
Analyzing the Gap between International Halal Standards and Local Practices in Halal Management Systems

Zuhdan Ady Fataron

Universitas Islam Negeri Walisongo, Indonesia.

* Corresponding author's e-mail: zuhdan_ady_fataron@walisongo.ac.id

ABSTRACT

This study examines the gap between international halal standards and local practices in implementing Halal Management Systems (HMS). Through a comprehensive literature review, the research identifies key factors contributing to this gap, including differences in Islamic law interpretations, technological capacities, and economic interests among countries. The study analyses the implications of these disparities on the global halal industry and proposes strategies for harmonization. Findings suggest that bridging this gap requires structured international cooperation, strengthening national capacities, public education, technological innovation, and respect for cultural diversity. The study contributes to the ongoing efforts to develop more effective and globally accepted Halal Management Systems.

Keywords:

Halal Management Systems; international standards; local practices; harmonization; global halal industry

Introduction

In the era of rapid globalization, the concept of halal has evolved into a global phenomenon that is not limited to food aspects, but also covers various sectors such as cosmetics, pharmaceuticals, logistics, and tourism. Halal, which means "permitted" or "allowed" in Islamic law, has become a quality standard sought after by Muslim and non-Muslim consumers worldwide. The global halal industry is projected to reach a very large market value, with an estimated value of USD 2.3 trillion in 2014 (Wilson, 2014). With the growing Muslim population, the demand for halal products and services is also increasing.

Despite significant growth in the halal industry, there is still a gap between international halal standards and local practices in halal system management in various countries. This poses challenges in ensuring product and service compliance with halal principles, as well as ensuring transparency and traceability throughout the supply chain. Various standardization and halal certification organizations have been established worldwide to develop and implement international halal standards (M. A. Latif, 2020). However, the implementation of these halal standards still faces various obstacles, especially at the local level. The implementation of halal management systems at the local level often faces gaps with existing international halal standards (Ahmad et al., 2017).

Along with this growth, the need for management systems that can guarantee the halal status of products and services is becoming increasingly urgent. Halal Management System (HMS) has emerged as a comprehensive solution to ensure halal integrity throughout the supply chain, from raw material procurement to final product distribution. HMS not only focuses on the technical aspects of production but also includes ethical and sustainability principles that are in line with Islamic values (Sulaiman et al., 2018).

The importance of HMS cannot be ignored in today's global context. For Muslim consumers, HMS provides assurance that the products they consume are in accordance with their beliefs. Meanwhile, for non-Muslim consumers, halal certification is often associated with high standards of hygiene and safety. From a business perspective, the implementation of HMS opens up vast market opportunities, given the global Muslim population estimated to reach 1.9 billion in 2022 (Azam & Abdullah, 2020).

The economic benefits of HMS implementation are evident from the increased exports of countries that have adopted strict halal standards. For example, Malaysia, known as a leader in the halal industry, recorded halal product exports worth RM30.5 billion (about US\$7.4 billion) in 2020, despite the COVID-19 pandemic (Shamsudin & Vincent, 2020). Socially, HMS encourages more ethical and sustainable business practices, in line with the principles of *maqasid al-shariah* (objectives of sharia) which emphasize protection of life, intellect, faith, lineage, and property.

However, the global implementation of HMS is not without challenges. One of the main issues is the gap between international halal standards and practices at the local level. International standards, such as those developed by the Organization of Islamic Cooperation (OIC) through SMIIC (Standards and Metrology Institute for Islamic Countries), aim to standardize halal practices worldwide (Kagman & Ghazali, 2023). However, their implementation at the local level often varies, influenced by diverse interpretations of Islamic law, varying technical capacities, and differences in regulations between countries. This gap can create confusion for consumers, while threatening the integrity of the halal system as a whole.

A concrete example of this gap can be seen in the differences in animal slaughter standards. While some countries require manual slaughter by trained Muslim slaughterers, others allow the use of stunning methods before slaughter, as long as the animal can recover if not slaughtered (Riaz et al., 2021). These differences create complexity in international trade and can cause confusion among consumers.

