

Aryan Gupta

📍 Charlotte, NC

✉ hire-me@gempi.re

📞 980-666-0648

🌐 theguptaempire.net/about-me

EDUCATION

transcripts available upon request

University of North Carolina at Charlotte - Charlotte, NC

M.S. in Computer Engineering

Aug. 2020 – May 2022 (Expected)

Current Cumulative GPA: 3.830 / 4.000

B.S. in Computer Engineering Minor in Software Systems Minor in Mathematics

Aug. 2016 – Dec. 2020

Graduated Cum Laude (GPA: 3.573 / 4.000)

WORK EXPERIENCE

references available upon request

ENSCO Avionics, Inc.

Embedded Software Engineer II

Aug. 2022 – Present

- Design tests to verify functionality of the fuel inerting system on the Airbus A321-XLR aircraft
- Utilize HIL testing to verify ICU operation based on the DO-178C verification process

Mosaic Computing / Personal Computer Support

IT System Administrator II

Aug. 2021 – Jul. 2022

- Develop and maintain computing environment to support academic and research labs in the college
- Development included specialized embedded/high performance computing solutions to support HIL simulation
- Provide support on the development of university-wide Linux-based services

IT System Administrator I

Feb. 2020 – Jul. 2021

- Provide support to the Mosaic managed desktop computing environment
- Oversee helpdesk support tickets with Tier 3 support
- Package engineering applications for deployment on Mosaic Windows desktops

RESEARCH AND PUBLICATIONS

links available upon request

Risk Aware LTL Motion Planning with Reinforcement Learned Agent and Antagonist (TBD)

Dr. Dipankar Maity, Ph.D. – University of North Carolina at Charlotte – Charlotte, NC

PROJECTS, RESEARCH, AND CREATIVE ENDEAVORS

code available on GitHub

NASA University Student Launch Initiative

2019 – 2020

First Place Nationally Payload, Second Place Nationally Overall

- Designed, documented, and constructed a rocket (LV) with a quadcopter (UAS) payload
- Lead development of computer systems on UAS and LV
- Lead development of camera vision system to detect ice sample location from LV
- Assisted in design of UAS to retrieve a lunar ice simulant sample
- Assisted design of deployment system to eject UAS out of LV during decent

TensorFlow Banana Presence Detector on IoT Arduino board

Spring 2021

- In a group, designed, trained, and tested a banana presence detector on a low powered Arduino ARM board
- Would detect presence of banana if placed in front of the camera
- Utilized Arduino Nano 33 BLE board with the OV7670 Camera

IoT Home Security System

Fall 2020

- Develop Android app, Raspberry Pi, Web Server, and IoT sensors to remotely control and secure a home
- All applications and server code developed from the ground up using Python, C++, Java, PHP, and SQL
- Embedded IoT sensors communicated with Raspberry Pi dashboard and synced up with an API Server
- Android app controlled the activation of sensors and break-in alarm

SKILLS

Leadership	Troubleshooting	Problem Solving	Communication	Reverse Engineering
Computer Networking	Multithreading	Embedded Systems	Assembly	Software Systems
C++	Python	Linux	Ansible	Git
			OpenCV	Arch Linux
				ARM
				Java

EXTRACURRICULAR

Boy Scout, Boy Scout of America

2008 – 2021

- Assistant Scoutmaster

Dec. 2019 – Apr. 2021

- Eagle Scout

Feb. 2016

IEEE Eta Kappa Nu (IEEE-HKN) Chapter Member

Apr. 2022