

Health and Safety at Work



This course book looks at why it's important to manage health and safety in the workplace and the effective processes required. Common workplace hazards and controls are discussed, as well as understanding why incidents happen and how to investigate them.

The content follows the syllabus for the *NEBOSH Health and Safety at Work Award* qualification and can be used as part of your studies. Even if you are not studying the *NEBOSH Health and Safety*

at Work Award, this book is an invaluable reference source and practical guide for those putting health and safety principles into practice at work.

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A man wearing safety glasses and a headlamp, looking down at a document. The image is in black and white with a purple tint. The man is wearing a headlamp on his forehead and safety glasses. He is looking down at a document or a piece of paper. The background is blurred. There are some geometric shapes in the bottom right corner, including a large purple triangle and a white triangle.

Element 3

Stopping incidents and ill-health before they happen

3.1 Inspecting the workplace

3.2 Risk assessment theory

Example – The need to know something about the risk

A worker was injured when he was cleaning a machine in a factory. The factory manager had carried out the risk assessment for this task. But the manager didn't really know how the machine operated; he hadn't noticed that

some of the safety guards and interlocks were missing or didn't work properly when he did the risk assessment. He hadn't been trained on how to complete the company risk assessment form either.



3.1 Inspecting the workplace

Using checklists

Inspections are an important method of checking, they include inspections using checklists, safety sampling or a simple walk round, looking at escape routes and housekeeping.

You can use a checklist to help you inspect a workplace or a piece of equipment. A checklist could be created by looking at where previous incidents have occurred or, by spotting a trend

in reported incidents, you may focus a checklist in that key area. It's also good to create a plan for carrying out inspections so you don't just do them once. This can also indicate which part of the workplace or piece of equipment you'll be inspecting.

Here is an example of an inspection checklist (this is based on the 'Sample Checklist for Offices' from the Canadian Centre for Occupational Health and Safety):

Inspectors:	Date:		
	Location	Condition	Comments
Floors			
Is there loose material, debris, worn carpeting?			
Are the floors slippery, oily or wet?			
Stairways and Aisles			
Are they clear and unblocked?			
Are stairways well lit?			
Are handrails, handholds in place?			
Are the aisles marked and visible?			
Equipment			
Are guards, screens and sound-dampening devices in place and effective?			
Is the furniture in good repair and safe to use? Look for:			
- chairs that are in poor repair			
- sharp edges on desks and cabinets			
- poor ergonomics (keyboard elevation, chair adjustment, desk height)			
- crowding			

There are advantages and disadvantages to using a checklist when doing an inspection.

Advantages:

- consistency between inspections, looking at the same things every time;
- knowing what you should be looking at before you begin the inspection; and
- not 'forgetting' any parts or miss anything out.

Disadvantages:

- something could be missed because it wasn't on the list; and
- could become a 'box-ticking' task if you get too used to what is on the list.

Talking to people

Interviewing or talking with workers (perhaps during an inspection) is a very effective way of checking:

- what workers know about the processes they are following; and
- how they feel about them, for example if they feel that they create a safe working environment.

Workers who are involved in the development and improvement of processes are more likely to understand and follow them.

Activity 9

Think about how risk assessments are done in your organisation. Do you think the people who do the risk assessments know enough about the risks they are assessing? Do you think the right people are involved in the risk assessment process?



Risk assessment depends on people who know what to look for. They need to be familiar with the activity, equipment or situation being assessed. Sometimes this might involve a small team of people with different skills. But, if you don't know what to look for, you can easily miss significant hazards and, because you don't know they exist, do nothing to control them.

3.2 Risk assessment theory

What 'hazard', 'risk' and 'risk assessment' really mean

We assess risks throughout our day, often without thinking about it. For example, driving quickly across a busy junction. In this element, we look at a systematic approach to risk assessment. Here are some of the terms we use in this element, and what we mean by them.

Hazards always exist to some degree in the workplace. The risks arising from a hazard can be controlled so that the likelihood of harm is reduced to an acceptable level, or sometimes eliminated completely. A risk assessment is the first key step in achieving this.

Study question 16

What is a hazard?

Select ONE answer.

- a. The likelihood of something causing harm.
- b. Something that has the potential to cause harm or damage.
- c. Anything in the work environment.
- d. The severity of an injury.



Key terms

Hazard

Anything that has the potential to cause harm or damage – this could be an object, an activity, or even a situation or a combination of these.

Hazards are often described either by referring to the type of harm or effect they lead to (eg, mechanical machinery hazards such as crushing, entanglement or even slips, trips or falls) or by the hazard origin or source (eg, electrical or noise).

Risk

The likelihood that a hazard will cause harm combined with how severe the harm could be.

Risk assessment

The process of recognising hazards, deciding if the risks are acceptable, and seeing what can be done to make things safer.