This research aims to analyse in depth the gap between international halal standards and local practices in the context of Halal Management Systems. By understanding these differences, it is hoped that effective strategies can be developed to align global halal practices while respecting local uniqueness. To achieve this goal, this research will answer several key questions:

1. What are the factors causing the gap between international halal standards and local practices?
2. What are the implications of this gap on international trade in halal products?
3. What strategies can be developed to bridge this gap without sacrificing halal integrity or local uniqueness?

The significance of this research lies in its contribution to the harmonization of global halal standards. By identifying the root causes of the gap and analysing its impact, this research is expected to provide valuable insights for policymakers, halal certification bodies, and industry players in developing more inclusive and adaptive HMS. Furthermore, the findings of this research can be the basis for increasing consumer confidence in halal products and facilitating the growth of the halal industry globally.

This article will be structured in several main sections. After this introduction, the second section will present a comprehensive literature review on international halal standards and variations in local practices. The third section will explain the research methodology, including data collection and analysis methods. The fourth section will present the research results and in-depth discussion of the gaps found. Finally, the fifth section will conclude the main findings and provide recommendations to address existing gaps.

Through this in-depth analysis, it is hoped that the research can make a significant contribution to the development of more effective and globally acceptable Halal Management Systems, while respecting the diversity of local interpretations and practices. Thus, the halal industry can continue to develop inclusively, meeting the needs of Muslim and non-Muslim consumers, and encouraging ethical and sustainable business practices worldwide.

Literature Review

Key Definitions and Concepts

Halal Management System (HMS) is a holistic and systematic approach to ensure halal integrity throughout the supply chain of products and services. According to Tieman et al. (2014), HMS includes a series of procedures, processes, and controls applied to ensure that products or services meet halal requirements from source to end consumer (Tieman & Ghazali, 2014). This concept is not limited to food aspects but also covers various sectors such as cosmetics, pharmaceuticals, logistics, and tourism (Wijoyo et al., 2023).

HMS developed as a response to the complexity of global supply chains and increasing awareness among Muslim consumers about the importance of halal assurance. This system is based on Islamic sharia principles, which prohibit the consumption or use of haram (forbidden) ingredients such as pork, alcohol, and blood, and emphasize product cleanliness and safety (Muhammed et al., 2022).

International halal standards refer to guidelines and criteria developed by global organizations to standardize halal practices worldwide. One of the most recognized standards is OIC/SMIIC 1:2019, developed by the Organization of Islamic Cooperation (OIC) through the Standards and Metrology Institute for Islamic Countries (SMIIC) (M. A. Latif, 2020). This standard aims to provide a consistent framework for OIC member countries in implementing halal certification systems.

Meanwhile, local practices in the context of HMS refer to the implementation of halal principles adapted to local conditions and interpretations. These practices are often influenced by factors such as the dominant Fiqh school, government regulations, and technological capabilities available in a country or region. Riaz and Chaudry (2018) emphasize that this variation in local practices reflects the diversity of Islamic law interpretations and different socio-economic conditions between countries (Riaz & Chaudry, 2018).

International Halal Standards

The development of international halal standards has undergone significant evolution in recent decades. In addition to OIC/SMIIC 1:2019, there are several other influential international standards, such as Codex Alimentarius CAC/GL 24-1997 which provides general guidance on the use of halal terms (Spiegel et al., 2012). The ISO 22000 standard for food safety management systems is also often integrated with halal requirements to form a comprehensive halal management system (M. A. Latif, 2020).

The implementation of international halal standards brings benefits to various stakeholders. For Muslim consumers, halal certification ensures that products can be legally consumed according to sharia principles. For producers, halal certification becomes an effective marketing tool to enter global markets dominated by Muslim consumers (Warto & Samsuri, 2020). For government agencies, international halal standards enable more effective supervision and law enforcement of halal practices domestically (M. A. Latif, 2020).

