# Henson School of Science and Technology

#### **Affordable Nursing Excellence**

SU was ranked the 16th "Best Affordable RN-B.S.N. Degree Program" in the nation based on cost and quality by the website Cheap Nursing Degrees.

The University is applauded for its "expert professors" who mentor students and teach in the classroom and laboratory, and its "excellent clinical facilities and hospital affiliations." The website added: "As proof of Salisbury's quality, the school has the highest three-year average NCLEX pass rate of any school in Maryland, and the Commission on Collegiate Nursing Education recently granted the program accreditation for the maximum period possible."

Enhancing these affordable programs, the Nursing Department received the largest grant in its history – nearly \$2.1 million – to continue a project that prepares clinical experts to become nursing faculty. The Eastern Shore Faculty Academy and Mentoring Initiative (ES-FAMI) was created by SU and several partners in 2011 to develop quality adjunct professors with a particular emphasis on recruiting underrepresented individuals, including men and those from diverse backgrounds.

The ES-FAMI is being funded via the Maryland Higher Education Commission (MHEC) as part of the Nurse Support Program (NSP) II it administers for the state's Health Services Cost Review Commission. NSP II's goal is to increase the number of nurses in Maryland by focusing on their education.

In awarding the latest funds, MHEC recognized SU as "a leader in mentoring new faculty in nursing education" and a "strong partner" in the efforts to expand resources for clinical faculty to Maryland nursing programs and hospitals.

At spring commencement, the nursing program awarded eight students the University's first doctoral degrees: the Doctor of Nursing Practice.





**First Doctoral Program:** SU's first doctoral program – the Doctor of Nursing Practice – began in fall 2012. Designed for nurses in advanced practice roles, graduates gain specialized skills for managing the increasingly complex needs of patients in multi-tiered health-delivery systems.

YEARS

#### **Innovative GIS Projects Honored**

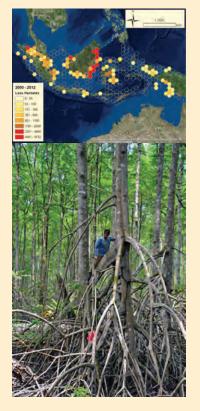
SU's Eastern Shore Regional GIS Cooperative (ESRGC) and its director, Dr. Michael Scott, were named among the state's Innovators of the Year for 2014.

Bestowed by the Maryland *Daily Record*, the honor recognizes those whose work "heralds new frontiers for how we live, work, play and give back" and those who have "created new products, services or programs that have improved their fields."

The ESRGC has played a key role in the Maryland Broadband Mapping Initiative, which has been called one of the top three such projects in the country by the National Telecommunications Information Administration. The ESRGC has been working on its \$2.12 million effort for the Maryland Broadband Cooperative (MdBC) for the last five years. In 2009, MdBC was designated by Governor Martin O'Malley to collect, validate and map service coverage areas and market performance of the state's internet providers for the broadband mapping initiative, funded by the American Recovery and Reinvestment Act.

The Cooperative also was awarded a contract for an international project with the Gordon and Betty Moore Foundation to monitor mangrove loss in Indonesia.

Undergraduate and graduate students will identify changes, since 2000, in the mangrove forest inventory of the archipelago in Southeast Asia/Oceania. They also will help compile a report to be presented to the Moore Foundation on the driving forces behind mangrove loss.



### Taylor Awarded Elkins Professorship

Dr. Ryan Taylor, Biological Sciences Department, received the Wilson H. Elkins Professorship, one of the University System of Maryland's most distinguished awards, which includes a \$50,000 prize. The honor will help him continue his field research on túngara frogs at the Smithsonian Tropical Research Institute in Panama.

Taylor has earned two National Science Foundation grants totaling nearly \$1.5 million for multi-year projects related to the frogs. He won SU's Outstanding Research Mentor Award in 2013. His studies using robotic frogs have been featured in National Geographic, The Wall Street Journal, The Smithsonian, the BBC nature documentary Talk to the Animals and the book Calls Beyond Our Hearing. He earned his Ph.D. from the University of Louisiana at Lafayette in 2004 and joined SU's faculty in 2007.

"This award will help to maintain my tropical research program (ongoing for 10 years) and help to ensure the future production of both quality science and student training," said Taylor. "Together with my colleagues and students, we have elucidated important evolutionary processes that explain how acoustic signals evolve in animals. In addition, this work has provided profound insights into basic auditory perception by the vertebrate brain, including human speech perception."

#### **Standardized Patients**

The Nursing Department received \$299,983 from the Maryland Higher Education Commission to expand its "Standardized Patient Experience" training across the state. SU students learn with "patients" who are actors trained to portray individuals with various mental health disorders. Their interactions are recorded and discussed later, and the students learn that identifying and caring for individuals with behavioral and mental health issues goes hand-in-hand with addressing clinical needs. Over the next two years, Drs. Debra Webster and Lisa Seldomridge will develop a series of web-based toolkits for other faculty to use to teach students the essential skills for "mental health" nursing.

## **Hamilton Earns Ecuadorian Fellowship**

Dr. Stuart Hamilton, Geography and Geosciences Department, earned a prestigious \$83,000 Prometheus Fellowship from the Ecuadorian government to explore the causes of sedimentation in that country's Chone Estuary.

The highly competitive award is considered the premier science fellowship within Ecuador, Hamilton said, and is given to less than 10 percent of those who apply. "My hypothesis is that the driving mechanisms behind the sedimentation include the deforestation of riverine mangrove forests and the conversion of terrestrial forests into agriculture and other uses,"

Hamilton said. "It is a problem because it has reduced the livelihood options available to local populations and decreased security for those who rely on the estuary for income and food."

In addition to studying the impacts of land-use and land-cover change in the coastal watershed, Hamilton is producing a management plan to mitigate the sedimentation issue in the future. He involves students in projects related to his research.

In other efforts to expand student learning, they may now complete an M.S. in geographic information systems (GIS) management entirely online.