

Artificial Intelligence as a Tool for Developing Waqf Investment Models – Opportunities and Challenges: A Comparative Study of Algeria and Saudi Arabia

BOUAMAMA Nasreddine *

Senior Lecturer A, Laboratory of Globalization and Economic Policies,
University of Algiers 3 (Algeria), bouamama.nasreddine@univ-alger3.dz

Received: 17/04/2026 Accepted: 01/05/2026 Published: 01/06/2026
.....

Abstract:

The Waqf system stands as a primary pillar of the Islamic economy and a potent tool for achieving social solidarity and sustainable development, embodying the concept of ‘ongoing charity’ that benefits generations. However, traditional Waqf management currently faces significant challenges, including low investment efficiency, lack of transparency, and financial sustainability issues, which have led to stagnating returns in many Muslim-majority countries. This research proposes Artificial Intelligence (AI) as a fundamental transformative tool for developing advanced Waqf investment models. It leverages emerging technologies such as Machine Learning, Predictive Analytics, and Blockchain, whilst conducting a comparative analysis between the experiences of Saudi Arabia and Algeria.

The study aims to explore how AI can optimise asset allocation, enhance governance, and ensure Sharia compliance, providing a roadmap for the transition towards ‘Smart Waqf’.

Keywords: Artificial Intelligence, Smart Waqf, Sharia Compliance, Digital Transformation, Islamic Economics, Sustainable Development.

Jel Classification Codes: Z12, G11, O33, P43.

* Corresponding author

1. INTRODUCTION

The waqf system occupies a central position in Islamic economic jurisprudence, defined as ‘the retention of the asset and the distribution of its benefits’, making it a vehicle for ongoing charity that does not cease upon the death of the waqf founder. Historically, waqfs have funded vital sectors including education, health and infrastructure within Islamic civilisation, and have contributed to strengthening social solidarity and economic development.

However, the current reality reveals a significant gap between theoretical potential and practical performance, with most waqf institutions suffering from traditional management practices that rely on direct human effort and paper-based records. This has led to low investment returns and the prevalence of challenges such as administrative corruption, a lack of transparency, and an inability to keep pace with the fluctuations of modern financial markets. In Saudi Arabia, the endowment sector’s assets exceed 430 billion riyals, with notable growth in endowment investment funds, which have reached 34. In Algeria, however, the sector faces challenges in digitalisation and governance despite recent legislative reform efforts (such as Law 25/06).

Amid rapid technological development, artificial intelligence (AI) is emerging as a strategic solution. With its ability to mimic human intelligence in learning, reasoning and self-correction, AI provides advanced tools for analysing big data, predict economic scenarios, automate oversight processes, and ensure Sharia compliance. It also supports the emergence of the concept of ‘Smart Waqf’, which combines modern technologies with Sharia objectives.

Despite technical progress, the applications of artificial intelligence in the waqf sector remain limited and insufficiently regulated.

The research question centres on: How can artificial intelligence technologies be utilised to develop investment models for waqf funds to achieve greater efficiency and more assured legal compliance? With a focus on a comparative study between Saudi Arabia and Algeria.

Significance of the research:

The importance of this research stems from the fact that it supports the Sustainable Development Goals, contributes to achieving the ‘economic justice’ sought by Islam, and provides practical guidance for decision-makers in waqf bodies and regulatory authorities to transition from traditional management to smart management, whilst enhancing transparency and combating corruption.

Research objectives:

- To analyse the challenges facing traditional waqf investment management in Saudi Arabia and Algeria.
- To explore the applications of artificial intelligence (predictive analytics, machine learning, blockchain) in improving investment efficiency, asset management and transparency.
- To evaluate comparative experiences between the two countries and draw lessons learned.
- To propose an integrated framework for ‘smart waqf’ that ensures Sharia compliance and sustainability.
- Identifying challenges (technical, legal, human, and Sharia-related) and providing practical recommendations to overcome them.

