



THE UNIVERSITY OF
NEW SOUTH WALES
SYDNEY · 2052 · AUSTRALIA

SCHOOL OF SURVEYING & SPATIAL INFORMATION SYSTEMS

GMAT3420

CADASTRAL SURVEYING and LAND LAW

Course Outline – Session 1, 2009

Version: 2 March 2009

Page	Table of Contents
2	Staff involved in the course and their contact details
2	Educational Aspects of the course
3	Course schedule
4	Assessment in the course
4	Course resources
5	Administrative matters
5	Rules
5	Rules for practical / field classes

1. Staff involved in the Course and their Contact Details

1.1 Lecturer: Michael Green

Office: EE420

Email: michael.green@unsw.edu.au

Phone: 9385-4193

1.2 Staff absences during session:

Michael Green will be off campus from time to time. During that time he may be contacted by email.

2. Educational Aspects of the Course

2.1 How this course relates to others in the program

Cadastral Surveying and Land Law looks at combining legal decisions with the practical side of positioning Title boundaries. Calculation methods learnt in Survey Computations courses will be used and the Course will also relate to Land Development Courses that follow in later stages of the Program.

2.2 Aim of the Course

The aims of the course are to assist students to learn factors that lead to the redefinition of boundaries in NSW and to guide students on the educational requirements that meet the registration requirements of the BOSSI in NSW.

2.3 Learning Outcomes

By the end of this session students should be able to understand the legal and practical principles that assist in the original definition and relocation of various land title boundaries in NSW. Students should also understand the impact of such decisions on society.

2.4 Teaching Strategies

Lectures, both in the class and field, will be combined with tutorials based on problems that are encountered in practice.

2.5 Suggested Learning Methods

Lists of reading material will be provided in week 1 together with handouts related to specific topics in some other weeks. Students should read the relevant material prior to the lecture and should then be in a position to ask questions to clarify and ensure their understanding of each topic.

2.6 UNSW Graduate Attributes

This course provides an environment that fosters in our students the following attributes is listed:

the skills involved in scholarly enquiry	Significant
an in-depth engagement with relevant disciplinary knowledge in its interdisciplinary context	Significant
the capacity for analytical and critical thinking and for creative problem solving	Significant
the ability to engage in independent and reflective learning	Some
the skills to locate, evaluate and use relevant information (Information Literacy)	Some
the capacity for enterprise, initiative and creativity	Some
an appreciation of and respect for, diversity	Some
a capacity to contribute to, and work within, the international community	Some
the skills required for collaborative and multidisciplinary work	Significant
an appreciation of, and a responsiveness to, change	Significant
a respect for ethical practice and social responsibility	Significant

3. Proposed Course Schedule

Week No.	Tuesday 11am-1pm Goldstein G01	Tuesday 2pm – 4pm Webster 138
1	Introduction, Cadastral Surveying and the Legal System of NSW	Preparation of field notes for Cadastral Surveys Reading a Plan of Survey
2	Estates and Interests in land	Torrens and Old System (OS) Land Titles in NSW, Investigating Titles & Organising Search
3	Boundaries - General and Fixed, Urban and Rural boundaries	Calculations from field surveys
4	Boundary re-location & Identification Surveys	Identification Reports and Calculations
5	Field Survey	Field Survey
	Mid-session Break	Mid-session Break
6	Easements & Restrictions	Preparation of draft documents - Sec 88b, OS description
7	Natural Boundaries	Test on material in wks 1 to 6
8	Strata and Community Titles	Preparation and calculation of Strata Plan
9	Leases of Land, PCA Surveys	Survey practises to define natural boundaries
10	Road & Railways	Calculation of impact of road repositioning
11	Cadastral Problems	Practical analysis of Cadastral Problems
12	Revision	Test on material in wks 7 to 12

4. Assessment in the Course

Assuming that you have met the 80% attendance rule, the overall assessment will be

Closed book tests	60%
Practical Assignments	40%

There will be 2 tests worth 15% each as well as a final test that will cover the sessions work worth 30%.

Practical Assignments:

Working in groups, students will be required to complete a Field Survey of a selected urban property that is to be approved by the lecturer-in-charge. This assignment will be completed outside of the time allocated for lectures and tutorials and students must obtain their own title and plan searches. The quality of these searches will be assessed and graded as part of the Practical Reports listed above.

In addition to the above and again working in groups, students will be required to measure a property for Strata subdivision purposes and will be required to prepare a Strata Plan to standards required by NSW Legislation.

Access is available to a limited range of the School's surveying instruments and equipment for this exercise and again is subject to the approval of the lecturer-in-charge of the course.

Further information about the practicals will be distributed during the lectures.
Rules for practicals are given in section 6 below.

5. Course Resources

5.1 Lecture Material

Some handouts applying to specific topics will be supplied during lectures however students should supplement these with their own notes of each lecture.

5.2 Text and Reference Books

Available from the Institution of Surveyors (NSW)
Legal Aspects of Boundary Surveying as apply in NSW (Hallmann Second Edition)
Roads by Ibbotson
Definition of Railway Boundaries by Weber
Rural Boundaries by W Searl

Other references include
Land Law by P Butt
A Practitioner's Guide to Risk Management & Loss Prevention for the Surveying & Geospatial Industries (CD ROM 2003) Association of Consulting Surveyors Insurance Scheme Ltd

5.3 Computational Aids

Pocket calculators are required during lecturing hours, for tutorials and practicals in this course. They have to be hand-held, internally powered and silent. They must be brought to all lectures and practicals.

Further advice will be given during lectures should a computer/calculator be required during a test.

Computer software relevant to this course is available in the School's computer lab EE401.

