## **COT 5930 Medical Information Systems**

Credits: 3 credits

**Text book, title, author, and year:** Health Care Information Systems: A Practical Approach for Health Care Management 2<sup>nd</sup> Edition Wager ~ Lee ~ Glaser & Several Research Papers would be provided for reading.

Reference materials: Instructor Notes

## **Specific course information:**

**Catalog description:** The course would discuss various health informatics standards and health informatics systems. Further, the health informatics system specification and design would be discussed. Specifically the course would discuss the system components for an EMR, PHS and HIS informatics systems.

Course would cover the concepts of interoperability of various healthcare informatics systems, issues and challenges associated with them. The concepts and computer science technologies associated with remote patient monitoring and preventive care would be discussed. Lastly course would cover the emerging concepts in healthcare and emerging mobile apps in healthcare space. The students would be required to complete the final design project as part of the course.

**Prerequisites:** Graduate Level

**Specific goals for the course:** • Overview of Health Informatics

- Health Standards: HIPPA, HL7, EDI-X12, DICOM, IHE
- Introduction to Health Information Systems: EMR, PHS, HIS, RIS
- Health Information Operability
- Electronic Prescribing
- Home Healthcare, Remote Patient Monitoring, Remote Preventive Care, Telemedicine
- Mobile Applications in HealthCare
- Emerging Trends

**Brief list of topics to be covered:** Students are expected to login at blackboard more than twice every week to participate in all discussions and blogs. All the assignment deadlines would be posted on the on the blackboard itself.

Note: By default all the assignments would have a deadline of one week after being posted on the blackboard. Please ensure to complete your assignment within that timeframe.