



Ecampus SAMPLE SYLLABUS

NOTE to prospective students: This syllabus is intended to provide students who are considering taking this course an idea of what they will be learning. A more detailed syllabus will be available on the course Canvas site for enrolled students and may be more current than this sample syllabus.

Course Name: Programming Concepts for Non-majors

Course Number: 519

Credits: 4

Instructor Name: Justin Wolford

Instructor Email: wolfordj@oregonstate.edu

Instructor Phone: 541-768-5410

Course Description

This is a fast paced course which covers a variety of fundamental topics in computer programming which would be relevant to anyone who needs to write or work with computer code frequently in their work or studies. The course will teach basic programming skills which allow students to solve a variety of real world problems. In addition to these basic programming skills students will learn some more advanced topics like how quickly a particular program implementation might be able to solve data sets of different size or how much memory it will need. Additionally some basic algorithms for tasks like sorting will be introduced and analyzed.

Communication

Read [this guide](#) on on-line communication. Follow every link in the section on asking good questions and giving good answers. You may be graded on the quality of your discussion. You need to communicate with clients and coworkers in the real world, you need to communicate with your fellow students here. You learn by finding the limits and holes in your knowledge. The best way for you to find them is to talk with others about the topics at hand.

Course Credits

This course combines approximately 120 hours of instruction, online activities, and assignments for 4 credits.

This is a 4 credit course. There is a variety of interactive, written and video content every week. That content along with the typical workload ends up taking an average of 20 hours a week. Some students will find they need longer than this. The content is delivered on a weekly basis. Interaction with the instructor and other students happens asynchronously

Technical Assistance

This course is offered through Oregon State University Extended Campus. For more information, contact:
Web: ecampus.oregonstate.edu Email: ecampus@oregonstate.edu Tel: 800-667-1465

If you experience computer difficulties, need help downloading a browser or plug-in, assistance logging into the course, or if you experience any errors or problems while in your online course, contact the OSU Help Desk for assistance. You can call (541) 737-3474, email osuhelpdesk@oregonstate.edu or visit the [OSU Computer Helpdesk](#) online.

Learning Resources

The primary book for this course will be "[Automate the Boring Stuff With Python](#)". It is available for free at automatetheboringstuff.com as a PDF, HTML or EBook format. You can also get a hard copy but it is not required to do so.

Note to prospective students: Please check with the OSU Bookstore for up-to-date information for the term you enroll ([OSU Bookstore Website](#) or 800-595-0357). If you purchase course materials from other sources, be very careful to obtain the correct ISBN.

Canvas

This course will be delivered via Canvas where you will interact with your classmates and with your instructor. Within the course Canvas site you will access the learning materials, such as the syllabus, class discussions, assignments, projects, and quizzes. To preview how an online course works, visit the [Ecampus Course Demo](#). For technical assistance, please visit [Ecampus Technical Help](#).

Measurable Student Learning Outcomes

1. Translate a problem statement into an appropriate algorithm containing arithmetic, relational, and logical expressions.
2. Translate the semantics of an algorithm into the syntax of a computer programming language.
3. Develop programs that read data from a local data file and from the web.
4. Develop an object-oriented solution to a problem using objects, classes, and methods.
5. Develop a program that uses dynamic memory allocation.
6. Develop a program that uses a List data structure.
7. Develop a program that uses a Dictionary data structure.
8. Develop a program that uses the NumPy library.
9. Explain the concept of time complexity and how it affects your choice of algorithms.

Evaluation of Student Performance

Approximate grade weighting

- 30% - Final Evaluation
- 50% - Weekly homework
- 20% - Activities and discussions

Course Content

Week	Content
Week 1	Python Intro, Expressions, Types, Variables
Week 2	Conditionals, Loops, Errors
Week 3	Functions, Collections
Week 4	Folds, Maps Etc., Objects, Dynamic Memory
Week 5	Local IO
Week 6	Libraries, HTTP Client
Week 7	Complexity
Week 8	Sorting
Week 9	Recursion
Week 10	Hashing

Course Policies

Discussion Participation

Students are expected to participate in all graded discussions. While there is great flexibility in online courses, this is not a self-paced course.

Proctored Exams

This course requires that you take exams under the supervision of an approved proctor. Proctoring guidelines and registration for proctored exams are available online through the Ecampus [testing and proctoring website](#). It is important to submit your proctoring request as early as possible to avoid delays.

Makeup Exams

Late exams are only given due to a verifiable emergency situation.

Incompletes

Incomplete (I) grades will be granted only in emergency cases (usually only for a death in the family, major illness or injury, or birth of your child), and if the student has turned in 80% of the points possible (in other words, usually everything but the final paper). If you are having any difficulty that might prevent you completing the coursework, please don't wait until the end of the term; let me know right away.

Guidelines for a Productive and Effective Online Classroom

Students are expected to conduct themselves in the course (e.g., on discussion boards, email) in compliance with the university's regulations regarding civility.

