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| Examination | Institute | Specialisation | Year | CPI / % |
|-----------------|--|------------------------|------|---------|
| Post Graduation | IIT Bombay | Geoinformatics | 2018 | 7.48 |
| Graduation | Dr. Babasaheb Ambedkar Technological University, Lonere | Information Technology | 2015 | 5.76 |

AREAS OF INTEREST

Programming, Algorithm, Databases, Machine Learning, Deep Learning and Image Processing.

TECHNICAL SKILLS

- Programming Languages: Java, C, C++, Python.
- Database Management: MySQL, PostgreSQL, PostGIS, Oracle.
- Engineering Software: MATLAB, Eclipse, ArcGIS, QGIS, ENVI, ERDAS, LaTeX.
- Frameworks and Web Technologies: Django, AWS, HTML, CSS, XML, JavaScript.
- Other Technologies: Blockchain, Git, Amazon Alexa, Node.js.

MAJOR PROJECTS

M.Tech Project [May 2017 - July 2018]

Title: **Snowpack Characterization Using SAR Data**

Guide: *Guide: Prof. Gulab Singh* Keywords: *Satellite Data, Algorithm, PolSARpro, accuracy assessment*

- **ALOS-2, TerraSAR-X and TanDEM-X** satellite images were classified using the proposed Idea. From the proposed Idea we developed the **Algorithm**.
- Algorithm was applied over the ALOS-2, Sentinel-2, TerraSAR-X and TanDEM-X satellite images to get the **snow density, snow wetness and snow roughness**. For **preprocessing** we have used PolSARpro and Envi.
- For calculating the density, snow wetness and snow roughness we have used some **C programs** along with PolSARpro, **ERDAS IMAGINE** and Envi. On those results we have applied the thresholds which was provided in the Algorithm to get our final results/output.
- After getting the results we did the **accuracy assessment** on the results using PolSARpro and Envi.

B.Tech Project [August 2014 - June 2015]

Title: **Predicting NBA Player Performance Using Machine Learning Techniques**

Guide: *Guide: Prof. S. R. Hivre* Keywords: *Linear Regression, Support Vector Machine, ESPN Data*

- Data was collected from the **ESPN** website which had more than **2000** entries. The data was free and using that data the performance of the player were calculated using the **linear regression techniques**.
- **Front-end** was developed using **Java** and **Eclipse** integrated development environment, the **back-end** had **excel** database. Graphs were plotted performance vs year using the previous year data which also had the performance of a player in the given match.
- **Support Vector Machine** was implemented to compare the **Linear Regression result**. Data had all the records of the players from the college level to **NBA**. In the final results, we compared both the results (linear regression and Support Vector Machine).

MINOR PROJECTS AND SEMINARS

- **Inclusive Images Challenge by Google AI** [Bronze] [Kaggle] [2018]
 - We were provided with images by **Google** our task is to find the distribution of data all over the world according to culture and geographical context. In the next stage we need to find the then suggest the we need to find the distribution in more illustrative ways. We use the **TensorFlow, Pandas, Numpy etc.** to develop and train the model.
- **Axis Bank AI Challenge (Hackathon)** [Mumbai] [2018]
 - **Objective:** Automatic signature recognition using AI and Machine Learning.
 - We are developing the **UI** using the Django, Html, AWS and Android for Axis Bank. For detecting signature we are using **Tensorflow and Python** and for training we are using Kaggle datasets.

