is possible to outperform the random walk forecasting models when we employ the forecasting methods to account for break uncertainty.

Paper ID: 11.2
Title of Paper: Forecasting with Weighted Smooth Transition Regression Models
Authors: Becker R, Osborn D
The University of Manchester
Presenter: Becker R
Abstract:
Smooth transition regressions (STR) have been successfully used to model nonlinear time-series, however, they only rarely deliver significant advantages when forecasting. This paper introduces a generalisation to STR that potentially addresses a shortcoming in the modelling cycle traditionally employed by researchers. Models with different transition variables (often different lags of the same economic variable) have proven to deliver almost identical forecasting performance, indicating that the choice of a particular lag for the transition variable may be suboptimal. Here we adopt a more flexible form of the transition variable in a STR model. By employing a beta function over the potential lags, our approach simplifies model specification because the only lag that needs to be specified for the transition function is the maximum lag that can enter this function. The use of the beta function (in the spirit of the MIDAS approach introduced by Ghysels, Santa-Clara and Valkanov, 2004) delivers a transition variable that is a weighted function of a range of past observations, which has the attractive implication that the current regime is defined as a smooth function of these observations over time. An extensive simulation study establishes that the misspecification of this transition variable may indeed be one of the causes for the poor forecasting performance of many applied STR models. The simulation study further reveals that achieved by modelling a nonlinear process with an appropriate nonlinear model can easily be negated by the need to estimate the relevant model parameters.

Paper ID: 11.3
Title of Paper: Constructing Historical Euro Area Data
Authors: Anderson H 1, Dungey M 2, Osborne D, Vahid F 3
1 School of Economics, ANU, 2 CFAP, University of Cambridge, 3 University of Manchester, 4 School of Economics, ANU
Presenter: Anderson H
Abstract:
Time series analysis for the Euro Area requires the availability of sufficiently long historical data series, but the appropriate construction methodology has received little attention. The benchmark dataset, developed by the European Central Bank for use in its Area Wide Model (AWM), is based on fixed-weight aggregation across countries with historically distinct monetary policies and financial markets of varying international importance. This paper proposes a new methodology, based on the historical distance from monetary integration between core and periphery countries, for producing back-dated monetary and financial series for the Euro Area. The impact of using the new methodology versus the AWM data is illustrated through a structural VAR analysis and estimates of an international DSGE model. An important advantage of the new methodology is that it can be applied to develop appropriate series as new member countries join the Euro Area.
Statistics New Zealand is interested in detection of structural breaks in its time series as these may indicate major changes in the survey population which could have effects on the consistency of its outputs over time. As part of its time series output Statistics New Zealand often not only provides the original time series but also a seasonally adjusted series and a trend estimate. To produce these outputs Statistics New Zealand uses the U.S. Bureau of the Census product X-12-ARIMA (X-12) to decompose the original series into a set of unobserved components; trend-cycle, seasonal, and irregular so it is important that structural breaks in any of these components be identified promptly and efficiently. We have used two alternate approaches to identifying multiple breaks, that of Bai and Perron (BP), and Atheoretical Regression Trees (ART). BP produces optimal solutions but at the cost of lengthy computation. ART uses regression trees which involves a non-parametric method for fitting piece-wise constant functions to a time series. The algorithm proceeds by recursively splitting the data into two subsets based on the response variable in right and left descendant nodes providing the highest reduction in deviance. We have examined both synthetic series and the monthly retail trade series. The performance of BP and ART very similar in terms of identifying breaks in the actual and trend component.

We consider an infinite horizon game between a hydroelectric power generator, and a thermal power generator. The Markov perfect equilibrium is characterized. This equilibrium differs from the typical in a number of ways. To begin, we consider a generalization of the steady state to a ‘steady cycle.’ The problems of a hydroelectric plant center around the variation in exogenous factors (demand, water inflow) from period to period. Hence, we fix a cycle of exogenous details, and look for a ‘steady cycle’ in which behavior is the same from cycle to cycle, but differs from period to period within a given cycle. Also, except for non-generic cases, at least one constraint must bind within the steady cycle. Further, we demonstrate how one might look at a single run of the exogenous cycle, and find a finite horizon equilibrium which mimics the behavior of the Markov perfect equilibrium. This involves not only the choice between open loop and closed loop equilibria, but also a choice of the start date.
This paper presents a laboratory collective resistance (CR) game to study how different forms of repeated interactions, with and without communication, can help coordinate subordinates' collective resistance against a “divide-and-conquer” transgression against their personal interests. In the one-shot laboratory CR game, a first-mover (the “leader”) decides whether to transgress against two responders. Successful transgression increases the payoff of the leader at the expense of the victim(s) of transgression. The two responders then simultaneously decide whether to challenge the leader. The subordinates face a coordination problem in that their challenge against the leader’s transgression will only succeed if both of them incur the cost to do so. The socially-efficient outcome without transgression can occur in equilibrium with standard money-maximizing preferences with both indefinite and finite repeated interactions, but this outcome is not an equilibrium with standard preferences when adding non-binding subordinate “cheap talk” communication in the one-shot game. Nevertheless, we find that communication (in the one-shot game) is at least as effective as repetition (with no communication) in reducing the transgression rate. Moreover, communication is better than repetition in coordinating resistance, because it makes it easier for subordinates to identify other “altruistic punishers” who are willing to incur the cost to punish a violation of social norms.

A decision scheme as defined by Gibbard (1977) is a function mapping profiles of strict preferences over a set of social alternatives to lotteries over the social alternatives. Motivated by conditions typically prevailing in elections with many voters, we say that a decision scheme is _weakly strategy-proof_ if it is never possible for a voter to increase expected utility (for some vNM utility function consistent with her true preferences) by misrepresenting her preferences when her belief about the preferences of other voters is generated by a model in which the other voters are i.i.d. draws from a distribution over possible preferences. We show that if there are at least three alternatives, a decision scheme is necessarily a random dictatorship if it is weakly strategy-proof, never assigns positive probability to Pareto dominated alternatives, and is anonymous in the sense of being unaffected by permutations of the components of the profile. This result is established in two settings: a) a model with a fixed set of voters; b) the Poisson voting model of Myerson.

The health care industry in some countries displays a gated structure. Rather than approaching a specialist directly, a patient will first seek a referral from a general practitioner. In this paper, we provide one possible explanation for such an industry structure. If the outcome of treatment depends on the effort exerted by the treating specialist, which is unobservable and unverifiable, then the market may fail to generate a Pareto optimal outcome. This is the standard moral hazard problem. If patients had a long-run relationship with specialists, this type of market failure might be avoided. However, in some cases, patients will only have a short-run relationship with specialists. The presence of general practitioners may provide an opportunity for reputation effects to apply in such a setting. By aggregating many potential consumers, general practitioners can create an artificial long-run relationship between a patient and a specialist. This long-run relationship reduces the incidence of shirking on the part of the specialist.
Paper ID: 13.2  
Title of Paper: The Evolution of Time Preference with Aggregate Uncertainty  
Authors: Robson A ¹, Samuelson L ²  
¹ Simon Fraser University, ² Yale University  
Presenter: Robson A  
Abstract:  
The Evolution of time preference with aggregate uncertainty by Arthur J. Robson, Simon Fraser University, Canada, and Larry Samuelson, Yale University, USA presented by Arthur Robson. We examine the evolutionary foundations of intertemporal preferences. When all the risk affecting survival and reproduction is idiosyncratic, evolution selects for agents who maximize the discounted sum of expected utility, discounting at the sum of the population growth rate and the mortality rate. Aggregate uncertainty concerning survival rates leads to discount rates that exceed the sum of population growth rate and death rate, and can push agents away from exponential discounting.

Paper ID: 13.3  
Title of Paper: Half Empty, Half Full and the Possibility of Agreeing to Disagree  
Authors: Zimper A  
University of Leicester  
Presenter: Zimper A  
Abstract:  
Aumann (1976) derives his famous we cannot agree to disagree result under the assumption of rational Bayesian learning. Motivated by psychological evidence against this assumption, we develop formal models of optimistically, resp. pessimistically, biased Bayesian learning within the framework of Choquet expected utility theory. As a key feature of our approach the posterior subjective beliefs do, in general, not converge to ‘true’ probabilities. Moreover, the posteriors of different people can converge to different beliefs even if these people receive the same information. As our main contribution we show that people may well agree to disagree if their Bayesian learning is psychologically biased in our sense. Remarkably, this finding holds regardless of whether people with identical priors apply the same psychologically biased Bayesian learning rule or not. A simple example about the possibility of ex-post trading in a financial asset illustrates our formal findings. Finally, our analysis settles a discussion in the no-trade literature (cf. Dow, Madrigal, and Werlang 1990, Halevy 1998) in that it clarifies that ex-post trade between agents with common priors and identical learning rules is only possible under asymmetric information.

Paper ID: 14.1  
Title of Paper: Efficient Semiparametric Detection of Changes in Trend  
Authors: Goh C  
University of Toronto  
Presenter: Goh C  
Abstract:  
This paper proposes a test for parameter variation in the context of a dynamic time-series model that is stationary about a deterministic trend function. The approach taken explicitly seeks an appropriately defined semiparametric power bound against contiguous alternatives to the null of parameter stability. This is done by deriving the efficient influence function of a least dispersed regular estimator of the total variation of the trend parameter under the assumptions imposed on the various components of the model. This derivation is then used in the construction of a Wald-type test for parameter variation based on an asymptotically linear estimator of the total variation functional whose influence function coincides with the efficient influence function. The utility of this testing procedure is illustrated in a simulation experiment and in an empirical example.
The information matrix test, introduced by White (1982), aims to test the significance of the discrepancy between the negative Hessian and the outer product of the score vector, where the lower triangular components of matrix of such differences are collected in a vector called the test vector. The information matrix test is well known as a general test for misspecification of a parametric likelihood. However, the use of information matrix test in applied econometrics is still limited because the actual size of the test derived according to asymptotic critical values often differs considerably from its nominal size. Horowitz (1994) proposed a bootstrapping procedure to obtain critical values and discussed the use of bootstrapping to overcome the incorrect-size problem in finite samples, where the variance-covariance matrix of the test vector was computed according to Lancaster (1984). This paper investigates the application of the multiple testing procedure, due to King, Zhang and Akram (2008), to the information matrix test, where the test is conducted through a two-stage simulation procedure, which combines a bootstrapping procedure to estimate the joint density of the test vector under the null hypothesis and a Monte Carlo procedure to derive p-values using the estimated density. To examine the size- and power-performance of the information matrix test based on this approach, we employed the Tobit model to simulate data. The proposed testing procedure is compared with the Lancaster’s (1984) version of information matrix test, whose critical values are approximated during the first-stage simulations. Moreover, we employed Horowitz’s (1994) bootstrapping procedure, in which the proposed test is compared with Lancaster’s (1984) version of information matrix test in terms of size- and power-performance. We find that both tests have approximately correct sizes, while the power of our test is higher than that of Lancaster’s version of information matrix test. Key words: bootstrapping, Hessian, multivariate kernel density, score vector, Tobit model.

Recently, a dramatic accumulation of foreign exchange reserves has been widely observed among developing countries. The purpose of this paper is to explore what long-run impacts accumulated foreign reserves have on macro variables in developing countries. In the first part, we analyze a simple open economy model where increased foreign reserves reduce costs of liquidity risk. Given the amount of foreign reserves, the utility-maximizing representative agents decide consumption, capital stock, and labor input as well as the amounts of liquid and illiquid external debts. The equilibrium values of these macro variables depend on the amount of foreign reserves. When the government increases its foreign reserves, not only liquid debt but also total debt increases, while the debt maturity becomes shorter. To the extent that interest rates of foreign reserve are low, the increased foreign reserves also lead to permanent decline of consumption. However, when the tradable sector is capital intensive, the increased foreign reserves may enhance investment and economic growth. In the second part, we show several empirical supports to the theoretical implications. We provide several supportive evidences by using the panel data of the Penn World Table. The cross-country evidence shows that increased foreign reserves make external debt outstanding larger and debt maturity shorter. It also implies that increased foreign reserves lead to a decline of consumption but can enhance investment and economic growth. The positive impact on economic growth, however, disappears when we control the impact through investment.
Abstract:
The effects of surprises on the spot exchange rate and interest rates have been well documented. However, the relative size of these effects, and hence the effect of surprises on forward exchange rates, have been neglected. We examine the relative size of the effects of New Zealand monetary policy and macroeconomic data surprises on the spot exchange rate, 2 and 5 year swap rate differentials, and the synthetic forward exchange rate schedule. We find that the spot exchange rate and 5 year swap rates respond by a similar magnitude to monetary surprises, implying there is little response of the forward exchange rate to this type of news. In contrast, the spot exchange rate responds by nearly three times as much as 5 year interest rates to CPI and GDP surprises, implying that forward rates appreciate to higher than expected CPI or GDP news. This is in contrast to standard theoretical models and US evidence. Lastly, we show that exchange rates by not interest rates respond to current account news. The implications of these results for monetary policy are considered.

Paper ID: 16.1
Title of Paper: The Long-Run Determinants of UK Wages, 1860–2004
Authors: Hendry D, Castle J
Oxford University
Presenter: Hendry D
Abstract:
As it is 50 years since the publication of the Phillips curve, we analyze an historical time series on UK wages and their determinants. Huge changes have occurred over this long run, so congruence is hard to establish: real wages have risen more than 6 fold, and nominal 500 times; laws, technology, wealth distribution, and social structure are all unrecognizably different from 1860. We investigate wage rates and weekly earnings, and real versus nominal wages. The model of price inflation developed earlier by the second author considered a plethora of economic theories for its determining variables: none was individually sufficient and almost all contributed. Historical contingencies, primarily major wars and oil crises, played a major role additional to economic influences. Since the Phillips curve breakdown sparked a large empirical literature, an eclectic approach was adopted here for wages, with a range of possible influences, including Phillips' non-linear response to unemployment; measures of excess demand, where workers react non-linearly to inflation when it rises; and structural breaks over 1860-2004: `trade union power’ and unemployment benefits do not play a major role. Autometrics was used to select a parsimonious representation from a highly over-parameterized initial general model, with more variables than observations when impulse indicators were included. The selected model of real-wage inflation explains much of the movement over almost a century and a half, finds considerable co-breaking between wage and price inflation shocks, and provides good 1-step forecasts of real wage inflation over the last 14 years of `moderation'.
This paper empirically analyses whether countries with higher levels of social institutions, a concept we argue is closely lined to social capital, perform better environmentally. Although there is a substantial literature on the effects of social capital on the environment using community level data, previous empirical work on the effects of social capital on measures of environmental outcomes across countries has been limited by data on social capital only being available for a relatively small number of countries. This paper makes use of a new World Bank data set, measuring different dimensions of social institutions for a much larger number of countries, to analyse the relationship between social capital and the environment across countries.

Our empirical model analyses the effect of different features of social institutions on the Environmental Sustainability Index (ESI), a composite index of environmental measures compiled by the Center for International Earth Science Information Network (CIESIN) at Columbia University in collaboration with the World Economic Forum. Our empirical results suggest that some aspects of social institutions (especially the extent of civic engagement and gender inclusiveness) are positively correlated with the ESI. Population density is found to be negatively correlated with environmental performance, whereas the level of democracy is generally positively correlated with environmental performance. Income per capita and the relative size of the industrial sector are generally insignificant.

Although an estimated US$6 billion is invested annually in our planet’s biological diversity, little research has been conducted on which conservation treatments work best or provide best value for money. Conserving biodiversity efficiently depends on identifying those conservation treatments which provide greatest return on investment. Where controlled experiments are not possible, panel econometric techniques can be used to determine the effectiveness of conservation treatments. We use a long-running yellow-eyed penguin (Megadyptes antipodes) nest count in New Zealand to compare the effectiveness and cost effectiveness of three commonly used endangered species restoration treatments—trapping of introduced predators, revegetation, and intensive management. Following ecological theory, we specify a density-dependent population growth rate. We control for year effects and site characteristics such as land cover, slope, and elevation. We confront the possibility of selection bias in treatment with site fixed effects and with an instrumental variable based on site accessibility. Of the three treatments that we analyze, only intensive management is significantly correlated with increases in annual site-level penguin population growth rate. We estimate that intensive management increased the yellow-eyed penguin population by 9% from the counterfactual, and that the marginal cost of restoring the yellow-eyed penguin population through intensive management is NZ$68,600 per nest.
The World Bank has provided estimates of total wealth and its major subcategories for a large group of countries in 2000. Total wealth has been interpreted by some to be a measure of social welfare and the object of the sustainable development paradigm. This paper contributes to the debate about the relative merits of subjective versus objective well-being measures in the context of sustainable development. Using scatter diagrams, correlations and regression analysis, it explores bivariate relationships between the wealth estimates and a widely reported measure of average subjective well-being (SWB) or 'happiness'. For comparative purposes, correlations between GNI per capita and the wealth estimates are also reported. The cross-country wealth-happiness relationship is very similar to the income-happiness relationship. However, differences emerge for wealth subcategories. First, the high correlation between total wealth and GNI per capita is mostly due to produced capital and, to a lesser extent, intangible capital, but not to natural capital. This raises doubts about the appropriateness of total wealth as a well-being measure in the context of sustainable development. Secondly, SWB is more highly correlated with intangible capital than produced capital, and least with natural capital. Thirdly, when the most natural capital intensive countries are excluded as outliers, the relationship between SWB and natural capital becomes much stronger. This is especially noticeable for high income countries. Therefore, putting more emphasis on SWB in the context of sustainable development should shift attention further toward natural capital, but lessen the relative importance of produced capital.

This study attempted to segment the festival market using a cluster based on delineated perception of relationship marketing factors who attended the 2006 Yi-Lan Green Expo in Taiwan. This study also used the travel cost method (TCM) to estimate the festival demand function, and investigated the relationships between relationship marketing clusters and recreational demand. Finally, this study compared the Truncated Poisson (TPOIS), Truncated Negative Binomial (TNB), and On-Site Poisson count data models to estimate tourist trip demand using maximum likelihood estimation (MLE). This study obtained three main empirical results. First, this study can reduce truncated and endogenous stratification by using On-Site Poisson recreational model in festival. Second, relationship marketing clusters has a significant differential in festival recreational demand models. Third, the mean CS (Consumer Surplus) values range from $266.69 to $295.99 per trip for the 2006 Yi-Lan Green Expo in Taiwan.
The one-child policy implemented since the late 1970s has decelerated the growth of China's working age population since the 1990s. From 2015, this growth will turn sharply negative, resulting in a declining labour force in China. This has caused concerns over the long-term prospects of China's economic growth. China is at a crossroad regarding its policy directions. Should China relax its one-child policy? This paper sheds light on the view that a more efficient allocation of labour between sectors is likely to be a better option than an increased fertility rate - the latter leads to a lower per capita income. Using a dynamic CGE model of China, we analyse the effects of removing labour market distortions that hinder the movement of labour from agricultural to manufacturing and services sectors. By removing the discriminations against rural workers in urban areas, China can enjoy continued growth in its manufactured exports even with a slower growth in its labour force. The positive growth effects of facilitating the movement of labour from agricultural to other sectors will help to mitigate the negative effects of the declining labour force on China's economic growth.

Despite great success in reducing poverty, China still has over 100 million rural poor living in remote, mountainous, low rainfall environments. Many of these pockets of poverty are disguised with province-level data that most poverty analysis relies upon. Geographic targeting could be efficient but is difficult since household survey samples in China are too small to reliably estimate poverty at sub-provincial levels. Small area estimation in other developing countries combines the detailed information from household surveys with the more extensive coverage of census data. The survey data allow models of consumption to be fitted, with the explanatory variables restricted to those available from a recent census. Estimated coefficients are applied to census data, and consumption and the risk of poverty are predicted for each census household. Weighted totals of the predicted poverty probabilities can then be estimated very precisely for small geographic areas. These applications, however, typically neglect environmental components that may have important links with poverty and are not yet used in China. To bridge these gaps in existing research, we use census and household survey data, as well as environmental variables derived from high resolution satellite imagery to construct poverty maps for rural Shaanxi province in China. We construct and compare two poverty maps: one with and one without environmental variables. These maps let us assess how much leakage and under-coverage results when environmental variables are ignored by poverty maps.
Estimation of Firm Level Energy Efficiency in China’s Energy Sector

Hu B
Lincoln University

Abstract:
This paper considers estimation of energy efficiency in China’s energy sector when firm-level data are available. The energy efficiency was studied by measuring efficiency in firms’ uses of three fuels, namely, coal, electricity and other fuels which include crude oil, diesel, etc. The fuel (in)efficiency is defined in the framework of stochastic production, factor demand and cost frontiers in Schmidt and Lovell (1979), which suggests technical and allocative inefficiencies are the sources of factor use inefficiency. The sample firms were made up of coal mines, refineries and electricity generators over the period 2000-2005. The analysis began by describing the production process with a translog production function, which is considered flexible in reflecting the underlying production technology. The price of pursuing such flexibility is that the efficiency in the fuel consumption cannot be evaluated analytically. Therefore, the numerical procedure proposed by Kumbhakar and Wang (2006) is followed. Observation-specific fuel efficiency estimates are obtained and are studied for each of the three types of firm. In general, the evidence regarding energy efficiency is not overwhelming either way. It was found that the efficiency in coal use decreased over the period. The efficiencies in using electricity and other fuels were decreasing in the coal-mining and refinery firms, whereas the electricity generators experienced an increasing in the efficiency of using the two fuels. The existence of allocative inefficiency seemed caused by firms’ over- or under-using fuels to address fuel efficiency. The paper also considers a scenario where reported fuel consumption data are a discount of the true fuel consumption. A numerical procedure is adopted to study fuel efficiencies and to evaluate how they are affected by technical and allocative inefficiencies.

Poverty Traps and Marriage Penalties in New Zealand’s Tax-Benefit Interface

Nolan P
NZIER

Abstract:
All major political parties will go into New Zealand’s 2008 General Election advocating personal income tax reform. Many of these personal income tax proposals will be accompanied by proposals for reform to other income transfer programmes (the Working for Families Tax Credits, the Unemployment and Domestic Purposes Benefits, the Accommodation Supplement, and Student Loans). Yet in spite of this ongoing interest in tax-benefit reform there has recently been only limited independent economic research on the tax-benefit interface in New Zealand.

To help address this gap in the evidence base this paper provides a benchmark against which tax-benefit proposals could be evaluated. This paper estimates the incidence and scale of poverty traps and marriage penalties contained in the 2007-08 system. These financial incentives have implications for a wide range of policy issues, including the labour supply of primary and secondary earners, the demand for childcare assistance, and the formation and stability of family structures.
The 1999 reforms of the Korea National Pension Scheme resulted in a very unique situation in which those who are insured by the pension scheme and those who are not coexist. Exploiting this situation, this paper evaluates the effect of public pension on private savings comparing outcomes of two groups without estimating expected pension wealth. Instead of using the standard Difference-in-Difference estimator, this paper uses the Changes-in-Changes estimator by Athey and Imbens (2006) in order to accommodate treatment effect heterogeneity. The estimation results show that the mean effect of pension is close to zero. Households with low or very high saving rates were little affected, while for the households with around mean saving rates the introduction of public pension reduced private wealth by about 25 percentages.

International research has shown that there are large regional differences in the uptake of social security benefits, but formal econometric modelling of this spatial variation has to date been relatively limited (McVicar, Regional Studies, 2006). Particularly in peripheral regions, job creation may not offer opportunities for older and less mobile workers. The present paper analyses the determinants of regional benefit usage by category (primarily unemployment, sickness, incapacity and single parents caring for dependent children) in New Zealand using a panel of data drawn from the 5 yearly Census of Population and Dwellings aggregated to 58 functionally defined local labour market areas (LMAs). Three waves of census data are considered (1996, 2001 and 2006), with 1991 data used where lagged variables are required. The theoretical framework that drives the specification of the panel model takes account of changes in the level and structure of the demand for labour, the composition of the labour force (age and occupational structure, the incidence of poverty and health indicators such as the incidence of smoking), benefit replacement rates and changes in eligibility rules. This framework builds on, for example, research by Beatty, Fothergill and Macmillan in the UK and by Bartik in the US. However, there can be both spatial heterogeneity and spatial dependence in the models of regional social security uptake. Hence, besides estimation of global parameters of reduced form equations, the paper considers geographically weighted regression (GWR) methods to explore geographic parameter variation (spatial heterogeneity). Issues of spatial spillovers in social security benefit uptake are addressed with models of spatial dependence. Specifically, these are the panel versions of spatially lagged dependent variable models and spatial autocorrelation models.
Paper ID: 19.4
Title of Paper: Teenage Mothers' Income Support, Education and Paid Work: The Dynamics of Welfare Participation
Authors: Jeon S, Kalb G, Vu H
University of Melbourne
Presenter: Kalb G
Abstract:
The main objective of the paper is to investigate whether the factors that influence welfare participation of women who experienced teenage motherhood differ from the factors that influence welfare participation of mothers in general. In addition, we examine to what extent observed persistence in welfare participation can be attributed to state dependence or to unobserved heterogeneity. The analysis in this paper is based on the Household, Income and Labour Dynamics in Australia (HILDA) Survey. The multivariate analysis of welfare participation uses dynamic random effects probit modelling, in which the panel data features of the HILDA data are fully taken into account. We compare the results from a panel approach dealing with the initial conditions problem with the results of a more simple pooled probit analysis, which does not take the panel feature of the data into account.

Paper ID: 20.1
Title of Paper: Monopolistic Banks and Fixed Rate Contracts: Implications for Open Economy Inflation Targeting
Authors: Benes J, Lees K
Reserve Bank of New Zealand
Presenter: Lees K
Abstract:
We investigate the implications of a key feature of mortgage markets for optimal policy for open economy inflation targeters. We show that the existence of fixed mortgage contracts shifts the transmission of monetary policy away from the standard interest rate transmission channel towards direct and indirect exchange rate channels. To quantify the impact of these effects on open economy inflation targeting, we calibrate our DSGE model to the case of New Zealand and solve for optimal time-consistent policy. New Zealand is the earliest explicit inflation targeter and proves a useful test case since many of the institutional features of mortgage markets are shared with other countries and the strength of the global boom in housing has been at least as strong as other countries. We show that optimal time-consistent policy is about ten percent less effective under fixed compared to flexible mortgage contracts. In addition, we show that the ineffectiveness of policy under fixed contracts is a decreasing function of the weight placed on a measure of output stabilisation but increasing the weight placed on interest rate smoothing does not mitigate the ineffectiveness of policy under fixed contracts.
We study macroeconomic stabilization cast as a Bayesian decision problem of simultaneous estimation and control of a simple first-order autoregressive process with unknown policy impact and persistence parameters. Anticipation of posterior revisions makes beliefs a part of the state vector, inducing a trade off between exploration and exploitation. Imperfect information dynamic programs such as this are hard because Bayesian law is nonlinear, state dimension is high, value function need not be convex and the policy function need not be continuous. First, we characterize the optimal solution that allows the decision-maker to actively experiment in order to sharpen future beliefs. Our numerical results indicate substantial degree of experimentation. Optimal policy is often discontinuous and irregularly shaped. We identify state space regions where experimentation motive dominates stabilization and visa versa, and explore sensitivity to the model parameters. Second, we contrast the optimal policy against an ensemble of suboptimal alternatives, in hope of identifying key features that could form an arsenal of good rules of thumb to attack higher dimensional problems where dynamic programming is not yet feasible. Our ensemble of approximate solutions includes myopic, certainty equivalent, anticipated utility, limited look ahead policies and assorted hybridizations and modifications, including methods for the actively adaptive prediction of posterior variance. We conclude that aligning the degree of experimentation with that of the optimal policy is essential for good performance of suboptimal approximation.

In this paper, we examine whether certain predictions of general models of optimal monetary policy are satisfied for Canadian data during the period of inflation targeting by the Bank of Canada. One objective is to see whether the theories of optimal monetary policy describe actual policy behaviour. Were this to be true, then these models are arguably useful tools for analysis. A further objective is to explore how policy behaviour departs from predicted optimal behaviour, which may provide information as to how monetary policy might be improved. A particular focus in this regard is the horizon over which central banks choose to target inflation. Central banks often couch inflation targets in terms of the medium term, say 4-8 quarters. Theory suggests that optimal policy should be as focused on the nearer term. Models of optimal monetary policy give rise to conditions, over time different horizons, on the conditionally expected path of variables of interest, such as inflation and the output gap, that can be directly estimated. These paths have a very natural interpretation: the central bank operates its policy instrument to ensure that a weighted-average of target variables is consistent with its policy target. The weights on different target variables and the target itself are constant, according to theory, across different horizons. Once estimated, we test whether the conditions are generally valid - a specification test for optimal monetary policy. More specifically, we can test whether inflation weights and targets are constant over different horizons. Preliminary results for Canada suggest that parameter constancy is an issue and that only at longer horizons, 18-24 months, do the conditions of optimal monetary policy hold.
Paper ID: 21.1
Title of Paper: A New Test in Parametric Linear Models with Nonparametric Autoregressive Errors
Authors: Gao J 1, King M 2
1 The University of Adelaide, 2 Monash University
Presenter: Gao J
Abstract: This paper considers a class of parametric models with nonparametric autoregressive errors. A new test is proposed and studied to deal with the parametric specification of the nonparametric autoregressive errors with either stationarity or nonstationarity. Such a test procedure is initially avoid misspecification through the need to parametrically specify the form of the errors. In other words, we propose estimating the form of the errors and testing for stationarity or nonstationarity simultaneously. We establish asymptotic distributions of the proposed test. Both the setting and the results differ from earlier work on testing for unit roots in parametric time series regression. We provide both simulated and real-data examples to show that the proposed nonparametric unit-root test works in practice.

Paper ID: 21.2
Title of Paper: Testing For Uncorrelated Errors in ARMA Models
Authors: Nankervis J 1, Savin G 2
1 University of Essex, 2 University of Iowa
Presenter: Nankervis J
Abstract: A problem of interest in economic and finance applications is testing that ARMA errors are uncorrelated under weak assumptions, namely assumptions where the errors are neither iid nor a martingale difference. In this paper, the tests of serial correlation introduced by Andrews and Ploberger (1996, hereafter AP) are modified so that they can be used for testing ARMA errors under weak assumptions. The motivation for considering the original AP tests is that they are consistent against all non-white noise alternatives, have good all-round power against nonseasonal alternatives compared to several widely used tests in the literature, including those of Box and Pierce (1960, hereafter BP) and Ljung and Box (1978, hereafter LB) tests and do not require the setting of a maximum order of autocorrelation coefficient. The natural competitors to the modified AP tests are the modified BP and LP tests proposed by Francq, Roy and Zakoian (2005) and Hong and Lee (2007). The modified AP tests and the modified BP and LB tests are asymptotically valid under the same set of weak assumptions. In our Monte Carlo experiments we consider ARMA with GARCH, EGARCH and nonlinear MDS innovations. We find that the modified AP tests generally have better power than the modified LB tests and the HL tests, which suggests that the power advantage of the original AP tests extends to the more general framework considered in this paper.

