

BIS | Department for Business
Innovation & Skills

MACHINERY

Guidance notes on the UK
Regulations

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Whilst every effort has been made to ensure that the information in this booklet is accurate, the Department for Business, Innovation and Skills, cannot accept liability for any errors, omissions or misleading statement in that information, whether caused by negligence or otherwise.

Prelude

This guide is intended to assist suppliers of machinery and safety components to understand the effect of the Regulations. It is not an authoritative interpretation of the Regulations, which is a matter for the Courts.

The guide seeks to explain the requirements of the Regulations in general terms and does not attempt to address detailed issues. You should refer to the Regulations themselves for a full statement of the requirements.

Free movement of goods

Achieving the free movement of goods lies at the heart of achieving an open market for business in Europe.

In May 1985, European Community Ministers agreed on a 'New Approach to Technical Harmonisation and Standards' in order to fulfil this objective.

'New Approach' Directives (that is Community laws) set out 'essential requirements' (for safety, for example), written in general terms, which must be met before products may be supplied in the United Kingdom or anywhere else in the Community. European standards fill in the detail and are the main way for businesses to meet the 'essential requirements'. The Directives also lay down how manufacturers are to show that products meet the 'essential requirements'. Products meeting the requirements are to carry CE marking, which should mean that they can be supplied anywhere in the Community. The revised Machinery Directive of 2006, in common with all previous machinery directives, are 'New Approach' directives.

In the summer of 2008, the New Legislative Framework (NLF) was adopted as a successor to the New Approach model of legislation. The NLF contains two distinct instruments: a directly applicable Regulation setting out the requirements for accreditation and market surveillance (meaning enforcement) relating to the marketing of products (Regulation (EC) No 765/2008); and a Decision on a common framework for the marketing of products (Decision No 768/2008/EC). The Decision is not directly applicable but sets the policy blueprint for future Community legislation relating to products. The revised Machinery Directive took account of the key principles within the NLF as it was being negotiated and so does not require further alignment.

The Machinery Directive is also extended by the European Economic Area Agreement which came into force on 1 January 1994. Under that Agreement the provisions of the Directive additionally apply to the four states of the European Free Trade Association: Iceland, Liechtenstein, Norway and Switzerland. Therefore, in this overview of the Regulations, the term EU encompasses both EU Member States and their EFTA counterparts.

Overview of Machinery Legislation

Context

The original machinery directive (89/392 /EEC as amended and subsequently codified as 98/37/EC) came into force in the UK in 1993 through the Supply of Machinery (Safety) Regulations 1992 as amended.

Therefore from 1st January 1993:

Most machinery supplied in the United Kingdom, including imports, has had to:

- satisfy wide-ranging essential health and safety requirements, for example on construction, moving parts and stability etc
- in some cases been subjected to a conformity assessment procedure by a notified body
- carry CE marking and supporting documentation.

In general, the responsible person (see Annex A) will need to be able to assemble all the necessary documentation relating to the machine.

The same rules applied everywhere in the EU so machinery complying with the Community regime may be supplied in any EU state.

Failure to comply with these requirements:

- meant that the machinery could not legally be supplied/placed on the UK market
- could have resulted in prosecution, and a person summarily convicted be subject to a fine, imprisonment or both the scale of which was dependent upon which court the case was heard in.

What are the changes with effect from December 2009?

The same basic principles continue to apply but some of the underlying detail has changed.

In 2006 the European Union adopted a revised Machinery Directive (publication in the Official Journal of the EU on 9 June 2006). It repeals Directive 98/37/EC and entered into force on 29 December 2009.

The Directive has been transposed into UK legislation using the European Communities Act 1972 as The Supply of Machinery (Safety) Regulations 2008 (S.I.2008/1597).

Machinery Regulations 2008 - Key changes

The new set of regulations puts into effect in the UK the reforms introduced by the revised Machinery Directive by, for example:

- providing some clearer definitions including of the core term “machinery” as well as of some other key terms such as ‘safety components’ (backed up with a list of specific examples) and ‘lifting accessories’.
- bringing builders’ goods hoists and cartridge operated tools into the scope of the Regulations

- re-defining more clearly and more logically the border with the Lifts Regulations
- requiring safety components; chains, ropes and webbing to be CE marked
- applying some of its provisions to a category of product known as 'partly completed machinery' to make clearer the responsibilities of players other than the ultimate supplier involved in the supply chain
- giving manufacturers the option to use full quality assurance in the conformity assessment process for those products regarded as particularly hazardous, ie those referenced in Annex D
- also on conformity assessment introducing a new, lighter procedure for manufacturers using harmonised standards for Annex D products
- updating the list of essential health and safety requirements in line with the 'state of art' as well as making some of them clearer than previously and presented in a more logical order and format
- making some small changes to the contents of Declarations of Conformity which will equip the enforcement authorities (sometimes referred to as the market surveillance authorities) with better means of tracing products.

Interpretative guidance from the European Commission

The European Commission is publishing a comprehensive body of guidance on the entire text of the revised Machinery Directive - see Sources of Reference. This new guidance will be web based only thus facilitating revisions to it. As such it is unlikely that there will be any separate interpretative statements regarding the essential health and safety requirements issued by the UK authorities.

The Supply of Machinery (Safety) Regulations 2008

The Regulations apply to:

(a) machinery described as;

- (i) an assembly, fitted with or intended to be fitted with a drive system other than directly applied human or animal effort, consisting of linked parts or components, at least one of which moves, and which are joined together for a specific application;
- (ii) an assembly as referred to in sub-paragraph (i), missing only the components to connect it on site or to sources of energy and motion;
- (iii) an assembly as referred to in sub-paragraph (i) or (ii), ready to be installed and able to function as it stands only if mounted on a means of transport, or installed in a building or structure;
- (iv) assemblies of machinery as referred to in sub-paragraphs (i), (ii) and (iii) or partly completed machinery, which, in order to achieve the same end, are arranged and controlled so that they function as an integral whole;
- (v) an assembly of linked parts or components, at least one of which moves and which are joined together, intended for lifting loads and whose only power source is directly applied human effort;

(b) interchangeable equipment described as;

devices which, after the putting into service of machinery or of a tractor, are assembled with that machinery or tractor by operators themselves in order to change its function or attribute a new function, in so far as they are not tools

(c) safety components described as components;

- (i) which serve to fulfil a safety function;
- (ii) which are independently placed on the market;
- (iii) the failure or malfunction of which endangers the safety of persons; and
- (iv) which are not necessary in order for the machinery to function, or for which other components which do not fall within the previous sub-paragraphs may be substituted in order for the machinery to function;

As noted above, the definition of safety components is now backed up in the 2008 Regulations by an indicative list of examples of products that fit this definition (see Annex E).

(d) lifting accessories described as components or equipment that;

- (i) are not attached to lifting machinery;
- (ii) allow a load to be held;
- (iii) are placed between the machinery and the load or on the load itself, or are intended to constitute

an integral part of the load; and

(iv) are independently placed on the market

(e) chains, ropes and webbing described as being;

designed and constructed for lifting purposes as part of lifting machinery or lifting accessories

(f) removable mechanical transmission devices described as;

removable components for transmitting power between self-propelled machinery or a tractor and another machine by joining them at the first fixed bearing (when such components are placed on the market with a guard the components and the guard together shall be regarded as one product).

(g) partly completed machinery described as;

drive systems and other assemblies which -

(a) are almost machinery;

(b) cannot in themselves perform a specific application; and

(c) are only intended to be incorporated into or assembled with other machinery or other partly completed machinery or equipment, thereby forming machinery.

Exceptions:

The new Regulations do **not** apply to machinery or safety components:

(a) as specifically listed in Annex B

(b) that are not placed on the EU market or put into service in it, eg that are in transit through it/sold at auction for non EU use

(c) if, or to the extent that, Community directives other than the Directive, which apply to them make more specific provision than the Directive in connection with the hazards referred to in the Essential Health and Safety Requirements of the UK Regulations

(d) that are placed previously on the market or put into service in any EU member state prior to 29 December 2009 i.e second-hand machinery

(e) that are in the supply chain prior to 29 December 2009 but unused

(f) that are being exhibited at trade fairs and exhibitions which do not comply with the Regulations, provided that visible sign clearly indicates that it does not comply, that it is not for supply until it has been brought into conformity and takes adequate safety measures to ensure that it does not kill or injure any person.