The main principles underlying international halal standards generally include: a) Compliance with Islamic sharia: All aspects of production, storage, transportation, and sales must comply with Islamic law. b) Product safety and hygiene assurance: Halal products must be safe for

consumption and produced under hygienic conditions. c) Traceability throughout the supply chain: Every product component must be traceable back to its source to ensure halal status. d) Transparency in production and certification processes: Information about production and certification processes must be available and accessible to consumers. e) Halal integrity: Halal products must be protected from contamination with non-halal materials throughout the entire process (Baharuddin et al., 2015).

Efforts to harmonize global halal standards continue to be made, but face challenges due to differences in Islamic law interpretations and economic interests of various countries. According to (I. A. Latif et al., 2014), this harmonization is important to facilitate international trade in halal products and increase global consumer confidence (I. A. Latif et al., 2014). However, Latif (2020) argues that this global standardization effort can also create tension with established local practices (M. A. Latif, 2020).

Halal Management System Practices at the Local Level

The implementation of HMS at the local level shows significant variation between countries. In Malaysia, for example, HMS has been well integrated into national policy, with the Department of Islamic Development Malaysia (JAKIM) as the sole authority for halal certification (Sulaiman et al., 2018). Malaysia has developed a comprehensive and internationally recognized halal certification system, covering not only food products but also pharmaceuticals, cosmetics, and logistics (Halim & Ahmad, 2014).

Meanwhile, in Indonesia, there are multiple bodies involved in halal certification, with the Halal Product Assurance Organizing Agency (BPJPH) as the main coordinator (Warto & Samsuri, 2020). This system is relatively new and still in the adjustment process, reflecting the complexity of HMS implementation in the country with the largest Muslim population in the world.

In the Middle East, HMS practices tend to be stricter and more conservative. Saudi Arabia, for example, has very high standards for halal products, especially those related to meat and its derivatives (Yaacob et al., 2023). This country prohibits the use of stunning in animal slaughter and has special requirements for importing halal products.

In non-Muslim countries such as Japan and South Korea, HMS practices focus more on meeting export needs to Muslim countries and serving Muslim tourists. This often results in a more pragmatic approach to HMS implementation (Deniar & Effendi, 2019). Japan, for example, has developed a halal certification program tailored to local industries, focusing on halal food and tourism.

Factors influencing the variation of local practices include: a) Different interpretations of Islamic law between schools of thought: For example, differences of opinion about the halal status of certain types of seafood or the use of alcohol in non-consumable products. b) National regulatory framework: Some countries have specific laws on halal products, while others rely on general food safety regulations. c) Technological capacity and human resources: Countries with more advanced technological infrastructure tend to have more sophisticated traceability systems. d) Market pressure and economic interests: Countries that depend on halal product exports tend to have stricter and more standardized standards. e) Socio-cultural context: Local practices often reflect the values and traditions of local communities (Astuti, 2020) (Nurrachmi, 2018).

Methods

This study uses a qualitative approach with analysis of the content of related documents. The main source of data comes from a literature review of international halal standards and halal management system practices in various countries. Qualitative analysis was carried out to

identify the factors that cause the gap, its impact on the global halal industry, and strategies to overcome the gap.

Results and Discussions

Gap between International Standards and Local Practices

Analysis of the summarized sources shows that there are significant gaps between international halal standards and local practices in various countries. First, although the basic principles of international halal standards have been established, their implementation at the local level is still highly variable. Some countries have developed comprehensive and integrated systems, while others still struggle to coordinate various related institutions. Second, differences in interpretation of Islamic law between schools of thought and local traditions cause variations in halal requirements. This can pose challenges in harmonizing standards and cross-border trade of halal products (Suryono et al., 2019) (Charina & Charisma, 2023) (Charina & Charisma, 2023). Third, technological capacity and human resources become important factors affecting a country's ability to implement adequate traceability and halal supervision systems. Countries with limited resources tend to face difficulties in meeting international standards (Astuti, 2020). Fourth, there is tension between global standardization efforts and the desire to maintain established local practices. Although harmonization of standards can increase consumer confidence, it can also ignore the uniqueness of culture and tradition (Abdallah et al., 2021). Fifth, differences in economic interests also influence a country's incentives to implement strict halal standards. Countries that depend on halal product exports tend to have more standardized systems, while countries that focus on domestic consumption may pay less attention to this issue (Nurrachmi, 2018).