Paper ID: 21.3
Title of Paper: A Simple Hybrid Bootstrap Test for Predictive Ability Based on Autoregressions
Authors: Kuo B 1, Tsong C 2, Lee C 3
1 Dept Int'l Business, Nat'l Chengchi University, 2 Dept Economics, National Chinan University, 3 Dept Business Administration, National Kaohsiung University of Applied Sciences
Presenter: Kuo B
Abstract: It has been by far well-documented that the extant tests for predictive ability suffer from size distortions. It results from the sensitivity of the tests to the choice of kernel functions in the estimation of the long-run variance. This paper proposes a bootstrap testing procedure using autoregression to overcome this problem. The regression approach transforms testing for the null of equal predictive ability into testing for an zero intercept in the estimated autoregression, which is easy to implement. To respectively account for autocorrelation and to retain heteroskedasticity of unknown from in forecast errors, the proposed resampling scheme combines both autoregressive sieve and wild bootstraps. We establish the bootstrap consistency by showing that the suggested test and the asymptotic counterpart have the same normality limit in distributions. Simulations revealed that our bootstrap testing procedure has a robust size performance to correlated forecast errors with conditional variance of GARCH or SV, in contrast to the existing tests adopting a moving block bootstrap.
Directional derivative, that is, a positive slope to the utility function. There will generally be a set of such tariff reform directions. We formulate the locally optimal tariff reform problem as one of choosing the best direction, as measured by the directional derivative. We show that the locally optimal, or steepest ascent, tariff reform is one that has a direction of change proportional to the gradient of the indirect utility function with respect to the tariff vector. Having derived the best possible differential reform, we can then proceed by ranking other well known reform rules in terms of the welfare gain that they yield - a feature that has not hitherto been exploited in the literature. This ranking is of course undertaken with respect to the best practice, viz. our SATR. Thus, while previously reforms have been chosen on the basis of, e.g., the informational requirements that they involved (undoubtedly, an important element), it is now possible to also base the choice of a reform rule on its efficiency properties. Accordingly, this provides an improvement in the information set that policy makers have before choosing a particular policy reform. While the concept of a steepest ascent tariff reform has not previously appeared in the literature (to our knowledge), it is closely related to, and inspired by, the concept of an optimal tax perturbation introduced into the tax reform literature by Diewert (1978, p.152). In a similar vein to our reform concept, Tirole and Guesnerie (1981) make use of a related gradient projection tax reform in a closed economy with many consumers and a social welfare function, but they do not compare reforms as is done here. The idea of locally optimal tax changes is also behind Weymark's (1981) concept of undominated directions of tax reform but he does not make use of a steepest ascent tax reform. Our steepest ascent tariff reform concept is used in the paper to develop new results in the theory of tariff reform. First, we characterize the steepest ascent tariff reform and develop some of its properties. We show that the reform can be made operational provided information is available on the net substitution matrix for the economy at the initial equilibrium as well as the initial tariffs. Increasingly, detailed empirical estimations and computable general equilibrium models are coming available for many countries thus making the concept of practical as well as theoretical interest. Second, we provide a characterization of the sources of the potential welfare gains in terms of measures of the level and dispersion of initial tariff rates, viz. the generalized average tariff and the generalized variance of tariffs. The greater is the generalized average tariff rate, or the greater is the generalized variance of tariffs, the greater is the potential increase in welfare from tariff reforms. These generalized mean and variance measures of the distortions differ from, but are inspired by, measures of the same name recently proposed by Anderson and Neary (2007). Third, by comparing the results of applying SATR to the cases where all tariff rates are subject to the reform and where only the tariffs on non-numeraire goods are permitted to be reformed, we establish that the latter involves a welfare loss compared to the former reform. That is, if we restrict attention to differential tariff reforms, it matters a great deal as to whether the tariff reform is applied to the tariff of all goods or only to those of non-numeraire goods. This may appear at first glance to contradict the well-known result that homogeneity considerations allow the equivalent analyses of tariffs on either all or non-numeraire goods, but this is not the case as will be demonstrated below. Fourth, we undertake a comparison of the proportional, univariate and steepest ascent tariff reforms. We establish several results concerning this comparison. In particular, we characterize the conditions under which the proportional tariff reform and the univariate tariff reform are locally optimal. We also provide a geometric illustration of these reforms and show that the more acute the angle between a reform and the steepest ascent tariff reform, the greater will be its welfare efficiency. In doing this, we develop a new index that measures the welfare effectiveness of any tariff reform. A numerical example provides concrete measures of the relative efficiency of the proportional and univariate reforms in raising welfare. In our concluding remarks, we provide a discussion on the role of our steepest ascent reform concept in a broader policy context and on potential extensions. In doing so, we argue that our methodology can be used with any objective function and any policy instruments, and we provide several examples for future work.
Balance of payments crises and banking crises are commonplace in developing countries. Often they feed off one another, creating dramatic swings in the real exchange rate, real interest rates, and expectations about regime sustainability. We quantify the effects of these crises on industrial sector productivity distributions, size distributions and borrowing patterns. To do so, we first develop an industrial evolution model in which capital market imperfections link firms’ ability to borrow and the wealth of their owners. This model is estimated using firm level panel data and macro data from Colombia that span the debt-crisis period of the 1980s. Finally, using the estimated parameters, we simulate industrial evolution patterns under alternative assumptions about the stochastic processes for exchange rates and interest rates. Among other things, we find that increases in macroeconomic volatility reduce average productivity through selection effects. These effects are particularly dramatic in the immediate aftermath of a shift from a stable regime to a volatile regime because heightened uncertainty creates greater incentives for large, poorly-performing firms to delay exit in the hope that things will improve. We also find that improvements in the efficiency of loan contract enforcement lead to more borrowing, larger firms, more entrepreneurship among households with modest wealth, and a more egalitarian distribution of income.

Revisiting Kindness and Confusion in Public Goods Experiments: A Note. Ralph-Bayer, Eike Renner & Rupert Sausgruber. We present a novel experiment to evaluate the role of confusion in explaining the dynamics of contributions in public goods experiments. In a learning condition we keep the subjects confused by withholding the information that would be necessary for them to understand the game. The comparison of the results with those of a standard public goods treatment provides a lower bound for the influence of confusion on contribution dynamics. We find that learning in the state of confusion explains 41 percent of the contribution dynamics in the standard public goods game. This result complements that of Houser and Kurzban (2002) who found that all of the decrease in contributions can be attributed to the reduction of confusion. We argue that their findings can be seen as an upper bound for the influence of confusion. We also show that the contribution dynamics in the learning condition are well explained by a simple reinforcement-learning model, while the same model fails to predict the contribution behaviour in a standard public goods game. In a regression analysis, where we regress contributions on past average contributions of group members, we find a positive relationship in the standard public goods game only. This shows that negative reciprocity has a strong influence on the decay of contribution, as simple reinforcement learning can be excluded as the factor causing this kind of dynamics.
Paper ID: 23.2
Title of Paper: Relational Contracts and Exogenous Revenue Shocks: An Experimental Study
Authors: Du N ¹, Servatka M ²
  ¹ SHUFE, ² University of Canterbury
Presenter: Servatka M
Abstract:
The central premise of the paper is that the negative shocks disrupt long-term relationships between two transacting parties (employer-worker or buyer-seller) despite the fact that staying in a relationship dominates the outside option. In such case, the efficiency-wages theory predicts that shocks should not matter, as given higher than equilibrium level of wages the worker exerts high level of effort whether it is because of reciprocity (the fair wage-effort version by Akerlof (1982, 1984), Akerlof and Yellen (1990) supported by experimental evidence of Fehr, Kirchsteiger, and Riedl (1993, 1998)) or because the threat of losing a stream of income is sufficient to induce him to work hard (the shirking version by Gintis (1976), Stoft (1982), Shapiro and Stiglitz (1984), Bowles (1985), Fehr (1984, 1986), MacLeod and Malcomson (1989, 1993, 1998), Malcomson (1999)). We study this conjecture in a laboratory experiment which is carefully designed to give subjects an opportunity to form and sustain relationships (similar to Brown, Falk, and Fehr (2004)) in a non-stationary environment. We implement two experimental conditions, one in which shocks to marginal revenue product occur and the other in which the marginal revenue product is constant. In both conditions the identities of transacting parties are observable and thus allow for reputation building. Our objective is to shed more light on the increased complexity of decisions of market participants given the repeated interactions while increasing the proximity to market conditions. The experimental data provide evidence that once the shocks occur, firms do not absorb them, but rather lower the wages. This causes many relationships to break down. The workers who accept a lower wage respond with exerting a lower effort. We do not find support for downward wage rigidity in our setting.

Paper ID: 23.3
Title of Paper: Credence Goods Markets: An Experimental Analysis
Authors: Dulleck U ¹, Kerschbamer R ², Sutter M ²
  ¹ QUT, ² University of Innsbruck
Presenter: Dulleck U
Abstract:
Credence goods markets suffer from informational asymmetries between sellers and customers, because customers cannot observe the quality they need and whether they have received it, whereas sellers can do so. Undertreatment and overcharging are the main causes of inefficiencies in credence goods markets. We examine behavior on such markets in a large-scale experiment with 936 participants. We show that liability is of crucial importance for efficiency, whereas observability has only a minor impact. Sellers’ reputation does not increase efficiency if either liability or observability is given. Competition is a major force that drives down prices, and yields almost full efficiency if liability is also given. We discuss several policy implications of our findings.

Paper ID: 24.1
Authors: Satchell S ¹, Thorp S ²
  ¹ University of Cambridge, ² University of Technology, Sydney
Presenter: Thorp S
Abstract:
Individuals, endowments and families face uncertain lifetimes. When the planning horizon of an entity is stochastic and Pareto distributed, discounting will be hyperbolic and the consumption policy will be time-varying even when decision makers do not intrinsically prefer short-term gratification. Spending plans are time-consistent for CRRA trusts, but may be revised on the arrival of new information. We derive expressions for the optimal rate of consumption (draw-down) from wealth for family trusts facing positive probabilities of extinction at each generation. Using birth statistics for the UK, we compute family extinction probabilities for a single branch and show that they are well-approximated by a Pareto distribution, hence family trusts will discount hyperbolically. Numerically optimised consumption paths for family trusts with CRRA preferences are decreasing but always higher than for infinitely-lived trusts.
**Paper ID:** 24.2  
**Title of Paper:** Behavioural Scenarios for Derivative Pricing in Incomplete Markets: A Dynamical Systems Approach  
**Authors:** Lambros B 1, Pinheiro D 2, Pinto A 3, Xanthopoulos S 4, Yannacopoulos A 5  
1 University of the Aegean, Greece, 2 University of Porto, Portugal, 3 University of Minho, Portugal, 4 University of the Aegean, Greece, 5 Athens University of Economics and Business, Greece  
**Presenter:** Pinto A  
**Abstract:** We study the problem of determination of asset prices in an incomplete market proposing three different but related scenarios. One scenario uses a market game approach whereas the other two are based on risk sharing or regret minimizing considerations. Dynamical schemes modeling the convergence of the buyer’s and of the seller’s prices to a unique price are proposed.

**Paper ID:** 24.3  
**Title of Paper:** Value-at-Risk Evaluations in Malaysian Stock Exchange: Heavy-Tailed and Long-Memory-ARCH Approaches  
**Authors:** Chin W  
**Presenter:** Chin W  
**Abstract:** This study focused on the Kuala Lumpur Stock Exchange (KLSE) indices which consisted of composite index (CI) and finance (FIN) index. As an emerging stock market, the KLSE has received great attentions (Cajueiro and Tabak,2005;Chin et al.,2007) from researchers and investors as the source of case studies and potential investment alternatives. In this research, the VaR is evaluated by long-memory ARCH-type (Baillie et.al.,1996) models and quantile estimation using Pareto distribution (Chin et al.,2008). Even though the ARCH-type student-t model is able to capture the heavy-tailed property, but it failed to take into account the asymmetric behaviour at the end for both tails. Our empirical results evidenced that the Pareto distribution estimation provided a convenient framework for asymmetric properties for both the lower and upper tails. This finding is important because the tail behaviours have the direct impact to the VaR for portfolios defined on long and short trading positions. In addition, accurate estimation of VaR provides non-trivial information to the investors who involve in long and short financial positions in Malaysian stock exchange.

**Paper ID:** 26.1  
**Title of Paper:** GMM Estimation of Short Dynamic Panel Data Models With Error Cross Section Dependence  
**Authors:** Sarafidis V  
**Presenter:** Sarafidis V  
**Abstract:** This paper considers the issue of GMM estimation of a short dynamic panel data model when the errors are correlated across individuals. We focus particularly on the conditions required in the cross-sectional dimension of the error process for the dynamic panel GMM estimator to remain consistent. To this end, we demonstrate that cross section independence (or uncorrelatedness) is not necessary - rather, it suffices that, if there is such correlation in the errors, this is weak. We define a stochastic scalar sequence to be weakly correlated at any given point in time if random variables sufficiently far apart in the sequence exhibit very little correlation. Spatial dependence satisfies this condition but factor structure dependence does not; consequently, the dynamic panel GMM estimator is consistent only in the first case. Under weakly correlated errors, an additional set of moment conditions becomes relevant for each i - specifically, instruments with respect to the individual which unit i is correlated with, denoted by j. We demonstrate that these extra moment conditions can be particularly useful when the errors are subject to both weak and strong correlations, a situation that is likely to arise in practice. Simulated experiments show that the resulting method of moment estimators outperform the conventional ones in terms of both bias and RMSE.
Paper ID: 26.2
Title of Paper: Efficient Estimation of Non-Linear Dynamic Panel Data Models with Application to Smooth Transition Models
Authors: Skeels C, Gørgens T, Würtz A
The University of Melbourne, The Australian National University, University of Aarhus
Presenter: Skeels C
Abstract: This paper explores estimation of a class of non-linear dynamic panel data model with additive unobserved individual specific effects. The models are specified by moment restrictions. The class includes the panel data AR(p) model and smooth transition autoregressive panel data (PSTAR) models. We derive an efficient set of moment restrictions for estimation and apply the results to estimation of panel smooth transition models with fixed effects, where the transition may be determined endogenously. The performance of the GMM estimator, both in terms of estimation precision and forecasting performance, is examined in a Monte Carlo experiment. We find that estimation of the parameters in the transition function can be problematic but that there may be significant benefits in terms of forecast performance.

Paper ID: 26.3
Title of Paper: First and Second Order Asymptotics of Covariance Structure Models
Authors: Prokhorov A
Concordia University
Presenter: Prokhorov A
Abstract: This paper derives some new first and second order asymptotic properties of well known estimators for covariance structure models. Generally, optimal GMM is known to dominate Gaussian QMLE in terms of first order asymptotic efficiency. There are however nontrivial conditions under which Gaussian QMLE preserves its optimality property even if the distribution is non-Gaussian. I derive such conditions for a general class of covariance structure models and provide an example when they hold. The conditions can be stated as restrictions on the fourth order moments of the distribution. They trivially hold for normal data but also identify non-normal cases for which Gaussian QMLE is asymptotically efficient. This result supports the much criticized use of traditional Gaussian QMLE in a wide range of econometric applications that employ such covariance structure models as LISREL, MIMIC, factor analysis and random effects. In recent papers, Newey et al (2003, 2004) derive and compare the second order bias of the Empirical Likelihood estimator and its first order equivalents, such as GMM and Exponential Tilting estimators, for covariance structure models. It is unknown however how these biases compare to the second order bias of Gaussian QMLE. I derive the Gaussian QMLE second order bias in a form that allows such a comparison and show that, under normality, the expressions for the Empirical Likelihood and QMLE bias are identical. There are several advantages to having a formal proof of this statement. First, an explicit form of the QMLE bias is helpful in making comparisons with EL under other distributions than normal. Second, it can be used to explain and compare the finite sample performance of QMLE and to construct its bias-corrected version. Finally, I use a higher order stochastic expansion and the bias expression I obtain involves higher order moments of the distribution rather than the cumulants and is thus fairly simple.
In this paper we use information from the Business Finance Survey (BFS), matched to the prototype Longitudinal Business Database (LBD) to examine the issue of access to finance for New Zealand firms. The BFS contains information on recent applications for debt and equity finance, the value of business assets being used as collateral for financing, and the length of the firm’s relationship with its main bank or financial institution. One drawback of the BFS is that it presents only a snapshot. By linking it to the LBD we can examine the influence of firms’ previous performance on the probability of applying for and their success in obtaining external finance. Moreover, we can use items from firms’ financial accounts to examine the effective cost of borrowing over a longer period and for a dramatically larger sample of firms.

How do choices about personnel practices affect firm performance? To examine this issue we use a unique panel of over 1,500 New Zealand firms, drawn from a diverse range of industries. The panel is constructed around respondents to official surveys of management practices in 2001 and 2005. These surveys ask a wide range of comparable qualitative questions covering organizational practices in the areas of: leadership, planning, customer and supplier relations, human resource management (HRM), quality and process monitoring, benchmarking, and innovation. To this panel, we attach longitudinal firm performance data, covering the 2000 to 2006 financial years, sourced from the prototype Longitudinal Business Database (LBD). The linked data allow us to examine the effect of HRM-related organizational change on firm productivity and worker outcomes.
International research has reached a reasonable consensus that the commonly observed positive relationship between productivity and exporting is driven primarily by the self-selection of productive firms into exporting. In this paper we delve more deeply into the issue of selection, examining the determinants of export market entry and exit at the level of products and trading partners.

This paper adds to the literature primarily through the extent of potential market entry and exit determinants that we have available in our dataset. The richness of the data allows us to simultaneously consider firm-, market- and product-level determinants of export market entry and exit. In this way we shed new light on the factors motivating firms' strategic market decisions.

At the firm-level, we control for standard characteristics such as industry and ownership structure (including foreign control), as well as more novel measures such as general & specific prior export and import market experience, and assistance from central government. For example, we consider whether firms are more likely to begin exporting to countries which they have previously imported from, and whether new products tend to go to existing or new partners.

Alongside the macroeconomic performance of the destination countries, the market determinants we consider include the impact of exchange rate movements (where the data allows firm-specific exchange rates to be constructed) and knowledge spillovers from other firms, in particular, whether firms find it easier to enter markets with which other domestic firms already have established relationships. From the product-level, we can control for product mix examining how product and market choices interact. For example, whether firms with a diverse portfolio of products are less likely to exit than those with a more concentrated product range.

To examine these issues we use data from the Longitudinal Business Database (LBD) recently developed by Statistics New Zealand (SNZ). The database is ideally suited to the study of goods exporting firms. The LBD is built around SNZ's Longitudinal Business Frame, a comprehensive database of economically significant New Zealand firms from all sectors of the economy. To this has been linked administrative tax data enabling the construction of firm-level labour & multi-factor productivity measures as well as a wide range of other standard financial performance metrics, such as profitability. For the purposes of examining export behaviour, we additionally have merchandise trade shipment data (i.e., daily by HS10 digit good by destination) linked to firms. The main estimation period for this paper is from 2000 to 2006, for which we have coverage of all data. However, since the Customs data is available on a reliably linked basis from 1996, we use this longer export history to help explain current exporting behaviour & performance.
This study explores the impact of democracy on corruption. In particular, does democracy necessarily reduce a country’s level of corruption? Earlier researches on the relationship between democracy and corruption have found mixed results. This study differs from earlier literature in three ways: first, it evaluates the relationship between democracy and corruption by decomposing the different components of democracy. Second, it develops the idea of “broad democracy” and “narrow democracy”. Accordingly, the study has developed two different methods of constructing a democracy index. A narrowly defined democracy index includes only political rights. Whereas, a broadly defined democracy index is constructed by incorporating press freedom, political rights and civil liberties. Third, it evaluates the democracy-corruption relationship in a non-linear fashion for different components of democracy by controlling the various economic factors. Both the partial regression technique and panel data estimations have been used to examine the effect and the influence of democratic reform on corruption levels. This study analyses the relationship by extending and updates the sample size from previous studies for 100 nations for the period 1995 to 2004. It uses transparency International’s annual corruption perceptions index as the dependent variable. The Freedom House subjective indices of political rights, civil liberties and press freedom are used to construct different democracy indices. Alternative measures of corruption and democracy are also utilised for robustness checking. The results suggest that a simple ‘electoral democracy’ represented by ‘political right’ is not sufficient to reduce corruption. An advanced fully-formed mature democracy is crucial to combat corruption, where the probability of being caught, if acting corruptly, is high. A fully-formed mature democracy is, of course, more than a democratically elected government. It requires effectively operating institutions, particularly the judiciary, the press and other media and active political participation of people. The coefficients of the non-linear regressions also suggest that democracy increases corruption in the early stage of democratic reforms; once past the threshold point however, corruption level decreases substantially in a well-functioning mature democracy. The results remain robust under the alternative panel estimations and under alternative democracy and corruption indices.

This present study investigates the inter-relationships between food and oil prices, and an exogenous variable (rainfall) drawing upon Johansen’ method for cointegration analysis (Johansen ,1988, 1991; Johansen and Juselius, 1990) and Vector Autoregression (VAR). The analysis is based on monthly and annual price data for long periods at the global level. It is supplemented by similar analyses of food prices in China and India. While comovements of prices imply integration of different markets, their efficiency implications are far from obvious for familiar reasons emphasised in the recent literature. Our analysis offers useful insights. First, there is robust evidence confirming comovements of different food prices. Specifically, both monthly and annual prices (e.g. wheat, rice, fruit, vegetable and oilseeds) are strongly interlinked globally. At the country level, similar results are obtained for India and China. Second, oil price has a significant positive impact on agricultural commodity prices globally (e.g. for wheat price with monthly data and for fruit price with annual data), and for India (on wheat, rice, fruit and vegetable prices with annual data). Oil price does not have any effect on agricultural commodity prices in China where wheat price leads other prices, such as prices of rice, fruit and vegetables. Thirdly, rainfall has a negative impact on agricultural commodity price in some cases (on wheat price at the global level, and on fruit and oilseed prices in India). Finally, in some cases, the price shocks are persistent but in several others these shocks are short-lived.
Abstract: Data for measuring poverty and income inequality are frequently available in a summary form that describes the proportion of income or mean income for each of a number of population proportions, ordered according to increasing income. While various discrete measures can be directly applied to data in this limited form, these discrete measures typically ignore inequality within each group. To overcome this problem Chotikapanich, Griffiths and Rao (2007a) proposed a method of moments estimator for fitting a generalized beta distribution to limited data. They examined shifts in the income distributions and Lorenz curves for the period 1988 to 1993. In a subsequent paper [Chotikapanich et al (2007b)], the authors estimated generalized beta income distributions for 91 countries and used these estimates to examine changes in global inequality over the period 1993 to 2000. In this paper we extend this work to the estimation of poverty measures. We show how values of poverty measures (the head-count ratio, the poverty-gap ratio, and measures suggested by Foster, Greer and Thorbecke, Watt, Atkinson, and Sen) can be computed from the parameters of beta distributions. The methodology is illustrated using World Bank data for Bangladesh, Thailand, urban and rural India, and urban and rural China for two periods around 1993 and 2000. The sensitivity of poverty assessments and their changes to the poverty threshold is examined.

Abstract: A substantial rise in private pension assets, such as employer sponsored pension plans and tax-preferred retirement savings accounts, documented in recent Canadian studies suggests that private savings are becoming an increasingly important component of retirement financing. Although the accumulation of private retirement savings in Canada has been extensively analyzed, very few studies, so far, have examined the post-retirement profiles of income generated by private savings. This study aims at making a contribution to the current retirement literature by providing insights into the overall structure of the income sources of older Canadians, focusing on the role of private pensions and tax-preferred savings programs such as Registered Retirement Pension Plans (RRSPs) in retirement financing. Using a sample from the Longitudinal Administrative Database, this paper examines changes in the income structure of older Canadians over the period from 1990 to 2005 and, in particular, changes in the roles of RRSP and private pensions during this period. We ask several questions, including: (1) how big is the role of RRSP income in retirement financing and for which group of seniors is the income share attributable to RRSP income the largest? (2) how did the patterns of RRSP withdrawals change in the past two decades? and (3) are RRSPs viewed mostly as a retirement asset or an emergency fund to be used in case of a health downturn or death of the spouse? Our preliminary findings show that while the share of private pension income in retirement financing has been rising in the past 15 years, the share of RRSP income remains relatively small. We also find that the likelihood of RRSP withdrawals is strongly correlated with lifecycle events, such as the death of the spouse, consistent with the view that families might view their assets in tax-preferred savings accounts primarily as precautionary savings.
Paper ID: 29.2
Title of Paper: Tax Law Asymmetries and Income Shifting: Evidence from Japanese Capital Keiretsu
Authors: Onji K 1, Vera D 2
1 Australian National University, 2 Kent State University
Presenter: Onji K
Abstract:
The asymmetric treatment of positive and negative income can create a tax incentive to engage in within-jurisdiction income shifting under a corporate income tax (CIT) that does not allow for the consolidation of group income. This paper aims to provide a justification for a group tax system by offering systematic evidence on the effects of taxes on within-group transfers. In the setting of the Japanese CIT of the early 1990s, we develop a model of a corporate group that predicts different optimal shifting schedules for subsidiaries with the size of paid-in capital above and below 100 million yen, due to the progressively in the CIT. Using a company-level data on 33,340 subsidiary-time pairs from 1988, 1990, and 1992, we find evidence consistent with the prediction. The finding underscores the importance of accounting for the group behavior in the design of CIT.

Paper ID: 29.3
Title of Paper: Tax Evasion, Tax Morale and Institutions
Authors: Torgler B 1,2,3, Schaffner M 1, Macintyre A 1
1 Queensland University of Technology, 2 CREMA Center for Research in Economics, Management and the Arts, Switzerland, 3 CESifo, Germany
Presenter: Torgler B
Abstract:
Taxpayers are more compliant than the traditional economic models predict. Why? The literature calls it the “puzzle of tax compliance”. In this paper we use field, experimental and survey data to investigate the empirical evidence on whether the level of tax morale helps to resolve this puzzle. The results reveal a strong correlation between tax morale and tax evasion/compliance confirming the value of taking the research a step further by looking at the determinants of tax morale. We explore this question focusing in particular on the importance of institutional and governance quality.

Paper ID: 30.1
Title of Paper: Structural VAR Approach to Malaysian Monetary Policy Framework: Evidence from Pre- and Post-Asian Crisis Periods
Authors: Raghavan M 1, Silvapulle P 2
1 Monash University, 2 Monash University
Presenter: Raghavan M
Abstract:
This paper employs a structural vector autoregression (SVAR) model to investigate the monetary policy framework of a small emerging open economy - Malaysia, especially how the economy dynamically respond to money, interest rate, exchange rate and foreign shocks. We establish identification conditions to uncover the dynamic effects of monetary policy shocks on various domestic variables. Following the financial crisis in July 1997, Malaysia adopted a pegged exchange regime in September 1998. By analysing the intensity of the responses of the domestic variables to various monetary shocks, we aim to find out whether the Malaysian monetary transmission mechanism has changed in the post-crisis period. Using monthly data from January 1980 to May 2006, a nine variable SVAR model is established to study the dynamic responses of the Malaysian economy to domestic and foreign shocks. The empirical results show notable differences: in the pre-crisis period, monetary policy and exchange rate shocks significantly affect the output, price, money, interest rate and exchange rate, while, in the post-crisis period, only the money shock tends to have stronger influence on output. Moreover, the domestic monetary policy appear to be far more vulnerable to foreign shocks especially the world commodity price shock and output shock in the post-crisis than in the pre-crisis period. The findings clearly indicate that the crisis has changed the role of the monetary transmission channels in propagating various policy shocks to the real sectors of the Malaysian economy.
Paper ID: 30.2  
Title of Paper: Practical Monetary Policies  
Authors: Guender A  
University of Canterbury  
Presenter: Guender A  
Abstract:  
This paper investigates the theoretical implications of targeting average inflation or following a speed limit policy in a dynamic model where monetary policy works with lags. Average inflation targeting dominates a speed limit policy for plausible values of society’s relative aversion to inflation variability. The efficiency loss associated with average inflation targeting relative to optimal policy is very small if society values output stability. A speed limit policy becomes attractive if society places great emphasis on inflation stability.

Paper ID: 30.3  
Title of Paper: Effectiveness and Feasibility of Cycle-Stabilising Capital Requirements: The Case of New Zealand Housing Lending  
Authors: Ng T  
Reserve Bank of New Zealand  
Presenter: Ng T  
Abstract:  
This paper assesses the potential for lenders’ capital requirements to dampen business cycle fluctuations. I focus quantitatively on the case of capital requirements on housing lending in New Zealand. My contribution is to assess the feasibility and likely effectiveness of a putative capital requirement on housing lending aimed at offsetting the procyclicality of this lending, as measured in the upswing of the cycle and in terms of the cyclical component of lending margins. The putative capital requirement is implemented as a multiplier on prudential capital requirements. I calculate the amount by which the scalar would have to move in order to offset apparent lending margin compression during upswings, and find that the scalar would have to double or more. I conclude that capital requirements should not be relied upon for a substantial dampening of the business cycle during the upswing, because of the likelihood of avoidance under the large magnitudes of regulatory capital movement needed. Having said that, a feasibly-calibrated capital requirement aimed at stabilising the cycle might still have beneficial stabilising effect during a downswing.

Paper ID: 31.1  
Title of Paper: Combining Forecast Densities from VARs with Uncertain Instabilities  
Authors: Vahey S ¹, Jore A ², Mitchell J ³  
¹ MBS, RBNZ and Norges Bank, ² Norges Bank, ³ NIESR  
Presenter: Vahey S  
Abstract:  
Clark and McCracken (2008) argue that combining real-time point forecasts from VARs of output, prices and interest rates improves point forecast accuracy in the presence of uncertain model instabilities. In this paper, we generalize their approach to consider forecast density combinations and evaluations. Whereas Clark and McCracken (2008) show that the point forecast errors from particular equal-weight pairwise averages are typically comparable or better than benchmark univariate time series models, we show that neither approach produces accurate real-time forecast densities for recent US data. If greater weight is given to models that allow for the shifts in volatilities associated with the Great Moderation, predictive density accuracy improves substantially.
Paper ID: 31.2  
Title of Paper: A Large BVAR for New Zealand: A Useful Tool for Analysing Shock Transmission in a Data-Rich Environment  
Authors: Matheson T, Bloor C  
Presenter: Bloor C  
Abstract:  
We analyse a large Bayesian Vector Autoregression (BVAR) containing almost one hundred New Zealand macroeconomic time series. Methods for allowing multiple blocks of equations with block-specific Bayesian priors are described, and forecasting results show that our model compares favorably to a range of other time series models. Examining the impulse responses to a monetary policy shock and two less conventional shocks – net migration and the climate – we highlight the usefulness of the large BVAR in analysing shock transmission.

