



## Seismic Interpretation - SI1

### COURSE

#### About the Course

*Can I observe the reservoir on seismic?*

*How large is the reservoir?*

*Did the well cut a fault?*

*Can seismic help me tie a set of wells?*

*What kind of a structural trap did I drill into?*

*Is the structure valid or a seismic artifact?*

*Are these reflections real or multiples?*

*How can I combine structural and stratigraphic interpretations to develop a structural and depositional history?*

*How does seismic data acquisition and processing impact my interpretation?*

*Will my well encounter hazards such as abnormal pressure or shallow gas?*

The participant learns to answer these and related questions by gaining an understanding of the seismic system, its limitations and pitfalls, and by interpreting 2D and 3D seismic examples of structural and stratigraphic features associated with actively producing hydrocarbon areas.

*"Liked explanations of how to actually interpret the data." - Senior Geologist, United States*

*"Understanding more about the physics of seismic, and seeing various geologic settings and how to interpret them with seismic." - Geologist, United Kingdom*

#### Target Audience

Geologists, geophysicists, and engineers who want to use seismic data for petroleum exploration and/or production. Familiarity with geological terminology will be helpful.

#### You Will Learn

Participants will learn how to:

- Understand the seismic process, interpret seismic sections, develop a geologic model, and prepare maps
- Relate the subsurface stratigraphy to well data
- Identify different structural styles from seismic data

- Create a basic stratigraphic framework using seismic stratigraphy

## Course Content

- Basics: geological controls on the propagation, reflection, and refraction of seismic waves
- Data acquisition and processing with emphasis on its potential impact on interpretation
- 2D and 3D interpretation techniques
- Seismic interpretation of different structural styles: extensional, compressional, strike-slip, inverted, salt, and gravity dominated basins
- Seismic velocities
- Sequence stratigraphy and seismic facies analysis
- Acoustic impedance
- DHIs
- AVO

## Product Details

Categories: [Upstream](#)

Disciplines: [Geophysics](#)

Levels: [Foundation](#)

Product Type: [Course](#)

Formats Available: [In-Classroom](#)

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