The gap between international halal standards and local practices is evident in several main areas:

1. **Slaughter Methods:** While international standards generally require manual slaughter without stunning (Jalil et al., 2018), some countries such as Australia and New Zealand allow reversible stunning to meet local animal welfare requirements. This raises debates about the halal status of meat produced through this method.
2. **Use of Additives:** There are differences in interpretation regarding the halal status of some additives, such as microbial enzymes and emulsifiers. (Alzeer & Hadeed, 2016) show that the use of ethanol in the food industry is still a subject of debate in various countries.
3. **Traceability Systems:** International standards emphasize the importance of comprehensive tracking systems, but their implementation at the local level is often constrained by technological and infrastructure limitations. (Talib et al., 2015) identify traceability as one of the main challenges in the global halal supply chain.
4. **Sharia Interpretation:** Differences in interpretation of Islamic law between countries can result in different standards. For example, some halal authorities allow the use of enzymes derived from microorganisms grown on media containing non-halal ingredients, while others prohibit it (Kashim et al., 2015).
5. **Certification Scope:** While international standards tend to encourage a holistic approach that covers the entire supply chain, local practices in some countries may only focus on certain aspects such as raw materials or production processes (Aziz & Sulaiman, 2014)
6. **Supervision and Enforcement:** Mechanisms for supervision and enforcement of halal standards vary between countries, with some countries having stricter systems than others. This can create opportunities for unethical practices in the halal industry (Demirci et al., 2016).

Impact of the Gap between International Standards and Local Practices on the Halal Industry

The gap between international halal standards and local practices can have several significant impacts on the global halal industry, including: First, differences in interpretation and halal requirements can hinder harmonization and cross-border trade of halal products. This can result

in economic losses, both for producers and consumers of halal products (Warto & Samsuri, 2020). Second, lack of coordination and adequate supervision can open opportunities for fraudulent practices and misuse of halal certification. This can erode consumer confidence and negatively impact the reputation of the halal industry as a whole (Amalia et al., 2022). Third, difficulties in meeting international standards can limit market access for halal products, especially for producers from countries with limited capacities. Fourth, differences in traceability and documentation systems can hinder the ability to verify the halal status of a product, as well as increase the risk of contamination and product mixing (Astuti, 2020). Fifth, lack of harmonization can create confusion among consumers regarding the importance of halal certification and reduce their trust in certified products (Abdallah et al., 2021).

Overall, the gap between international halal standards and local practices presents various challenges for the global halal industry. Efforts to address this issue require close cooperation and coordination between governments, industries, and relevant institutions, both at national and international levels (Halim & Ahmad, 2014).

Analysis of Strategies to Align International Halal Standards with Local Practices

Aligning international halal standards with local practices is a complex but essential challenge for the growth and sustainability of the global halal industry. Here are some strategies to consider:

1. Structured International Cooperation:

Role of International Organizations: Organizations such as the Organisation of Islamic Cooperation (OIC) and the Codex Alimentarius Commission should lead harmonization efforts by involving member countries, experts, and stakeholders. The OIC can play a role in formulating comprehensive halal standards, while the Codex can focus on the food safety aspects of halal products.

Dialogue and Information Exchange: Discussion forums and collaborative platforms, such as international seminars and workshops, are crucial for sharing knowledge, best practices, and innovative solutions. For instance, regularly held international halal forums can serve as venues for discussion and information exchange among countries.

Mutual Recognition of Certification: Agreements on mutual recognition of halal certification between countries can reduce trade barriers and improve efficiency. This can begin by identifying countries with relatively similar halal standards and building bilateral agreements.

