

JACLYN FIELD MATHAI

Senior Data Science Leader | Building ML-Powered Products | Blending Creative Innovation and Strategic Design

Greater Washington DC Area | jacburge@gmail.com | [linkedin.com/in/jacburge](https://www.linkedin.com/in/jacburge) | jaclynfieldmath.ai

SUMMARY

Proven leader skilled at turning complex data and bold ideas into products that save time and unlock revenue. Over the last decade, scaled ML-driven platforms and frameworks automating 60+ hours of monthly forecasting in support of hundreds of millions in ad revenue, migrated legacy stacks to cloud pipelines, and led cross-functional teams converting ambiguity into action. Equal parts strategist and builder, ensuring insights land with decision-makers, not in dashboards no one opens. Helping organizations tell sharper stories with their data they can act on, whether mentoring talent, speaking at industry conferences, or shipping user-first tools. From GenAI-powered applications to traditional statistics-driven frameworks, marrying science with the art of building applications people love.

EXPERIENCE

The Walt Disney Company

Manager, Data Science | Disney Entertainment - Research, Insights & Analytics | Remote | May 2023 – Present

- Expanded our charter from optimizing \$30 million in ad revenue across 2 brands to billions in ad revenue across Disney's suite of digital and linear media brands (ESPN, ABC, Disney Channel, NatGeo, etc.).
- Spearheaded the design and launch of a self-service ML-powered forecasting platform, transforming manual workflows into automated, scalable pipelines and intuitive UX, reducing stakeholder efforts by 60+ hours per cycle.
- Co-led a cross-functional initiative of 12 software engineers, data scientists, and BI engineers to deliver the first GenAI application in our org, providing producers and executives with contextual analysis of min-by-min viewership of programs across competitors.
- Founded a knowledge sharing initiative across the org for data science and machine learning, covering topics from K-means cluster analysis to GenAI, LLMs, GitHub Copilot, and automating pipelines with Snowflake Tasks.
- Partnered with executive leadership, engineering, governance, sales, finance, and research stakeholders to ensure analytics solutions and roadmaps aligned with strategic goals, increasing trust and adoption across business units.

Manager, Data Science | Disney Media & Entertainment Distribution | Seattle, WA | Oct 2020 – May 2023

- Founded and led a high-performing 4 person data science engineering team to deliver modern data solutions supporting content performance insights and forecasting.
- Negotiated budget and strategy for cloud modernization, evolving our pipelines from local SQL and Python files requiring manual runs with RAM limitations, to automating via GitLab Runner, Docker, and AWS EC2, saving 8+ hours a week of compute time and resources.
- Directed foundational ad server and data warehouse migrations (e.g. SAS to Hive to Snowflake), ensuring continuity, improved scalability, and technical resilience.

Data Product Integration Manager | Disney Decision Science & Integration | Nov 2018 – Sep 2020 | Seattle, WA

- Took on expanded leadership responsibilities, coordinating cross-team initiatives and supporting new analytics product feature launches across multiple business units.
- Built a Django web application to deliver a user-friendly, scalable tool for master data management across multiple sources and custom feature engineering, saving countless hours from prior human review in local Excel files.
- Migrated forecasting processes from legacy SAS workflows to a more scalable architecture with SQL and Python scripts, reducing model turnaround times from 2 weeks to 2 hours.

Data Scientist | Disney Decision Science & Integration | Aug 2016 - Nov 2018 | Seattle, WA

- Developed and maintained predictive models, emphasizing usability, data cleanliness, and long-term operational efficiency for Disney's digital ad ecosystem.
- Championed the use of Tableau, helping stakeholders migrate from heavily manual processes in Excel to thoughtfully designed user interfaces and visualizations, driving innovation in forecasting with clear, actionable narratives.

Liberty Mutual Insurance

Senior Associate Data Analyst | Jan 2016 – Aug 2016 | Seattle, WA

- Designed and operationalized predictive models personalizing the online quoting experience, doubling the accuracy of default systems.

Associate Data Analyst | Jul 2015 – Jan 2016 | Seattle, WA

- Proposed and implemented analytical solutions driving \$8M in cost savings and \$4M in premium for Michigan.

UC Berkeley

Student Instructor & Head of edX Content Development | Jan 2013 – May 2015 | Berkeley, CA

- Taught lab sessions and discussions for 80+ students with *The Beauty and Joy of Computing* (CS 10), an introductory course bringing computer science to non-majors through creative, visual programming concepts.
- Guided curriculum development for the edX version of BJC, helping expand global access to computing education and contributing to the foundation of AP Computer Science Principles.

EDUCATION

University of Maryland, College Park | Executive Master of Business Administration (STEM-Designated) — *Expected May 2026*

University of California, Berkeley | B.A., Cognitive Science — *Graduated May 2015*

CERTIFICATIONS

- **Prediction and Machine Learning** — BerkeleyX (edX), *Issued Jul 2019*
- **Professional Certificate in Foundations of Data Science** — BerkeleyX (edX), *Issued Jul 2019*
- **Computational Thinking with Python** — BerkeleyX (edX), *Issued Jun 2019*
- **Inferential Thinking by Resampling** — BerkeleyX (edX), *Issued Jun 2019*
- **Programming with Python for Data Science (DAT210x)** — Microsoft (edX), *Issued Feb 2018*
- **Machine Learning for Data Science and Analytics** — ColumbiaX (edX), *Issued Mar 2016*

SKILLS

Machine Learning & Predictive Analytics (XGBoost, GLM, Prophet, K-Means) | **Programming** (Python, SQL, R, SAS)

Data Engineering (Snowflake, Liquibase, ETL pipelines) | **Cloud & DevOps** (AWS, Jenkins, Docker, GitLab CI/CD)

Web Application Development (Django, Flask, React, REST APIs) | **Visualization** (Tableau)

Leadership & Strategic Skills (Team Building, Cross-Functional Leadership, Agile Methods, Product Strategy & Roadmapping, Stakeholder Communication & Influence, User-Centered Design, Mentorship)

SPEAKING ENGAGEMENTS & THOUGHT LEADERSHIP

- **Industry Expert Interviewee** — Education Strategy Group / NYC Public Schools, 2025 | *Invited as an industry leader to consult on AI and workforce readiness for public education initiatives.*
- **Guest Speaker on Data Science Career Journey** — Stanton University, 2022 | *Invited to speak to data science students about my personal career journey into data science with an emphasis on creativity and storytelling.*
- **Conference Speaker** — Disney Data & Analytics Conference, 2019 | *“And the Emmy Goes To... Behind the Scenes of Digital Television Forecasting” on feature engineering, machine learning, and business integration best practices.*
- **DataCamp Instructor** — Datacamp, 2018 | *Designed curriculum reaching 2500+ students with a real-world clustering analysis project and visualization, emphasizing effective storytelling with data.*

AWARDS & HONORS

- **Chinese Martial Arts Gold Medalist** — CMAT, ICMAC, Can-Am Competitions, 2015–2019 | *Multiple gold and silver medals in advanced Tai Chi and Baguazhang forms at national and international tournaments.*
- **Disney Excellence Award** — The Walt Disney Company, 2017 | *Recognized for proactive client problem-solving, forecasting process optimization, and innovation in data visualization.*
- **Outstanding Graduate Student Instructor Award** — UC Berkeley, 2015 | *Top 9% of instructors across campus for excellence in undergraduate teaching.*
- **Regents' & Chancellor's Scholarship** — UC Berkeley, 2011–2015 | *Prestigious merit scholarship awarded to top 5% of entering undergraduates.*