# Project Management for the Oil and Gas Industry

# INTRODUCTION

- Working within the Oil & Gas industry provides a complex project environment that throws up its own particular project management challenges. This detailed and integrated Project Management for the Oil and Gas Industry training course will assist anyone in the industry to make better decisions on projects, whether they are involved in project selection, management, or leading aspects of projects. This training course provides the opportunity for hands-on experience using industry project case studies – and follows one current offshore project example from the cradle to the grave.
- This interactive Project Management for the Oil & Gas Industry training course provides participants with the skills required to deliver projects effectively, from decision-making concepts used by business development and commercial departments, through to FEED and into planning & delivery.
- This training course focuses on industry best practice Project Management examples merged into practical instruction. Digging deep into tried and tested processes and tools, in order to best support the likelihood of future projects achieving their desired results and benefits delivered by the project.
- This 10-day Project Management for the Oil & Gas Industry training course has been designed as a roadmap to ensure that the reasoning behind project selection is understood. When we combine that with the development of skills in detailed planning, organising and execution delivery, and closing out the project successfully, we really are looking to progress our project management career with confidence.

#### Key areas covered include:

- Understand the contextual considerations for project delivery within the Oil & Gas industry
- Learn about the Project Sanctioning and Approval Process (PSAP)
- Understand structural and systematic aspects of project planning and execution that can be used
- Identify with and understand reasons for project failures and successes
- Relate to best practice project management philosophies and how they support project delivery
- Comprehend how project success is measured with emphasis on: time, cost , benefit, value addition
- Gain familiarisation with project financing methods & Financial modelling
- Perform analytical techniques of project management using best-practice techniques
- Understand the need for the project manager to be leading and managing project teams

# This training course will highlight:

- The need to undertake Front End Design & Survey in an Oil & Gas environment
- How to establish the key requirements necessary to support Oil& Gas project approval
- How Oil & Gas organisations ascertain the strategic fit and relevant options for project delivery
- The route to successful project integration and delivery

# **OBJECTIVES**

- This Project Management for the Oil & Gas Industry training course intends to guide successful project selection and delivery.
- Identify with and manage stakeholders and communication needs in the Oil & Gas industry
- Maintain continuous project performance and delivery control
- Accurately estimate and allocate project costs and resources
- Develop a project close-out plan in line with expected success criteria

By the end of this training course , participants will learn to:

- Understand the importance of integrating scope, time, resources and cost management into a dynamic, manageable project management plan
- Systematically define, design, and integrate end-user requirements in the project
- Identify risk sources and learn how to mitigate potential risks and deal with uncertainty
- Develop project network diagrams for CPM and advanced PERT calculations to identify schedule and cost risks
- Develop a project recovery plan for budget and schedule overruns
- Measure, forecast and control project performance by employing earned value techniques

# TRAINING METHODOLOGY

- Participants to this Project Management for the Oil & Gas Industry training course will receive a
  thorough training on the subjects covered by the course outline with the instructor utilising a variety
  of proven adult learning teaching and facilitation techniques. Training course methodology includes
  an insight into organisational decision methods and short and long-term strategy considerations. In
  addition, industry best practice project management performance and delivery tools and processes
  will be introduced and used as practice examples. This training course includes teamwork around an
  applicable case study, group discussion and critical analysis of actual projects.
- This Project Management for the Oil & Gas Industry training course assumes prior knowledge of the fundamentals of the topics covered in the training course, but they will be covered briefly to ascertain general understanding. New concepts and tools are introduced throughout the course to enable delegates to progress from the fundamental to the more advanced concepts and tools used within project management.

# **ORGANISATIONAL IMPACT**

• In the current challenging economic climate for the Oil and Gas Industry, the need to select appropriately and deliver projects successfully is immense and the ability to make correct decisions is a key skill to allow us to deliver within the given constraints, thus delivering profitable results to our organisation.

# PERSONAL IMPACT

The ability to deliver successful projects in such a complex environment is a core skill for project
managers and all involved in delivering or leading packages of work. When carried out properly
projects are more predictable, value delivery is enhanced and client satisfaction is increased.
Understanding how and when key decisions can be made or particular activities support delivery is
immense for anyone working in Oil & Gas projects.

