

# **Course Outline**

- **Course name:** Intro to Computer Science & Project Management
- **Course Number:** MADP 101 & 104
- **Minimum Passing Grade:** 70%
- **Start Date:** January 2, 2018
- **End Date:** January 12, 2018
- **Total Hours:** 40 hours
- **Total Weeks:** 2 weeks

## **Course Description**

- Python is a language with a simple syntax, and a powerful set of libraries. It is an interpreted language, with a rich programming environment, including a robust debugger and profiler. While it is easy for beginners to learn, it is widely used in many scientific areas for data exploration. This course is an introduction to the Python programming language for students without prior programming experience. We cover data types, control flow, object-oriented programming, and graphical user interface-driven applications.
- Effective use of version control is an important and useful skill for any developer working on long-lived (or even medium-lived) projects, especially if more than one developer is involved. This course will introduce the basics of using version control by focusing on a particular version control system called Git and a collaboration platform called GitHub.

## **Course Outcomes**

- By the end of this course, you should be comfortable programming in Python, understand why good style is critical, and be familiar with core computer science topics like algorithms and complexity.

- By the end of this course, you should be able to manage your projects using git and github.

## Course Distribution

- Attendance - 10%
- Labs & Assignment - 40 %
- Final Exam - 50 %
  
- Makeup Tests, exams, or quizzes: There will be no makeup tests, exams, or quizzes. If you miss a test, exam or quiz, you will receive zero marks. Exceptions may be made for documented medical reasons or extenuating circumstances. In such a case, it is the responsibility of the student to inform the instructor immediately.
- Late assignments/online submissions or projects will not be accepted except for proof of illness. No assignments/projects will be accepted after marked assignments or solutions to questions have been posted.
- Midterm exams, final exams, and project papers: The midterm exam, final exam, and final project will not be returned to the student.

### NOTE:

*Any form of plagiarism will result in a grade of ZERO for the first instance. Any subsequent instances of Academic Misconduct will meet with harsher penalties. These penalties may include failing the course and/or removal from the program.*

## Textbook

- *Charles R. Severance*, Python for Everybody: Exploring Data Using Python.

## Additional Resources

- <https://www.py4e.com/lessons>
- <http://codingbat.com/python/>

# Course Plan

## Week 1

1 Mon	2 Tue	3 Wed	4 Thurs	5 Fri
No Class	Level Test	Introduction and install environment settings	Chapter 2 & 3	Chapter 4 & 5

## Week 2

8 Mon	9 Tue	10 Wed	11 Thurs	12 Fri
Chapter 6 CLI	Chapter 7, 8 Git	Chapter 9, 10 Git	Chapter 11, 14	Final Exam

- Chapter 12, 13 might be covered depends on the course schedule