Paper ID: 31.3  
Title of Paper: Nowcasting, Business Cycle Dating and the Identification of Policy Shocks using Information Available in Real Time  
Authors: Shields K  
Presenter: Shields K  
Abstract:  
A modelling framework is proposed in which the real time informational context of decision-making is properly reflected. Comparisons are drawn with ‘standard’ estimated models that incorrectly omit market-informed insights on future macroeconomic conditions and inappropriately incorporate information that was not available at the time. An analysis of quarterly US data 1968q4-2006q1 shows that neither diagnostic tests applied to the standard models nor typical impulse response analysis are able to expose the misspecification clearly. Estimated real time models considerably improve out-of-sample forecasting performance, provide more accurate ‘nowcasts’ of the current state of the macroeconomy and provide more timely indicators of the business cycle. A case study highlights the use of information in recognising the US recessions of 1990q3 -- 1991q2 and of 2001q1 -- 2001q4.

Paper ID: 31.4  
Title of Paper: Combining Multivariate Density Forecasts using Predictive Criteria  
Authors: Gerard H, Nimark K  
Presenter: Gerard H  
Abstract:  
This paper combines multivariate density forecasts of output growth, inflation and interest rates from a suite of models. An out-of-sample weighting scheme based on the predictive likelihood as proposed by Eklund and Karlsson (2007) and Andersson and Karlsson (2007) is used to combine the models. Three classes of models are considered: a Bayesian vector autoregression (BVAR), a factor-augmented vector autoregression (FAVAR) and a medium-scale dynamic stochastic general equilibrium (DSGE) model. Using Australian data over the inflation-targeting period, we find that, at short forecast horizons, the Bayesian VAR model is assigned the most weight, while at intermediate and longer horizons the factor model is preferred. The DSGE model is assigned little weight at all horizons, a result that can be attributed to the DSGE model producing density forecasts that are very wide when compared with the actual distribution of observations. While a density forecast evaluation exercise reveals little formal evidence that the optimally combined densities are superior to those from the best-performing individual model, or a simple equal-weighting scheme, this may be a result of the short sample available. The views expressed in this paper are those of the authors and are not necessarily those of the Reserve Bank of Australia.
Many universities in the US offer on-campus housing opportunities to incoming as well as already enrolled students. The most common student assignment mechanism used in the US has been shown to suffer serious efficiency losses. In this paper we first show that a particular placement mechanism which is in use at the MIT for about two decades is in fact equivalent to a natural adaptation of the well-known Gale-Shapley mechanism of two-sided matching theory to this framework. Motivated from the increasing popularity and success of the Gale-Shapley mechanism in a number of markets, we next experimentally compare the performances of the MIT mechanism with that of the leading theory mechanism Top Trading Cycles. Contrary to theory, the MIT mechanism performs better in terms of efficiency and participation rates, while we observe no significant difference between the two mechanisms in terms of truth-telling rates.

Human cooperation in large groups of anonymous actors is problematical for evolutionary theories. Globalization is a process that intensifies interactions among individuals on a worldwide scale, thus increasing the challenge. In this research we experimentally analyze the relationship between globalization – measured at the macro (country) and (micro) individual levels – and individual cooperation. Subjects were drawn from the general populations of Argentina, Iran, Italy, Russia, South Africa and the United States. We show that as macro and micro levels of globalization increase, so too do individual cooperation in both national and global public goods. This evidence suggests that existing theories may overstate the relevance of group-based enforcement or cultural mechanisms in accounting for cooperation. Prompting awareness of and increased interaction and interdependence with distal others may be vital for cooperation in large groups. This exploratory study suggests that globalization should be included in future analyses of cooperation in modern complex societies.

The purpose of this paper is to determine whether there is any mispricing of initial public offerings (IPOs) and seasoned issues of straight corporate bonds in Japan, and to determine what factors explain variations in the degree of mispricing. Significant evidence of overpricing of both IPO and seasoned issues of straight corporate bonds is presented. It is found that the degree of overpricing tends to increase both as: the volatility of interest rates at the bond conditions were determined increases; and the volatility of interest rates increases during the subscription period.
**Paper ID:** 34.2  
**Title of Paper:** An Examination of Systematic Risk in a Scaled Market Model  
**Authors:** Gold M  
Sydney Business School  
**Presenter:** Gold M  

**Abstract:**  
Despite the continuing intellectual skirmishes about its scientific validity, the CAPM endures as a principal exemplar of investment theory. The CAPM's theoretical assumptions and practical limitations have been subjected to early scrutiny (e.g. Roll, 1977), however, the empirical literature has ignored causal relationships embedded in these data and the index management practices which directly affect the performance characteristics of “market” models. Stock market indexes are effectively “closed systems” which comprise relatively few ex post variables (i.e. security size and performance). This paper, therefore, makes identifies the actual/fundamental sources of errors emanating from within index models and their implications for econometric methods, and thus, the CAPM's validity. This paper analyses a unique dataset which captures the index constituent changes which occurred between 1994 to June 2002 within the S&P/ASX50 Index – a leading institutional equity index which measures the performance of a basket of Australia’s largest and most liquid stocks. Index turnover is revealed as an important source of statistical anomalies which has not been previously documented in the empirical literature. Further, it is deduced that these anomalies have been mistakenly accorded deterministic meaning under the CAPM's theoretical framework (namely, to support an elemental conjecture that a dichotomy between “systematic” and “idiosyncratic” risk exists).

**Paper ID:** 34.3  
**Title of Paper:** Tests of Conditional Asset Pricing Models in Emerging Markets: Empirical Evidence from Pakistan  
**Authors:** Iqbal J, Brooks R, Galagedera D  
Monash University  
**Presenter:** Iqbal J  

**Abstract:**  
Pricing risky assets is a daunting task. This is especially true for emerging markets where institutional, political and macroeconomic conditions are generally volatile. This implies that the parameters of the asset pricing models and expected returns are unlikely to remain constant over time. Further, the distribution of asset returns in emerging markets is non-normal with thick tails as the frequency of extreme observations is high compared to developed markets. In this paper we address both of these issues. We evaluate the performance of unconditional and conditional CAPM and the Fama-French models for an emerging market in a discount factor framework and employ GMM for estimation and testing which does not require strong distributional assumptions. The expected return and parameters of the stochastic discount factor are allowed to vary with investors’ information set through a scaled factor methodology. The risk premia are estimated by sequential GMM approach. The impact of thick tails and excess kurtosis is accommodated by augmenting the asset pricing model with a cubic market factor consistent with co-kurtosis. The higher order co-moment literature provides evidence that for emerging markets, co-kurtosis is more relevant than the co-skewness. The Hansen-Jagannathan distance prefers conditional version of the CAPM and Fama-French to their unconditional counterpart. Moreover, the unconditional Fama-French model augmented with a cubic market factor performs best among the competing model. This model is also more parsimonious compared to the conditional Fama-French model in terms of number of parameters.
Abstract:
The parameters in duration models are usually estimated by a Quasi Maximum Likelihood Estimator (QMLE), which is available in standard econometric software and is widely used in practice. This estimator is efficient if the errors are iid and exponentially distributed. If the error distribution is unknown, then it may not be the most efficient. Motivated by this, a class of semiparametric estimators have been introduced recently by Drost and Werker (2004) to improve upon the QMLE. Their method is based on the theory of efficient semiparametric estimation. A thorough evaluation of the finite sample properties of this method is not yet available. Further, although some parameters in several standard duration models are known to be nonnegative, the aforementioned semiparametric estimator does not incorporate such nonnegativity constraints. The purpose of this paper is to address these two issues. In particular, we propose a new semiparametric estimator for the case when there are inequality constraints on parameters, and report the results of simulation studies to evaluate the aforementioned two semiparametric estimators. The results lead us to conclude the following when the error distribution is unknown: (i) If the model does not impose inequality constraints on parameters then the Drost-Werker estimator is better than the QMLE, and (ii) if the model does impose inequality constraints on parameters then the estimator proposed in this paper is better than the Drost-Werker estimator and the QMLE.

Abstract:
This paper develops a new semiparametric method for modelling multivariate data, particularly when it is desired to assign different levels of importance to various regions in the domain of the joint distribution. The main idea is to estimate the unknown parameter by maximizing a Cramer-von-Mises type distance between a particular type of empirical distribution and the true distribution, which is specified in a semiparametric way that allows a flexible form for the multivariate distribution. The Cramer-von-Mises function incorporates a weight function to assign differential weights to different parts of the domain of the distribution. The main focus of this paper is estimating the lower tail of the joint distribution accurately. In a simulation study, the performance of the new semiparametric method is found to be better than that of the inference function method. The proposed estimation method is used to estimate the joint distribution of DM-USD and Yen USD exchange rates.
Survivorship is known to push the performance of mutual funds (both public and private) and their money managers upwards. One possible solution is to impose parametric assumptions or only look at survivorship bias free data. However, many financial data have unknown and possibly heteroscedastic and leptokurtic distribution which severely affects the robustness of the results using traditional parametric models. The main purpose of this paper is to venture into the existing knowledge-base of truncated regression using linear rank type estimators with minimum distance based approaches. We propose an estimator of the truncated regression model which is extension of the well known Hodges and Lehmann (1963) type generalized difference estimator based on an extension of the linear rank statistic. Rank based inference methods has been proposed as early as Adichie (1967) and has been studied by several other authors thereafter. This has also been used to find out the treatment effect in fixed effect models, and then by Honore and Powell (1994) to propose their pair-wise difference estimators which is a sequence of minimizers of second order U-processes. We extend their result into a Hodges and Lehmann type estimator in multivariate location as studied by Choudhuri (1992) to a linear regression framework where one or more of the variables might be truncated at variable but observable points. We obtain this estimator by minimizing a measure of dispersion as suggested in the univariate case by Jaeckel (1972). We apply our results to evaluate the performance of funds and managers using Morningstar Principia and other databases.

In this paper we demonstrate methods for drawing inferences from estimated elasticities of demand. A significant literature in the estimation of demand relationships centers on the determination of elasticities. Such parameters of interest include: the Hicksian and Marshallian price elasticities of demand, the Allen and Morishima elasticities of substitution, income and expenditure elasticities defined for Engle curves, and long-run elasticities defined in dynamic models can be defined as complex functions of the estimated parameters. In addition, although most demand specifications imply that these elasticities of interest vary by prices, income, or level of output, it is frequently the case that there is little attempt to draw inferences at more than a single point and for only one level of significance. In this paper we demonstrate how these bounds can be generalized to consider multiple values and how one may determine the relationship between the level of significance chosen may influence the inferences drawn.

In particular, this analysis focuses on the wide class of elasticities which are defined as ratios of estimated relationships. The principle method we use to construct these intervals is based on Fieller’s method. The advantage of the Fieller method is that it generates a more general class of confidence intervals than can be obtained from the traditional (mean ± t standard deviation) intervals or the standard resampling methods while still employing the usual asymptotic distributional assumptions. Although based on the assumption of asymptotic normality, the Fieller confidence intervals are constrained to be neither symmetric nor finite when . We demonstrate how this method contrasts to the usual approximation techniques by constructing a cumulative distribution function of the relationship of interest so that one can observe how the confidence interval can be defined at various levels of significance.
Paper ID: 37.2
Title of Paper: On Assessing the Specification of Propensity Score Models
Authors: Lee W
University of Melbourne
Presenter: Lee W
Abstract:
This paper discusses a graphical method and a closely related regression test for assessing the specification of the propensity score, an area which the literature currently offers little guidance. Based on a Monte Carlo study, it is found that the proposed regression test in this paper has good size and power to detect a misspecified propensity score in the case when an inappropriate link function is used to estimate the propensity score (e.g., using a logit model when the data generating process is a heteroskedastic probit model). In addition, given that the ultimate purpose of the use of propensity scores is to estimate average treatment effects, the finding of lower bias and mean squared error for instances when the proposed regression test is passed suggests that such a test can be useful in applied work.

Paper ID: 37.3
Title of Paper: How to Pick the Best Regression Equation: A Monte Carlo Analysis of Alternative Model Selection Criteria
Authors: Reed B, Qin X
Department of Economics, University of Canterbury, University of Colorado
Presenter: Reed B
Abstract:
This study uses Monte Carlo experiments to compare the performance of a large number of model selection criteria (MSC). It is distinguished from previous studies in a number of ways. It includes a larger number of MSC than previous studies (15). It includes a wider variety of MSC. We examine (i) conventional information criteria such as the AIC and SIC, (ii) General-to-Specific modeling, (iii) portfolio modeling where a set of models are chosen rather than a “single best” model; and (iv) Bayesian model averaging where models are weighted by their posterior probabilities to produce a composite model.
We use Mean Squared Error (MSE) as our measure of MSC performance. The decomposition of MSE into Bias and Variance provides a useful framework for understanding MSC performance. We find that the overall best MSC is the “small-sample corrected version” of the SIC (SICC). However, there is much variation in MSC performance and no MSC works best in all circumstances.
Our empirical results identify two important determinants of MSC performance: (i) overall fit of the equation as measured by R2, and (ii) the ratio of relevant variables to total candidate variables. We use these two factors to identify circumstances in which some MSC are likely to dominate others.
Recent research in economics has emphasized the utility of General-to-Specific modeling and Bayesian Model Averaging (Hendry and Krolzig, 2005; Sala-i-Martin et al., 2004). The main contribution of our study is that it suggests that the SICC may prove superior in many circumstances.

Paper ID: 37.4
Title of Paper: Estimating Probability Density Functions for Exact Index Numbers
Authors: O'Donnell C, Rao P
University of Queensland
Presenter: O'Donnell
Abstract:
The Konus (1924) approach to constructing price index numbers involves evaluating the expenditure function of a representative consumer at different vectors of prices. Muellbauer (1976) has shown that if consumer preferences exhibit price-independent generalised linearity (PIGL) then this representative consumer exists. This paper computes Konus price index numbers derived from expenditure functions belonging to the logarithmic PIGL class. The parameters of the expenditure functions are estimated in a Bayesian framework. Results are summarised in the form of estimated posterior probability density functions for expenditure shares and associated index numbers. Uncertainty concerning the functional form of the representative expenditure function is resolved through Bayesian model averaging. Multilateral index numbers are computed based on the EKS method applied to Fisher binary indices and to the GAIA system proposed by Neary (2004).
We examine a maximization model in education when peer effects are nonzero and students are allocated into small groups to learn. The model allows peer inputs to be substitutes or complements to own inputs into educational production. We explore the model’s implications under self-selection, forced random allocation, and forced ability-based matching. If peer inputs are complementary to own inputs, we find that social planners will prefer learning groups to be streamed by ability, which is also what will generally occur when individuals are left to self-select. However, this implies a regressive distribution of peer-derived benefits. Using a combination of survey and administrative data on undergraduates allocated into tutorials, we estimate key parameters of the model under reasonable assumptions. We then compare the optimal allocation mechanisms derived using our model to observed sorting behavior. Based on this comparison, we deduce and characterize the default empirical maximand and discuss feasible alternatives, given institutional constraints.

A central question in the economics of education is the impact of teacher salary on student achievement. Previous studies have often struggled to deal with problems of endogeneity – administrators and voters may punish teachers for poor student performance by keeping teacher salaries low. Using data from the state of Western Australia, we exploit an unusual feature of the system: salaries are uniform across the state, except that schools outside the capital city pay higher salaries to their teachers. The salaries rise in levels across districts whose boundaries are drawn along longitudes and latitude. Our approach assumes that schools which are very close to these geographic boundary, but on opposite sides, should be identical in all respects except for the salary differential. This allows us to employ a regression discontinuity approach to identify whether literacy and numeracy scores increase with teacher salaries.

Many countries have recently introduced research assessments to help document and raise the quality of research carried out in their university sector. However, there is very little empirical evidence on how these exercises, such as the Performance Based Research Fund (PBRF) in New Zealand and the forthcoming Research Quality Framework in Australia, affect the signals that researchers observe in the academic labour market. Since these research assessments aim to raise research quality, individual academics should perceive a higher return to publication quality relative to quantity than they otherwise would have in the absence of the assessment exercise. In this paper we use data collected by the authors on the rank and publication records of all New Zealand academic economists both prior to the introduction of the PBRF and at the time of the second assessment round. Academic rank is regressed on indicators of lifetime quantity and quality of journal articles produced by each academic, using ordered probits. A test of whether the returns to publication quality changed between the two periods is used to infer whether PBRF had any impact on the incentives for academics to produce higher quality research. Changes in overall publication quantity and quality between 2000 and 2006 are also decomposed into the part due to the recruitment of new economists by NZ universities and the part due to changes in the output mix of existing academics.
This paper considers the effect of eliminating the tax-free threshold in the Australian income tax structure. First, analytical comparisons are made of alternative tax structures with and without a tax-free threshold. Second, policy simulations are carried out. The welfare effects (using equivalent variations) for particular household types are examined, along with distributional implications. Two cases, of unchanged labour supplies and allowing for behavioural responses to the tax change, are examined using the Melbourne Institute Tax and Transfer Simulator (MITTS). In each case, policy changes are designed to be revenue-neutral.

The redistributinal, as well the efficiency, aspects of personal taxes are of particular interest to governments designing tax reforms. Traditionally however, the numerous analytical tools available to calculate distributional and efficiency effects of taxes and transfers are not widely used in tax policy advice. This partly reflects the computational complexities involved in calculating some of those measures and the need for simplicity, and transparency of underlying assumptions, when presenting policy advice. This paper makes two contributions to the analysis of the equity and efficiency effects of tax policy. Firstly, it explores the methodologies proposed by economists to measure equity and efficiency outcomes of taxes and considers their usefulness as policy advice tools for New Zealand. Secondly, the paper examines a database of low-income New Zealand taxpayers. Decomposing taxpayers by household type etc., shows that different groups of low income taxpayers can be affected quite differently by various aspects of the tax/transfer system. In particular, tax-free zones appear less suited to helping those most in need than positive initial tax rates.

The paper presents a tour of personal tax and transfer policy in the UK over the last decade. It argues that developments occurred in three broad phases: first, the Government sought to strengthen incentives to work at all, and eliminate the highest marginal effective tax rates (METRs). Second, with rising concern about the level of child poverty, defined in terms of relative income, transfers to all low-income families with children rose in a way which weakened financial work incentives, particularly but not exclusively for potential second earners. The last phase has seen a growing use of time-limited work-conditional cash transfers to strengthen work incentives, despite the lack of evidence that they have long-lasting effects. We show the impact on all of these on the distribution of income, relative poverty rates and the distribution of measures of work incentives. We also discuss the key operational change to personal taxes and benefits, under which responsibility for all cash transfers for families with children moved to the revenue department.
Statistics New Zealand not only provides users the measured time series, but also the series with identifiable seasonal and calendar effects removed. These effects are easily modelled, though not easy to estimate due to the volatility of New Zealand's time series. To remove seasonal variation Statistics New Zealand uses X-12-ARIMA. Possible calendar effects are trading day and moving holidays (e.g. Easter). Models for seasonal and trading day variation affect each month or quarter and thus are relatively straightforward to estimate. Estimating the effect of moving holidays is more of a problem as the period over which they affect the series needs to be quantified. Also there is only one measurement per annum. Statistics New Zealand has been investigating using Genhol to estimate the effect of Easter on its time series. Genhol is a supplementary tool for X-12-ARIMA which creates variables linked to the time periods of interest. These variables may be for the periods before, during and after the moving holiday. The coefficients are estimated as a part of the usual seasonal adjustment process, in a similar fashion to trading day coefficients. The expected gain from a better specification of the holiday is a reduction in overall noise and better defined trend and seasonal components. We investigated series for retail trade, building consents, migration and accommodation guest nights. The results overall indicated an improvement in the adjustment of the series for regular effects, allowing greater confidence in the interpretation of our published series. The current state of our analysis is presented.

This paper examines how news releases and key microstructure features of market activities affect trading frequency in major American airline stocks. Using the autoregressive conditional hazard framework of Hamilton and Jorda (2002), we show that company and U.S. macroeconomic announcements significantly change the conditional probability of trade, but traders' reaction strongly depends on the news informational content. In particular, we find that the frequency of trading in smaller stocks increases significantly before a firm-specific news release, yet does not change considerably for larger airlines. Further, traders seem to 'pause' during an announcement itself, but then start trading more actively, and the probability of trade increases significantly for up to 20 minutes after the news arrival. This effect is most pronounced for unscheduled airlines security releases and announcements that are directly related to past or future earnings, such as traffic reports or favourable analyst reports. The impact of macroeconomic statistical releases depends on news timing, with indicators published earlier producing the strongest response. We also find that market microstructure variables have a small and significant effect on trading frequency, with trade volume and price changes revealing more information than relative bid/ask spread. In particular, our analysis reveals a positive and significant impact of large trade volumes on the probability of trade. The results also clearly indicate that the tick-by-tick crude oil futures returns are highly relevant in modeling the probability of a trade within the next time period, with a notable exception of Southwest Airlines, renowned for their strong and successful jet-fuel hedging program. However, the inclusion of crude oil futures prices does not change the significance of the announcement variables.
This paper attempts to explain some of the variation in crime rates across developing countries. Economically-motivated crime imposes extremely high costs in certain countries, such as PNG, and deters significant amounts of investment and growth. At the same time, poor returns to labour can push agents into criminal activity. Trade flows have a strong effect on the returns to capital and labour, for instance the returns to copper in PNG. The paper models a standard Heckscher-Ohlin trade model with two countries and two sectors and two goods, but with a third sector, crime. Agents move between the crime sector and the two legal sectors in order to equalise returns to labour across all three. Trade is shown to reduce crime in the capital-poor country but raise it in the capital-rich country, in equal proportions. The total amount of crime does not change, but it relocates. Furthermore it is shown that trade may be welfare-reducing for the (relatively) wealthier country. More seriously, when labour is mobile across locations, there can be locations that are caught in a “crime trap” and all labour migrates away. The results seem applicable to variations in crime rates across developing countries, but seem less applicable to wealthy countries in which social welfare programs make it less necessary for the poor and unemployed to turn to crime.

The model consists of two parties. One is a supervisor and the other a wealth-constrained employee. Both parties will potentially be able to screen between a set of production methods, some of which carry accident risk. Production methods deliver private benefits to each player, e.g. the employee preferring an easier method that carry greater accident risk. Before production, both parties invest in skills which stochastically inform them of the project type. Following Aghion-Tirole (1997), formal authority will be defined as the right to choose the method and is allocated before production. Real authority is the right to choose the method in practice, i.e. provided that the party has the knowledge to enable such a choice. A formal-authority liability rule—where the supervisor is made liable regardless of whether or not he is informed, is compared with a real liability rule, which makes liable the party who is actually informed, i.e. the party who actually chooses the project which carries the risk of an accident. Suppose there is a conflict of interest between the manager and subordinate regarding the preferred project: We derive conditions under which the formal-authority liability rule encourages both the manager and the subordinate to be more informed regarding the riskiness of the project, and which leads to a higher level of social welfare than real-authority liability. However, when the manager’s and subordinates interests are aligned, real liability is socially preferred to formal liability.

Are minorities treated differently by the legal system? Systematic racial differences in case characteristics, many unobservable, make this a difficult question to answer directly. In this paper, we estimate whether judges differ from each other in how they sentence minorities, avoiding potential bias from unobservable case characteristics by exploiting the random assignment of cases to judges. We measure the between-judge variation in the difference in incarceration rates and sentence lengths between African-American and White defendants. We perform a Monte Carlo simulation in order to explicitly construct the appropriate counterfactual, where race does not influence judicial sentencing. In our data set, which includes felony cases from Cook County, Illinois, we find statistically significant between-judge variation in incarceration rates, although not in sentence lengths.
Paper ID: 42.1
Title of Paper: Preferred Suppliers and Vertical Integration in Auction Markets
Authors: Burguet R ¹, Perry M ²
¹ Institute for Economic Analysis (CSIC), ² Rutgers University
Presenter: Burguet R
Abstract:
This paper examines a symmetric first-price procurement auction in which one supplier is preferred by the buyer. Preference takes the form of a right-of-first-refusal which allows the preferred supplier to accept or reject the contract at the lowest bid of the other competing suppliers. We first characterize a strictly monotonic bidding function for the competing suppliers. We then show that the buyer can benefit from selling preference to one of the suppliers. The sale of preference allows the buyer to extract the differential expected profits from becoming the preferred supplier. Preference can also arise from a vertical merger between the buyer and one of the suppliers. We also show that the joint surplus of the buyer and one supplier increases after the vertical merger.

Paper ID: 42.2
Title of Paper: Comparing Bertrand and Cournot Outcomes in the Presence of Public Firms
Authors: Ghosh A ¹, Mitra M ²
¹ University of New South Wales, ² Indian Statistical Institute
Presenter: Ghosh A
Abstract:
It is now well known that Bertrand competition yields lower prices and profits and higher consumer surplus and welfare than Cournot competition. Exploiting cost asymmetries, recently several authors have constructed specific examples where at least one of these conclusions fails to hold. However, to date, the literature comparing Bertrand and Cournot outcomes has almost exclusively focused on environments where all firms maximize profits. We revisit the classic comparison, in mixed markets, where profit-maximizing private firms coexist with public firms.
In developed countries, this coexistence is observed in several oligopolistic sectors including banking, insurance, and telecommunications. In the developing world, the share of public enterprises in manufacturing output and employment lies in the 30-70% range.
So, how does a public firm differ from its private counterpart? Following the mixed oligopoly literature, we assume that the difference lies in the objective function. Unlike private firms, which maximize profits, a public firm maximizes welfare (sum of consumer surplus and producer surplus). First we characterize and compare Cournot and Bertrand outcomes in a differentiated duopoly where a private firm competes against a welfare-maximizing public firm. The results are strikingly different from the ones obtained from a similar comparison with profit-maximizing firms only. The standard Bertrand-Cournot rankings are reversed for prices, consumer surplus, and profits. These reversal results generalize beyond duopoly for a wide range of parameter values.
We also examine the comparison between Bertrand and Cournot outcomes in presence of partial privatization. To endogenize the degree of privatization we construct a stylized two-stage game in which a public firm maximizes a weighted sum of its own profits and welfare in stage two, and the weights, indicating the extent of privatization, are chosen optimally by a welfare-maximizing government in stage one. The reversals also hold under this richer setting. As a by-product of our analysis, we find that the mode of market competition (i.e., Bertrand or Cournot) can have qualitatively different welfare implications for partial privatization.
This paper considers a moral hazard problem in an infinite-horizon, principal-agent framework characterized by limited commitment and history-dependent reservation utilities. I prove existence and construct a reduced equivalent representation of the problem that can be addressed by numerical techniques. In computing the endogenous state space, I use an innovative algorithm which does not rely on the convexity of the underlying set. Further on, I focus on the estimation of the dynamically optimal compensation for US executives and find evidence that in the presence of positive correlation between stock prices and reservation utilities, the contract provides the CEO with insurance against bad outcomes, which ultimately smooths his/her consumption across (initial-history) states. Exerting effort appears to be the predominant strategy for the principal, but shirking may still be optimal when the agent is rich enough. The optimal wage scheme and the future utility of the CEO tend to grow in both his/her current utility and in the future realization of the stock price. The agent's utility weakly increases in the long run.

This paper investigates the development of bond market in emerging economies. The main objective of this paper is to explore the reasons for a slow development of bond market in emerging economies. To achieve this objective, we first provide a comprehensive survey of the bond market developments in a sample of Asian and Latin American countries. For comparison purposes, we split the sample into two: (i) the early reformers, and (ii) the hesitant or late reformers. We present a case where bond market developments become an integral part of the financial market development. Then, we study the role of some important institutional and social indicators in bond market development. We follow the approach used by Claessens, Klingebiel, and Schmukler (2003) to test the hypotheses that (i) macroeconomic and institutional environment does help to develop a market for domestic bonds and (ii) social factors such a low level of corruption helps market development and improve market efficiency. We use pooled data for a sample of developed and emerging economies to empirically test these hypotheses. The results are expected to have important implications for policy makers in the emerging markets.
Paper ID: 43.2
Title of Paper: Booms and Busts as Exchange Options: Valuing the Decision to Enter and Exit from an Emerging Market
Authors: Miller S
Monash University
Presenter: Millar S
Abstract: There is an analogy between booms and busts and exercising exchange options, which may one day open up the possibility of replicating and hedging against such events. Okunev and Tippet’s (1993) single factor option pricing framework is summarized, extended and used to get a dollar value of the urgency of overnight exit from a country in crisis and overnight entry into a country during a boom. The exchange option contract that characterizes a boom, called the global benchmark premium, pays when a country’s global systematic risk adjusted performance exceeds that for a broad global stock market index, and equals zero otherwise. This is the call option in Okunev and Tippett’s (1993) version of the performance management fee. They do not consider the put option, but by applying Put-Call Parity, it is possible to characterize a bust. This exchange option contract is called global benchmark insurance. It pays the difference between global systematic risk-adjusted performance on a broad global stock market index and a country’s stock index if this difference is positive, and zero otherwise. The benchmark premium gives the dollar value of exercising an option to enter a country, while benchmark insurance gives the dollar value of exercising an option to exit a country. The global benchmark premium and insurance pricing formulas are first defined. The methodology used to estimate the rolling country alphas and betas is described next. After describing the data, and summarizing events during the Asian Crisis, the daily entry and exit values are computed for sixteen emerging markets and presented along with the respective country alphas, betas and their standard errors from 1996 through 2006, before concluding.

Paper ID: 43.3
Title of Paper: Multinational Ownership and Subsidiary Investment
Authors: Carlin W 1, Charlton A 2, Mayer C 3
1 UCL, 2 LSE, 3 Said Business School, Oxford University
Presenter: Carlin W
Abstract: Global financial integration has raised questions about the impact of foreign ownership on host country economies. Some see multinationals as bringing much needed capital and financial stability to underdeveloped economies, while others emphasize the volatility produced by footloose foreign investors. These issues relate to fundamental questions about the investment behaviour of related firms within multinational networks. This paper investigates one such question: how investment in subsidiaries is affected by the investment opportunities of parent firms. We create a new panel dataset of almost 5,000 parents and subsidiaries in more than 60 countries, for which we can separately observe necessary financial and operating information because they are independently listed on national exchanges. We choose listed multinational subsidiaries to overcome the primary identification problem in the literature on diversified firms: inadequate proxies for the investment opportunities of individual divisions of conglomerates. We find that improvements in the investment opportunities of parent firms have a negative effect on the investment of their subsidiaries, after controlling for the investment opportunities of the subsidiary, which can be independently observed. This provides evidence of internal capital markets in multinationals that reallocate funds towards units with better investment opportunities. We also find that the negative effect of the parent's investment opportunities on subsidiary investment is greatest where the relationship is more arms-length, i.e. where parents have modest ownership stakes, are distant from their subsidiaries or when subsidiaries - as well as parents - operate in well developed financial markets.
Paper ID: 44.1
Title of Paper: Money, Capital and Unemployment
Authors: Dutu R, Huangfu S, Julien B
1 University of Waikato, 2 University of Sydney, 3 University of New South Wales
Presenter: Dutu R
Abstract:
We study the role played by trading frictions in the long-run relationship between inflation, unemployment and capital accumulation. We model trading frictions via a positive endogenous probability of not finding a trading partner, and emphasize the implications this has for firms when making capital decisions prior to the opening of the two frictional markets: the labour market and the goods market. The economy is populated with firms and households. Firms borrow money from households to buy capital, then hire labour and finally pay wages, dividends and interests on loans. Households earn wages by working for firms, interests by lending to firms and dividends through firms ownership. Since firms make their capital choice prior to the opening of the frictional goods and labour markets, this creates an endogenous systemic risk of default and multiple equilibria. We characterize these equilibria, optimal monetary and fiscal policy and calibrate the model to the U.S. data.

