# SYLLABUS: CSE 591 - Semantic Web Mining

1. Contact Information

Instructor: Hanghang Tong Office: BYENG 416 Tel: (480) 727-1431 Email: <u>hanghang.tong@asu.edu</u> Class Meeting: 4:30-5:45pm M/W, Tempe COOR 170

2. Office Hours

Students should make every effort to utilize the scheduled office hours. However, if you are unable to attend office hours, please schedule an appointment at least 24 hours in advance.

3. Course Objectives and Expected Learning Outcomes

Students who complete this course can:

- 1. Develop data mining techniques and tools for structuring and organizing unstructured sources such as text and Web data into semantic machine processable information.
- 2. Understand syntax, semantics and structure in HTML, text and data
- 3. Understand the computational aspects of Information Extraction (IE) and linkage
- 4. Perform discovery and information extraction tasks wherever text serves as data such as measuring public opinion and trending topics expressed in social media messages
- 4. Topics (Subject to Change)
  - Semi-Structured and Web Data
  - Semantic Web: RDF, OWL and Ontologies
  - Information Extraction (IE)
  - Text Classification
  - Text Clustering and Summarization
  - Opinion Mining and Sentiment Analysis
  - Streaming Text Analysis Trend and Topic Detection
  - Profiles, Personalization and Recommendation Systems
  - Dissemination
- 5. Grading Policies

Project proposal	10%
Final Project Report	30%
Assignment	30%
Exam	30%

Grade Assignment: A+ (97 – 100%), A (94 – 97%), A- (90 – 94%), B+ (87 – 90%), B (84 – 87%), B- (80 – 84%), C+ (76 – 80%), C (70 – 76%), D (60 – 70%), E (0 – 60%).

## 6. Absence & Make-Up Policies

Accommodations will be made for religious observances provided that students notify the instructor at the beginning of the semester concerning those dates. Students who expect to miss class due to officially university-sanctioned activities should inform the instructor early in the semester. Alternative arrangements will generally be made for any examinations and other graded in-class work affected by such absences.

# 7. Readings, Assignments, Examinations, Special Materials, Required Activities

Required Text: *Mining the Web: Discovering Knowledge from Hypertext Data* by Soumen Chakrabarti. Morgan Kaufmann

Optional: Web Data Mining: Exploring Hyperlinks, Contents, and Usage Data, Liu, Springer Reading List: http://www.public.asu.edu/~hdavulcu/CSE591\_Semantic\_Web\_Mining.html

### 8. Classroom Behavior

Cell phones and pagers (must be/or state alternative rule) turned off during class to avoid causing distractions. The use of recording devices (is/is not) permitted during class. Any violent or threatening conduct by an ASU student in this class will be reported to the ASU Police Department and the Office of the Dean of Students.

### 9. Academic Integrity

All students in this class are subject to ASU's Academic Integrity Policy (available at <u>http://provost.asu.edu/academicintegrity</u>) and should acquaint themselves with its content and requirements, including a strict prohibition against plagiarism. All violations will be reported to the Dean's office, who maintains records of all offenses.

#### 10. Disability Accommodations.

Suitable accommodations will be made for students having disabilities and students should notify the instructor as early as possible if they will require same. Such students must be registered with the Disability Resource Center and provide documentation to that effect.