General requirements

The Regulations make it an offence for a 'responsible person' to supply machinery, partly-completed machinery or safety components unless they comply with the Regulations, i.e. they have the requisite technical file, Declaration of Conformity, EC Type-examination certificate, Declaration of Incorporation as appropriate, is CE marked and is in fact 'safe' (see Annex A).

How to comply with the Regulations

Overview of conformity assessment procedures

The responsibility for demonstrating that machinery complies with the Directive rests on the 'responsible person' (see Annex A) applying the essential health and safety requirements (See Annex C).

Methods of Assessment

There are three methods of conformity assessment under these Regulations with the choice of method available to the responsible person being dependent for the most part on whether the machinery in question falls within Annex D.

Thus for machinery:

- not included in Annex D, or included in it but manufactured wholly in accordance with transposed harmonised standards (see Annex A), see method 1
- included in Annex D but either not manufactured wholly in conformity with transposed harmonised standards or was manufactured to be in conformity by not opting to use method 1, see method 2
- included in Annex D and manufactured using a Full Quality Assurance system, see method 3.

Method 1 - Self Assessment

A responsible person, applying the general principles (see page 14) and having regard to standards (see page 10), undertakes a risk assessment against the Essential Health and Safety Requirements (EHSRs - see Schedule 2, Part 1 of the Regulations), produces a technical file having applied the necessary internal checks (see Annex F), produces a Declaration of Conformity (see Annex G) and affixes the CE mark to the product thus declaring compliance to the Regulations.

Declaration of Incorporation

Where the machinery is incomplete and is intended for incorporation into other machinery or assembly with other machinery to constitute machinery covered by the Regulations, the responsible person must draw up a Declaration of Incorporation for each machine (see Annex H) in this case the partly complete machine must NOT be CE marked.

This option is not available for interchangeable equipment modifying the function of the machine or machinery which can function independently.

Method 2 - EC Type examination

Where a responsible person makes a product which is not manufactured wholly in accordance with transposed harmonised standards, i.e. they have not been published in the OJ (see Sources of Reference) they will be required to have it assessed by a 'Notified Body' (see Annex A). If compliant the Notified Body will issue an EC-type examination certificate (see Annex I). This method is also an option open to a manufacturer for machinery that is wholly manufactured to a harmonised standard.

Method 3 - Full Quality Assurance

A responsible person, having manufactured a product using a full quality control system, has that system assessed by a NB which has been accredited for this type of activity by UKAS. The NB will arrange the issue of the necessary documentation and CE marking (see Annex J).

CE Marking

The marking is as illustrated in diagram 1, below. Except for small-scale machinery, the marking may not be smaller than 5 mm in its vertical height, and the proportions in diagram 2, below, must be maintained whatever its size. The grid does not form part of the marking and is for information only.



Diagram 1

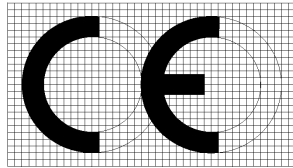


Diagram 2

CE marking must be affixed in a distinct, visible, legible and indelible manner.

The CE marking should not be affixed to machinery for which a declaration of incorporation has been issued.

The Regulations make it an offence to affix a mark to machinery which may be confused with CE marking.

Machinery or safety components that comply with the Regulations may also be subject to other Community Directives. For example, an electric machine permanently installed in a building would need to comply with legislation implementing the Construction Products and Electromagnetic Compatibility Directives as well as any other existing relevant legislation. In such cases the CE marking indicates that the requirements of those other Directives have also been complied with.

Machinery bearing CE marking and accompanied by the EC declaration of conformity can be presumed to satisfy the provisions of the Machinery Directive unless there are reasonable grounds for suspecting otherwise.

A person who either supplies machinery which does not bear CE marking, or does so but there is doubt as to validity is required, if requested by an enforcement authority from any EU Member State, to provide any available information that will allow it to determine its compliance. Failure to supply such information could, as a minimum, lead to restrictions being placed on its use which, in turn, could also lead to criminal prosecution.

The conformity assessment mechanisms available are shown in diagrammatic form in Annex K.

Because partly completed machinery is only intended to be incorporated into or assembled with other machinery, or partly completed machinery, it should not be CE marked. Instead the responsible person should complete a Declaration of Incorporation (see Annex H). It is for the responsible person to CE mark the whole product at the point when it is placed on the market/put into service - the Declaration of Incorporation forming part of the technical file.

Some Key Definitions

Authorised Representative

The authorised representative is the person who is established in the EU who has received a written mandate from the manufacturer to perform, on their behalf, all or part of the obligations and formalities imposed on manufacturers.

Harmonised Standards

These are non-binding technical specifications adopted by one of the European Standard Organisations (CEN, CENELEC or ETSI) on the basis of a remit issued by the Commission.

Machinery and safety components manufactured in conformity with specified, published European standards which cover all the EHSRs and have also been published as identically worded national standards ('transposed harmonised standards'), and are listed in the EU Official Journal will be presumed to comply with the EHSRs covered by those standards - see Sources of Reference.

The European Committee for Standardisation (CEN) and the European Committee for Electrotechnical Standardization (CENELEC) have been mandated to look at all existing machinery standards to ensure that where necessary they are revised to meet the requirements of the new Directive. The European Commission periodically publishes lists of standards that comply with the Directive [this list also may carry a note where a Standard has been found not to comply with one or more of the EHSRs].

The standards in support of the Machinery Directive are at three levels. The first (A) level comprises general principles for the design of machinery. The second (B) level covers specific safety devices and ergonomic aspects. The third (C) level deals with specific classes of machinery by calling up the appropriate standards from the first two levels and addressing requirements specific to the class. Only the latter can give a presumption of conformity against the Directive.

Manufacturer

The manufacturer is:

- a) a person who designs or manufactures that machinery or partly completed machinery:
 - i) with a view to its being placed on the market in the EEA under that person's own name or trademark or
 - (ii) for that person's own use in an EEA state; or
- (b) if there is no such person (i.e. the machine was designed and manufactured outside the EU and was not intended for the EEA - not CE marked) the person who places that machinery or partly completed machinery on the market or puts it into service.

Notified Body

A notified body is:

- a) a UK legal entity accredited formally appointed by the Secretary of State for Business, Innovation and Skills, and 'notified' to the Commission and other EU Member States for the purposes of undertaking conformity assessment;

- b) a person designated as a notified body for the purposes of this directive by another Member state and noted to the Commission and other Member States
- c) a person recognised for the purpose of carrying out the functions of a notified body by virtue of:
 - (i) a mutual recognition agreement relating to the Directive; or
 - (ii) a similar agreement (including a Protocol to a Europe Agreement, or another agreement, on Conformity Assessment and Acceptance of Industrial Products),

which has been concluded between the European Community and a state other than an EEA state.

For a full list of notified bodies under a) see Sources of Reference.

Putting into service/Placing on the market

In these Regulations:

- a) references to placing machinery or partly completed machinery on the market are references to making it available in the EU -
 - (i) for the first time;
 - (ii) with a view to distribution or use, whether by the person making it available or another; and
 - (iii) whether for reward or free of charge; and
- b) references to putting any machinery or partly completed machinery into service are references to the first time that it is used for its intended purpose in an EEA state.

Responsible person

In relation to machinery or partly completed machinery:

- a) the manufacturer (see above) of that machinery or partly completed machinery
- b) the manufacturer's authorised representative (see above).

Safe

Means that when it is properly installed and maintained, and used for the purposes for which it is intended, or under conditions which can reasonably be foreseen, machinery does not -

- a) endanger the health of, or result in death or injury to, any person; or
- b) where appropriate:
 - (i) endanger the health of, or result in death or injury to, domestic animals; or
 - (ii) endanger property.

