

Summary

B.Tech in **Electronics and Communication Engineering** from **National Institute of Technology, Durgapur** with a CGPA of **9.25/10**. Graduated in the year 2019. Have done relevant work in the field of Optimization, Machine Learning, Artificial Intelligence and Robotics which are listed below. Worked in the field of app development and have released 3 android apps which utilizes Artificial Intelligence, Computer Vision and Augmented Reality. Playstore [Link 1](#), [Link 2](#), [Link 3](#). [My Google Scholar Link](#).

Publications:

Optimal Integer Order Approximation of Fractional Order Human Ear Simulator, IEEE ECTI-CON- 2018, Chiang Rai, Thailand.

[IEEE Xplore Link](#) , [Certificate Link](#)

Work Experience

• **Associate Engineer** at **Qualcomm** (Nov 2019 - Present), **Compute Applications Engineering**.

• **Project Engineer** at **Wipro Technologies** (July - Nov 2019)

• **Summer Internship** at **PricewaterhouseCoopers Pvt. Ltd.** (Technology Consultant Intern) from May-July 2018. [Certificate Link](#)

• **Research Internship** at **Machine Dynamics Laboratory, NIT Durgapur, India** on **Mobile Robotics**. Guided by **Dr. Nirmal Baran Hui (ME)**, **NIT Durgapur** & **Dr. Aniruddha Chandra (ECE)**, **NIT Durgapur** (2018).

• **Research Internship** at **Indian Statistical Institute, Kolkata, India** on **Computer Vision**. Guided by **Prof. Bhabatosh Chanda (ECSU)**, **ISI Kolkata** (2017).

• **Research Intern** at **Jadavpur University, West Bengal, India** on **Mobile Robotics**. Guided by **Prof. Amit Konar (ETCE)**, **Jadavpur University**. Github [Link](#)

Certifications/Trainings

• Completed the course **Applied AI with Deep Learning** authorized by **IBM**, [Certificate Link](#), [Badge Link](#)

• **Google Cloud Platform Big Data and Machine Learning Fundamentals** authorized by **Google cloud**, [Certificate Link](#)

• **Neural Networks and Deep Learning** authorized by **deeplearning.ai**, [Certificate Link](#)

• **Machine Learning** authorized by **Stanford University** and offered through **Coursera**, [Certificate Link](#)

• **Embedded Systems and Microcontrollers** from **Pracsol Technologies**. [Certificate Link](#)

• **JAVASCRIPT** from **SOLOLEARN**.

Published Android Applications:

• Made an **Augmented Reality Application** which can play any video in AR over any image that the user wants. Playstore [Link](#), Tutorial [Link](#), Demo video [Link](#).

• Made an **AI Face Editor App** which uses flow based generative model to augment human facial features in pictures. Playstore [Link](#)

• Made an **AI Chatbot App** which responds to user's texts like a real person. [Link](#)

Published Youtube Tutorials:

• Fabricated **Reinforcement Learning** video tutorial series which demonstrates the steps to make an Artificially Intelligent Bot using Reinforcement Learning which can play games. Youtube [Link](#)

• **RFID Smart card programming** using **Raspberry Pi 3** to write and fetch data to and from a server. Detailed video explanation is available at: [YouTube Link](#)

Prototypes Developed for Competitions:

• Constructed a **Prototype Digital stethoscope** to analyze cardiac signals in real time during auscultation to reduce the risks of not detecting certain anomalies. It was selected for the **Grand Finale of Smart India Hackathon, 2018** . [Certificate Link](#)

• Designed and developed a **semi-autonomous robot** which was capable of throwing and landing discs at precise locations. Participated in the **Asian Oceanian College robot competition, ABU ROBOCON 2017** as a team representing our college with this robot.

Other Projects:

• **Sentiment Analysis** using **Tensorflow**. Github [Link](#).

• Designed a **short-range Quadcopter** using **MultiWii v2.5 SE** which was controlled from an **Android device** via **Bluetooth**.

• **Shape Detection** using **OpenCV library** in **python**. Relevant codes are available at my Github [link](#).

• **Mobile Robot** controlled by a **smartphone application** via **Bluetooth** using **Arduino Nano** .Relevant codes are available at my Github [link](#).

• Developed a **prototype on Home Automation** using **Arduino Microcontroller** and **Wi-Fi module ESP8266** in which the basic electrical appliances of a house can be remotely controlled by an interface in a laptop over the internet.

Technology Skills

Programming Languages

- Python
- C
- C++
- Java
- Javascript
- HTML
- CSS
- Lua

Software Skills

- Android Studio
- MATLAB
- SAP HANA Cockpit
- Eclipse
- GNU Octave
- LTspice
- Sketch-Up

Microcontrollers and Computers used for Robotics Projects

- Arduino
- Raspberry Pi 3

Education

National Institute of Technology (NIT) Durgapur, India <ul style="list-style-type: none">•Graduate (Bachelor of Technology)•Electronics and Communication Engineering	August 2015-May 2019 Overall GPA: 9.25/10
St. Xavier's Institution, West Bengal, India Higher Secondary/+2 (Indian School Certificate), ISC Examination	2014 Percentage Obtained: 95.5%
St. Xavier's Institution, West Bengal, India Secondary (Indian Certificate of Secondary Education), ICSE Examination	2012 Percentage Obtained: 96.6%

Extracurricular Activities

- Painting, completed a course on Art
- Interested in music and can play the Synthesizer and Guitar
- Playing Chess

Position of Responsibility

- Was involved in raising funds for the Child Care Project of CCWH and RI and to help suffering children from cancer.
- Member of ROBO-CELL of Centre for Cognitive Activities(the official club of NIT, Durgapur) from 2015-2019.
- Senior Fest Coordinator in AAROHAN 2017,2018 & 2019 (Annual Techno-Management Fest of NIT,Durgapur).