

San Jose State University  
CS 256 Topics in Artificial Intelligence  
Course Syllabus  
Fall 2015

1. **Course information**

1. Basic information

- San Jose State University
- CS 256, 43273, Section 1; (MW 18:00 to 19:15; MQH 422)
- Fall 2015
- Dr. Teng Moh, MQH 411
- Phone: 408-924-5147
- Email: MyFirstName <dot> MyLastName <at> SJSU <dot> EDU

2. Office Hours and Days: MW 20:45 to 21:45

3. Course information

- Course Description: Introduction to topics in artificial intelligence such as problem solving methods, game playing, understanding natural languages, pattern recognition, computer vision and the general problem of representing knowledge. This section focuses specifically on Machine Learning.
- Prerequisites: CS 156 or instructor consent.
- Required Text:
  - Pang-Ning Tan, Michael Steinbach, and Vipin Kumar, **Introduction to Data Mining**, Addison Wesley, 1st ed, 2006, ISBN: 978-0321321367 available at <http://www-users.cs.umn.edu/%7Ekumar/dmbook/index.php>
- Recommended Texts:
  - Gareth James, Daniela Witten, Trevor Hastie and Robert Tibshirani, **An Introduction to Statistical Learning: with Applications in R**, Springer, 1st ed, 2013, ISBN: 978-1461471370
  - Simon O. Haykin, **Neural Networks and Learning Machines**, Prentice Hall, 3rd ed, 2008, ISBN: 978-0131471399
  - Ian H. Witten, Eibe Frank, and Mark A. Hall, **Data Mining**, Morgan Kaufmann, 3rd ed., 2011, ISBN: 978-0123748560
- Required Equipment: Wireless laptop

4. Student Learning Objectives

- On successful completion of this course students should be able to:
  - understand supervised learning
  - understand association analysis
  - understand unsupervised learning
  - understand anomaly detection
  - understand semi-supervised learning
  - implement new tools for machine learning based on the above techniques

5. Course Requirements

- Homework: 20%
- Midterm Exam : 20%
- Project: 30%
- Final Exam: 30%

6. Tentative Course Calendar

- Midterm Exam (Wednesday, Oct. 14)
- Final Exam (Monday, December 14, 17:15-19:30)

## 7. Grading Method

Percentage	Grade
92 and above	A
90 - 91	A-
88 - 89	B+
82 - 87	B
80 - 81	B-
78 - 79	C+
72 - 77	C
70 - 71	C-
60 - 69	D
59 and below	F

8. **No** make-up exams will be given and **no** late homework will be accepted.
9. To encourage participation from students, **no** recording is allowed.

## 2. University, College, or Department Policy Information

### 1. General Expectations, Rights and Responsibilities of the Student

As members of the academic community, students accept both the rights and responsibilities incumbent upon all members of the institution. Students are encouraged to familiarize themselves with SJSU's policies and practices pertaining to the procedures to follow if and when questions or concerns about a class arises. See University Policy S90–5 at <http://www.sjsu.edu/senate/docs/S90-5.pdf>. More detailed information on a variety of related topics is available in the SJSU catalog, at <http://info.sjsu.edu/web-dbgen/narr/catalog/rec-12234.12506.html>. In general, it is recommended that students begin by seeking clarification or discussing concerns with their instructor. If such conversation is not possible, or if it does not serve to address the issue, it is recommended that the student contact the Department Chair as a next step.

### 2. Dropping and Adding

Students are responsible for understanding the policies and procedures about add/drop, grade forgiveness, etc. Refer to the current semester's Catalog Policies section at <http://info.sjsu.edu/static/catalog/policies.html>. Add/drop deadlines can be found on the current academic year calendars document on the Academic Calendars webpage at [http://www.sjsu.edu/provost/services/academic\\_calendars/](http://www.sjsu.edu/provost/services/academic_calendars/). The Late Drop Policy is available at <http://www.sjsu.edu/aars/policies/latedrops/policy/>. Students should be aware of the current deadlines and penalties for dropping classes.

Information about the latest changes and news is available at the Advising Hub at <http://www.sjsu.edu/advising/>.

### 3. Consent for Recording of Class and Public Sharing of Instructor Material

University Policy S12-7, <http://www.sjsu.edu/senate/docs/S12-7.pdf>, requires students to obtain instructor's permission to record the course and the following items to be included in the syllabus:

- "Common courtesy and professional behavior dictate that you notify someone when you are recording him/her. You must obtain the instructor's permission to make audio or video recordings in this class. Such permission allows the recordings to be used for your private, study purposes only. The recordings are the intellectual property of the instructor; you have not been given any rights to reproduce or distribute the material."
- It is suggested that the greensheet include the instructor's process for granting permission, whether in writing or orally and whether for the whole semester or on a class by class basis.
- In classes where active participation of students or guests may be on the recording, permission of those students or guests should be obtained as well.
- "Course material developed by the instructor is the intellectual property of the instructor and cannot be shared publicly without his/her approval. You may not publicly share or upload instructor generated material for this course such as exam questions, lecture notes, or homework solutions without instructor consent."

#### 4. Academic integrity

Your commitment, as a student, to learning is evidenced by your enrollment at San Jose State University. The University Academic Integrity Policy S07-2 at <http://www.sjsu.edu/senate/docs/S07-2.pdf> requires you to be honest in all your academic course work. Faculty members are required to report all infractions to the office of Student Conduct and Ethical Development. The Student Conduct and Ethical Development website is available at <http://www.sjsu.edu/studentconduct/>.

#### 5. Campus Policy in Compliance with the American Disabilities Act

If you need course adaptations or accommodations because of a disability, or if you need to make special arrangements in case the building must be evacuated, please make an appointment with me as soon as possible, or see me during office hours. Presidential Directive 97-03 at [http://www.sjsu.edu/president/docs/directives/PD\\_1997-03.pdf](http://www.sjsu.edu/president/docs/directives/PD_1997-03.pdf) requires that students with disabilities requesting accommodations must register with the Accessible Education Center (AEC) at <http://www.sjsu.edu/aec> to establish a record of their disability.