

# ***SPE Reservoir Evaluation & Engineering***

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## ***Well Performance, Testing, and Evaluation***

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1127–1143

SPE-215808-PA (Direct to Peer)

### **Modeling Transient Flow Behavior of Off-Center Fractured Well with Multiple Fractures in Radial Composite Gas Reservoirs**

Y. Xu, X. Zuping, and M. Yu

## ***Well Logging, Petrophysics, and Formation Evaluation***

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SPE-214367-PA

### **Flow-Through Experiments of Reactive Ba-Sr-Mg Brines in Mons Chalk at North Sea Reservoir Temperature at Different Injection Rates**

P. Ø. Andersen, S. S. Herlofsen, R. I. Korsnes, and M. W. Minde

## ***Enhanced Oil Recovery, Heavy Oil, and CO<sub>2</sub> Applications***

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1159–1174

SPE-200057-PA (Open Access)

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S. Masalmeh, S. A. Farzaneh, M. Sohrabi, M. S. Ataei, and M. Alshuaibi

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SPE-210120-PA

### **New Insights into Hybrid Low-Salinity Polymer Flooding through a Coupled Geochemical-Based Modeling Approach**

A. M. Hassan, E. W. Al-Shalabi, W. Alameri, M. S. Kamal, S. Patil, and S. M. S. Hussain

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SPE-215832-PA (Direct to Peer)

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W. Zhao, H. W. Jang, and D. Yang

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SPE-200572-PA

**Special Connections for Representing Multiscale Heterogeneities in Reservoir Simulation**

M. G. Correia, G. Oliveira, and D. J. Schiozer

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**Real-Time Rock-Properties Estimation for Geosteering: Statistical Rock-Physics-Driven Inversion of Seismic Acoustic Impedance and LWD Ultradeep Azimuthal Resistivity**

F. Ciabbari, C. Tarchiani, G. Alberelli, F. Chinellato, M. Mele, J. A. Marini, M. Nickel, H. Borgos, and G. V. Dahl

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SPE-214451-PA (Open Access)

**Measurement of Effective Hydrogen-Methane Gas Diffusion Coefficients in Reservoir Rocks**

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SPE-214689-PA (Direct to Peer)

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X. Zhang, Z. Gao, V. Maselli, and T. Fan

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SPE-217450-PA (Direct to Peer)

**Genesis, Distribution, and Characterization of a Paleokarst Subsurface River System in the Tahe Area, Tarim Basin, Western China**

X. Lyu, B. Ju, X. Wu, and F. Xiao

### ***Improved Oil Recovery, Waterflooding, and Phase Behavior***

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A. Somoza, B. Rodríguez-Cabo, I. Barrio, M. F. García-Mayoral, and A. Soto

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#### **Comparative Evaluation of $\alpha$ Functions for the Soave-Redlich-Kwong Equation of State and the Peng-Robinson Equation of State to Predict Saturation Pressures for Gas(es)-Heavy Oil/Bitumen-Water Systems**

E. A. Atonge and D. Yang

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#### **The Best Scenario for Geostatistical Modeling of Porosity in the Sarvak Reservoir in an Iranian Oil Field, Using Electrofacies, Seismic Facies, and Seismic Attributes**

V. Mehdipour, A. R. Rabbani, and A. Kadkhodaie

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H. Pashaei, A. Ghaemi, and R. Miri

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#### **Evaluation of Effects of Waterflooding-Induced Bilayer Fractures on Tight Reservoir Using Pressure-Transient Analysis Method**

Z. Wang, Z. Ning, J. Zhan, and W. Guo

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### **RTA-Assisted Numerical History-Matching Workflow**

H. Hamdi, C. R. Clarkson, and A. Ghanizadeh

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### **Pressure Transient Analysis for Water Injection Wells with Waterflooding-Induced Nonsimultaneously Closed Multistorage Fractures: Semianalytical Model and Case Study**

Z. Wang, Z. Ning, W. Guo, W. Lu, F. Lyu, and G. Liu

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### **Review of Offshore Chemical Flooding Field Applications and Key Lessons Learned**

M. Han, S. Ayirala, and A. A. Al-Yousef

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### **Experimental Measurements and Molecular Simulation of Carbon Dioxide Adsorption on Carbon Surface**

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E. Morales and J. Lee

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### **A Novel 2.5D Deep Network Inversion of Gravity Anomalies to Estimate Basement Topography**

Z. Ashena, H. Kabirzadeh, J. W. Kim, X. Wang, and M. Ali

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B. A. Diliegros and R. Aguilera

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**Geophysical Modeling and Its Contribution on the Reservoir Characterization of Al Baraka in El Gallaba Plain, South Egypt**

M. O. Ebraheem, H. A. Ibrahim, H. F. Ewida, and A. H. Senosy

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**Data Assimilation of Production and Multiple 4D Seismic Acquisitions in a Deepwater Field Using Ensemble Smoother with Multiple Data Assimilation**

D. Rossi Rosa, D. J. Schiozer, and A. Davolio

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**A Practical and Innovative Workflow to Support the Numerical Simulation of CO<sub>2</sub> Storage in Large Field-Scale Models**

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M. Z. Afzal Durrani, S. A. Rahman, M. Talib, G. Subhani, and B. Sarosh

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SPE-214435-PA (Open Access)

**The Role of Diffusion on Reservoir Performance in Underground Hydrogen Storage**

V. Arekhov, T. Clemens, J. Wegner, M. Abdelmoula, and T. Manai

## Editorial Notes

This is the last issue of *SPE Reservoir Evaluation & Engineering*. For future papers covering this discipline, as well as other topics in the upstream oil and gas industry and emerging technologies, please refer to the new, expanded *SPE Journal*. While the first issue of the new journal is scheduled for January 2024, there are a number of articles in press currently available on [OnePetro](#). For more information on the journal consolidation, please visit the [SPE Journals Consolidation](#) page on spe.org.

## 2023 Outstanding Technical Reviewer Service Awards

Every year, SPE recognizes members who have made an exceptional effort to ensure the technical excellence of the Society's peer-reviewed journals. For their contributions, the following individuals are recipients of the 2023 Outstanding Technical Reviewer Service Award for *SPE Reservoir Evaluation & Engineering*.

**Anil Ambastha**, Chevron

**Salam Al-Rbeawi**, Middle East Technical  
University

**Emad Al-Shalabi**, Khalifa University of  
Science and Technology

**Jeff Baldwin**, Chesapeake Energy

**Roderick Batycky**, StreamSim  
Technologies

**Eric Delamaide**, IFP Technologies  
(Canada)

**Adolfo D'Windt**, Consultant

**Jianlin Fu**, Chevron

**Lei Fu**, Aramco Americas

**Valentin Guillon**, IFP Energies nouvelles

**Zhenyu Guo**, Xecta Digital Labs

**Myung Hwang**, Consultant

**Cunqi Jia**, The University of Texas at Austin

**Keith Katahara**, Consultant

**Anthony Kavscek**, Stanford University

**Hassan Mahani**, Royal Dutch Shell

**Mohamed Rezk**, King Fahd University of  
Petroleum & Minerals

**David Rousseau**, IFP Energies nouvelles

**Vijay Shrivastava**, Computer Modelling  
Group

**Maissa Souayah**, Sultan Qaboos  
University

**Charles Vanorsdale**, Keystone Petroleum  
Consulting

**Fengyuan Zhang**, China University of  
Petroleum (Beijing)