College of Commerce
Division of Economic and Financial Studies
Business Department

DEM127:
Elements of Demography

Unit Outline
Second Semester, 2005

Unit Co-ordinator: Dr. Nick Parr

Lecture Times and Locations:
Monday: 6:05pm – 6:55pm in W5A Price Theatre
Tuesday: 6:05pm – 6:55pm in X5BT1
DEM127: ELEMENTS OF DEMOGRAPHY
Second Semester 2005

Students in this unit should read this unit outline carefully at the start of semester. It contains important information about the unit. If anything in it is unclear, please consult one of the teaching staff in the unit.

ABOUT THIS UNIT

About Demography

Demography is the study of the changing size and composition of human populations, and the causes and consequences of such change. This subject will be useful not only to those with an interest in learning about population change it will also provide knowledge and skills which will be valuable to those aiming to pursue study or careers in marketing, market research, economics, statistics, health, business and many other areas. The size and composition of markets, electorates, public service clienteles and the labour force all are related to demography. Because of this, demographic analysis can assist planning marketing campaigns, retail site location, electoral campaign strategies and public sector resource allocation decisions, such as where to build schools and hospitals.

Credit Points for this Unit: 3

The Rationale and Objectives of the Unit

This unit will introduce students to the study of demography and provide a platform of knowledge and skills for further studies in this field. The main objective is to introduce students to the analysis of changes in population size and composition. The patterns of fertility, mortality and migration in Australia and other countries will be described, and their implications for population size and composition outlined. The main sources of demographic data and the main techniques for analysing population change will be introduced. Practical applications of demography in the public sector and the private sector will be discussed.

In addition to developing a knowledge of the basic elements of demography, the unit will assist students in developing skills in note-taking, accessing and analysing data, problem solving and critical thinking.

TEACHING STAFF

<table>
<thead>
<tr>
<th>Name</th>
<th>Task</th>
<th>Room</th>
<th>Phone No.</th>
<th>Email</th>
</tr>
</thead>
<tbody>
<tr>
<td>Dr. Nick Parr</td>
<td>Lecturer-in-Charge</td>
<td>C5C-326</td>
<td>9850 8570</td>
<td><a href="mailto:nparr@efs.mq.edu.au">nparr@efs.mq.edu.au</a></td>
</tr>
<tr>
<td>Ms Linda Owens</td>
<td>Tutor</td>
<td>C5C-484</td>
<td>9850 8559</td>
<td><a href="mailto:lowens@efs.mq.edu.au">lowens@efs.mq.edu.au</a></td>
</tr>
<tr>
<td>Mr Wei Zhou</td>
<td>Tutor</td>
<td>NA</td>
<td>NA</td>
<td><a href="mailto:SydneyLife2009@yahoo.com.au">SydneyLife2009@yahoo.com.au</a></td>
</tr>
<tr>
<td>Ms. Shanley Chong</td>
<td>Tutor</td>
<td></td>
<td></td>
<td><a href="mailto:schong@efs.mq.edu.au">schong@efs.mq.edu.au</a></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Name</th>
<th>Task</th>
<th>Room</th>
<th>Phone No.</th>
<th>Email</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ms. Shanley Chong</td>
<td>Tutor</td>
<td>Statistical information system laboratory</td>
<td>9850 6138</td>
<td><a href="mailto:schong@efs.mq.edu.au">schong@efs.mq.edu.au</a></td>
</tr>
</tbody>
</table>
**Consultation Hours**

Students are most welcome to visit the lecturer-in-charge during his consultation hours. If you cannot make the scheduled consultation hour you are still welcome to visit, however, since there is no guarantee that the staff will be available outside the hours below, phoning or emailing to make an appointment would be advisable. Please note that Dr Parr will be taking parental leave every Thursday and Friday this semester and will be unavailable for consultation on these days.

<table>
<thead>
<tr>
<th>Name</th>
<th>Scheduled Consultation Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td>Dr. Nick Parr</td>
<td>Tuesday 3pm – 5pm</td>
</tr>
</tbody>
</table>

**CLASSES**

**Lectures and Tutorials: Times and Venues**

Students are expected to attend both lectures and one specified tutorial per week.

