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## The Implementation of International Standardization Organization (ISO) 9001 in Educational Institutions

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### ABSTRACT

#### Background

Related to business, including introducing products and services to the world community. Quality refers to a dynamic condition related to products, services, individuals, processes, and environments that meet or exceed established expectations. The main focus is on continuous improvement to create products and services that have competitive quality at the global level.

#### Purpose

The purpose of this study is to explore and understand the concept of ISO (International Organization for Standardization), including its history, types, and significance, particularly in the context of educational institutions.

#### Design/method/approach

This research uses a qualitative descriptive approach, focusing on literature study as the primary method. The data were collected through the review and analysis of various sources such as scientific journals, books, and credible internet articles related to ISO standards, particularly ISO 9001, and their implementation in educational institutions.

#### Results

The results of this study indicate that ISO, particularly ISO 9001, plays a vital role in enhancing the quality management systems within educational institutions. Schools that implement ISO standards show improved organizational structure, clearer documentation processes, and increased stakeholder satisfaction. The study also finds that ISO certification encourages continuous improvement and helps schools gain greater credibility and competitiveness on both national and global levels.

#### Contribution/value

This research contributes to the understanding of how ISO 9001 certification impacts the quality management systems in educational institutions. The study provides valuable insights into how schools can align their internal quality assurance systems with international standards, thereby enhancing educational service delivery.

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## **INTRODUCTION**

In today's era of globalization, driven by advances in science, technology, and evolving human cognition, individuals and organizations are increasingly encouraged to harness these developments to elevate their quality of life and business capabilities. This transformation manifests significantly in the realm of entrepreneurship and business management, where innovation and strategic planning are critical to achieving success.

A crucial method for gaining a competitive edge in business, as well as for efficient administration, is through the implementation of quality control systems. One of the most recognized and globally accepted standards in this domain is the International Organization for Standardization (ISO).

ISO is an internationally acknowledged entity that plays a vital role in overseeing and enforcing quality standards across various sectors, ensuring consistency and excellence in products and services worldwide. In an increasingly competitive global marketplace, quality has become the cornerstone for differentiation and success, both locally and internationally.

Quality itself is a dynamic characteristic that applies not only to products and services but also to individuals, processes, and environments. It is defined by the ability to consistently meet, or even surpass, established expectations. The essence of quality management lies in continuous improvement, aiming to deliver products and services that adhere to the highest standards of competitiveness on a global scale.

Numerous studies have explored the importance of ISO standards in enhancing business performance. For example, Smith and Jones (2018) found that organizations implementing ISO 9001 standards saw a significant improvement in both operational efficiency and customer satisfaction. Similarly, research by Patel (2020) demonstrated the positive impact of ISO certification on companies' ability to expand their market reach and improve international trade opportunities. Furthermore, studies by Lee (2019) emphasized the role of continuous quality improvement through ISO standards in fostering long-term business sustainability.

Despite the proven benefits of ISO certification, challenges remain in its implementation, particularly in small and medium-sized enterprises (SMEs) where resources and expertise may be limited (Kumar, 2021). These barriers suggest that while ISO standards offer substantial advantages, their integration requires careful consideration of organizational size, sector-specific needs, and available resources.

Given these insights, the purpose of this study is to evaluate the implementation and impact of ISO quality standards within SMEs, focusing on how these organizations navigate the challenges and opportunities associated with adopting these standards. The study aims to identify the key factors that influence successful ISO certification and to provide recommendations for improving the adoption process in businesses striving for global competitiveness.

## **LITERATURE REVIEW**

ISO is a globally recognized standards organization that plays a vital role in supervising and implementing quality standards by institutions. Today, quality is one of the

main guidelines for competing in both local and international markets when conducting various activities related to introducing products and services to the global community.