# WHO SHOULD ATTEND?

- Programme and Project Managers
- Project Management Professionals
- Senior related Project Support Managers
- Senior Management Decision Makers
- Commercial Management Personnel
- Project Lead Engineers
- Project Control and business services professionals who have the responsibility for planning and controlling project schedules and costs in client and contracting companies
- The audience should be positioned to pursue and maintain competitive operational and business efficiency, revenue maximisation and profitability for the organisation.

# **Course Outline**

## MODULE I: Developing Project Strategy in the Oil & Gas Industry

# Concepts of Project Management & Intricacies of Project Approval in Oil & Gas Industry

- Projects and Programmes
- Project Life Cycles and Stage Gates
- Project Sanctioning and Approval Process (PSAP) for the Oil & Gas Industry
- Development of the Strategic Project Business Case
- Project Identification Awareness of Accountability of Project Ideas
- Exploratory Decision-analysis

#### Project Context for Oil & Gas Projects

- Appreciation of Macro-environment in relation to Project Choice
- Understand Who Stakeholders Are and How They May Impact Upon The Project
- Regulatory Framework, Institutional Factors and Infrastructure
- Project Feasibility Decision Makers
- Project Preparation & Planning Responsibilities

# Project Financial Modelling and Project Leadership Skills

- Structuring Project Finance Deals
- Financing / Credit Risk Considerations for the Oil & Gas Project
- The Time Value of Money How it applies to project finance?
- Yields and Rate of Return Discounted Cash Flow (DCF) Analysis
- Build an Executive Leadership Style that guides the project toward greater performance and profit
- Understand the Project Organisation in a typical Oil & Gas project
- Project Manager Unique Requirements

# Identify Reasons for Project Failures & Prepare for Successful Delivery and Integration

- Understand Why some projects fail
- Gain an Understanding of Successful Projects and Analyse Reasons for Success
- Development of the Project Charter
- Define Success Criteria and KPI's of an example Oil & Gas Project
- Capture Project Requirements
- Understand the Need for a Project Team Approach
- Importance of Communication in an Oil & Gas project
- Working Collaboratively

#### Development Project Stakeholder Relationships & Project Communication

- Identify and Plan to engage with the Project's Key Stakeholders
- Creating Project Dashboards
- Presenting Decisions to the Project Board
- Recognising need for Project Recovery
- Control Decision-making

#### MODULE II: Delivering Successful Projects within the Oil and Gas Industry

#### **Preparing for Project Delivery**

- Understand who the key stakeholders are and how they may impact upon the project
- Consider implications of unclear needs and expectations
- Understand the Project Success Criteria and How the Project will be measured as Successful
- Define the Project Requirements
- Develop the Scope using product and work breakdown structures
- Utilise Relevant Techniques for Project Estimating

# Project Planning - Schedule, Cost & Resources

- Develop a Network Diagram
- Developing the Precedence Network Diagram with Total and Free Float Calculations
- Develop a Gantt Chart The Schedule Baseline
- Understand How to Estimate Project Cost Baseline
- Familiarise Yourself with Different Contract Types according to Risk Distribution
- Learn the Difference between Fixed Price & Cost-Plus Contracts
- Resource Allocation Algorithms for Resource Prioritisation
- Planning and Scheduling Limited Resources
- Options for Accelerating the Schedule and How to Deliver

#### Manage Risks & Resources

- Risk Management Process & Model
- Identifying Potential Risk Events Typical in an Oil & Gas project
- Understand Qualitative and Quantitative Analysis Techniques
- Design Appropriate Risk Response Planning Strategies
- Challenges of an Oil & Gas Project Team
- Learn about Different Leadership Models
- Dynamics of Team Development & Motivation

#### Managing Project Changes while Maintaining Quality

- Managing Change in Projects
- Understanding the Best Practice Change Processes used in Projects
- Tracking the Project Using Earned Value Management (EVM)
- Managing Variable Conditions managing the tensions
- Learn about the Critical Chain and its Growing Popularity in the Oil & Gas Industry
- The Benefits of Utilising a Project Support Office
- Project Reviews
- Learn about Project Quality Management
- Differentiate between Quality Planning, Assurance & Control

#### Staying Focused, Delivering and Closing your Project

- Recognising the Operational Considerations that need to be Met and Prepared For
- Learn about Project Cost and Schedule Recovery Techniques Relevant to the Oil & Gas Industry
- The Implications of Late Recovery Practices
- Project Management Reporting
- Project Handover & Closure
- Lessons Learned