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# ENERGY PERSPECTIVE

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#### **Building Connections**

SPE International Delegation Strengthens Bonds in Uganda

In a significant stride towards fostering collaboration and knowledge exchange in the energy sector, a distinguished delegation from the Society of Petroleum Engineers International (SPEI) embarked on a visit to Uganda on 21\* March 2024.

The visit was orchestrated by the SPE Uganda Section, a subsidiary of SPE International (SPEI). SPE International is a not-for-profit professional association whose mission is to connect a global community of engineers, scientists, and related energy professionals to exchange knowledge, innovate, and advance their technical and professional competence regarding the exploration, development, and production of oil and gas and related energy resources to achieve a safe, secure, and sustainable energy future.

The delegation from SPE International was led by Ms.Oghogho Effiom, the SPE Africa Regional Director. She was accompanied by Mr. Moyosore Olaoluwa Davies - SPE Regional Activities Manager for Europe and Africa, Dr. Riverson Oppong - SPE Ghana Section Director, and Ms. Samantha Vanessa Armstrong - SPE Member Programmes Senior Manager.

The delegation's itinerary encompassed various captivating activities to strengthen the relationship between SPE and Uganda's petroleum industry. The activities commenced with an elegant dinner, where select members of the SPE Uganda Section Board had the privilege of welcoming the esteemed guests to Uganda. Against the backdrop of conviviality and camaraderie, the guests and Board members exchanged insights and perspectives on the current state and future prospects of Uganda's oil and gas sector. The dinner set a promising tone for the subsequent engagements, laying the foundation for fruitful interactions and meaningful discussions about Uganda's energy future.



Ms.Oghogho Effiom - SPE Africa Regional Director



The SPE International Delegates and SPE Uganda Section Board members at the welcoming dinner.

## **SASTCE 2024**

On the first day, the delegates attended the 2<sup>nd</sup> SPE Annual Students Technical Conference and Exhibition (SASTCE) at Makerere University on 22<sup>nd</sup> March 2024. This flagship event serves as a platform for knowledge sharing, collaboration, and innovation among students and industry stakeholders in Uganda. The event involved technical presentations, panel discussions, exhibitions and the SPE Africa Student Paper Contest. Several students from various SPE student chapters in Africa attended the event.

One of the highlights at the SASTCE was the 2024 SPE Africa Regional PetroBowl® Qualifiers, which pitches SPE student chapter teams against each other in a series of quick-fire rounds, answering technical and nontechnical industry-related questions.

During the final round of the competition, representatives from Kenya and Uganda showcased their intellectual prowess and competitive spirit.

The PetroBowl® competition provided a platform for budding talents to demonstrate their proficiency in various facets of the oil and gas industry. Through rigorous rounds of questioning and strategic manoeuvring, participants showcased their aptitude, innovation, and dedication, embodying the spirit of excellence that defines SPE's global community.

In the end, the SPE Student Chapter of Mbarara University of Science and Technology from Uganda emerged as the winner and qualified for the International PetroBowl® Championship, which will take place at the SPE Annual Technical Conference and Exhibition (ATCE) in New Orleans, Louisiana, USA from 23<sup>rd</sup> to 25<sup>th</sup> September 2024.

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Mr. Moyosore Olaoluwa Davies -SPE Regional Activities Manager for Europe and Africa



**Dr. Riverson Oppong** - SPE Ghana Section Director



Ms. Samantha Vanessa Armstrong - SPE Member Programmes Senior Manager



Panel Discussion at the SASTCE 2024



The SPE Africa Regional PetroBowl® Qualifiers at the SASTCE 2024



The SPE Africa Student Paper Contest at the SASTCE 2024

## Exhibitioners at the SASTCE 2024





#### **Awards and Recognition**





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## ALBERTINE GRABEN TOUR



The SPEI Delegates and PAU Staff preparing to travel to the Albertine Graben

The second activity for the delegation was a comprehensive tour of the Albertine region, a strategic milieu renowned for its burgeoning petroleum activities. The trip occurred on 23<sup>rd</sup> and 24<sup>th</sup> March 2024, accompanied by industry representatives from the Petroleum Authority of Uganda (PAU). The purpose of the tour was to demonstrate to the SPEI delegates the progress of the oil and gas projects in Uganda and highlight the co-existence of the projects within the communities and with wildlife.

On 23<sup>rd</sup> March 2024, the SPEI Delegation visited the Kingfisher Development Area project (KFDA) in Kikuube district. The team specifically visited well pad 3, the Buhuka Gravity water scheme, and the resettlement housing project.



The SPEI Delegates at the KFDA Project

On 24<sup>th</sup> March 2024, the delegates visited the Tilenga project, which is situated in Buliisa district. The team visited specifically the JBR04 well pad and the Victoria Nile Crossing.