Machinery excluded from the Regulations

The Regulations do not apply to:

- a) safety components which are -
 - (i) intended to be used as spare parts to replace identical components; and
 - (ii) supplied by the manufacturer of the original machinery;
- b) equipment specifically for use in fairgrounds and/or amusement parks;
- c) machinery specially designed or put into service for nuclear purposes which, in the event of failure, may result in an emission of radioactivity;
- d) weapons, including firearms;
- e) subject to paragraph 2, the following means of transport -
 - (i) agricultural and forestry tractors, in respect of the risks covered by Directive 2003/37/EC;
 - (ii) motor vehicles and trailers as defined in Article 3(11) and (12) of Directive 2007/46/EC of the European Parliament and the Council of 5 September 2007 establishing a framework for the approval of motor vehicles and their trailers, and of systems, components and separate technical units intended for such vehicles;
 - (iii) vehicles covered by Directive 2002/24/EC of the European Parliament and of the Council of 18 March 2002 relating to the type-approval of two or three-wheel motor vehicles;
 - (iv) motor vehicles exclusively intended for competition; and
 - (v) means of transport by air, on water and on rail networks,
- f) seagoing vessels, mobile offshore units and machinery installed on board such vessels or units;
- g) machinery specially designed and constructed for military or police purposes;
- h) machinery specially designed and constructed for research purposes for temporary use in laboratories;
- i) mine winding gear;
- j) machinery intended to move performers during artistic performances;
- k) electrical and electronic products falling within the following areas, insofar as they are covered by Council Directive 2006/95/EC of 12 December 2006 on the harmonisation of the laws of Member States relating to electrical equipment designed for use within certain voltage limits -
 - (i) household appliances intended for domestic use,
 - (ii) audio and video equipment,

- (iii) information technology equipment,
- (iv) ordinary office machinery,
- (v) low-voltage switchgear and control gear,
- (vi) electric motors; and

(l) the following types of high-voltage electrical equipment -

- (i) switch gear and control gear, and
- (ii) transformers.

(m) lifts which serve specific levels (i.e. of buildings and constructions) with a speed greater than 0.15 metres per second having a carrier, which must be a car*, moving between guides which are rigid and inclined at an angle of more than 15 degrees to the horizontal and designed for the transport of:

- (i) persons
- (ii) persons and goods
- (iii) goods alone if the car is accessible, that is to say, a person may enter it without difficulty, and fitted with controls situated inside the carrier or within reach of a person inside the carrier.

* note that the EHSRs now make clear that such a 'car' must be fully enclosed.

Essential Health and Safety Requirements relating to the design and construction of machinery

For the purposes of this Annex the term 'machinery' incorporates machinery; interchangeable equipment; safety components; chains, ropes, and webbing; lifting accessories; and removable transmission devices.

To comply with the Regulations, machinery must satisfy the essential health and safety requirements which apply to it. The full list of EHSRs is laid out in Schedule 2, Part 1 of the 2008 Regulations. Alternatively they can be viewed via the OPSI website at The Office of Public Sector Information (OPSI) (see 'Sources of Reference'). This annex is a brief summary of their main content.

The listing in Schedule 2, Part 1 of the 2008 Regulations begins with a crucially important statement of 'General Principles', reproduced in full below. This, in turn, explicitly requires the carrying out of a risk assessment, meaning that the responsible person should determine which are the EHSRs applicable to his machinery and in respect of which he must take measures.

General Principles

The responsible person must ensure that a risk assessment is carried out in order to determine the health and safety requirements which apply to the machinery. The machinery must then be designed and constructed taking into account the results of the risk assessment.

By the iterative process of risk assessment and risk reduction referred to above, the responsible person shall:

- determine the limits of the machinery, which include the intended use and any reasonably foreseeable misuse thereof,
- identify the hazards that can be generated by the machinery and the associated hazardous situations,
- estimate the risks, taking into account the severity of the possible injury or damage to health and the probability of its occurrence,
- evaluate the risks, with a view to determining whether risk reduction is required, in accordance with the objective of the Directive,
- eliminate the hazards or reduce the risks associated with these hazards by application of protective measures, in the order of priority established in section 1.1.2(b) of this Annex.

The obligations laid down by the essential health and safety requirements only apply when the corresponding hazard exists for the machinery in question when it is used under the conditions foreseen by the responsible person or in foreseeable abnormal situations. In any event, the principles of safety integration referred to in section 1.1.2 of this Annex and the obligations concerning marking of machinery and instructions referred to in sections 1.7.3 and 1.7.4 of this Annex apply.

The essential health and safety requirements are mandatory. However, taking into account the state of the art, it may not be possible to meet the objectives set by them. In that event, the machinery must, as far as possible, be designed and constructed with the purpose of approaching these objectives.

The list of essential requirements is organised into several sections. The first section has a general scope and is applicable to all kinds of machinery. The other sections refer to certain kinds of more specific hazards. Nevertheless, it is essential to examine the whole of the list in order to be sure of meeting all the applicable essential requirements. When machinery is being designed, the requirements of the general section and the requirements of one or more of the other sections shall be taken into account, depending on the results of the risk assessment carried out in accordance with the opening paragraph of these General Principles.

The sections of the Essential Requirements

The requirements are wide-ranging, and take into account potential dangers to operators and all other persons who may come into contact with the machinery. They are organised into a series of six sections as follows:

Section 1 is general and includes a list of definitions, a statement on the 'principles of safety integration' which is fundamental to the interpretation of many of the other essential requirements and also some requirements, not previously covered by the pre 2008 regulations, on ergonomics. There is then a series of sub-sections on:

- control systems
- protection against mechanical hazards
- guards and protective devices
- risks due to other hazards (including electricity, fire and vibration) and
- maintenance

Section 2 addresses certain stated categories of machinery as follows:

- machinery used with foodstuffs and cosmetics or pharmaceuticals
- portable or hand-guided machinery
- machinery for working with wood (and similar materials)

Section 3 addresses hazards due to the mobility of machinery with sub-sections on:

- work positions
- control devices
- protection against mechanical and other hazards
- information and indications

Section 4 addresses hazards due to lifting operations with sub-sections on:

- non manual power sources
- information and markings
- instructions

Section 5 deals with underground working with sub-sections on:

- stability
- movement
- control devices
- stopping
- fire
- exhaust emissions

Section 6 deals with the lifting of persons with sub-sections on:

- control devices
- risks to persons in or on the carrier
- fixed landings and markings.

Machinery subject to special assessment procedures

1. Circular saws (single- or multi-blade) for working with wood and material with similar physical characteristics or for working with meat and material with similar physical characteristics, of the following types:
 - 1.1 sawing machinery with fixed blade(s) during cutting, having a fixed bed or support with manual feed of the workpiece or with a demountable power feed;
 - 1.2 sawing machinery with fixed blade(s) during cutting, having a manually operated reciprocating saw-bench or carriage;
 - 1.3 sawing machinery with fixed blade(s) during cutting, having a built-in mechanical feed device for the workpieces, with manual loading and/or unloading;
 - 1.4 sawing machinery with movable blade(s) during cutting, having mechanical movement of the blade, with manual loading and/or unloading.
2. Hand-fed surface planing machinery for woodworking.
3. Thicknessers for one-side dressing having a built-in mechanical feed device, with manual loading and/or unloading for woodworking.
4. Band-saws with manual loading and/or unloading for working with wood and material with similar physical characteristics or for working with meat and material with similar physical characteristics, of the following types:
 - 4.1 sawing machinery with fixed blade(s) during cutting, having a fixed or reciprocating-movement bed or support for the workpiece;
 - 4.2 sawing machinery with blade(s) assembled on a carriage with reciprocating motion.
5. Combined machinery of the types referred to in points 1 to 4 and point 7 of this Annex, for working with wood and material with similar physical characteristics.
6. Hand-fed tenoning machinery with several tool holders for woodworking.
7. Hand-fed vertical spindle moulding machinery for working with wood and material with similar physical characteristics.
8. Portable chainsaws for woodworking.
9. Presses, including press-brakes, for the cold working of metals, with manual loading and/or unloading, whose movable working parts may have a travel exceeding 6 mm and a speed exceeding 30 mm/s.
10. Injection or compression plastics-moulding machinery with manual loading or unloading.
11. Injection or compression rubber-moulding machinery with manual loading or unloading.
12. Machinery for underground working of the following types:

- 12.1 locomotives and brake-vans;
- 12.2 hydraulic-powered roof supports.
- 13. Manually loaded trucks for the collection of household refuse incorporating a compression mechanism.
- 14. Removable mechanical transmission devices including their guards.
- 15. Guards for removable mechanical transmission devices.
- 16. Vehicle servicing lifts.
- 17. Devices for the lifting of persons or of persons and goods involving a hazard of falling from a vertical height of more than three metres.
- 18. Portable cartridge-operated fixing and other impact machinery.
- 19. Protective devices designed to detect the presence of persons.
- 20. Power-operated interlocking movable guards designed to be used as safeguards in machinery referred to in points 9, 10 and 11 of this Annex.
- 21. Logic units to ensure safety functions.
- 22. Roll-over protective structures (ROPS).
- 23. Falling-object protective structures (FOPS).

