

# NM STATE Engineering



Fall 2018



### INDUSTRIAL ENGINEERING STUDENT COMMERCIALIZES VACUUM TECHNOLOGY

**Trashard Mays,** a graduate student at NMSU, is using valuable resources provided by Arrowhead Center at NMSU to commercialize vacuum technology developed by the Air Force Research Laboratory that solves a problem scientists and technicians have grappled with for years.

Through its TechMatch program, Arrowhead Center works to match aspiring entrepreneurs with technologies and creative works available to commercialize, and provides access to inventions and technologies developed in New Mexico.

Mays is working on a master's degree in industrial engineering and a master's in business administration. Mays has worked on defining customer segments and needs for the Vacuum System Assembly Tool, which was developed by two engineers at the Air Force Research Laboratory.

Read more at engr.nmsu.edu/techmatch/

### NSF FUNDS FIRST-OF-ITS-KIND HSI STEM RESOURCE HUB AT NMSU

The National Science Foundation recently announced its first research awards under the Hispanic-Serving Institutions Program. In addition to 31 projects awarded to community colleges and universities across the country, a \$2.6 million, five-year grant will fund a first-if-its-kind HSI Resource Hub at New Mexico State University, in collaboration with Doña Ana Community College and California State University-Northridge.

"We envision a higher education landscape in which HSIs have institutional capacity that enables them to access the information, funding, and other resources needed to increase Hispanic student success that leads to advanced educational opportunities and productive employment in STEM fields," said Sonya Cooper, regents professor, associate dean in NMSU's College of Engineering and co-principal investigator for the project.

#### Read more at engr.nmsu.edu/hsi-stem/



### NMSU ENGINEERING ENTERS COOPERATIVE AGREEMENT WITH CHINESE UNIVERSITY

**On September 5,** the presidents of New Mexico State University and Changchun Institute of Technology signed a five-year memorandum of understanding to increase opportunities for Chinese students to pursue graduate studies in engineering at NMSU.

The joint program initially will focus on electrical engineering and automation, particularly on the development and use of smart grids and electrical generation and distribution infrastructure.

"By focusing on this area of expertise, we can address some global problems," said John Floros, NMSU president. "It will also help our students to become more aware and enter careers that are targeted on solving the problems of the future."



#### Read more at engr.nmsu.edu/china/

## COLLEGE OF ENGINEERING LAUNCHES RON SEIDEL ENGINEERING LEADERSHIP INSTITUTE



Our family owes a great deal to NMSU and this donation is a way we can support this new and exciting program that will help create a new generation of engineering leaders," said Seidel. Engineering today is a team-based, multidisciplinary endeavor that requires skills beyond technical, but also the ability to work with diverse groups of people, communicate effectively and develop entrepreneurial skills. NMSU's College of Engineering will help students develop those essential "soft skills" with the launch of the Ron Seidel Engineering Leadership Institute.

A donation from engineering alum Ron Seidel and his wife Janice, will make the institute a reality this coming spring, providing students with the interpersonal and intrapersonal skills that they will need to become successful leaders in engineering careers.

Read more at engr.nmsu.edu/leaders/



NMSU ENGINEERING STUDENTS EARN ACCOLADES **AT INTERNATIONAL DESIGN COMPETITION**  **After spending two years** working on a personal mobility device, a group of NMSU engineering students were rewarded with top honors at the Partners for the Advancement of Collaborative Engineering Education (PACE) Global Annual Forum held in Detroit, Michigan, at the General Motors Warren Tech Center this past summer.

NMSU partnered with Iberoamericana University and Instituto Tecnologico y de Estudios Superiores de Monterrey-Toluca from Mexico; Inha University, Kookmin Design Team and Sungkyunkwan University from South Korea and University of Puerto Rico. They won first place in industrial design and second place in the road test competition for their personal urban mobility access device that is marketed to the Baby Boomer population.

Read more at engr.nmsu.edu/pace/

## ENGINEERING PROFESSOR RECEIVES DEPARTMENT OF ENERGY GRANT

NMSU Department of Civil Engineering Assistant Professor Ehsan Dehghan Niri has received a United States Department of Energy grant. This is a three-year award for \$400,000 and is a collaboration with Arizona State University.

Dehghan Niri is the principal investigator on the research project that will focus on creating a bio-inspired robot – the Lizard-inspired Tube Inspector – to inspect tubular structures for cracking and corrosion in coal power plants.

Read more at https://engr.nmsu.edu/niri/





### ENGINEER, LAWYER: DISTINGUISHED ALUMNA DION MESSER MADE THE BEST OF HER EDUCATION

**Dion Messer,** electrical engineering, was honored as Distinguished Alumna at homecoming celebrations in early October. She addressed scholarship donors and scholarship recipients at the 26th Annual College of Engineering Scholarship Breakfast.

"The advice I would give current students at NMSU is to take the fullest advantage you can of the excellent education you are receiving. This is your time to absorb it all. When you leave NMSU, you'll leave with a foundation upon which to make a career and a profession," said Messer. "Remember to be kind, to be generous and to never burn bridges because you just don't know what life holds."

Her commitment to people also extends back to where it all began. At NMSU, she serves on the NMSU Foundation Board of Directors, is an active member of the NMSU Alumni Association and has been donating to her alma mater since 1987.

Read more at engr.nmsu.edu/messer/

#### NEW MEXICO STATE UNIVERSITY

PO BOX 30001, MSC 3449 LAS CRUCES, NM 88003-8001 NONPROFIT ORGANIZATION US POSTAGE **PAID** NMSU

#### SUPPORT AGGIE ENGINEERING

https://engr.nmsu.edu/giving/make-a-gift/

# NM STATE Engineering

"Goddard Broadcast" pays homage to wireless communication pioneer Ralph Willis Goddard, one of the founders of the engineering school in 1914, and former dean of engineering at NMSU, originally known as the New Mexico College of Agriculture and Mechanic Arts.

#### CONNECT

- 🛞 engr.nmsu.edu
- facebook.com/nmsuengineering/
- twitter.com/nmsu\_engineer
- instagram: @nmsu\_engr
- snapchat: @nmsu\_engr