The times and venues of the lectures are:
Monday 6:05-6:55pm in W5A Price Theatre  
Tuesday 6:05-6:55pm in X5B T1

The times and venues of the tutorials are:
Monday 7:05 -7:55pm in C5C236  
Monday 8:05 - 8:55pm in C5A404  
Tuesday 4:05 - 4:55pm in C5A401  
Tuesday 4:05 - 4:55pm in C5C303  
Tuesday 5:05 - 5:55pm in C5A307  
Tuesday 5:05 – 5:55pm in C5A401

Please bring a calculator, lecture notes and the textbook to all tutorials. *Please note that there will be no tutorials in the first two weeks of this semester.*
REQUIRED AND RECOMMENDED TEXTS AND MATERIALS

Recommended Textbook


Or

A.H. Pollard, Farhat Yusuf and G.N. Pollard, *Demographic Techniques* (third edition, 1990). The sections relevant to this unit are Chapters 1-6 and 8. A copy has been placed in the Special Reserve section of the library for photocopying.

Other Useful Sources of Information

Parr, N.J. and Farhat Yusuf *A Workbooklet in the Elements of Demography* (available via the DEM127 webpage or from the Library Reserve Collection webpage) includes many data analytic exercises that should help students to prepare for tutorials, class tests and the final examination.


A list of other useful references can be accessed from the DEM127 page on the Demography web site (http://www.bus.mq.edu.au/dem/127REFRER.html).

Overheads and Note-taking

Copies of a selection of the overheads shown in lectures will be available on the Reserve Collection page of the Macquarie University library website (http://www.lib.mq.edu.au/resources/reserve). A copy of the *Workbooklet in the Elements of Demography* may also be accessed.

*Note that the overheads offer only a skeletal coverage of the topics covered in lectures that must be augmented by additional note-taking during the lecture or using the recommended references. Please also note that only some of the overheads shown in lectures are available (eg. ones with key formulae or definitions or with tables of data that would be too lengthy to copy down during a lecture).*

UNIT WEB PAGE

The web page for this unit can be found at www.bus.mq.edu.au/dem/127.htm. Of particular importance is the DEM127 Bulletin Board www.bus.mq.edu.au/dem/127bulletin.htm. The Bulletin Board will be used by the Lecturer-in-Charge to relay information about the unit to students. It is expected students will visit this page on a regular basis.

The address of the Macquarie University Demography website is www.bus.mq.edu.au/dem/.

The site contains an array of materials relating to the various undergraduate units in demography.
LEARNING OUTCOMES

The main outcomes that students are expected to achieve from this unit include:
- knowledge of the basic demographic concepts;
- knowledge of the sources of demographic data;
- ability to use basic demographic techniques to calculate and interpret demographic measures;
- ability to analyse changes in population size and composition in Australia;
- understanding of the patterns of fertility, mortality and migration in Australia;
- knowledge of the uses of demography in public and private sectors; and
- ability to compile notes and write short essays on relevant demographic topics.

In addition to the discipline-based learning objectives, all academic programs at Macquarie seek to develop students’ generic skills in a range of areas. One of the aims of this unit is that students develop their skills in the following:
- foundation skills of literacy and numeracy;
- information literacy skills;
- analytic and problem-solving skills
- memory skills
- combinations of these skills.

TEACHING AND LEARNING STRATEGY

The teaching strategy consists of the provision of information in the two weekly lectures on Monday and Tuesday and one specified weekly tutorial (starting week three). Copies of overhead slides for each topic will be provided via the Library e-Reserve page, which could be printed out before the lecture. It is expected that students will attend the two weekly lectures and tutorial on a regular basis and will actively take notes during the lectures.

In addition to the time spent attending lectures and tutorials and doing assignments, each student is expected to spend a significant amount of time preparing for lectures and tutorials, updating lecture notes, learning the key formulae, attempting exercises from the textbook and workbooklet, reading the demographic literature, and revising for tests and exams (12 hours per week is recommended).

A week-by-week list of the topics covered is provided on the following page.
## DEM127: ELEMENTS OF DEMOGRAPHY
### SCHEDULE OF LECTURES
#### Second Semester, 2005

