TECHNICAL
EDUCATION
ACADEMY

Operational Risk Management Center

COURSE PROGRAMME

000613

HSSE075 - Human Error Prevention

Human error is widely acknowledged as the major cause of quality, production, and safety risks in many industries.



Learn from the Best in the Business!

Course overview

Duration: 2 days / 16 hours · Foundation level

Why take this course

Human error is widely acknowledged as the major cause of quality, production, and safety risks in many industries. Although it is unlikely that human error will ever be completely prevented, there is growing recognition that many human performance problems stem from a failure within organizations to develop an effective policy for managing human reliability.

Human errors begin during the research and design stage, and continue into the manufacturing, construction, and installation phases, and finally through the design of management systems associated with operations and maintenance. Such management systems include: management and training policies, procedural development, and standard operating procedure development.

This course will provide insights into current knowledge of human error and how it can be reduced. The course will provide hands-on experience of practical error reduction techniques, using real-life case studies. You will also gain an understanding of the underlying causes of human error and how to reduce its occurrence by changing the culture of the organization and changing the design of the processes. Workshops are used throughout the course to illustrate concepts and to demonstrate human error analysis applications.

Who it is for and how it helps

Manager, supervisors, engineers and coordinators from Production, Operations, Maintenance, Safety and HR.

What you will learn

- Learn why focus on human reliability
- Learn what companies can do to reduce or eliminate human error
- Learn why human error is a factor in all accidents
- Learn why humans make mistakes
- Learn what can the worker do to eliminate the causes of human error
- Learn what the company can do to control human errors
- Learn what is the lower limits of control of human errors

Curriculum

Modules 01–03

01 Introduction to Human Error

- Learning objectives and goals of human error prevention
- What is human error and human error analysis?
- Understanding Human Error
- Errors and their relationship to loss events
- Which is most important: Management system deficiencies or personal behavior?
- Types of human error
- Modeling human behavior
- Elements associated with understanding and controlling human error
- Relating Human Error to Human Factor Influences

02 Human Error and Statistics

- Statistical Lower Limit of Human Error Rate
- Quantitative Importance of Each Human Factor
- Error rates under various job/task design/settings
- Dependent (common cause) error rates
- Quantitative importance of each human factor

03 Common Human Error Prevention Techniques

- Management leadership/Culture
- Fitness for Duty
- Knowledge and Skills
- Task design versus Human Capability
- Procedures and other written reference documents (emphasis on rules for reducing human errors by content accuracy and format/presentation clarity)
- Tools and Equipment (making these fit for humans)
- Human-System Interface (introduction to error proofing)
- Task Environment
- Communication (control of errors from miscommunication; verbal and signals)
- Management systems for prediction and control: Process Hazard Analysis, IRoot Cause Analyses, Management of Change

Curriculum

Modules 04–07

04 Error-Proofing Methods

- Error Recovery and Error-Proofing methods
- Application and expected values of Specific Error-Proofing methods
- Common Error Proofing methods

05 Techniques for Predicting and Analysing Human Error

- Checklist Analysis: For situational and for management system related errors
- Workplace walk-through analysis
- Guideword-based analysis (HAZOP, Job Hazard Analysis, etc.)
- Quantitative Human Reliability Analysis

06 Behaviour/Habits

- What controls human behavior (T-H-O theory and analysis)
- Implementation strategies for controlling undesired behaviors
- STAR (Specific Task Action Reporting)

07 Management, Leadership, and Culture

- How leadership shapes the control of human error control
- Getting Near Misses Reported
- Delegation of risk control roles
- Planning Your Path Forward

Programme instructor



Гыльнур Хуснуллина

Гыльнур Хуснуллина – эксперт и консультант в области биологической охраны труда (БиОТ) и промышленной безопасности (ПБ) с более чем 19-летним профессиональным опытом. Она специализируется на разработке и внедрении систем управления охраной труда (СУОТ), проведении внутренних аудитов по OHSAS 18001, а также на оценке и управлении рисками, управлении подрядными компаниями и выявлении опасных и вредных факторов.

Гыльнур проводит курсы по программам OPITO, NEBOSH IGC, IOSH Managing Safely, где ученики учатся определять опасные факторы в промышленности, оценивать риски, расследовать несчастные случаи, обучаться поведенческой безопасности и проведению пожарно-аварийной безопасности (ПАБ), а также системам управления в БиОТ.

В качестве эксперта Гыльнур разрабатывает системы отчетности, информирования, мотивации и поощрения в области БиОТ, проводит семинары по лидерству и культуре безопасности, а также разрабатывает материалы для курсов обучения. Ее опыт и экспертиза делают ее востребованным инструктором в области охраны труда и промышленной безопасности, ликвидации аварий и пожаротушения, системе экологического менеджмента и системе нарядов-допусков. Обучение у Гыльнур помогает компаниям и организациям сократить риски и обеспечить безопасность работников и окружающей среды.

Participant ratings

Programme evaluation based on participant feedback

Overall programme rating — 4.7 / 5

Clarity of learning objectives	**4.8 / 5**
Confidence in applying knowledge and skills	**4.8 / 5**
Achievement of learning objectives	**4.7 / 5**
Relevance of content to job tasks	**4.7 / 5**
Suitability of difficulty for the level of preparation	**4.8 / 5**
Increase in knowledge	**4.7 / 5**
Skills development	**4.6 / 5**
Willingness to recommend the programme to colleagues	**4.8 / 5**

59 responses

Joining the programme

Contact the Academy and quote course code 000613 to confirm dates, delivery format, prices and enrolment terms.

Training for your team

Tell us your business goals, the roles and number of participants, and your preferred dates and location. This will help us discuss the right training option.

Preparing for the programme

The published programme does not specify any prerequisites. Contact us before enrolling to confirm how to prepare.

Discuss your training needs

mail@tecedu.org
www.tecedu.academy

Learn from the Best in the Business!