

# INTRODUCTION TO PETROLEUM ENGINEERING



**DRPT301**  
**Drilling,**  
**Reservoir &**  
**Petroleum**  
**Training**

**COURSE TITLE**

**INTRODUCTION TO PETROLEUM ENGINEERING**

**COURSE DATE/VENUE**

30<sup>th</sup> November – 4<sup>th</sup> December 26'

Doha, Qatar

**COURSE REFERENCE**

DRPT301

**COURSE DURATION**

05 Days

**DISCIPLINE**

Drilling, Reservoir & Petroleum Training

**COURSE INTRODUCTION**

This course introduces the general activities of the upstream sector of the petroleum industry including origin of petroleum, petroleum traps, exploration for oil and gas, drilling and completion practices, and production operations, corrosion, pollution, oil storage, transportation, refining, and marketing.

**COURSE OBJECTIVE**

**Upon completion of this course, participants will be able to:**

- To learn about major issues in petroleum engineering
- To understand the various operations carried out during field development, from drilling to surface treatment
- To learn the vocabulary needed to communicate with E&P professionals

## **COURSE AUDIENCE**

Professionals in technical, commercial, legal, financial or human resources departments, within the petroleum industry or related sectors, who need a general knowledge in petroleum engineering

## **COURSE CONTENT**

Pre-Course Test

Overview of Oil and Gas Resources and Industry (2 Hours)

Basic Review of Petroleum Geology

- The Geologic Column
- Petroleum Traps
- Origin of Petroleum, Migration and Accumulation

Oil Well Drilling Technology

- The Rig: Basic Functions and Components
- The Drilling Fluids: Functions, Types and Compositions
- Well Design: A Descriptive Review
- Fundamental Drilling Operations and Problems

Well Completion and Workover Operations

- Completion Types
- Completion Equipment
- Basics of Acidizing and Hydraulic Fracturing
- Sand Control

Production Engineering and Operations

- Surface Production Facilities
- Pipelines and Gathering Systems
- Separation and Treatment of Oil, Gas and Water
- Artificial Lift Systems
- Storage Systems and Tank Forms

Reservoir Engineering

- Definitions of Reserves

- Reservoir Drive Mechanisms
  - Primary Recovery
  - Enhanced Recovery Methods
- Oilfield Safety and Environmental Aspects
- Post-Course Test

### **COURSE CERTIFICATE**

**TRAINIT ACADEMY** will award an internationally recognized certificate(s) for each delegate on completion of training.

### **COURSE FEES**

£4,750 per Delegate. This rate includes participant's manual, Hand-Outs, lunch, coffee/tea on arrival, morning & afternoon of each day.

### **COURSE METHODOLOGY**

The training course will be highly participatory and the course leader will present, guide and facilitate learning, using a range of methods including formal presentation, discussions, sector-specific case studies and exercises. Above all, the course leader will make extensive use of real-life case examples in which he has been personally involved. You will also be encouraged to raise your own questions and to share in the development of the right answers using your own analysis and experiences. Tests of multiple-choice type will be made available on daily basis to examine the effectiveness of delivering the course.

- 30% Lectures
- 30% Workshops and work presentation
- 20% Case studies & Practical Exercises
- 10% Role Play
- 10% Videos, Software or Simulators (as applicable) & General Discussions