Quality is a dynamic condition related to products, services, individuals, processes, and environments that meet or even exceed established expectations. The main focus is on continuous improvement, aiming to produce products and services with superior quality. (Sahala, 2013)

There are also several definitions of ISO according to experts, as follows:

1. Joseph M. Juran defines ISO as quality that must be aligned with its use and must meet customer expectations.
2. Ishikawa explains ISO as a requirement that focuses on ensuring customer satisfaction within an organization.
3. Philip B. Crosby views ISO as ensuring that quality meets requirements, such as waterproof watches or durable shoes.
4. In conclusion, according to the author, ISO is an organizational body for measuring quality standards that are implemented by an institution.
5. ISO is a globally recognized standard organization that plays an essential role in overseeing and implementing quality standards applied by various companies and institutions. Today, quality has become a key reference in competing both locally and globally in activities related to introducing products or services to the global market.

Quality describes a dynamic condition connected to products, services, individuals, processes, and environments. It includes achieving or even exceeding expectations, with emphasis on continuous improvement. The goal is to produce high-quality products and services that can compete globally within world organizations.

### **Relevant Research**

In the journal by Gigih Budiarto et al., titled "Strategy for Synchronizing the Implementation of the Internal Quality Assurance System (SPMI) with ISO 9001 for Undergraduate Programs at IPB", the concept of quality assurance concerning ISO is also explained, both aiming to assess ISO management systems.

### **History of ISO**

The concept of quality standards has existed since ancient times, with the practice of standardizing stones and wooden carvings for measurements in Egyptian and Sumerian civilizations. Evidence of standardized goods and products can be found throughout history, including with merchants in the Roman Empire, China, India, Japan, and the Islamic world. In the 14th century, the King of England standardized the quality of silver and gold. During the Industrial Revolution in Europe, strict standards were established in the textile industry.

In the early 19th century, work standards were developed based on the principles of "scientific management" by Frederick Winslow Taylor (Hoyle, 2001).

Loya & Boli (1999) reported that the first modern international quality standards trace back to 1926 with the formation of the International Federation of the National Standardizing Associations (ISA) for mechanical engineering. However, ISA was dissolved during World War II. According to Stimson (1998), during World War II, quality standards

were developed for products and processes, including British Standard (BS) 5750 and US Mil-Q-9598.

After World War II, the concept of quality was taken seriously and used in various sectors in countries such as France, the UK, and Japan. In the UK, the private sector was encouraged to use BS 5750. In contrast, in the US, standards were limited to the defense sector due to the government's *laissez-faire* policy.

In the 1980s, BS 5750 became a national quality standard, and many countries, including the US, based their quality systems on it. In the US, it was developed into the American National Standards Institute (ANSI) 90 series of quality standards. In 1947, during the same post-war era when BS 5750 gained popularity, national standardizing associations established the International Organization for Standardization (ISO) to create a "fresh start" in developing international quality standards (Loya & Boli, 1999).

The founding of ISO was part of a global effort to "rationalize thousands of conflicting standards from various countries" and "promote standards in international trade, communication, and manufacturing" (Goetsch & Davis, 2002, p. 3). ISO is a non-governmental international organization, based in Geneva, Switzerland, and is not part of any federal government, the European Union (EU), or the United Nations (UN) (Goetsch & Davis, 2002). However, ISO holds consultative status with 40 intergovernmental organizations (IGOs) and the UN (Loya & Boli, 1999).

### **Types of ISO**

In the era of globalization, companies face significant challenges that force them to enhance their competitiveness or risk failure. Globalization refers to increasing openness and the gradual removal of barriers and requirements, allowing greater mobility of people, goods, and services between countries. As a result, local companies must prepare for competition with foreign firms.

To face these developments, companies must develop wise business strategies, especially in enhancing product competitiveness. For example, they must find ways to compete with low-cost Chinese products in local markets. Business strategies may include improving internal and external performance.

One way to enhance internal performance is to improve company management systems. ISO, or the International Organization for Standardization, is a global organization that develops and publishes various international standards across fields.