Paper ID: 44.2
Title of Paper: Modelling Regime-Shifting Beveridge Curves
Authors: Dutu R, Holmes M, Silverstone B
University of Waikato
Presenter: Holmes M
Abstract:
This paper offers new insights into Beveridge curve analysis by modelling the unemployment-vacancy rate relationship within a Markov regime-switching environment in which the probabilities of curve-shifting are determined endogenously by shift factors. This approach, in sharp contrast to existing Beveridge curve literature, enables regime-specific parameters to be estimated. In addition, a novel feature of our analysis is an assessment of the role played by several factors in influencing the transition probabilities of switching between regimes. These shift factors include the labour force participation rate, GDP growth, net migration and the real interest rate. Using New Zealand data, our evidence suggests that these variables have been responsible, in varying degrees, for shifts in and movements along the Beveridge curve.

Paper ID: 44.3
Title of Paper: Gains from Migration in a New-Keynesian Framework
Authors: Engler P
Freie Universität Berlin
Presenter: Engler P
Abstract:
This paper presents a simple New-Keynesian small open economy model allowing for labour to be supplied both domestically and abroad with a locational preference to work at home rather than abroad. From this small change in the otherwise standard setup as (in Gali and Monacelli, 2005) follows an important implication for the Phillips-curve: The opening of the “labour account” reduces the output-inflation tradeoff, i.e. the Phillips-curve becomes flatter. The theoretic intuition is simple: Any given boost to output requiring an increase in labour input is associated with increasing real wages, marginal costs and thereby inflation if workers need to be compensated for a reduction in leisure. However, to the extent to which this additional labour is mobilized from a substitution away from labour formerly supplied abroad, due to an improving real wage differential, there is no need for such a compensation. Hence real wages, marginal costs and inflation are less affected by the expansion, i.e the Phillips-curve becomes flatter.
The dynamics of inflation have changed substantially in many if not all advanced economies over the past four decades. Several studies have documented significant changes in the average level of inflation, the degree of inflation persistence and the volatility of inflation, although the timing and extent of these changes varies across country. As a result of these changes, modelling and forecasting inflation dynamics has become an arduous task. The complexity in modelling inflation dynamics relates not only to the various types of above-mentioned structural changes in the statistical properties of inflation, but also to the fact that to some extent these changes are related to one another in various ways. Hence, it is important to analyse these changes jointly. At the same time, modelling inflation is complicated also by the fact that in addition to its (potential) instability, different forms of nonlinearity can be relevant.

While much effort has been devoted to analysing the inflation process for the US economy, much less research has been undertaken for the euro area. As a result, it is still uncertain how to best model euro area inflation. As regards the traditional Phillips curve approach, relatively little has been done to assess its usefulness for the euro area. The few existing studies tend to include only a limited analysis of possible instability and nonlinearities. As a result, several questions remained unanswered regarding the most appropriate way to model inflation dynamics in the euro area.

This paper provides a comprehensive analysis of euro area inflation dynamics, focusing on the functional form of the Phillips curve using quarterly data from 1970 to 2005. We explicitly and carefully address the stability of the relationship between inflation and economic activity, accounting for the possibility of structural change in the mean, persistence, and volatility of inflation, as well as in the slope of the curve. In addition, we examine the appropriate functional form of the curve by means of the methodology of smooth transition regression models, which allows for both convex and concave shapes of the curve. Although our main analysis is conducted on quarterly inflation based on the GDP deflator, we also analyse the price index that is preferred by the ECB, the Harmonised Index of Consumer Prices (HICP). For the latter indicator, we also analyse the possible presence of nonlinearity in the effect of additive price shocks stemming from oil and exchange rate developments. Finally, we conduct a thorough sensitivity analysis across different possible measures of economic slack.

The main results of the study are three:

• First, there is strong evidence, quite un-surprisingly, of a shift in the mean of euro area inflation, with the change occurring quite gradually towards the middle of the 1980s.

• Second, there is also strong evidence of a shift in the slope of the curve, again occurring in the 1980s but somewhat earlier and much more abruptly. As a result of this shift, the curve becomes significantly flatter, consistent with the idea that the frequency of price adjustment is negatively related to the mean of inflation.

• Third, once we correct for this time variation in the parameters we find no significant evidence of non-linearity in the curve. Hence, we conclude that the Phillips “curve” is, at least in the euro area, indeed a “line”.

The main policy implication of our study is, therefore, that there is at least no convincing evidence of the existence of a "free lunch" for monetary policy, whereby the central bank is able to stimulate economic activity without creating inflationary pressure.
Since the early 1990’s, NAIRU estimates have fallen and the ratio between average unemployment duration and the unemployment rate has risen. Using simulations and empirical Phillips curve estimation, we attribute these developments to a combination of demographics and other factors that have reduced the job separation rate. We develop an efficiency wage model that predicts that a fall in the equilibrium separation rate lowers the NAIRU and raises the duration-unemployment ratio. We then simulate the NAIRU and duration-unemployment ratio over 1960-2005. From 1960-1991, the separation rate (as measured by Shimer (2007)) is closely related to demographics, and during this period demographics can explain much of the variation in the NAIRU and duration-unemployment ratio. After 1991, however, the separation rate falls much more than predicted by demographics, and this decline can explain the recent behavior of the NAIRU and duration-unemployment ratio. The model predicts that the NAIRU depends on the equilibrium separation rate. To empirically evaluate this, we estimate Phillips curve models that include the duration-unemployment ratio, which is closely related to the equilibrium separation rate but is less affected by business cycle fluctuations. The coefficient this ratio is always significant, and the elasticity of the NAIRU with respect to this ratio is very close to the value predicted by our model. Using our estimated coefficients, we construct time-varying NAIRU estimates. The predicted NAIRU starts rising in the 1960’s, peaks around 1980, and falls thereafter. In 2006:Q4 the average value of the predicted NAIRU is 4.7%, close to consensus estimates.
In this paper we consider two concerns for the Phillips Curve. The first is asymmetry. Typically Phillips curves are assumed to be linear in recent modelling. We show using panel data data from the euro area that important nonlinearities exist and that to some extent the ‘flattening’ of the Phillips curve in recent years reflects the greater success of monetary policy in keeping inflation down and behaviour on the less steep parts of the curve. We also explore the extent to which departures from the curve are asymmetric. We use an (M)TAR approach to show that the persistence of inflation varies according to whether shocks take inflation above or below the curve and according to whether this applies to the steeper or flatter segments. The second relates to the use of ‘real time’ information. We show that the New Keynesian model offers a better explanation of behaviour if real time data are used, particularly with regard to the measurement of expectations. We use both OECD forecasts and survey data to approximate expectations and find that this removes the tendency to get perverse estimates of the output or employment gap and suggests that people are more forward looking than is implied by the use of the rational expectations hypothesis.

The income of the self-employed is often assumed to be understated in economic statistics. Controversy exists about the best method for estimating the extent of under-reporting and about the resulting measures of the size of the underground economy. This paper adapts an Engel curve methodology developed by Hamilton (2001) for estimating errors in economic statistics. We examine discrepancies between food shares and reported incomes of the self-employed and other households and provide an estimate of how much income is under-reported by the self-employed. Using data from Korea, we find 23 percent under-reporting.

The Australian CPI is a Laspeyres index with fixed quantity weights based on the consumption patterns observed in an earlier period. Laspeyres-type price indices are subject to number of well-known biases which were highlighted in the recent Boskin Report (1996) for the US. This paper evaluates the performance of the Australian CPI as a true cost of living index. The analysis is based on ‘Engel’s Law’ that, other things equal, the budget share for food declines with total expenditure, and that households are equally well off if they devote the same share of their budget to food. Food Engel curves are estimated, based on the Working-Leser specification, using the series of ABS Household Expenditure Surveys spanning 1975/76-2003/04. The difference in the food share for households with the same level of CPI-deflated total expenditure provides a measure of bias in the CPI. The main findings are that the Australia CPI overstated changes in the general cost of living by approximately 28% between 1984 - 2003/04 (38% between 1975/76 -2003/04). However, there is substantial heterogeneity in the inflation rates experienced by different households and demographic groups. It was found that the CPI was an accurate measure of changes in the cost of living facing working families and two-adult families. The CPI was found to be a substantially less accurate measure of changes in the cost of living for single men and women and lone parent families.
Economists rely heavily on self-reported measures of health status to examine the relationship between income and health. In this paper we directly compare survey responses to a self-reported measure of health that is commonly available in nationally-representative individual and household surveys, with objective measures of the same health condition. Our particular focus is on hypertension, which is the most prevalent health condition in Western countries. Using data from the Health Survey for England, we find that there is a substantial difference in the percentage of adult survey respondents reporting that they have hypertension as a chronic health condition compared to that from repeated measurements by a trained nurse. Around 85% of individuals measured as having hypertension do not report having it as a chronic illness. Importantly, we find no evidence of an income/health gradient using self-reported hypertension, but a large (about 14 times the size) gradient when using objectively measured hypertension. We also find that the probability of false negative reporting, that is an individual not reporting to have chronic hypertension when in fact they have it, is significantly higher for individuals living in low income households. Given the wide use of such self-reported chronic health conditions in applied research, and the asymptomatic nature of many major illnesses such as hypertension, diabetes, heart disease and cancer at moderate and sometimes very elevated levels, we show that using commonly available self-reported chronic health measures is likely to lead to an underestimate of true income-related inequalities in health. This has important implications for policy advice.

This paper examines the probability of a recent university graduate obtaining full-time employment by degree of study. It allows for degree choice to be endogenous (self-selection bias) and adjusts for those graduates not in the labour force who are not typically considered in graduate outcome studies (sample-selection bias). The self-selection problem is able to be identified by using a unique data set that combines data from the 2005 and 2006 Australian Graduate Destination Survey with data from the University of Tasmania’s (UTAS) student administration database, which includes students’ pre-tertiary school results. Degree choice is modelled using a Nested Logit, while labour force participation is modelled using a Probit. Using a ‘Heckit’ type methodology, the Inverse Mills Ratios (pseudo-residuals) from the Nested Logit and the modified Inverse Mills Ratios from the Probit are included in the final Probit model for Employment. Both correction terms are statistically significant at 5% in the employment probability equation. Allowing for self selection significantly reduces the probability of employment for accounting, architecture, engineering and economics/finance graduates by 6%, 9%, 10% and 5% respectively, suggesting that better students select these degrees at UTAS. Correcting for sample selection reduces the probability of employment for the average student from 80% to 70%, indicating that UTAS graduates who choose to enter the labour force have a higher probability of being employed than those who pursue additional/alternate study.
In this paper we investigate the effect of using a home computer on children’s development. In most OECD countries 70% or more of the households have a computer at home and children use computers quite extensively, even at very young ages. Yet, little is known about the effect of computer usage on children’s cognitive and non-cognitive skills. Time spent using a computer can affect skills because of the way children use the computer, i.e. content, because computer time inevitably displaces other activities, and because most software requires interaction and is therefore intellectually stimulating. We use data from the Longitudinal Study of Australian Children (LSAC), which follows an Australian cohort born in 2000. Skills and computer usage information is collected when children are approximately 5 and 7 years old. For cognitive skills, our results indicate that computer time has a positive effect. The effect is large relatively to other inputs, such as child care, and is not shared by other media devices, such as television and video games which instead show a negative effect. For the non-cognitive skills the evidence is more mixed, with the direction of the effect depending on the score and the age of the children. We test the robustness of our results using OLS, IV and Value Added estimators. Generally, the IV estimates are larger and the Value Added estimates lower than the OLS ones. However the pattern of result is quite consistent.

We construct up to date estimates of earnings premia for workers with a post-secondary education in Australia over time. These premia have remained strikingly stable over the 1981 to 2003-04 period. The stability of education earnings premia observed may be due in part to changes in the credentials earned by individuals entering certain professional occupations during the 1980s and early 1990s, particularly for females. We provide an estimate of the potential effect that credential changes may have had on estimates of education earnings premia in Australia over time. The focus is on credential changes within the nursing and teaching professions, which now predominantly require a university bachelors degree or higher, but lower levels of education were sufficient in the past.
Paper ID: 48.1
Title of Paper: Cyclical Earnings Variation and the Composition of Employment
Authors: Hyslop D ¹, Mare D ²
  ¹ Department of Labour, ² Motu Economic and Public Policy Research
Presenter: Hyslop D
Abstract:
During the current economic upswing in New Zealand, employment growth was more than 20 percent and average real wages by around 9 percent between 1999 and 2007. We use Statistics New Zealand’s Linked Employer-Employee Database (LEED) to assess the extent to which employment growth favoured low-skilled and low-paid workers, thus changing the composition of the workforce and affecting average earnings growth. Similarly, we examine whether the composition of firms also changed and affected average earnings growth. Our analysis adopts a linear regression model for log(FTE annual earnings) that controls for observable worker demographic and aggregate male and female time effects, and also controls for the effects of constant unobserved worker and firm specific factors. Compared to the 9 percent measured increase in real earnings, we estimate that average real earnings would have increased by 15 percent in the absence of changing composition of workers and firms. The 6 percent difference is due to a 5 percent decline in the average earnings premiums associated with workers, and a 1 percent decline in average earnings associated with firms. About 60 percent the decline in worker effect is attributed to new entrants, and 25 percent to existing lower-paid employees working more hours. The decline in firm effects was more than fully due to new firms entering production having lower earnings premiums than those of existing firms, and is partly offset by an increase in employment by firms with higher earnings premiums.

Paper ID: 48.2
Title of Paper: Relative Income Position, Reference Groups, and Performance
Authors: Schaffner M ¹, Torgler B ¹, ², ³
  ¹ The School of Economics and Finance, Queensland University of Technology,
  ² Center for Research in Economics, Management and the Arts, Switzerland,
  ³ CESifo, Germany
Presenter: Torgler B
Abstract:
It is generally taken that people care about their absolute income position. Beyond this, a number of studies have shown that people also place considerable significance upon their relative income position. Empirical evidence about the behavioral consequences of this is scarce. This paper tries to reduce this shortcoming by exploring the relative income effect in a (controlled) sporting contest environment. Specifically, we look at the pay-performance relationship working with NBA data using a large number of seasons. We explore in detail several potential reference groups for the players to check their relevance and the scope in which such comparisons take place. This is a critical aspect in the literature that requires further investigation.

Paper ID: 48.3
Title of Paper: Wage Gaps in the New Zealand Labour Market
Authors: Genç M ¹, Smith M ²
  ¹ University of Otago, ² University of Aberdeen
Presenter: Genç M
Abstract:
Using data from the Statistics New Zealand’s 2003 CURF (Confidentialised Unit Record File) data set, we estimate wage regressions taking account of sample selection bias arising from the exclusion of individuals with no market income. We use the ‘copula approach’ in the specification of sample selection models. We find evidence of a statistically and economically significant female/male differential. Ethnicity, however, is found to matter for certain groups only, not for Maori.
The improvements in the reporting and maintenance of data sets containing spatial and temporal domains as well as powerful computers have opened the way for Spatial-Temporal (ST) models and estimation techniques in many disciplines. In this paper we compare a Spatial Temporal Linear Model (STLM) proposed in the literature to forecast real estate prices to a Spatial Errors Model (SEM) cast in state-space form (SSSEM). We explore in detail the incorporation of the time and spatial information in the estimation of the parameters of both models. We derive analytical expressions that show how the spatial and time information are handled in the estimation of the hedonic parameters in each case. The estimates from the STLM and from the Kalman Filter of the SSSEM account for spatial correlation of contemporaneous and past sales, although the relative weighting of information differs. This is not the case for the Kalman smoothed estimates. The fixed time estimates from STLM are expected to be close to the average of the time-varying estimates produced by the Kalman Filter over the same time period. We illustrate both methods with a sample from Brisbane, Australia for the period 1985-2005. This is a severe draw back considering the usual size of real estate data sets. A comparison of prediction performance indicates the RMSE of the SSSEM based predictions is considerably lower than those obtained from STLM.

We apply multivariate statistical methods to a large dataset of Singapore’s macroeconomic variables and global economic indicators with the objective of forecasting business cycles in a small open economy. The empirical results suggest that three common factors are present in the time series at the quarterly frequency, which can be interpreted as world, regional and domestic economic cycles. This leads us to estimate a factor-augmented vector autoregressive (FAVAR) model for the purpose of optimally forecasting the key macroeconomic and sectoral aggregates of Singapore. By taking explicit account of the common factor dynamics, we find that iterative forecasts generated by this model are significantly more accurate than direct multi-step predictions based on the identified factors as well as forecasts from univariate and vector autoregressions.

The value of a point forecast can be increased by supplementing it with some measure of uncertainty. Interval and density forecasts are considered an important part of the communication from policymakers to the public. While it is now established that the combination of individual forecasts may help to form a better consensus forecast when it comes to point forecasting, a similar conclusion has not been reached in the literature on density forecasting. In this paper we empirically evaluate competing approaches for combining density forecasts. We compare combinations of density forecasts for CPI inflation using a suit of linear forecasting devices and various VARs with moving estimation windows to account for structural change. Three different data sets for the US, the UK and Norway are used. We find that several combination schemes improve over selecting the best model throughout the three data sets. Thus, it is safe to combine predictive densities. Furthermore, we find that some combination schemes that work well in point forecasting cannot be recommended for density combination.
Access and veto rights are alternative instruments to foster incentives in an incomplete contracts setting. When both are required ownership is optimal. Considering the governance features of debt and equity, we view (secured) debt as the allocation of veto rights by an entrepreneur to an investor, while equity corresponds to the allocation of access rights. The model rationalizes the respective roles of debt-holders and equity-holders. Debt-holders should have veto on the entrepreneur’s asset to prevent him from investing on substitutable projects. While equity-holders should have access to increase their incentives to invest. Overall our framework highlights the complementary and independent roles of debt and equity for the concerned parties: equity is an incentive device for investors while debt is a disciplining device for entrepreneurs. We find out that debt is optimal when the entrepreneur has low marginal productivity and the asset is highly substitutable at the margin, whereas equity financing is optimal when the agent has high productivity and the asset is always complementary at the margin to the financial asset. Independent assets should be financed by retained earnings, differentiated assets by equity and idle assets by debt. Owners of intangible assets should finance their projects with retained earnings or minority equity, while owners of human assets should finance them with retained earnings or debt. Using the same framework, we analyze the determinants of capital structure and study the link between R&D intensity and financing choices, and the role of venture capital in financing an entrepreneur’s business.

Since Modigliani-Miller (1959) and their irrelevance theorem, many scholars have tried to find explanations to the capital structure of the firm and in particular the choice between debt and equity. Several theories have emerged, in particular the trade-off theory, based on cost-benefit analysis of debt and dividends, the free cash-flow theory (Jensen & Meckling, 1976) based on agency costs, and the pecking order theory (Myers, 1984) based on asymmetric information. This paper proposes a theory based on the allocation of rights. We consider the governance features of debt and equity, and their respective incentive effects on all the agents involved: the managers and the lenders. (Secured) debt is characterized by contractual constraints and a pre-emptive role but no intrusion (Williamson, 1996) and thus corresponds to the allocation of veto power on the assets of the firm to the debt-holder (the borrower renounces to its veto power by pledging the assets). On the other hand, equity is characterized by a residual claimant role and extensive intrusion (Williamson, 1996) and thus corresponds to the allocation of access to the equity-holder (who gets income rights). We define the concept of focus effect (focusing on fewer investment opportunities may increase the marginal product of investment) and find that equity is more efficient than debt (in terms of total welfare) when the marginal productivity of the productive agent with her physical asset is higher than the focus effect. In an incomplete contract setting, we show the following results. If the financial asset is always complementary (at the margin) to the physical asset and the productivity of the firm with its physical asset is higher than the focus effect, it should raise equity (i.e. give access to the financial investor). But when its productivity becomes lower than the focus effect, the financial investor should take full ownership. If the physical asset is always substitute at the margin (even in presence of the financial asset) to other assets and the productivity of the firm is lower than the focus effect, it should raise debt (i.e. give veto to the financial investor). But if its productivity is higher than the focus effect, the firm should finance its investments by itself (i.e. retained earnings). The intuition is the following. When the financial asset is complementary (at the margin) to the physical asset in presence of other assets, giving access on the physical asset to the financial investor will increase its incentives and its marginal productivity without decreasing the marginal productivity of the productive agent (they both are residual claimants). Moreover it will increase the incentives of potential additional investors. Thus it is efficient from a welfare point-of-view. On the other hand, when the physical asset is substitute (at the margin) with other physical assets even in presence of the financial asset, the incentives of the productive agent may be reduced. Giving veto to the financial investor will prevent the productive agent to make investment in substitute assets. In other words, the debt, by creating a strain on the firm’s cash flow, prevents the productive agent to engage in hazardous investments. The model rationalizes the respective roles of debt-holders and equity-holders. Debt-holders should have veto on the physical asset to prevent managers from merging substitute assets (from investing on too many projects). While equity-holders should have access to increase additional investors’ incentives to invest. Overall our framework highlights the complementary and independent roles of debt and equity for the concerned parties: equity is an incentive device for investors while debt is a disciplining device for managers. This interpretation of our model provides a rationalization of the free cash-flow theory, which states that debt is the solution to force managers to pay out cash rather than investing in hazardous or unprofitable projects. Our interpretation is also similar to a ‘debt is hard, equity is soft’ formulation a la Dewatripont and Tirole (1994), Hart and Moore (1990b), or Berkovitch and Israel (1996). Using the same framework, we also study the link between R&D intensity and financing choices, and the role of venture capital in financing an entrepreneur’s business.
I investigate when and how principals can use external experts to monitor agents when agents control information necessary for monitoring. In particular, I provide a theoretical model to examine in what circumstances external experts can assist boards of directors in discharging their management oversight and investment approval duties. Management controls relevant information about an investment but may not have the ability to process it to make an informed recommendation. External experts have the ability, but may not enjoy access to this information. I demonstrate how using experts to certify management recommendations affects the disclosure incentives of management. Because certification serves as a signaling mechanism, when managers have the incentive to truthfully reveal all that they know, certification mandates are unnecessary since managers will choose to seek out second opinions. When information disclosures cannot be easily verified, certification mandates can be counterproductive, elevating the status of costly second opinions that always agree with management recommendations. In the absence of incentives for truthful disclosure, it is better for boards to allow management to determine when to seek second opinions, or alternatively, if second opinions are required to allow management and advisors to pool their recommendations.

For countries in the process of development, it is commonly observed that the pattern of Foreign Direct Investment (FDI) varies over time. Previous trade literature has failed to develop a unified treatment of inward and outward FDI position of each country leading to a single measure of integration in the global FDI network. A novel analysis of national-level FDI flows reveals four clear phases in the relative strength of every country’s roles as Host and Parent of FDI before a ‘steady state equilibrium’ is reached. We term this 4-stage dynamic transformation the ‘FDI Chain’. The aim of the present paper is two-fold. First, we provide evidence on the existence of the sequence of stages proposed using data on FDI flows for 189 countries over the period 1970-2006, and develop the necessary framework to empirically identify the one each country is at any specific point in time. Second, we develop consecutive logit models to test factors motivating the process. We show that market and trade growth increases significantly the probability of transition through the initial stages of the Chain, although only a significant advantage in productivity and technology can motivate transitions to the final stages of integration in the global FDI network. The expansion of the global FDI network in geo-space resulting from this dynamic process points also at a number of issues for future research.

This paper develops a reciprocal dumping model of international trade with heterogeneous firms and endogenous R&D to examine how trade liberalization affects firm and industry productivity, as well as social welfare. We identify two effects of trade liberalization on productivity: a direct effect through changes in R&D investment, and a selection effect due to inefficient firms leaving the market. We show how these effects operate in the short run when market structure is fixed, and in the long run when market structure is endogenous. Among the robust results that hold for any market structure are that trade liberalization (i) increases (decreases) aggregate R&D for low (high) trade costs; (ii) increases expected firm size if trade costs are high; and (iii) raises expected social welfare if trade costs are low.
This paper explores whether the efficacy of foreign exchange interventions hinges not only on the firmness of signals but also on expectation heterogeneity among traders. We empirically show that announced interventions significantly affect the level and reduce the volatility of the yen/dollar rate when traders expectations of future exchange rate are relatively heterogeneous. We then explain the evidence by demonstrating a noisy rational expectations equilibrium model in which asymmetric information across agents leads to a misalignment of exchange rate from the fundamental value and, even though the monetary authority has no more accurate information than investors, intervention signals help to wipe out the bubble by enhancing the accuracy of informed traders information on the future exchange rate. This model is consistent with our finding that intervention announcements are more effective in a high implied volatility period.

How do exporting firms manage currency exposures? We examine this issue at the firm level, testing whether NZ exporters to Australia hedge currency exposures by hedging exports denominated in Australian dollars (AUD) into New Zealand dollars (NZD), and/or by denominating exports in NZD. We use Statistics New Zealand’s prototype Longitudinal Business Database covering virtually all NZ firms. To this, we link survey and administrative data enabling construction of firm-level financial variables. Customs merchandise trade data linked to firms provides the currency that each trade was conducted in, a variable indicating whether the trade was hedged into NZD and, if so, the exchange rate of that contract. Our dataset covers 38,000 firm-month observations on exporters’ currency hedging decisions (drawn from over 600,000 firm-month observations on exporting and non-exporting firms’ activities) over July 2000 - March 2007. We use these data to test both optimal and selective hedging theories. Optimal hedging theory hypothesises that firms’ hedging decisions depend on: probability and cost of financial distress, tax rules, underinvestment risks, scale, and institutional factors. We construct longitudinal measures for these variables and find that hedging increases where: firms have high growth prospects, when they are in a tax-loss situation, have a fragile balance sheet, and/or have undiversified trade/currency exposures. Recent literature also suggests that some exporters vary hedges relative to their optimal position in a selective attempt to ‘beat the market’. Consistent with this conjecture, we find that exporters’ hedges vary inversely with the level of the AUD/NZD (relative to its historical average).

Using daily stock market data, we examine short term exchange rate exposure for New Zealand firms, allowing for an asymmetric response to changes in the exchange rate. Unlike previous studies, which typically use monthly data, we categorise periods of appreciation and depreciation in five bilateral exchange rates, and an index, using the underlying trends in the rates. To a large extent, the sign on the exposures are predictable, based on categorisation of firms as importers or exporters.
Paper ID: 54.1
Title of Paper: Background Risk and Household Portfolio Choice: Bayesian Analysis of a Generalized Selection Model
Authors: Stavrunova O, Yerokhin O
University of Technology Sydney
Presenter: Stavrunova O
Abstract: This paper studies determinants of household portfolio decisions using recent data from Australia. A flexible econometric approach based on the finite mixture of normals sample selection model is used to analyze jointly the decision to participate in the market for risky assets and how much to invest in such assets. To study factors influencing these decisions the paper derives expressions for marginal effects of covariates in the mixture of normals sample selection model and evaluates their posterior distributions. We find that in our sample the mixture model outperforms normal model according to the marginal likelihood criterion, and that up to five mixture components are required to approximate the joint distribution of errors in the sample selection model. Results based on the preferred mixture model show that household characteristics and background risk variables have significant effect on participation decision, while having moderate predictive power with respect to the share of wealth invested in risky assets. The paper also demonstrates that relatively modest participation cost can rationalize prevalence of non-participation in the market for risky assets, with the cost in the range of 500-700 dollars explaining 90% of non-participation in our sample.

Paper ID: 54.2
Title of Paper: Posterior Distributions for Welfare Changes in Agricultural Commodity Markets
Authors: Bialowas A, Griffiths W
University of Melbourne
Presenter: Griffiths W
Abstract: The agricultural economics literature has devoted a great deal of attention to assessing welfare changes that result from policy changes and shocks in commodity markets. Examples of interest are whether producer levies should be used to fund product advertising that increases demand or research that leads to technological change, and the effect of health scares or other changes in international markets. Welfare changes have typically been measured using changes in producer or consumer surplus or by the concepts of equivalent and compensating variation. Such measurement requires assumptions about elasticities or the nature of supply and demand curves or the estimation of such curves. Whether one proceeds by assumption or by estimation, in both cases there will be uncertainty about key parameters and consequently uncertainty about the magnitude of any welfare changes. This uncertainty has been assessed directly or via simulation from prior subjective densities placed on parameters to reflect the uncertainty. In this study we use posterior density functions, obtained by combining prior information with sample observations on variables in demand and supply models. A dynamic two-equation model for the demand and supply of Australian lamb is used to illustrate the methodology. The dynamics, introduced through lags in the supply equation, mean that any shock to the system will result in both short-run and long-run changes in producer and consumer surplus. In addition to the equilibrium change, we derive expressions for changes in consumer and producer surplus after each time period. Posterior densities for these changes are derived.
Hard drug use inflicts considerable harm on drug users and society. The gateway effect suggests that the initiation pattern commonly found in empirical studies, with cannabis use preceding hard drug in most individuals, is due to a causal linkage between cannabis and subsequent hard drug use. The previous literature has focused on the gateway effect, finding mixed evidence that the use of cannabis increases the probability of using a hard drug later on. Influenced by the "gateway hypothesis" strict penal sanctions towards cannabis has been one important policy response to discourage the uptake of drugs. There are, however, other possible explanations for the observed higher probability of hard drug use among cannabis users. First, hard drugs may be more accessible (economic, cultural and/or physical) to cannabis users than to others. Second, a common proneness against deviant behaviour may lead some to consume illicit drugs, and cannabis is just used prior to others because it is cheaper and more readily available. Excessive drug use is then viewed as one out of many possible responses to unfavourable genetic endowments or traumatic childhood experiences. The goal of this paper is to analyse the relative importance of the gateway, proneness and accessibility effects in explaining the increased probability of hard drug initiation among cannabis users. Our paper uses a unique survey of young adults in Norway from the Norwegian institute for alcohol and drug research (SIRUS). We analyse the cannabis and hard drug initiation pattern of the sample subjects in a suitable Bayesian estimation framework that is tailored to the problem. The Bayesian predictive approach is then used to estimate probability of hard drug uptake among cannabis users and non-users and to assess the relative importance of the gateway, accessibility and proneness effects in explaining the hard drug initiation. Our extensive empirical analysis provides evidence for all three effects.