Safety Components

Under the Regulations there is now an indicative list of safety components.

1. Guards for removable mechanical transmission devices.
2. Protective devices designed to detect the presence of persons.
3. Power-operated interlocking movable guards designed to be used as safeguards in machinery referred to in Annex IV (Part 4 of this Schedule), points 9, 10 and 11.
4. Logic units to ensure safety functions.
5. Valves with additional means for failure detection intended for the control of dangerous movements on machinery.
6. Extraction systems for machinery emissions.
7. Guards and protective devices designed to protect persons against moving parts involved in the process on the machinery.
8. Monitoring devices for loading and movement control in lifting machinery.
9. Restraint systems to keep persons on their seats.
10. Emergency stop devices.
11. Discharging systems to prevent the build-up of potentially dangerous electrostatic charges.
12. Energy limiters and relief devices referred to in Annex I (Part 1 of this Schedule), sections 1.5.7, 3.4.7 and 4.1.2.6.
13. Systems and devices to reduce the emission of noise and vibrations.
14. Roll-over protective structures (ROPS).
15. Falling-object protective structures (FOPS).
16. Two-hand control devices.
17. Components for machinery designed for lifting and/or lowering persons between different landings and included in the following list:
 - a) devices for locking landing doors;
 - b) devices to prevent the load-carrying unit from falling or unchecked upwards movement;
 - c) overspeed limitation devices;
 - d) energy-accumulating shock absorbers,
 - non-linear, or

- with damping of the return movement;
- e) energy-dissipating shock absorbers;
- f) safety devices fitted to jacks of hydraulic power circuits where these are used as devices to prevent falls;
- g) electric safety devices in the form of safety switches containing electronic components

Technical File

A. Technical File for machinery

It is essential that, before drawing up the EC Declaration of Conformity, the manufacturer or his authorised representative established in the Community should prepare a technical construction file. However, it is not essential that all documentation should be permanently available in material form, but it must be possible to make it available on request. It need not include detailed plans of subassemblies used for the manufacture of machinery, unless knowledge of such plans is essential in order to ascertain conformity with the essential health and safety requirements.

This part describes the procedure for compiling a technical file. The technical file must demonstrate that the machinery complies with the provisions of the Directive. It must cover the design, manufacture and operation of the machinery to the extent necessary for this assessment. The technical file must be compiled in one or more official Community languages, except for the instructions for the machinery, for which the special provisions of Annex I (Part 1 of this Schedule), section 1.7.4.1 apply.

1. The technical file shall comprise the following:

a) a construction file including:

- a general description of the machinery,
- the overall drawing of the machinery and drawings of the control circuits, as well as the pertinent descriptions and explanations necessary for understanding the operation of the machinery,
- full detailed drawings, accompanied by any calculation notes, test results, certificates, etc, required to check the conformity of the machinery with the essential health and safety requirements,
- the documentation on risk assessment demonstrating the procedure followed, including:
 - (i) a list of the essential health and safety requirements which apply to the machinery,
 - (ii) the description of the protective measures implemented to eliminate identified hazards or to reduce risks and, when appropriate, the indication of the residual risks associated with the machinery,
- the standards and other technical specifications used, indicating the essential health and safety requirements covered by these standards,
- any technical report giving the results of the tests carried out either by the manufacturer or by a body chosen by the responsible person,
- a copy of the instructions for the machinery,
- where appropriate, the declaration of incorporation for included partly completed machinery and the relevant assembly instructions for such machinery,

- where appropriate, copies of the EC declaration of conformity of machinery or other products incorporated into the machinery,
- a copy of the EC declaration of conformity;

(b) for series manufacture, the internal measures that will be implemented to ensure that the machinery remains in conformity with the provisions of the Directive.

The manufacturer must carry out necessary research and tests on components, fittings or the completed machinery to determine whether by its design or construction it is capable of being assembled and put into service safely. The relevant reports and results shall be included in the technical file.

2. The technical file referred to in point 1 of this Annex must be made available to the enforcement authorities and the competent authorities of any other EEA state for at least 10 years following the date of manufacture of the machinery or, in the case of series manufacture, of the last unit produced.

The technical file does not have to be located in the territory of an EEA state, nor does it have to be permanently available in material form. However, it must be capable of being assembled and made available within a period of time commensurate with its complexity by the person designated in the EC declaration of conformity.

The technical file does not have to include detailed plans or any other specific information as regards the sub-assemblies used for the manufacture of the machinery unless knowledge of them is essential for verification of conformity with the essential health and safety requirements.

3. Failure to present the technical file in response to a duly reasoned request by the competent national authorities may constitute sufficient grounds for doubting the conformity of the machinery in question with the essential health and safety requirements.

B. Technical File for partly completed machinery

This part describes the procedure for compiling relevant technical documentation. The documentation must show which provisions of the Directive are applied and fulfilled. It must cover the design, manufacture and operation of the partly completed machinery to the extent necessary for the assessment of conformity with the essential health and safety requirements applied. The documentation must be compiled in one or more official Community languages.

Relevant technical documentation shall comprise the following:

a) a construction file including:

- the overall drawing of the partly completed machinery and drawings of the control circuits,
- full detailed drawings, accompanied by any calculation notes, test results, certificates, etc, required to check the conformity of the partly completed machinery with the applied essential health and safety requirements,
- the risk assessment documentation showing the procedure followed, including:
 - i) a list of the essential health and safety requirements applied and fulfilled,

- (ii) the description of the protective measures implemented to eliminate identified hazards or to reduce risks and, where appropriate, the indication of the residual risks,
 - (iii) the standards and other technical specifications used, indicating the essential health and safety requirements covered by these standards,
 - (iv) any technical report giving the results of the tests carried out either by the manufacturer or by a body chosen by the responsible person,
 - (v) a copy of the assembly instructions for the partly completed machinery;
- (b) for series manufacture, the internal measures that will be implemented to ensure that the partly completed machinery remains in conformity with the essential health and safety requirements applied.

The manufacturer must carry out necessary research and tests on components, fittings or the partly completed machinery to determine whether by its design or construction it is capable of being assembled and used safely. The relevant reports and results shall be included in the technical file.

The relevant technical documentation must be available for at least 10 years following the date of manufacture of the partly completed machinery or, in the case of series manufacture, of the last unit produced, and on request presented to an enforcement authority or a competent authority of any other EEA state. It does not have to be located in the territory of an EEA state, nor does it have to be permanently available in material form. It must be capable of being assembled and presented to the relevant authority by the person designated in the declaration for incorporation.

Failure to present the relevant technical documentation in response to a duly reasoned request by an enforcement authority or a competent authority of any other EEA state may constitute sufficient grounds for doubting the conformity of the partly completed machinery with the essential health and safety requirements applied and attested.

Assessment of conformity with internal checks on the manufacture of machinery

Outlined below is the procedure by which the responsible person, who carries out the obligations laid down in the following paragraphs ensures and declares that the machinery concerned satisfies the relevant provisions of the Directive.

For each representative type of the series in question the responsible person shall draw up a technical file.

The manufacturer must take all measures necessary in order that the manufacturing process ensures compliance of the manufactured machinery with the technical file and with the provisions of the Directive.