- **Mylan Hackathon** (*Hackathon*) [Bangalore] [October 2018]
 - **Objective:** Early cancer detection using AI and Blockchain
 - We developed the **UI** for patient, Clinic and Anganwadi Sevika using **AI Engine, Blockchain, Django and Python** for detecting cancer as quickly as possible.
- **Titanic: Machine Learning from Disaster** [Kaggle] [Ongoing]
 - We were provided with passengers detail like Category, Sex, Age etc. We need to find if that passenger will survive or not I applied **EDA, Feature Extraction** and finally train different model with accuracy and then I used ensembling and staking using **StackNet** to boost my score.
- **Djangothon** (*Hackathon*) [Bangalore] [2018]
 - **Objective:** Heath monitoring Application using Django and AI.
 - We developed the **django** and using the Python and AI for monitoring the health withing 24 hr of hackathon.
- **Bonafide Certificate Generation Using The Student Section Data** (*Mini Project*) [2014]
 - Developed code using the **HTML, JavaScript, and MySQL**, Data was taken from the **student section** of Dr.Babasaheb Ambedkar Technological University, Lonere. The code successfully produces the Bonafide certificate for the student and could have reduced the workload of the student section. But due to the security reasons and sensitive information, we were not able to produce this system for the whole institute thus we have implemented for our class.
- **Pond Perimeter Calculation Using The Matlab** (*Course Project*) [2016]
 - Matlab code was generated not using the inbuilt functions of the **Matlab**, the code uses basics of the dilation, erosion, closing opening and edge detection techniques. **GUI** created and presented in front of our class. The code had around **60-70%** accuracy.
- **Website Development For Ice and Glacier Microwave Lab** (*TA work*) [2017-2018]
 - Updated the **website** to get better **GUI** and Tried made it more **user-friendly** compare to previous one, that has all information about **Ph.D. and M-tech Students, publications by student and achievement by Cryosphere lab**.
- **Glacier Classification Using The ALOS-2 Data Using G4U Decomposition** (*Course Project*) [2017]
 - Glacier from Rasia is classified using the **G4U algorithm** compare the ablation and accumulation zone is detected and form with using different datasets. **PolSARpro** software was used for the classification and presented in front of the class.
- **Supervised Classification of Bhakra Forest Using ALOS-2 Data-Sets** (*Course Project*) [2017]
 - The **ALOS-2** image of forest located on **Haldwani, Uttarakhand** was classified using the **MLC, SAM, MDM**. The results show that Classification accuracy of the classifiers for the given data set is around **50-60 %**. That was due to limited testing samples used for accuracy assessment.
- **DInSAR Applications For Chamoli Earthquake Mapping** (*Course Project*) [2016]
 - Using **SRTM-DEM** images the **interferogram** was generated and after some filtering and enhance we got our final result then **geocoded** image was shown as final result and presented.
- **Scattering Models of Vegetation** (*Seminar*) [2017]
 - By taking the physical model as the representer we have generated a seminar with help of scattering model of vegetation by and summarized and presented in front of the class.

ACHIEVEMENTS

- Secured **96.30** percentile in GATE 2016 among **108495** students. [2016]
- **Certified Java and C/C++** programmer by **TechGig.com** [2018]
- **Certified Data Scientist, Analyst and Python** programmer by **IBM and TechGig.com** [2018]
- Secure **47** rank among more than 2000 Participant in **HDFC Machine Learning Challenge**[2018]
- Secure **65** rank in **Inclusive Images Challenge** by **Google AI** [Kaggle] [2018]
- Secure **132** rank (**top 3%**) in **Titanic: Machine Learning from Disaster** [Kaggle] [Present]
- **Participant** of **Axis Bank AI Challenge**(Round 2) [Ongoing]
- **Participants** of **Mylan Hackathon** Bangalore among **576** participants [Bangalore][October 2018]
- **Participants** of **Djangothon 2018** Bangalore among more than **2000** participants [November 2018]
- Secured **86** marks out of **100** in Maharashtra State Ceritfcate In Information Technology(**MS-CIT**) [2008]

EXPERIENCE

Advanced Risk Analytics Private Limited, Pune
Software Engineer

[July 2018 - September 2018]

- **Software Development:** Developed an application for an auto-email reply using SMTP server and **S22.IMAP**, for getting Lat-Long from Google API using Excel packages, Google API, C sharp programming, and packages like **EPPlus, FileInfo, StreamReader, and ExcelPackage**.
- Created the datasets for the **Rifine-Net** model using QGIS and tested the results accuracy.
- **Testing:** Tested the code generated by using the **Rifine-Net** model using the QGIS and Google earth.