This paper introduces a form of boundedly-rational inflation expectations in the New Keynesian Phillips curve. The representative agent is assumed to behave as an econometrician, employing a time series model for inflation that allows for both permanent and temporary shocks. The near-unity coefficient on expected inflation in the Phillips curve causes the agent's perception of a unit root in inflation to become close to self-fulfilling. In a 'consistent expectations equilibrium,' the value of the Kalman gain parameter in the agent's forecast rule is pinned down using the observed autocorrelation of inflation changes. The forecast errors observed by the agent are close to white noise, making it difficult for the agent to detect a misspecification of the forecast rule. I show that this simple model of inflation expectations can generate time-varying persistence and volatility that is broadly similar to that observed in long-run U.S. data. Model-based values for expected inflation track well with movements in survey-based measures of U.S. expected inflation. In numerical simulations, the model can generate pronounced low-frequency swings in the level of inflation that are driven solely by expectation feedback, not by changes in monetary policy.
Paper ID: 55.2
Title of Paper: Understanding the Flattening Phillips Curve
Authors: Robinson T \(^1\), Kuttner K \(^2\)
\(^1\) Reserve Bank of Australia, \(^2\) Oberlin College, USA
Presenter: Robinson T

Abstract:
This paper’s objective is to understand, in the context of “New Keynesian” macroeconomic theory, why the observed response of inflation to output fluctuations has diminished. In this framework, a reduction in the sensitivity of inflation to output may result either from a change in the relationship between the output gap and real marginal costs, or from a change in the linkage between costs (or more precisely, expectations of future costs) and inflation. This approach will allow us to determine whether the flattening is a structural phenomenon, or merely an artefact of the reduced form, due, for example, to a change in expectations formation.

Paper ID: 55.3
Title of Paper: Evaluating the German (New Keynesian) Phillips Curve
Authors: Scheufele R
Halle Institute for Economic Research (IWH)
Presenter: Scheufele R

Abstract:
This paper evaluates the New Keynesian Phillips Curve (NKPC) and its hybrid variant within a limited information framework for Germany. Our main interest rests on the average frequency of price re-optimization of firms, which can be estimated by nonlinear regression techniques. Therefore, we use the labor income share as the driving variable and conduct a GMM estimation strategy as proposed by Galí and Gertler (1999) and Galí, Gertler and López-Salido (2001). We also consider a source of real rigidity by allowing for a fixed firm-specific capital stock. Furthermore, we expand the basic empirical framework by several tests to check the robustness of the NKPC specification. This also includes a procedure that is robust to weak instruments. We find out that the German Phillips Curve is purely forward looking. Moreover, our point estimates are consistent with the view that firms re-optimize prices every two quarters. While these estimates seem plausible from an economic point of view, the uncertainty around these estimates are very large and also consistent with perfect nominal price rigidity where firms never re-optimize their prices. In contrast to previous studies, we do not detect problems with weak identification, but we do find some evidence that the model might be misspecified.

Paper ID: 56.1
Title of Paper: Business Expenditure on Research and Development in New Zealand – Future Potential and Future Industries
Authors: Williams J, White R
Ministry of Research, Science and Technology
Presenter: Williams J

Abstract:
Studies of business expenditure on R&D (BERD) are important because BERD supports firms’ technological progress that is the only sustainable way to a nation’s long-term productivity growth, which is essential for its long-term international competitiveness.

The gap between our BERD intensity – at 0.49% GDP and that of 1.53% for OECD nations taken as a whole – is large and this suggests New Zealand experiences substantial competitive disadvantages.

To investigate these competitive disadvantages, in this study: (i) we update our previous estimates for the country-specific and firm-specific components of the BERD intensity gap; (ii) we re-estimate the gap and its components using estimates of industry-level purchasing power parities as a proxy for purchasing power parities for R&D input costs; and (iii) we report and discuss the industry-level sub-structure of the gap components.

In conclusion we recommend the use of the gap, its components, and their industry-level structure, as useful indicators to monitor changes in BERD intensity over time relative to other nations. We provide examples of such application in the context of recent policy initiatives in New Zealand. Our results demonstrate how the BERD intensity gap for New Zealand and other nations is dependent on estimates of industry-level prices for R&D inputs in nations. Interestingly, this suggests that a nation’s international competitiveness due to BERD is itself influenced by the competitiveness of the business of performing R&D.
Title of Paper: Evaluating Government Business Assistance Programmes Multi-product Exporters and Product Switching Behaviour of New Zealand Firms
Adalet M
NZ Treasury
Presenter: Adalet M
Abstract: Using a unique dataset that covers all exporting firms in New Zealand from 1997 to 2007, this paper analyzes the patterns of their product mix, how it changes over time and how this relates to firm characteristics. We suggest that looking at the relative importance of added and dropped products is as important as firm entry/exit in reallocation of resources. We find that product switching occurs frequently. It is also shown that dropping products is more likely to happen than adding products, suggesting the difficulty of entering new markets/products. We also show that products with a smaller share and tenure are more likely to be dropped by a firm. Finally, the link between volatility of earnings and the choice of product mix suggests that single product exporters are more stable. The results make a good case for product-firm characteristics being an important part of export decisions and suggest that more work should be done on this link.

Authors: Fabling R 1,2
1 Reserve Bank of New Zealand, 2 Motu Economic & Public Policy Research
Presenter: Fabling R
Abstract: This paper tests the feasibility of using a microeconometric model to construct a consistent measure of Business Expenditure on Research and Development (BERD) over time. This approach is motivated by an attempt to compensate for changes to survey-design that make it difficult to interpret recent growth in research and development (R&D) – a key economic indicator of the innovativeness of the economy. We begin by estimating a two-stage selection model of the determinants of R&D investment decisions for private-for-profit firms in New Zealand. The first stage yields estimates of whether a firm performs R&D, while the second stage estimates R&D intensity taking into account the determinants of the decision to make the investment. Using Statistics New Zealand's prototype Longitudinal Business Database, we are able to consider a wide range of potential determinants of R&D activity including ownership, industry, balance sheet structure and prior performance. After appraising the appropriateness of the R&D model, we use it to predict expected R&D expenditure for the population of firms and, from this, derive a time series for aggregate BERD.
Title of Paper: Migration and Trade in a World of Technological Differences: Theory with an Application to Eastern-Western European Integration
Authors: Iranzo S
Universitat Rovira Virgili
Presenter: Iranzo S
Abstract:
Trade and migratory flows between industrializing and industrialized countries have been two prominent features of globalization in recent decades. Due to restrictive laws in the receiving countries and high migration costs, the increase in international migration has involved mainly highly educated workers. During the same period, technology in developed countries has become progressively more skill-biased, increasing the productivity of highly educated workers more than less educated workers. This paper extends a model of trade in differentiated goods to analyse the joint phenomena of migration and trade in a world where countries use different skill-specific technologies and workers have different skill levels (education). We calibrate the model to match the features of the Western European countries (EU-15) and the new Eastern European members of the EU. We then simulate the effects of freer trade and higher labor mobility between the two regions. Even in a free trade regime the removal of the restrictions on labor movements would benefit Europe as a whole by increasing the GNP of Eastern and Western Europe. Interestingly, we also find that the resulting skilled migration (the so-called 'brain drain') from Eastern European countries would not only benefit the migrants but, through trade, could benefit the workers remaining in Eastern Europe as well.

Paper ID: 57.2
Title of Paper: Workforces on the Move: An Examination of Commuting Patterns to the Cities of Auckland, Wellington and Christchurch
Authors: Goodyear R
Statistics New Zealand
Presenter: Goodyear R
Abstract:
In the last 20 years, a combination of factors such as high house prices and the desirability of small town and rural lifestyles have resulted in the development of more flexible and varied commuting patterns. There has been a transformation in the New Zealand countryside with the development of lifestyle blocks around cities and the extension of coastal communities. This development has led to a significant shift in the characteristics of the rural population, as areas close to cities became increasingly linked to urban areas. Smaller towns close to cities have also expanded as people have chosen to move there for reasons of cost and lifestyle. The impact of these decisions has had major implications for transport systems and affects community resources and cohesion. Although these developments have occurred throughout New Zealand, they have had the most visible effect in the Auckland region, which has experienced the largest numerical increase in population, but have been replicated to some extent in Wellington and Christchurch. This paper explores and compares commuting patterns around the largest cities in New Zealand: the four cities of Auckland (the Auckland metropolis), Wellington and Christchurch cities. While focusing on information from the 2006 Census, this paper will also include an historical perspective, examining the change in the proportion of people commuting to these cities. This census data will be combined with information from the 2007 Survey of Dynamics and Motivation for Migration in New Zealand. This paper explores the relationship between educational qualifications, employment and income patterns, and the commuting patterns of the population.
Paper ID: 57.3
Title of Paper: Network Effects on Domestic Migration Flows Across Germany – A Spatial Autoregressive Perspective with Spatially Structured Origin and Destination Effects and Heteroskedastic Innovations
Authors: Zimmer M
Centre for Economic Studies at the University of Munich
Presenter: Zimmer M
Abstract:
Domestic migration accounts by far for the major proportion of total migration in Germany. While cross-country migration has been intensively investigated in the literature we address the less prominent issue of regional migration in this paper. In our model we study the spatial interaction between German districts in order to explain the domestic flows of migration. Recently empirical research emphasises that beside an increase in expected earnings, network effects seem to have the strongest influence on the decision to migrate. Social networks rise expected income by increasing the employment probability. They also lower migration costs by reducing the fear of loosing social integration. They decrease the search costs and the amount of uncertainty by increasing circulation of information. These networks can either be established formally established, like in the case of relatives or informally, by linking the migrants through a common regional background. We analyze the migration between the 439 administrative districts in Germany. We show that networks have a strong significant impact on migration flows. We explore the differences in the migration-behaviour depending on the gender or nationality of the migrant. We identify strong influences of amenities and of traditional origin and destination characteristics. Our extension of the log-linear specification of the gravity model by spatial lag structures requires adequate econometric methods to account for spatial autocorrelation. We extend the model of Kelejian and Prucha (2008) to a second order process in both, the spatial endogenous lag and the autoregressive disturbance. Thus we are able to separately analyze origin and destination effects on bilateral flows of migration.

Paper ID: 58.1
Title of Paper: The Effects of a Minimum Wage Increase in a Model with Multiple Unemployment Equilibria
Authors: Beugnot J
LAMETA
Presenter: Beugnot J
Abstract:
The purpose of this paper is to analyze the effects of an exogenous rise in the legal minimum wage on the unemployment equilibrium, the general price level and the wage dispersion in the context of multiple equilibria model. To do so, we extent the imperfectly competitive model “à la Manning (1990)” by introducing the heterogeneity of labor and we assume the presence of “knowledge spillover” in the individual production function giving a theoretical support to increasing returns to scale at the aggregate level. Then, we show that different equilibrium cases can occur according to the size of knowledge spillovers in the economy: two equilibria or no equilibrium. We focus our analysis on the case of multiple equilibria. Next, we run a static comparative exercise in order to analyze the effects of an economic policy increasing minimum wage. As a result, we find that it has no impact on the unemployment equilibrium, reduces the purchasing power of the high-skilled workers due to an increase in the general price level of the economy and reduces the wage dispersion. All these results hold whatever the nature of the equilibrium which is reached by the economy. Our findings are broadly consistent with those of Card and Krueger (1995). As in our model, theirs studies conclude that a rise in minimum wage does not imply a necessary increase of unemployment, increases the price of good produced by low-skill industry and involves a reduction in overall wage dispersion.
This paper examines the effects of the distribution of unemployment by duration on the level of unemployment. It explores one central assumption that is observed empirically: when the share of long-term (short-term) unemployed increases, the unemployment rate increases (decreases). By embodying this assumption in a standard equilibrium unemployment model we characterize the joint behaviour of unemployment and the distribution of unemployment by duration. In the theoretical part of the paper an extension of the standard equilibrium unemployment model is provided where the average job finding probability depends on the distribution of unemployment by duration. In the empirical section we estimate a panel data model for 16 OECD countries to test the implications of the theoretical model. The main results are: First, in a steady state equilibrium the flow rates are larger, the larger the share of short-term unemployed. Second, out of steady state the unemployment rate increases (decreases) with the share of long-term (short-term) unemployed. Third, the larger the duration dependent job finding probabilities the larger the share of short term unemployed. Fourth, panel estimates for 16 OECD countries provide robust and significant evidence that an increase in the share of short-term (long-term) unemployment decreases (increases) the unemployment rate. Therefore, the empirical evidence supports our hypotheses whereby (a) the reemployment probability decreases with an increasing spell of unemployment and (b) average exit rates have international differences. Hence, the different experiences with unemployment on both sides of the Atlantic can be explained by observed aggregated duration dependence and differences in the average exit rate.
At the time of writing, the two coauthors of this article are teaching Economics in Aix-en-Provence and Marseilles. In April 2006, the French Government created a new labor contract targeting the youth. This contract was named the Contrat Première Embauche, or CPE for short. The main purpose of the CPE was to reduce the cost of administrative procedures related to dismissals for jobs occupied by young workers. Student unions have advocated against such proposal, and they have been followed by massive cohorts of students. All these young people have demonstrated in the streets, they have occupied the faculties and so on. To many observers, most of them foreigners, these demonstrations were a pure illustration of the ideological bias of the French society as a whole: students demanding and obtaining the abandonment of a law that was supposed to improve their economic perspectives. In this paper, we consider another explanation to the behavior of the French students. This explanation is based on housing market imperfections and their impacts on the willingness of people to adopt a legislation that secures jobs.

Indeed, we suggest that housing market regulations (HMR) originate a social demand for employment protection legislation. Our argument is based on the following mechanism. Imperfections on the mortgage market as well as imperfections on the rental market imply that the access to housing market and/or the price of housing depend on job security. We examine this argument in three steps. First, we present aggregate evidence suggesting that EPL is related to HMR. Hence, we confront the OECD index of strictness of EPL on regular contracts to various measures of imperfections on the housing market. Second, we develop a very simple framework that allows to discuss the social demand for EPL in an environment with HMR. We also discuss feedback effects from EPL to HMR and emphasize the scope for institutional complementarity. Third, we elaborate on policy complementarity and offer a dynamic framework that allows to think about the joint determination in EPL and HMR. This model makes strong predictions concerning cross-country heterogeneity in the two institutions and within-country time correlation between changes in the two institutions.

Why is this important? Our paper has two main motivations. On the one hand, EPL is the cornerstone institution behind the social trade-off between flexibility and security. There is a large cross-country heterogeneity in EPL within OECD countries. Such heterogeneity broadly mirrors the distinction between flexible Anglo-Saxon countries, and sclerosed continental Europe. In this paper, we argue that this heterogeneity partly reflects the diversity in HMR. On the other hand, many economists have advocated in favor of reforming EPL in continental Europe. Such claims have been followed by large changes in EPL on temporary contracts (mainly hiring restrictions have been softened), but almost no changes in EPL on regular contracts (but Spain). Our paper suggests that the labor market reform should not be made without a simultaneous reform of the housing market. At least, those who are supposed to benefit from the labor market reform, the youth, would not oppose it because their access to housing would be better.
The literature concentrates on the effect of health and health shocks on labour market participation and offers no evidence regarding reducing working hours after health shocks. Our data shows that for every 1000 employees 112 suffer a health shock every year. Out of those 112, 10% stop work (zero hours), 40% reduce hours and 50% show no change. We estimate the joint effect of health status and health shocks on working hours using panel data on individuals who report their current health status (SRH) and (separately) their recent health shocks. We use a dynamic random effects Tobit estimation to account for those who work zero hours. We adopt Heckman's method (1981) to control for initial conditions. We use predicted individual health stocks to ameliorate the effects of measurement error and endogeneity. The main conclusions of the paper are that health stock and health shocks have a statistically significant effect on working hours, that better health status is associated with longer hours worked, that severe health shocks reduce working hours considerably and less severe ones less so. The dynamic properties of the model are as expected and there are no significant gender differences to report. The main innovation of this paper is that it estimates the joint effect of health and health shocks on working hours.

Although the importance of the elasticity of substitution between capital and labor ($\sigma$) has long been recognized in several branches of economics, it has received very little attention in the growth literature. This paper aims to partly rectify this omission by exploring the growth potential with $\sigma$ as a yardstick and studying how different values of $\sigma$ impact the balanced growth paths in theoretical model. When $\sigma$ is high, the incremental capital is easily substituted for labor, resulting in a nearly equiproportionate increase in both factors. Under constant returns to scale, diminishing returns sets-in very slowly, and the marginal and average products of capital can remain sufficiently large so that output can grow indefinitely. The theoretical model is built upon the work of de La Grandville and Solow (2004) who show that perpetual growth is possible in the Solow (1956) model even without technological progress, if the value of $\sigma$ exceeds a critical value ($\sigma_{cH}$) that is greater than unity. I extend their model to show that the output level, capital stock and consumption follow perpetual decline if $\sigma$ is less than another critical value ($\sigma_{cL}$) that lies between zero and unity. I show that the above result also holds in a model of endogenous saving, and analytically prove that the balanced growth path exists only if $\sigma$ lies between two critical values--$\sigma_{cL}$ and $\sigma_{cH}$. I calibrate the critical value of $\sigma$ from data for each country. These values are then compared to estimated elasticity of substitution ($\hat{\sigma}$) from time series data. A number of countries, mainly from Africa, have $\hat{\sigma} < \sigma_{cL}$. Average per capita output growth in these countries is either negative or very low. Although many countries have $\hat{\sigma} > \sigma_{cH}$ indicating bright growth potential, none of them has $\hat{\sigma}$ sufficiently large (i.e., $\hat{\sigma} > \sigma_{cH}$).
Why doesn’t capital flow from rich to poor countries? This paper attempts to shed light on this crucial question by examining the role of capital market imperfections in driving differences in the marginal product of capital (MPK) across countries. The model in this paper builds on the Ricardian trade model of Eaton and Kortum (2002) to derive predictions on the share of world expenditure in capital goods across countries based on differences in the probability that these countries have the highest MPK in the world. In contrast to recent evidence on MPKs across countries, empirical evidence supports the view that capital market imperfections are indeed important in explaining why capital does not flow from rich to poor countries.

This paper reviews some recent international progress in the measurement of productivity, and highlights some of the many remaining challenges. An overview of the methodology used by the Australian Bureau of Statistics is given as an example of international ‘best practice’. A review of remaining challenges includes problems in measuring service sector output, accounting for quality adjustment, misclassification of consumption as business expenses, and environmental accounting.

This paper considers the implications of the permanent/transitory decomposition of shocks for identification of structural models in the general case where the model might contain more than one permanent structural shock. It provides a simple and intuitive generalization of the influential work of Blanchard and Quah (1989), and shows that structural equations with known permanent shocks can not contain error correction terms, thereby freeing up the latter to be used as instruments in estimating their parameters. The approach is illustrated by a re-examination of the identification schemes used by Wickens and Motto (2001), Shapiro and Watson (1988), King, Plosser, Stock, Watson (1991), Gali (1992, 1999) and Fisher (2006).

We address some issues about local and global identification of DSGE models and link these issues to identification in the simultaneous-equation VAR framework.
**Abstract:**
A large theoretical literature shows that competition reduces banks’ franchise values and induces them to take more risk. The key assumption in this literature is that banks invest in assets with exogenous distributions of returns. Boyd and De Nicolo (2005) replace this by the assumption that banks invest in loans. Following Stiglitz and Weiss (1981) they also assume that the risk of these loans is increasing in the loan rate. Hence a reduction in loan rates due to greater bank competition reduces the loans’ probability of default, so banks will be safer. However, this result does not take into account the fact that, when defaults are imperfectly correlated, lower rates also reduce the banks’ revenues from non-defaulting loans that provide a buffer to cover loan losses. Thus in addition to the risk-shifting effect there is a margin effect that goes in the opposite direction. This paper examines several models of imperfect competition (including quantity competition a la Cournot and price competition a la Salop) in a loan market in which a single risk factor drives the correlation of loan defaults. Equilibrium is solved numerically for a large range of parameter values. We show that there is in general a U-shaped relationship between competition (measured by the number of banks) and the risk of bank failure. Thus in concentrated markets the risk-shifting effect dominates, whereas in competitive markets the margin effect dominates.

**Abstract:**
This paper studies how stock price manipulation affects the price formation process and process of information transmission into a market. In asymmetric information models of financial markets, trading behavior imperfectly reveals the private information held by traders. Informed traders who trade dynamically thus have an incentive not only to trade less aggressively but also to manipulate the market by trading in the wrong direction, undertaking short-term losses to confuse the market and then recouping the losses in the future. Manipulation by an informed trader has been a difficult issue in the literature of market microstructure theory. The main contribution of this paper is to prove the uniqueness of equilibrium and characterize it in the canonical model of the literature, proposed by Glosten and Milgrom (1985). In the original Glosten-Milgrom model, manipulation does not occur because traders can trade only once. In the current paper, the informed trader trades dynamically, and in this sense, this paper extends the Glosten-Milgrom model to a dynamic setting. In another aspect, this paper proves the uniqueness of equilibrium which Back and Baruch (2004) assume in their analysis. This paper adds to the literature that brings the canonical model to a dynamics setting and analyzes the equilibrium. This paper also proves that the value functions are strictly monotone and strictly convex; the bid price is strictly convex and strictly increasing; and the ask price is strictly concave and strictly increasing in terms of the market makers’ prior belief. Those analyses provide theoretical support for properties of numerical simulation given in Back and Baruch.
Investors facing restrictions on the portfolios that they can trade, is more of a norm than an exception. We consider a model in which investors’ portfolio sets are constrained, i.e. their participation is restricted. As in Siconolfi (1986), Balasko, Cass and Siconolfi (1990) these constraints are exogenously given (possibly arising due to some institutional reasons). Moreover, we consider very general restrictions on portfolio where each agent’s portfolios set is assumed to be convex and containing zero. This paper primarily examines the characterization of equilibrium asset prices with arbitrage free asset prices, in a multiperiod model when investors face such general portfolio restrictions. In the absence of such portfolio constraints the approach initiated by Cass (1984), has been extensively used to characterize equilibrium asset prices with arbitrage free asset prices. See Cass (1984), Duffie (1987) and Florenzano and Gourdel (1994). Moreover this approach is also useful in showing the existence of an equilibrium. See Magill and Shafer (1991), Florenzano and Gourdel (1994), Magill and Quinzii (1996), Rocha and Triki (2005), Hahn and Won (2003) and Angeloni and Cornet (2006) among others. Another approach to prove existence in a differentiable economy is to show existence in a numeraire asset economy and infer the existence in the nominal asset economy (See Villanacci et al. 2002 and Magill and Quinzii 1996).
This paper examines the effects of demography and other factors on national saving, domestic investment, external (trade and current account) balances. The paper weaves two strands of literature. The first focuses on the effects of demography on national saving, investment, growth and the current account balance. The second focuses on the determinants of current account imbalances. The main difference between them lies in their choice of explanatory variables in the regression models. The first strand of the literature devotes considerable attention to the specification of demography. These studies, however, pay comparatively little attention to international factors. On the other hand, the second strand of the literature, while more parsimonious on demography, is much more elaborate on international factors. Our contribution is to combine these two bodies of literature into a more comprehensive approach. In particular, while the two bodies of literature are increasingly elaborate regarding the content of the numerous regression models, little attention has so far been devoted to the structure of those models. The methodological innovation of the present study is to make use of the national income identities for open and close economies. On this basis, we derive a number of “semi-structural equations” for saving, investment, as well as for the external balances. These open-economy semi-structural equations incorporate the closed, partially open, and completely open economies as special cases. For our empirical analyses, we construct a panel dataset. It comprises national account data, the balance of payments statistics, data on demography as well as data on a number of variables to control for other potentially important factors, such as institutional quality. We find that while the semi-structural equations generate results in agreement with the findings of previous studies, they make noticeable improvement to the explanatory power to the models of external balances as compared with traditional specifications.

We consider a many country endogenous growth model with international trade in complementary capital goods. Countries may impose tariffs on imported capital goods and can enter into preferential trade agreements (PTAs). We analyze the impact of PTAs on economic growth in the long and short run. We characterize long run steady states of the model. These yield a common rate of long run growth for all countries. The long run rate of growth is affected by all symmetries and asymmetries, including trade policy. Levels of endogenous variables can differ across nations even if the long run growth rate is common, and such differences are solved from the model. Asymmetries in trade policy and other exogenous differences are converted into endogenous long run income clubs; countries in such clubs exhibit common long run growth but persistently differ in levels of technology and output. A trade bloc that raises its trade barrier has a negative effect on technology levels of outsiders but retaliation by nonmembers can alleviate losses. Establishment of a PTA lowers long run growth but the effect of an expansion in the PTA on growth is ambiguous. We apply heterogenous learning to generate transition dynamics that yield short run differences in growth across countries. Differences in growth can arise both from structural asymmetries, including trade policy, and heterogeneity in learning. Asymmetric trade policy creates both income and transitory growth clubs (country groups that share short run growth experiences).
Paper ID: 64.1
Title of Paper: Forecasting Euro Area Quarterly Real GDP: Optimal Pooling of Information
Authors: Hülsewig O, Mayr J, Wollmershäuser T
Ifo Institute for Economic Research
Presenter: Mayr J
Abstract:
This paper utilizes short-term forecasts of Euro area real GDP to propose a new method to construct area-wide indicators by pooling the information contained in country-specific indicators. We generate area-wide indicators by adopting non-economic - i.e. optimized - weights instead of economic weights. In an out-of-sample forecast experiment we find that our method improves upon the several alternative forecast methods in terms of forecast accuracy.

Paper ID: 64.2
Title of Paper: Disaggregate Evidence of US Inflation Persistence
Authors: Ravazzolo F ¹, Vahey S ²
¹ Norges bank, ² MBS, RBNZ and Norges Bank
Presenter: Ravazzolo F
Abstract:
The persistence of US inflation has received a great deal of recent research. In particular, recent studies have focused on whether the aggregate level of persistence has changed since the Great Moderation. There are two views on this. The first, typified by Cogley and Sargent (2001, NBER Macro Annual), portrays inflation persistence as having moderated in recent years. Another perspective views the inflation process as fundamentally unaltered, despite the recent moderation in the level of aggregate inflation; for example, see Stock (2001, NBER Macro Annual). A recent study by Clark (2006) examines the disaggregate evidence on US inflation persistence. Mindful of the potential for structural breaks in the time series behaviour of inflation, Clark demonstrates that following a break in aggregate inflation during the early 1990s, persistence fell markedly in the aggregate and across the disaggregates. In contrast to Clark’s earlier work which looks at “average” persistence across disaggregates, this paper examines the evolving predictive densities for inflation persistence. We start by considering an autoregressive model for each PCE disaggregate but allow for breaks of unknown number and timing by utilizing a mixture innovations approach. We use Bayesian Model Averaging to construct predictive densities of the features of interest – in this case the sum of the autoregressive coefficients (SARC) measure of inflation persistence. We show that a number of disaggregate series exhibit multiple breaks in the means and/or the variance. Since the early 1990s, there is considerable evidence in support of bimodal predictive densities for US inflation persistence. Hence, the average level of persistence of inflation exhibited by the disaggregate series misses an important feature of the inflationary process. Given the bimodal nature of inflation persistence across disaggregates, the uncertainty about inflation persistence is greater than indicated by a Gaussian aggregate inflation model.
Paper ID: 64.3
Title of Paper: Transparency and Communication in Monetary Policy: A Survey of Asian-Pacific Central Banks
Authors: Filardo A ¹, Guinigundo D ²
¹ Bank for International Settlements, ² Bangko Sentral ng Pilipinas
Presenter: Filardo A
Abstract:
Over the past decade or so, there has been increased emphasis on transparency and communication in the conduct of monetary policy amongst central banks in advanced industrial and emerging market economies alike. Central banks have long left behind the days when secrecy was the norm and ‘strategic ambiguity’ was seen as a pre-condition for policy flexibility. Despite considerable steps forward, it is widely recognized that there is still room for improvement, and current efforts represent just the latest in an ongoing work in progress. This paper examines recent developments in transparency at Asian-Pacific central banks, reporting results of a new qualitative self-assessment survey of central bank communication practices in the region. The responses provide insights into four key issues of transparency and communication for monetary policy: (1) What information is communicated?; (2) How is the information communicated?; (3) Are there perceived limits to transparency?; (4) What do central banks do to ‘manage’ public expectations? We use a new empirical approach to explore the macroeconomic consequences of how more transparent monetary policy frameworks have acted to shape private sector expectations of inflation and economic activity. We first compute kernel density estimators to track cross-sectional variation in inflation forecasts from professional forecasters for eleven Austral-Asian economies and then use the resulting Kullback-Leibler summary statistics in time-series panel regressions to explore the links to evolving monetary policy regimes. The paper concludes by drawing policy implications for current efforts to enhance transparency further at central banks.

Paper ID: 65.1
Title of Paper: Output-Inflation Tradeoffs with State-Dependent Information
Authors: Balta N
ECARES, Université Libre de Bruxelles
Presenter: Balta N
Abstract:
This paper gives a rational inattention DSGE model that shows how the expectations in the Phillips curve change under imperfect information when the economy is hit only by aggregate shocks or by both aggregate and idiosyncratic shocks in a monopolistic competition setup with strategic complementarity between pricing decisions. Under strategic complementarity, only the presence of both aggregate and idiosyncratic volatility can generate endogenously heterogeneous information. The economy is populated by agents that have to pay a cost to update their information set and become fully aware of all available information. The cost of updating is a state-contingent stochastic variable that has a common component correlated with the volatility of the aggregate variables, and respectively, an idiosyncratic component correlated with the volatility of the idiosyncratic variables. Agents optimally choose when to update the information set by looking every period at the realization of the cost and the expected loss incurred by making forecast errors with outdated information. Both aggregate and idiosyncratic volatility are important for monetary disturbances to have persistent and hump-shaped real effects. In the absence of idiosyncratic shocks, under common knowledge about the cross-distribution of information sets, even if periods of inattention are optimal, firms synchronize their price changes when information is revealed as in Lucas (1972).
Abstract:
This paper estimates the NAIRU and output gap in two small open economies (Czech Republic and New Zealand) in a Bayesian framework. The estimates of these unobserved states are made using two models: simple hysteretic model with adaptive expectations and dynamic (non-hysteretic) rational expectations model. Hysteretic model assumes a well known “law of motion” of the equilibrium unemployment. The results show that the hysteresis is a significant phenomenon in the Czech economy. Similar trajectories of the NAIRU are estimated in both models. On the other hand, effective and credible inflation targeting monetary policy may cause a false indication of the hysteresis as the estimates for the New Zealand economy show. Estimated path of the NAIRU is very sensitive to specification of the prior parameters in this case. We estimated three sets of the paths which are in accordance with the natural rate hypothesis (equilibrium unemployment is constant in time), hysteresis hypothesis (equilibrium unemployment follows the path of actual unemployment), and the theory of NAIRU (time-varying equilibrium unemployment). Fortunately, Bayesian inference allows us to decide which trajectory is the most probable. This may lower the uncertainty related to NAIRU estimation. The paper concludes that most of the decrease in New Zealand unemployment is driven by structural factors compared to Czech experience with hysteresis mechanisms staying behind the decreasing unemployment rate in the last years.