2. Comprehensive National Capacity Building:

Robust Regulatory Framework: Countries need to develop a comprehensive, transparent regulatory framework for halal that aligns with international standards such as those formulated by the OIC. This regulatory framework should cover all aspects of the halal supply chain, from raw materials to final products.

Competent Certification Bodies: Halal certification bodies need to have adequate technical capacity, integrity, and independence. This can be achieved through rigorous accreditation programs, standardized training for halal auditors, and continuous oversight.

Enhancement of Technology and Human Resources: Investment in technology, such as blockchain-based traceability systems, and the development of human resources in the halal sector, such as halal auditors and halal food technology experts, are crucial.

3. Extensive Education and Public Awareness:

Consumer Education: Public education campaigns through various media, such as social media, television, and print media, are important to raise consumer awareness about international halal standards, the importance of certification, and their rights as consumers.

Inclusive Industry Training: Training and mentoring programs for industry players, especially small and medium-sized enterprises, on international halal standards, certification requirements, and best practices can improve compliance and competitiveness.

Public Literacy Enhancement: Efforts to educate the public about halal principles and the importance of tolerance in diverse practices can help build understanding and reduce

misunderstandings. This can be achieved through educational programs in schools, universities, and communities.

4. Sustainable Innovation and Technology:

Advanced Traceability Systems: Technologies like blockchain, the Internet of Things, and big data can be utilized to improve the transparency, traceability, and reliability of the halal supply chain. Implementing these technologies can help track the origins of raw materials, production processes, and the distribution of halal products.

Focused Research and Development: Research and development in the halal field, such as developing alternative halal raw materials, more efficient and environmentally friendly processing technologies, and more accurate and faster halal analysis methods, should be continuously encouraged.

5. Respect for Local Practices and Cultural Diversity:

Recognition of Diverse Interpretations: It is important to recognize and respect the diversity of Islamic law interpretations and halal practices in different countries. This requires mutual respect and tolerance between countries and cultures.

Focus on Fundamental Halal Principles: Focusing on universally agreed-upon fundamental halal principles, such as the prohibition of haram and najis substances, and finding common ground in differences of interpretation can facilitate harmonization.

Flexibility in Halal Standards: International halal standards need to provide flexibility to accommodate local practices that do not contradict fundamental halal principles. This can be achieved by formulating general standards and allowing countries to adapt these standards according to their local context.

Conclusion

This study highlights the significant gap between international halal standards and local practices in Halal Management Systems (HMS). While international standards aim to standardize halal practices worldwide, their implementation at the local level is often hindered by differences in Islamic legal interpretations, varying technical capacities, and different regulations across countries. These differences pose challenges in ensuring product and service compliance with halal principles and maintaining transparency and traceability throughout the supply chain.

The study identifies several key factors contributing to this gap, including slaughtering methods, the use of additives, traceability systems, Shariah interpretations, certification scope, and monitoring mechanisms. The impact of this gap on the global halal industry includes cross-border trade barriers, opportunities for fraudulent practices, market access difficulties for producers with limited capacities, and consumer confusion regarding halal certification.

To address this gap, structured international cooperation, comprehensive national capacity building, massive public education and awareness, sustainable technological innovation, and respect for local practices and cultural diversity are needed. With these strategies, it is hoped that the harmonization of global halal standards can be achieved without sacrificing local uniqueness, allowing the halal industry to continue growing inclusively and meeting the needs of both Muslim and non-Muslim consumers worldwide.

This study makes a significant contribution to the development of more effective and adaptive HMS and promotes ethical and sustainable business practices globally. These findings are expected to provide a foundation for policymakers, halal certification bodies, and industry players to enhance consumer trust in halal products and facilitate the growth of the global halal industry.