2. The concept of waqf and the challenges of its investment:

a. The concept of waqf and its types:

Linguistically, waqf means ‘restriction’ or ‘prohibition’; technically, it refers to the restriction of ownership of an asset to prevent it from being transferred to another individual, whilst donating its benefits to a charitable or benevolent cause. Waqf assets are currently classified as follows: (Azab, 2025)

- **Real waqf:** This includes real estate, land and buildings (which is the predominant traditional form).
- **Cash endowment:** An endowment of liquid funds for investment in Islamic financial instruments.
- **Tangible (Movable) Waqf:** This includes shares, Islamic bonds (sukuk), and machinery and equipment.

The waqf aims to fulfil the five objectives of Sharia law, in particular

‘preserving wealth’ through its growth, and ‘preserving life’ and ‘preserving the mind’ by channelling its income towards social services.

b. Traditional challenges in waqf management:

Waqf institutions face deep-rooted structural obstacles that hinder the maximisation of developmental and social returns and prevent the achievement of financial and operational sustainability. The following table highlights these challenges based on reports from waqf bodies and strategic studies for 2024, noting that these figures are approximate and derived from analyses of a sector characterised by varying levels of development across countries:

Table 1: Challenges facing traditional waqf

Challenge	Detailed description
Low returns	Reliance on unproductive traditional real estate investments or fixed rents.
Lack of transparency	Lack of real-time oversight, which opens the door to corruption and falsification of financial records.
Risk management	Exposure to market volatility without forecasting tools, leading to the erosion of endowment capital.
Lack of digitisation	Reliance on paper archives and manual records for documentation and disbursement.

Source: (General Authority for Awqaf, Saudi Arabia , 2025), (Jassim, 2024)

- Low returns: Most traditional waqfs rely on outdated real estate assets (such as agricultural land or undeveloped buildings) or fixed-rate leases that do not account for inflation or market changes. This limits the ability to finance sustainable development projects, such as healthcare and education, and leads to stagnation in the real value of waqf capital. In some cases, the actual return is less than 5% per annum, making the waqf less attractive compared to modern investments.
- Lack of transparency: Without real-time monitoring systems, it becomes easy for misuse or falsification of records to occur.
- Risk management: Waqfs are exposed to economic, political or natural fluctuations without predictive analytics tools during crises.
- Lack of digitisation: 70% of records are still manual or paper-based in

many institutions, which slows down documentation, disbursement and auditing processes; this increases administrative costs and prevents the use of big data to make informed decisions.

3. The role of artificial intelligence in waqf management:

Artificial intelligence (AI) is a set of systems and software designed to simulate human cognitive abilities such as understanding, learning, reasoning and decision-making. To understand the role of AI in transforming the waqf from a traditional model into a sustainable intelligent system, it is necessary to identify the core sub- technologies that form its backbone. These technologies do not operate in isolation, but rather integrate to form ‘waqf decision intelligence’, which addresses traditional challenges (low returns, lack of transparency, risk management and digitalisation) and maximises revenue whilst preserving the waqf asset. The following are these technologies and their practical applications in the context of the waqf:

a. Machine Learning (ML): Algorithms such as Random Forest and Neural Networks are capable of automatically learning from historical data (past asset returns, market fluctuations, donor behaviour) to predict future trends without explicit programming for each scenario. In waqf: ML is used to analyse the performance of waqf investments, forecast future returns based on multiple scenarios (such as inflation or recession), and propose a balanced investment allocation that minimises risk and maximises returns. It also helps identify underutilised assets or predict the needs of the waqf. Machine learning models transform historical financial data into intelligent investment recommendations, thereby raising the annual return to higher levels whilst maintaining Sharia compliance. (Alkaabi & Yaacob, 2026, p. 358)

b. Deep Learning (DL): An advanced extension of machine learning based on multi-layered neural networks, excelling in processing unstructured data such as images, videos, and time series. In Waqf: Deep learning is applied to the analysis of aerial imagery to assess the condition of waqf properties, detect structural deterioration, or estimate true market value with high accuracy; it is also used in predictive models for the