<table>
<thead>
<tr>
<th>Date</th>
<th>Topic</th>
<th>Lecturer</th>
<th>Tutorials &amp; Assignments</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Week 1</strong></td>
<td>Monday 1 August&lt;br&gt;<strong>Tuesday 2 August</strong></td>
<td>Introduction to demography&lt;br&gt;Sources of demographic data I</td>
<td>NP&lt;br&gt;NP</td>
</tr>
<tr>
<td><strong>Week 2</strong></td>
<td>Monday 8 August&lt;br&gt;<strong>Tuesday 9 August</strong></td>
<td>Sources of demographic data II&lt;br&gt;Basic demographic measures I</td>
<td>NP&lt;br&gt;NP</td>
</tr>
<tr>
<td><strong>Week 3</strong></td>
<td>Monday 15 August&lt;br&gt;<strong>Tuesday 16 August</strong></td>
<td>Basic demographic measures II&lt;br&gt;Basic demographic measures III</td>
<td>NP&lt;br&gt;NP</td>
</tr>
<tr>
<td><strong>Week 4</strong></td>
<td>Monday 22 August&lt;br&gt;<strong>Tuesday 23 August</strong></td>
<td>Computation of life tables I&lt;br&gt;Computation of life tables II</td>
<td>LO&lt;br&gt;LO</td>
</tr>
<tr>
<td><strong>Week 5</strong></td>
<td>Monday 29 August&lt;br&gt;<strong>Tuesday 30 August</strong></td>
<td>Uses of life tables&lt;br&gt;Internal migration &amp; population distribution in Australia</td>
<td>LO&lt;br&gt;Guest</td>
</tr>
<tr>
<td><strong>Week 6</strong></td>
<td>Monday 5 September&lt;br&gt;<strong>Tuesday 6 September</strong></td>
<td>Measurement of fertility&lt;br&gt;Fertility trends &amp; differentials in Australia</td>
<td>LO&lt;br&gt;NP</td>
</tr>
<tr>
<td><strong>Week 7</strong></td>
<td>Monday 12 September&lt;br&gt;<strong>Tuesday 13 September</strong></td>
<td>Measurement of mortality &amp; standardisation&lt;br&gt;Class Test No. 1 (in Lecture time)</td>
<td>LO&lt;br&gt;NP</td>
</tr>
<tr>
<td><strong>Mid-Semester Teaching Break (16 September–4 October)</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Week 8</strong></td>
<td>Monday 3 October&lt;br&gt;<strong>Tuesday 4 October</strong></td>
<td>Public Holiday (no class)&lt;br&gt;Mortality trends &amp; differentials in Australia</td>
<td>NP&lt;br&gt;NP</td>
</tr>
<tr>
<td><strong>Week 9</strong></td>
<td>Monday 10 October&lt;br&gt;<strong>Tuesday 11 October</strong></td>
<td>Population projections I&lt;br&gt;Population projections II</td>
<td>LO&lt;br&gt;LO</td>
</tr>
<tr>
<td><strong>Week 10</strong></td>
<td>Monday 17 October&lt;br&gt;<strong>Tuesday 18 October</strong></td>
<td>Marriage and Family in Australia&lt;br&gt;World population growth</td>
<td>Guest&lt;br&gt;NP</td>
</tr>
<tr>
<td><strong>Week 11</strong></td>
<td>Monday 24 October&lt;br&gt;<strong>Tuesday 25 October</strong></td>
<td>International migration in Australia&lt;br&gt;Class Test No. 2 (in Lecture time)</td>
<td>Guest&lt;br&gt;NP</td>
</tr>
<tr>
<td><strong>Week 12</strong></td>
<td>Monday 31 October&lt;br&gt;<strong>Tuesday 1 November</strong></td>
<td>Demography of Australia's Aborigines&lt;br&gt;Uses of demography in the private sector</td>
<td>Guest&lt;br&gt;Guest</td>
</tr>
<tr>
<td><strong>Week 13</strong></td>
<td>Monday 7 November&lt;br&gt;<strong>Tuesday 8 November</strong></td>
<td>Uses of demography in the public sector&lt;br&gt;Conclusion: Exam format &amp; unit evaluation</td>
<td>Guest&lt;br&gt;NP</td>
</tr>
</tbody>
</table>

Lecturers: (NP) Dr. Nick Parr, (LO) Linda Owens
Assessment will be by five assignments, two class tests, and a final examination. The weighting given to the various assessment tasks will be:

**Assignments (five in total)** 10%
Class Test 1 10%
Class Test 2 10%
Final Exam 70%

The five assignments are designed to help students to practise what they have learned in the lectures. Major demographic concepts and techniques introduced in the lectures are incorporated into the five assignments. Questions in the class tests and the final exam will include calculating and interpreting major demographic measures, explaining demographic concepts, and writing short notes on certain demographic topics. The two class tests will also include a section of multiple choice questions which will be used to assess students' knowledge and understanding of the basic demographic concepts, structures and trends. All questions are designed to assess students' learning outcomes listed in the above section.

Details of the dates for distribution of and submission of assignments are presented on the schedule of lectures. All assignments submitted should have a cover sheet which clearly states the student's name, ID number, the name and code of the unit, the tutor's name, and the number and date of submission of the assignment.

The due dates and times for the submission of assignments will be the dates and times of the tutorials. All assignments should be submitted to your tutor at the tutorial. Penalties will be incurred for the late submission of assignments, unless satisfactory evidence of unavoidable disruption is presented. Tutors may refuse to mark the work of students who have a poor record of attendance or who have previously been late in submitting assignments (without satisfactory evidence of unavoidable disruption) on more than one occasion.