References

Abdallah, A. E., Rahem, M. A., & Pasqualone, A. (2021). The Multiplicity of Halal Standards: A Case

- Study of Application to Slaughterhouses. *Journal of Ethnic Foods*, 8(1). <https://doi.org/10.1186/s42779-021-00084-6>
- Ahmad, A. N., Rahman, R. A., Othman, M., & Abidin, U. F. U. Z. (2017). Critical success factors affecting the implementation of halal food management systems: Perspective of halal executives, consultants and auditors. In *Elsevier BV*, 74, 70–78. <https://doi.org/10.1016/j.foodcont.2016.11.031>
- Alzeer, J., & Hadeed, K. A. (2016). Ethanol and its Halal status in food industries. In *Elsevier*, 58, 14–20. <https://doi.org/10.1016/j.tifs.2016.10.018>
- Amalia, R., Nasution, A., & Effendi, S. (2022). *Pengaruh Iklan dan Sertifikasi Pproduk Halal terhadap Keputusan Pembelian Kosmetik Wardah*, 3(1), 33–51. <https://doi.org/10.30743/mutlaqah.v3i1.6144>
- Astuti, M. (2020). *Pengembangan Produk Halal Dalam Memenuhi Gaya Hidup Halal (Halal Lifestyle)*, 1(1). <https://doi.org/10.55357/is.v1i1.16>
- Azam, M. S. E., & Abdullah, M. A. (2020). Global Halal Industry: Realities and Opportunities. *Universitas Islam Sultan Agung*, 5(1), 47. <https://doi.org/10.30659/ijibe.5.1.47-59>
- Aziz, N. A., & Sulaiman, S. S. (2014). Role of the Local Authority in Issuing License for Halal Certified Premise in the City of Shah Alam. *Elsevier BV*, 121, 133–143. <https://doi.org/10.1016/j.sbspro.2014.01.1115>
- Baharuddin, K., Kassim, N. A., Nordin, S. K., & Buyong, S. Z. (2015). *Understanding the Halal Concept and the Importance of Information on Halal Food Business Needed by Potential Malaysian Entrepreneurs* (Vol. 5, Issue 2). <https://doi.org/10.6007/ijarbss/v5-i2/1476>
- Charina, A., & Charisma, D. (2023). *Efektivitas Penerapan Ekosistem Halal Value Chan (HVC) pada Industri Makanan dan Minumam Halal di Indonesia*, 9(2), 1858. <https://doi.org/10.25157/ma.v9i2.10135>
- Demirci, M. N., Soon, J. M., & Wallace, C. A. (2016). Positioning food safety in Halal assurance. In *Elsevier BV* (Vol. 70, pp. 257–270). <https://doi.org/10.1016/j.foodcont.2016.05.059>
- Deniar, S. M., & Effendi, T. D. (2019). *Halal Food Diplomacy in Japan and South Korea* (Vol. 2, Issue 3). <https://doi.org/10.31014/aior.1991.02.03.121>
- Halim, M. A. A., & Ahmad, A. A. (2014). Enforcement of Consumer Protection Laws on Halal Products: Malaysian Experience. In *Canadian Center of Science and Education* (Vol. 10, Issue 3). <https://doi.org/10.5539/ass.v10n3p9>
- Jalil, N. S. A., Tawde, A. V., Zito, S., Sinclair, M., Fryer, C., Zulkifli, I., & Phillips, C. J. C. (2018). Attitudes of the public towards halal food and associated animal welfare issues in two countries with predominantly Muslim and non-Muslim populations. In *Public Library of Science* (Vol. 13, Issue 10, pp. e0204094–e0204094). <https://doi.org/10.1371/journal.pone.0204094>
- Kagman, K. S. H., & Ghazali, M. A. 'Ikhsan. (2023). *Developing the Cooperative Agreement Efforts between the World Islamic Call Society and the Islamic Call Organization in Malaysia* (Vol. 12, Issue 2). <https://doi.org/10.6007/ijarped/v12-i2/17213>
- Kashim, M. I. A. M., Majid, L. A., Adnan, A. H. M., Husni, A. M., Nasohah, Z., Samsudin, M. A., & Yahaya, M. Z. (2015). Principles Regarding the Use of Haram (Forbidden) Sources in Food Processing: A Critical Islamic Analysis. In *Canadian Center of Science and Education* (Vol. 11, Issue 22). <https://doi.org/10.5539/ass.v11n22p17>
- Latif, I. A., Mohamed, Z., Sharifuddin, J., Abdullah, A. M., & Ismail, M. M. (2014). A Comparative Analysis of Global Halal Certification Requirements. In *Taylor & Francis* (Vol. 20, Issue sup1, pp. 85–101). <https://doi.org/10.1080/10454446.2014.921869>
- Latif, M. A. (2020). *Halal International Standards and Certification* (pp. 205–226). <https://doi.org/10.1002/9781118823026.ch14>
- Muhammed, A. A., Halif, M. M., Bakar, M. Z. A., Hassan, M. F., & Rahim, N. N. A. (2022). *Non-Conventional Strategic Supply Chain Management towards Halal Perspective* (Vol. 12, Issue 1). <https://doi.org/10.6007/ijarbss/v12-i1/12078>
- Nurrachmi, R. (2018). The Global Development of Halal Food Industry: A Survey. In *Tazkia University College of Islamic Economics; Association of Islamic Economics Lecturers* (Vol. 11, Issue 1). <https://doi.org/10.30993/tifbr.v11i1.113>

