

UT-AUSTIN

EDGER
FORUM



SHORT COURSE SEISMIC INVERSION AND ROCK PHYSICS FOR RESERVOIR CHARACTERIZATION

The Jackson School of Geosciences, 11–15 January 2016

INSTRUCTORS: DRS. MRINAL K. SEN and KYLE T. SPIKES

The EDGER Forum is offering a 5-day short course for members and potential members. The topic is integration of seismic inversion and rock physics for reservoir characterization. We are targeting new hires from our consortium members to attend the weeklong class. Mrinal Sen and Kyle Spikes will co-instruct, using their overlapping expertise in inverse theory and rock properties. The morning sessions will consist of lectures and background information. Hands-on exercises will be the focus in the afternoon sessions. These exercises will be based on well log and seismic data provided from the EDGER Forum.

TOPICS

Introduction to seismic reservoir characterization
Seismic wave propagation and modeling fundamentals
Rock physics basis of seismic velocity
The connection between seismic velocity and fluid flow
Seismic and reservoir resolutions, optimal grids, and scaling issues
Fundamentals of geostatistics fundamentals
Seismic attributes and facies
Seismic Inversion, poststack and prestack
Use of seismic, well log, core, pressure test and other data in reservoir model building
Neural networks and multi-attributes
Basic statistics, Markov Chain Monte Carlo simulations, and stochastic inversion
Uncertainty in reservoir models using Bayesian probability
4D seismic analysis

DATES

January 11–15, 2016, at UT-Austin

RATES

\$500 / person for individuals from membership companies
\$2500 / person for individuals from non-membership companies

Online Registration is Open at
<https://apps.jsg.utexas.edu/form/short-course-registration>