Training Course on Incident Investigation and Root Cause Analysis

Professional Development Training Course Outline

Category	Occupational Health	**Duration**	10 Days
Base Fee	$3,000 USD	**Delivery Mode**	Online / On-site Hybrid

Course Introduction

In today’s fast-paced industrial environment, ensuring safety, compliance, and continuous improvement is more critical than ever. Training Course on Incident Investigation and Root Cause Analysis is designed to equip professionals with the skills, tools, and techniques needed to systematically analyze incidents, uncover root causes, and implement effective corrective actions. Whether the incident is a minor near-miss or a major event, understanding the why behind the what is the cornerstone of creating safer and more efficient workplaces.

Through this intensive, hands-on training, participants will master globally recognized investigation frameworks such as 5 Whys, Fishbone Diagrams, and Fault Tree Analysis, while applying best practices in documentation, stakeholder communication, and regulatory compliance. By the end of the course, learners will have the confidence to lead investigations that drive real change and prevent recurrence, creating a culture of proactive safety and operational excellence.

Programme Curriculum

Training Course on Incident Investigation and Root Cause Analysis

Introduction

In today’s fast-paced industrial environment, ensuring safety, compliance, and continuous improvement is more critical than ever. Training Course on Incident Investigation and Root Cause Analysis is designed to equip professionals with the skills, tools, and techniques needed to systematically analyze incidents, uncover root causes, and implement effective corrective actions. Whether the incident is a minor near-miss or a major event, understanding the why behind the what is the cornerstone of creating safer and more efficient workplaces.

Through this intensive, hands-on training, participants will master globally recognized investigation frameworks such as 5 Whys, Fishbone Diagrams, and Fault Tree Analysis, while applying best practices in documentation, stakeholder communication, and regulatory compliance. By the end of the course, learners will have the confidence to lead investigations that drive real change and prevent recurrence, creating a culture of proactive safety and operational excellence.

Course Objectives

By the end of this course, participants will be able to:

1. Understand key concepts in incident response and investigation protocols
2. Apply root cause analysis (RCA) tools for incident resolution
3. Lead structured investigations using industry-recognized frameworks
4. Implement corrective and preventive actions (CAPA) effectively
5. Integrate human factors analysis into investigations
6. Conduct detailed evidence collection and scene preservation
7. Use data to enhance risk assessment and mitigation strategies
8. Improve organizational learning through incident trend analysis
9. Document investigations using compliance-ready reporting formats
10. Foster a safety-first culture through transparent communication
11. Utilize digital investigation tools and software
12. Conduct root cause workshops and training within teams
13. Support continuous improvement and operational resilience

Target Audience

This course is ideal for:

1. Safety Officers and HSE Professionals
2. Maintenance and Operations Managers
3. Quality Assurance/Control Personnel
4. Incident Investigators
5. Risk Managers
6. Plant Managers and Supervisors
7. Regulatory and Compliance Officers
8. Safety Trainers and Auditors

Course Duration: 10 days

Course Modules

Module 1: Introduction to Incident Investigation

- Definitions and classifications of incidents
- Legal and regulatory requirements
- Reporting vs non-reporting decisions
- Importance of timely investigations
- Overview of the investigation process
- **Case Study:** Minor injury leading to process redesign

Module 2: Planning the Investigation

- Assigning roles and responsibilities
- Securing the scene and preserving evidence
- Initial information gathering

- Establishing scope and objectives
- Communication with stakeholders
- **Case Study:** Equipment malfunction at a manufacturing plant

Module 3: Evidence Collection Techniques

- Interviews and witness statements
- Physical and documentary evidence
- Scene photography and sketches
- Chain of custody
- Avoiding evidence contamination
- **Case Study:** Near miss in a construction site

Module 4: Root Cause Analysis Methods

- Introduction to 5 Whys
- Fishbone (Ishikawa) diagram
- Fault Tree Analysis (FTA)
- Human Factors Analysis and Classification System (HFACS)
- Selecting the appropriate method
- **Case Study:** Recurring quality defects in a food plant

Module 5: Conducting Effective Interviews

- Planning and preparation
- Establishing rapport
- Asking open-ended questions
- Avoiding leading and biased questions
- Handling difficult interviewees
- **Case Study:** Slip and fall in a distribution warehouse

Module 6: Data Analysis and Interpretation

- Analyzing trends and patterns
- Statistical and qualitative tools
- Drawing conclusions from evidence
- Use of investigation software
- Verifying findings with data
- **Case Study:** Chemical spill and emergency response delays

Module 7: Identifying Root Causes

- Difference between immediate, contributing, and root causes
- Use of RCA templates
- Validating root causes with evidence
- Linking causes to organizational systems
- Avoiding common errors in RCA
- **Case Study:** Machine downtime analysis in a textile mill

Module 8: Corrective and Preventive Actions (CAPA)

- CAPA framework and lifecycle
- SMART corrective action planning
- Assigning responsibilities and deadlines
- Monitoring effectiveness
- Documentation and follow-up

- **Case Study:** Safety barrier failure in oil and gas facility

Module 9: Regulatory and Compliance Considerations

- OSHA, EPA, and local regulations
- Legal implications of investigations
- Confidentiality and reporting standards
- Compliance reporting systems
- Dealing with external auditors
- **Case Study:** Regulatory citation after confined space entry violation

Module 10: Reporting and Documentation

- Writing effective investigation reports
- Structuring content for clarity
- Using visuals and flow diagrams
- Ensuring accuracy and objectivity
- Version control and approvals
- **Case Study:** Fire incident report leading to procedural change

Module 11: Investigation Review and Validation

- Internal peer reviews
- Involving leadership and SMEs
- Closing the loop on actions
- Lessons learned documentation
- Continuous feedback mechanisms
- **Case Study:** Forklift collision investigated by cross-functional team

Module 12: Communicating Findings

- Audience-appropriate communication
- Creating presentations and executive summaries
- Holding debriefing sessions
- Building trust and transparency
- Using communication as a learning tool
- **Case Study:** Explosion investigation briefing to stakeholders

Module 13: Integrating Investigations into Risk Management

- Connecting incident data to risk registers
- Updating hazard identification
- Linking RCA to proactive controls
- Continuous improvement systems
- Cross-functional collaboration
- **Case Study:** Production incident linked to overlooked risk in assessment

Module 14: Digital Tools and Software for RCA

- RCA software features overview
- Integrating with EHS systems
- Automation of reports and tracking
- Role of AI and analytics
- Security and access control
- **Case Study:** Digitalization of incident logs in a logistics firm

Module 15: Leading an Investigation Team

- Leadership skills in high-stress environments
- Assigning roles and managing dynamics
- Conflict resolution during investigations
- Motivating team collaboration
- Ensuring accountability and follow-through
- **Case Study:** Complex multi-shift investigation at an aerospace plant

Training Methodology

- Interactive lectures with visual presentations
- Real-world case study analysis
- Hands-on group exercises and simulations
- Role-playing for interviews and reporting
- Use of digital tools and templates for RCA
- Pre- and post-assessment to measure learning outcomes

Register as a group from 3 participants for a Discount

Send us an email: info@fineskilltrainingcenter.org or call *+254769199797*

Certification

Upon successful completion of this training, participants will be issued with a globally- recognized certificate.

Tailor-Made Course

We also offer tailor-made courses based on your needs.

Key Notes

a. The participant must be conversant with English.

b. Upon completion of training the participant will be issued with an Authorized Training Certificate

c. Course duration is flexible and the contents can be modified to fit any number of days.

d. The course fee includes facilitation training materials, 2 coffee breaks, buffet lunch and A Certificate upon successful completion of Training.

e. One-year post-training support Consultation and Coaching provided after the course.

f. Payment should be done at least a week before commence of the training, to Fineskill Training Center account, as indicated in the invoice so as to enable us prepare better for you.

Upcoming Scheduled Sessions

Start Date	End Date	Location	Price
23 Nov 2026	04 Dec 2026	Online	$2,000
23 Nov 2026	04 Dec 2026	Physical	$3,000

Start Date	End Date	Location	Price
23 Nov 2026	04 Dec 2026	Physical	$6,000
23 Nov 2026	04 Dec 2026	Physical	$6,000
23 Nov 2026	04 Dec 2026	Physical	$12,000
23 Nov 2026	04 Dec 2026	Physical	$9,000
23 Nov 2026	04 Dec 2026	Physical	$12,000
23 Nov 2026	04 Dec 2026	Physical	$12,000

Ready to enroll or request a customized program? Book online or contact us:

Register Online Now

Email: info@fineskilltrainingcenter.com | Website: www.fineskilltrainingcenter.com