EC Declaration of Conformity

Content and Custody

This declaration and translations thereof must be drawn up under the same conditions as the instructions (see Annex I (Part 1 of this Schedule), section 1.7.4.1(a) and (b)), and must be typewritten or else handwritten in capital letters.

This declaration relates exclusively to the machinery in the state in which it was placed on the market, and excludes components which are added and/or operations carried out subsequently by the final user.

This declaration accompanies each product and declares that it complies with the relevant essential health and safety requirements or with the example that underwent type-examination.

The EC declaration of conformity must contain the following particulars:

1. business name and full address of the manufacturer and, where appropriate, the manufacturer's authorised representative;
2. name and address of the person authorised to compile the technical file, who must be established in an EEA state;
3. description and identification of the machinery, including generic denomination, function, model, type, serial number and commercial name;
4. a sentence expressly declaring that the machinery fulfils all the relevant provisions of the Directive and where appropriate, a similar sentence declaring the conformity with other Directives and/or relevant provisions with which the machinery complies. These references must be those of the texts published in the Official Journal of the European Union;
5. where appropriate, the name, address and identification number of the notified body which carried out the EC type-examination referred to in Annex IX (Part 9 of this Schedule) and the number of the EC type-examination certificate;
6. where appropriate, the name, address and identification number of the notified body which notified the full quality assurance system referred to in Annex X (Part 10 of this Schedule);
7. where appropriate, a reference to the published harmonised standards used;
8. where appropriate, the reference to other technical standards and specifications used;
9. the place and date of the declaration;
10. the identity and signature of the person empowered to draw up the declaration on behalf of the responsible person.

The manufacturer of machinery or the manufacturer's authorised representative shall keep the original EC declaration of conformity for a period of at least 10 years from the last date of manufacture of the machinery

Declaration of Incorporation for Partly Completed Machinery

Content and custody

This declaration and translations thereof must be drawn up under the same conditions as the instructions (see Annex I (Part 1 of this Schedule), section 1.7.4.1(a) and (b)), and must be typewritten or else handwritten in capital letters.

The declaration of incorporation must contain the following particulars:

1. business name and full address of the manufacturer of the partly completed machinery and, where appropriate, the manufacturer's authorised representative;
2. name and address of the person authorised to compile the relevant technical documentation, who must be established in an EEA state;
3. description and identification of the partly completed machinery including generic denomination, function, model, type, serial number and commercial name;
4. a sentence declaring which essential health and safety requirements are applied and fulfilled and that the relevant technical documentation is compiled in accordance with Annex VII (Part 7 of this Schedule), part B, and, where appropriate, a sentence declaring the conformity of the partly completed machinery with other relevant Directives. These references must be those of the texts published in the Official Journal of the European Union;
5. an undertaking to transmit, in response to a reasoned request by the national authorities, relevant information on the partly completed machinery. This shall include the method of transmission and shall be without prejudice to the intellectual property rights of the manufacturer of the partly completed machinery;
6. a statement that the partly completed machinery must not be put into service until the final machinery into which it is to be incorporated has been declared in conformity with the provisions of the Directive, where appropriate;
7. the place and date of the declaration;
8. the identity and signature of the person empowered to draw up the declaration on behalf of the responsible person.

The manufacturer of partly completed machinery or the manufacturer's authorised representative shall keep the original declaration of incorporation for a period of at least 10 years from the last date of manufacture of the partly completed machinery.

Assembly instructions

The assembly instructions for partly completed machinery must contain a description of the conditions which must be met with a view to correct incorporation in the final machinery, so as not to compromise safety and health.

The assembly instructions must be written in an official Community language acceptable to the manufacturer of the machinery in which the partly completed machinery will be assembled, or to the manufacturer's authorised representative.

EC Type-examination

EC type-examination is the procedure whereby a notified body ascertains and certifies that a representative model of machinery referred to in Annex IV (Part 4 of this Schedule) (hereafter named the type) satisfies the provisions of the Directive.

1. The responsible person must, for each type, draw up the technical file referred to in Annex VII (Part 7 of this Schedule), part A.
2. For each type, the application for an EC type-examination shall be submitted by the responsible person to a notified body chosen by the responsible person.

The application shall include:

- the name and address of the manufacturer and, where appropriate, the manufacturer's authorised representative,
- a written declaration that the application has not been submitted to another notified body,
- the technical file.

Moreover, the applicant shall place at the disposal of the notified body a sample of the type. The notified body may ask for further samples if the test programme so requires.

3. The notified body shall:
 - 3.1 examine the technical file, check that the type was manufactured in accordance with it and establish which elements have been designed in accordance with the relevant provisions of published harmonised standards, and those elements whose design is not based on the relevant provisions of those standards;
 - 3.2 carry out or have carried out appropriate inspections, measurements and tests to ascertain whether the solutions adopted satisfy the essential health and safety requirements, where published harmonised standards were not applied;
 - 3.3 where published harmonised standards were used, carry out or have carried out appropriate inspections, measurements and tests to verify that those standards were actually applied;
 - 3.4 agree with the applicant as to the place where the check that the type was manufactured in accordance with the examined technical file and the necessary inspections, measurements and tests will be carried out.
4. If the type satisfies the provisions of the Directive, the notified body shall issue the applicant with an EC type-examination certificate. The certificate shall include the name and address of the manufacturer and the manufacturer's authorised representative, the data necessary for identifying the approved type, the conclusions of the examination and the conditions to which its issue may be subject.

The manufacturer and the notified body shall retain a copy of this certificate, the technical file and all relevant documents for a period of 15 years from the date of issue of the certificate.

5. If the type does not satisfy the provisions of the Directive, the notified body shall refuse to issue the applicant with an EC type-examination certificate, giving detailed reasons for its refusal. It shall inform the applicant, the other notified bodies and the Member State which notified it. An appeal procedure must be available.
6. The applicant shall inform the notified body which retains the technical file relating to the EC type-examination certificate of all modifications to the approved type. The notified body shall examine these modifications and shall then either confirm the validity of the existing EC type-examination certificate or issue a new one if the modifications are liable to compromise conformity with the essential health and safety requirements or the intended working conditions of the type.
7. The Commission, the Member States and the other notified bodies may, on request, obtain a copy of the EC type-examination certificates. On reasoned request, the Commission and the Member States may obtain a copy of the technical file and the results of the examinations carried out by the notified body.
8. Files and correspondence referring to the EC type-examination procedures shall be written in the official language(s) of the EEA state where the notified body is established or in any other official Community language acceptable to the notified body.
9. Validity of the EC type-examination certificate
 - 9.1 The notified body has the ongoing responsibility of ensuring that the EC type-examination certificate remains valid. It shall inform the manufacturer of any major changes which would have an implication on the validity of the certificate. The notified body shall withdraw certificates which are no longer valid.
 - 9.2 The manufacturer of the machinery concerned has the ongoing responsibility of ensuring that the said machinery meets the corresponding state of the art.
 - 9.3 The manufacturer shall request from the notified body the review of the validity of the EC type-examination certificate every five years.

If the notified body finds that the certificate remains valid, taking into account the state of the art, it shall renew the certificate for a further five years.

The manufacturer and the notified body shall retain a copy of this certificate, of the technical file and of all the relevant documents for a period of 15 years from the date of issue of the certificate.

- 9.4 In the event that the validity of the EC-type examination certificate is not renewed, the manufacturer shall cease the placing on the market of the machinery concerned.

Full Quality Assurance

This Annex describes the conformity assessment of machinery referred to in Annex IV (Part 4 of this Schedule), manufactured using a full quality assurance system, and the procedure whereby a notified body assesses and approves the quality system and monitors its application.

1. The manufacturer must operate an approved quality system for design, manufacture, final inspection and testing, as specified in point 2 of this Annex, and shall be subject to the surveillance referred to in point 3 of this Annex.
2. Quality system
 - 2.1 An application for assessment of a quality system shall be lodged by the responsible person with a notified body chosen by the responsible person.

