PHD STUDENTSHIP IN SCIENTIFIC VISUALIZATION AND DATA ANALYSIS

(TO BEGIN IN FALL 2017)

Department of Modeling, Simulation, and Visualization Engineering
Old Dominion University
Norfolk, VA 23529, U.S.A.

One PhD studentship in <u>Scientific Visualization and Data Analysis</u> is available at the department of Modeling, Simulation, and *Visualization* Engineering (MSVE: https://www.odu.edu/msve), Batten College of Engineering and Technology (https://www.odu.edu/eng), Old Dominion University (ODU: www.odu.edu). Applications are invited to fill this opening in fall 2017.

While candidates already with Master's degrees in computer science, information science or engineering, electrical engineering, applied mathematics, or other closely related disciplines are expected, those with BS degrees yet with exceptional research potentials are also very welcome. The successful candidate will perform intensive research and sustainable development in scientific visualization and data analysis, involving vector / flow field visualization, parallel visualization, uncertainty visualization, and virtual reality. An ideal candidate should

- be highly self-motivated
- have a deep passion for research
- address tasks in a discreet, progressive, and accordingly thorough manner
- demonstrate strong research ability and solid development capability (with C/C++ programming required and with OpenGL / GLSL / CUDA / multi-threading / MPI programming desired — considered a plus)
- possess great communication skills in written and oral English

ODU is a national research university, as classified by the Carnegie Foundation. With an enrollment of 25,000 students, ODU is located at Norfolk, VA, just along the east coast of the United States. The surrounding metropolitan area called "Hampton roads", covering other neighbor cities (Newport News, Hampton, Virginia Beach, Chesapeake, Portsmouth, et al), has a population of over 1.7 million. Norfolk is considered the historic, financial, and cultural center of this region, about 20 miles from NASA Langley Research Center (Hampton), about 25 miles from Jefferson National Lab (Newport News), and about 3.5 hours of drive from Washington DC

The MSVE department of ODU is the first of the nation to offer a doctoral program in modeling and simulation engineering, currently with a significant initiative in <u>scientific visualization and data analysis</u> in an effort to address the increasing needs of domain experts as they resort to the modeling-simulation-visualization-analysis cycle towards scientific discovery. MSVE students have access to state-of-the-art high-performance computing facilities in addition to research labs, a virtual reality theater, and a four-wall CAVE (Cave Automatic Virtual Environment). The graduate program is unique for the multidisciplinary characteristics, involving 35 faculty members from six academic colleges. In addition, it is supported by research scientists and computing resources of the nearby Virginia Modeling, Analysis, and Simulation Center (VMASC) located at Suffolk, VA.

An application package should include a cover letter, a detailed CV, a copy of BS & MS diplomas, as well as names and contact information of at least two references.

Please **E-MAIL** questions and applications to z**1L**iu@odu.edu.

Thanks.

Dr. Zhanping Liu

Assistant Professor
Department of Modeling, Simulation, and Visualization Engineering

Old Dominion University, MSVE
4700 Elkhorn Avenue #1300
Norfolk, VA 23529

Tel: 757-683-4561   /   Fax: 757-683-3200
E-mail: z**1L**iu@odu.edu / Home Page: www.zhanpingliu.org