SAFETY and RISK MANAGEMENT IN OIL & GAS

by

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COURSE OBJECTIVE


COURSE CONTENTS

- Course Introduction
- Safety & Risk Management Terminologies (safety terminologies, hazard, risk, incident, accident, safety work, etc)
- Overview of Oil & Gas Processing & Facilities (wellhead, separation, pressure
vessel, piping, pipeline, conditioning, etc)

- **Protection Concepts and Layer of Protection** (BPCS, alarm system, safety instrumented system, etc)
- **Safety & Risk Management in Design Process** (project phase, project safety analysis, etc)
- **Hazard and Operability Study / HAZOPS** (Methodology, Team Coordination, HAZOPs guide word, HAZOPs Worksheets, etc)
- **Hazards Related to Oil and Gas Industry** (fire, explosions, slips, trips, falls, motor vehicle accidents, confined space, etc)
- **Safety Instrumented System (SIS) and Risk Reduction** (probability failure on demand, safety integrity level, etc)
- **Safety Management/Administration System** (safety policy, safety standard, procedure, PTW System, etc)
- **Methods for Risk Identification & Risk Assessment** (what if, checklist, Event Tree Analysis / ETA, Fault Tree Analysis / FTA, risk based inspection / RBI, etc)
- **Reading Safety and Risk Management System at Documents of Technical Drawing** (process flow diagram / PFD, symbols & labels, piping & instrument diagram / P&ID, etc)
- **Case Study, Discussion, and Film**

**HWO SHOULD ATTEND**

- HSE professionals,
- process, piping and rotating equipment professionals
- Operations and maintenance professionals,
- instrumentation and electrical professionals,
- project engineers, site managers and field superintendents, and
- operations and maintenance personnel.

**INSTRUCTOR:**

In Jumanda Kasdadi (IJK) has experienced an instructor at the industrial training since the year 1997, both the in-house training and public training. Experience in-house training in international **copper mining companies in Papua** (Year 1997-1998) and incorporated in the ITC (Industrial Training Center) company in Field Instrumentation & Process Control. IJK joint team is also experienced in-house training in the chemical industry company operating in Karawang
The experience of other in-house training in oil & gas companies that operate the Thousand Islands became one of the instructors in Field Safety Aspect Gas Operation, in the year 2008. In recent years also do inhouse training in the major oil companies in Riau Rumbai, Duri, Jambi, and Balikpapan. As for the public training, IJK & team have experienced more than 200 execution of training in Jakarta, Bandung, Surabaya, Balikpapan, Jogjakarta, Denpasar, Lombok, and Batam. In addition to training, IJK is also experienced in some job-related training materials include Field of Risk Assessment in the oil & gas company for 9 gas plant in South Sumatra onshore & Natuna offshore, Field Processing on the design process and waste treatment equipment laboratory environment in Pare-Pare in South Sulawesi, Field piping and feasibility study on a pipeline from the offshore pipeline tie-in on the pipe in the Straits of Malacca to the onshore pipeline distribution on the Island of Batam. The international experience of IJK is the conduct of FEED (Front End Engineering Design) of Oil Pipeline Distribution at Dili, Timor Leste (2015) and an instructor at the training Corrosion Control Management & Coating with participants of Titas Gas Company, Bangladesh (2016).