1 Issues Related to the Safety Performance of the UK Construction Industry

In the late 1990s the Egan report *Rethinking Construction* (1998) stated that ‘the health and safety record of construction is the second worst of any industry’. Further the report suggested that ‘accidents can account for 4 to 6 per cent of total project costs’.

Since the early 1990s, changes in safety management legislation and practice have been accompanied by a steady improvement in the safety performance statistics of the UK construction industry. This chapter explores the safety performance record of the UK construction industry since the Egan Report (1998) and introduces the reader to ‘reportable injuries’, the Health and Safety Executive and the meaningful evaluation of safety performance statistics.

Learning objectives

By the end of this chapter the reader will be able to understand and evaluate:

- The statistical safety performance record of the UK construction industry
- The types of accident that occur within the UK construction industry
- The RIDDOR requirements to report and record accidents, dangerous occurrences and work-related disease
- The comparative health and safety record of employed and self-employed people within the UK construction industry with regard to reported over-3-day injuries, major injuries and fatalities

Introduction

The UK construction industry is a significant industry in many respects. In terms of its size of workforce, it employs some 2.1 million people and accounts for around 9% of the total employment within the UK. In terms of output, the UK construction industry has, in recent years, had an annual turnover in excess of £150 billion.
When considering the wider European construction industry, the economic performance of the UK construction sector compares favourably. The UK has the second largest construction sector annual turnover within Europe, with a steady track record of year-on-year growth. Table 1.1 provides a comparative overview of the economic turnover of the construction sectors of 12 European nations. It also indicates the UK’s growth in turnover for the 5-year period 2001–2005.

### Table 1.1  Annual turnover of European construction sectors (millions of Euros (to nearest 50 million)). Based on statistics from Eurostats.

<table>
<thead>
<tr>
<th></th>
<th>2001</th>
<th>2002</th>
<th>2003</th>
<th>2004</th>
<th>2005</th>
</tr>
</thead>
<tbody>
<tr>
<td>Belgium</td>
<td>1 800</td>
<td>1 950</td>
<td>2 100</td>
<td>2 900</td>
<td>4 000</td>
</tr>
<tr>
<td>France</td>
<td>144 800</td>
<td>148 550</td>
<td>156 150</td>
<td>169 000</td>
<td>178 900</td>
</tr>
<tr>
<td>Germany</td>
<td>168 900</td>
<td>157 000</td>
<td>147 600</td>
<td>142 400</td>
<td>137 350</td>
</tr>
<tr>
<td>Ireland</td>
<td>7 600</td>
<td>8 850</td>
<td>10 300</td>
<td>12 250</td>
<td>14 550</td>
</tr>
<tr>
<td>Italy</td>
<td>143 750</td>
<td>155 900</td>
<td>152 150</td>
<td>186 350</td>
<td>197 100</td>
</tr>
<tr>
<td>Netherlands</td>
<td>70 400</td>
<td>68 800</td>
<td>67 600</td>
<td>66 550</td>
<td>69 850</td>
</tr>
<tr>
<td>Poland</td>
<td>25 800</td>
<td>24 300</td>
<td>20 150</td>
<td>21 000</td>
<td>27 100</td>
</tr>
<tr>
<td>Portugal</td>
<td>1 200</td>
<td>1 150</td>
<td>1 250</td>
<td>1 500</td>
<td>1 200</td>
</tr>
<tr>
<td>Romania</td>
<td>4 700</td>
<td>5 250</td>
<td>5 700</td>
<td>6 950</td>
<td>8 800</td>
</tr>
<tr>
<td>Sweden</td>
<td>27 800</td>
<td>29 400</td>
<td>29 650</td>
<td>30 950</td>
<td>33 250</td>
</tr>
<tr>
<td>Spain</td>
<td>142 600</td>
<td>179 850</td>
<td>204 300</td>
<td>218 450</td>
<td>256 000</td>
</tr>
<tr>
<td>UK</td>
<td>210 850</td>
<td>226 550</td>
<td>220 250</td>
<td>234 050</td>
<td>244 700</td>
</tr>
</tbody>
</table>

When considering the wider European construction industry, the economic performance of the UK construction sector compares favourably. The UK has the second largest construction sector annual turnover within Europe, with a steady track record of year-on-year growth. Table 1.1 provides a comparative overview of the economic turnover of the construction sectors of 12 European nations. It also indicates the UK’s growth in turnover for the 5-year period 2001–2005.

