

### Course Title

## Advanced Well Completion & Stimulation

### Credit Hours

25 H

### Venue

Dubai

### Date

7<sup>th</sup> – 11<sup>th</sup> July 2024

## Objectives

- **By the end of this Course participants will be able to:**
  - ✓ Understand geological history and its connection to offshore drilling and production industry
  - ✓ Explain the employment of the different methods of exploration for oil and gas
  - ✓ Describe the different equipment and methods for well testing and logging
  - ✓ Explain why and how cutting of formation core samples is undertaken
  - ✓ Calculate pressures and pressure gradients in drilling and production wells
  - ✓ Explain the construction of the different well control systems and equipment, and how they operate
  - ✓ Employ methods and procedures for well control in a simulated environment
  - ✓ Explain the most common drilling operations, and the tools and equipment involved
  - ✓ Describe the most common floating and fixed installations and their main systems for operation
  - ✓ Explain the construction of a well, including the use of casings, wellheads and cementing methods and techniques
  - ✓ Explain the installations of hydraulic/pneumatic/electrical systems for control of drilling and well maintenance operations
  - ✓ Explain methods for completing production wells
  - ✓ Describe construction of a production well with production tubing wellhead and x-mas trees
  - ✓ Explain the main principles of sub-sea completions and operations

## The Delegates

- ✓ Drilling Engineers, Senior Drilling Engineers, Drilling Supervisors, Petroleum Engineers, Completion Engineers, Tool Pushers, Reservoir and Senior Reservoir Engineers, Geologists, Production and Completion Field Operators, Foremen, Industry Personnel.

## Contents

- **Introduction and Course overview.**
- **Exploration**
  - ✓ Search for oil & gas
  - ✓ Terms and nomenclature of geology used in oil industry
  - ✓ Petroleum: How it is formed and trapped, geology of the suitable rocks for favorable deposition of hydrocarbons
- **Introduction to Drilling Technology**
  - ✓ Drilling methods
  - ✓ Technical Definitions
  - ✓ Rotary Drilling practices
  - ✓ Well Construction and Design of Casing String
  - ✓ Drilling fluids
  - ✓ Well control Equipment
  - ✓ Fishing and fishing Tools
  - ✓ Offshore drilling Practices
  - ✓ Safety on the rig

- **Well Completion and Testing**
  - ✓ Reservoir engineering aspects for well completion
  - ✓ Phase behaviour
  - ✓ Performance Evaluation
  - ✓ Production inflow performance
  - ✓ Types of well completion
  - ✓ Corrosive high pressure completion
  - ✓ Tubing less well completion
  - ✓ Horizontal and multilayered completion
  - ✓ Open hole completion
  - ✓ Slotted liner completion
  - ✓ Special completion
  - ✓ Packer completion
  - ✓ Perforation Techniques
  - ✓ Over balanced and under balanced
  - ✓ Well head equipment
  - ✓ Down hole tools
  - ✓ Classification of well production tests
  - ✓ Transient pressure testing: well testing strategy
  - ✓ Production testing tools
  - ✓ Drill stem Test
  - ✓ High pressure and high temperature testing
  - ✓ Testing of sour wells
  - ✓ Well activation and flow measurements
- **Artificial Lift**
  - ✓ Artificial lift
  - ✓ Need for artificial lift
  - ✓ Various modes of lifts
  - ✓ Selection criterion and design of suitable lift
  - ✓ Trouble shooting
  - ✓ Optimization
- **Reservoir Pressure Maintenance through Water / Gas Injection**
  - ✓ Reservoir pressure maintenance
  - ✓ Need for reservoir health management
  - ✓ Types of water injection methods, peripheral and spot injection
  - ✓ Frontier areas of EOR
  - ✓ Compatibility of injection fluids
  - ✓ Monitoring
- **Work-over Operations, Well Stimulation & Sand Control**
  - ✓ Work over rig components
  - ✓ Introduction
  - ✓ Rig components
  - ✓ Draw works
  - ✓ Hoisting System
  - ✓ Rotary equipment
  - ✓ Mud Pumps
  - ✓ Prime over
  - ✓ Work over Jobs

# Title

## Training & HR Development



- ✓ Major Repair Jobs
- ✓ Casing Damage repair
- ✓ Fishing
- ✓ Well Stimulation
- ✓ Formation Damage
- ✓ Various stimulation techniques
- ✓ Gravel packing
- ✓ Activation
- **Production, Storage, processing & Transportation**
  - ✓ Production
  - ✓ Design of GGS/GCS/ EPS
  - ✓ Design of CTF
  - ✓ Sour component handling
  - ✓ Demulsification and desalting
  - ✓ ETP- design
  - ✓ Transportation
  - ✓ Introduction to Offshore Technology especially Deep water
  - ✓ Offshore Practices
  - ✓ Introduction to offshore technology
  - ✓ Deep water: frontier area of technology
  - ✓ Case Studies
  - ✓ Discussions
- **Course summary.**

Discount	Language	Fees
10% in case of Three P. (or more)	English & Arabic	USD : 5000 \$
Timetable	How to Register ?	Other Dates
09:00 Am : 11:00 Am (1 <sup>st</sup> Section) 11:00 Am : 11:15 Am (Break 1) 11:15 Am : 12:45 Pm (2 <sup>nd</sup> Section) 12:45 Pm : 01:00 Pm (Break 2) 01:00 Pm : 02:00 Pm (3 <sup>rd</sup> Section)	<a href="http://www.titlehr.com">www.titlehr.com</a> <a href="mailto:Info@titlehr.com">Info@titlehr.com</a> Tell   00971559687070	15 <sup>th</sup> – 19 <sup>th</sup> September 2024