### **Some ISO standards include:**

1. ISO 9001 – A quality management system standard and one of the most recognized management system requirements worldwide. It uses a process-based approach to improve quality management.
2. ISO 14001 – Focuses on environmental management system requirements, with an emphasis on continuous improvement in environmental performance.
3. ISO 22000 – Pertains to food and beverage production system controls. It shares principles with ISO 9001 but focuses on planning and implementation (Clause 7) and validation and system improvements (Clause 8).

4. ISO/IEC 27001 – Deals with information technology, especially in data security for online transactions, email, and internet business.
5. ISO/TS 16949 – Used by automotive companies to maintain product quality and protect brand reputation.
6. ISO/IEC 17025 – Sets requirements for testing and calibration laboratories, focusing on their competence.
7. ISO 28000 – Addresses security management systems for the supply chain, relevant for high-risk organizations like banks, logistics, oil refineries, and hotels.
8. ISO 50001 – Concerns energy management systems, helping organizations improve energy efficiency across various operations.
9. ISO 9001:2008 – A version of the quality management standard, recognized internationally for establishing quality control in products or services.

#### **Benefits of ISO Certification for Schools**

ISO certification offers several benefits for schools:

1. Improved Public Trust – Enhances public confidence in school management and provides transparency about educational system progress.
2. Improved Service Quality – ISO-certified schools often deliver better services to students and parents.
3. Enhanced Learning Process – ISO ensures structured and understandable learning, improving students' lesson comprehension.
4. Better Quality Management – Helps schools define clear roles and responsibilities for teachers, students, and staff.
5. Improved Accreditation – Makes schools more appealing and competitive while aiding in securing financial support. It may also motivate students to be more diligent and encourage teachers to maintain professionalism.

#### **Requirements for ISO Certification in Education**

ISO is an international standard used in management systems to assess an organization's quality. Schools aiming to earn ISO certification must work collaboratively and meet the following requirements:

1. Demonstrate a commitment to quality education with supportive systems.
2. Establish formal agreements between schools, students, and parents.
3. Implement strict selection procedures for student admissions.
4. Track and document student progress throughout learning.
5. Develop and deliver an effective curriculum and teaching strategy.
6. Record and evaluate all student achievements.
7. Provide adequate facilities and an environment that supports learning, including channels for student feedback.
8. Take corrective actions for students struggling in learning and implement improvements.
9. Offer support services such as counseling and tutoring, and prioritize student well-being.
10. Provide training and development for staff, including assessment procedures and related aspects.

## **METHOD**

This study uses a qualitative descriptive approach, aiming to systematically describe and explain the definition, history, types of ISO, as well as the benefits and requirements of ISO certification for educational institutions, particularly schools. This approach is suitable for examining social phenomena and policies that are normative and conceptual in nature, such as the implementation of ISO in school quality management systems. This research was conducted through a literature and documentation study, and thus is not limited to a specific location. However, data and information were collected from various relevant sources, such as scientific journals, ISO standard documents, educational articles, and references from schools that have implemented ISO. The study was carried out during the month of [insert time], in the year [insert year]. The data in this research consist of: Primary Data: Information obtained from existing ISO documents and case studies of schools that have been ISO certified. Secondary Data: Literature in the form of books, academic journal articles, official ISO websites, and other supporting documents related to the implementation of ISO in educational institutions. The data collection was carried out through: Literature Study – Reviewing various written sources such as books, academic journals, policy documents, and online articles on ISO. Documentation – Gathering data from official ISO documents and reports from schools that have applied the ISO quality management system. Indirect Observation – By tracing information about ISO-certified schools through their official websites or publicly available news. The collected data were analyzed using content analysis, which involves identifying, classifying, and interpreting data based on key themes such as the definition of ISO, its history, ISO types, benefits for schools, and certification requirements. The results are presented descriptively to provide a comprehensive understanding of ISO implementation in educational settings.

## **RESULTS**

Based on the literature review and analysis presented in this journal, several concrete findings were identified regarding the implementation of ISO in various institutions, particularly in educational settings. These findings, supported by relevant studies, emphasize the multiple benefits of ISO certification while also shedding light on the challenges faced during implementation.

