

A GUIDE TO THE ISO 14001 ENVIRONMENTAL MANAGEMENT STANDARD

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Introduction

Environmental issues are becoming increasingly important to businesses of all sizes and across all industries. These issues can affect businesses in both financial and ethical ways. For example, businesses that tender for public sector contracts may be expected to have certain environmental standards in place before they will be considered for the work.

The ISO 14000 Standard is part of a family of international environmental standards that provide businesses with a systematic approach for dealing with environmental issues. ISO 14001 is seen as the cornerstone of the ISO 14000 series, as it specifies a framework of control for an Environmental Management System (EMS). Currently, it is the only standard of the ISO 14000 series where it is possible to be certified by an external certification body.

This factsheet explains what ISO 14001 covers and how assessments are conducted, and explores the advantages of its implementation. It also provides sources of further information.

What is ISO 14001 and who controls it?

ISO is the International Organization for Standardization - a worldwide federation of national standards organisations. Based in Switzerland, the ISO is the world's largest developer of International Standards and consists of 158 member countries worldwide. ISO standards are usually reviewed on a five-year cycle.

ISO 14001 was introduced as a standard in 1996. It covers the requirements for an EMS, and considers the monitoring, control and management of activities that have a direct or indirect impact on the environment.

ISO 14001 aims to help organisations comply with environmental management related aspects of their production and output. It requires organisations to assess the environmental impact of their activities, deciding what they need to change, working out how they should do it and putting plans into action.

As explained, ISO 14001 is part of the wider ISO 14000 series. The series is divided into a number of separate parts, many of which are guidance documents, under the general heading of environmental management. It includes guidelines on auditing and issues such as labelling.

What does ISO 14001 cover?

The focus of the Standard is the EMS. This involves the establishment and implementation of a documented system of procedures, practices and instructions, and allows a business to be certified by a third party. It is a management tool, which enables an organisation to control its impact on the environment. Establishing an EMS involves a number of key steps:

- A detailed review, which covers past, present and future aspects of a business' environmental impact over which it has control or influence. Once this formal review is conducted, you should focus on developing an environmental policy and setting implementation targets. Considerations will include the

implications for your staff, training, communications and resources. Procedures and training schemes should be developed so staff understand the new systems and how they will be implemented.

- Commitment to an environmental policy based on the review of current practices. The policy should be a statement of intentions and principles in relation to environmental performance, and should provide a framework for action. It should set objectives and targets and commit your business to regulatory compliance. The policy should help change your management approach rather than simply being a tool to achieve certification. Usually a member of staff will be appointed to lead a project team to implement the policy.
- The EMS should be continually reviewed to check that it remains fit for purpose. Auditors must be appointed and trained to ensure that targets are achieved. Auditing will help you to structure the development of the system and will enable you to understand in which areas your business is weak.
- Documentation is needed to make sure that everybody knows what they are required to do and how different issues relate to each other. You should produce a manual that clearly outlines your policy and individual responsibilities, plus emergency procedures where relevant. There should also be a reference system to enable staff to identify, locate, use and update relevant documentation which the manual does not include.

These documents will be essential for the accreditation procedures of external auditors. However, they need not be paper-based and could, for example, be located on your business' Intranet.

What are the advantages of implementing ISO 14001?

ISO 14001 can help your business to reduce waste and energy loss. In turn this can help your business reach Government targets for improved environmental performance, as well as saving money. It can also help you make sure your business complies with environmental legislation and reduces its environmental impact.

Additionally, attaining ISO 14001 can help your business to achieve:

- More effective operations and processes.
- A more responsible and marketable image and reputation to project to customers and employees.
- Improved investment potential - investors are increasingly likely to look at poor or non-existent environmental management as indicating greater risk.
- Lower costs as a result of efficiency, for example relating to use and wastage of materials and any environmental clean-up costs.
- Increased competitiveness and access to markets that are environmentally sensitive.

- Compliance with proposed Government and European eco-auditing procedures.
- Improved health and safety performance.
- Reduced levels of energy and materials consumption.
- Reduced insurance costs.

What are the disadvantages in obtaining ISO 14001 registration?

There are some drawbacks to achieving ISO 14001 registration, which must be given due consideration before deciding to go ahead with the registration process.

- Accreditation can be expensive for a small business to obtain and maintain.
- It would be unusual to seek ISO 14001 certification without already having a documented Quality Management System (QMS) in place. ISO 9001 is the designated standard for a QMS with which ISO 14001 was designed to be compatible. Because of this, for many businesses it is better to seek ISO 9001 before or at the same time as ISO 14001.
- The timescale for obtaining certification can be long and there are no shortcuts.
- Promoting staff enthusiasm for the system is an ongoing managerial task.
- All aspects of the system, not just any documentation involved, must be kept under review and updated as required.

What steps need to be taken for achieving ISO 14001 registration?