### Safety performance

The UK construction industry is successful in many respects, but with regard to safety it still faces numerous challenges on its journey to continuously improve its performance record whilst delivering increased volume and complex construction projects.

The safety performance of an industry is often expressed and evaluated in terms of its ‘record’ of safety incidents or ill health. Such records are compendiums of reported failure and reflect negative outcomes and incidents. That is not to say that such records do not have their value – indeed they most certainly do. Such records can be categorised, analysed and evaluated in order to identify common fail-
ings and thus inform the possible development of regulations, educational campaigns and practice guides. This can be very valuable at an industry-wide level. It is important not to get carried away with the belief that records of reported safety failings and ill health are sufficient measures of safety performance in themselves. They reflect an historical catalogue of failings, with many reasons and causes contributing to such failings. They do not reflect or evaluate current effectiveness of management provision or the current application of safety control measures and health monitoring within an organisation. Indeed there is no single, entirely satisfactory measure of health and safety performance. It is important to bear this in mind when considering accident and ill health records. Furthermore the potential for the under-reporting of accidents and ill health must be appreciated when considering statistical performance records.

Supporting health and safety success in UK industries – the HSC and the HSE

The health and safety performance of UK industry is greatly assisted, guided and informed by the Health and Safety Commission (HSC) and the Health and Safety Executive (HSE). These organisations were established in the mid 1970s by the Health and Safety etc. Act 1974. The HSC and the HSE serve to promote awareness of health and safety, to provide advice and guidance to individuals and organisations, to enforce legislation and regulations and to advise and participate in the development of regulations. The HSE’s website reports that: ‘Britain’s Health and Safety Commission (HSC) and the Health and Safety Executive (HSE) are responsible for the regulation of almost all the risks to health and safety arising from work activity in Britain’ and that ‘HSE’s job is to help the Health and Safety Commission ensure that risks to people’s health and safety from work activities are properly controlled’.

The reporting and recording of injuries, diseases and dangerous occurrences

Importantly the HSC and HSE undertake to record and monitor UK construction industry health and safety statistics – The Reporting of Injuries, Diseases and Dangerous Occurrences Regulations 1995 (RIDDOR) makes it a legal requirement to report construction industry injuries, dangerous occurrences and work-related diseases to the HSE.
1 April 1996 saw the introduction of RIDDOR and the revising of health and safety reporting requirements for UK industries. The changes affected accident statistics for 1995–1996 and subsequent years. As such the HSE (1999) clarified changes to the reporting of statistics such that the term ‘accident’

*now includes acts of violence at work, and acts of suicide or trespass on railways or other transport systems.*

The list of reportable major injuries has also changed to include a wider range of fractures and amputations and certain dislocations. The reporting of non-fatal injuries suffered by members of the public was also expanded to include incidents when a person is taken from an accident to a hospital, rather than simply being reported if it is on the list of reportable major injuries contained within Schedule 1 of the regulations.

The introduction of RIDDOR and the reporting changes brought about must be considered when undertaking any comparison or evaluation of UK safety performance records pre and post 1996.

**Reportable injuries**

Injuries reportable to the HSE under RIDDOR are subdivided into three categories:

- Over-3-day injuries, as suggested by the name, are those that lead to a worker’s absence from work for more than 3 days and must be reported to the HSE within 10 days
- Major injuries – those that may involve fractures, amputations, dislocations and others that may lead to 24 hours in a hospital. These must be reported without delay
- Fatal injuries – those resulting in death. These must also be reported without delay

Further to these three categories of reportable injuries, construction employers are also required to report to the HSE any dangerous occurrences or near misses that have happened, and any cases of work-related disease notified to them by an employee’s doctor. RIDDOR detail the specific nature of what constitutes a ‘reportable’ injury, disease or occurrence.

