

Arboriculture

11:216:365

Fall 2016 - 4 credits
Tuesday 2:15 - 5:15 & Thursday 2:15 - 3:35
Meeting Room: ENR - 123

Instructor: Jason Grabosky
Phone: 848-932-0050
Email: grabosky@aesop.rutgers.edu

Office Hours: Wednesday mornings 7:30-8:30. Additional hours can be arranged by e-mail appointment arrangement. Office will be Loree 038, or 80 Nichol Avenue offices, as discussed during the first class.

Course Description:

This course considers the relationship of tree biology and management of trees in the developed landscape. Field exercises will compliment lectures for practical applications. Students will be required to submit written documentation which can be developed into an integrated consultation report. The campus and field case studies will be used to facilitate methodical, iterative site and tree evaluation and to synthesize information into a management plan.

Learning Goals:

- Provide an introduction to aspects of the professional tree care industry
- Provide a working understanding of how tree biology translates into and informs tree care management and practice
- Provide a platform to encourage organized methods of observation and critical evaluation of trees in all life stages for landscape management and safety
- Introduce students to the basis of industry standards, associated best management practices and the development of contract/bid specifications within a specific environmental management profession.

Text: Arboriculture, Integrated Management of Landscape Trees, Shrubs, and Vines. 2004, 4th Edition. Harris, R.W., J.R. Clark, and N. P. Matheny. Prentice Hall. 578 pages. ISBN: 0130888826

Additional readings will be posted as assignments on a course Sakai site through .pdf or .docx or .ppt

Supplemental Texts: (found in Lab Office)

- Evaluation of Hazard Trees in Urban Areas
- Fungal Strategies of Decay in Trees
- Guide to Report Writing for Consulting Arborists
- Trees and Development: A Technical Guide
- The Body Language of Trees
- Plant Health Care Systems
- Plant Health Care Systems Management Lab Manual
- Fungal Strategies of Decay in Trees
- Anatomy of Seed Plants
- Guide to Assessing Abiotic Disorders in Trees
- Illustrated Guide to Pruning
- Varied ANSI Standards
- Varied ISA Publications on Best Management Practices (BMPs)

Exams/Graded products:

There will be two exams during the semester. All exams are cumulative. There will be several reading checks as short quizzes given during lecture periods. Field reports as summations of specific topic methods applied to a set of assigned trees will be assigned. There is an assigned documentation effort to build specification language to be discussed during the semester

A Note on Exams:

I consider the classroom to be a safe learning environment and exams are meant to be an opportunity to show me what you know, as well as a chance to learn something while the semester progresses. The exams are one of three primary means of assigning the final course grade and therefore questions will be a reasonable mixture of materials presented in lectures, labs and readings. The exams will include primarily short answer questions and possibly a few matching and fill in the blank questions. I expect short responses (a few sentences or bullets) to the short answer questions, if you feel your answer is too long, you are probably correct. Grading will be on content and not grammar, so SMALL grammatical errors are not of a concern.

- I expect legible writing and sentence structure.
- Bullets are acceptable
- If you cannot get your point across, or pad your answers with repetitive or circular thoughts, I will have to assume that you do not have an understanding of the subject matter.
- Some questions may not have a definitive answer. In these cases, I will not grade based whether we agree, rather how you present and back up your argument. I will try to point out these questions at the beginning of the examination period.

- Exams are not meant to be a race among peers, please take your time and do well.
- If there are formulas needed for specific questions, I will provide them unless otherwise warned.

A note on formulae: You are able to look up formulae in the working world, so I do not require you to memorize them. I strongly encourage you to know how the formulae work and when it is appropriate to use each. You need to know what you are looking for, understand (without seeing it) how it works, and know it when you see it.

Grading:

	% Final Grade	Grading Assignment:
Exam I	15	A = 100- 90%
Exam II	15	B+ = 87.0-89.9%
Reading checks	15	B = 80.0% - 86.9%
Field reports	40	C+ = 77.0- 79.9%
Specification assignment	15	C = 70.0- 76.9%
		D = 69.9- 60%

Late work: All work is due at the beginning of the class period. Work turned in after that time is considered to be a day late. Late work is accepted at a 10% deduction of the points attainable per day *including* weekends and holidays. Therefore, work more than 10 days late will not be accepted.

Meeting set-up: Meeting with instructors and professors, as an undergraduate is very important and the beginning level of developing a professional relationship that you will need in your life after college. However few undergraduates meet with professors prior to graduation. Therefore, within the first two weeks of class, you will be required to set up a meeting with me for a period of no less than 10 minutes. Setting up the meeting cannot occur during class time and must be made in advance. You must come prepared to the meeting with questions and things to talk about.

Homework: You will be assigned readings in the text and on files posted to a class Sakai site. You will also be assigned homework to post either in hard copy or via e-mail. If by e-mail, It needs to be posted by beginning of class on the due date, I don't wait to download at 11:59pm for the benefit of the doubt, nor will your future clients. It is fully expected that you read assignments in a timely manner (like before the next class unless told otherwise). Completion of readings and assignments are meant to solidify lecture materials and to generate questions to continue the lectures as a conversation to facilitate your learning. If there are no questions, I have to assume you have command of the materials and will be tested accordingly.

Course Outline: (not in final order, to be changed by class/student needs)

Syllabus by topic/field assignment:

Topics//text chapters:

Tree biology & Site to species linkages (this will span a few classes and will be parsed out accordingly)

Chapters 1,2,3,4,6,12,13; about 160 pages

Vitality and health assessments

Structural assessments

Diagnosing plant disorders

Chapters 15,16,18,19; about 100 pages

Value appraisal

Chapters 5,10; about 43 pages

Construction protection

Chapters 7,11; about 70 pages

Pruning and assorted structural intercessions

Chapter 14,17; about 75 pages

Utility municipal and commercial arboriculture topics

Chapters 8,9 possible

Outside Trips: *Every class may include outdoor exercises.* It is a safe assumption that you will be outside walking in any weather. Closed toed footwear and long pants might be required. Attempts will be made to remind you of these outings prior to class, but it is assumed that all students will show up on Tuesdays prepared to go outside (even in rain, snow, or cold weather). Those students not dressed appropriately may not be able to attend lab and may miss any assigned tasks or content.

Missed classes

A significant part of instruction revolves around class activities and simulations, which cannot be made up if missed. It is therefore important (for your learning and your grade) to attend every class. Your grade reflects the importance of your attendance and engagement. If you know ahead of time that you will be absent, please notify me. Rutgers uses an online reporting system for illnesses. Please use this to report if you are ill, and follow up with an email once you are able.

Technology use

Occasionally I will ask you to bring a laptop computer to class if you are able. In such situations, computers are to be used for the given activity only. Unless expressly stated, all computers and cell phones are to be turned off (no dinging, beeping, buzzing, or chirping!) and put away during class.

We will take a break midway through the class period. During this time you are welcome to use your phones and computers as you wish.

Other resources

Please be aware that there are numerous resources and services available to you as students.

CAPS – Counseling, ADAP, and Psychiatric Services

<http://rhscaps.rutgers.edu/>

Office of Disability Services

<https://ods.rutgers.edu/>

Rutgers Learning Centers

<https://rlc.rutgers.edu/>

Rutgers Libraries

<http://www.libraries.rutgers.edu/>