

| EDUCATION | | | |
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| Degree/Certificate | Institute | CGPA / % | Year |
| M. Tech (Department of Management Sciences) | Indian Institute of Technology, Kanpur | - | 2024 - Present |
| B. Tech (Mechanical Engineering) | Jadavpur University | 8.53 CPI | 2015-19 |
| Higher Secondary Education (CBSE) | D.A.V Public School, Patna | 86.8 % | 2014 |
| Secondary Education (CBSE) | D.A.V Public School, Patna | 10 CPI | 2012 |
| WORK EXPERIENCE (3 YEARS) | | | |
| Jindal United Steel Limited, Jajpur | | | Jul'19-Aug'22 |
| <ul style="list-style-type: none"> Conducted data analysis to optimize production processes, reducing defects and improving efficiency. Led projects to minimize seam-line defects, reduce roll change time, and optimize slab length, leveraging data-driven insights. Managed furnace operations, ensuring safety, efficiency, and reducing fuel consumption through process optimization. Developed SOPs and quality plans, applying statistical process control (SPC) and root cause analysis to enhance product quality. Collaborated with cross-functional teams for strategic planning, driving continuous improvement and operation excellence. | | | |
| PROJECTS | | | |
| House Price Prediction for Ames, USA Machine Learning Regression (GitHub Link) (Self Project) | | | July 2024 |
| <i>Objective</i> | <ul style="list-style-type: none"> To predict the house prices in the city of Ames, USA using Machine Learning Algorithms. | | |
| <i>Approach</i> | <ul style="list-style-type: none"> The dataset comprises 80 independent features, and a dependent variable "SalePrice" with 2930 observations. Data Preprocessing: Conducted outlier treatment, feature engineering and handled missing values. Applied one-hot encoding and feature scaling. Models Used: Employed Linear Regression with Elastic Net regularization and Random Forest Regressor. Hyperparameter Tuning: Utilize GridSearchCV to optimize model hyperparameters and enhance predictive performance. Toolset: Scikit-learn, NumPy, Pandas, Matplotlib, Seaborn | | |
| <i>Result</i> | <ul style="list-style-type: none"> Achieved adjusted R² of 86.6% using Linear Regression with Elastic Net regularization and adjusted R² of 86.3 % using Random Forest Regressor. | | |
| Bank Personal Loan Modelling Machine Learning Classification (GitHub Link) (Self Project) | | | August 2024 |
| <i>Objective</i> | <ul style="list-style-type: none"> The goal is to predict the likelihood of a liability customer buying personal loans | | |
| <i>Approach</i> | <ul style="list-style-type: none"> Steps includes Exploratory Data Analysis, Data Preprocessing, Classification Models (Using Logistic Regression, Decision Tree , Random Forest , Gradient Boost algorithms to predict the likelihood of customers accepting personal loans) and Model Evaluation (Printing the confusion matrix to evaluate the performance of each model). Package used : Numpy, Panda, Matplotlib, Seaborn | | |
| <i>Result</i> | <ul style="list-style-type: none"> The best-performing model is selected based on its confusion matrix and overall accuracy in predicting the acceptance of personal loans by liability customers and I got that Logistic Regression model has highest accuracy equals to 98.40% | | |
| COURSEWORK & SKILLS *in progress | | | |
| <i>Relevant Courses</i> | Statistical Modelling for Business Analytics* Probability & Statistics * Operations Research for Management* Introduction to Computing* | | |
| <i>Skills</i> | Python ML Libraries: NumPy, Pandas, Matplotlib, Seaborn, Scikit-learn MySQL* MS Excel | | |
| <i>Soft Skills</i> | Decision Making Adaptability Team Management Communication Skills Leadership Teamwork | | |
| <i>Certifications</i> | <ul style="list-style-type: none"> Machine Learning from Basic to Advanced – Udemy Python NumPy Data Analysis for Data Scientist – Udemy The Pandas Bootcamp – Udemy Microsoft Excel – Udemy | | |
| ACHIEVEMENTS & EXTRACURRICULAR | | | |
| <ul style="list-style-type: none"> Secured AIR 482 in GATE 2024 Examination in Mechanical Engineering conducted by IISC Bangalore. Organised a technical event in TRAJECTORY (Mechanical Engineering Tech fest) at Jadavpur University . Completed a one-month vocational training at NTPC, gaining practical experience in power plant operations. | | | |