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About me:

I am currently enhancing my skills through a 6-month data analytics certification at Tops Technology. As a passionate mathematician with a Master's in Applied Mathematics from Gujarat University and a Bachelor's degree in Mathematics from C. U. Shah University, I possess strong analytical skills and a commitment to continuous learning. I am eager to contribute to impactful projects in applied mathematics and data analytics.

Education:

- Master of Science in Applied Mathematics at Gujarat University, Ahmedabad in 2022-2024 with aggregate of 71.58%.
- Bachelor of Science in Mathematics at C. U. Shah University, Surendranagar in 2019-2022 with aggregate of 7.88 CGPA and Gold Medal.
- H.S.C from Gujarat Secondary & Higher Secondary Education Board, in 2019 with aggregate of 58%.
- S.S.C from Gujarat Secondary & Higher Secondary Education Board, in 2017 with aggregate of 70%.

Academic Projects:

Food Safety Analysis (May 2024):

- Downloaded a comprehensive food safety dataset from Kaggle.
- Utilized data cleaning techniques to handle missing values, outliers, and inconsistencies to ensure data quality.
- Leveraged Microsoft Excel to perform detailed data analysis.
- Created informative visualizations, such as charts and graphs, to identify trends, patterns, and key insights related to food safety.

YOLOv5 - Based Smart Traffic Management: Real-Time Vehicle Density Estimation and Adaptive Light Control (Sem 4 in M.Sc.):

- Developed a real-time vehicle density prediction and adaptive light regulation system using YOLOv5 for precise traffic management.
- Utilized advanced AI algorithms for accurate vehicle tracking and dynamic traffic light adjustment to optimize traffic flow.
- Leveraged YOLOv5's strong detection capabilities for high-accuracy monitoring in diverse traffic conditions, enabling continuous real-time adjustments.
- Aimed to reduce traffic congestion, enhance transportation efficiency, and combat pollution, promoting urban sustainability and better quality of life.

A Study of Comparing BJP and INC: For Understanding Voter Perception and Preference toward Gujarat (Sem 3 in M.Sc.):

- Conducted a comparative study on voter perception and preference between BJP and INC in Gujarat.
- Collected data through a close-ended questionnaire, ensuring a representative sample.
- Analysed data using SPSS and applied discriminant analysis to identify key differentiators between party supporters.
- Provided actionable insights into voter behaviour and the political landscape dynamics.

Certifications:

Pursuing at Tops Technology's 6-month certification course in data analytics (Jan 2024 - Present)

- Focusing on MySQL, Advanced Excel, Statistics, and Power BI.
- Developing practical skills in data management, statistical analysis, and data visualization to enhance data-driven decision-making capabilities.

National Conference on Advancements in Mathematics Research and Development-2024 Pilvai, Gujarat (Feb, 2024).

Poster Topic: “Hybrid Encryption with RSA and AES in Python: Securing Communication Through Public and Symmetric Key Cryptography”

- This poster reviews security issues in information transmission and explores the benefits of hybrid encryption algorithms, combining symmetric and asymmetric encryption to enhance security.
- It analyses various algorithm characteristics and typical cases, demonstrating how hybrid encryption improves transmission security without introducing additional problems.

NAHEP - CAAST Anand Agricultural University, Anand (Sep, 2023).

21 Days Training Programme on “Fostering Foundations: A Journey into Data Analytics through R and Python ”

- Participated in a 21-day training program on data analytics through NAHEP - CAAST at Anand Agricultural University, focusing on Python and R-Studio.
- Gained practical experience in data analysis and statistical modelling using Python and R, enhancing analytical and programming skills.

AARYA-2023 National Conference on Applied Mathematics Sciences Organized by Gujarat University, Ahmedabad, Gujarat (March, 2023).

Poster Topic: “Forecasting Crime Rate of Delhi by Holt’s Method”

- This poster delves into forecasting the crime rate of Delhi using Holt's Exponential Smoothing method, addressing the significant issue of crime prediction in a populous city.
- Utilizing historical data and present patterns, the poster demonstrates how Holt's approach aids in projecting future crime rates, contributing to efforts in preventing and addressing criminal activities in Delhi.

Technical Skills:

- **Programming Languages:** Python and R-Studio
- **Database Management:** MySQL and Excel
- **Statistical Analysis:** SPSS
- **Data Visualization Tool:** Power BI

Personality Traits:

- Self Motivated
- Passionate
- Creative
- Insightful