

Jacob Krol

ADDITIONAL RESOURCES

LinkedIn: /in/jakekrol

Github: /jkrol6675

Livonia, MI, 48150

Phone: (586) 713-9800

Email: jacobkrol66@gmail.com

SUMMARY

A data-driven professional with a background in data engineering, data analytics, and biotechnology. I am seeking a role in data engineering where I can make a large impact through my work. I am eager to apply my analytic and process optimization skillset to improve operational efficiency and contribute to data-driven decision-making.

EXPERIENCE

Simpluris, Oviedo, FL (Remote)— *Data Analyst I / II* July 2024 - Current

- Engineered scalable data solutions in collaboration with cross-functional teams to support business expansion initiatives.
- Evaluate various deployment strategies for on-premise large language models (LLMs) to automate high-volume production workflows.
- Architected, built, and maintained data pipelines within Microsoft Fabric to enable efficient data modeling and reporting.
- Developed production-grade SQL queries and stored procedures to support critical business functions for a multi-terabyte relational database.
- Automated and simplified standard production processes using Python scripts and user-friendly Jupyter Notebooks.
- Designed, built, and maintained Power BI and SSRS reports to help inform key stakeholders in support of operational efficiency.
- Implemented SQL-based transformations within Microsoft Fabric pipelines to enable resilient ingestion of critical external vendor data.

Daicel Arbor Biosciences, Ann Arbor, MI— *Research Associate/Scientist*

August 2020 - June 2024

- Designed and maintained ETL pipelines in order to streamline statistical analysis and visualization of experimental data and efficiently convey results to stakeholders.
- Utilized Lean Six Sigma concepts to improve data collection and handling practices within the organization.
- Performed and coordinated experimentation with international teams to upscale and standardize manufacturing processes.
- Designed, tested, documented, and implemented new production processes.

SKILLS & EXPERTISE

- Python
- SQL
- BI Tools (Power BI, Tableau, SSRS)
- Microsoft Fabric
- Pandas, PySpark, Scikit-Learn
- Data processing pipelines
- Batch processing
- Rust
- Microsoft Office
- Written and Spoken Communication
- Stakeholder Presentations
- Protein sciences
- Synthetic biology
- Fast and enthusiastic learner

EDUCATION

Bachelor of Science (B.Sc.) - Oakland University, Rochester, MI

September 2016 - December 2019

CERTIFICATES

Advanced Data Analytics Certificate - Coursera

March 2024

Certificate in Biotechnology Engineering with Distinction - University of Southern California, Los Angeles, CA

June 2023

PUBLICATIONS

Krol, J. and Tawil, B. "Cell-based meat: farming from a fermenter." *Journal of Applied Biotechnology and Bioengineering* 10.1 (2023): 17-22.
<https://doi.org/10.15406/jabb.2023.10.00322>