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## **EDUCATION**

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### **M.S. Petroleum Engineering**

New Mexico Institute of Mining and Technology, Socorro, NM, USA

GPA: 3.85/4.0

Duration: August 2019 - Today

*Master's Thesis:* Monitoring of CO<sub>2</sub> in CO<sub>2</sub>-WAG EOR, Farnsworth Unit, Texas.

### **B.S. Petroleum Engineering**

Kwame Nkrumah University of Science and Technology, Kumasi, Ghana

(First Class Honors)

Duration: September, 2014 – July, 2018

*Project:* Design of Well Completion System for Lamar Field, Venezuela.

## **WORK AND INTERNSHIP EXPERIENCES**

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### **Research Assistant**

Petroleum Recovery Research Center, New Mexico Institute of Mining and Technology

August, 2019 - Today

- Work involved studying the effect of CO<sub>2</sub> dissolution on the thermophysical properties of the bulk reservoir fluid.
- Propose a fluid substitution model to study the changes in the effective elastic properties of the reservoir rock and fluid due to CO<sub>2</sub> dissolution.
- Quantify the effect of the bulk elastic property change on the resulting Time-Lapse seismic property shifts.
- Create a penalty function for the measured and computed seismic attributes as a way of calibrating the simulation model.
- Develop a forecast model to analyze the potential changes in the seismic responses at future time steps.

### **Teaching Assistant**

Department of Petroleum Engineering

Kwame Nkrumah University of Science and Technology, Kumasi, Ghana

July, 2018 – August, 2019

- Assisted in the teaching of Petroleum Engineering courses by organizing tutorial classes for Reservoir Simulation, Formation Evaluation and Fluid Mechanics courses.

### **Intern**

Department of Petroleum Engineering

Kwame Nkrumah University of Science and Technology, Kumasi, Ghana

July, 2017

- Performed laboratory tests on drilling fluids: measuring the density and rheological properties of drilling mud.
- Performed data analysis on pressure and production data to infer the average reservoir pressure, absolute permeability within a drainage area using Saphir (KAPPA Suite Software).
- Received some training on using a rig floor simulator, which is capable of simulating field well control and drilling procedures.

### **Intern**

Ghana National Petroleum Corporation (GNPC), Ghana

June 1- July 1, 2016

- Worked as an Intern under a team of engineers to understand how the operations within the various sectors (Subsea, Drilling, Production and Reservoir Engineering) in the Oil and Gas Industry and how they work collectively.

### **SOFTWARE SKILLS**

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- Slumberger Softwares (Petrel Reservoir engineering, PVTi, PIPESIM)
- Computer Modeling Group packages (IMEX, GEM and WINPROP)
- MATLAB,
- PVTSIM,
- Microsoft VBA.
- NIST SUPERTRAPP
- Graphic Illustration Software (Inkscape)

### **PROFESSIONAL MEMBERSHIPS**

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- Society of Petroleum Engineers
- American Association of Drilling Engineers

### **CERTIFICATE**

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- Wild Well Control