Lorenzo Mondragon

Software Engineer

📱 *719-821-7117*
✉️ *lorenzo.mondragon@icloud.com*
🌐 *mondragon.io*
in */lorenzo-mondragon/*
🐙 */Ldragon27*

Professional Summary

Software Engineer with 3+ years of experience specializing in building scalable ETL pipelines and data products to drive strategic decisions. Proven ability to integrate data from diverse sources, including REST APIs and GitHub, to deliver key insights. Proficient in Python, SQL, and AWS, with hands-on experience in GPU-acceleration using NVIDIA RAPIDS to enhance machine learning workflows.

Skills

Languages	Python, SQL, C#
Platforms & DBs	AWS (EC2, S3, Lambda), Snowflake, Power BI
Data Engineering	ETL Pipelines, Data Warehousing, Data Modeling, REST APIs
Developer Tools	Git, Docker, CI/CD, Jupyter, ASP.NET
Libraries	NVIDIA RAPIDS, PyTorch, Scikit-learn, Pandas, Polars, OpenCV

Experience

Mar 2024 – Present — **Software Engineer - Analytics**, *Colorado State University*
- Engineered and deployed scalable Python and SQL ETL pipelines in Snowflake, processing over 100GB of data weekly to support university analytics and strategic initiatives.
- Developed and open-sourced a traffic analytics system using OpenCV and Python, providing data that empowered stakeholders to make informed infrastructure decisions.
- Automated data extraction and statistical analysis workflows using SQL and Python, reducing manual effort and delivering actionable recommendations to leadership.

Apr 2022 – Feb 2024 — **Backend Developer**, *Colorado State University*
- Engineered and maintained performant C# backend systems and RESTful APIs using ASP.NET for custom web applications, ensuring efficient and reliable data handling for end-users.

May 2023 – Aug 2023 — **Solutions Architect Intern**, *Amazon Web Services (AWS)*
- Designed and documented scalable infrastructure for AI applications using core AWS services, including EC2, S3, and databases.
- Authored a comprehensive tutorial for the TwinGraph AWS framework, detailing its use in simulation and predictive modeling for complex AI experiments.

Projects & Awards

Nov 2024 — **NVIDIA AI Hackathon @ ODSC – 3rd Place Winner**, *Featured in NVIDIA Technical Blog*
- **Achievement:** Secured 3rd place among numerous teams and was featured in an official **NVIDIA Technical Blog post**.
- **Impact:** Leveraged NVIDIA RAPIDS (cuDF, cuML) to accelerate Polars/pandas machine learning workflows, achieving a significant performance increase through GPU acceleration.

June 2025 – Present — **NVIDIA Hackathon: Data Filtering for Edge LMs**, *Personal Project*
- **Focus:** Developing novel data filtering techniques for edge Language Models (LMs) using DoRA to enhance on-device task performance for robotics, roleplay, and RAG applications.

2023 — **OpenAI ChatGPT API Integration (C#/Blazor)**, *Personal Project*
- **Description:** Built a C#/Blazor application integrating the ChatGPT API to explore advanced prompt engineering techniques and LLM-powered chat functionalities. View on **GitHub**.

Education

Expected 2026 — **B.S. in Computer Science**, *Colorado State University*, Fort Collins, CO

May 2021 — **A.G.S. in Computer Science**, *Community College of Denver*, Denver, CO

Certifications

NVIDIA: Getting Started with Deep Learning • TDWI: Dimensional Modeling Certificate