The SPEI Delegates at the Tilenga Project

The key issues raised by the delegates during the field visit encompassed aspects such as environment management practices and sustainable measures, the operational timelines for the different projects and related infrastructure, the progress of drilling in both the KFDA and Tilenga projects, HSE management practices, national content aspects in Uganda's oil and gas sector, water quality management at the Buhuka Gravity water scheme as well as the land acquisition, resettlement and compensation aspects for both the KFDA and Tilenga projects.



The PAU Staff that facilitated the tour

The delegates encouraged and advised the PAU team to ensure that more positive publication about the respective projects in Uganda is consistently done with specific reference to the closeness of the communities to the projects, the economic activities such as world bank market in KFDA that is within the community as well as the reduction in footprint (thirty (30) well slots on a single pad- JBR04). They also appreciated the extension of safe water to the KFDA communities given that they are very close to Lake Albert.

Not only did the delegates appreciate the tremendous progress in Uganda's oil and gas sector, they also made a commitment to continue supporting the sector developments.



The SPEI Delegates at the Murchison Falls National Park

The tour facilitated an immersive learning experience, enabling the delegates to glean valuable insights into Uganda's petroleum landscape while appreciating its socio-economic implications.

The delegates got to witness firsthand the coexistence of the oil and gas industry with the community and within the national park, which is unique to the oil and gas projects in Uganda.

#### Development Projects in the Albertine Graben

#### Kingfisher Development Project

The development of the Kingfisher Development Area project (KFDA) includes the development of a Central Processing Facility (CPF) with the capacity to process forty thousand (40,000) bopd. The processed crude oil will be transported to the Delivery Point at Kabaale, through a 10" inner diameter Feeder pipeline that is approximately forty- eight (48) km long. It includes over eighteen (18) km of buried flowlines, a Lake Water Abstraction station together with supporting infrastructure, which includes camps, a Support base, a Materials yard, a Safety check point, a jetty, and access roads. The project consists of one (1) Onshore oilfield which is located at the shores of Lake Albert in Kikuube district. The oil field in the KFDA has a volume of 568MMbbls in place with recoverable resources estimated 186MMbbls. The China National Offshore Oil Company, Uganda Limited (CUL) is the operator of KFDA. The development of the Kingfisher field is planned to be undertaken through onshore drilling of thirty-one (31) Development Wells from four (4) wellpads, over a period of five (5) years, using one (1) drilling rig.

#### Tilenga Project

The Tilenga project is operated by TotalEnergies Exploration, and Production Uganda (TEPU). The project includes putting in place facilities to support the production of petroleum from six (6) oilfields located in Buliisa and Nwoya districts. The project consists of nine (9) Onshore oilfields with one (1) field in the Murchison Falls National Park (MFNP) -North of River Nile, and eight (8) fields in the South of the Nile (outside the park). The development of Tilenga project is planned to be undertaken through Onshore drilling of four hundred, and twenty-six (426) wells from thirty-one (31) well pads, with three (3) drilling rigs, for approximately, 4.6 years. The project is projected to produce 190,000 bopd of oil at peak, which will be processed and cleaned up at the Central Processing Facilities (CPF) located in the Industrial Area. The CPF consists of a series of tanks and piping systems through which the produced oil and the associated gas will be processed to remove any unwanted mixtures such as water and sand. The project infrastructure includes over one hundred and seventy (170) kilometres (km) of buried flowlines, and a ninety-six (96) km feeder pipeline, a Lake Water Abstraction System, and other infrastructure such as the Victoria Nile Crossing, Bugungu Airstrip, Support bases, camps, and access roads. The oil fields under the Tilenga project have a combined volume of oil in place of 5.8 billion barrels of oil (Bbbls) with recoverable resources estimated 874mmbbls.

Source: www.pau.go.ug

## ENERGY PERSPECTIVE



The Guests and Delegates who participated in the SPE Networking Forum 2024 at Four Points By Sheraton in Kampala

## **SPE NETWORKING FORUM 2024**

### Advancing Uganda's Energy Future And Talent With SPE



Mr. Kato Obadiah Anthony Chairperson, SPE Uganda Section

The culminating engagement of the visit by the SPEI Delegation was the SPE Networking Forum 2024, hosted at the esteemed Four Points By Sheraton, Kampala. Industry professionals, government officials, and academic leaders attended the event.

The forum was a nexus for knowledge dissemination, professional networking and strategic dialogue. The engagement comprised technical presentations, panel discussions, networking and an award and recognition session.

Mr. Kato Obadiah Anthony, the Chairperson of the SPE Uganda Section, welcomed the guests to the forum and appreciated the delegates for making time to visit Uganda.