The application shall contain:

- the name and address of the manufacturer and, where appropriate, the manufacturer's authorised representative,
 - the places of design, manufacture, inspection, testing and storage of the machinery,
 - the technical file described in Annex VII (Part 7 of this Schedule), part A, for one model of each category of machinery referred to in Annex IV (Part 4 of this Schedule) which the manufacturer intends to manufacture,
 - the documentation on the quality system,
 - a written declaration that the application has not been submitted to another notified body.
- 2.2 The quality system must ensure conformity of the machinery with the provisions of the Directive. All the elements, requirements and provisions adopted by the manufacturer must be documented in a systematic and orderly manner, in the form of measures, procedures and written instructions. The documentation on the quality system must permit a uniform interpretation of the procedural and quality measures, such as quality programmes, plans, manuals and records.

It must contain, in particular, an adequate description of:

- the quality objectives, the organisational structure, and the responsibilities and powers of the management with regard to the design and quality of the machinery,
- the technical design specifications, including standards that will be applied and, where published harmonised standards are not applied in full, the means that will be used to ensure that the essential health and safety requirements are fulfilled,
- the design inspection and design verification techniques, processes and systematic actions that will be used when designing machinery covered by the Directive,
- the corresponding manufacturing, quality control and quality assurance techniques, processes and systematic actions that will be used,
- the inspections and tests that will be carried out before, during and after manufacture, and the frequency with which they will be carried out,

- the quality records, such as inspection reports and test data, calibration data, and reports on the qualifications of the personnel concerned,
- the means of monitoring the achievement of the required design and quality of the machinery, as well as the effective operation of the quality system.

2.3 The notified body shall assess the quality system to determine whether it satisfies the requirements of point 2.2 of this Annex.

The elements of the quality system which conform to the relevant harmonised standard shall be presumed to conform to the corresponding requirements referred to in point 2.2.

The team of auditors must have at least one member who is experienced in the assessment of the technology of the machinery. The assessment procedure shall include an inspection to be carried out at the manufacturer's premises. During the assessment, the team of auditors shall carry out a review of the technical files referred to in the third indent of the second paragraph of point 2.1 of this Annex, to ensure their compliance with the applicable health and safety requirements.

The responsible person shall be notified of the decision. The notification shall contain the conclusions of the examination and the reasoned assessment decision. An appeal procedure must be available.

2.4 The manufacturer shall undertake to fulfil the obligations arising from the quality system as approved and to ensure that it remains appropriate and effective.

The responsible person shall inform the notified body which approved the quality system of any planned change to it.

The notified body shall evaluate the proposed changes and decide whether the modified quality assurance system will continue to satisfy the requirements referred to in point 2.2, or whether a re-assessment is necessary.

It shall notify the manufacturer of its decision. The notification shall contain the conclusions of the examination and the reasoned assessment decision.

3. Surveillance under the responsibility of the notified body

3.1 The purpose of surveillance is to make sure that the manufacturer duly fulfils the obligations arising out of the approved quality system.

3.2 The manufacturer shall, for inspection purposes, allow the notified body access to the places of design, manufacture, inspection, testing and storage, and shall provide it with all necessary information, such as:

- the documentation concerning the quality system,
- the quality records provided for in that part of the quality system concerned with design, such as the results of analyses, calculations, tests, etc,
- the quality records provided for in that part of the quality system concerned with manufacture, such as inspection reports and test data, calibration data, reports on the qualifications of the personnel concerned, etc.

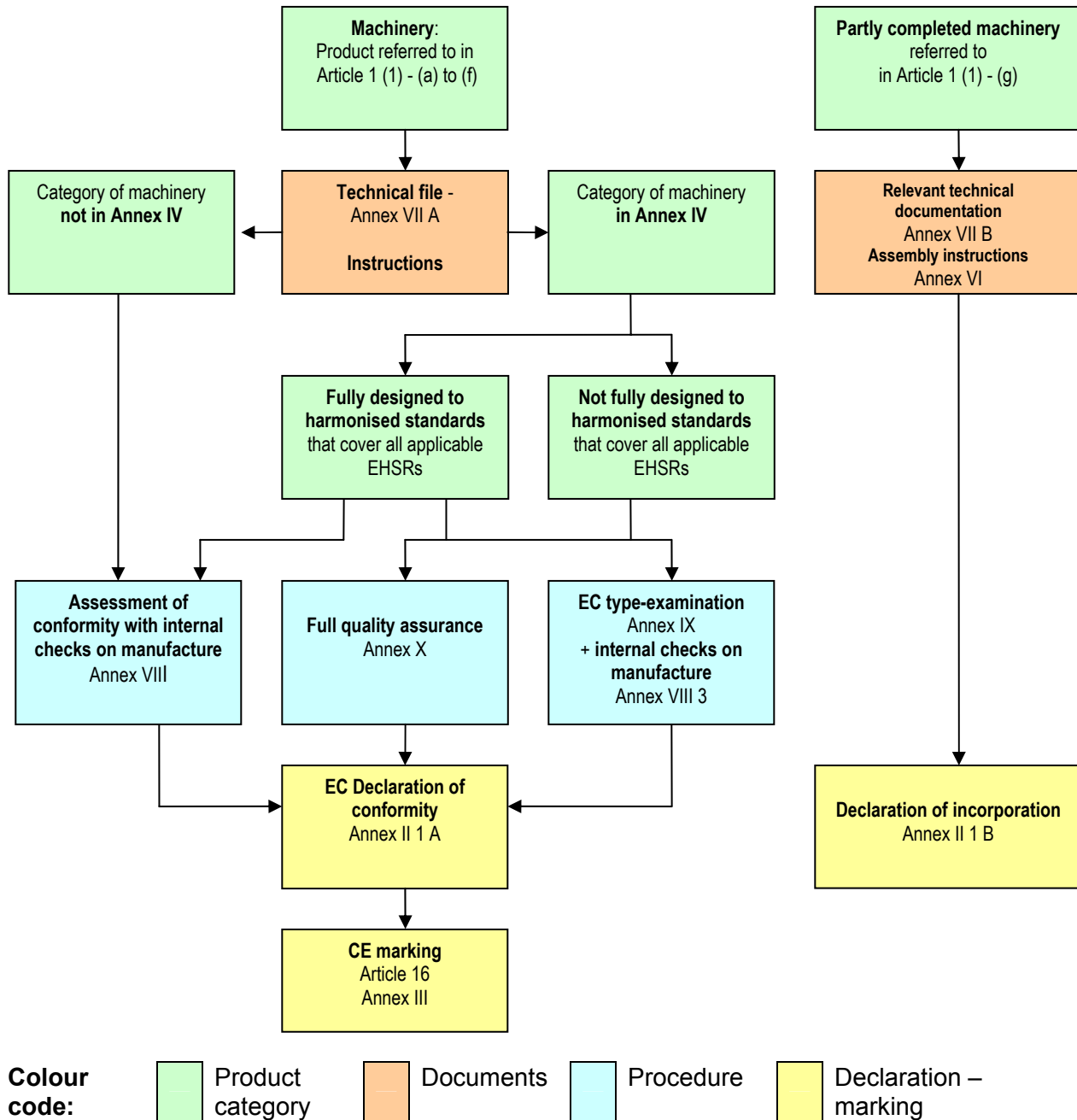
- 3.3 The notified body shall conduct periodic audits to make sure that the manufacturer is maintaining and applying the quality system; it shall provide the manufacturer with an audit report. The frequency of the periodic audits shall be such that a full reassessment is carried out every three years.
- 3.4 Moreover, the notified body may pay the manufacturer unannounced visits. The need for these additional visits and their frequency will be determined on the basis of a visit monitoring system managed by the notified body. In particular, the following factors will be taken into account in the visits monitoring system:
- the results of previous surveillance visits,
 - the need to monitor remedial measures,
 - where appropriate, special conditions attaching to approval of the system,
 - significant modifications in the organisation of the manufacturing process, measures or techniques.

On the occasion of such visits, the notified body may, if necessary, carry out tests or have them carried out in order to check the proper functioning of the quality system. It shall provide the manufacturer with a visit report and, if a test was carried out, with a test report.

4. The responsible person shall keep available for the national authorities, for a period of ten years from the last date of manufacture:
- the documentation referred to in point 2.1 of this Annex,
 - the decisions and reports of the notified body referred to in the third and fourth subparagraphs of point 2.4 of this Annex, and in points 3.3 and 3.4 of this Annex.

