Course Profile: Introduction to Information Management

Course Number: INF 6000

Credits: 3

Prerequisite(s): None

Rationale for Inclusion in Curriculum:

This course provides students with the opportunity to synthesize, analyze, and develop the knowledge and skills uniquely needed for today's information management professional, and provides students with a solid background for taking advanced courses in the program.

From the perspective of information technologies, information in nature is data. Over the past few years, along with the trend of "big data" in the broad area of information management, the demand for skills in data analytics in various areas has increased dramatically. This course uniquely combines the views from multiple perspectives including both data science and information technologies to examine the information management field. The course introduces students to current data/information management from an interdisciplinary perspective, incorporating the latest ideas, techniques, and technologies into the data/information life cycle in order to prepare students for Information Management (IM) careers.

Learning Outcomes:

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

1. Distinguish among the major phases in the data/information life cycle
2. Determine the relevance, importance, and value of the major concerns and opportunities at different phases of the life cycle for information management
3. Categorize the different types of data based on their properties
4. Compare and evaluate different technical approaches/solutions for major IM tasks
5. Examine the impact of information technology on information management
6. Analyze the changing relationships between data/information and information technologies
7. Analyze the social and ethical issues related to information management
8. Synthesize the major challenges facing IM professionals in the future
Topics include: (i.e. selective topics)

- Analytical frameworks.
- Case studies: Acquiring insights through data manipulation and portrayal.
- Data Analytics and Visualization
- Data dissemination on the Web
- Data Management: Big data and NOSQL databases
- Data Management: Relational databases
- Data mining
- Data Processing at different phases of life cycle
- Data/information life cycle
- Health informatics
- Human-Computer Information interaction
- Insight need types
- Social and organizational context for IM
- Social media (as a source of data)
- Text information retrieval and analysis
- Types and Categories of Data

Course Methodology:

Lectures, demonstrations, readings, class discussions, presentations, and guest speaker(s).

Bases for Evaluation of Student Performance:

- Assignments (may be research papers, exercises, and/or projects)
- Examinations
- Presentations
- Participation/discussion

Text and/or Readings:

To be determined

Approved: 8/17

Updated: