

A Guide to Accident Investigations



Introduction

The Health and Safety Executive (HSE) report that in 2010/2011 171 workers were killed at work. A further 121,430 other injuries to employees were reported under RIDDOR (Reporting of Injuries, Diseases and Dangerous Occurrences Regulations 1999).*

Preventing incidents at work plays a part in avoiding the costs of illness and accidents. However, sometimes things out of our control do go wrong. Determining the cause of workplace accidents is extremely important. It is essential that even minor accidents are reported and properly investigated so that causes are identified and control measures put in place to prevent recurrence.

This guide will show you how to investigate accidents following five simple steps. By following these, you can greatly improve your workplace safety. Unfortunately, it often takes an injury for lessons to be learned, but the event can be used to help increase the standards of health and safety at your workplace.

What is an accident?

The term **accident** can be defined as an unplanned or adverse event that interrupts the completion of an activity, and that may (or may not) include injury or property damage.

What is an incident?

An **incident** usually refers to an unexpected event that did not cause injury or damage this time but had the potential. **Near miss** or **dangerous occurrences** are also terms for an event that could have caused harm but did not.



* Ref. 18/07/2011 www.hse.gov.uk Fatal injury statistics 2010/2011 (provisional)

All accidents have a cost

These may include:

- **Legal** fines, personal convictions, enforcement notices etc.
- **Moral** pain and suffering, mental strain, loss of earnings, possible loss of life or life shortening, effect on families, outside activities, hobbies etc.
- **Financial** cost of lost time to injured persons, cost of repair/replacement of damaged property, plant and/or equipment, cost of loss or production etc.



Benefits of investigating

- Identifying the immediate, underlying and root causes allows effective measures to be implemented to prevent a recurrence
- Gain a better understanding of the risks associated with work activities
- Reduction in the number of accidents and ill health resulting in financial savings, such as insurance costs

Legal reasons for investigating

You should investigate accidents for a number of reasons:

- To ensure you are operating your business within the law.
- The Management of Health and Safety at Work Regulations 1999 requires employers to plan, organise, control, monitor and review their health and safety arrangements. Health and safety investigations form an essential part of this process.
- You are expected to make full disclosure of the circumstances of an accident to the injured parties considering civil legal action. The fear of litigation may make you think it is better not to investigate, but you can't make things better if you don't know what went wrong.

The fact that you thoroughly investigated an accident and took remedial action to prevent further accidents would demonstrate to a court that your business has a positive attitude to health and safety. Your investigation findings will also provide essential information for your insurers in the event of a claim.

Who should carry out the investigation?

For an investigation to be worthwhile, it is essential that the management and the workforce are fully involved. Depending on the level of the investigation (and the size of your business), the following may all be involved:



- supervisors
- line managers
- health and safety professionals
- union safety representatives
- employee representatives
- senior management/directors

This joint approach will ensure that a wide range of practical knowledge and experience will all contribute towards the investigation. Employees and their representatives will feel empowered and supportive of any remedial measures that are necessary. A joint approach also reinforces the message that the investigation is for the benefit of everyone.

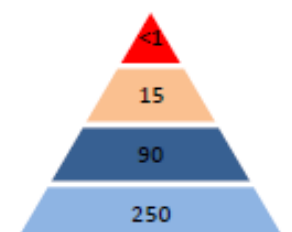
Level of investigation

How much effort to devote to an investigation

	MINOR	SERIOUS	MAJOR	FATAL
RARE	MINIMAL	LOW	MEDIUM	HIGH
UNLIKELY	MINIMAL	LOW	MEDIUM	HIGH
POSSIBLE	LOW	MEDIUM	HIGH	HIGH
LIKELY	LOW	MEDIUM	HIGH	HIGH
CERTAIN	LOW	MEDIUM	HIGH	HIGH

Balance the effort expended against the potential benefits. Consider

- **LIKELIHOOD** that the event will happen again
- Likely **WORSE CONSEQUENCE** if it does



How deep should the investigation drill?

LEVEL	WHO	IMMEDIATE Premises, plant & substances, procedures, people	UNDERLYING Planning, risk assessment	UNDERLYING Organisation, monitoring, review	ROOT Policy issues, resource allocation
MINIMAL	DEPARTMENT	YES	MAYBE		
LOW	DEPARTMENT	YES	YES	MAYBE	
MEDIUM	H+S TEAM	YES	YES	YES	MAYBE
HIGH	H+S TEAM / DEPARTMENT	YES	YES	YES	YES

- It is important that accident investigations are clearly delegated
- It is important to set some boundary's on an investigation – otherwise investigations can drag on forever and expand to examine everything in minute detail – for little benefit

When should it start?

