PetroSkills

# Nuclear Magnetic Resonance (NMR) Petrophysics - NMRP

COURSE

## About the Course

NMR today is a must-have technology for many companies because of the value-added to formation-evaluation. Some of the applications include: Matrix-independent, 'sourceless' porosity, low-resistivity/low-contrast, fresh-water reservoirs, and carbonates. NMR completes the formation-evaluation story for many companies now using the technology regularly because it either validates conventional log and test data or it independently provides an answer unavailable from other sources. Certainly, in many instances, the absence NMR data too frequently leaves the formation-evaluation story incomplete and uncertain.

This four-day, PetroSkills NMR Petrophysics course will provide geoscientists and engineers with a basic to intermediate skill-level for using NMR data in reservoir characterization workflows. Course design is a balance between information transfer, discussion, training, and practical exercise.

*"In my opinion the course was very useful, well organized and the professor did a great job. It improved my knowledge of the subject and gave me tools to better work this kind of data once back in the office."* - Operations Geologist, Spain

## Target Audience

Geoscientists and engineers interested in learning how NMR technology fits within the reservoir characterization/reservoir modelling workflow and how to use the data to best advantage.

## You Will Learn

Participants will learn how to:

- Understand how NMR works for petrophysical applications
- Understand the language of NMR technology (mnemonics)
- Use NMR data for core and log applications
- Understand how NMR fits into predictive rock-typing schemes
- Plan core and log acquisition programs
- Identify data quality indicators and what they mean
- Use core data for log calibration
- Use contractor deliverable to produce an interpretation
- Fit NMR data with conventional log data
- Process raw data

**Course Content**

- Basics of NMR technology
- NMR Core Analysis
- Rock typing from NMR core data and its relationship to logs
- Pore geometry and what it means for the interpretation of NMR data
- NMR logs
- Job planning
- Log quality control
- Working with NMR data (various exercises throughout the course)

**Product Details**

Categories: Upstream

Disciplines: Petrophysics

Levels: Intermediate

Product Type: Course

Formats Available: In-Classroom

Instructors: PetroSkills Specialist David Marschall