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DIFFERENCES BETWEEN ISO 9001 AND ISM CODE

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ABSTRACT

During the last decade, all those who are interesting in the shipping industry have become aware of the problem. Many of those parties have declared that the reasons of this problem are the changes affected the market mechanisms, and the fleets alliances. How ever, there were many other factors that strongly contribute on the world fleet declination, generally the limitation of those developing countries to implement and comply with the recent and most frequent technical amendments to IMO instruments, the use of tacit acceptance techniques to put the technical amendments into force, and the broad application of Port State Control all over the world. This paper highlights the Background of ISO, Types of ISO, Advantage and disadvantage, how to get ISO certificate and Relationship between ISO & The mandatory ISM Code, to ensure that shipboard risks are managed effectively and performance is improved. Its requirements include measures to establish safety procedures and prevent pollution.

KEYWORDS: ISO International, Certificate and Relationship, ISM Code

INTRODUCTION

ISO is an independent, non-governmental organization made up of members from the national standards bodies of 164 countries. These national standards bodies make up the ISO membership and they represent ISO in their country. It was founded in 1947; this international institution initially focused on developing technical standards for specific products such as films and screws, ISO has expanded its scope significantly, and now develops management system standards and other protocols that have significant environmental and social policy implications. Since its foundation has published more than 19 000 International Standards covering almost all aspects of technology and business. From food safety to computers, and agriculture to healthcare, ISO International Standards impact all our lives. It has its headquarters in Geneva, Switzerland. ISO develops International Standards. The three official languages of the ISO are English, French, and Russian.

Incentive Stock Option a type of employee stock option which provides tax advantages for the employer that a non-qualified stock option does not, but which is subject to more stringent requirements. For ISOs, no income tax is due when the options are granted or when they're exercised. Instead, the tax is deferred until the holder sells the stock, at which time he/she is taxed for his/her entire gain. As long the sale is at least two years after the options were granted and at least one year after they were exercised, they'll be taxed at the lower, long-term capital gains rate; otherwise, the sale is considered a "disqualifying disposition", and they'll be taxed as if they were nonqualified options (the gain at exercise is taxed as ordinary income, and any subsequent appreciation is taxed as capital gains). ISOs may not be granted at a discount to the current stock price, and they are not transferable, except through a will, also called qualified stock option.

International Organization for Standardization, The world's largest standards developer, a non-governmental organization established in 1946, consisting of a network of 156 countries' national standards institutes with one member representing each country. The organization is managed by a general secretariat in Geneva, Switzerland.

The three official languages of the ISO are English, French, and Russian. The organization's logos in two of its official languages, English and French, include the word ISO, and it is usually referred to by this short-form name. The organization says that ISO is not an acronym or initialism for the organization's full name in either official language; rather, recognizing that its initials would be different in different languages, it adopted ISO, based on the Greek word isos (meaning equal), as the universal short form of its name. However, one of the founding delegates, Willy Kuert, recollected the original naming question with the comment: "I recently read that the name ISO was chosen because 'iso' is a Greek term meaning 'equal'. There was no mention of that in London!"

Members

SO have 162 national members, out of the 205 total countries in the world, ISO has three membership categories: Member bodies are national bodies considered the most representative standards body in each country. These are the only members of ISO that have voting rights.

Correspondent members are countries that do not have their own standards organization. These members are informed about ISO's work, but do not participate in standards promulgation. Subscriber members are countries with small economies. They pay reduced membership fees, but can follow the development of standards. Participating members are called "P" members, as opposed to observing members, who are called "O" members.

History

The organization today known as ISO began in 1926 as the International Federation of the National Standardizing Associations (ISA), whose focus was mainly mechanical engineering. It was disbanded in 1942 during World War II but was reorganized under its current name, ISO, in 1946, when delegates from 25 countries met at the Institute of Civil Engineers in London; the new organization officially began operations in February 1947.

ISO is a voluntary organization whose members are recognized authorities on standards, each one representing one country. The bulk of the work of ISO is done by the 2,700 technical committees, subcommittees, and working groups. Each committee and subcommittee is headed by a Secretariat from one of the member organizations.

OBJECTIVES

ISO 9001:2008 QMS Standard requires that organization develop measurable quality objectives, consistent with the quality policy of the organization. Internal and external auditors review quality objectives at each audit to see if they are being met. For planning of the quality management system it is necessary to establish measurable quality objectives. Requirements with respect to quality objectives are mentioned in clause 5.4.1 of ISO 9001:2008 Standard.