Conformity Procedures

The following diagram summarises the procedures set out in Article 12 and 13 of the Machinery Directive 2006/42/EC, the annex references are those in the Directive, for the placing on the market of machinery and partly completed machinery from 29 December 2009.



Enforcement

In Great Britain referred the Health and Safety Executive is responsible for enforcing the Regulations in relation to machinery and safety components for use at work; local authority Trading Standards Officers in relation to machinery and safety components for private use.

In Northern Ireland the Department of Economic Development and the Department of Agriculture are responsible for enforcing the Regulations in relation to machinery and safety components for use at work; district councils in relation to machinery and safety components for private use.

The enforcement authorities have available to them various powers under the Health and Safety at Work etc Act 1974, the Health and Safety at Work (Northern Ireland) Order 1978 and the Consumer Protection Act 1987, for example, relating to suspension, prohibition and prosecution.

Where machinery bearing the CE marking is safe but there are breaches of other obligations, the 'responsible person' will be given the opportunity to correct the breach before further enforcement action is taken.

The Machinery Directive requires Member States to inform the Commission of any specific enforcement action taken. The Commission will consider whether the action is justified and advise the parties concerned accordingly.

Offences under the Health and Safety at Work Act: Penalties

The Health and Safety at Work etc Act 1974 (the HSW Act), section 33 (as amended) sets out the offences and maximum penalties under health and safety legislation. Thus

- failing to comply with an improvement or prohibition notice, or a court remedy order (issued under the HSW Act sections 21, 22 and 42 respectively):
- for breaching sections 2–6 of the HSW Act, which set out the general duties of employers, self-employed persons, persons who have control of premises, employees, manufacturers and suppliers to safeguard the health and safety of employees and members of the public who may be affected by work activities: and
- for most other breaches of the HSW Act, † contravening licence requirements and breaches of all health and safety regulations under the Act. Regulations impose both general and more specific duties, such as the requirements to carry out a suitable and sufficient risk assessment or to provide suitable personal protective equipment. Licensing requirements apply to high hazard activities such as nuclear installations and asbestos stripping:
 - Lower court maximum £20 000 and/or 12 months' imprisonment*
 - Higher court maximum unlimited fine and/or 2 years' imprisonment.

On conviction of directors for indictable offences in connection with the management of a company (all of the above, by virtue of the HSW Act sections 36 and 37), the courts may also:

- make a disqualification order (Company Directors Disqualification Act 1986, sections 1) and 2). The courts have exercised this power following health and safety convictions. Health and safety inspectors draw this power to the court's attention whenever appropriate.
 - Lower court maximum 5 years' disqualification

- Higher court maximum 15 years' disqualification

It is for the Courts to decide the penalty in any given case, taking into account the severity of the offence.

The Regulations provide a defence of due diligence. They also provide for proceedings to be taken against a person other than the principal offender, if it is the other person's fault, and against officers of a company or other body corporate.

Footer to previous page:

(* The sentencing option of 12 months applies in Scotland but will only apply in England and Wales when section 154(1) of the Criminal Justice Act 2003 is enacted. † For some offences under section 33 of the HSW Act the penalties vary. Details can be found in the explanatory note to the Health and Safety (Offences) Act 2008.)

Other Legislation

Other legislation: the Health and Safety at Work etc Act 1974, the Health and Safety at Work (Northern Ireland) Order 1978 and the General Product Safety Regulations 2005 continue to apply.

General Product Safety Regulations 2005 (S.I. 1994/2328): these Regulations, which implement the General Product Safety Directive (92/59/EEC), came into force on 1 October 1995. They replace section 10 (the general safety requirement) of the Consumer Protection Act 1987. They apply to new and second-hand products supplied by business to consumers for their private use. The Regulations cover a wide range of products but do not apply to products covered by specific Community law which is comprehensive in terms of safety coverage (such as the Machinery Directive). They will therefore be relevant to some machinery which is outside the scope of the Machinery Directive, for example second-hand machinery.

Provision and Use of Work Equipment Regulations 1998

What is PUWER?

PUWER 1998 replaces the Provision and Use of Work Equipment Regulations 1992 and carries forward these existing requirements with a few changes and additions, for example the inspection of work equipment and specific new requirements for mobile work equipment. Many aspects of PUWER should therefore be familiar to you.

The Regulations require risks to people's health and safety, from equipment that they use at work, to be prevented or controlled. In addition to the requirements of PUWER, lifting equipment is also subject to the requirements of the Lifting Operations and Lifting Equipment Regulations 1998.

The corresponding legislation in Northern Ireland is The Provision and Use of Work Equipment Regulations (Northern Ireland).

What does PUWER do?

In general terms, the Regulations require that equipment provided for use at work is:

- suitable for the intended use;
- safe for use, maintained in a safe condition and, in certain circumstances,
- inspected to ensure this remains the case;
- used only by people who have received adequate information, instruction and training;
- and accompanied by suitable safety measures, e.g. protective devices, markings, warnings.

What equipment is covered by the Regulations?

Generally, any equipment which is used by an employee at work is covered, for example hammers, knives, ladders, drilling machines, power presses, circular saws, photocopiers, lifting equipment (including lifts), dumper trucks and motor vehicles. Similarly, if you allow employees to provide their own equipment, it too will be covered by PUWER and you will need to make sure it complies.

Work equipment must have met all the requirements of the Regulations from 5 December 1998. However, requirements relating to certain aspects of mobile work equipment (see below) did not apply to such equipment (provided for use in the business before 5 December 1998) until 5 December 2002. Examples of uses of equipment which are covered by the Regulations include starting or stopping the equipment, repairing, modifying, maintaining, servicing, cleaning and transporting.

Do the Regulations apply to me?

If you are an employer or self-employed person and you provide equipment for use at work, or if you have control of the use of equipment, then the Regulations will apply to you. They do not apply to equipment used by the public, for example compressed-air equipment used in a garage forecourt. However, such circumstances are covered by the Health and Safety at Work etc Act 1974 (HSW Act).

While your employees do not have duties under PUWER, they do have general duties under the HSW Act and the Management of Health and Safety at Work Regulations 1999 (MHSWR), for example to take reasonable care of themselves and others who may be affected by their actions, and to co-operate with others.

The Regulations cover places where the HSW Act applies - these include factories, offshore installations, offices, shops, hospitals, hotels, places of entertainment etc. PUWER also applies in common parts of shared buildings and temporary places of work such as construction sites. While the Regulations cover equipment used by people working from home, they do not apply to domestic work in a private household.

What do the Regulations require me to do?

You must ensure that the work equipment you provide meets the requirements of PUWER. In doing so, you should ensure that it is:

- suitable for use, and for the purpose and conditions in which it is used; maintained in a safe condition for use so that people's health and safety is not at risk;
- inspected in certain circumstances to ensure that it is, and continues to be, safe for use. Any inspection should be carried out by a competent person (this could be an employee if they have the necessary competence to perform the task) and a record kept until the next inspection.

You should also ensure that risks, created by the use of the equipment, are eliminated where possible or controlled by:

- taking appropriate 'hardware' measures, e.g. providing suitable guards, protection devices, markings and warning devices, system control devices (such as emergency stop buttons) and personal protective equipment; and
- taking appropriate 'software' measures such as following safe systems of work (e.g. ensuring maintenance is only performed when equipment is shut down etc), and providing adequate information, instruction and training.

A combination of these measures may be necessary depending on the requirements of the work, your assessment of the risks involved, and the practicability of such measures. You need to ensure that people using work equipment have received adequate training, instruction and information for the particular equipment.

Mobile work equipment

In addition to these general requirements which apply to all work equipment, Part III of PUWER contains specific duties regarding mobile work equipment, for example fork-lift trucks and dumper trucks. You should ensure that where mobile work equipment is used for carrying people, it is suitable for this purpose. Measures should be taken to reduce the risks (e.g. from it rolling over) to the safety of the people being carried, the operator and anyone else.

Power presses

Part IV of the Regulations also contains specific requirements regarding power presses.⁴ In particular, you should have a power press, and associated guard or protection device, thoroughly examined at specified intervals and inspected daily in use to ensure that it is safe. This work should only be performed by a competent person and records should be kept.

