

# BORA ARVIND REDDY | 16BT30031

BIOTECHNOLOGY & BIOCHEM. ENGG. (M.Tech Dual 5Y)



ГІЛ	<b>ICAT</b>	11 /IW

Year	Degree/Exam	Institute	CGPA/Marks
2021	M.TECH Dual Degree 5Y	IIT Kharagpur	7.36 / 10
2016	INTERMEDIATE PUBLIC EXAMINATIONS	SRI CHAITANYA JUNIOR COLLEGE	86%
2014	ICSE	ST ALOYSIUS ANGLO INDIAN HIGH SCHOOL	78.3%

## **SKILLS AND EXPERTISE**

Database: MySQL. Programming Languages: C,C++,Python,Java Softwares: Microsoft Office, Solidworks. Operating Platforms: Windows, Ubuntun. Other Skills: Ambidextrous. Languages known: English, Hindi, Telugu.

# **INTERNSHIPS AND PROJECTS**

1.Dr. Satyahari DeyScience and Technology Entrepreneurs Park (STEP)(IIT KHARAGPUR )| May 2018 - July 2018| Title: Design, construction, and automation of a cost-effective greenhouse for modern agriculture

Built a Prototype of Mobile GreenHouse incorporated sensors for continous monitoring and made a attempt to add Aquaphonics to the Mobile GreenHouse.

2.Dr. Riddhiman Dhar ( IIT KHARAGPUR ) | May 2019 - December 2020| Title:Co-evolution of flagellar proteins | Bachelor's Thesis Project

Building Phylogenetic Trees using Multiple Alignment using Fast Fourier Transformation.

3.Prof Mrinal Kumar Maiti|Summer Internship(IIT KHARAGPUR) |April 2020-August 2020|

Title: In-Silico Identification of functional Domains present in OsGLP 2 protien and Docking Analysis with Different

Predicted Models for the given Protein using Homology modelling softwares like SWISS-MODEL and I-TASSER. Performed Docking with different Auxins and analyzed docking results to find the affinity and Metal Ion Binding Sites.

## **TRAINING**

- Machine Learning Laboratory | Prof Adway mitra | September 2020 November 2020 Prediction of Daily Monsoon Rain Fall using both Linear Regression and Lasso regularized Linear Regression.
- •Implemented a bottom-up hierarchical clustering algorithm considering the Simple Jaccard Coefficient as notion of similarity.
- Hand Gesture Classification by converting image into binary image and applying SVM classification on extracted features.
  Multilayer Neural Network for classifying a given message to SPAM or HAM(non-spam) using Stochastic Gradient Descent.

## POSITIONS OF RESPONSIBILITY

## Department UG Representative of Biotechnology Department (IIT KHARAGPUR) [2019-2020]

- RepresentsStudents in the Departmentand disseminate information provided by the authorities.
- •Member of Undergraduate Council, under Dean UGS, to identify problems and raise issues for the welfare of the students.
- •Planning new initiatives to provide flexibility in the curriculum which will benefit 6000+undergraduate students.
- Conducted an Induction Programme for First-Year Student, and Assimilation Programme for Second Year Students.

# General Secretary, Bio EnGene, Institute Research Group (IIT KHARAGPUR) [2019-2020]

- Coordination of whole group activities.
- Overall management of research & General Activities.

## Kshitij AnnualTechno-ManagementFest at IIT Kharagpur[19TH-21ST JAN 2018] Position: SubHead

- •Led a team of 8 volunteers for conducting Maths Olympiad during Kshitij 2018.
- Responsible for conducting exams at 2 venues.

# Biotsav Fest at IIT Kharagpur[1ST-3RD NOV2019] Position: Core Team Head

•Organized first-ever National Students Fest for bio-allied students.

#### **AWARDS AND ACHIEVEMENTS**

- •Secured AIR 4700 in JEE ADVANCED (2016)
- Achieved 94.80 percentile score in JEE MAINS (2016)
   Awarded with a scholarship from NCC Cadet Welfare Society
- Awarded with scholarship under Prime Minister Scholarship Scheme .
- Secured'A'Grade in NCC B Certificate Examination

# **COURSEWORK INFORMATION**

Computer Science Courses: Programming and Data Structures\* | Algorithms | Machine Learning Foundations and applications\* Mathematics Courses: Probability and Statistics | Partial Differential Equations (PDE) | Mathematics I & II.

Others Courses: Economics | Engieering B-Plan Development | Environmental Studies | Science of living system | Chemical Process Calculations | Mass Transfer-

| IlDrug Design and Development | Cancer Biology. | Biotechnology Courses: Microbiology\* | Biochemistry \* | Cell & Molecular Biology\* | Bioinformatics\* | Plant Cell Tissue Culture\* | Immunology | Protein Engineering | Bioprocess Technology | Gene Expression | Neurophysiology | Transgenic Technology | Secondary Metabolism in Plants and Microbes | Immunotechnology | Introduction to System Biology | Enzyme Technology Laboratory | Biochemical Engineering Laboratory | Biochemical Engineering Laboratory | Secondary Metabolites | Analytical Biochemistry | Laboratory | Biochemical Engineering Laboratory | Secondary | Biochemical Engineering Laboratory | Biochemical Engineering | Biochemical Engineering Laboratory | Biochemical Engineering Laboratory

# **EXTRA CURRICULAR ACTIVITIES**

•NCC 3 Bengal Tech Air Squadron|National Cadet Corps (IIT KHARAGPUR )| [2016-2018]
Served as Cadet Sergeant for 1 year and Served as Cadet Corporal for 1 year in 3 Bengal Tech Air Squadron NCC (IIT Kharagpur ). Participated in Combined Annual Training Camp 2016.

Trained 150 cadets in 3 Bengal Tech Air Squadron NCC and volunteered for many social welfare activities like Blood Donation, Swachh Bharat Abhiyan.