The top management of the organization needs to establish quality objectives. Top management of the organization must ensure that quality objectives (including those needed to meet requirements for the product) are established at relevant functions and levels within the organization. The quality objectives must be measurable and consistent with the quality policy of the organization.

Clause 7.1 (a) of ISO 9001:2008 QMS Standard lays down that in planning product realization, the organization must determine quality objectives and requirements for the product. It is evident from this clause that the ISO 9001:2008 Standard now calls for objectives not only for the quality management system but also for the product.

When setting up quality objectives, look for activities or indicators that employees can relate to and that can be measured. A few examples may be:

- Reducing the production time
- Achieving no failures or defects in production
- Achieving cost reduction
- Improving productivity
- Increasing market share

It is very important point that people in the organization must be aware of how they contribute to the achievement of the quality objectives. Therefore, employees in the organization must know and understand the specific quality objectives that have been set up for their functions and level and how they can achieve them. For awareness of quality objectives, specific training sessions or campaigns may be organized.

Types of ISO Certification

ISO, the International Organization for Standardization, is the world's largest standards-writing body. Its 18,500 international standards cover a wide range of sectors, including agriculture, engineering, manufacturing, management, and IT. By implementing these standards, businesses like yours can meet globally-recognized requirements and open doors to new markets.

Similar to ISO, Intertek operates internationally in a wide range of sectors. So it is no surprise that we offer certification to many ISO standards, including:

ISO 9001 Certification — Quality Management Systems

ISO 13485 Certification — Medical Quality Management Systems

ISO 14001 Certification — Environmental Management Systems

ISO 14971 Certification — Risk Management Systems

ISO 20000 Certification — IT Service Management Systems

ISO 22000 Certification — Food Safety Management Systems

ISO 22716 Certification — Cosmetics Good Manufacturing Practices (GMP)

ISO 27001 Certification — Information Security Management Systems

ISO 50001 Certification — Energy Management Systems

ISO/TS 16949 Certification — Automotive Quality Management Systems

How to Get ISO Certificate

Organizations and companies often want to get certified to ISO's management system standards (for example ISO 9001 or ISO 14001) although certification is not a requirement. The best reason for wanting to implement these standards is to improve the efficiency and effectiveness of company operations.

A company may decide to seek certification for many reasons, as certification may:

- Be a contractual or regulatory requirement
- Be necessary to meet customer preferences

- Fall within the context of a risk management programmers, and
- Help motivate staff by setting a clear goal for the development of its management system.

ISO develops International Standards, including management system standards such as ISO 9001, ISO 14001 and ISO 31000. However, it is not involved in the certification to any of the standards it develops. Certification is performed by external certification bodies, which are largely private. Therefore a company or organization cannot be certified by ISO. When a company or organization is certified to an ISO standard they will receive a certificate from the certification body. Even though the name of the ISO standard appears on this certificate, it is not ISO that has issued it.

Although ISO does not perform certification, its Committee on Conformity Assessment (CASCO) has produced a number of standards that relate to the certification process. The voluntary criteria contained in these publications are an international consensus on good practice relating to certification. Companies and organizations usually operate their certification activities in accordance with these international standards.

Basically, there will be four major steps in your ISO certification process.

Write Documentation

You'll need a written quality manual, certain written procedures, and probably some forms. Some records will have to be kept. Your documentation will have to meet the requirements of the ISO quality standard. It will also have to fit your company's quality goals. Your quality documentation says what you do, how you do it, and provides proof that you do it. You must be able to demonstrate that you are continuously improving your quality system as well as your product or service, and your customers' satisfaction.

Training

All of your people will require some training. The amount of training is dependent on each individual's responsibilities.

Practice and Live with Your Quality System for a Few Months

Undoubtedly you will find that some changes need to be made. Keep records in accordance with your quality system. After a few months your quality system and your people should be ready for the registration audit.

Get Audited

The number of auditors needed, and the time involved to conduct a registration audit will vary according to the size and complexity of your company. During an ISO audit, the auditor(s) will examine your records and will talk with your people. It is very important that your staff is properly trained and that your records are in order. Auditors write up problems as "nonconformances". Nonconformance's can be "major" or "minor". Auditors can also write up "observations". A major nonconformance will cause you not to get certified to the ISO standard. Minor nonconformance's may or may not prevent your certification; it all depends on the number and severity of your nonconformances. Auditors have a fair amount of discretion in what they write up, and whether or not you will get certified on your first try. Observations will not cause you to lose your certification; they are usually suggestions by the auditor for how you might be able to make improvements to your quality system.

