

# ELDIN SAHBAZ

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## SUMMARY

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Program Manager and Data Scientist delivering **\$1.54B** with **8+ years of proven experience**. Established and scaled enterprise-level Digital Transformations across the Petroleum and Semiconductor industries. Delivered **core engineering AI solutions** for British Petroleum and enabled Data Science's **69% AI market share** within BP US Onshore Upstream O&G. Produced **\$500M+** via a **patent-pending** computational chemistry solution for INFICON's Semiconductor business.

## PROFESSIONAL EXPERIENCE

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### Program Manager

*British Petroleum (BP)*

November 2023 – Present

*Denver, Colorado*

- Acquired **52% of Exploration & Development's AI/ML market** and enabled the team's **69% AI/ML market share** across the organization — spearheading **in-house AI development & Digital Transformation strategy**.
- Delivered **100% of the Q2/Q3 Agile Features** in Data Science, Generative AI, and Machine Learning Engineering.
- Architected key partnerships with the **Subsurface Technology Team** and the **Head of Performance Optimization**.
- Orchestrated internal forums with Digital Transformation Leaders across **Saudi Aramco, ADNOC**, and the **U.S. DOE**.

### Product Owner

*British Petroleum (BP)*

November 2023 – Present

*Denver, Colorado*

- Realized **\$4MM in annual cost reductions** — prioritizing developer resources to build and deploy **ML Sand Flowback**.
- Coordinated stakeholder timelines and prioritized developer resources — **launching ML Drilling AFE Cost Prediction**.
- Productionalized **Long-term Production Risk** for **Subsurface Technology's Reservoir Engineering** via Streamlit.
- Coordinated between **BP** and the **US Department of Energy** on integrating technology for produced water optimization.
- Oversaw the Azure to AWS cloud migration for the **Salt Water Disposal** and **Productivity Index** Power BI reports.

### Senior Data Scientist

*British Petroleum (BP)*

February 2023 – Present

*Denver, Colorado*

- Generated **\$977MM** for Permian with a **\$700MM NPV** well development plan and **\$277MM** Drilling & Completions cost reductions by productionalizing Techlog **AI Lithofacies** — enabling well prospecting and fluid mobility assessments.
- Delivered **\$540MM NPV** for Permian Reservoir Engineering — deploying **AI Completions Optimization** in Streamlit.
- Drove **\$20MM NPV** for Eagle Ford Reservoir Engineering — launching **ML Refracturing Production Forecasting**.
- Collaborated with **Subsurface Technology** to address Eagle Ford wellbore instability — predicting **\$60MM cost savings**.
- Interfaced with the **Head of Performance Optimization** on engineered completions — estimating a **10% – 20% uplift**.

### Data Scientist

*INFICON*

June 2018 – February 2023

*Syracuse, New York*

- Directed **\$500M+** in forecasted **annual cost reductions** and **provisioned Neural Processing Units** to support **patent-pending** Automated Sensor Calibration advances directly on next-generation semiconductor sensor technologies.
- Produced a **21% enhancement** in Mass Spec signal fidelity and designed A/B Quality Control tests for **all Mass Specs**.
- Achieved **50% coverage** for chemical detection & monitoring systems — executing A/B tests with simulated GC-MS data.
- Achieved a **95% increase** in density estimation accuracy — creating the Bijective Neural Architecture via PyTorch.

### Research Assistant

*Syracuse University | Data Lab*

June 2017 – August 2017

*Syracuse, New York*

- Modeled social media engagement metrics, formulating repeated measures experiments, utilizing Scikit-learn and NLTK.

### Technology Analyst

*JPMorgan Chase & Co.*

June 2016 – August 2016

*Jersey City, New Jersey*

- Developed project business cases alongside senior team members and deployed code to **live internal JPMC applications**.

### Software Engineer

*Self-employed*

June 2015 – September 2015

*Syracuse, New York*

- Engineered information retrieval systems as a subcontractor for **British Petroleum (BP)** and a **County Government**.

**Undergraduate Research Assistant**  
*Syracuse University | Hosein Research Group*

August 2014 – May 2015  
*Syracuse, New York*

- Awarded the **Dean's Leadership Grant** supporting simulation studies quantifying energy loss across solar cell surfaces.

## PATENTS & PUBLICATIONS

**Method of Auto Tuning One or More Sensors**  
*USPTO Application 18/686,753*

August 2023  
*Patent Pending*

## INVITED PRESENTATIONS

**Neural Attention for Seismic Data Processing**  
*BP Geophysics R&D Seminar*

July 2024

**Improving Mass Spectrometry Signal Fidelity**  
*INFICON Data Analytics Summit*

November 2020

## PROFESSIONAL DEVELOPMENT

**Core Analysis Workshop**  
*UT Austin Bureau of Economic Geology*

April 2024/December 2023

**Advanced Power BI — Power Query and DAX**  
*Havens Consulting*

April 2023

**Power BI — Reporting and Model Building**  
*Havens Consulting*

February 2023

## HONORS & AWARDS

**Graduate Merit Scholarship**  
*Syracuse University*

August 2017 – May 2018

**Summa Cum Laude**  
*Syracuse University*

May 2017

**The Warren Semon Prize**  
*Syracuse University*

May 2017

**Dean's Leadership Grant**  
*Syracuse University*

September 2014

**Dean's List**  
*Syracuse University*

August 2014 – May 2017

**The Founders' Scholarship**  
*Syracuse University*

August 2014 – May 2017

## EDUCATION

**Syracuse University**  
*Master of Science | Computer Science*

May 2018

**Syracuse University**  
*Bachelor of Science | Computer Science*

May 2017  
*Summa Cum Laude*

## SKILLS & COMPETENCIES

**Business** Strategy, Business Development, Stakeholder Management, Change Management, Agile, OKRs, CRISP-DM  
**Technical** Artificial Intelligence, Deep Learning, Transfer Learning, Machine Learning, Linear & Nonlinear Modeling, Numerical Optimization, Regression, Classification, Statistics, Probability, Monte Carlo, Time Series, Statistical Signal Processing, Data Collection, Data Preprocessing, Data Analysis, Data Wrangling, Data Mining  
**Tools** Amazon SageMaker, Linux, Git, Python, R, PyTorch, Scikit-learn, Pandas, SciPy, Statsmodels, NumPy, NLTK, Gensim, OpenCV, Seaborn, Matplotlib, SLB Techlog, Atlassian Jira, Azure DevOps