



# SUBHADEEP PAUL

✉ subhadeep.paul@iitg.ac.in

## CONTACT

☎ +91 xxxx xxxx  
in spaul99  
✉ subhadeep99

## ACHIEVEMENTS

### GATE

**Electronics and Communication Engineering (EC)**  
Qualified in 2022 with 412 score in general category.

### University Rank Holder

Gold medal in M.Sc. Electronics from Vidyasagar University  
1st Rank Holder (Gold Medal)  
Sitaram Jindal Foundation (Gold Medals for excellence in education in highest marks in M.Sc. in Electronics)

### Career Edge - Knockdown the Lockdown

#### 7.0 out of 9 Band

A certificate issued by TCS iON, to prove English language proficiency with Communication, Presentation, and Soft Skills.

## WORK EXPERIENCE

### Junior Research Fellow

Sept 22 - Present

#### DA-IICT, Gandhinagar, Gujrat (India)

Working on a project titled "Prototyping Dog Jacket for Real-Time Rescue Operation Inspired by Robotics Technology". I have developed wheel robot which can control through Bluetooth or IR remote. Learn to interfacing of different microcontroller board like Arduino, ESP, xbees etc. Works with GPS and IMU sensors like MPU6050 and BNO055. Worked on interfacing camera, microphone & speaker interface and stabilizing the video feed with a stable platform made using IMU sensor.

Also worked with Kalman filter implementation with python. Accrue sound knowledge in communication protocols like MQTT, CoAP and worked on configuring local network for communication without internet in WAN. I have also worked with Quaternions and Euler angles. I made a python library for conversion of different parameters like Quaternions, Euler angles and Rotational matrix.

## EDUCATION

### M. Sc. - Electronics

2020 - 2022

#### Vidyasagar University - Medinipur, West Bengal, India

Passed with **9.08 CGPA. First Rank** holder in the University. Project work on Remote Health Monitoring system using IoT.

### B. Sc. (H) - Physics

2017 - 2020

#### Vidyasagar University - Medinipur, West Bengal, India

Passed with **7.63 CGPA.**

### Higher Secondary Examination - Science (PCMB)

May 2017

#### West Bengal Council of Higher Secondary Education

Passed with **80.2%.**

### Secondary Examination

May 2015

#### West Bengal Board Of Secondary Education

Passed with **82%.**

## SKILLS

Python	5+ yrs
Internet of Things	3+ yrs
Arduino & ESP	3+ yrs
C++	3+ yrs
Autodesk Eagle	2+ yrs
MATLAB/Simulink	2+ yrs
Gazebo	1+ yrs
ROS	1+ yrs
Autodesk Tinkercad	1+ yrs
VHDL	2+ yrs
Verilog	2+ yrs
LTSpice	2+ yrs
Linux	3+ yrs
C	3+ yrs

## PUBLICATIONS

**VLSI Implementation of Neural Network Based Emergent Behavior Model for Robot Control**  
IEEE International Conference on Distributed Computing, VLSI, Electrical Circuits and Robotics (DISCOVER) (ISBN:978-1-6654-8716-0, DOI: 10.1109/DISCOVER55800.2022.9974734)

Oct 2022

Status: Accepted and Published

**Design of a Cost-Effective Remote Health Monitoring System Using IoT**

March 2023

Spring Lecture Notes in Electrical Engineering (LNEE) (ISSN: 978-981-99-2709-8, DOI: 10.1007/978-981-99-2710-4\_11) Vol 1046, 2023

Status: Accepted and Published

## PROJECTS

**Autonomous Obstacle avoiding Rover**

2023

Tool: Arduino, Ultrasonic sensor, GPS, C++

Developed a 6-wheel rover with dynamic obstacle avoiding mechanism with self guidance with GPS

**Remote Health Monitoring System System using IoT**

2021 - 2022

Tool: Arduino, MAX30102, ESP8266, Python, C++, Java, HTML, MS-SQL

Created a system by which we can measure health data like heart rate and body temperature of a patient wirelessly using Arduino and MAX30102 Sensor without any human interaction. The health data are displayed in our developed website.

## WORKSHOPS & CONFERENCES

**ROBOFEST-GUJARAT 3.0**

2023

Participated in Rover category and qualified to the final stage.

**4th International Conference on Communication, Devices and Computing (ICCDC 2023)**

March 2023

Department of Electronics & Communication Engineering, Haldia Institute of Technology

Presented the paper titled "Design of a Cost-Effective Remote Health Monitoring System Using IoT"

**6th International Conference on Distributed Computing, VLSI, Electrical Circuits and Robotics (2022 DISCOVER)**

October 2022

IEEE Mangalore Sub-Section

Presented the paper titled "VLSI Implementation of Neural Network Based Emergent Behavior Model for Robot Control"

**Workshop on Science Communication for Early  
Career Researchers**  
CSIR-NCL, IISER-Pune and GUJCOST

**November 2022**

**National Webinar on Recent Trends in  
Communication**  
Department of Electronics, Vidyasagar University -  
Medinipur, West Bengal, India

**January 2022**

**Two day International webinar on "Machine Learning  
and Steganography"**  
Department of Computer Science and BCA,  
Kharagpur College

**August 2020**