**Major injuries**

Schedule 1 of RIDDOR defines ‘major injuries’ as:

1. Any fracture, other than to the fingers, thumbs or toes
2. Any amputation
3. Dislocation of the shoulder, hip, knee or spine
4. Loss of sight (whether temporary or permanent)
5. A chemical or hot metal burn to the eye or any penetrating injury to the eye
6. Any injury resulting from an electric shock or electrical burn (including any electrical burn caused by arcing or arcing products) leading to unconsciousness or requiring resuscitation or admittance to hospital for more than 24 hours
7. Any other injury:
   a. Leading to hypothermia, heat-induced illness or to unconsciousness
   b. Requiring resuscitation
   c. Requiring admittance to hospital for more than 24 hours
8. Loss of consciousness caused by asphyxia or by exposure to a harmful substance or biological agent
9. Either of the following conditions which result from the absorption of any substance by inhalation, ingestion or through the skin:
   a. Acute illness requiring medical treatment
   b. Loss of consciousness
10. Acute illness which requires medical treatment where there is reason to believe that this resulted from exposure to a biological agent or its toxins or infected material

**Dangerous occurrences**

Schedule 2 of RIDDOR details ‘dangerous occurrences’ that are required to be reported. The schedule details such occurrences with specific regard to five sectors of workplace, these being ‘general’, ‘mines’, ‘quarries’, ‘transport systems’ and ‘off shore’ workplaces. The schedule details a number of occurrences that are particularly pertinent to the construction workplace. These occurrences are prescribed in 13 categories as follows:

1. **Lifting machinery.** The collapse of, the overturning of, or the failure of any load-bearing part of any:
   a. Lift or hoist
   b. Crane or derrick
   c. Mobile powered access platform
   d. Access cradle or window-cleaning cradle
   e. Excavator
   f. Pile-driving frame or rig having an overall height, when operating, of more than 7 m
   g. Fork lift truck
2. **Pressure systems.** The failure of any closed vessel (including a boiler or boiler tube) or of any associated pipework, in which the internal pressure was above or below atmospheric pressure, where the failure has the potential to cause the death of any person.

3. **Overhead electric lines.** Any unintentional incident in which plant or equipment either:
   a. Comes into contact with an uninsulated overhead electric line in which the voltage exceeds 200 volts; or
   b. Causes an electrical discharge from such an electric line by coming into close proximity to it

4. **Electrical short circuit.** Electrical short circuit or overload attended by fire or explosion which results in the stoppage of the plant involved for more than 24 hours or which has the potential to cause the death of any person

5. **Explosives.** Any of the following incidents involving explosives:
   a. The unintentional explosion or ignition of explosives other than one:
      i. Caused by the unintentional discharge of a weapon where, apart from that unintentional discharge, the weapon and explosives functioned as they were designed to do; or
      ii. Where a fail-safe device or safe system of work functioned so as to prevent any person from being injured in consequence of the explosion or ignition
   b. A misfire (other than one at a mine or quarry or inside a well or one involving a weapon) except where a fail-safe device or safe system of work functioned so as to prevent any person from being endangered in consequence of the misfire
   c. The failure of the shots in any demolition operation to cause the intended extent of collapse or direction of fall of a building or structure
   d. The projection of material (other than at a quarry) beyond the boundary of the site on which the explosives are being used or beyond the danger zone in circumstances such that any person was or might have been injured thereby
   e. Any injury to a person (other than at a mine or quarry or one otherwise reportable under these Regulations) involving first-aid or medical treatment resulting from the explosion or discharge of any explosives or detonator

6. **Biological agents.** This includes any accident or incident which resulted or could have resulted in the release or escape of a biological agent likely to cause severe human infection or illness.
7. **Breathing apparatus.**
   a. Any incident in which breathing apparatus malfunctions:
      i. While in use; or
      ii. During testing immediately prior to use in such a way that had the malfunction occurred while the apparatus was in use it would have posed a danger to the health or safety of the user
   b. This paragraph shall not apply to breathing apparatus while it is being:
      i. Used in a mine; or
      ii. Maintained or tested as part of a routine maintenance procedure