Steps that should be taken to cover ISO 14001 registration include:

- Gain a full understanding of the Standard and what it will mean for your business. Decide whether you will engage outside help or conduct the whole procedure yourself with internal staff and resources.
- Present the concept positively to motivate and involve staff, and set up teams to design the EMS and document the necessary procedures.
- Prepare a project plan, including the creation of manuals to ensure that all documented procedures meet the requirements of the Standard. A standard toolkit can be purchased to help with this - see the ISO Café contact details in the 'Further Information' section for more information. The whole plan will then be laid out to determine the project goals, identify all responsibilities, include the necessary staff training and set up a project timeline.
- Set up a steering team. The team must represent all the main process areas of your business, such as manufacturing, quality, admin, sales and marketing. You will need to appoint people with the experience and authority to make decisions, and allocate the necessary resources. This team will monitor progress, resolve problems and co-ordinate the design of the EMS.
- Set up task teams. Each process will have its own task team to redesign procedures if necessary and document them once they meet the requirements of the Standard.
- Train staff on the implementation of ISO 14001, as they will need to understand the requirements of their job function and how it contributes to meeting quality policies.
- Train the required number of staff to undertake your internal auditing. They will need the skills to:

- Prepare an audit plan.
- Conduct procedural meetings.
- Audit documents and records.
- Document findings and write the audit report.
- Report findings to management.

- It will be important to use the implemented system for a few months to fine-tune it, and collect records. During this period you must:

- Follow all documented procedures and work instructions.
- Make improvements to the process.
- Conduct internal audits.
- Hold regular management review meetings.
- Keep fully documented records for registration auditing procedures.
- Undergo the registration audit. Once you are ready for audit, your appointed lead assessor will make arrangements for an independent auditor to conduct the formal assessment. The registration auditor will be looking for evidence that you are fully compliant with the requirements for ISO 14001. This will be found in the records that your EMS generates, so ensure that you are strictly following all the requirements of the standard. Ensure that you run your system for sufficient time before your audit so that there are enough records for the auditor to review.

- Following approval of the independent auditor's recommendation, your registration will be formally recognised by the certification body's Approvals Board, and your certificate of conformity to the Standard will then be issued.

- Having achieved registration, you will need to maintain it, and your lead assessor will normally remain available to help with improvements and to ensure that you continue to meet the requirements of the Standard.

How do you select an appropriate certification body?

Full information about registration and a list of accredited certification bodies can be obtained from the UK Accreditation Service (UKAS). However, there is no requirement for certification bodies to be UKAS-accredited and some reputable certification bodies may have other forms of accreditation. See the 'Further information' section for details.

How much does it cost to achieve the Standard?

The total cost will vary according to the size and complexity of your business, whether you have a QMS in place already, (for example, for ISO 9001) and whether outside consultants are involved.

In all cases, make sure both consultant and accrediting auditor charges are clearly specified in advance: typically they will be dependent on the number of audit or consultant days required, travel costs and administration fees, plus the actual certification fee, which rises depending on the turnover of your business. For instance, organisations with turnover below £250,000 could currently pay £695 plus VAT for an audit, while those with turnover of between £2.5 million to £5 million could pay upwards of £1,595 plus VAT for an audit. See www.british-accreditation.co.uk/ISO-14001-certification-services.htm for more details on certification.

Hints and tips

- It is helpful to have the foundation of a robust QMS in place before you embark on the ISO 14001 Standard.
- It is important for all staff involved to read the Standard and ensure that they keep up to date with any changes, legislative developments and other issues.
- A preparatory environmental review must be carried out as a basis for working towards the Standard.

- All your staff should be fully committed to the system.
- It is important to remember that the system is there to help your business and should be flexible enough to cope with changes. Your business processes and activities should not be restricted by over-complicated EMS procedures.

Further information

For practical start up and small business tips, ideas, know-how and news, go to:

Website: www.enterprisequest.com

To access hundreds of practical factsheets, market reports and small business guides, go to:

Website: www.scavenger.net

- BIF 29 A Guide to ISO 9000 Quality Standards
- BIF 60 A Guide to the Environmental Protection Act 1990
- BIF 100 An Introduction to Environmental Regulations
- BIF 116 A Guide to Waste Disposal Regulations
- BIF 144 An Introduction to British, European and International Standards

Books

'ISO 14001 Environmental Systems Handbook'

Ken Whitelaw

2004

Butterworth-Heinemann

'BS EN ISO 14001:2004 Environmental Management Systems. Requirements with Guidance for Use'

British Standards Institution

2005

BSI Standards

Useful contacts

UKAS (the UK Accreditation Service) is a national accreditation body which assesses (against internationally agreed standards) organisations that provide certification and inspection services.

21-47 High Street

Feltham

TW134UN

Tel: (020) 8917 8400

Website: www.ukas.com

The BSI Group develops standards and provides testing services, training and information.

389 Chiswick High Road

London

W4 4AL

Tel: (020) 8996 9001

Website: www.bsi-global.com

Useful websites and portals

There are many websites that supply plain English 'translations' of all the ISO 14000 and 14001 documentation, as well as some of their own guidance documents, free of charge. On a chargeable basis, they will also provide help and consultancy tailored to your specific circumstances and requirements. They include:

BSI UK provides a variety of business services including training and management systems assessment and certification.

Website: www.bsigroup.co.uk

The British Accreditation Bureau accredits people, services and organisations to ISO management standards, and also designs and manages bespoke accreditation schemes.

Website: www.british-accreditation.co.uk

The ISO Café is a service provided by the International Organization for Standardization (ISO) and is an informal website with a plain English overview of the system, and many examples of ISO standards in practice.

Website: www.iso.org/iso/newsandmedia/theisocafe.htm

CONTACT-

for further information.

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