

# ELDIN SAHBAZ

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## SUMMARY

Program Manager and Data Scientist delivering **\$1B+** with **8 years of proven experience**. Established and scaled enterprise-level Digital Transformations across the Petroleum and Semiconductor industries. Personally **realized \$997MM** for British Petroleum and enabled Data Science's **69% AI market share** within BP US Onshore Upstream O&G (BPX). Produced **\$500M+** via a **patent-pending** computational chemistry solution for INFICON's Semiconductor business.

## PROFESSIONAL EXPERIENCE

### 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 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 Electrofacies** — enabling well prospecting and fluid mobility assessments.
- Drove **\$20MM NPV** for Eagle Ford Reservoir Engineering — launching **ML Refracturing Production Forecasting**.
- Delivered **\$540MM NPV** for Permian Reservoir Engineering — deploying **Permian AI Completions Optimization**.
- Collaborated with **Subsurface Technology** to address Eagle Ford wellbore instability — projecting a **\$60MM** cost savings.

### 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.
- Led a **21% enhancement** in Mass Spec signal fidelity (SciPy.optimize/Statsmodels), designed A/B Quality Control tests (SciPy.stats/Nolds) for **all Mass Spec sensors**, and documented mathematical foundations for proprietary algorithms.
- Established **50% coverage** across chemical detection and monitoring systems — designing KPIs and executing A/B simulation tests via synthetic GC-MS data generated using PySwarms and SciPy.optimize, SciPy.stats, and SciPy.integrate.
- Achieved a **95% increase** in density estimation accuracy — creating the Bijective Neural Architecture via PyTorch.

### 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

<b>Method of Auto Tuning One or More Sensors</b> <i>USPTO Application 18/686,753</i>	August 2023 <i>Patent Pending</i>
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INVITED PRESENTATIONS

<b>Neural Attention for Seismic Data Processing</b> <i>BP Geophysics R&amp;D Seminar</i>	July 2024
<b>Improving Mass Spectrometry Signal Fidelity</b> <i>INFICON Data Analytics Summit</i>	November 2020
<b>Automatic Text Summarization — Deep Learning &amp; Classical Approaches</b> <i>Syracuse University iSchool Poster Session</i>	April 2018

PROFESSIONAL DEVELOPMENT

<b>Core Analysis Workshop</b> <i>UT Austin Bureau of Economic Geology</i>	April 2024/December 2023
<b>Advanced Power BI — Power Query and DAX</b> <i>Havens Consulting</i>	April 2023
<b>Power BI — Reporting and Model Building</b> <i>Havens Consulting</i>	February 2023

HONORS & AWARDS

<b>Graduate Merit Scholarship</b> <i>Syracuse University</i>	August 2017 – May 2018
<b>Summa Cum Laude</b> <i>Syracuse University</i>	May 2017
<b>The Warren Semon Prize</b> <i>Syracuse University</i>	May 2017
<b>Dean’s Leadership Grant</b> <i>Syracuse University</i>	September 2014
<b>Dean’s List</b> <i>Syracuse University</i>	August 2014 – May 2017
<b>The Founders’ Scholarship</b> <i>Syracuse University</i>	August 2014 – May 2017

EDUCATION

<b>Syracuse University</b> <i>Master of Science   Computer Science</i>	May 2018
<b>Syracuse University</b> <i>Bachelor of Science   Computer Science</i>	May 2017 <i>Summa Cum Laude</i>

SKILLS & COMPETENCIES

<b>Business</b>	Strategy, Business Development, Stakeholder Management, Change Management, Agile, OKRs, CRISP-DM
<b>Technical</b>	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
<b>Tools</b>	Amazon SageMaker, Linux, Git, Python, R, PyTorch, Scikit-learn, Pandas, SciPy, Statsmodels, NumPy, NLTK, Gensim, OpenCV, Seaborn, Matplotlib, SLB Techlog, Atlassian Jira, Azure DevOps