CIS 41A Python Programming - Winrter 2024

Instructor: Mirsaeid Abolghasemi

Email: <u>abolghasemimirsaeid@fhda.edu</u> (For any questions, students should message me on Canvas, not email).

Class hours: TBA - No live session - The recorded videos will be posted on Canvas

Office hours: Wednesday 2 PM - 3 PM - Zoom online meeting - The link will be posted on Canvas

Description:

A complete introduction to the Python language. Topics covered include: primitive and collection data types, operators and statements, loops and branching, functions and variable scoping, modules and packages, object oriented programming, file handling, regular expressions and exception handling

Student Learning Outcome Statements (SLO):

• **Student Learning Outcome**: Design, code, document, analyze, debug, and test introductory level Python programs that include Python modules.

Course Objectives:

- Use appropriate data types for variables
- Code statements that use expressions, operators, and built-in functions to compute values
- Apply control structures to create loops and conditional blocks of code
- Write code to handle data input/output through standard IO and files
- Implement user-defined functions for modularization of code
- Import and use common Python modules and packages
- Create custom classes and apply object oriented programming concepts
- Handle exceptions in the program
- Use regular expressions for text parsing

Course Information:

Term: 2024 Winter De Anza | **CRN:** 38592 | **Title:** PYTHON PROGRAMMING | **Course:** CIS D041A63Z | **Days:** TBA | **Time:** TBA - TBA | **Room:** ONLINE | **Prerequisite:** CIS 22A or 36A or 40.

Textbook(s):

• Python for Everyone, 2nd Edition, Cay S. Horstmann, Rance D. Necaise, Wiley, 2016. Supporting Texts and References: (We <u>may</u> use the following books which are free and can be found online.)

• Python for Everybody: Exploring Data in Python 3, Dr. Charles Russell Severance, 2016. https://www.py4e.com

• Think Python: How to Think Like a Computer Scientist, 2nd Edition, Allen B. Downey, O'Reilly, 2015. https://greenteapress.com/wp/think-python/

- Introducing Python by Lubanovic, ISBN: 978-1449359362
- Google's Python Class: <u>https://developers.google.com/edu/python/</u>

Grading:	
Quizzes	35%
Lab Exercises &	20%
Assignments	
Midterm Exam(s)	20%
Final Exam	25%
Total	100%

Extra credit opportunities:

Several assignments/labs will have bonus points added.

Lectures, attendance, exercises, midterm, and final:

- Assignments should be submitted before the due date. If submitted late, then the homework score will be reduced with a penalty of 10% per day.
- Assignments should be commented on with your name and team name.
- Students can use any IDEs to do their assignments.
- Lectures:
 - o The recorded videos will be posted on Canvas.
 - o The class is asynchronous and there is no live session for this class.
- Attendance:
 - o No live session.
 - o No attendance is needed but students should take the attendance quizzes.
 - o However, students should be active on Canvas, especially in the first two weeks. I can check the students' activities on Canvas.
 - o If a student is not active on the first day or week of class, I will drop them. So, taking the mandatory quiz on Canvas and being active on Canvas is important.
 - o Students should inform the professor if they cannot attend the class during the first two weeks.
- Quizzes:
 - o Quizzes are multiple-choice questions.
 - o Students need to have a camera on their computers.
 - o Students should have Zoom installed on their computers to take the exams.
 - o Students should record the exam based on the instructions posted on Canvas and upload the recorded video on their Google Drive (or any other cloud). Then share a link to the recorded video without a password. After grading, students can delete the recorded video from their Google Drive.
 - o The student has the option to drop the two lowest quiz scores from Quizzes 1, 2, 3, 4, and 7. They should choose the two quizzes and message me on Canvas to drop their scores.
- Midterm part 1: the coding part
 - o Students can do it at home.
 - o Students should do it in a team but each student should write their name and the team's names on their codes.
 - o Although students can do it individually, teamwork is recommended. If you want to do it individually, it means you are good enough in Python and you do not need help.
 - o No presentation is needed for Midterm part 1.
- Midterm part 2:
 - o Midterm part 2 is similar to the quizzes.
 - o Students need to have a camera on their computers.
 - o Students should have Zoom installed on their computers to take the exams.
 - o Students should record the exam based on the instructions posted in Canvas and upload the recorded video on their Google Drive. Then share a link to the recorded video without a password. After grading, students can delete the recorded video from their Google Drive.
- Final part 1:
 - o Final part 1 is the final project (the coding part)