Problems

There are doubts among quality experts about possible problems in obtaining the certificate, including

- The ever-increasing numbers of agents of the International Standards which creates competition among them and thus occurs concessions
- These agents do not agree on the interpretation of these specifications, which creates a lot of inconsistency,
- Cost large direct and indirect for the application process and obtain the certificate.
- Effort that needs quality system documentation and training of staff
- The need to change some of the current practices in the company or organization in order to meet the requirements of the specification, which may sometimes find resistance from the workers

The Benefits and Advantages of Obtaining the ISO

The benefits obtained by the Company from the careful application of quality concepts lead to several benefits of the institution or company in general such as:

- We find that some institutions and companies requiring those other clients to obtain a certificate of international standards for quality.
- Most of these concepts are sponsored and international institutions on a global level, making the spread of these concepts as bases general and universally recognized standards and required.

So company on the application of these concepts and standards contribute to the advancement of companies around the world.

- The adoption of uniform standards leads to similar working conditions (in general) there which makes convergence and post between companies with similar Employment throughout the world.
- The similarity of standards and working conditions lead to benefit from the experience of advanced companies in its field and lead to the transfer of successful experiences of emerging companies.
- Providing employees with a variety of skills leading to the development of manpower capabilities of the company.
- Proper use of resources (physical, natural and human.), especially at a time when scarcity of resources specific barrier to many companies.
- Material gains through optimal use of resources and savings in the cost of resources used and reduce expenses.

Accrued Benefits of Obtaining the ISO

- ISO system itself is a tool or a means to correct errors and ensure they are not repeated.
- System determines the administrative responsibilities and powers and accountability for errors.
- Establishes statistical techniques that can institution to assess and understand the information systems within the organization helps to make the right decisions.
- Control and inspection system to ensure the achievement of quality requirements to meet the wishes of customers and consumers.
- ISO 9000 are becoming more important for several reasons, including:

  As the moment of application decisions WTO in the first of January 2005 and when they become institutions all

over the world have equal right in the market, there is no monopoly or feature provides an institution for the other, and winning comes from the ability of the institution to satisfy its clientele, and the first step to satisfy dealers is to get an ISO 9000 certificate will therefore expect every customer in the end that installations of any kind or size that did not get a certificate seeks to get them.

- Also more than important, it is considered the gateway to the countries of the European Union and the United States of America and Canada, Obtaining this certificate gives the organization that obtained the right to enter this huge market, it gives a competitive advantage for organizations that got them.
- Trade facilitation and standardization of patterns and principles used throughout the world.
- It is also the first step for the application of total quality management in spite of their inability to apply principles such as continuous improvement, but it helps to clarify the current status of the performance they are fully documented performance of the institution and the establishment of a quality manual, and here you can move towards the application of Total Quality Management, which owns the tools and techniques which managed to achieve this improvement.

The Importance of the ISO 9000 System within the four Main Pillars

Can be summarized most of the benefits of getting ISO certification within four main pillars:

- Product quality: This is done through periodic review of methods and means of production and constantly improved and developed and then documented and acted upon.
- Competition: The company's access to ISO incentive to maintain a high level of quality, especially in the face of competitors that did not qualify for such a certificate produces similar kinds of classes.
- Customer Service: In many cases, especially in export markets, the importer requests that source must have a certificate of ISO.
- Productivity and profitability: This is done by increasing the effectiveness of the organization through product quality and competitiveness, and thereby led to increased sales volume and profitability.

MAJOR DIFFERENCES BETWEEN ISO 9001 AND ISM CODE

The International Management Code for the Safe Operation of Ships and for Pollution Prevention (ISM Code) provides an international standard for safe management and operation of ships with a conscious effort toward protecting the environment. The International Maritime Organization (IMO) mandates the application of the ISM Code to all vessels and the ISM Code is mandatory to all vessels of 500 gross tonnages and upward including mobile offshore drilling units. The ISM Code requires that companies establish safety objectives as per section 1.2 of the Code and in addition the companies are required to develop, implement and maintain a safety management system which includes functional requirements as per section 1.4.While ISO 9001 is not mandatory.

The ISM Code is a mandatory requirement for vessels trading internationally. For vessels trading in domestic waters, national governments may legislate to use the ISM Code. The ISM Code section 1.3, which states that the ISM Code may be applied to all ships, is now being brought in for domestic vessels by most countries. The United States Coast Guard (USCG) has been implementing portions of the Code, and is systematically considering applying the ISM Code to ferries. The application of the ISM Code is meant to support and encourage the development of a safety culture in shipping. Success factors for this safety culture are a commitment to values and beliefs.