Civility is an essential ingredient for academic discourse. All communications for this course should be conducted constructively, civilly, and respectfully. Differences in beliefs, opinions, and approaches are to be expected. In all you say and do for this course, be professional. Please bring any communications you believe to be in violation of this class policy to the attention of your instructor.

Active interaction with peers and your instructor is essential to success in this online course, paying particular attention to the following:

- Unless indicated otherwise, please complete the readings and view other instructional materials for each week before participating in the discussion board.
- Read your posts carefully before submitting them.
- Be respectful of others and their opinions, valuing diversity in backgrounds, abilities, and experiences.
- Challenging the ideas held by others is an integral aspect of critical thinking and the academic process. Please word your responses carefully, and recognize that others are expected to challenge your ideas. A positive atmosphere of healthy debate is encouraged.

Statement Regarding Students with Disabilities

Accommodations for students with disabilities are determined and approved by Disability Access Services (DAS). If you, as a student, believe you are eligible for accommodations but have not obtained approval please contact DAS immediately at 541-737-4098 or at <http://ds.oregonstate.edu>. DAS notifies students and faculty members of approved academic accommodations and coordinates implementation of those accommodations. While not required, students and faculty members are encouraged to discuss details of the implementation of individual accommodations.

Accessibility of Course Materials

All materials used in this course are accessible [with the exception of (list items that are not accessible)]. If you require accommodations please contact [Disability Access Services \(DAS\)](#). [If all items are accessible in your course, please delete the orange text in this section.] Additionally, Canvas, the learning management system through which this course is offered, provides a [vendor statement](#) certifying how the platform is accessible to students with disabilities.

Expectations for Student Conduct

Student conduct is governed by the university's policies, as explained in the [Student Conduct Code](#).

Academic Integrity

Students are expected to comply with all regulations pertaining to academic honesty. For further information, visit [Student Conduct and Community Standards](#), or contact the office of Student Conduct and Mediation at 541-737-3656.

OAR 576-015-0020 (2) Academic or Scholarly Dishonesty:

- a) Academic or Scholarly Dishonesty is defined as an act of deception in which a Student seeks to claim credit for the work or effort of another person, or uses unauthorized materials or fabricated information in any academic work or research, either through the Student's own efforts or the efforts of another.
- b) It includes:
 - i) CHEATING - use or attempted use of unauthorized materials, information or study aids, or an act of deceit by which a Student attempts to misrepresent mastery of academic effort or information. This includes but is not limited to unauthorized copying or collaboration on a test or assignment, using prohibited materials and texts, any misuse of an electronic device, or using any deceptive means to gain academic credit.
 - ii) FABRICATION - falsification or invention of any information including but not limited to falsifying research, inventing or exaggerating data, or listing incorrect or fictitious references.
 - iii) ASSISTING - helping another commit an act of academic dishonesty. This includes but is not limited to paying or bribing someone to acquire a test or assignment, changing someone's grades or academic records, taking a test/doing an assignment for someone else by any means, including misuse of an electronic device. It is a violation of Oregon state law to create and offer to sell part or all of an educational assignment to another person (ORS 165.114).
 - iv) TAMPERING - altering or interfering with evaluation instruments or documents.
 - v) PLAGIARISM - representing the words or ideas of another person or presenting someone else's words, ideas, artistry or data as one's own, or using one's own previously submitted work. Plagiarism includes but is not limited to copying another person's work (including unpublished material) without appropriate referencing, presenting someone else's opinions and theories as one's own, or working jointly on a project and then submitting it as one's own.
- c) Academic Dishonesty cases are handled initially by the academic units, following the process outlined in the University's Academic Dishonesty Report Form, and will also be referred to SCCS for action under these rules.

Conduct in this Online Classroom

Students are expected to conduct themselves in the course (e.g., on discussion boards, email postings) in compliance with the [university's regulations regarding civility](#).

Tutoring

[NetTutor](#) is a leading provider of online tutoring and learner support services fully staffed by experienced, trained and monitored tutors. Students connect to live tutors from any computer that has Internet access. NetTutor provides a virtual whiteboard that allows tutors and students to work on problems in a real time environment. They also have an online writing lab where tutors critique and return essays within 24 to 48 hours. Access NetTutor from within your Canvas class by clicking on the Tools button in your course menu.

OSU Student Evaluation of Teaching

Course evaluation results are extremely important and are used to help me improve this course and the learning experience of future students. Results from the 19 multiple choice questions are tabulated anonymously and go directly to instructors and department heads. Student comments on the open-ended questions are compiled and confidentially forwarded to each instructor, per OSU procedures. The online Student Evaluation of Teaching form will be available toward the end of each term, and you will be sent instructions via ONID by the Office of Academic Programs, Assessment, and Accreditation. You will log in to “Student Online Services” to respond to the online questionnaire. The results on the form are anonymous and are not tabulated until after grades are posted.