- o Students can do it at home.
- o Students should do it in a team but each student should write their name and the team's names on their codes.
- o Students can do it individually but teamwork is recommended. If you want to do it individually, it means you are good enough in Python, and you do not need help.
- o No presentation is needed for Final Part 1.
- Final part 2:
 - o Final part 2 is similar to the quizzes.
 - o Students need to have a camera on their computers.
 - o Students should have Zoom installed on their computers to take the exams.
 - o Students should record the exam based on the instructions posted in Canvas and upload the recorded video on their Google Drive. Then share a link to the recorded video without a password. After grading, students can delete the recorded video from their Google Drive.
- Midterm and final parts 1 and 2 are together and students should do both parts 1 and 2 to get their midterm or final grades.
- All the technical questions related to the class should be posted in the discussion section on Canvas first. Other students and TAs will answer your questions. Students will get extra credit by sharing their questions or answering others' questions in the discussion section. I will also reply to the questions if nobody answers them.

Grade average required:

- A+ 98% and up
- A 94%-97%
- A- 90%-93%
- B+ 87%-89%
- B 84%-86%
- B- 80%-83%
- C+ 77%-79%
- C 70%-76%
- F 69% or less

De Anza Academy Integrity:

http://www.deanza.edu/studenthandbook/academic-integrity.html

Homework and labs must be your own work to the following extent:

- Do not send your code to anyone.
- Do not copy anyone else's code.
- DO NOT LOOK AT OTHER STUDENTS WORK AND SHOW THEM YOURS.
- As long as you are not copying others' work, discussions and exchange of ideas are encouraged.

Disability Accommodations:

De Anza College views disability as an important aspect of diversity, and is committed to providing equitable access to learning opportunities for all students.

Disability Support Services (DSS) is the campus office that collaborates with students who have disabilities to provide and/or arrange reasonable accommodations If you have, or think you have, a disability in any area such as, mental health, attention, learning, chronic health, sensory, or physical, please contact DSS to arrange a confidential discussion regarding equitable access and reasonable accommodations.

If you are registered with DSS and have accommodations set by a DSS counselor, please be sure that your instructor has received your accommodation letter from Clockwork early in the quarter to review how the accommodations will be applied in the course. Students who need accommodated test proctoring must meet appointment booking deadlines at the Testing Center. a) Midterm exam be booked at least five (5) business days in advance of the instructor approved exam date/time. b) Final exams must be scheduled seven (7) business days/weekdays in advance of the instructor approved exam date/time. Failure to meet appointment booking deadlines will result in the forfeit of testing accommodations and you will be required to take your exam with the class.

DSS Location: RSS Building, Suite 141 Phone: (408) 430-7681 Email: <u>DSS@deanza.edu</u> Students with special needs to: <u>https://www.deanza.edu/dsps/index.html</u>

=> Important Dates:

(Please check the Academic Calendar on the De Anza College website. These dates may get changed.)

Last Day for Drops w/ Refund	January 21, 2024
Last Day for Drops w/o W	January 21, 2024
Last Day for Drops	March 01, 2024

(Students are responsible for checking the Academic Calendar for important deadlines and any changes in the deadlines.)

The schedule of the class sessions:

- No live session.
- No presentation is needed.
- No attendance is required => But students should take the attendance quizzes every week to show they are active in class.

week 1: January 8 - January 14

(The first session - reviewing the syllabus)

(Chapter 1 - Introduction & Chapter 2 - Variables, Expressions, and Statements)

(Quiz Chapter 1 on January 13 & Quiz Chapter 2 on January 16)

week 2: January 15 - January 21

(Chapter 3 - Decisions, Relational Operators)

(Chapter 3 (from Analyzing Strings) & Software Testing, Reviewing Quiz CH2, EZGraphics) week 3: January 22 - January 28

(Quiz Chapter 3: **January 26**. Students can take it at any time between 9 a.m. and 11:59 p.m.) week 4: January 29 - February 4

(Chapter 4 - Loops - reviewing Quiz Chapter 3)

(Chapter 4 & Strings)

(Chapter 5 Functions & about Quiz 4 and Midterm parts 1 & 2)

(Quiz Chapter 4: February 2. Students can take it at any time between 9 a.m. and 11:59 p.m.)