Abstract:
Replacing rational expectations by adaptive learning algorithms complicates the dynamics of economic models. Identification of the structural parameters is improved, but it is weak when the gain parameter is decreasing or small. Inference is further complicated by near non-ergodicity of the data induced by learning. We show that valid inference can be conducted using the Anderson-Rubin statistic with appropriate choice of instruments. Application of this method to the new Keynesian Phillips curve with US data provides evidence against constant gain least squares learning.
Paper ID: 66.1
Title of Paper: Coordination Costs: A Drawback for Research Joint Ventures?
Authors: Poyago-Theotoky J ¹, Falvey R ², Talengrsi Teerasuwannajak K ³
¹ Loughborough University, ² University of Nottingham, ³ Chulalongkorn University
Presenter: Poyago-Theotoky J
Abstract:
We analyze a simple oligopoly model where firms can engage in cost-reducing R&D. We compare two R&D regimes: R&D competition and R&D cooperation where firms can enter in a Research Joint Venture (RJV). We introduce coordination costs for the RJV and examine how these affect the equilibrium outcomes. Further, we examine the question of the equilibrium versus optimal size of the RJV. For a given size of the RJV, its members decrease their own R&D as the anticipated coordination costs increase. This results in lower output and profits. On the contrary, the non-RJV firms increase their R&D investments in response to the fall in the RJV firms. We show that the performance of the RJV in terms of R&D investment, profit and welfare in relation to R&D competition is sensitive to the level of coordination costs. Furthermore, we show that, although the RJV as a whole may no longer conduct a unit of R&D at a lower cost compared to the independent firm under the non-cooperative R&D regime, its members can still make savings on their own R&D expense through information sharing. Finally, we show that not only the equilibrium size becomes smaller as coordination costs increase, but the discrepancy between the equilibrium and optimal sizes is widening. One important message from our analysis is that by ignoring the coordination costs of operating the RJV, the anticipated benefits or success of the cooperative project could have been grossly exaggerated.

Paper ID: 66.2
Title of Paper: Intellectual Property Clearinghouses and Investment in R&D
Authors: Schiff A ¹, Aoki R ²
¹ Hitotsubashi University, ² Hitotsubashi University and University of Auckland
Presenter: Schiff A
Abstract:
We examine the effects of third-party clearinghouses that license intellectual property on behalf of inventors when downstream uses of IP require licenses to multiple complementary innovations. We consider different simple clearinghouse royalty redistribution schemes, and different innovation environments. We show that clearinghouses generally increase incentives to invest in R&D as they increase efficiency in licensing. However, they may reduce expected profits of inventors who have the unique ability to develop a crucial component. We also show that clearinghouses also may increase or decrease expected welfare, and are more likely to be beneficial when R&D costs are relatively high, and/or the probability of success for inventors is relatively low.

Paper ID: 66.3
Title of Paper: Venture Capital Syndication and Termination of Viable Projects
Authors: Fabrizi S ¹, Erkal N ², Lippert S ¹
¹ Massey University Auckland, ² University of Melbourne
Presenter: Fabrizi S
Abstract:
Projects financed by venture capital are often syndicated. Syndication has been advocated to be driven by either a selection hypothesis, or a value-added hypothesis. However, these hypotheses have neglected the possibility for syndication to be driven by the need of reducing competitiveness between otherwise potentially rival projects. To explore this alternative hypothesis, this paper constructs a model where venture capitalists financing projects that are competing to varying degrees decide whether to syndicate and, thus, terminate one of the projects. Venture capitalists take the decision whether to syndicate after a signal about the quality of the projects is observed. We show that if these signals are public, syndication occurs out of competition concerns and viable projects with a good signal will be terminated. This leads to a possible reduction in expected social welfare. We then proceed to show that if signals are private, venture capitalists do not always have incentives to truthfully reveal their signals and, as a result, may syndicate less often. This is likely to lead to welfare improvements over the situation with public signals.
Using data from the Survey of Income and Program Participation (SIPP) this paper studies the durability of immigrant job opportunities and the duration of unemployment spells in the U.S. using the 1996 and 2001 panel. This a rotating panel where participants are interviewed every four months. The 1996 panel collects information over 12 waves and the 2001 panel collected information over 9 waves. The main advantages of this data are the relatively lengthy panels for observing completed job and non-employment durations with a relatively short reference period that reduces recall bias.

This paper explicitly models the joint distribution of duration in the labour market states of employment and non-employment and participation in the panel, providing evidence that, relative to the native born, there is little difference in the duration of immigrant job opportunities. Although not significant, exit rates from employment tend to fall with time spent in the host country. Controlling for country of birth and years since migration, there is no evidence of a higher incidence of involuntary (employer initiated) or voluntary job changes amongst immigrants. Using a competing risks framework, there is little difference in the duration of job opportunities resulting in either involuntary or voluntary quits.

This paper investigates differences in the magnitude and composition of wealth between German natives and immigrants and examines the reasons for these differences. Since portfolio allocations may be responsible for a sizeable part of the nativity wealth gap, particular attention is paid to differences in composition and diversification of asset portfolios between native-born and foreign-born individuals in Germany. In the empirical analysis, which is based on cross-sectional data drawn from the German Socio-Economic Panel (SOEP), two research questions will be addressed: Are there differences in individual wealth and asset holdings between natives and immigrants? Which part of these differences can be attributed to disparities in socioeconomic and demographic characteristics between the two groups? The empirical findings reveal considerable differences in wealth and asset holdings between natives and immigrants, indicating substantial disparity in the economic well-being of the two groups. Moreover, differences in real estate constitute the major part of different levels of net worth, suggesting that disparities in home-ownership rates are responsible for the main part of the overall wealth gap. Furthermore, migrants’ degree of portfolio diversification is significantly lower than that of comparable natives. The results of a decomposition analysis suggest that differences in wealth and asset holdings may be explained by disparity in educational attainment to a sizable extent, while the effects of income differentials and differences in demographic characteristics are insignificant. The estimates of the single components of wealth reveal that educational attainment is highly relevant for the investment in financial and other assets as well as private insurances but relatively less important for the accumulation of real estate. Finally, in most cases, more than half of the gap in wealth and asset holdings remains unexplained by differences in income, education, and demographic characteristics between natives and immigrants.
Twenty-three percent of New Zealand’s population is foreign-born and forty percent of migrants have arrived in the past ten years. Despite the magnitude of these immigrant flows, the impact of immigration on the labour market opportunities of New Zealanders has yet to be investigated using micro-econometric techniques. The New Zealand case is of broad interest because unlike much of the literature, it shows the impact of immigration on labour market outcomes in a small open-economy with a large-scale and highly structured immigration system that focuses mainly on higher-skilled migrants, little low-skilled illegal immigration, and a highly mobile population both internally and internationally. This paper uses data from the 1996, 2001 and 2006 New Zealand Censuses to examine how the supply of immigrants in particular skill-groups affects the employment and wages of the New Zealand-born and of earlier migrants. We compare estimates from CES models that assume perfect substitutability within but not between different skill groups, nested CES estimates that allow for constrained patterns of migrant/non-migrant substitutability within skill groups, and Generalised Leontief estimates that allow for a broader range of substitutability. Our main estimates identify the impact of recent immigration on the labour market using the ‘area-analysis’ approach. We consider two different definitions of skill groups – a human capital-based definition (Borjas (2003)) using age/qualification groups and a ‘predicted occupations’ definition (Card (2001)). Overall, the descriptive evidence and estimation results suggest that immigration may have at most a small negative impact on employment rates for similarly skilled NZ-born, and there is little evidence that it negatively impacts the wages of similarly skilled NZ-born or earlier migrants. The largest negative impacts of immigration are found when examining the impact of inflows of recent migrants in a particular skill-group on the wages of recent migrants in that same skill-group.

The paper traces the macroeconomic consequences of diversity in the United States. Although cross-country studies largely claim that diversity reduces productivity, recent studies with US datasets argue that diversity contributes positively to aggregate economic performance because of the availability of complementary knowledge, skills and experiences. Employing a cross-sectional dataset for 48 contiguous states in the US, this paper provides empirical evidence for negative impact of diversity on Gross State Product (GSP) per capita growth. We include three measures for diversity – racial, religious, and linguistic diversity, each of which is derived as a fractionalisation index. Our results indicate that the estimated impact of racial diversity is negative; implying that racial division within the states is detrimental for economic growth. When we control for low level of English fluency or the inability to communicate effectively, the effect of racial diversity is stronger. If low level English fluency is positively correlated with the cost of communication across the population, as we would expect, the results indicate that racial diversity reduces GSP per capita growth when barriers to communication are higher. This finding provides fresh insights into the use of social capital as a public policy tool. Equally as important our empirical results provide strong support for the economic significance of establishing ‘weak ties’ across diverse social groups in pluralistic societies.
Paper ID: 69.2
Title of Paper: What Makes Growth Sustained?
Authors: Ostry J, Berg A, Zettelmeyer J
IMF
Presenter: Ostry J
Abstract:
We identify structural breaks in economic growth for 140 countries and use these to define ‘growth spells’: periods of high growth preceded by an upbreak and ending either with a downbreak or with the end of the sample. Growth spells tend to be shorter in African and Latin American countries than elsewhere. We find that duration of growth spells is positively related to: the degree of equality of the income distribution; democratic institutions; export orientation (with higher propensities to export manufactures, greater openness to FDI, and avoidance of exchange rate overvaluation favorable for growth duration); and macroeconomic stability (with even moderate instability curtailing growth duration).

Paper ID: 69.3
Title of Paper: Foreign Direct Investment and Economic Growth: Evidence from Quantile Regression
Authors: Hsu C, Wu J, Lin H
Department of Economics, National Central University
Presenter: Hsu C
Abstract:
In this paper, we examine the role of absorptive capacity in contributing to the growth effects of FDI. We use cross-country data for the period 1975–2006. Our analysis adds to the existing literature in two ways. First, we allow for different growth effects of FDI at different quantiles of the income distribution by using the conditional quantile regression (QR). Compared with the firm-level study of Girma and Grögel (2007), we use aggregate FDI flows for a broad cross section of countries to provide the macroeconomic study of FDI spillovers. Secondly, we apply, for the first time in this context, the instrumental variable quantile regression (IVQR) developed by Chernozhukov and Hansen (2006, 2007, 2008) and Chernozhukov et al. (2007) to control for endogeneity of all the explanatory variables. Moreover, the IVQR approach is asymptotically valid under weak identification. Empirical analysis yields three main conclusions. First, the IVQR estimates suggest positive growth effects of FDI in higher quantiles of the distribution, while the estimates of FDI for QR are insignificant and small in magnitude across different quantiles. It implies that high-income countries with well-developed absorptive capacities seem to gain significantly more from FDI; this is consistent with the results of Blomström et al. (1994) and Wang et al. (2004). Secondly, our QR (IVQR) analysis can provide the empirical evidence of convergence clubs (Quah, 1996). It means that high-income countries have the phenomenon of convergence, but low-income countries do not. Moreover, the black market premium distorts allocations of resource in lower quantiles. Finally, in contrast with Hermes and Lensink (2003) and Alfaro et al. (2004), our empirical results show that the level of development of local financial markets is not crucial for the growth effects of FDI in lower quantiles.

Paper ID: 70.1
Title of Paper: Spurious Regressions in Time Series with Long Memory
Authors: Wang G
Takming University of Science and Technology
Presenter: Wang G
Abstract:
This paper studies the asymptotic distributions of partial sums of fractionally integrated processes which are long memory. The required moment conditions on the innovations of the processes are weak. We also discuss the asymptotic properties of least squares estimators and related test statistics in some spurious regression models that are generated by stationary or nonstationary fractionally integrated processes. We show that even when the fractionally integrated processes are long-range dependent, the asymptotic distributions of the least squares statistics, after appropriately rescaling and normalizing, are functionals of standard Brownian motions rather than of fractional Brownian motions.
Title of Paper: Gaussian Tests for Unit Roots and Cointegration with More Power with a Re-examination of PPP
Authors: Rajaguru G
Bond University
Presenter: Rajaguru G
Abstract:
Non-standard distributions, severe size distortions and extremely low power are well-known problems of the unit root tests that are currently in use. In this paper we use a mixed-frequency regression technique to develop two test statistics for unit roots and cointegration that are asymptotically normally distributed. The first is for the null of stationarity based on an MA unit root. Preliminary Monte Carlo simulations show that this test offers substantial increase in power against near unit root alternatives in moderate size samples. The second test is for the null of a unit root. Theoretical work on this test is still in progress. Preliminary results on a special case of a random walk shows substantial gains in power compared to existing tests.

Title of Paper: Threshold Model of the Exchange Rate Pass Through Effect: the Case of Croatia
Authors: Tica J ¹ Posedel P ²
¹ University of Zagreb, ² University of Zagreb
Presenter: Tica J
Abstract:
The paper applies a nonlinear econometric approach in modeling a possible explanation for the low Exchange Rate Pass through (ERPT) effect in a highly dollarized (euroized) economy such as Croatia. The nominal exchange rate has been the central anchor of country’s monetary policy since the last stabilization process in October 1993, and there is consensus among economists that an almost complete pass-through effect is present in Croatia. Nevertheless, researchers had major difficulties in finding empirical evidence of ERPT effect during the post-stabilization float period (Billmeier and Bonato 2002; Kraft 2002 and Maodus 2006). Having in mind speculations about existence of a potential threshold in theoretical and in empirical papers (Taylor 2000; Carranza et. al. 2004; Campa and Goldberg 2004) a threshold regression approach is employed. During a grid search, 13013 regressions are estimated and a strong case of nonlinearity with the single threshold is proven. According to our estimation there is a threshold at 5.91% of the monthly growth rate of the nominal exchange rate of the German mark (Euro) with a 95% interval between 2.69% and 21.81%. The way in which the nominal exchange rate affects inflation is asymmetric around the threshold. Below the threshold, ERPT effect is weak or statistically insignificant and above the threshold the effect is strong and significant. Although mathematical techniques cannot replace economic reasoning and intuition, the results are consistent with the intuitive expectations and theoretical speculations of the authors that have already researched the ERPT effect in Croatia. Translated to the level of macroeconomic policy design findings of this research can be summed up in a single sentence: in order to keep inflationary expectations and prices low and stable, one of the rules of monetary authorities should be to avoid depreciation rates that are higher than 2.69% monthly (estimated threshold is 5.91%, but the lower boundary of 95% interval is 2.69% depreciation rate).
This paper proposes testing procedures for unit roots in a two-state regime switching threshold model by taking into account of one-sided alternatives. Motivated by the fact that many economic and financial time series go through various phases of business cycles and consequently their movements around equilibriums can exhibit “deepness” and “steepness” asymmetries, Enders and Granger (1998) extended the simple linear model to a two-state regime switching threshold autoregressive model. There are two roots to capture the adjustment process in this model, one governing the economic downturns and other economic upturns. This model was further extended by Caner and Hansen (2001) by allowing deterministic trends, the autoregressive root and short-term dynamics to switch between the two-regimes. Since the threshold parameter is unidentified under the null and the alternative hypothesis is one-sided, in order to establish stationarity, the null hypothesis of both roots being zero is tested against both being negative. In this paper, we propose Sup of the one-sided Wald test developed by Wolak (1987) and one-sided score test by Silvapulle and Silvapulle (1995), and use simulation methods to compute critical values of the tests. Application of one-sided tests shows that G7 real interest rates are stationary, while conventional tests found them to be non-stationary.

We develop a model to analyze the optimal allocation of decision-making rights between a principal and an agent. The decision-making process has the following elements: it takes effort and time to determine the optimal decision to implement; and, once implemented, the expected loss from a particular decision (or project) increases with the length of time since the last decision was made. The model shows that for low levels of uncertainty centralization is optimal; alternatively, for higher levels of (controllable) uncertainty decentralization of decision making is optimal. The predictions of the model are largely consistent with the empirical results of the allocation of decision-making authority within organizations using workplace data. Empirically, decision making is more likely to be decentralized the larger the workplace and the more competitive the product market. We find a non-monotonic relationship between the probability of de-centralized decision making and the number of workplaces within an organization that produce the same product. Business strategy in the product market is not related to the allocation of decision-making authority: decentralization, however, is associated with the use some of human resource management techniques such as the provision of bonuses to employees.
This paper investigates complementarities in organizational design, by analyzing how environmental volatility influences the joint determination of the preferred allocation of decision rights, compensation structure of divisional managers and the degree of operational integration, such as product standardization and the use of shared distribution and marketing channels across divisions. While the choice of organizational structure (allocation of decision rights and incentive structure) has received increasing attention in the economic literature, the choice of organizational strategy remains largely unexplored. The key contribution of this paper is the recognition that the choice of organizational strategy (degree of operational integration) influences both the nature and severity of agency conflicts inside the organization, which in turn influence the optimal choice of structure. Similarly, the degree to which the organization is able to resolve the underlying agency conflicts through its structure influences the optimal choice of strategy. To my knowledge, this is one of the first papers to examine the interrelationships between environment, strategy and structure from an agency theoretic perspective.

The model generates four broad empirical predictions. First, operational integration is generally, but not always, negatively related to environmental volatility. Second, centralized decision making can arise as the preferred governance structure only when the optimal degree of operational integration is sufficiently high and is always associated with a relatively high degree of profit sharing among divisions. Third, decentralized decision making can arise as the preferred governance structure for all levels of operational integration and can thus exhibit either more or less operational integration and more or less profit sharing than centralization. Fourth, if operational integration is negatively related to environmental volatility, then decentralization is positively associated with the volatility of the environment. In other words, increased environmental volatility does not directly imply more decentralized decision making. We conclude by relating these predictions to the works of Bartlett and Ghoshal (2002) on the strategy and structure of multinational corporations.

Using novel firm-level panel data from European countries, this paper empirically investigates how the performance-innovation relationship varies with firm size. We distinguish between firm-level measures of applied research using patents (from both the European and US Patent Offices) and measures of basic research (using academic publication in “hard science” journals). We look at (total factor) productivity and growth as measures of firm performance. Our results indicate that the correlation of performance with applied research (patents) is stronger for small firms than for large firms. By contrast, the correlation of performance with basic research (academic publications) is stronger for large firms than small firms. A number of possible theoretical explanations for our findings are discussed.
One aspect of the climate change discussion that has been attracting a great deal of media attention, particularly in Europe, is “food miles”. The concept that the further food has to travel, the worse its impact on the environment is one that – although flawed – is easy for consumers to grasp and for domestic import-competing food producers to support. And despite the growing body of scientific analysis that shows buying locally may not in fact be better for the environment than importing food from overseas (once the emissions generated across a product's entire life cycle are considered), there is some evidence that consumers are starting to display preferences for home products when considering the environmental impacts of their purchases of food. These changes in demand could have significant implications for food exporters, and particularly for those food-exporting countries that are geographically isolated, such as NZ. We assess the impact of a change in UK preferences towards local produce at the expense of foreign agro-food commodities using the GTAP computable general equilibrium model. We find that even relatively small changes in UK preferences could have noticeable impacts on the NZ economy. This suggests that ongoing efforts to dispel the myth of food miles are warranted.

One of the major themes in New Zealand economic development thinking has been concerned with the balance of trade, industry and infrastructure policy that should accompany entrepreneurial activity. A new era of export development began in the early 1980’s with the introduction of a ‘more market’ approach. However, this did not mean the end of economic development thinking. There were concerns at the time that the non-food manufacturing sector would be decimated by the large reductions in rates of protection. This concern with the breadth of non-food manufacturing has run deep in the New Zealand psyche since the economy opened to trade early in the 19th century. New Zealand’s economic development thinking has focused on attempting to transform a very small economy, without major natural resource endowments, and distant from large foreign markets, into a nation with broadly based opportunities. This thinking was multifaceted in terms of the dispersion of output, employment, entrepreneurial and commercial opportunities. Economic development also had an international trade aim that might be glibly referred to as trying to move beyond the tyranny of distance and ruminants. The rapidly changing global trade environment over the last 20 years provides an opportunity to examine changing patterns of comparative advantage in ‘free trade’ New Zealand. The case of New Zealand is interesting because it has always had economic features that differ significantly from most OECD countries – a very small domestic market, a manufacturing sector which shows some “hollowed-out” characteristics, distant from major importers, a very strong comparative advantage in agriculture and recent comprehensive unilateral trade policy reforms. This paper reviews some trade aspects of economic development with a view to identifying promising export developments.
Competition points are awarded in sports events to determine which participants qualify for the playoffs or to identify the champion. We use competition points to measure strength in a prediction model and choose competition points to maximise prediction accuracy. This allows us to determine the allocation of competition points that most appropriately rewards strong teams. Our analysis focuses on Super Rugby as the characteristics of this competition closely match our modelling assumptions. We find that the current allocation of competition points is not optimal and suggest an alternative. Our findings have implications for other competitions.

This paper employs a cointegrating panel approach based on Australian states to estimate the intratemporal elasticity of substitution between state government consumption expenditure and nondurable private consumption expenditure. Taken together with plausible values for the intertemporal elasticity of substitution, our estimates imply that public and private consumption are Edgeworth-Pareto complements.

Most recent studies of dynamic macroeconomic relationships focus on models derived from optimising behaviour by economic agents. In most of these models, the eigenvalues of the associated dynamical system are real-valued and so the time-path of the system exhibits monotonic or near-monotonic behaviour. While, it is well-known that linear dynamic models with complex-valued eigenvalues exhibit the property of oscillatory dynamic behaviour, limited research has been undertaken to investigate the properties of optimising models with oscillatory behaviour. In this study, we produce an example of an optimising consumer with habit persistence whose consumption dynamics are characterised by complex-valued eigenvalues and whose consumption thus exhibits cyclical behaviour. In practice, even in this case, oscillatory behaviour will not be observable if the periodicity of the cycle is too long or if the cycle becomes dampened at too rapid a rate. For example, there will be little evidence of cycles for a consumer who lives for eighty years if they have a consumption cycle with a period-length of two hundred years. In order to investigate whether cycles are likely to be empirically observable, we also investigate the dynamic properties of a calibrated version of the model.
We examine Italian inflation rates and the Phillips curve with a very long-run perspective, one that covers the entire existence of the Italian lira from political unification (1861) to the entry of Italy in the European Monetary Union (end of 1998). Methodologically, we examine the volatility, persistence and stationarity of the Italian inflation rate over the long run and across various exchange-rate regimes that have shaped Italian monetary history. Next, we estimate alternative Phillips equations and investigate the extent to which nonlinearities, asymmetries and structural changes characterize the inflation-output trade-off in the long run. We capture the effects of structural changes and asymmetries on the estimated parameters of the inflation-output trade-off relying partly on sub-sample estimates and partly on time-varying parameters estimated with the Kalman filter. Finally, we investigate causal relationships between inflation rates and output and extend the analysis to include the US and the UK for comparison purposes.

This paper examines euro area inflation dynamics by estimating open economy New Keynesian Phillips curves based on the assumption that all imports are intermediate goods. Instead of imposing rational expectations a priori, Consensus Economics survey data and OECD inflation forecasts are used to proxy inflation expectations. The results suggest that, compared with a closed economy New Keynesian Phillips curve, euro area inflation dynamics are better captured by the open economy specification. Moreover, in the open economy context, and even if we allow for persistence in expectations, the hybrid specification of the New Keynesian Phillips curve is needed in order to capture the euro area inflation process properly. We also provide some evidence that in recent years of low and stable inflation, euro area inflation dynamics have become more forward-looking and the link between inflation and domestic demand has weakened (ie the euro area Phillips curve has flattened). On the other hand, in low-inflation euro area countries the inflation process seems to have been more forward-looking already since the early 1980s.

With the aid of a geographical information system, our paper constructs a three stage least squares simultaneous equation model to investigate the interrelationships between the interregional flows of human capital, and the innovation dynamism of a region. In order to do this, we model the interregional migration behaviour of high quality British university graduates from university into first employment, and we relate these human capital flows to both the labour market characteristics and the knowledge characteristics of the employment regions. This is done for both all industries and for just high technology industries. Our results indicate that for England and Wales there is a two-way causality between the interregional human-capital employment-migration flows of recent university graduates and the innovation performance of regions. However, the results for Great Britain as a whole depend on whether London is included and Scotland is excluded. We find little or no support that the presence of local universities or small firms promotes regional innovation.
Abstract

Australian Bureau of Statistics. The issue of the impact of skills shortages on the capacity of businesses to successfully conduct their innovation activities is at the forefront of business concerns and government policy considerations in Australia. In May 2007 the Australian Department of Industry, Tourism and Resources released a study, ‘Aspects of Skills Shortages and Innovation in Australian Businesses’ which used micro-data collected in the 2003 Australian innovation survey to investigate skills shortages and innovation in Australia. The present skills shortage in Australia was in only a nascent stage during the period covered by that study. This paper uses the main unit record data files for the 2003 and the more recent 2005 innovation surveys to investigate the nature and extent of changes in the impact of skills shortages on businesses innovation efforts. An identically specified binary probit model is estimated on both the 2003 and 2005 innovation data sets. The model estimates the strength and direction of association between selected business characteristics and the probability of a business experiencing skill shortages that actually hampered its innovation during the period in question. Impact analysis is conducted on selected conditioning variables of a priori interest and statistical significance. In addition, the relative roles of changes in business characteristics, and changes in model ‘structure’ (estimated model coefficients) on the predicted probability of experiencing innovation-hampering skills shortages between the 2003 and 2005 innovation surveys is analysed. Although the proportion of all innovating businesses experiencing innovation-hampering skill shortages rose only from 25.6% to 27.9% between the two periods, there are large and significant changes in model predictions at more disaggregated industry and business size levels, with most of the change resulting from ‘structural’ change rather than average characteristic change. It is suggested that these ‘structural’ changes are reflective of the major macroeconomic changes taking place in the Australian economy over that period. Innovation and Business Characteristics in Australia - an Econometric Analysis

Abstract

Australian Bureau of Statistics

Constraints on economic growth arising from an increasingly tight skilled labour market in Australia have intensified an already keen analytical and public policy focus on innovation and its relationship with productivity and economic growth. Understanding better the micro-economic underpinnings of the proximate characteristics of business innovation activity is critical to well informed public policy debate and program development in this important area. This paper uses discrete response econometric techniques to conduct analyses of the association between key business characteristics and the nature of innovation in Australian businesses. It addresses two different dimensions of innovation using unit micro-data from the 2005 Australian innovation survey. First, a binary probit analysis is conducted to investigate the association between key business characteristics and the probability of businesses being innovators. This analysis is followed by an ordered categorical probit analysis of the association between these same key business characteristics and the diversity of types of innovation conducted, including abandoned or not yet completed innovation activity. The sixteen different subsets formed from 4 different ‘types’ of innovation activity are logically grouped to form 8 ordered groups of innovation ‘diversity’. These eight groups form the ordered categorical dependent variable in the analysis. Among the conditioning variables analysed, statistically significant associations are found for collaboration, collaboration diversity (a count of the number of different types of collaboration engaged in), R&D intensity, foreign ownership, employment size, and industry to which the business belongs. Significance is also found across levels of innovation diversity.
This paper investigates the extent to which R&D alliance participation affects the performance of newly listed high tech firms. The estimation strategy identifies the impact of R&D alliance through changes on a firm’s alliance status. Using longitudinal data on 586 high tech firms that became public over the period 1990-2000, I find that R&D collaborating firms experience significantly higher profits and enhanced survival, relative to non-R&D collaborating firms. R&D alliance participation raises the return on assets by 3.24% and Tobin’s q by 2.83%. The hazard of poor performance and firm failure is attenuated by 10%, on average. The results are valid to model specification and control for the potential endogeneity of alliance participation.

Although some developing countries receive large numbers of migrants, empirical evidence on the labour market effects of these migrants is scarce. Thailand is one of the few developing countries that have sufficiently good data on immigration to permit empirical analyses. These data come from a 2004 registration scheme that enrolled around half of the approximately two million irregular migrants in the country. We use the registration data, plus census and survey data on Thais, to study how immigration has affected the wages, employment, and internal migration of Thai workers. Given the type of data available, the only feasible analytical approach is an ‘areas’ analysis. Essentially we test whether, all else equal, Thai areas that have received more migrants have lower wages. We allow for endogenous migration— whereby migrants are disproportionately attracted to areas with higher wages— by using distance to the Burmese border as an instrument for migrant intensity. We allow for spillovers between districts by estimating our model at two different levels of geographical aggregation, and by constructing a model with spatial lags. We also test whether immigration stimulates compensatory migration by Thai workers that would transmit labour market impacts to low-immigration areas. Our results are mixed, but do suggest that immigration may reduce the wages of low-skilled Thai workers, in border areas. We find no evidence that immigration reduces local employment.
The recent international literature on the impact of immigrants on the wages of natives (e.g. Borjas 2003, Card, 2005) has shown contrasting results. These studies have generally focussed on low skilled immigrants and natives in the US, and results have ranged from no impact to negative impacts on the wages and employment opportunities of the native born. In this paper we examine the effect of the inflow of immigrants on the wages of New Zealand-born workers. Our analysis incorporates labour markets across regional and skill labour market groups, and unit record data of the Household Labour Force Survey, and its Income supplement (HLFS/NZIS) for the year 2004. Supplementary difference-in-differences results are further provided. We first test the hypothesis of factor price equalisation (Borjas 2003) and effects on labour supply. We then examine hypotheses of wage effects for the NZ-born (Card 2005) across regions and occupations. We address potential endogeneity of immigrant labour supply through IV estimation. That is since immigrants may choose the city in which they settle down based on higher expected wages. New Zealand provides a case based on its immigration policy which focuses on highly educated immigrants. Due to its geographical position, illegal immigration is also not commonly possible. Therefore, while much of the existing literature has focused on low-skilled immigrants, this study focuses on the effect of skilled immigration on the wages of both high-skill and low-skill native-born. First, our results of labour supply effects of immigrants reject the hypothesis of factor price equalisation -- that natives move to completely adjust the labour market skill base intact. Based on these results, the hypothesis of factor price equalisation is not empirically verified in this case. Second, we find that for the native-born with higher education, an adverse wage impact of immigration with higher education is not verified. This result is robust across both years of study, and it is not reversed by using instrumental variable estimations. In addition, we find that contrary to what may be commonly expected, the supply of highly educated immigrants has a small negative effect on the wages of low-skilled New Zealand born. We provide labour market hypotheses of the cause of this seemingly unexpected effect in light of New Zealand immigration policy and verify them through additional occupation-based models.
Brain drain has long been one of the most common concerns developing countries have about migration. This concern has been amplified in recent years by the rapid increase in skilled emigration, driven in large part by developed countries shifting to more skill-intensive immigration systems. However, while economic theory suggests a number of possible benefits, in addition to costs, from skilled emigration, the evidence base on many of these is very limited. This paper reports first results from a project designed to quantify the evidence for or against many of the channels through which skilled migration is thought to affect the sending country. We focus on the area of the World where brain drain is the highest – the Pacific, and on a well-identified target population whose emigration is of high concern – the most academically talented individuals. The first evidence from this project comes from Tonga, where we have surveyed the individuals who were the top graduating students from their high schools over the period 1976-2006, surveying both those who remain in Tonga and those who have emigrated; and from New Zealand, where we track top bursary scholars and members of the New Zealand maths and chemistry Olympics teams. In Tonga, we find very high levels of migration and return migration. There is strong evidence for positive impacts of migration on human capital formation, knowledge transfer, tourism, remittances, and repatriated savings. There is weak or no evidence for migration playing a significant role in trade, FDI, or through diaspora activities. The fiscal impact of the highly skilled migration appears approximately neutral, with the main negative impact of the highly skilled migration appearing to be a loss of potential teachers and doctors. However, as all doctors and many teachers receive training overseas, this loss is relative to a situation of more return migration, rather than relative to one of less migration. On net we conclude the impact of highly skilled migration is therefore largely positive for Tonga. Ongoing work is examining the same channels for New Zealand.