Both ISO 9001 and the ISM Code specify a systematic approach to management by those responsible for management of ships. Qualified ISO 9001 auditors who have the competence required to determine the effectiveness of a system are encouraged to attend the ISM Code course to determine the effectiveness of the Company's safety management system. The ISM Code describes the responsibilities of the Master and the Designated Person (Management Representative). Job descriptions are required for these and other crew. "Manning agents" are subcontractors of the company and are required to provide trained sea farers. Training is specified for the crew and personnel ashore. Consider how to audit the linkage of training records to the rapidly changing identity of the crew.

Quality planning for shipping is a complex process. For example, cruising or sailing the high seas and inland waterways is risky enough to demand procedures that identify, describe and respond to potential emergencies from dock-to-dock. Accidents and hazardous occurrences (near misses) are fed into the corrective action process.

As you should expect, maintenance of the ship and equipment goes way beyond the comparatively bland requirement of 7.5.1 in ISO 9001:2008.

Most other requirements are shared with ISO 9001. By knowing ISO 9001 and relating this knowledge to the ISM Code, maritime students succeeding on our RABQSA certified (IRCA recognized) class for training ISO 9001 lead auditors should also feel confident enough to conduct ISM audits of management systems both aboard and ashore.

ISM Code with ISO 9001 provides a basis for ensuring management systems are also driven by customer needs for the continued success of shipping companies around the world.

CONCLUSIONS

Quality systems management have used for decades in the community developed and proved very successful in accessing the product or service provided to the highest quality desired, also used quality systems in safety management in companies installations Petroleum working away from the coast during the last decades of the twentieth century also, the desire of those interested in maritime safety to reach the highest degree of safety and security at the facilities of the hazardous nature and critical, and as a result resorted to some shipping companies to use quality standards in management in general on all activities of the company from purchasing, selling, set, and also as a branch of the company's activities on safety, and the most common of these standards ISO standards, terms of use ISO 9000 series, which uses them ISO 9002 standards in the shipping companies where it's most convenient, they are goals the product's ability to control the actions that depend on the quality of its services.

In the early nineties, after the English ship disaster Free Enterprise in the English Channel, as ship capsized near Belgian in 1987, and 193 people lost their lives in the disaster, which resulted from the sailing ship and slots provided Bow Ports the open. International Maritime Organization (IMO) attention to the role of management and the use of modern methods in quality safety and pollution management, the decision came A. 740 (18), your CODE International Safety Management and became this code compulsory implementation at the shipping companies operating the ships high-risk, such as tankers and bulk vessels and passenger rolling as of June 1998, and ships the goods to the public and drilling units mobile offshore bulk of 500 tons as of the first of June 2002.

To understand the quality systems in the management of maritime safety, we must first define the meaning of quality they have meaning in a positive understanding usually refers to confidence in the product or service provided, but there may be another meaning of quality shows why resorted to Empirical many companies in management, quality is (Quality) in the simple meaning as defined in the series not to ISO (8402) is characteristics of a product or service seem

able to satisfy stated or implied needs. But this definition may not seem to some easy to understand, and therefore can be simply defined quality as the ability to achieve the desired objectives of the product or service provided, as expected by the client exactly, quality is when placed in a mathematical formula found equal quotient of performance expectations, and the ratio resulting be less than the correct one usually when the performance is less than expected or in other words the inability to fully achieve the goals, and this is what makes international bodies seeking to implement safety standards of quality in safety management to achieve public goals through quality management systems.

REFERENCES

1. IMO: International Safety Management (ISM) Code.
2. IMO: International Convention Standard of Training, Certification and Watch keeping, STCW 1978/Code 1995.
3. IMO: Human resources Management – model Course 5.04.
4. IMO: Human Relationships – Model Course 1.21.
5. *Rothblum, Anita (1999) "Human Error and Marine Safety" U.S. Coast Guard Research & Development Center, Washington. http://www.uscg.mil/hq/g-m/risk/*
6. *Fairplay (2002) "Ship Losses 2002". Feb. 2002 p.4.*
7. *SSMR- Shipping Statistics and Market Review (2003) "Maritime Casualties", ISL August/September 2003, P. 9-10/40-43.*
8. www.iso.org
9. *http://en.wikipedia.org/wiki/International_Organization_for_Standardization*
10. *http://iso9001-2008awareness.blogspot.com/2009/08/quality-policy-and-quality-objectives.html*
11. *http://www.gl-group.com/pdf/0E225_ISM_ISO9001_ISO14001.pdf*