Jared Brooks, PhD

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WORK EXPERIENCE

Prove - A leading digital identity and Authentication Solutions provider

Jan. 2021 – Present

Senior Data Scientist | June 2024 - Present

Denver, CO

- Architected and deployed International TrustScore ML model from concept to production, establishing a new model microservice framework that accelerated deployment cycles by 200% and expanded product capabilities globally
- Overhauled legacy Assurance Level (AL) verification system by integrating ML enhancements that increased AL=3 accuracy to 99%, directly strengthening the company's flagship Verified Users product
- Engineered automated monitoring dashboards in **Looker** that track 10+ critical model features across 40+ international clients, enabling proactive identification of performance issues and ensuring consistent service quality for high-value authentication services
- Led software engineering advancement initiatives, including developing the team's core **Python repository** with pytest and **GitLab CICD** pipelines that reduced scripting overhead by 70%, and collaborating with Platform Engineering to implement LazerDome, a centralized **AWS** environment that streamlined secure access and enhanced team collaboration

Data Scientist | October 2021 – June 2024

Denver, CO

- Designed and built the Assurance Level identity verification system from concept to production, creating a
 session-based transaction framework that achieved 90% accuracy at 20% population coverage, meeting
 critical product requirements
- Established comprehensive **model governance** protocols for **tier 1 banking** clients, ensuring regulatory compliance for identity verification systems while maintaining technical documentation and validation frameworks required by financial institutions
- Engineered and deployed over a dozen fraud detection signals and mechanisms using Python and SQL, balancing increased fraud detection capabilities with optimized false positive rates across multiple identity verification products

Data Analyst | January 2021 — October 2021

Denver, CO

- Led analysis for 20+ new client data studies, leveraging **Python** and **machine learning**.
- Resolved 12+ client issues through **SQL** diagnostics and client consultations.
- Developed new products by evaluating 6+ data sources for verification and fraud detection.

EDUCATION

UC Santa Barbara

Sept, 2017

PhD and Masters Degree in Theoretical Physics

Santa Barbara, CA

University of Southern California

May, 2011

BSc in Physics, Minor in Mathematics

Los Angeles, CA

SKILLS, TECHNOLOGIES, & INTERESTS

- **Skills:** Machine Learning; Data Analysis; Python; SQL; Model Governance; APIs; Mentorship; Statistics; R&D Collaboration; Fraud Detection; Feature Engineering
- Technologies: Git; AWS; Sagemaker; Looker
- Interests: Musical Performance; Weightlifting; Backpacking; Archery; Cooking