

HANS KUMAR

www.linkedin.com/in/kumarhans

hansk@andrew.cmu.edu | 484 – 802- 3730

EDUCATION

Carnegie Mellon University Pittsburgh, PA
B.S. in Mechanical Engineering, May 2019
Double Major in Biomedical Engineering
GPA: 3.8/4.0

Spring-Ford High School Royersford, PA
High School Diploma, June 2015
GPA: 100.925/100.000

WORK EXPERIENCE

Undergraduate Research Fellow Pittsburgh, PA
CERLAB Carnegie Mellon, Summer 2016

- Designed practical surgical models for the training of medical residents and medical device testing using novel fabrication techniques
- Interacted with several surgeons, residents, and researchers at Allegheny General Hospital for validation on different aspects of the 3D printed models

Team Children Collegeville, PA
Volunteer Tech, Summer 2014

- Refurbished old computers by updating software and hardware
- Donated and sold computers to children at underprivileged schools

PROJECTS

UAV Computer Vision Project, Summer 2016

- Collaborated in a CERLAB research group to develop software that could potentially allow a drone to detect cracks along water tunnels in Japan.
- Researched and implemented different segmentation techniques to help drone accurately detect areas of road and grass

15-112 Term Project, Spring 2016

- Coded an interactive drum tutor and audio visualizer that was designed to help drummers learn and create different beats
- Presented project to peers as one of the top fifteen showcase presenters

Mousetrap Car Project, Carnegie Mellon University, Fall 2015

- Built a small car using laser cutting and 3D printing techniques that could travel 15 feet forward and 15 feet backwards with only the power of a Mousetrap
- Worked with a team and made several improvements to the design of the car

LEADERSHIP

Networking Chair for CMU OM, 2016-Present

- Reached out to speakers and other organizations to coordinate major cultural events for the Pittsburgh's South Asian community

Center Snare of Spring-Ford Marching Band, 2012-2015

- Managed tempo across entire marching band of 120 students
- Helped to guide new members and maximize rehearsal process as percussion section leader

SKILLS

Software: Python, SolidWorks, Creo Pro/E, Meshlab, Blender, Basic HTML/CSS
Machines: 3D Printer, Mill, Laser Cutter, Lathe, DIY Fabrication
Language: Conversant in Hindi

ACTIVITIES

CMU Bhangra, Fall 2015-present
CMU OM, Spring 2016-present
Phi Delta Theta Fraternity, Spring 2016-present
Carnegie Mellon Racing, Fall 2016-present

HONORS

World Championship with Reading Buccaneers Drum and Bugle Corps, Summer 2015
Dean's List, Fall 2015