



Application and Optimization of CCUS Technology in Shale Gas Production and Storage

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Message from the Guest Editors

Dear Colleagues,

Worldwide climate change enables a major challenge to the current situation of energy consumption and, accordingly, much attention has been drawn to the development of comprehensive technology as a way of enhancing the energy supply and simultaneously reducing carbon emissions. In this context, in recent years, a technique known as CCUS in shale gas production and storage raised increasing concerns because it usually promotes synthetic rewards, namely, acquiring energy from geological formation and trapping CO₂ in underground strata. Basically, the shale gas reservoir has been widely accepted and recognized to be a suitable geological target to deploy CCUG technology; however, it is not mature enough to experience large-scale field promotion and implementation. As a result, shale-based CCUS is the focus of considerable scientific investigations, and these drive the organization of this Special Issue. Herein, this Special Issue welcomes all achievements regarding CCUS technology related to shale gas, including all outlines from laboratory experiments, numerical simulations, engineering evaluations, economic judgements, etc.





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Message from the Editor-in-Chief

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