



Varadraj "Raj" Prabhu Gurupur, PhD
Associate Professor
Health Management and Informatics,
University of Central Florida

Academic Training

PhD Computer Engineering, The University of Alabama at Birmingham, 2010

Master of Science, Computer Science, The University of Alabama at Birmingham, 2005

Bachelor of Engineering, Computer Science and Engineering, Mangalore University, 2002

Work Experience

Associate Professor, Health Management and Informatics, University of Central Florida, August 2019 - Present

Assistant Professor, Health Management and Informatics, University of Central Florida, August 2014 – August 2019

Assistant Professor, Health Informatics and Information Management, Louisiana Tech University, September 2013-July 2014

Assistant Professor, Computer and Information Sciences, Texas A&M University – Commerce, August 2011 – July 2013

Data Manager, Department of Neurology, The University of Alabama at Birmingham, April 2007 – July 2011

Data Processing Specialist, Department of Pharmacy, The University of Alabama at Birmingham, November 2005 – April 2007

Research Achievements

- 106 publications include: 27 peer-reviewed journal articles, 3 book chapters, 20 articles in conference proceedings, 1 book, 1 dissertation, 10 abstracts, 39 non-refereed reviews, and 5 special issues with journals
- 1 best presentation award at a regional conference
- 1 national level recognition for research
- 1 state level recognition for research
- 1 college level research fellowship
- Participated in 9 research projects that were funded externally (6 as a Principal Investigator)
- 2 internal research grants
- Awarded the best doctoral student with the Department of Electrical and Computer Engineering, The University of Alabama at Birmingham, year 2010.
- Participated in 7 doctoral committees, and 2 Master's thesis committees
- Mentored 16 research assistants (14 graduate and 2 undergraduate)
- Received 1 lifetime achievement award
- Pioneering the Decision Support System and Informatics lab at UCF



Research Areas

Primary Area: The main area of my research is **“software engineering information systems that aid in decision support to improve the quality of healthcare delivery.”**

This implies that my research work covers the following areas of focus:

- a) requirements and readiness assessments, and
- b) architecting the design of information systems for healthcare delivery.

Secondary Area: My secondary area of research is **design and development of innovative tools and techniques for assessing student learning outcomes.**

Areas of Current Research



- a) advancing Deep Learning techniques for predicting/analyzing healthcare data,
- b) testing and validating systems and prototypes I have developed so far on technology for education in predicting student learning outcomes, and
- c) advancing my already established international reputation in the area of synthesizing artificial intelligence-based healthcare systems.

Decision Support Systems and Informatics Lab at UCF

- <https://www.ucfinformaticslab.org/>

RESEARCH TEAM | UCF Informatics X


https://www.ucfinformaticslab.org

UCF Decision Support Systems and Informatics Lab


HOME RESEARCH TEAM THE FACILITY PROJECTS

Faculty

Varadraj P. Chinnaiyan



Thomas T.H. Wan, Ph.D.



Dr. Thomas T.H. Wan is an associate professor and director of the Decision Support Systems and Informatics Lab. He has a strong background in the area of research associated with the lab. He has established a collaborative relationship with local industry to achieve the objective of contributing to positive outcomes in the community. He is currently working on a research grant to develop a research grant of researchers in the aforementioned areas of research. His research interests include the analysis of human factors in the design of health care management systems, the development of decision support systems, and the analysis of risk factors for avoidable adverse events. He is currently the director of the department of Health Management and Informatics at UCF, which is ranked among the top 40 Health Administration programs in the nation. The Decision Support Systems and Informatics Lab embodies the goals of the department, which is to advance the College of Community Innovation and Education.

The overarching mission of the Decision Support Systems and Informatics Lab is to synthesize algorithms, technologies, and methodologies for advancing the support science of the next generation of scientists who specialize in this lab. This lab was founded by Varadraj P. Chinnaiyan and Thomas T.H. Wan, who have a strong background in the area of research associated with the lab. They have established a collaborative relationship with local industry to achieve the objective of contributing to positive outcomes in the community. They are currently working on a research grant to develop a research grant of researchers in the aforementioned areas of research.