

EDUCATION

The University of Texas at Austin, Master of Science, Electrical and Computer Engineering (GPA: 3.8/4) May 2024
IIT Kharagpur, Bachelor of Tech. (Honors), Electrical Engineering, Minor in CS (GPA: 8.8/10) July 2020

PUBLICATIONS

“Socioeconomic Bias in LLMs” | Singh S., Keshari S., Jain V., Chadha A. (Amazon) (current)
“Annotating sleep states in children from wrist-worn accelerometer” | Ram A., Sundar S.V.S., Keshari S., Jiang Z. ([read here](#))
“Stable Remaster: Bridging the Gap Between Old Content and New Displays” | Paull N., Keshari S., Wong Y. ([read here](#))
“Categorizing ENDS-related Tweets: using BERT Topic Modeling” | Murthy D., Keshari S., Arora S., Yang Q. (Submitted)
“Decoding Brain Motor Imagery: with various Machine Learning techniques” | Jana G., Karnei C., Keshari S. ([read here](#))
“Large Cigar Detection in social media using YOLOv7” | Kong G., Keshari S., Ouellette R., Lee J., Murthy D. (Submitted)
“Facial asymmetry: a Vision based behaviometric index for interview assessment” | Keshari S. et al., ([read here](#))

RESEARCH AND INDUSTRY EXPERIENCE

UT Austin Power Electronics Lab: Graduate Teaching Assistant (ECE462L & ECE394J) Sept 2023 — Present
Advisor: Dr. Brian Johnson Austin, Texas

Texas Instruments: Systems Engineer May 2023 — August 2023
Internship - Optimized system performance by comparison of GaN and Si devices Dallas, Texas

UT Austin CML: Graduate Research Assistant: Computer Vision/NLP Nov 2022 — May 2023
Advisors: Dr. Dhiraj Murthy, Dr. Anna Wilkinson Austin, Texas

- Developed Vision-based computational models/pipelines to identify mechanisms underlying electronic nicotine delivery system (ENDS)-related social media exposure and ENDS use among young adults
- Investigated social media data using Oracle Cloud (scraping), and deployed custom Yolo and BERT models (inference) to explore multi-modal ML techniques [Paper Presentation: SRNT, San Antonio]
- Supervised undergraduate research assistants working on this project as part of the Computational Media Lab

Jaguar Land Rover Sept 2020 — August 2022
Power Electronics Software Engineer Coventry, United Kingdom

- Filed a patent (under review) for electric vehicle charging hardware and software
- Investigated Computer Vision R&D projects like driving assist technology and fault prediction for validation

IIT Kharagpur Rekhi Center: Undergraduate Research Assistant: Computer Vision Jan 2020 — Sept 2020
Advisors: Dr. Manas K Mandal, Dr. Priyadarshi Patnaik keshariS/EmotionAnalysis

- Designed an algorithm for measuring facial asymmetry and emotion incongruity from real time videos using CNNs.
- Developed an application using tkinter GUI library for a user-friendly interaction with the software.
- Enhanced accuracy of Facial emotion recognition model from 70% to 87% using custom datasets and AWS

ITC Limited: Operations Research Intern May 2019 — July 2019
Skills - Data Analysis, Operations Management, Strategic Planning and Market Research Mysuru, India

IIT Kharagpur EV Research Group Lead Oct 2017 — Mar 2020
Advisor: Dr. Vikranth Racherla Read: [Official Vehicle Launch Story](#)

TECHNICAL SKILLS

Programming LLMs, python (opencv, keras, scikit-learn), C/C++, OCI, AWS, Git, HTML, CSS
Software [CARLA Simulator](#), Jupyter, PyTorch, VS Code, MATLAB, ROS, PSIM, Cadence

RELEVANT COURSEWORK

Graduate Generative AI, AI & Society, Applied ML, Advanced CV, Autonomous EVs, DS/ Algorithms
Coursera Specializations [Self Driving Cars](#) (University of Toronto) || [Deep Learning](#) || [Machine Learning](#) (Stanford)

AWARDS & HONORS

2024 Texas Public Educational Grant scholarship (awarded by UT Austin)
2023 Professional Development Award (awarded by UT Austin ECE for conference presentation)
2020 Systems Society Award (Best B. Tech Thesis among Electrical, Energy and Instrumentation Engineering depts.)
2019 Silver Trophy ([Inter IIT Tech Meet 8.0](#), IIT Roorkee: Tech competition among 20 major IITs)
2016 KVPY National Fellow (funded by the Department of Science and Technology, Government of India)