Venkata Sai Bharadwaj Velamakanni

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PROFESSIONAL SUMMARY

Analytics Engineer with 3 years designing scalable ETL pipelines and self-service analytics to drive business outcomes. Skilled in AWS, Databricks, Spark, Python, SQL, Airflow, Azure Data Factory, Tableau, & Power BI.

EXPERIENCE

Senior Data Engineer   June 2024 – Present
BulkMagic   *Jersey City, NJ*

- Developed a real-time pricing engine pipeline to adjust 100K+ SKUs daily by ingesting competitor and promotional data via Spark Streaming into PostgreSQL boosting average order margin by 10%.
- Implemented a Valkey Redis caching layer for competitor pricing lookups in our Python services—reducing external API calls by 40% and cutting latency on price queries by 35%.
- Built fallback mechanisms for pricing and data transformations using Databricks notebooks and PySpark ensuring 99.5% pipeline uptime and preventing outages during data source failures.
- Orchestrated weekly competitor pricing and data-refresh workflows with Prefect designing DAGs in Python to automate job scheduling and error handling, which improved pipeline reliability by 30%.
- Developed executive Tableau dashboards powered by FP-Growth (NetworkX, Apriori) to surface $100K+ cross-sell opportunities from market-basket analysis enabling the sales team to target high-value bundles.
- Led the creation of a GenAI image-transformation bot microservice in Python (FastAPI) and built Prometheus/Grafana monitoring dashboards reducing manual image-processing effort by 80% and maintaining 99.9% service availability.

Data Analyst   Feb 2022 – Dec 2022
Vistex, Inc   *Hyderabad, India*

- Streamlined SAP SD rebate process for 2 enterprise clients by configuring automated rebate schedules and building Python scripts cutting manual reconciliation time by 30% and ensuring 100% contract compliance.
- Developed real-time SSRS dashboards by querying SAP HANA and SQL Server, designing drill-down reports, and scheduling automated data refreshes reducing payroll errors by 20% and saving HR teams over 10 hrs per week.
- Optimized GTMS analytics pipelines by refactoring PySpark jobs in Databricks and adding Python validation checks improving data accuracy by 35% and achieving a 90% demo success rate that preserved $4.2M in recurring revenue.

Data Analyst   Jan 2021 – Sept 2021
Suven Consultants   *Hyderabad, India*

- Created a Python/SQL segmentation model using K-means and RFM analysis on 100K+ transaction records, leveraged scikit-learn and SQL driving a 25% lift in ad CTR and $0.5M incremental quarterly revenue.
- Developed interactive Tableau dashboards for a $0.2M marketing campaign, implemented calculated ROAS/CPA fields and dynamic drill-down filters with scheduled data refresh, reducing budget overruns by 15%.
- Partnered with the marketing team to design and analyze A/B experiments, refine business logic, and translate KPI requirements into dashboard features-enabling rapid, data-driven campaign optimizations and improved overall performance.

PROJECTS

End-to-End Machine Learning Pipeline for Fraud Detection

- Built an end-to-end real-time fraud detection pipeline by ingesting 1M+ daily transactions from Kafka into PySpark jobs on Databricks, containerizing with Docker and orchestrating on AWS EKS via GitHub Actions, and deploying TensorFlow models as Amazon SageMaker endpoints with autoscaling, accelerating deployments by 70%.

Alteryx Datathon − OCTA Transportation Insights

- Built end-to-end Alteryx workflows with Python formulas to cleanse and transform 200K+ transit records, then delivered Tableau dashboards highlighting route optimization insights under tight deadlines.

SKILLS

Technical Skills: Python, SQL, R, GenAI (LLMs, OpenAI, Gemini), Apache Spark, Kafka, Databricks, Airflow, AWS (S3, EC2, Glue), Azure Data Factory, Snowflake, Docker, Kubernetes, Alteryx, Tableau, GitHub Actions CI/CD, FastAPI, Advanced Excel (pivot tables, macros, VLOOKUP)
Software Engineering and Management: Data Modeling, Git, SDLC (Agile, SCRUM), Jira, Slack, Clickup

EDUCATION

California State University, Fullerton   Fullerton, CA
Masters in Information Systems, Concentration in Business Analytics–GPA-3.79   *Jan 2023 – Dec 2024*

- **Relevant Coursework:** Statistical Analysis; Decision Models for Business & Economics; Business Databases & Data Transformation; Data Mining.

Certifications

AWS Certified Data Engineer - Associate Certification, Google Project Management Professional Certificate