He highlighted that Uganda, as a young entrant in the sector, is in a strategic position to learn and implement efficient exploitation of its petroleum resources for the country's benefit based on lessons from countries whose sector has matured over time. He further stated that Uganda's petroleum industry will require professional individuals with robust competence in various technical disciplines to develop innovative solutions and demonstrate exceptional leadership capabilities to ensure that the energy needs of the country are met.

The forum was graced by Mr. Philips Obita, the Chief Operating Officer Upstream at the Uganda National Oil Company (UNOC), who provided the keynote address. He tactfully set the tone for the forum by presenting aspects related to the energy demand in Uganda and globally, Uganda's future energy systems, the drive to decarbonise oil and gas projects, and strategies SPE and Industry can implement to meet the country's energy needs.



Mr. Philips Obita, Chief Operating Officer - Upstream UNOC

"As a young entrant in the oil and gas sector, Uganda is in a strategic position to learn and implement efficient exploitation of its petroleum resources for the country's benefit based on lessons from countries whose sector has matured over time."

- Kato Obadiah Anthony

The Forum provided the opportunity for the SPEI Delegates to participate in technical presentations, panel discussions, and a networking session with the attendees.

Mr. Moyosore Olaoluwa Davies presented on SPE's Contribution to the Energy Industry in Africa and Globally. His presentation provided an in-depth look at the benefits available to both SPE's professional and student members. He encourged the members to maximise these benefits to enhance their competence in the oil and gas sector.

Dr. Riverson Oppong presented on the topic Using SPE as a Career Advancement Tool for Professionals. He piqued the interest of budding petroleum engineers regarding the perks and opportunities that come with being an SPE member. Drawing from his own journey as an active SPE member, he shared how this esteemed organisation has been instrumental in his professional growth and leadership development, enabling him to make meaningful contributions to the progress of the African energy sector.

He further discussed the valuable resources and offerings provided by SPE, such as Petroleum Engineering Certifications, Access to OnePetro, engaging Distinguished Lectures, skill-building workshops, networking opportunities, and knowledge-sharing platforms. Emphasising the rewards and recognition available to dedicated members, he underscored the importance of active participation and volunteering within SPE. He also exhorted the young professionals in the sector to leverage the mentorship programmes in SPE to gain first-hand career insights and develop the requisite skills to excel in the industry.

In his concluding remarks, He accentuated the power of networking in career development and portrayed SPE as not just an organisation but a formidable family that fosters unity, growth, and progress within the energy industry.

Ms. Samantha Vanessa Armstrong presented on The Future of Member Programmes for SPE Professionals. Her presentation was primarily focused on the professional members. She explained the changes that have taken place in SPE International, such as the appointment of a new SPE CEO and Executive Vice President, Mr. Simon Seaton, how SPEI interacts with its members and the benefits available to the SPE professional members.

All the presentation materials have been uploaded on the SPE Uganda Section website: <a href="https://connect.spe.org/uganda/home">https://connect.spe.org/uganda/home</a>

Access to these materials will require an individual to have an active SPE membership and SPE membership profile credentials.

The forum also offered the students from the SPE Student Chapter of Mbarara University of Science and Technology an opportunity to present and share their experiences from the recent International Petroleum Technology Conference (IPTC) held in Dhahran, Saudi Arabia, from 12<sup>th</sup> to 14<sup>th</sup> February 2024.

The forum also facilitated two (2) panel discussions, and these included;

 The Role of SPE in supporting the sustainable development of Uganda's Petroleum Industry.

The panel delved into the SPE's instrumental role in driving the sustainable development of Uganda's burgeoning petroleum industry and dissed the benefits that the SPE brings to the forefront of industry development.

#### ■ Work-Life Balance in a Fast-Paced Environment

After a long wait, the Ugandan oil industry is now nearing the peak of the development phase. As professionals directly and indirectly involved in the industry, this is a fast-paced time for every discipline. For this session, the panel shared insights on how they were adapting to the industry pace amidst the various other demands of life.

To conclude the forum, the SPE Uganda Section recognized and awarded individuals with long-term SPE membership. Subsequently, companies were recognized and awarded for paying membership fees for their staff. The SPEI Delegates were also provided gifts as a token of thanks from the SPE Uganda Section.

Overall, the visit by the SPEI Delegates represented a significant milestone in strengthening ties between SPE and Uganda's petroleum industry. Through a multifaceted program encompassing student engagement, a field tour of the prolific petroleum basin in Uganda, and a networking forum for professionals in the petroleum sector, the visit underscored the shared commitment to advancing knowledge, fostering excellence, and driving sustainable development in the energy sector.

The SPE Uganda Section would like to acknowledge and appreciate our sponsors, Four Points By Sheraton, Petroleum Authority of Uganda, Uganda National Oil Company, TotalEnergies EP Uganda, CNOOC Uganda Limited, and Kabalega Resort—Hoima Hotel, for collaborating with us to orchestrate the SPEI Delegation's visit to Uganda.

#### **PICTORIALS**