This study contributes to the international literature on health insurance by focusing on a specific group of individuals namely young women. We investigate the role of family formation, in particular the effect of children, actual and desired, on the purchase of private health insurance. A unique panel data set of Australian women allows us to focus on a large cohort of young women below the age of 30. The model of insurance used, explicitly accounts for state dependence while controlling for correlation due to the presence of unobserved and time-invariant individual effects. We also estimate specifications in which attrition is modelled through the use of inverse weighted probabilities. Evidence of differential demand for insurance is found when we distinguish between young women who have started their families, those who have reached their desired number of children and those intending to have additional children. The different effects on joining and leaving cover show the importance of modelling dynamics in insurance.
Abstract:

Individuals' decision-making on the utilisation of hospital services in the mixed public-private hospital system in Australia involves the decisions on whether to purchase private health insurance, to obtain public or private hospital care and the intensity of care. In this paper, I empirically examine these decisions in a simultaneous framework. This approach enables us to isolate and identify the intertwining factors that motivate the three decisions surrounding hospital care use. The econometric model is a simultaneous equation model that accommodates the count data nature of hospital stay and binary outcomes in the decision to insure and the choice of public or private care. The model allows for endogeneity arising from simultaneity in the insurance and patient type decisions. Estimation is carried out via maximum simulated likelihood. The econometric model is applied to household survey data from the 2004 Australian National Health Survey. The results indicate that demographic and socioeconomic factors have significant influence on the propensity to insure. Health status appears to have a more limited effect. The availability of private health insurance is the most significant factor that influences the decision to seek private hospital care. Two main sources of unobserved heterogeneity that influence length of hospital stay arise from the lack of information in the data on individuals' medical conditions for which hospital care was obtained and the nature of the treatments. The results suggest that individuals seek private care for hospital treatments that involve shorter hospital stays. Consistent with previous studies, there is evidence to suggest the presence of moral hazard in private hospital use. The paper concludes with a discussion on the implications of the findings on health policy issues that are currently debated in Australia.
Criminal activity imposes significant costs on society. Government expenditures on the criminal justice system are sizeable in most OECD countries. In addition, crime victim compensation schemes offer direct reimbursement to, or on behalf of, a crime victim for statutorily identified crime-related expenses. These costs, together with private outlays on crime prevention measures, are a measure of the direct cost of crime. The direct, dollar cost grossly understates the real cost of crime to society since many private precautionary expenses against crime and public expenditures incurred in enforcing certain types of legislation are not included (Becker, 1968). Furthermore, police crime statistics understate the incidence of crime, largely because many crimes are not reported. Moreover, as Viscusi (1993) suggests, health and safety risks contribute to human unhappiness. One possible source of health risk, in addition to physical injury, is the post-traumatic stress and the psychological impact of injury on its victims. These effects can be relatively short-lived or can ‘activate long-term trajectories of mental distress’ (Macmillan, 2001). However, it is generally impossible to put an accurate price on the emotional and psychological sufferings caused by victimisation. Finally, as Rizzo (1979) points out, in the presence of risk aversion, the true cost of crime will exceed the expected value of losses. Research on crime by economists has focussed on trying to explain individuals’ decision to commit crime within an optimization framework, on analyses of public policies to mitigate criminal behaviour and on the economic consequences of incarceration for individuals. However, they have largely ignored the impact of crime on victims. This is surprising, given the level of interest in the impact of other life-changing events like divorce and unemployment. One reason for this neglect is the difficulty in obtaining accurate data on the direct and indirect costs of crime on victims. Nevertheless, the need for accurately estimating both the direct and indirect costs of crime cannot be over-emphasised. Crime has the potential to incapacitate otherwise productive people, and to impose financial and psychological costs on their families. These are costs that are ultimately borne by society. In this paper, we estimate the causal effect of crime victimisation on labour market outcomes and general well-being using longitudinal data from the nationally representative Household Income and Labour Dynamics of Australia (HILDA) survey. Crucially for our analysis, individuals in HILDA are asked whether they experienced a number of major life events in the previous year including being a victim of violent or property crime. We have four waves of data available, which lets us estimate short-term impacts. But the richness of the data allows us to extend the literature in a number of ways. First, we estimate OLS regression models on the entire population that examine outcomes for individuals that have been victimised relative to outcomes for non-victims with similar observable characteristics over the same time period. We also estimate fixed effects regression models that examine changes in outcomes for individuals before/after victimisation. The second model allows us to control for characteristics that may simultaneously cause certain individuals to become victims of crime and put them at higher risk of poor outcomes. Second, we estimate the impact of victimisation on both labour market outcomes and general well-being. Clearly, victimisation might have impacts on individuals beyond the labour market. We believe that this is the first quantitative analysis to examine the impact of victimisation on more general measures of human capital and personal well-being. Our results indicate that there is no causal impact of victimisation on employment or income; while estimates based on cross-sectional models indicate significant impacts, the fixed-effects estimates uniformly suggest that these results can be explained by unobserved heterogeneity. In contrast, there is strong evidence of a negative impact of victimisation on well-being measures, and these are especially strong for violent victimisation. However, these effects appear not to persist beyond the first year following victimisation.
GMM estimators for panel data have become vastly popular in empirical economic growth studies. In particular, the system GMM estimator proposed by Blundell and Bond (1998) is perhaps one of the most popular estimation techniques in empirical growth. The popularity of this estimator is in part due to its lower bias and substantial precision improvement in finite samples relative to “traditional” estimators. These features have triggered a new wave of empirical research using this estimator. Some authors that have used it in empirical growth studies are Levine, Loayza and Beck (JME, 2000) who study the effects of financial intermediation on growth; Dollar and Kray (EJ, 2004), who analyse the impact of globalisation on growth and poverty reduction and Cohen and Soto (JOEG, 2007), who examine the role of education on growth. In spite of its increasing popularity, the properties of the system GMM estimator have been studied in samples where the number of cross-units is relatively large (i.e. thousands). Yet, availability of country data limits the number of cross-units (i.e. the number of countries) to around 100 at most and often to less than half that value. The lack of knowledge about the properties of GMM estimators when the number of individuals is small renders them a sort of ‘black box’. This paper analyses through Monte Carlo simulations the properties of various GMM and other estimators when the number of individuals is the one typically available in country growth studies. It is found that, provided that some persistency is present in the series, the system GMM estimator has a lower bias and higher efficiency than all the other estimators analysed, including the standard first-differences GMM estimator. In a simple application of a growth regression the system GMM produces substantially more sensible results than the other estimators analysed (i.e. OLS, fixed effects and difference GMM).

The ultimate goal of any country’s economic development is sustainable economic growth in order to achieve continuous improvement in the standard of living. This paper looks at past performance and future prospects of Thailand’s economic growth from the perspective of labor productivity developments and demographic changes. Our study is divided into two major parts. In the first part, we analyze Thailand’s economic growth from 1977 to 2007 using the Australian Treasury’s 3Ps framework of decomposing real GDP growth into productivity, population, and participation components. In the second, we use our earlier findings along with the country’s demographic projection to project forward Thailand’s potential GDP growth till the year 2040. The evidence in this paper suggests that to improve Thailand’s long-term economic growth

In the current debate concerning New Zealand’s unrelenting current account deficits, its trade performance and high external debt levels, little or no attention is paid to the positive contribution that foreign capital inflow makes to the nation’s real income. This paper sets out a theoretical framework for assessing the contribution of foreign capital and uses both growth accounting and econometric methods to derive estimates of the real income gains to New Zealand after allowing for the debt servicing obligations. Further, we then construct a stylised national balance sheet that includes New Zealand’s assets and foreign liabilities. This places the stock of foreign debt in proper context and reveals that after accounting for net foreign investment, national wealth gains have also been significant.
P1.1 Testing for Price Convergence in Chinese Energy Markets
Ma H
University of Canterbury

Among the transitional economies, China seems to have been the centre of attention in the recent economic literature. In particular, as highlighted by some recent work (Lau, Qian and Roland, 2000; Young, 2000; Poncet, 2003 and 2005), whether China's gradualist reform has been successful is still subject of great interest and intense debate. Energy market integration has been extensively investigated worldwide since the 1990s, however, for China recent amounts to one study, Fan and Wei (2006). Fan and Wei test 'The Law of One Price' in China utilising 72 time series, but include only two fuel variables (gasoline and diesel). This study investigates energy price movements in China with a data set that consists of 4 energy types (coal, gasoline, electricity and diesel) in 35 cities (all of which are provincial or autonomous regions and municipal cities) over a maximum of 132 months (from 1995 to 2005) and using time series methods which focus upon non-stationary and cointegration. The research has two major goals. The first goal is to investigate energy market integration across major cities in China. The second goal is to estimate the rate at which relative prices converge to their long-run values across cities and to examine causality relationship across cities to observe how prices change between cities. The results can be summarised as follows: First of all, both common ADF unit root test and panel unit root test show that gasoline and diesel markets are fundamentally integrated once we account for some special and remote cities (some western and southwestern small cities, such as Lhasa, Wulumuqi, Guiyang and Lanzhou). This finding is consistent with international literatures (Fan and Wei, 2006; Panagiotidis and Emilie, 2007). Although all tests suggest that coal and electricity markets in mainland China seem not as well integrated as gasoline and diesel markets, this may be mostly due to the bulk of coal and non-storability of electricity and power network disconnection. Second, with no significant intercept terms, electricity prices empirically and theoretically converge to absolute price parity due to no more transportation cost once started. However, coal and gasoline prices more likely to converge to their relative price parities due partly to significant transportation cost. Third, the rates at which relative prices converge to their long-run values are very close between each relative price series within the same energy product and also fairly short compared with those internationally. Fourth, there are rich causality relationships between cities for coal and electricity. Causality not only originates from supply cities but from demand cities.

P1.2 The Economic Impact of Foreign Domestic Workers in Malaysia: Estimates from Induced Labour Market Activity
Leong Tan P, Gibson J
University of Waikato

Economic growth in Malaysia is heavily dependent on migrants, who are estimated to be between 17-27 percent of the labour force. Amongst these migrants are some 320,000 females, mainly from Indonesia, who are employed as domestic workers for Malaysian families with children. The presence of these domestic workers enables higher labour force participation by married Malaysian women. In this poster we report estimates of the value of the economic contribution made by foreign female domestic workers. We use Household Expenditure Survey (HES) data from 1994, 1998 and 2004 to estimate logistic labour force participation equations, to see how much higher are the odds of female labour force activity as a result of their family employing foreign domestic workers. Wage equations are then used to estimate the value of the extra market production enabled by the presence of foreign domestic workers in Malaysia.
P1.3 Ready (or not) to get Engaged or get Married? Co-movement Towards a Monetary or Currency Union Amongst Pacific Island Countries
Lahari W
Economics Department, University of Otago

This project looks into the potential for a Pacific Islands currency or monetary union. Recent debate in the South Pacific on labour mobility, greater economic integration and the single market by the Forum Island countries has rekindled interest in the debate for a common currency or monetary union. There are few studies undertaken in pacific region which focus mainly on economic integration and dollarization of the Pacific. This study will contribute new findings with newly estimated quarterly GDP data and employ econometric methods using the cointegration framework, and apply the permanent and transitory decomposition methods of Gonzalo & Ng (2001) into analysing the impact of similar (dissimilar) shocks to, and from Pacific Island economies, and with Australia and/or New Zealand. These methods will be used to assess the co-movement of macroeconomic variables and to examine respective country or country-group's business cycle characteristics to evaluate regional behaviour towards or away from a possible currency or monetary union. Structural Vector Autoregressive (VAR) and Vector Error Correction (VECM) models will be mainly used in this project to estimate regressions including the application of impulse response functions and variances decompositions to investigate impact assessments and macroeconomic shocks. This study has recently started and preliminary results from a number of these tests results and analysis are presented.

P1.4 Evaluating Government Assistance Programmes
Morris M
Ministry of Economic Development

In this paper we examine the potential for the prototype Longitudinal Business Database as a tool for the econometric evaluation of a business assistance scheme. We examine the use of perhaps the two most popular groups of techniques in recent years - difference-in-differences and matching estimators. We consider a suite of matching estimators that have been developed to provide a set of appropriate comparisons to the set of treated firms. These include two types of nearest-neighbour estimators, a kernel estimator, radius, and stratified matching estimators. We consider the impact of business assistance on a number of indicators of firm performance - sales, value-added, sales-per-employee and labour productivity. We consider the impact of a range of standard firm characteristics, such as size and growth. However, our dataset also allows us to consider both previous instances of assistance from both the agency in question as well as other agencies. We also discuss the ways forward in both using this database for the evaluation of the wide range of business assistance schemes offered by a number of government agencies and for the improvement of the microeconometric techniques available to do so.

P1.5 Keynesian Microeconomics and Institutional Change
Kesting S
Auckland University of Technology

Keynes has been interpreted as a utilitarian during the time of the Neoclassical Synthesis and by Neo Keynesians. Though this was regarded as “Bastard Keynesianism” (Joan Robinson) there is probably more than a grain of truth in it if we consider the influence of Marshall and Pigou on him in Cambridge and his attempt to accommodate his new ideas with the traditional habits of thought of his “fellow economists” (Steven Fazzari). Based on his ideas about conventions some colleagues seem to interpret Keynes as if he was an institutional economist (Sheila Dow, Geoff Hodgson and Fred Lee). Considering fundamental uncertainty and his remarks on “animal spirits” and founded on Keynes’s Treatise on Probability others see him as close to the Austrians (Paul Davidson and Stephen Parsons). Similarities seem to exist with von Hayek’s ideas on markets as discovery process and Schumpeter’s notion of the entrepreneur, despite some disagreement about the role of government. This paper will try to provide an overview over these different microeconomic interpretations of Keynes’s work. Considering this review of quite considerable diversity, it may well be that all of these interpretations contain a kernel of truth. Did Keynes attempt to construct a “general theory” of economic behaviour? And if so, did he actually succeed in providing an all inclusive and comprehensive micro synthesis? If not, is such an endeavour possible? What is missing? New theoretical developments like mental models (Arthur Denzau and Douglass North), bricolage (John Campbell) and institutional entrepreneurs (Colin Crouch) in new institutional economics and the neo-institutionalism of political science and economic sociology might provide some of the missing elements and thus, support Keynes’s basic microeconomic claims.
P1.6  Do returns to Schooling go up During Transition? Evidence from Vietnam
Doan T, Gibson J, Holmes M
University of Waikato

This paper provides estimates of the change in the returns to schooling in Vietnam in recent years. Earlier research suggests that returns to education in Vietnam are low and have not risen during transition (Liu, 2006), which is contrary to the pattern in most other countries. In contrast, we find that that the return to an additional year of schooling has improved remarkably over time, from 3.76% in 1998 to 9.4% in 2004. Females were paid lower than male counterpart, however, their rate of returns to schooling is much higher than male's regardless of model specifications. This trend is robust to various treatments for sample selection bias. The increasing returns may be attributed to the economic transition to market-oriented economy, labour market reform, and economic structural and technical changes in the last recent years.

P1.7  Understanding Regional Economic Growth, Development and Well Being in a Globalizing Economy : An Empirical Analysis
Arora R
University of Auckland

What are the potential factors, which explain regional economic growth, development and well-being in a globalizing economy? Why is it that economic growth and development varies across the regions? Can markets and globalization boost the growth of the regions excluded in the core development process? This study using the different states of India as an evidence of differential performance across the states seeks to understand why economic growth, development and overall well-being differ across states. More specifically, it seeks to understand how, in the presence of globalisation, development of backward regions can be brought about. The endogenous regional growth theory, seeking to explain why some regions enjoy sustained growth while others do not, focuses on human development, information and knowledge (Button, 2000). It presumes that a highly skilled labour force, basic infrastructure, entrepreneurial capabilities, innovative environment (high research and development) exists in all the regions uniformly. It focuses on the issues and prospects of regions in the context of developed countries, and does not address the problems and issues of backward areas’ development in the developing countries where basic requirements as adequate availability of power, literacy, good road and transport system and the spread of information technology are absent. Even though the interest in regions rose due to backwardness in many regions and the lagging states (Higano, Nijkamp, Poot, & Wyk, 2002), the focus currently is on knowledge creation and innovation in the regional economy (Atalik & Fischer, 2002) and the ‘new economy’ relating to internet related activity, high tech developments and global economic integration. The new theories of endogenous growth do not concentrate on framing new strategies for the development of the backward regions (Rolim, 2002). Departing from the cross-country approach commonly adopted in the growth studies, our study focuses on the regional dimensions and using the variables on education, growth, infrastructure and overall human development and state government policies that is, economic reforms initiated by different state governments as a proxy for responsiveness of the governments distil the factors which lead to overall growth, development and well-being in Indian states.
P1.8 Assessing Design Options for a Nutrient Trading System using an Integrated Model
Kerr S, Lock K
Motu Economic and Public Policy Research

Water quality in many New Zealand waterways is currently declining leading to lakes and rivers being closed for contact recreation such as swimming and potentially threatening our clean, green image. Much of this decline is associated with an increase in the nutrient loss from agriculture in the surrounding catchment. Nutrient trading systems are being considered in a number of catchments across the county to restrict the nutrient loss entering the waterways and thus improve the water quality. Such a system is currently being implemented in Lake Taupo and Environment Bay of Plenty is exploring actively the use of such a system to manage nutrient loss in the Lake Rotorua catchment.

While there is a substantial theoretical literature on market based instruments, the practical design of such systems is challenging and empirical evidence is still quite limited. Lake Rotorua has a number of features which makes it ideal for a nutrient trading system such as a large number of heterogeneous participants and scientific understanding of the geophysical processes. But there are also challenges. Nutrients in this catchment can take up to 200 years to reach the lake depending on where they are lost. Thus a nutrient trading system where caps are set on nutrients lost off the land without taking into account the ground-water lags is unlikely to achieve the water quality improvements desired.

To take into account the groundwater lags, we propose that nutrient caps are on the nutrients reaching the lake in each time period. We call this a ‘temporal’ market because trades occur over time as well as space but not through banking. Each landowner must hold allowances for the ‘vintage’ in which the nutrients off his property actually enter the lake. Each property will be assigned to a vintage based on maps of ground-water lag zones. If his nutrients take 100 years to reach the lake, then he must surrender 2109 vintage allowances for nutrients lost in 2009.

How many zones do we wish to have? One zone is likely to be too inaccurate to achieve our water quality goals efficiently. The location of groundwater zones and the travel time of nutrients within them are still uncertain. Clearly we should not have more zones than science can credibly support. Having a large number of zones (and hence allowance markets that operate simultaneously) also increases the complexity of the system and could lead markets to be illiquid.

In a collaborative effort between Motu, NIWA and GNS-Science, we are developing a spatial, stochastic, dynamic simulation model, N-TRADER which combines the economics of land use and management decision making, the functioning of temporal nutrient allowance markets and a model of nutrient flows and lags. The model is based on the best available empirical information on the geophysical and economic conditions for this catchment. This model will allow us to simulate the likely effects of a different number of trading zones in addition to many other questions. For example, what would be the impact of voluntary opt-in by small properties? What is the impact of higher transaction costs? This paper will discuss the design of N-TRADER and some of the nutrient trading system design questions that we plan to explore with the model.

P1.9 Modelling the Effects of Socio-economic Characteristics on Survey Trust
Etang A
University of Otago

A large number of studies have used both an economic experiment and surveys to measure trust. There is some evidence on how behaviour in the experiment is related to socio-economic characteristics (for example, age, gender, income levels, educational attainment, marital status and group memberships). However, the relationship between survey trust and such characteristics has not been explored in the current literature. This paper explores this relationship. The survey data are categorized into context-specific and non-context specific trust. Context-specific questions specify how much trust people are being asked to place in others (for example, lending a bicycle to other village members), while non-context specific questions do not (for example, how much would you agree or disagree with the statement: “Generally speaking, most people can be trusted?”). Generally, the extent of trust declines as the radius of trust widens, suggesting that social distance is important. The results show some evidence that survey trust is correlated with some socio-economic characteristics. However, the correlates of context-specific and non-context specific trust are different. The number of years lived in the village is the key determinant of non-context specific trust. ROSCA membership is important for non-context specific trust in fellow ROSCA members only. Age and marital status are significantly negatively correlated with non-context specific trust in other village members. Income is what really matters for context-specific trust, however, years lived in the village and whether someone has ever lived in an urban area are also correlated with trust in fellow villagers.
P1.10 Finding the Invisible Hand: An Objective Model of Financial Markets
McLeod D
RedSky Systems Corporation

A financial model is presented which resolves the ambiguity in the efficient markets concept because it is consistent with rational expectations. Fundamental investors do not build self-contained models of return but rather isolate particular factors out of observed return in order to understand it. Price is not the weighted average of individual views but the product of interlocking expectations, and the continual revision of expectations causes price to gravitate to the efficient point. This behaviour can be understood in terms of a hidden substrate in which price is an information storing object, analogous to a set of genes in biology, and heterogeneous least squares learning is a genetic operator. The movement of price to the efficient point is emergent behaviour which cannot be determined from the initial state of the investors. How can the positive profit expectations of investors be reconciled with outcomes which have a net realization of zero? The answer derived from the objective model is that the use of price as a variable in estimating return is costly most of the time because of the imprecise nature of price compared with other variables. Nonetheless at least some investors will continue to use price as a variable, and subsidize other investors in normal times, because it is profitable to use price in bubble/crash situations. Bubble/crashes are not an aberration but an intrinsic part of the two-phase cyclical process (stable / bubble) which governs financial markets.

P1.11 On the Trade Balance Effects of Free Trade Agreements Between the EU-15 and the CEEC-4 Countries
Sova, S1, Rault, C2, Sova, R3
1 CES, Sorbonne University and E.B.R.C, 2 LEO, University of Orleans and IZA, Germany, and William Davidson Institute at the University of Michigan 3 CES, Sorbonne University, E.B.R.C and A.S.E

The expansion of regionalism has spawned an extensive theoretical literature analysing the effects of Free Trade Agreements (FTAs) on trade flows. In this paper we focus on FTAs (also called European agreements) between the European Union (EU-15) and the Central and Eastern European countries (CEEC-4, i.e. Bulgaria, Hungary, Poland and Romania) and model their effects on trade flows by treating the agreement variable as endogenous. Our theoretical framework is the gravity model, and the econometric method used to isolate and eliminate the potential endogeneity bias of the agreement variable is the fixed effect vector decomposition (FEVD) technique. Our estimation results indicate a positive and significant impact of FTAs on trade flows. However, exports and imports are affected differently, leading to some disparity in trade flow performance between countries. Therefore, there is an asymmetric impact on the trade balance, the agreement variable resulting in a trade balance deficit in the CEEC.

P1.12 Regional Energy Demand: An Analysis of Substitution Possibilities for China
Ma H1, Oxley L1, Gibson J2
1 University of Canterbury, 2University of Waikato

We calculate the missing technological change, factor demand and interfactor and interfuel substitutability by regions in China using a new and appropriate dataset and rigorous econometric methods. In particular, we use individual fuel price data, obtained from 150 city price bureaus covering a variety of energy sources and a two-stage approach, total factor cost functions and fuel share equations were estimated and the parameters used to calculate implied elasticity's of substitution ( ) and price elasticities ( ) for interfactor substitution and interfuel substitution. We decomposed regionally changing energy intensity to ascertain the driving forces of the recent increases in energy intensity. Taken together, the new results presented here provide the inputs necessary to construct informed forecasts of the potential for regional governments to adapt to the rising dependency on energy in a climate of rising fuel prices while, at the same time, attempting to minimize the effects on the environment, economic growth.
P1.13 A Word of Caution on Indices

Birks S
Massey University

A class of measures in the form of indices is increasingly being developed and used by researchers. Frequently such measures are treated as variables in regression equations. This is a questionable practice. The construction of an index requires three steps: i) the constituent items have to be selected; ii) weights must be assigned to these items; and iii) values for each of the items must be determined. Unless there is a specific basis for each step, it may be possible to construct numerous indices, all apparently measuring the same phenomenon, but giving different results. Therefore, misleading results can be obtained when indices are treated as cardinal measures in regressions. Reasons can be given for the decisions at each stage in the construction of price indices, and there are clear criteria for assessing the merits and accuracy of alternative options. The same cannot be said for many other indices, however. This paper takes the short form of the Economic Living Standard Index (ELSI) is an example. It is considered in the context of the above three steps, assessing whether decisions at each stage have a specific justification or are arbitrarily determined. The paper then considers some of the distortions that may arise as a result of arbitrary decisions. It does this by first identifying the possibility that index values may not even provide a unique ordering. It then considers how results may vary even when the ordering is invariant to the construction process. Finally, an index is an aggregate measure and hence is subject to the homogeneity requirement for the components of the aggregate in terms of the relationships for which the aggregate is used. This means that the legitimacy of an aggregate is context-dependent. The paper discusses these aspects from first principles. Clear grounds for caution are indicated.

P1.14 Australian and New Zealand Standard Research Classification (ANZSRC): Impact on Collection and Analysis of Economic Research Data

Hancock A
Statistics New Zealand

The Australian and New Zealand Standard Research Classification is a joint development of the Australian Bureau of Statistics, Statistics New Zealand and the Ministry of Research, Science and Technology (MoRST). Currently New Zealand has no statistical framework for producing quality data on research and development activities and the introduction of ANZSRC resolves this situation. ANZSRC will allow for the comparison of R&D data between sectors of the economy (e.g. general government, private non-profit organisations, business enterprises and educational institutions). The classification has comprehensive coverage of economic fields of research and socio-economic objectives covering such areas as economic theory, applied economics, econometrics, macroeconomics and microeconomics. ANZSRC provides a considerable degree of flexibility in meeting the needs of a wide variety of users. The hierarchical structure of both the FOR and SEO classifications enables them to be applied to particular purposes at various levels. ANZSRC also helps classify multi-disciplinary work, where several disparate areas of the FOR are usually brought together to address one area, or closely related areas of the SEO. The classification, over time, is intended to replacing existing research classifications and frameworks e.g. Marsden Fund. ANZSRC also provides cross-cutting output views for Aboriginal and Torres Strait Islander, Māori and Pacific Peoples research categories. Linking to other classification frameworks such as industry or product classifications is being considered. The paper will discuss the implications of producing a new standard framework for collecting and producing research and development information. In particular, the impact on collection and analysis of economic research data as well as the issue of implementing the framework across the Official Statistical System will be discussed. Issues around migrating from existing frameworks to the new standard will also be discussed.

P1.15 Forecasting using Discrete Event Simulation for Capacity Planning in the NZ Prison System

Wang J
Ministry of Justice

This paper presents a dynamic ‘Discrete Event Simulation’ (DES) model to forecast the prison population using historic data. Accurate forecasts of the prison population in the prison system are important to plan capacity to house the future prison population. Accuracy has positive spin-offs for risk management and increases the quality of investment decisions. The main forecasting model uses the underlying drivers’ mean values to derive point estimates of future levels of the prison population. The model uses time-series and other methods to determine the future values for the drivers of the model. It also incorporates known policy changes that might affect the prisoner population. For risk management purposes, a second DES model uses the empirical distributions of the prison population drivers to carry out a Monte Carlo simulation. The technique generates the distribution of the forecasts and assists with decisions about acceptable risks of under-capacity over the forecast horizon. This analysis is important to establish the risk of bed shortages and to plan peak capacity. This enables a buffer stock of required spare capacity to be calculated. The Monte Carlo simulation reveals that this calculation needs to allow for some non-normality.
Earnings Mobility in Korea
Oh J
Sungkyunkwan University

Earnings mobility is defined as the rate of change about relative income ranking which is shown from continuing two terms. It is important to measure of the equality of opportunity in a society and of the flexibility and freedom of its labor market. It is usually measured with a panel data. However, measurement of the mobility using panel data on earning is complicated by the presence of measurement error, and by non-random attrition from the panel. As an alternative, it has been shown that pseudo-panel methods can be used to consistently estimate measure of the mobility when genuine panels are not available. To investigate earnings mobility in Korea, we use the Korean Urban Household Survey (KUHS) with a pseudo-panel method. Our findings show that there is a substantial decrease in the mobility after the Asian financial crisis.

Poverty Mapping in China: Do Environmental Variables Matter?
Olivia S ¹, Gibson J ², Rozelle S ³, Huang J ⁴, Deng X ⁴
¹ University of California, Davis, ² University of Waikato, ³ Stanford University, ⁴ Chinese Academy of Science

Despite great success in reducing poverty, China still has over 100 million rural poor living in remote, mountainous, low rainfall environments. Many of these pockets of poverty are disguised with province-level data that most poverty analysis relies upon. Geographic targeting could be efficient but is difficult since household survey samples in China are too small to reliably estimate poverty at sub-provincial levels. Small area estimation in other developing countries combines the detailed information from household surveys with the more extensive coverage of census data. The survey data allow models of consumption to be fitted, with the explanatory variables restricted to those available from a recent census. Estimated coefficients are applied to census data, and consumption and the risk of poverty are predicted for each census household. Weighted totals of the predicted poverty probabilities can then be estimated very precisely for small geographic areas. These applications, however, typically neglect environmental components that may have important links with poverty and are not yet used in China. To bridge these gaps in existing research, we use census and household survey data, as well as environmental variables derived from high resolution satellite imagery to construct poverty maps for rural Shaanxi province in China. We construct and compare two poverty maps: one with and one without environmental variables. These maps let us assess how much leakage and under-coverage results when environmental variables are ignored by poverty maps.