How do the Regulations relate to other health and safety legislation?

The requirements of the Regulations need to be considered alongside other health and safety law. For example, section 2 of the HSW Act requires all employers to ensure, so far as is reasonably practicable, the health, safety and welfare of all their employees. Similarly, the MHSWR contain important duties relating to the carrying out of a risk assessment to identify measures that you can take to eliminate, or reduce, the risks presented by the particular hazards in your workplace. Guidance on how to do this is set out in *5 steps to risk assessment*.

Other more specific legislation may also apply, for example:

- the Workplace (Health, Safety and Welfare) Regulations 1992, which cover, for example, workplace risks to pedestrians from vehicles.
- the Construction (Design and Management) Regulations 2007, which contain, for example, specific requirements relating to certain types of work equipment such as scaffolding.

Generally, if you are meeting the requirements of more specific legislation such as those outlined above, then this should normally be sufficient to meet the more general requirements of PUWER.

Specific requirements

These apply only to equipment which has not been supplied in compliance with relevant EC product Directives, such as the Machinery Directive. They cover:

- guarding of dangerous parts of machinery (replacing the current law)
- protection against specific hazards, i.e. falling/ejected articles and substances
- rupture/disintegration of work equipment parts, equipment catching fire or
- overheating, unintended or premature discharge of articles and substances, explosion;
- work equipment parts and substances at high or very low temperatures
- control systems and control devices
- isolation of equipment from sources of energy
- stability of equipment;
- lighting
- maintenance operations; and
- warnings and markings.

Sources of Reference

General

Enquiries relating to policy issues, particularly those which need to be taken up at the European level should be addressed to:

Department for Business, Innovation & Skills
Environmental & Technical Regulation Directorate
Bay 1105
1 Victoria Street
London SW1H 0ET

Tel: +44 (0) 207 215 0923
e-mail: graham.payne@bis.gsi.gov.uk
Web: <http://www.bis.gov.uk>

Availability of the Regulations

The text of the Supply of Machinery (Safety) Regulations 2008 (SI 2008/1597) is available from the OPSI website at:

http://www.opsi.gov.uk/si/si2008/uksi_20081597_en_1 or

via the Official Journal of the European Communities at:

http://eur-lex.europa.eu/LexUriServ/site/en/oj/2006/l_157/l_15720060609en00240086.pdf

British Standards Institute can provide information about the standards which may be used to demonstrate conformity with the essential health and safety requirements. Enquiries should be addressed to:

BSI Information Centre
Mechanical Group
389 Chiswick High Road
Chiswick
London W4 4AL

Tel: +44 (0) 208 996 7024
Web: <http://www.bsonline.bsi-global.com>

CEN – European Committee for Standardisation

Web: <http://www.cen.eu/cenorm/aboutus/index.asp>

CENELEC – European Committee for Electrotechnical Standardisation

Web: <http://www.cenelec.eu/Cenelec/About+CENELEC/default.htm>

Commission guidance on the interpretation of Directive 2006/42/EC

Hyperlink available post public launch of the guidance (anticipated December 09).

General Product Safety - information on the application of the General Product Safety Directive can be obtained from:

Department for Business, Innovation & Skills (BIS)
General Product Safety Unit,
Room 4.28
1 Victoria Street,
London SW1H 0ET
Tel: + 44 (0) 207 215 6078

Email: michael.porter@bis.gsi.gov.uk

Guide to the implementation of directives based on the New Approach and the Global Approach (commonly referred to as the 'The Blue Guide') gives detailed information on the application of the single market which encompasses the Machinery Directive. This is being replaced by the New Legislative Framework, see 'Free movement of goods' (page 4), which comes into force on the 1 January 2010. The guide can be reference at:

http://ec.europa.eu/enterprise/newapproach/legislation/guide/document/1999_1282_en.pdf

Health and Safety Executive (HSE) can give advice on enforcement matters, and on technical matters related, for example, to the essential health and safety requirements relating to machinery for use in the workplace in Great Britain. In the first instance enquirers should contact the **HSE** Infoline by

- Telephone: +44 (0) 845 345 0055
- Minicom: +44 (0) 845 408 9577
- Text: 'HSE' to 64446[†]
- Textphone: +44 (0) 845 408 9577
- Email: hse.infoline@connaught.plc.uk or hse.infoline@natbrit.com
- Web: <http://www.hse.gov.uk/feedback.htm>

Opening hours: 8 am - 6 pm (Monday to Friday).

([†] We do not charge for this service however your network provider may charge their normal network text rate).

HSE Infoline (by post)

HSE Information Services
Caerphilly Business Park
Caerphilly
CF83 3GG

HSE aims to respond to all enquiries within 10 days.

HSE Knowledge Centre in Merseyside caters for personal callers who want to consult the Health and Safety related publications held there including HSE authored material. Their address is:

HSE Knowledge Centre
Knowledge Centre
Health and Safety Executive (1G)
Redgrave Court
Merton Road
Bootle
Merseyside, L20 7HS

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CO10 2WA

Tel: +44 (0) 1787 881165
Web: <http://www.hsebooks.co.uk>

They are also available from bookshops and free leaflets can be downloaded from HSE's website at:

Web: <http://www.hse.gov.uk>

HSE Regional Offices - a list of HSE offices by regions can be found at:

Web: <http://www.hse.gov.uk/contact/maps/index.htm>

Health and Safety Executive for Northern Ireland (HSENI) can deal with enquiries relating to machinery for use in the workplace in Northern Ireland. Their address is:

Health and Safety Executive for Northern Ireland
83 Ladas Drive
Belfast
BT6 9FR

Tel: +44 (0) 800 0320 121
Email: hseini@detini.gov.uk

Independent consultants may also be able to offer advice on the Regulations. The Department is aware of a number who have indicated that they can do so. A list - Machinery Directive: Independent Sources of Advice - is available on the BIS website at:

Web: <http://www.berr.gov.uk/files/file51675.pdf>

Local authority Trading Standards Departments can deal with enquiries relating to machinery for private use (see local telephone directory for details).

Notified Bodies are appointed to carry out special conformity procedures required for machinery listed under Schedule 2, Part 4 of the Supply of Machinery (Safety) Regulations 2008. They can also offer wide-ranging advice on the Regulations. A list of UK Machinery Notified Bodies is available at:

Web: <http://www.berr.gov.uk/files/file46126.pdf>

The Guidelines on the appointment of UK Notified Bodies are available at:

Web: <http://www.berr.gov.uk/files/file49954.pdf>

The European Commission publishes an EU-wide list of such bodies on its NANDO database at:

Web: <http://ec.europa.eu/enterprise/newapproach/nando/>

Office of Rail Regulation

1 Kemble Street
London WC2B 4AN

Tel: +44 (0) 207 282 2000
Web: <http://www.rail-reg.gov.uk>

The Stationery Office Ltd

PO Box 29
Norwich
NR3 1GN

Tel: +44 (0) 870 600 5522
Email: customer.services@tso

Trade Associations can often provide advice specific to the sectors in which they operate. Lists of these can be found in your local telephone directory/Yellow Pages.

Transposed Harmonised Standards - a consolidated list which relates to the Machinery Directive can be found on the EC Europa website at:

<http://ec.europa.eu/enterprise/newapproach/standardization/harmstds/reflist/machines.html>

UK Solvit Centre can give advice where compliant machinery, partly completed machinery or safety components are denied proper access to the market in other EEA countries. Enquiries to:

Department for Business, Innovation and Skills
UK SOLVIT Centre,
Bay 4123,
1 Victoria Street
London SW1H 0ET

Tel: +44 (0) 207 215 2800

United Kingdom Accreditation Service (UKAS) are charged with the responsibility of assessing companies seeking appointment under the UK Machinery Regulations. Enquiries to:

UKAS
21-47 High Street,
Feltham
Middlesex.
TW13 4UN

Tel: +44 (0) 208 917 8400
Email: info@ukas.com
Web: <http://www.ukas.com/>

Environmental and Technical Regulation Directorate

<http://www.berr.gov.uk/whatwedo/sectors/sustainability/regulations/ecdirect/page12543.html>

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