Raghwendra Dey

raghwendra-dey.github.io
raghwendra-dey
raghwendra-dey

kumarraghav075@gmail.com
+91-7872419752

Tenughat No. 3, Bokaro Steel City,
Jharkhand, India - 829123

Academics

2018-2022	*B.Tech* in **Instrumentation Engg** with **Minor in Computer Science Engg, IIT Kharagpur**
GPA	**8.84**/10.0

Experience

May 21-July 21	**Software Development Intern : BNY Mellon** ⬀	**BNY Mellon, Pune**

- Worked on a dashboard, written in *angular and java (springboot)*, which provides Pentaho ETL software as a service (SAAS) to **70+ applications teams**, which run around **3000+ jobs per day**.
- Developed **api endpoints** for displaying job deployment details and server license information.
- Implemented **timer based auto refresh**, resulting in **performance boost in production by around 30%**.
- Also worked on adding various **UI features** like *dropdowns, dialog boxes, Stepper UI, paginator, etc.*

Projects ⬀

Software Team Member, Aerial Robotics Lab, Kharagpur (ARK) ⬀   **Guide: Prof. Somesh Kumar**
- Developed and Implemented various algorithms for efficient **localization and Path planning** of drones.
- Worked on **computer vision** techniques for effective **detection of shapes and features** in an image.
- Worked on **vision based controllers** for effective controlling of drones and **obstacle avoidance**.
- Deployed an **ORBSLAM2** based **indoor localisation** algorithm. Also worked on a **realtime 3D mapping and object detection** using stereo cameras.

Productivity Meter ⬀   ★ : 15, ⑂ : 24
- Owner and maintainer of **open source software "Productivity meter"**, a **javascript** based application that helps users to **moniter and reduce their time wastage** and increase productivity, **using Timers**.
- It also has features of a **ToDo List**, a counter to keep **count of problems solved** and **average solving time**.
- It has option to **save the data of the session** of user, in the browser. Thus, **users can start where they left**, making it the **ideal productivity tracking app**.

Covid-19 Detection using Chest X-Ray Images ⬀   **Guide: Prof. Debdoot Sheet**
- DL-based solution for covid-19 detection using chest X-Ray images.
- Trained a **transfer learning Resnet model** and a **Vanilla CNN model in Pytorch** for covid-19 prediction.

Awards & Achievements

- Part of the **GOLD Winning Team** of **IMAV-19 Indoors** ⬀ (*11th International Micro Air Vehicle Competition*), among 14 teams from **across 11 countries**, in *Madrid, Spain*. Also *featured in* **IIT KGP UG achievers** ⬀ *directory*.
- Successfully qualified **Regional Mathematics Olympiad (RMO) - 2016** and was among the **few selected students**(35 in number) in the **whole batch of 9th, 10th and 11th std** from State of Jharkhand, India.

Technical Skills

Languages	C/C++ • Java • Javascript • Typescript • Python • HTML • CSS • SQL • MATLAB
Packages/Tools	SpringBoot • Angular • Git • Pytorch • Keras • OpenCV • Sklearn • Numpy • Pandas • ROS

Relevant Coursework

Completed	*Algorithms (Theory+Lab) • Database Management System • Computer Architecture And Operating System • Data Analytics • Deep Learning Foundations and Applications • Discrete Structures • Probablity and stochastic processes • NLP • Image Processing • Deeplearning.ai specialization (Coursera)*

Positions Of Responsibity

- **Mentor, Kharagpur Winter of Code, 2020**
  Owner and Maintainer of Productivity Meter ⬀**,** Coordinated a group of **17 active contributors** working in parallel, during an **annual open source fest, KWoC** (Kharagpur winter of code), organised by **KOSS, IIT Kharagpur**.

- **Mentor, IEEE Robotics Winter Workshop, 2019**
  Conducted Winter Workshop as one of the **Lead Mentors**, attended by a group of **80+ First and Second years**, about various **computer vision and Path Planning algorithms**, their use and implementation in **OpenCV**.