6. Administrative Matters

6.1 Expected work load

At UNSW, the normal workload expectations of a student are 25-30 hours per session for each unit of credit, including class contact hours, preparation and time spent on all assessable work.

To assist students with the organisation of their studies, the expected workloads of the various components of the course are listed below. It is strongly suggested that students use the listed hours to plan their work during session.

Lectures (12 x 2hr)	24hr
Tutorials (12x1hr)	12hr
Assignments	28hr
Revision of Lectures, preparation of practical/tutorial reports, background reading (approximately 3hr x 12wk)	36hr
Total	100hr

6.2 Rules

Students should read the University Calendar or Student Guide for details of University Rules and special considerations.

Students are reminded that the University regards academic misconduct as a very serious matter. Unauthorised material must not be taken into a test or examination. Any work submitted for assessment must be entirely the student's own work. The penalty for any suspected academic misconduct ranges from zero mark for the assignment or exam involved, through failure of the subject, to expulsion from the University. If absent from an examination, class test or practical, students must submit written documentation to the University, via the Student Centre in the Chancellery.

All assignments or practical reports are compulsory parts of the course and must be handed in by the due date. **The marks for late submissions will be reduced as follows:** -20% (of the maximum mark) for up to 24 hours after the scheduled submission time, then -10% (of the maximum mark) for each additional 24 hour period late. (For example, a student submitting a report/assignment 4 days late has his/her mark reduced by 4 if the maximum mark of the submission is 10.). Any late submission must be made before solutions are issued to the class.

If a student is unable to submit on time due to illness or other legitimate reason, then a brief written explanation must be given to the lecturer for consideration as soon as is feasible. In some cases the lecturer may grant an extension to the submission date provided notice is given before the due date.

Further assessment may be granted in this course at the lecturer's discretion. If further assessment is granted then performance in tutorials may be considered as well as an oral exam including use of a computer.

If students attend less than 80% of their possible classes they may be refused final assessment.

6.3 Grievances

In the first instance all grievances should be discussed with the lecturer involved. If the problem cannot be resolved, students should contact the School's Grievance Officer in writing.

6.4 Rules for practical / field classes

Do not assume a class will be cancelled because of poor weather conditions attend on time and ask the supervisor. Practical classes take place in a variety of weather. Do not forget umbrellas, water proof jackets, hats, sun cream, sturdy footwear (thongs or sandals are not acceptable), warm clothes, etc.

There will be a briefing session prior to each practical class. Punctual attendance at the briefing is essential. All group members are expected to attend the briefings.

The practical exercises form an important part of learning in this course. Most practicals will be done in groups of students, however the calculations and reports require individual work. It is important that each student within a group gets experience in each aspect of each practical.

Students should be aware of OHS matters to be adopted when completing any field work. If you have any questions or doubts about an OHS matter discuss it with you supervisor.

ISSUING OF EQUIPMENT

As the issue of equipment is not at any set time, students should ensure that the store is scheduled to be open when seeking equipment. Only specific pieces of equipment will be available for tasks to be completed off campus. If the equipment is borrowed for use by more than one student, the group is responsible for all equipment issued to it, with the student signing for the equipment as the representative.

1. *You should first inspect all equipment and make sure that it is in working order otherwise you will be held responsible.* When returning equipment at the end of the field class, it should be handed back to the Stores Officer, piece by piece, so that it can be checked off. A student's responsibility for borrowed equipment does not end until all your equipment has been returned and signed off.
2. *It is not sufficient to leave the equipment near the store and depart.*
3. *Any equipment lost or damaged will have to be paid for by the group.* In the field, there is less danger of losing items if everything is laid close to an instrument box or in a group where pedestrians can safely bypass it.

INSTRUMENTS

The equipment used in surveying is sometimes delicate and often valuable (> \$10,000). Please make sure that you take due care of the equipment and give some thought to the way in which you handle it.

Theodolites and electronic measuring equipment have fragile optical mechanical and electronic components and are delicately adjusted. ***Shut instrument boxes immediately after removing/replacing the instrument.*** Carrying instrument on tripods will not be tolerated in this School. Do not force any parts to move, ensure clamps that lock the instrument to the tripod are set and do not over tighten clamps.

No equipment is to be left unattended in the field at any time.

IN THE PUBLIC EYE

It is hoped that students taking part in surveying practicals on or off the campus will create a favourable impression on the public and fellow students - **so behave in a professional manner.** The field classes give you an opportunity to experience practical problems in a learning environment and should be a welcome break from lectures. It is hoped you find them enjoyable as well as instructive.

SUBMISSION OF REPORTS ON PRACTICAL WORK

Time: Reports may be submitted at any time prior to the due date. **Late submissions will not be marked,** unless accompanied by an appropriate reason. Reports should be submitted to the lecturer.

Contents of Reports: Your report should have a front/title page, a summary of results page and then the rest of the report including computations and plans. Reports must contain original field notes or a photocopy of the originals, but not rewritten field notes. The requirements for each practical will be discussed at the briefings before the practicals, if in doubt ask the supervisor. The front cover of all submissions should include: Course number and name, your name and the title of exercise

Field Notes: On the first page of your field notes for a particular exercise the following information should be given: Title of Exercise, Date, your name and others present in the group, instrument make and number if the School's equipment is used.

Field notes should be neatly written, not overcrowded and pencils are recommended. Use diagrammatic and tabular form where required, drawing neat sketches or diagrams where applicable. Overwriting is not permissible in the field notes and wrong figures or words should be crossed and the true one written above it and initialled by the booker whose name must appear at the top of each page.

Computations: Computations must be done by each individual.