Vocational Education and Poverty Exit in Korea
Ha T
Sungkyunkwan University

Previous studies of poverty showed that people who were female, older, less educated and less experienced were more likely to experience poverty. In addition, among those poor people, poverty-exit probability was shown to be higher for male, younger, more educated and experienced. This study examines which factors affect poverty-exit probability in Korea. We use the Korean Labor Income Panel Survey (KLIPS) which is a longitudinal survey of households and individuals residing in urban areas on their labor market and income activities. Though our findings are similar to those of previous studies, we uniquely found that the poverty-exit probability was affected not by university education, but mostly by vocational education.
P1.19 Water, Water Somewhere: The Value of Water in a Drought-Prone Farming Region

Grimes A 1,2, Aitken A 1
1 Motu Economic & Public Policy Research, 2 University of Waikato

Water is critical for agriculture, yet few studies internationally have analysed its value. We estimate farmers’ valuations of irrigated water using a dataset covering every rural property in the Mackenzie District over nineteen years. New Zealand has a system of water consents under the Resource Management Act enabling farmers with consents to extract specified quantities of water, both through large-scale irrigation infrastructure and localised means. We hypothesise that farmers pay a premium for land with a water consent and that the premium’s value is determined by the present discounted value of extra income due to the consent. The premium may vary according to the characteristics of the land (e.g. rainfall) which influence water’s marginal productivity. Our longitudinal dataset includes each property’s QVNZ land value and sale price - our dependent variables. Explanatory variables include three consents measures; land area; rainfall, slope and drainage; distance from towns; land use; and improvements value. We estimate land values as functions of these variables plus consent terms interacted with other variables to determine how valuation of water consents varies according to variations in conditions. We also test whether water consents affect the propensity for properties to be traded. While water is not explicitly traded, our methods determine a shadow price for water and isolate its key determinants. Water is valued higher: where the water right increases in size; where rainfall is lower; and where there are water-intensive land uses. Differing returns to water imply that the absence of trading results in allocative inefficiency.

P1.20 The Impact of The Terms of Trade Shocks on Malaysian Economy: A General Equilibrium Analysis

Pradesha A
International Islamic University Malaysia

The change in the terms of trade is an important source of macrroeconomic stability (Easterly, Kremer, Pritchett and Summers, 1993; Barro and Sala-i-Matin, 1995; Bleaney and Greenway, 2001; Hadass and Williamson, 2003), especially for a small open economy that heavily depends on external sector such as Malaysia. The country’s trade is mostly influenced by manufacturing sector, as its share in total export increased progressively from 11.9 per cent in 1970 to 81 percent in 2006 (MOF, 2007; MOF 1971). The trend of GDP growth in Malaysia is also consistent with the growth of the manufacturing sector. Greater than 50 percent of GDP growth from 1987 to 1997 came directly from manufacturing, with foreign firms accounting for over 75 percent of manufactured exports (Athukorala, 2001). Currently, the proportion of trade to GDP has reached approximately 230 per cent in 2006 (MOF, 2007). As a result, trade has had a strong effect on economic growth in Malaysia where the terms of trade holds strategic role in influencing the economic stability as an external disturbance. This study examines the impact of the changes in the terms of trade on Malaysian economy utilizing general equilibrium model, which emphasizes the relationship between external sector and domestic economy. The analysis will focus on how key macroeconomic variables namely (i) Gross Domestic Product (GDP), (ii) consumption, (iii) savings, (iv) investments, (v) government budget, (vi) exports and (vii) imports, are affected by the changes on the terms of trade. As this shock is a price shock transmitted through the real exchange rate adjustment, we also look at the impact on domestic prices, which are (viii) output price, (viii) consumer price and (ix) sales price. Based on the findings, we will propose some policy prescription to mitigate the impacts due to price disturbances by maintaining consumer welfare.

P1.21 Opinion Divergence and Post-Earning-Announcement Drift

Chen, M, Hsu, J
Department of Finance, National Chung Hsing University

In this paper, the impacts of investors’ opinion divergence on post-earning announcement drift (PEAD) are investigated. Two proxies for opinion divergence are considered: (i) the standard deviation of analyst’s earning forecasts (SDE) and (ii) abnormal trading volume turnover around the earnings announcement day (SAV%). This study focuses on 8,350 yearly-end earnings announcement events of 1,542 NYSE/AMEX firms for 1983-2002. Our empirical results show that, after controlling for firm size and firm-specific risk, these two proxies are associated with PEAD in different manners. It is found that SDE does not significantly affect PEAD. However, stocks with decreasing PEAD tend to exhibit high SDE, implying that opinion divergence among financial analysts is negatively related with PEAD. On the other hand, stocks with high SAV% tend to cause higher PEAD. It is also found that high SAV% and negative pre-announcement returns for positive earnings surprise would generate more pronounced PEAD. This reveals that investors need time to adjust their valuation when stocks are miss-priced prior to earnings announcement and exhibit opinion divergence among investors at earning announcement.
**P1.22 Credible Assignments and Incentives in the Minimum Effort Coordination Game**

Paichayontvijit, T, Chaudhuri, A  
University of Auckland

We use experiments to investigate the efficacy of credible assignments and incentive bonuses in resolving coordination failures in a stag-hunt type coordination game with multiple Pareto-ranked equilibria often referred to as a ‘weak link’ game. Participants routinely find it difficult to coordinate to the payoff-dominant outcome in such games. We study the efficacy of such assignments in resolving coordination failures among both fixed and randomly re-matched groups. Among randomly re-matched groups we also study, in addition to the assignment, the success of a performance bonus in facilitating coordination to the payoff dominant outcome. We look at performance in both fixed and randomly re-matched groups. Among randomly re-matched groups we also study, in addition to the assignment, the success of a performance bonus in facilitating coordination to the payoff dominant outcome. We look at performance in both fixed and randomly re-matched groups. In this paper we look at the success of two possible interventions designed to enhance coordination in weak-link games: (1) a ‘credible assignment’ and (2) a performance bonus. We study two different treatments vis-à-vis the assignment. In the public knowledge treatment we hand out a sheet of paper to each subject instructing them to choose the number that will lead to the payoff-dominant outcome. Here each subject knows that every other subject is looking at the exact same message. In the common knowledge treatment, in addition to handing out the exact same message to each subject, the experimenter also reads this message out loud. We find that a credible assignment is successful in resolving coordination failures among fixed groups as long as that announcement is public and common knowledge. Resolving such coordination failures in randomly re-matched groups is more difficult and can be achieved only by paying a performance bonus but not by a credible assignment.

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**Poster Session 2**

**Date:** Friday 11 July  
**Time:** 11.40 – 13.10  
**Location:** Renouf Foyer

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**P2.1 Fiscal Shocks and Real Exchange Rate Dynamics: Some Evidence from Latin America**

Caporale G, Ciferri D, Girardi A  
1 Brunel University, 2 University Tor Vergata, Rome, 3 Institute for Economic Studies and Analyses

This paper analyses the effects of fiscal shocks using a two-country macroeconomic model for output, labour input, government spending and relative prices which provides the orthogonality restrictions for obtaining the structural shocks. Dynamic simulation techniques are then applied, in particular to shed light on the possible effects of fiscal imbalances on the real exchange rate in the case of six Latin American countries. Using quarterly data over the period 1980-2006, we find that in a majority of cases fiscal shocks are the main driving force of real exchange rate fluctuations.

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**P2.2 Long Run and Cyclical Dynamics in the US Stock Market**

Caporale G, Gil-Alana L  
1 Brunel University, 2 University of Navarra

This paper examines the long-run dynamics and the cyclical structure of various series related to the US stock market using fractional integration. We implement a procedure which enables one to consider unit roots with possibly fractional orders of integration both at the zero (long-run) and the cyclical frequencies. We examine the following series: inflation, real risk-free rate, real stock returns, equity premium and price/dividend ratio, annually from 1871 to 1993. When focusing exclusively on the long-run or zero frequency, the estimated order of integration varies considerably, but nonstationarity is found only for the price/dividend ratio. When the cyclical component is also taken into account, the series appear to be stationary but to exhibit long memory with respect to both components in almost all cases. The exception is the price/dividend ratio, whose order of integration is higher than 0.5 but smaller than 1 for the long-run frequency, and is between 0 and 0.5 for the cyclical component. Also, mean reversion occurs in all cases. Finally, we use six different criteria to compare the forecasting performance of the fractional (at both zero and cyclical frequencies) models with others based on fractional and integer differentiation only at the zero frequency. The results show that the former outperforms the others in a number of cases.
P2.3 The Effect of Taxation and Inflation on Housing Markets in a Lifecycle Model with Credit Constraints
Coleman A
Motu Economics

This paper develops an overlapping-generations model of the housing market to explore how New Zealand’s taxation regime on housing affects the housing market, and how these effects depend on the inflation rate. The model, based on work by Ortalo-Magne and Rady (2006) and Coleman (2007) has a similar form to the life cycle model of Modigliani-Brumberg (1980). The model numerically aggregates the housing tenure and consumption choices of optimising agents who differ in terms of age and income to determine equilibrium rents, house prices, house price inflation and home ownership patterns. The equilibrium properties are a function of interest rates, the tax structure, the inflation rate, and the extent to which young agents face binding credit constraints. Once these equilibrium prices are found, the equilibria are compared to demonstrate how taxes affect the housing market.

P2.4 The Quantity Theory of Money in Historical Perspective
Graff M 1,2
1 KOF Swiss Economic Institute at ETH Zurich, 2 University of Queensland, School of Economics

The paper reconstructs the origins of the quantity theory of money and its applications. Against the background of the history of money, it is shown that the theory was flexible enough to adapt to institutional change and thus succeeded in maintaining its relevance. To this day, it is useful as an analytical framework. Although, due to Goodhart’s Law, it now has only limited potential to guide monetary policy and was consequently abandoned as guidance by most central banks. However, an empirical analysis drawing on a panel data set covering more than hundred countries from 1990 to the present confirms that the theory still holds: proportionality between the excess growth rate of the stock of money and the rate of inflation cannot be rejected. Yet, while the correlation holds for the whole sample, proportionality is driven by a relatively small number of influential observations with high inflation.

P2.5 How Reliable are Household Expenditures as a Proxy for Permanent Income? Implications for the Income-Nutrition Relationship
Kim B 1, Gibson J 2
1 Sungkyunkwan University, 2 University of Waikato

Many studies use estimates of short-run expenditures from household surveys to proxy for unobserved permanent income. This noisy proxy may attenuate estimates of the effects of income and economic growth on a range of outcomes. This paper uses a survey with repeated observations on households during the year to calculate reliability ratios and uses these to estimate errors-in-variables models of calorie intakes. These estimates are compared with upper and lower bounds estimates from calorie availability data that have correlated measurement errors. The results show a significant effect of income on nutrition unlike several revisionist studies in the literature based on calorie intake data.

P2.6 Optimal Capital Taxation under Limited Commitment
Lee J 1, Chien Y 2
1 The Australian National University, 2 Purdue University

We study optimal capital taxation under limited commitment. We prove that the optimal tax rate on capital income should be positive in steady state provided that full risk-sharing is not feasible. In a limited commitment environment, a one unit increase of capital investment by an agent increases all individuals’ autarky values in the economy and generates externality costs in the economy. This externality cost provides a rationale for positive capital taxation even in the absence of government expenditure. Moreover, we show that both this externality cost of capital investment and the optimal tax rate are potentially much bigger than one might expect.
P2.7 Political Events and Financial Market Volatility: Investigating the Link Using Markov Switching Process
Khalid A, Rajaguru G
1 Bond University

This paper investigates the impact of political shocks (positive and negative) on financial markets. Using data from Pakistan for the period January 1999 to September 2006, we try to link ‘a’ political event to the financial market volatility. It is to be noted that Pakistan experienced fair economic growth, though with cyclical downturns until recently when the economy showed signs of recovery and high growth. The major reasons for cyclical growth were domestic political instability, external factors and internal macroeconomic mismanagement. The economic reforms initiated in 1990s could not contribute much to economic success due to (and again) a lack of political consensus built to implement these policies, high level of corruption and political instability. The result: by the end 1999, the country had exceptionally high level of debt with foreign exchange reserves enough for mere 3-months of imports. However, the post-September 11 events turned out to be a way out for Pakistan. Pakistan’s decision to become part of US-led war against terrorism opened the doors for soft loans and aid from Western countries and the United States. These factors increased foreign reserves at a historically high level of above US$12 billion and led to a slight appreciation of the currency as well as improvement in country’s credit rating. But the important question is whether these shocks had any impact on the financial market that lead to the declining trend of the economy. On a flip side of the coin, one may ask if the economic recovery in 2001 onward was the result of any positive external shocks. This is our testable hypothesis.

The study uses Markov Switching process to analyze the impact of positive and negative shocks on Pakistan economy. First, we list a series of domestic an international political events that are expected to have some impact on the economy. These events are categorized as negative or positive. Any negative event is expected to have a negative impact on the domestic economy while a positive event is expected to lead to high economic growth. We use a questionnaire to confirm our conjecture of negative and positive shocks. We use high frequency data for currency market for empirical estimation. We first use a Markov Switching process to identify low and high volatility regimes in Pakistan’s currency market and then link these regimes to certain political events. Later, we extend the analysis to other two indicators of the financial markets, namely stock market and the money market. We use data on exchange rates, stock prices and interest rates and use Granger causality, Variance Decomposition and Impulse responses in a VAR model to determine if the three markets are interlinked. Finally, we trace the impact of political events moving from one market to another using these linkages and causal relationship. The results suggest that the markets have some weak linkages but do not support a long-run causal relationship. The results also confirm the changes in the market volatility as a result of some domestic and international events having impact on the domestic economy and the financial market.

P2.8 It Never Rains but it Pours: Modelling the Persistence of Spikes in Electricity Prices
Christensen T 1, Hurn S 1, Lindsay K 2
1 Queensland University of Technology, 2 University of Glasgow

During periods of market stress, electricity prices can rise dramatically. This paper treats these abnormal episodes or price spikes as count events and attempts to build a model of the spiking process. In contrast to the existing literature, which either ignores temporal dependence in the spiking process or attempts to model the dependence solely in terms of deterministic variables (like seasonal and day of the week effects), this paper argues that persistence in the spiking process is an important factor in building an effective model. A Poisson autoregressive framework is proposed in which price spikes occur as a result of the latent arrival and survival of system stresses. This formulation captures the salient features of the process adequately, and yields forecasts of price spikes that are superior to those obtained from naive models in which persistence in the spiking process is not accounted for.
P2.9 Unhappiness Effects of Risk and Duration of Unemployment

Ochsen C 1, Welsch H 2

1 University of Rostock, 2 University of Oldenburg

Over the past decade or so it has become a familiar approach to assess the welfare consequences of economy–wide phenomena in terms of their impact on subjective well-being (happiness, life satisfaction). Especially, the happiness consequences of unemployment have become an important field of research. According to this literature, being unemployed features among the strongest individual determinants of unhappiness, and the non-pecuniary effect of being unemployed may be larger than the effect that stems from the associated loss of income.

In addition to these individual effects, unemployment may act as a social bad, that is, people may be unhappy about unemployment even if they are not themselves out of work. For instance, they may worry about the possibility of becoming unemployed themselves when the general unemployment level is high, or they may fear that social tension may increase. Consistent with these and related hypotheses, Di Tella et al. (2001) finds a considerable effect of the general unemployment rate on self-rated life satisfaction in several European countries, even when controlling for the individual employment status. There is thus not only a private, but also a social cost to unemployment.

Our point of departure is the fact that any given level of the annual unemployment rate can be explained by risk and duration of being unemployed. In addition, unemployment duration can be driven by a high number of persons unemployed for a short period of time or a high number of persons unemployed for a longer period. These differences in flows and stocks on the labor market can affect life satisfaction differently.

The question then arises to what extent life satisfaction is affected by the risk of being unemployed and the duration of unemployment. If the latter effect is negative but smaller, this would indicate that the fear of losing one’s job is more pronounced when the prospect is to stay unemployed for a long time.

Using approximately 300,000 micro data (Eurobarometer) for eleven European countries, 1983-2002, we find that the percentage of jobless people that are unemployed for more than one year affects self-rated life satisfaction significantly positive. This suggests that society may have no interest in reducing the share of long-term unemployment (at a given unemployment rate), because this reduces the flow from employment to unemployment. In contrast to this, the risk of being long term unemployed has a significant negative effect. What seems to bother people is thus not just the risk of becoming unemployed, but especially the risk of permanently staying out of work.

Alternative specifications control for the effects of benefit replacement rate and the duration of payment on life satisfaction. With respect to the replacement rate, we find significant positive effects on life satisfaction. Benefit duration has no significant effect. Compared to the above mentioned results it is again the risk of becoming unemployed that affect people more. In addition, we find that these labor market institutions significantly mitigate the fear of becoming unemployed in a sizable way.

In a third step we control for different socio-demographic subgroups. With respect to the share of long term unemployed we find that with increasing age this aspect is more and more a cause for concern. For the risk of being long term unemployed we find the exact opposite. This is in line with the empirical literature on risk and duration of unemployment. Furthermore, the impact of risk on life satisfaction decreases in magnitude when people have a higher education level. Finally, the non-pecuniary negative effect of being unemployed on life satisfaction can be explained for the most part by the risk of becoming long term unemployed.

P2.10 An Empirical Test of Methods for Estimating Price Elasticities from Household Survey Data

Kim B 1, Gibson J 2, Rozelle S 3

1 Sungkyunkwan University, 2 University of Waikato, 3 Stanford University

Unit values, calculated as the ratio of household expenditure on a particular food to the quantity consumed, are often used as proxies for market prices in demand studies based on cross-sectional survey data. Because unit values are likely to give biased estimates of price elasticities, Deaton (1987, 1990) developed procedures for correcting these biases. However, empirical evidence on the bias created by unit values in demand systems is lacking. In this paper we use data collected specifically to carry out comparisons with the results of using market prices. Our findings suggest that unit values, whether used in naive or improved estimation procedures, provide poor approximations to the elasticities calculated with market price data. We provide an example where optimal tax reform is distorted by using price elasticities calculated from unit values.
P2.11 Trends in Tourist Expenditure Measured in Volume Terms
Tantririgama T, Taniguchi M
Statistics New Zealand

The Tourism Satellite Account (TSA) produced by Statistics New Zealand is currently published in nominal terms or current prices. There is a growing interest to analyse the growth of tourist expenditure in volume terms and this has been recognised by the United Nations World Tourism Organization as a practice to be adopted in measuring tourism impacts. The purpose of this study is to provide an alternative measure of tourist expenditure in New Zealand in volume (or real) terms, thereby removing underlying inflationary effects. The methodology is based on the chain-linking approach adopted by Statistics New Zealand in producing real measures for aggregates such as gross domestic product. Consistent with Statistics New Zealand’s approach, the selected measure for analysis is an annually reweighted chained Laspeyres volume measure covering the years 2000–2007. The expenditure series in nominal price from the TSA was used to compile the volume series. Price indices were also obtained from Statistics New Zealand sources, and to ensure accurate measurements, detailed calculations were carried out. Findings, however, are presented at an aggregated level. Results indicated that real growth of tourism expenditure was slower than growth measured in nominal terms. In addition, it also showed that real expenditure recorded significantly slower growth after 2004 when compared with previous years, reflecting the impact of inflationary pressures. Slower growth is more prominent for domestic tourist expenditure. Product categories most affected by high price increases in recent years have been air passenger transport, retail fuel and other automotive products.

P2.12 National Accounts: An Optimisation Approach for Balancing Supply and use Tables
Kole J
Statistics New Zealand

Statistics New Zealand uses a supply and use framework within the national accounts to confront and reconcile the annual production and expenditure estimates of gross domestic product (GDP). This framework is a powerful statistical and analytical tool used to balance the flows of goods and services in the economy. The supply and use approach also provides the basis for checking the consistency of the measures of the supply and use of goods and services, which have been estimated from different statistical sources. The balancing process requires detailed and up-to-date product data on inputs and outputs by industry. The primary vehicle for collecting product data is through a commodity data collection (CDC) survey, which is tailored to the specifications of each individual industry. To support the large-scale implementation of this new data in supply and use tables, an optimisation model was developed. The model is formulated as a linear program where the new product data is incorporated as far as possible into the supply and use tables, given some balancing constraints. Results from this optimisation model can provide an improved starting point for the manual balancing process. The aim is to implement a comprehensive set of up-to-date input and output product proportions in the supply and use framework for the annual national accounts release in November 2009.

P2.13 Statistical Significance and Policy Significance
Birks S
Massey University

Research findings sometimes play a part in the policy making process. This can happen through direct use of analysis, or through their impact on public perceptions and preferences as a result of media coverage. There are opportunities in this process for distortions to occur. This paper looks at one aspect of this, namely the potential for statistical significance to be interpreted as policy significance. The two are not the same. They can diverge for several reasons. Some, such as the difference between correlation and causation, are widely recognised in statistics. Others may merit some attention. Two aspects considered here are first, the policy options suggested by statistical significance, and second, some policy analysis criteria that are not covered by statistical significance alone. On the first aspect, there are two perspectives on an association between two variables from which policy suggestions may be made. One policy approach would be to alter the value of one variable, the policy instrument, to alter the value of another variable, the target variable. This is the usual perspective. Sometimes it is not possible to change policy instrument. The policy focus then turns to means of changing the relationship between the two variables. This second option, altering the relationship, may be generally available when considering relationships between variables. However, if the first option is feasible, then the second is generally overlooked. The second aspect to be considered in the paper is that there are some well-recognised policy analysis criteria that are not covered by statistical significance alone. Standard economic approaches to policy making require consideration of alternative options, including assessment of their costs and benefits. There could also be thought given to the extent of control available, and risk and uncertainty. Explicit consideration of policy aspects may result in improved use of statistical findings.
P2.14 The Distributional Impact of KiwiSaver Incentives
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1 Waikato Management School, 2 NZ Institute of Economic Research

New Zealand’s approach to retirement saving changed profoundly with the introduction of KiwiSaver and tax incentives. Previous retirement income policy relied on NZ Superannuation, which reduces lifetime inequality, but these tax incentives will increase future inequality and lead to diverging living standards for the elderly. In this paper we use data from a nationwide survey to measure the distributional effects of these tax incentives. We focus on the $1000 kickstart, the matching tax credit of $20 per week and the exemption from withholding tax on employer contributions. Estimates are reported for both initial and lifetime impacts, with the greatest effect on inequality apparent in the lifetime impacts.

P2.16 An Efficiency Wage - Imperfect Information Model of the Phillips Curve
Campbell C
Northern Illinois University

This study develops an efficiency wage model in which workers have imperfect information about average wages at other firms. Firms’ profit-maximizing behavior results in a Phillips curve relationship between inflation (either of wages or prices), unemployment, and lagged inflation. The wage-wage Phillips curve is a reduced form relationship that is derived directly from the profit-maximizing behavior of firms, and the coefficient on lagged wage inflation exactly equals 1. The wage-price and price-price Phillips curves are statistical relationships obtained from modeling stochastic shocks to the growth rate of aggregate demand. In response to these shocks, the profit maximization problem of firms yields expressions for wages, prices, and unemployment as functions of the shocks, and these expressions are then treated as data in a wage-price and price-price Phillips curve regression. It is demonstrated that the coefficient on lagged price inflation asymptotically approaches 1 for both the wage-price and the price-price Phillips curves and that, even when the sample size is small, the coefficient is very close to 1 with reasonable parameter values. The profit-maximizing behavior of firms also yields an upward-sloping curve (referred to as the Dynamic Labor Demand (DLD) curve) in unemployment – wage inflation space, and the intersection of the Phillips curve and DLD curve determines the rate of wage inflation and the unemployment rate. In addition, the model makes predictions about the cyclical behavior of real wages. Real wages are strictly procyclical in response to technology shocks, but can be either procyclical or countercyclical in response to aggregate demand shocks.

P2.17 How the Distribution of Unemployment by Duration Affects the Unemployment Rate
Ochsen C
University of Rostock

This paper examines the effects of the distribution of unemployment by duration on the level of unemployment. It explores one central assumption that is observed empirically: when the share of long-term (short-term) unemployed increases, the unemployment rate increases (decreases). By embodying this assumption in a standard equilibrium unemployment model we characterize the joint behavior of unemployment and the distribution of unemployment by duration. In the theoretical part of the paper an extension of the standard equilibrium unemployment model is provided where the average job finding probability depends on the distribution of unemployment by duration. In the empirical section we estimate a panel data model for 16 OECD countries to test the implications of the theoretical model. The main results are: First, in a steady state equilibrium the flow rates are larger, the larger the share of short-term unemployed. Second, out of steady state the unemployment rate increases (decreases) with the share of long-term (short-term) unemployed. Third, the larger the duration dependent job finding probabilities the larger the share of short term unemployed. Fourth, panel estimates for 16 OECD countries provide robust and significant evidence that an increase in the share of short- term (long-term) unemployment decreases (increases) the unemployment rate. Therefore, the empirical evidence supports our hypotheses whereby (a) the reemployment probability decreases with an increasing spell of unemployment and (b) average exit rates have international differences. Hence, the different experiences with unemployment on both sides of the Atlantic can be explained by observed aggregated duration dependence and differences in the average exit rate.
Although the business cycle status of the economy is not directly observable, our most educated estimate of its turning points is embodied in the binary variable announced by the NBER Business Cycle Dating Committee. These announcements are based on the consensus of a panel of experts, and they are made some time (usually six months to one year) after the time of a turning point in the business cycle. Of course, this delay is too long to make the information useful. For this reason, there are many models to predict the economy’s business cycles, for example Burns and Mitchell (1946), Stock and Watson (1988a, b, 1989, 1991, 1993a) and Chauvet (1988). Issler and Vahid (2006) were the first to use the information contained at the NBER indicator to construct coincident and leading indicator indices of economic activity, the IVCI and ILCI, respectively. In their work they reported some evidence that the weights of their indexes are likely to vary over time. This evidence was also reported by other authors. For example, Chauvet (1998) reported some different aspects in the coincident series at the 1990 recession and Stock and Watson (1998) argued that the combinations of shocks that induce the business cycles might vary from a cycle to the next.

In this paper we extend the ideas presented by Issler and Vahid (2006) to build coincident and leading indexes of economic activity that allows the weights of coincident and leading variables to vary over time. As Issler and Vahid (2006) we use canonical correlation analysis to extract the cycles from the coincident variables (employment, industrial production, sales and income). With the cycles obtained we run a state space probit equation using the NBER indicator to estimate the time-varying coefficients related to each of these cycles. Combining the contribution of each coincident series to the cycles and the coefficients related to each cycle estimated by the probit regression we have the time-varying weights of coincident series that constitute our coincident index called Kalman Filter Coincident Index (KFCI) and Kalman Smoother Coincident Index (KSCI).

The canonical correlation analysis has an important role in our methodology. It extracts the cycles from the coincident series that have common features with the “business cycle”, where by cycle we mean the information that can be linearly predicted from the past. This step is important for some reasons: (i) it allows us to extract the non-cyclical features from the coincident series that could affect negatively the estimation, as noted by Chauvet (1998); (ii) since the past information set is a combination of lags of leading and coincident variables, it combines the estimation of coincident and leading indicator indices and; (iii) It allows for the possibility of asymmetric cycles in coincident series. The estimation procedure chosen for obtaining the state space probit model states estimates is the extended iterated Kalman filter and smoother. Although this method is based on a Taylor expansion, the predictive power of the implemented model ensures the good quality of adjustment, as we report in the following paragraph. The NBER Business Cycle Dating Committee uses information available at time t+h, where h is some positive integer, to decide whether the economy at time t is in recession or not. This generates a MA(h) structure at the error terms. This dynamic structure is incorporated in the model, exploring the flexibility of the state space formulation. We also adapt the procedure presented by Rivers and Vuong (1988) to deal with presence of endogeneity in the data.

Our preliminary results are promising. Our model shows a significant gain to predict recessions Compared to Issler and Vahid (2006) one. For example, using the same data set, our filtered probabilities predict 92.54 % of the recessions, compared to 77 % obtained by then. We also have some evidence that the weights vary slight over time. The employment weight varies over time in a range of 1.07 to 0.94 during the studied period. This agrees with a memo of the Business Cycle Dating Committee (Hall et al., 2002, p. 9) where they state “employment is probably the single most reliable indicator [of recessions]”.

This paper examines the cyclical behavior of nominal wages in the United States during the 1920s and 1930s. Although these decades are typically omitted from historical macroeconomic studies of wage cyclicity, many scholars allege wages became stickier during those decades, most likely in the response to the Crash of 1929 or with the First New Deal in 1933. This paper tests that assertion using a modified Phillips Curve framework in which the monthly change in nominal hourly earnings is regressed against current and lagged values of industrial production and wholesale prices. The results indicate that wages were sticky in both the 1920s and the 1930s, since in both decades the cumulative impact of thirteen successive 1% changes in output has a very small predicted effect on wages, and the cumulative impact of thirteen 1% changes in wholesale prices, while stronger, is much less than one-for-one. The results further suggest that wages became significantly stickier in 1933, though not in 1929. This last result seems to contradict the widespread belief that wage stickiness was a key transmission mechanism in the Great Contraction of 1929-33, since the severe nominal shocks of 1920-21 did not result in a long-term depression in the early 1920s, despite the similar degree of wage stickiness in both episodes. The apparent increase in wage stickiness after 1933 is coincident with the change in policy regime under President Roosevelt’s New Deal, which ushered in a host of measures that had the effect of shielding workers from wage cuts.
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<td>17:40-19:30</td>
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<td>19:30-20:30</td>
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<td>20:30-22:30</td>
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**Wednesday, 9th October**

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<tr>
<td>08:30-10:00</td>
<td>Time Series: Forecasting of Key models and the Phillips Curve</td>
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<tr>
<td></td>
<td>Chair: Martin Fakus (1.1), (1.2)</td>
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<tr>
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<td>EDN: Game Theory</td>
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<tr>
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<td>Chair: Rinan Richford (2.1), (2.2), (2.3)</td>
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<td>Microeconomics: Networks</td>
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<td>Chair: Arthur Robinson (3.1), (3.2), (3.3)</td>
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<td>11:00-13:00</td>
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**Thursday, 10th October**

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<td>08:30-10:30</td>
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**Friday, 11th October**

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**Monday, 14th October**

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**Tuesday, 15th October**

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