The urgency of an investigation will depend on the risks involved (e.g. a major accident involving an everyday job will need to be investigated quickly). In general, adverse events should be investigated and analysed as soon as possible. This is not simply good practice; it is common sense - memory is best and motivation greatest immediately after an adverse event.

The Five Stages of an Accident Investigation

1. **Reporting**
2. **Gathering information**
3. **Analysing information**
4. **Identifying risk control measures**
5. **Action planning and implementing**

1. Reporting

After an accident occurs, it is important that it is recorded and reported speedily. In most cases, accidents only need to be reported internally, i.e. kept within your company or organisation.

However, there are certain types of accidents that need to be reported to the HSE, or the Local Authority. These are listed in RIDDOR (the Reporting of Injuries, Diseases and Dangerous Occurrences Regulations 1995) which is a law requiring employers to report certain accidents by telephone or via the internet.

For further information on reporting accidents visit www.hse.gov.uk/riddor

2. Gathering Information

The next step is to gather information about the accident and about the events that led up to it. Gathering witness statements or carrying out interviews with people who were injured or involved is essential.

Describe and determine who the people involved were and what action they took. Interviews may also need to be conducted with people who supervise the area where the accident occurred. Drawings and photographs are a good way of recording the scene of the accident, but are not essential.

Find out about the sequence of events that led up to the accident. It is essential for anyone who investigates an accident to fully understand the sequence of events. An accident often occurs, not because of the immediate thing that went wrong, but because of something much earlier going wrong.



For example, falls from a ladder may be due to incorrect ladder selection or usage, incorrect positioning of the ladder, failure of the ladder, or a combination of these factors.

Some of the things to consider during the information gathering stage are:

- What happened?
- Who was involved?
- What was the nature of the work being carried out?
- Was equipment being used at the time? If so, was it properly maintained?
- Where on the premise did the accident happen?

- What were the weather conditions at the time?
- Were procedures being followed at the time? If not, copies of those procedures should be looked at.
- Was the worker experienced on the job?
- What was the injured person actually doing at the time of the accident and immediately before the accident?
- What personal protective equipment was being worn at the time of the accident?
- What was the injury and how did it occur?
- Were any first aid measures taken and, if so, by whom?
- Who was the site supervisor?
- Were there any witnesses?

3. Analysing the Information

Once information has been gathered, it should be examined carefully. This is the stage when you can begin to piece together the sequence of events and start to understand why the incident occurred and, more importantly, the underlying reasons for the accident.

You need to establish the causes of the accident. These can be classed as:

- **Immediate causes**, for example the dust, or blade or substance
- **Underlying causes**, for example unsafe acts and unsafe conditions including the ventilation switched off or the guard removed
- **Root causes**, an initiating event or failing from which all other causes or failings spring. Root causes are generally management, planning or organisational failings (lack of training, inadequate funding made available for maintenance etc)

To prevent accidents, you need to provide effective risk control measures which address the immediate, underlying and root causes.

4. Identifying Risk Control Measures

There are hazards in all workplaces; risk control measures are the workplace precautions put in place to reduce the risks to an acceptable level to prevent accidents and cases of ill health.

The fact that an adverse event has occurred suggests that the existing risk control measures were inadequate.

After the accident has been examined and the root causes have been identified, control measures can be identified that will 'cut off the root'. Control measures can include: staff refresher training;

providing personal protective equipment; implementing simple procedures for doing the job; providing better equipment and improved maintenance etc.

As an employer, you must assess and manage health and safety risks - whether you are a big business, a small business or just a one-person operation.

A risk assessment is an important tool in protecting your workers and your business. It helps you focus on those risks that have the potential to cause harm. Most of these can be readily controlled by straightforward measures.

5. Action Planning and Implementing

The final stage of the accident investigation is to ensure that a plan is put together for implementing the control measures that have been identified.

You should:

- Provide an action plan with SMART objectives (Specific, Measurable, Agreed, Realistic and Time scaled).
- Ensure that the action plan deals effectively not only with the immediate and underlying causes, but also the root causes.
- Check and review your risk assessments
- Include lessons that may be applied to prevent other adverse events, e.g. is there a training need which can be applied in other areas of the organisation?
- Provide feedback to all parties involved ensuring the findings and recommendations are correct, address the issues and are realistic. You must also inform them of the results of your investigation.

Carrying out your own health and safety investigations will provide you with a deeper understanding of the risks associated with your work activities.

Remember learning lessons from incidents and an accident is vital to reduce losses to your business.