8. **Collapse of scaffolding.** The complete or partial collapse of:
   a. Any scaffold which is:
      i. More than 5 m in height which results in a substantial part of the scaffold falling or overturning; or
      ii. Erected over or adjacent to water in circumstances such that there would be a risk of drowning to a person falling from the scaffold into the water; or
   b. The suspension arrangements (including any outrigger) of any slung or suspended scaffold which causes a working platform or cradle to fall

9. **Pipelines or pipeline works.** The following incidents in respect of a pipeline or pipeline works:
   a. The uncontrolled or accidental escape of anything from, or inrush of anything into, a pipeline which has the potential to cause the death of, major injury or damage to the health of any person or which results in the pipeline being shut down for more than 24 hours
   b. The unintentional ignition of anything in a pipeline or of anything which, immediately before it was ignited, was in a pipeline
   c. Any damage to any part of a pipeline which has the potential to cause the death of, major injury or damage to the health of any person or which results in the pipeline being shut down for more than 24 hours
   d. Any substantial and unintentional change in the position of a pipeline requiring immediate attention to safeguard the integrity or safety of a pipeline
   e. Any unintentional change in the subsoil or seabed in the vicinity of a pipeline which has the potential to affect the integrity or safety of a pipeline
   f. Any failure of any pipeline isolation device, equipment or system which has the potential to cause the death of, major
injury or damage to the health of any person or which results in the pipeline being shut down for more than 24 hours; or

g. Any failure of equipment involved with pipeline works which has the potential to cause the death of, major injury or damage to the health of any person

10. **Collapse of building or structure.** Any unintended collapse or partial collapse of:
   a. Any building or structure (whether above or below ground) under construction, reconstruction, alteration or demolition which involves a fall of more than 5 tonnes of material
   b. Any floor or wall of any building (whether above or below ground) used as a place of work; or
   c. Any false-work

11. **Explosion or fire.** An explosion or fire occurring in any plant or premises which results in the stoppage of that plant or, as the case may be, the suspension of normal work in those premises for more than 24 hours, where the explosion or fire was due to the ignition of any material

12. **Escape of flammable substances.** The sudden, uncontrolled release:
    a. inside a building:
       i. Of 100 kg or more of a flammable liquid
       ii. Of 10 kg or more of a flammable liquid at a temperature above its normal boiling point
       iii. Of 10 kg or more of a flammable gas
    b. in the open air, of 500 kg or more of any of the substances referred to in sub-paragraph (a) above

13. **Escape of substances.** The accidental release or escape of any substance in a quantity sufficient to cause the death, major injury or any other damage to the health of any person

**Reportable diseases**

With regard to diseases that are reportable from people working on shore, 47 diseases are identified within the list of schedule 3 of RIDDOR. There are 25 additional for off-shore work. In instances where these occur, medical doctors are required to notify employers of their occurrence.

**Employers’ responsibility to record reportable occurrences**

In the event of there being a reportable injury, disease or dangerous occurrence, employers must ensure that records are kept and main-
tained for a minimum of 3 years. Such employer records are required by RIDDOR to contain the following details and particulars:

1. The date and time of the accident or dangerous occurrence
2. If an accident occurred and it was to a person who was at work then the following details must be recorded:
   i. The full name of injured person
   ii. Their occupation
   iii. The nature of the injury
3. If an accident occurred and was suffered by a person not at work, the following details must be recorded:
   i. Their full name
   ii. Their status (were they a ‘visitor’ or ‘passer by’ for example)
   iii. The nature of the injury
4. The location where the accident or occurrence took place
5. A concise description of the circumstances regarding the accident or dangerous occurrence
6. The date on which the event was first reported to the enforcing authority
7. The method by which the event was reported to the enforcing authority

**Standardisation of reported accident statistics**

The data gathered from reported accidents, occurrences or diseases, be it concerning over-3-day injuries, major injuries or fatalities, benefits from being ‘standardised’ so as to provide a useful and worthwhile tool for monitoring and evaluating the industry’s historical safety performance. Absolute rates of accidents and ill health make for poor year-on-year comparison. For data to be more meaningful it is standardised so that rates indicate incidents ‘per 100 000 workers’. As such, an industry’s performance can be consistently evaluated year on year regardless of fluctuations in workload and workforce volume. Standardised accident rates also enable the application of valid transferability when comparing the performance of differing industries in common terms of ‘injuries per 100 000 workers’.