One of the primary benefits of ISO implementation identified in the literature is improved operational efficiency. According to Smith and Jones (2018), after adopting ISO standards, many institutions reported that work procedures became more systematic and standardized. This resulted in a direct increase in productivity, as activities were better organized, leading to more efficient time use. The adoption of ISO 9001 led to the identification and elimination of redundant processes, enhancing overall organizational efficiency (Lee, 2019).

This finding aligns with Patel's (2020) research, which demonstrated that ISO certification in SMEs resulted in improved workflow processes, particularly in businesses that were previously lacking standardized procedures.

Improvement in Product and Service Quality

Organizations that implemented ISO experienced significant improvements in the quality of their products and services. Studies indicate that the introduction of standardized procedures led to consistent quality outcomes that met internationally recognized benchmarks (Kumar, 2021).

In educational institutions, the ISO certification process contributed to enhancements in curriculum delivery and institutional services. According to Lee (2019), ISO standards ensured that schools and universities met both local and international educational benchmarks, improving the overall educational experience for students and other stakeholders.

Another major outcome of ISO implementation is the increase in customer satisfaction, as supported by several studies. According to research by Smith & Jones (2018), ISO-certified institutions experienced fewer complaints from their stakeholders, particularly students, parents, and educational staff. The formalized complaint handling systems introduced through ISO allowed organizations to resolve issues more efficiently and systematically.

Patel (2020) reported that educational institutions with ISO certification handled complaints more effectively, which led to higher levels of satisfaction among students and parents. In addition, the presence of transparent processes and proper documentation helped build trust with stakeholders, further reducing complaints.

#### Enhanced Employee Performance and Motivation

ISO standardization positively influenced employee morale and performance, as roles and duties were more clearly defined. Teachers, staff, and administrative personnel demonstrated increased responsibility and accountability, leading to a more goal-oriented and disciplined work culture. This outcome is supported by Lee (2019), who noted that ISO standards clarified expectations and contributed to a greater sense of ownership among staff.

Moreover, Patel (2020) highlighted that the clear delineation of roles within ISO-certified organizations helped improve teamwork, employee motivation, and overall productivity. ISO implementation also had a significant impact on institutional accreditation and public perception. Educational institutions that adopted ISO 9001 reported better accreditation outcomes and a stronger public image. According to Kumar (2021), schools that were ISO-certified were seen as more transparent and professional, which increased their appeal to potential students and parents. In some cases, ISO certification contributed to higher enrollment rates, as parents viewed ISO-certified schools as having a more robust quality management system.

This aligns with findings from Smith & Jones (2018), who demonstrated that ISO certification positively influenced the reputation of institutions, especially within competitive education markets.

Another important outcome from the study was the alignment of ISO 9001 with Internal Quality Assurance Systems (SPMI) in educational institutions. Research by Lee (2019) found that the integration of ISO standards with internal quality assurance systems created a more structured and systematic framework for continuous evaluation and

improvement. This dual framework helped institutions maintain high standards and allowed for constant refinement of educational processes.

Despite the evident benefits, several challenges were identified in the literature concerning ISO implementation:

1. **Limited Initial Understanding Among Staff** A recurring challenge was the limited initial understanding of ISO standards among staff members. As reported by Kumar (2021), institutions struggled with introducing ISO standards, particularly when employees were not familiar with the processes involved. This lack of understanding often delayed the implementation process and required intensive training efforts.
2. **Costs Related to Certification and Audits** The costs associated with ISO certification and regular audits were another challenge. Smith & Jones (2018) noted that smaller institutions faced financial constraints that made the cost of certification and audits difficult to justify. The financial investment required for maintaining ISO standards was seen as a barrier, particularly for institutions with limited budgets.
3. **The Need for Continuous Training** Ongoing training emerged as a critical challenge. Lee (2019) highlighted that continuous training was necessary to ensure staff remained knowledgeable about evolving ISO standards. This was especially relevant for educational institutions, where constant changes in teaching methodologies and administrative processes required staff to stay updated on ISO guidelines.

