School of Information Sciences

Course Profile: Information Visualization

Course Number: INF 7492

Credits: 3

MLIS Prerequisite(s): INF 6080

MSIM Co-requisite(s): INF 6000

Rationale for Inclusion in Curriculum:

Information professional careers increasingly focus on understanding and drawing insights from vast stores of collected data. Analyzing these large data sets and drawing insights from them will become the basis for competition. To obtain insights, information professionals use a variety of tools, statistical techniques, charts, and graphs to present and infer meaning. Yet, currently, there is a shortage of skilled analysts and information professionals to make sense of this explosion of digital data.

This course is intended to advance the insight generation skills and capabilities of the library and information science student. This course does not require any technical knowledge beyond the content covered in INF 6080.

Learning Outcomes:

By the end of the course, students will be able to:

1. perform analysis using various statistical tools and techniques;
2. perform critical thinking using analytic models;
3. articulate the fundamental concepts of visualization and decision making;
4. enhance presentation and communication skills;
5. expand ability to think and reason rigorously through using pattern detection;

Content:

Various topics will be explored in a Library and Information Science setting focusing on practical data visualization and analysis. The following topics will be covered in this course:

1. Organizational Analytics: discussion of analytics and metric reports generated from various website tools
2. A/B Experimentation: investigate various A/B experimentation as it is associated with the website
3. Information Visualization: focus on business intelligence and generation tools and techniques
4. “Big Data”: utilize various tools and techniques such as data mining of historical data to gain insights and extracts key indicators from various social networks and virtual communities to determine influence

Course Methodology:

Lectures, Discussion Boards, Demonstrations , Course Website, Supplemental Material (including videos, audio interviews, slides), Additional Readings(including blogs, journal articles, books), Projects

Evaluation of Student Performance:

The student's performance will be evaluated using:

1. Creation of materials using software tools;
2. Completion of class assignments;
3. Quizzes / Exams;

Students will have access to various software productivity tools to complete assignments.

Text(s): To be determined

Approved: 4/12
Updated: 8/13