Control measure

Anything that you do or put in place that eliminates or reduces the risk of harm or damage.



Why we do risk assessments

The aim of a risk assessment is to make sure that no one suffers harm as a result of workplace activities. To do that, we need to look for things that might cause harm and decide what to do about them. A risk assessment is a systematic way of doing this, so that we don't miss anything important. It helps us make decisions about whether we are doing enough in the workplace to control risks or whether we need to do more. It's important to use it correctly – it should help us make decisions – and it shouldn't be used in reverse (to justify a decision that we have already made!).

Study question 17

Which work activities may require a specific risk assessment?



Select ONE answer.

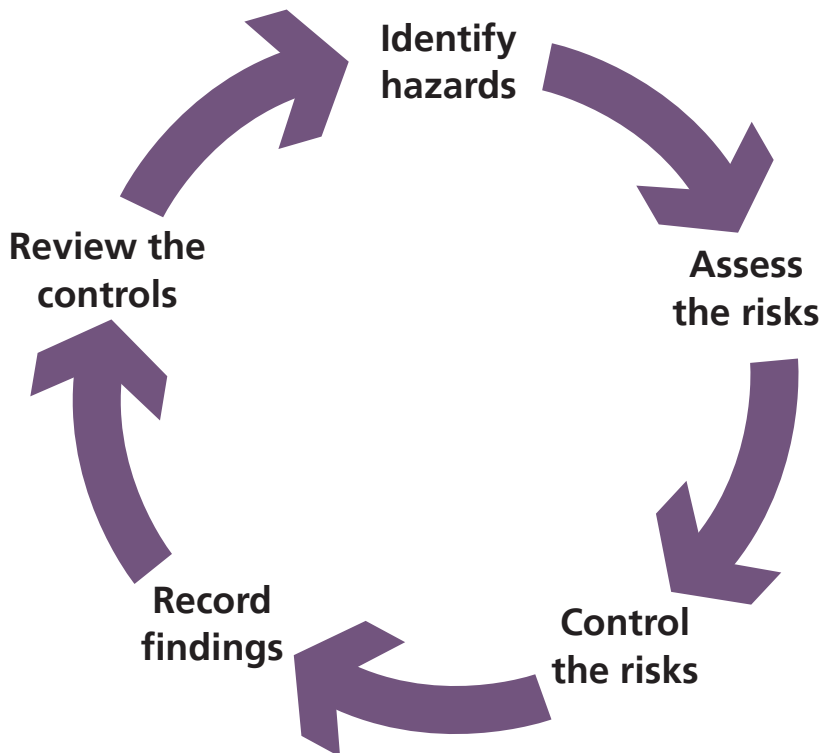
- a. Using a brush.
- b. Manual handling.
- c. The use of hazardous substances.
- d. Driving.

How you do risk assessment

The process of risk assessment is not difficult. It's about us figuring out what might potentially go wrong, and what we need to put in place to stop or minimise the chance of this happening.

Although there are no fixed rules about how a risk assessment is conducted, it is important to take a structured approach so that all relevant risks from hazards are addressed. The leaflet *Risk assessment – A brief guide to controlling risks in the workplace*, issued by the British Health and Safety Executive (HSE), sets out a good framework for the process. The guide, called 'INDG163', can be downloaded from the HSE website (www.hse.gov.uk).

Steps needed to manage risk



How to identify hazards

It's important to look at all hazards in the workplace to identify the most important ones.

Look at all aspects of work, including:

- the way in which the work is carried out;
- the way it is organised;
- the substances and/or equipment used; and
- think about what harm can be caused.

Some hazards are obvious – if you are climbing up and down ladders, you can slip or fall and injure yourself.

Occasionally the hazards are less obvious, particularly where a normally safe activity or situation is only hazardous sometimes. For example, faulty equipment (electrical equipment with damaged wiring may cause shocks or burns) or a specific scenario (a spillage would make walking across a floor hazardous).

So, you need to think not only about routine/ everyday activities, but also occasional or non-routine activities such as maintenance work,

loading and unloading of deliveries from vehicles, or changes in production cycles. Interruptions to the work activity can also be a common cause of accidents.

There are many ways of identifying such hazards, such as:

- Instructions from manufacturers and suppliers (eg written in the equipment user manual or chemical safety data sheet).
- Official guidance/law – not only from the health and safety regulator but also industry professional bodies. They will point out typical hazards in different types of businesses and activities.
- Records of past incidents (accidents, ill health, near miss) in your workplace. This will tell you how people can be harmed.
- Talking to people who actually do the job (as well as relying on your own expertise).

To help you look at hazards systematically, people often use hazard checklists (compiled from the above sources). These can prompt you as you inspect the workplace or analyse each step of a job or task.

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