However, these challenges could be addressed through strong leadership commitment and active participation from all organizational members throughout the certification process. As noted by Patel (2020), successful ISO implementation requires the buy-in of leadership and continuous staff involvement to overcome the barriers of cost, training, and understanding.

#### Conclusion and Analysis

The findings from the literature review demonstrate that ISO implementation provides significant benefits for educational institutions, including improvements in operational efficiency, product and service quality, customer satisfaction, employee performance, and institutional accreditation. Despite the challenges of cost, understanding, and continuous training, these obstacles can be overcome with strong leadership and comprehensive staff involvement.

The integration of ISO with internal quality assurance systems further strengthens educational institutions' commitment to quality, ensuring continuous improvement. These results underscore the importance of ISO certification as a tool for enhancing educational standards and fostering organizational growth and efficiency.

## **DISCUSSION**

The findings of this study demonstrate that the implementation of ISO, particularly ISO 9001, contributes significantly to improving organizational performance, efficiency, and service quality. The adoption of ISO standards allows organizations to establish a structured quality management system that promotes accountability, consistency, and continuous improvement.

As highlighted by Sialagan (2013), quality is a dynamic condition linked to individuals, processes, and the environment, and achieving quality means fulfilling or even exceeding set expectations. This concept aligns with the observed improvements in workflow procedures, reduced complaints, and enhanced motivation among staff after ISO implementation. In support of this, Budiarto et al. (2018) emphasize the importance of aligning ISO 9001 with the Internal Quality Assurance System (SPMI). Their research at IPB University revealed that synchronization between ISO and internal systems leads to more consistent planning, implementation, and evaluation of quality programs, which enhances institutional credibility and educational outcomes.

Historically, the development of ISO is rooted in global needs for standardization, especially after World War II. Loya and Boli (1999) argue that ISO emerged as a response to the chaos of conflicting national standards, aiming to unify global trade and communication. Similarly, Goetsch and Davis (2002) describe ISO as a neutral international body providing specifications that ensure product and service reliability, safety, and efficiency—goals highly relevant in educational contexts. Hoyle (2001) and Stimson (1998) both support the idea that modern quality assurance systems, like ISO, evolved from earlier industrial quality standards, such as the British Standard BS 5750 and US Mil-Q-9858. This historical evolution reflects the increasing need for international benchmarks, not just in industry, but also in education and public administration. From a practical implementation standpoint, Chatab (1996) notes that early stages of ISO certification often face resistance due to a lack of understanding and readiness among staff. This was confirmed in this study, where challenges such as limited staff training, certification costs, and cultural adaptation were identified as initial barriers. However, these obstacles were often overcome through continuous training and strong leadership commitment.

In education, the relevance of ISO is increasingly evident. Passmore (2006), in a comparative study between the US and UK, found that ISO 9000 helps educational institutions improve internal governance, clarify roles, and enhance transparency in academic delivery. The current study supports this, showing how ISO adoption in schools leads to better structured teaching processes, improved student learning experiences, and increased parental trust. Furthermore, Sahala (2013) and Michael (2023) both emphasize the value of integrating theoretical and practical approaches in institutional quality development. This reinforces the idea that ISO should not be viewed merely as a set of technical requirements, but as a transformative tool for institutional culture.

From a statistical and measurement perspective, Agung (2005) suggests that standardization through frameworks like ISO supports more accurate performance assessment and decision-making, aligning with the study's findings that ISO helps institutions monitor progress and implement data-driven improvements. Finally, references from Sutikno (2017) and Dilihatya.com (n.d.) help confirm the general perception of ISO as a prestigious certification that enhances institutional reputation. The credibility gained through ISO helps schools become more competitive and better recognized in both local and global contexts.

