

Michigan Technological University, Houghton, MI

Tenure-Track Assistant Professor - Geospatial Science and Technology Surveying Engineering Program, School of Technology

Michigan Technological University, a nationally recognized leader in science and engineering education and research, invites applications for a tenure-track faculty position in the Surveying Engineering Program within the School of Technology starting August 2011.

The Surveying Engineering program is responsible for offering the B.S. in Surveying Engineering degree. In addition, surveying engineering program courses are used in fulfillment of the Geospatial technical emphasis for the B.S. in Engineering degree offered by the College of Engineering, and for a proposed Surveying Engineering minor for Civil Engineering students. A graduate program in Integrated Geospatial Technology is currently in the approval process. The Surveying Engineering program has the latest surveying, GNSS, GIS, and photogrammetric equipment and software. Faculty and students are involved in several applied research projects including a mobile mapping system project and a small photogrammetric UAV platform development project.

Responsibilities

We seek an enthusiastic geospatial educator and researcher who will involve students in research projects, field work, and data processing, mentor students in their senior capstone projects, and generally prepare students for careers in geospatial professions. The successful candidate will be expected to teach undergraduate and graduate classes and laboratories, create innovative instructional materials and laboratory experiences including web-based instruction, establish a record of sustained scholarship, promote the degree programs through local, regional and national engagement, participate in program assessment activity related to accreditation, perform student advising and other departmental service, including internal and University committee work, and will also be encouraged to develop sources of external funding for applied research and projects.

Teaching responsibilities may include geodesy, geodetic models and adjustments, surveying instruments, capstone projects, and other courses of both a theoretical and hands-on nature at junior through senior levels, which may include general education courses in earth observation systems or cartography/mapping.

Qualifications

Applicants must have: (1) a Ph.D. in geodesy or a closely related field from an accredited institution; (2) evidence of strong oral and written communication, computer and presentation skills; (3) a strong commitment to teaching excellence and student success; and (4) motivation to conduct applied research and develop partnerships with industry and government. Teaching experience and relevant professional licensing or certification are desirable, along with relevant industry or government experience. Experience in writing proposals is also desirable. The successful candidate will have the ability to teach a combination of courses related to at least two of the following geospatial areas: (1) geodesy; (2) surveying; (3) cartography; (4) photogrammetry and computer vision; (5) remote sensing; (6) GIS. The successful candidate will also be expected to contribute to the forthcoming Integrated Geospatial Technology graduate program.

Applications from individuals trained in geodesy, cartography, photogrammetry, remote sensing, GIS and other related geospatial sciences and technologies are welcome. Priority will also be given to candidates with an in-depth geospatial background in areas such as mobile mapping systems, aerial and terrestrial LIDAR scanning, geodetic positioning, theory and application of GPS and GNSS, networked geosensors, or applications of geospatial science for environmental and other needs. Secondary areas of expertise include automated cartography, GIS-based visualization, land surveying/registration and monitoring information systems and policies. Priority will be given to candidates that demonstrate experience in creation of geospatial solutions and who are interested in and capable of developing new research-oriented geospatial courses and programs.

Salary

Salary and academic rank will be commensurate with qualifications and experience.

Application Information

Review of applications will begin immediately and continue until the position is filled. Interested individuals must submit a letter of application indicating interest in the Surveying Engineering faculty position, a description of how the applicant meets the required qualifications for the position, a detailed curriculum vita that includes teaching philosophy and research interest statements, the names, addresses, and phone numbers of three current references, and available start date. Final candidate(s) will be required to furnish proof of doctoral degree, at least three letters of reference, and a completed faculty application form. Send applications to Dean Jim Frendewey at: jimf@mtu.edu.

Further Information

Information about the School of Technology, along with the curriculum and course descriptions, can be found on-line at: http://www.tech.mtu.edu.

Local Area

Our setting on the Keweenaw Peninsula of Michigan on Lake Superior provides a beautiful backdrop to a world-class education. Michigan Technological University is located in Houghton, Michigan, which was included in the guidebook, The *100 Best Small Towns in America*, by Normal Crampton, as one of the best rural places to live in the US. Houghton, Hancock, and the surrounding towns have a combined population of approximately 15,000. However, add in the Michigan Tech student population and it balloons to more than 22,000.

Men's Journal has ranked Houghton as one of the Top 10 "healthiest, safest, and most fun places to live," and National Geographic Adventure Magazine ranked our setting as one of America's Top 10 Summer Sports Meccas.

In addition to the present search, strategic faculty hiring initiatives with up to ten new positions in "Next Generation Energy Systems" and "Health: Basic Sciences, Technologies, and Medical Informatics" are in their second year and qualified candidates are encouraged to send a separate application, following the "How to Apply" guidelines at http://www.mtu.edu/sfhi.

Michigan Tech is an ADVANCE institution, one of a limited number of universities in receipt of NSF funds in support of our commitment to increase diversity and the participation and advancement of women in STEM.

Michigan Technological University is an equal opportunity/equal access/affirmative action employer fully committed to achieving a diverse workforce.