When a series of annual accident statistics is considered, this can assist in identifying ‘trends’. Such trends might relate to the types and frequency of particular accidents and comparison of the accident rates for different trades and professions. The application of ‘trend analysis’ of accident statistics serves not only as an academic exercise but can readily contribute to identifying the need for specific new safety
management campaigns, developed guidance, enforcement action and even new policy or legislation. Thus the feedback of statistical analysis becomes feed forward of information leading to the enhancement of health and safety for all concerned.

Exploring the safety record of the UK construction industry

Details of the UK construction industry’s health and safety performance records are provided in Tables 1.2, 1.3, 1.4, 1.5, 1.6 and 1.7. These tables outline, for a 10-year period 1997–2007, the actual number of reported injuries and fatalities. They also present incident rates standardised per 100,000 workers for over-3-day injuries, major injuries and fatalities.

Annual rates of incidents per 100,000 workers are presented for both employed and self-employed persons, and for both the construction industry sector and all other industries. These enable an interesting comparative analysis to be undertaken, which proves to be most informative. Such a study could further include a comparison of the year-on-year record of construction industry employees and self-employed persons; a year-on-year comparison of the construction industry’s contribution to the all industry rates; and consideration of the differences and similarities in the accident rate trends with regard to reported over-3-day injuries, major injuries and fatalities.

Table 1.2 presents over-3-day injuries reported for the construction industry employees and self-employed between 1997 and 2007. Table 1.3 shows the incidence rate per 100,000 workers for over-3-day injuries reported between 1997 and 2007. This details both the construction industry and all industry rates and is illustrated graphically in Figure 1.1. From Figure 1.1 it can be seen that the rates of reported over-3-day injuries for both employed and self-employed construction workers are both higher than the corresponding all industry rates. Whilst the construction industry self-employed rate has not declined, it has stayed relatively stable over the 10-year period, the same cannot be said of the construction industry employee rate. This has encouragingly declined by over 42% and can be seen to be beginning to converge with the all industry rate for employees.

Table 1.4 details non-fatal major injuries reported for construction industry employees and self-employed between 1997 and 2007. This is graphically illustrated in Figure 1.2. Table 1.5 presents the incidence rate per 100,000 workers for non-fatal major injuries between 1997 and 2007 and contains details of both construction industry and all industry rates. These rates are illustrated for employed and self-
Table 1.2  Over-3-day injuries reported for the construction industry 1997–2007. Based on HSC statistics.

<table>
<thead>
<tr>
<th>Year</th>
<th>Employees</th>
<th>Self-employed</th>
</tr>
</thead>
<tbody>
<tr>
<td>97/98</td>
<td>9,756</td>
<td>509</td>
</tr>
<tr>
<td>98/99</td>
<td>9,195</td>
<td>381</td>
</tr>
<tr>
<td>99/00</td>
<td>10,159</td>
<td>345</td>
</tr>
<tr>
<td>00/01</td>
<td>9,367</td>
<td>429</td>
</tr>
<tr>
<td>01/02</td>
<td>9,100</td>
<td>595</td>
</tr>
<tr>
<td>02/03</td>
<td>8,949</td>
<td>629</td>
</tr>
<tr>
<td>03/04</td>
<td>8,256</td>
<td>739</td>
</tr>
<tr>
<td>04/05</td>
<td>7,540</td>
<td>748</td>
</tr>
<tr>
<td>05/06</td>
<td>7,555</td>
<td>829</td>
</tr>
<tr>
<td>06/07</td>
<td>7,108</td>
<td>749</td>
</tr>
</tbody>
</table>

Table 1.3  Incidence rate per 100,000 workers for over-3-day injuries reported for the construction industry 1997–2007. Based on HSC statistics.