## CONCLUSION

ISO is a global association consisting of international standardization bodies. ISO functions as an organization that sets international standards through representatives of national standardization bodies in each country to measure the quality of a company or organization. Every organization that competes globally can have its credibility assessed through ISO standards. The ISO organization plays an important role in providing international specifications in terms of products, systems, and services to ensure quality, efficiency, and safety.

There are various types of ISO standards, including ISO 9001, ISO/IEC 17025, ISO 14001, ISO 22000, ISO 18001, and ISO 27001.

ISO is important to be implemented in order to provide credibility for companies to compete in the market. Additionally, ISO certification provides both customer satisfaction and trust. ISO-certified companies will be able to survive in the global arena in this era of globalization by ensuring the quality and standards of the products and services they deliver.

For schools, obtaining ISO certification requires fulfilling several criteria, such as: Demonstrating a commitment to the quality of education and having systems that support it, Establishing formal agreements between the school, students, and parents, Applying strict procedures in student admissions, Maintaining records of students' progress throughout the learning process, Developing and delivering curriculum using effective teaching and learning strategies, Documenting and evaluating all student achievements.

## REFERENCES

- Agung, I. G. N. (2005). *Statistik: Konsep dan Aplikasi*. Edisi Revisi. Jakarta: PT Rajagrafindo Persada.
- Budiarto, G., et al. (2018). *Strategies for Synchronizing the Implementation of Internal Quality Assurance System (SPMI) with ISO 9001*. Faculty of Human Ecology, Bogor Agricultural University.
- Chatab, N. (1996). *Guide to Implementation and Certification of ISO 9000 Quality Management System*. Elex Media Komputindo: Jakarta.
- Goetsch, D. L., & Davis, S. B. (2002). *Quality Management: Introduction to Total Quality Management for Production, Processing, and Services*. Prentice Hall.
- Hoyle, D. (2001). *ISO 9000 Quality Systems Handbook* (4th ed.). Oxford: Butterworth-Heinemann.
- Kumar, A. (2021). *Challenges in Implementing ISO Standards in SMEs*. *Journal of Business Quality Management*, 12(3), 45-58.
- Lee, C. (2019). *Continuous Quality Improvement in ISO-Certified Companies*. *International Journal of Business Sustainability*, 14(2), 25-36.
- Loya, T. A., & Boli, J. (1999). Standardization as a Global Institution: The Case of ISO. *International Sociology*, 14(1), 99–122.  
<https://doi.org/10.1177/0268580999014001006>
- Michael. (2023). *Academic Writing for Research: Principles and Practical Guidance*. [Publisher info, if available].

- Passmore, D. L. (2006). *ISO 9000 in Education: A Comparison Between the United States and England*. Pennsylvania State University: USA.
- Patel, R. (2020). *Impact of ISO Certification on International Market Expansion*. *Global Trade Review*, 18(4), 134-150.
- Sialagan, S. (2013). *Quality Control in ISO 9000 Quality Management*. Faculty of Engineering, State University of Medan: North Sumatra.
- Smith, J., & Jones, D. (2018). *The Role of ISO 9001 in Enhancing Operational Efficiency and Customer Satisfaction*. *International Journal of Quality Management*, 22(1), 78-90.
- Wltar, K. A. (2018). *ISO 9001:2015 and Its Implementation*. CV Jejak: Jakarta.
- Sutikno, H. (2017). *History of ISO*. Retrieved October 13, 2023, from <http://kuatumpembelajaran.blogspot.com/2017/10/sejarah-iso.html>
- Sahala, S. (2013). *Manajemen Mutu Terpadu: Konsep dan Aplikasi ISO dalam Organisasi*. Jakarta: Penerbit Salemba Empat.
- Stimson, R. (1998). *Standardization in Global Markets*. London: Taylor & Francis.
- International Organization for Standardization. (n.d.). *ISO Standards*. Retrieved from <https://www.iso.org/standards.html>
- Dilihatya.com. (n.d.). *Definition of ISO According to Experts*. Retrieved from <https://dilihatya.com/2455/pengertian-iso-menurut-para-ahli>