

Mechanical Engineering Capstone Presentations Fall 2022

Friday, December 9th, 2022, 9:00am - 3:00pm

duBois – Aspen B & C

Oral Presentations

Aspen B

- 9:00am - 9:30am Flyable Cargo Plane for SAE Aero Micro Competition
- 9:30am - 10:00am Solar Powered Unmanned Aerial Vehicle (UAV)
- 10:00am - 10:30am Python-Based Wind Turbine Point of Common Coupling Data Acquisition System
- 10:30am - 11:00am Solar Thermal Collector Design-of-Experiments for the NAU Renewable Energy Laboratory
- 11:00am - 11:30am Robotics Engineering Track System

Aspen C

- 9:00am - 9:30am Thermal-Fluid Scaffold Clearing of 3D-Printed Neurovascular In-Vitro Models
- 9:30am - 10:00am Low Force Iris Stent Crimper for Endovascular Stents
- 10:00am - 10:30am Nitinol Shape Memory Alloy Resettable Hold-Down Release Mechanism
- 10:30am - 11:00am Adjustable Leaf Spring Ankle-Foot Orthotic
- 11:00am - 11:30am Interactive Robotic Arm
- 11:30am-1:00pm Lunch Break
- 1:00pm – 2:00pm Panel Discussion

Poster Presentations

Aspen B&C (combined) – 2:00pm – 3:00pm

- Flyable Cargo Plane for SAE Aero Micro Competition
- Solar Powered Unmanned Aerial Vehicle (UAV)
- Python-Based Wind Turbine Point of Common Coupling Data Acquisition System
- Solar Thermal Collector Design-of-Experiments for the NAU Renewable Energy Laboratory
- Robotics Engineering Track System
- Thermal-Fluid Scaffold Clearing of 3D-Printed Neurovascular In-Vitro Models
- Low Force Iris Stent Crimper for Endovascular Stents
- Nitinol Shape Memory Alloy Resettable Hold-Down Release Mechanism
- Adjustable Leaf Spring Ankle-Foot Orthotic
- Interactive Robotic Arm