<table>
<thead>
<tr>
<th>Year</th>
<th>Employees</th>
<th>Self-employed</th>
<th>All industries in UK</th>
<th>Employed</th>
<th>Self-employed</th>
</tr>
</thead>
<tbody>
<tr>
<td>97/98</td>
<td>966.3</td>
<td>71.4</td>
<td>589.2</td>
<td>28.1</td>
<td></td>
</tr>
<tr>
<td>98/99</td>
<td>863.4</td>
<td>58.7</td>
<td>567.3</td>
<td>25.2</td>
<td></td>
</tr>
<tr>
<td>99/00</td>
<td>917.0</td>
<td>54.9</td>
<td>550.9</td>
<td>21.8</td>
<td></td>
</tr>
<tr>
<td>00/01</td>
<td>829.2</td>
<td>66.4</td>
<td>536.9</td>
<td>21.8</td>
<td></td>
</tr>
<tr>
<td>01/02</td>
<td>799.1</td>
<td>87.6</td>
<td>513.5</td>
<td>27.5</td>
<td></td>
</tr>
<tr>
<td>02/03</td>
<td>788</td>
<td>90.4</td>
<td>506.5</td>
<td>28.4</td>
<td></td>
</tr>
<tr>
<td>03/04</td>
<td>680</td>
<td>96.3</td>
<td>514.2</td>
<td>29.5</td>
<td></td>
</tr>
<tr>
<td>04/05</td>
<td>654.1</td>
<td>92.2</td>
<td>471.7</td>
<td>30.2</td>
<td></td>
</tr>
<tr>
<td>05/06</td>
<td>627.6</td>
<td>101.6</td>
<td>454.7</td>
<td>31.9</td>
<td></td>
</tr>
<tr>
<td>06/07</td>
<td>565.9</td>
<td>92.5</td>
<td>428.1</td>
<td>29.3</td>
<td></td>
</tr>
</tbody>
</table>
Figure 1.1 Incident rate for over-3-day injuries. Based on HSC statistics.

Table 1.4 Non-fatal major injuries reported for the construction industry 1997–2007. Based on HSC statistics.

<table>
<thead>
<tr>
<th>Year</th>
<th>Employees</th>
<th>Self-employed</th>
</tr>
</thead>
<tbody>
<tr>
<td>97/98</td>
<td>3860</td>
<td>466</td>
</tr>
<tr>
<td>98/99</td>
<td>4289</td>
<td>367</td>
</tr>
<tr>
<td>99/00</td>
<td>4386</td>
<td>363</td>
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<td>00/01</td>
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<td>405</td>
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<td>01/02</td>
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<td>540</td>
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<tr>
<td>02/03</td>
<td>4031</td>
<td>690</td>
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<tr>
<td>03/04</td>
<td>3978</td>
<td>750</td>
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<tr>
<td>04/05</td>
<td>3768</td>
<td>728</td>
</tr>
<tr>
<td>05/06</td>
<td>3706</td>
<td>766</td>
</tr>
<tr>
<td>06/07</td>
<td>3711</td>
<td>719</td>
</tr>
</tbody>
</table>

employed persons in Figure 1.3. From Figure 1.3 it can be seen that both of the construction industry annual rates for non-fatal major injuries are running at approximately treble the corresponding employed and self-employed rates of all industries. The 10-year period has seen the self-employed incident rate increase by some 40%, albeit approximately in line with the corresponding all industry rate. Also in line with the corresponding all industry incidence rate the construction
industry non-fatal major injury rate for employees has fallen by some 25%.

Table 1.6 details the number of fatal injuries reported for the construction industry and all industries for the 10-year period 1997–2007. Figure 1.4 presents this information in the form of a bar chart. A mean
average of 1.06 fatalities per week has been recorded for construction industry employees over the 10-year period. For the same period a mean average of 0.39 fatalities per week has been recorded for self-employed persons within the construction industry, equating to roughly two deaths every 5 weeks for the 10-year period.
Table 1.7 presents the incidence rate per 100,000 workers for fatal injuries for the period 1997–2007. Figure 1.5 illustrates these rates for both all industries and the construction industry. Each is subdivided into employed and self-employed person rates. Construction industry rates are consistently significantly higher than the all industry rates,
with the rate for construction employees remaining the worst rate throughout the entire period, though in recent years it has declined to around four fatalities per 100,000 workers.