(Midterm part 1 will be published)

week 5: February 5 - February 11

(Midterm Part 1: The due date for midterm part 1 (coding part) will be on **February 11** at 11:59 pm. Midterm part 1 will be opened one week before its due date.)

week 6: February 12 - February 18

(Midterm - Part 2: February 16. Students can take it at any time between 9 a.m. and 11:59 p.m.) week 7: February 19 - February 25

(Chapter 6 - Lists & Reviewing Midterm Part 2)

(Chapter 8: Sets, Dictionaries, Chapter 7: Files)

(Quiz - Chapters 6&8: February 23. Students can take it at any time between 9 a.m. and 11:59 p.m.) week 8: February 26 - March 3

(Quiz - Chapter 7: **March 1**. Students can take it at any time between 9 a.m. and 11:59 p.m.) (Chapter 9: Class&Objects)

week 9: March 4 - March 10

(Inheritance)

(Quiz - Chapter 10 - Inheritance: **March 8**. Students can take it at any time between 9 a.m. and 11:59 p.m.)

(Final part 1 will be published)

week 10: March 11 - March 17

(Regular Expressions & Review Quiz Chapter 10)

(CSV reading and writing and Assert & a sample final presentation)

- week 11: March 18 March 24
 - (12. Advanced Topics- args & kwargs and Iterators & Generators & sample final presentations) (Final part 1)

week 12: March 25 - March 29

(Final week)

Final Exam:

• Final Part 1 (coding part): The due date for the final part 1 will be on Thursday, March 24 at 11:59 p.m. It will be opened two weeks before its due date.

• Final part 2 (multiple-choice questions): Students can take it at any time from Thursday, **March 28** to Friday, **March 29** at 9 p.m.

=> Very Important Notice:

- This item is very important:
 - Once students have completed the introductory survey, <u>they are responsible for dropping</u> <u>classes</u>.
 - Therefore, if students want to drop the class <u>THEY NEED TO DO IT</u>.
 - Please DO NOT wait for the college system or your instructor to drop you.
 - So, I do not accept any requests from students to drop the class or any other official communications.
- Again, students are responsible for checking the Academic Calendar for important deadlines and any changes in the deadlines.
- To take the quizzes, midterm part 2 and final part 2:
 - Students should have Zoom installed on their computers to take the exams.
 - Students need to have a camera on their computers.
- Students should update their Canvas profile pictures with a picture showing their faces.
- Your first name and last name on Canvas should be your official first name and last name.
- For any questions, students should message me on Canvas (not email).

De Anza Calendar:	http://deanza.edu/calendar
CIS Lab:	http://www.deanza.edu/buscs/labs.html
CIS Tutoring:	https://www.deanza.edu/cis/tutoringOnline.html
De Anza Canvas Web:	https://deanza.instructure.com/
Resources On Campus:	• •
Tutorial:	https://www.deanza.edu/studentsuccess/
EOPS:	https://www.deanza.edu/eops/
Counseling:	https://www.deanza.edu/counseling/
Mutual Respect Policy:	https://fhdafiles.fhda.edu/downloads/aboutfhda/4110.pdf
Student Grievance Procedure:	https://www.deanza.edu/policies/grievances.html
Student Rights & Responsibilities:	https://www.deanza.edu/student-complaints/rights-responsibilities.html
CARES Emergency Care Funds:	https://www.deanza.edu/resources/emergency-funds.html
Students with special needs to:	https://www.deanza.edu/dsps/index.html
CIS TAs and Tutors:	https://deanza.edu/cis/tutoringOnline.html
De Anza CONNECT:	https://www.deanza.edu/counseling/retention/connect.html

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