Students will be permitted to use a small battery-operated calculator in tests and exam, provided it does not have a text-returnable capacity. Dictionaries are not allowed in class tests and exam.

Students are advised that a poor record of attendance in lectures and tutorials may adversely affect the grade awarded. Satisfactory attendance in lectures and other activities may be used to determine a marginal grade. A marginal performance in the final examination will normally result in a marginal final grade being given. Satisfactory attendance is 75% of tutorials and 75% of lectures.

The University Examination period in the Second Half Year 2005 is from 16 November to 2 December. You are expected to present yourself for examination at the time and place designated in the University Examination Timetable. The timetable will be available in Draft form approximately eight weeks before the commencement of the examinations and in Final form approximately four weeks before the commencement of the examinations.  
The only exception to not sitting an examination at the designated time is because of documented illness or unavoidable disruption. In these circumstances you may wish to consider applying for Special Consideration. Information about unavoidable disruption and the special consideration process is available at http://www.reg.mq.edu.au/Forms/APSCons.pdf

If a Supplementary Examination is granted as a result of the Special Consideration process the examination will be scheduled after the conclusion of the official examination period.

You are advised that is Macquarie University policy NOT to set early examinations for individuals or groups of students. All students are expected to ensure that they are available until the end of the teaching semester, that is the final day of the official examination period.

**PLAGIARISM**

The University defines plagiarism in its rules: "Plagiarism involves using the work of another person and presenting it as one's own." Plagiarism is a serious breach of the University's rules and carries significant penalties. You must read the University's practices and procedures on plagiarism. These can be found in the *Handbook of Undergraduate Studies* or on the web at: http://www.student.mq.edu.au/plagiarism/

The policies and procedures explain what plagiarism is, how to avoid it, the procedures that will be taken in cases of suspected plagiarism, and the penalties if you are found guilty. Penalties may include a deduction of marks, failure in the unit, and/or referral to the University Discipline Committee.

**UNIVERSITY POLICY ON GRADING**

Academic Senate has a set of guidelines on the distribution of grades across the range from fail to high distinction.

<table>
<thead>
<tr>
<th>High Distinction (HD)</th>
<th>Distinction (D)</th>
<th>Credit (Cr)</th>
<th>Pass (P)</th>
<th>Conceded Pass (PC)</th>
<th>Fail (F)</th>
</tr>
</thead>
</table>

Your final result will include one of these grades plus a standardised numerical grade (SNG). Please note that the raw marks for a unit (i.e. the weighted average of your marks for each assessment item) may not be the same as the SNG which you receive. Under the Senate guidelines, results may be scaled to ensure that there is a degree of comparability across the university, so that units with the same past performances of their students should achieve similar results.

STUDENT SUPPORT SERVICES

Macquarie University provides a range of Academic Student Support Services. Details of these services can accessed at http://www.student.mq.edu.au.
MACQUARIE UNIVERSITY

Professional Authority Form

This form must be completed by a professional authority.

Students at Macquarie University are able to apply for special consideration if they are unable to attend an examination or if they consider that their examination preparation or overall performance in a unit of study has been affected by unavoidable disruption or misadventure. Special consideration may also be granted if a student is forced to leave the examination room early due to illness or unavoidable disruption and believes that his/her examination performance has been affected. In most circumstances documentary evidence is required before special consideration will be granted and your assistance in providing information on the student’s illness or misadventure would be appreciated. The information you provide will allow the University to make a fair decision about the student’s academic performance and will only be used to assess the student’s request for special consideration. If special consideration is requested on non-medical grounds, appropriate supporting documentation must be provided, e.g. statutory declarations by independent witnesses, police reports, or statements from sufficiently senior officials in the place of employment. Photocopies of documents will not be accepted unless they have been certified by a member of the Registrar’s staff.

Professional Use Only

Student’s Name: __________________________ ID Number: __________________________

Date of Consultation: __________________________

Date/s of illness or misadventure: From: __________ To: __________

Please tick the box which best describes the student’s illness or misadventure

In my opinion the effect of the illness or misadventure on the above day/s was (or will be):

Negligible ( ) mild ( ) moderate ( ) severe ( )

Was the student suffering from symptoms of the illness or misadventure on the date of the consultation? Yes/No

Please provide details of misadventure or illness including symptoms and the way in which the circumstances are likely to affect exam performance. Is the illness or misadventure related to or as a result of a pre-existing condition? Give details below.

________________________________________________________________________

________________________________________________________________________

Name and Title: __________________________

Profession: __________________________

Provider Number: __________________________

Signature: __________________________

Phone number/s: __________________________

Stamp or seal of Professional Authority (or attach letterhead)