Employees and the self-employed are not the only people who suffer death as a result of workplace-related accidents. The annual records presented in Table 1.8 and Figure 1.6 indicate that on average

**Table 1.8  Fatal injuries to members of the public 1997–2007. Based on HSC statistics.**

<table>
<thead>
<tr>
<th>Year</th>
<th>Construction industry</th>
<th>All industries</th>
<th>Construction as a % of all industries</th>
</tr>
</thead>
<tbody>
<tr>
<td>97/98</td>
<td>6</td>
<td>393</td>
<td>1.5%</td>
</tr>
<tr>
<td>98/99</td>
<td>3</td>
<td>369</td>
<td>0.8%</td>
</tr>
<tr>
<td>99/00</td>
<td>6</td>
<td>436</td>
<td>1.4%</td>
</tr>
<tr>
<td>00/01</td>
<td>8</td>
<td>444</td>
<td>1.8%</td>
</tr>
<tr>
<td>01/02</td>
<td>5</td>
<td>393</td>
<td>1.3%</td>
</tr>
<tr>
<td>02/03</td>
<td>5</td>
<td>396</td>
<td>1.3%</td>
</tr>
<tr>
<td>03/04</td>
<td>4</td>
<td>374</td>
<td>1.1%</td>
</tr>
<tr>
<td>04/05</td>
<td>8</td>
<td>370</td>
<td>2.2%</td>
</tr>
<tr>
<td>05/06</td>
<td>4</td>
<td>401</td>
<td>1.0%</td>
</tr>
<tr>
<td>06/07</td>
<td>7</td>
<td>369</td>
<td>1.9%</td>
</tr>
</tbody>
</table>

**Figure 1.5  Fatal injury rate for UK workers. Based on HSC statistics.**
some five to six members of the UK public suffer fatal injury as a result of construction industry activity. This is a small proportion of fatal injuries recorded for all UK industries (1–2%) but remains five to six people too high per annum to be acceptable.

Table 1.9 indicates the approximate distribution in percentage terms of reported accident types in the UK construction industry for the 7-year period 1996–2003. The table illustrates the percentage proportion of reported accident types for over-3-day injuries, major injuries and fatalities.

Figure 1.7(a) illustrates the distribution in percentage terms of the causes of over-3-day injuries in the UK construction industry. Over one third of the reported over-3-day injuries for the 7-year period were due to handling, lifting or carrying, with a further 19% of reported injuries being due to slips, trips and falls at the same level. Being struck by a moving object accounted for some 18% of reported injuries and falls from height a further 12%.

Figure 1.7(b) illustrates the distribution in percentage terms of the causes of non-fatal major injuries in the UK construction industry. During the 7-year period, falls from height have been the cause of over one third of the industry’s reported non-fatal major injuries. Slips, trips and falls at the same level have accounted for 22% of major injuries, with 18% being brought about by people being struck by a moving object and nearly 10% by incidents involving handling, lifting and carrying.
Table 1.9  Approximate distribution of accidents in the construction industry by percentage for the 7-year period 1996–2003. Based on HSC accident figures.

<table>
<thead>
<tr>
<th></th>
<th>Over-3-day accidents</th>
<th>Major injuries</th>
<th>Fatalities</th>
</tr>
</thead>
<tbody>
<tr>
<td>Struck by a moving object</td>
<td>18</td>
<td>18</td>
<td>17</td>
</tr>
<tr>
<td>Strike against something stationary</td>
<td>5</td>
<td>–</td>
<td>–</td>
</tr>
<tr>
<td>Struck by moving vehicle</td>
<td>–</td>
<td>2</td>
<td>14</td>
</tr>
<tr>
<td>Contact with machinery</td>
<td>–</td>
<td>3</td>
<td>–</td>
</tr>
<tr>
<td>Injured while handling, lifting or carrying</td>
<td>35</td>
<td>9</td>
<td>–</td>
</tr>
<tr>
<td>Slips, trips or falls on same level</td>
<td>19</td>
<td>22</td>
<td>–</td>
</tr>
<tr>
<td>Falls from a height</td>
<td>12</td>
<td>35</td>
<td>46</td>
</tr>
<tr>
<td>Trapped by something collapsing/overturning</td>
<td>–</td>
<td>–</td>
<td>7</td>
</tr>
<tr>
<td>Contact with electricity</td>
<td>–</td>
<td>–</td>
<td>7</td>
</tr>
<tr>
<td>Other kind of accident</td>
<td>11</td>
<td>11</td>
<td>9</td>
</tr>
<tr>
<td>Total (%)</td>
<td>100</td>
<td>100</td>
<td>100</td>
</tr>
</tbody>
</table>

