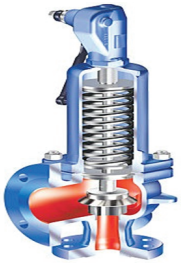
QATAR TECHNICAL PETROLEUM CENTER

Safety Relief Valve- Selection, Operation & TroubleShooting



Course Description

Within the boiler, piping and pressure vessel indus¬try, safety relief valves are of most essential importance. Pressure relief valves are the last line of defense against catastrophic failure or even loss of life. The course covers safety valve types and designs, materials, specification and se¬lection, preventive maintenance procedures, op¬eration and troubleshooting.
A number of different instructional methods are used throughout the course to allow interactive learning and to give practical examples from man¬ufacturing and service industry to enable the del¬egates to operate, select and troubleshoot safety valves upon course completion.

Course Objectives

- Familiarize participants with the functions and applications of safety relief valves, their types, designs and components.
- Train participants to install, disassemble, troubleshoot, clean, inspect, align, and reassemble a variety of safety valves
- Enable appropriate safety valve sizing and selection for liquid, gas and vapor applications
- To increase the participant's awareness and understanding that the mechanical integrity of relief valves depends jointly on the proper design, operation, condition assessment, and maintenance of the equipment.
- To provide the participants with a clear understanding of the degradation mechanisms that relief valves could be subjected to over their operating life, how to identify them, predict and determine their impact, and what appropriate measures can be taken to prevent and control the resultant damage.
- To provide the participants with the knowledge and failure analysis skills they need to conduct damage and failure analysis so as to prevent similar failures from happening.

Training Methodology

This interactive training course includes the following training methodologies as a percentage of total tuition hours:-

50% Lectures
30% Courses, Group Work & Practical Exercises
20% Videos & Software

Who Should Attend

Process engineers involved in design, selection and operation of plants. Mechanical, inspection, maintenance engineers. Technicians involved in operation, inspection, maintenance, troubleshooting of piping systems & valves. Plant and equip-ment design engineers working with engineering/
construction, process plant and equipment.

Delegates will gain essential and integrated knowledge about pressure equipment and piping systems design and the significance of appropriate design, operation and maintenance on their mechanical integrity.

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Course Outline

- Safety Valves History & Overpressure Protection
- Pressure Relief Devices
- Introduction to Safety Valves
- Pressure Relief Valves (Safety Valve, Relief Valve, Safety Relief Valve)
- Safety Valve Selection
- Installation Design
- Installation onto Systems
- Safety Valve Management
- Testing , Maintenance and Resetting
- Safety Valve Disposal
- Sizing Basics
- Pressure Terminology
- Identification/Specification of Safety Valves
- Rupture Discs
- Safety Valve Storage
- Selection & Sizing of Safety Valves
- API Recommended Practices

About the Course Instructor

MOHAMMMED KAMAL UDDIN AHMED

Bachelor of Engineering in Mechanical Engineering from Osmania University, Hyderabad, India in the year 1998.

• Piping Specialist since 1998, administered many courses in Piping Engineering, Onshore Pipeline Design & Construction, Pipe Stress Analysis, ASME B31.3, and API 570 Piping Inspection Examination Training & HVAC.

Piping & Pipeline Engineering Specialist

Profile at a glance:

Fourteen years of Progressive experience in projects management, design & maintenance engineering including piping material specifications, pipe stress analysis, mechanical systems, pipe support design, valves specifications and piping specialty items. It includes Design, evaluation, testing, fabrication interpretation, & modification of piping systems. Lead major projects for piping discipline with the world's most recognized design and owner companies.

• Currently engaged as Engineering Manager - Piping for M/S IPEBS, a engineering firm, based in Hyderabad, India into design and stress analysis of piping and pipeline systems and leading provider of technical trainings globally.

• Special interests include projects management for detailed engineering and mechanical integrity of piping and pipeline systems and Technical Trainings.

M/S IPEBS, Hyderabad, India Engineering Manager- Piping (July 2007 - Present)

Currently engaged as Engineering Manager of M/S IPEBS, an engineering firm based in Hyderabad, India, into engineering design of piping and pipeline systems and technical trainings.

M/S IPEBS was founded and incorporated in 2007, in Hyderabad, India. Today, the company consists of twenty-five executive, managerial, technical and administrative employees who manage, coordinate and execute projects successfully.