- Riaz, M. N., & Chaudry, M. (2018). Handbook of Halal Food Production. In *Informa*. <https://doi.org/10.1201/9781315119564>
- Riaz, M. N., Irshad, F., Riaz, N. M., & Regenstein, J. M. (2021). Pros and cons of different stunning methods from a Halal perspective: a review. In *Oxford University Press* (Vol. 5, Issue 4). <https://doi.org/10.1093/tas/txab154>
- Shamsudin, R., & Vincent, C. J. (2020). *Agricultural and Food Industries in Malaysia* (Vol. 1, Issue 1). <https://doi.org/10.36877/aafrija.0000107>
- Sulaiman, M., Noordin, N., Noor, N. L. M., Suhaimi, A. I. H., & Isa, W. A. R. W. M. (2018). *Halal Virtual Inspection Requirements for Food Premise Inspection Process: Towards the Virtualization of Malaysia Halal Certification System*. <https://doi.org/10.1109/ict4m.2018.00012>
- Suryono, S., Istadi, Y., Praptiningsih, R. S., Taufiq, H., Athoillah, S., & Widiyanto, W. (2019). Global Halal Center - Unissula mengabdikan untuk menyelamatkan umat melalui penyusunan instrumen Muslim Friendly. In *Universitas Islam Sultan Agung* (Vol. 1, Issue 1, p. 1). <https://doi.org/10.30659/ijocs.1.1.1-15>
- Talib, M. S. A., Hamid, A. B. A., & Zulfakar, M. H. (2015). Halal Supply Chain Critical Success Factors: A Literature Review. *Journal of Islamic Marketing*, 6(1), 44–71. <https://doi.org/10.1108/jima-07-2013-0049>
- Warto, W., & Samsuri, S. (2020). Sertifikasi Halal dan Implikasinya Bagi Bisnis Produk Halal di Indonesia. In *Universitas Muhammdiyah Magelang* (Vol. 2, Issue 1, p. 98). <https://doi.org/10.31000/almaal.v2i1.2803>
- Wijoyo, H. S. H., Anam, M. S., & Isyanto, B. (2023). Implementation halal certification for creative economy business actors in the food and beverage sub-sector. In *Universitas Merdeka Malang*, 8(2), 326–335. <https://doi.org/10.26905/abdimas.v8i2.9961>
- Wilson, J. A. J. (2014). *The <I>halal</I> phenomenon: An extension or a new paradigm?*, 4(3), 255–271. <https://doi.org/10.1362/2044440814x14103454934294>
- Yaacob, T. Z., Abdullah, F. R., Hasan, M. Z., & Hashim, H. I. C. (2023). *Determinants Factors of Purchase Behavior Towards The Intention to Purchase Halal Certified Products among University Students*, 13(7). <https://doi.org/10.6007/ijarbss/v13-i7/17199>