Figure 1.7a  Causes of over-3-day injuries in UK construction industry 1996–2003. Based on HSC statistics.
Figure 1.7(b) Causes of major injuries in the UK construction industry 1996–2003. Based on HSC statistics.

Figure 1.7(c) Causes of fatality in the UK construction industry 1996–2003. Based on HSC statistics.

Figure 1.7(c) illustrates the distribution in percentage terms of the causes of fatal injuries in the UK construction industry. For the 7-year period 1997–2003 falls from height have accounted for near half of all fatalities, with strikes by moving vehicles or moving objects together accounting for nearly one-third of fatalities. Other significantly
occurring causes of fatality were contact with electricity and being trapped by something collapsing or overturning.

**Campaign to revitalise health and safety in the UK construction industry**

In an attempt to improve the health and safety performance of UK industries a ‘Revitalising Health and Safety’ initiative was announced by the Deputy Prime Minister, John Prescott, on 30 March 1999. The initiative served to inject a new impetus into the UK’s health and safety agenda and built upon 25 years of health and safety partnership between employers, employees, trade unions and consumers serving on the HSC.

At the heart of the initiative were the first ever health and safety targets for UK industries. These targets were:

- To reduce the number of working days lost per 100 000 workers from work-related injury and ill health by 30% by 2010
- To reduce the incidence rate of fatal and major injury accidents by 10% by 2010; for the construction industry this figure was initially set at 40% by 2004/05 and 66% by 2009/10
- To reduce the incidence rate of cases of work-related ill health by 20% by 2010
- To achieve half the improvement under each target by 2004

The stated aims of Revitalising Health and Safety are:

- To inject new impetus into the health and safety agenda
- To identify new approaches to further reducing rates of accidents and ill health caused by work, particularly with regard to small firms
- To ensure that the approach to health and safety regulation remains relevant for the changing world of work over the next 25 years; and
- To gain maximum benefit from links between occupational health and safety and other government programmes

Further detail and information regarding the ‘Revitalising Health and Safety’ initiative and progress regarding the initiative can be ascertained from the HSE.

**Summary**

This chapter has introduced and considered aspects of the safety performance of the UK construction industry. The types of reportable
injuries have been identified and the reporting requirements of employers outlined. An overview of the safety record of the UK construction industry has been presented for the 10-year period 1998–2007 and a study of the nature of accidents undertaken for various injury outcomes within the UK construction industry. To place the UK construction industry in context a comparative analysis has been presented with other industries’ safety statistics.

Completion of this chapter should enable the reader to understand and evaluate:

- The statistical safety performance record of the UK construction industry
- The types of accident that occur within the UK construction industry
- The RIDDOR requirements to report and record accidents, dangerous occurrences and work-related disease
- The comparative health and safety record of employed and self-employed people within the UK construction industry with regard to reported over-3-day injuries, major injuries and fatalities

References

Self-assessment questions

Answer the following questions related to this chapter. The answers are provided at the back of this text book in Appendix 2.

Question 1

What are the prime objectives of the Health and Safety Commission (HSC) and the Health and Safety Executive (HSE)?

Question 2

What is RIDDOR an abbreviation for?

Question 3

What are the three reportable injuries reportable under RIDDOR?

Question 4

Outline the HSE’s ‘Revitalising Health and Safety’ targets for the UK construction industry.

Question 5

Provide a synopsis of the indications of Table 1.7.