preventive maintenance of assets. (Kondile, Msomi, Moosa, & Okoro, 2025)

c. Natural Language Processing (NLP): a technology that enables computers to understand, analyse and generate human language (text, speech, conversations), including models such as Transformers and ChatGPT. In Waqf: NLP is used to understand legal texts (fatwas, waqf conditions, historical documents) and extract precise meanings, as well as to build interactive chatbots that respond immediately to enquiries from waqf donors and beneficiaries. It also assists in summarising financial reports or translating multilingual documents. Example: An NLP-powered chatbot that provides accurate Sharia-compliant answers regarding waqf conditions, or analyses thousands of fatwas to support administrative decision-making. (Alyemny, Al-Khalifa, & Mirza, p 2)

d. Blockchain: A distributed ledger technology that ensures the immutability of records and their resistance to alteration or forgery, incorporating ‘smart contracts’ that execute automatically when conditions are met. In Waqf: Blockchain ensures complete transparency in the recording of assets and transactions, and automates the distribution of income in accordance with Sharia conditions without human intervention; it also enables global crowdfunding for Waqf projects. The Finterra Waqf Chain platform in Malaysia (the world’s first waqf blockchain platform, launched in 2019) uses smart contracts to issue digital tokens representing donors’ shares and to distribute profits automatically, whilst ensuring compliance with Sharia provisions. It has led to the funding of 12 cash waqf funds and has impacted thousands of beneficiaries. (Bouakkaz, 2022, pp. 141–142)

These technologies work together in an integrated system, for example a system that uses ML to predict returns, NLP to read the terms of the waqf, and Blockchain to automate disbursement via smart contracts. This integration transforms the waqf into a modern development tool.

Figure 1: Smart Waqf Investment Process Flowchart

Source: Prepared by the researcher.

4. The use of artificial intelligence applications in waqf investment:

Artificial intelligence (AI) can be widely deployed in waqf investment to transform traditional management into a smart and sustainable model that enhances efficiency, reduces risk, and ensures transparency and compliance with Sharia principles. AI addresses challenges such as poor predictability of returns, lack of transparency, and the difficulty of managing waqf assets (property, land, shares), whilst opening up new horizons such as digital waqf and community engagement.

a. Predicting investment returns:

AI uses machine learning algorithms to analyse vast amounts of historical data (past investment performance, market volatility, inflation, and economic factors), accurately predicts future returns, proposes multiple scenarios, and warns of risks early on, preserving the waqf asset whilst maximising income, and supports long- term planning (spanning decades). For example, in Malaysia, AI analyses the performance of Sharia-compliant companies on the Kuala Lumpur Stock Exchange to select investments that achieve annual returns exceeding 10%. (Al-Asraj, 2025)

b. Selecting the most viable endowment projects:

AI evaluates projects based on multiple criteria: economic viability,

social impact (health, education, income), risk, and Sharia compliance. It analyses thousands of data points in seconds to prioritise and identify underperforming assets, and directs resources towards projects with greater impact and better sustainability. AI systems suggest the best use of assets (leasing, development, or investment) and accurately measure social impact.

c. Waqf property management:

Integrates AI with IoT (Internet of Things) technologies for accurate periodic asset valuation, predict maintenance needs, and identify untapped opportunities. It proposes smart maintenance plans that reduce costs and extend the asset’s lifespan, transforming property management from reactive to proactive, whilst minimising waste. AI dashboards instantly monitor the value of properties and land and suggest a balanced investment allocation. (Awqaf Conference Organizing Committee, 2026)

d. Improved revenue collection:

Artificial Intelligence (AI) automates the distribution of endowment proceeds in accordance with the endower’s conditions (by converting them into digital rules), detects manipulation or wastage, and sends immediate alerts. It is also used to detect fraud and improve collection processes, ensuring strict compliance with Sharia requirements and reducing human error. (Al-Duwian, 2023)

Table 2: Traditional management versus AI-supported management

Scope	Traditional Management	AI-powered management	Key benefit
Return forecasting	Reliance on human estimates	Big data analysis + multiple scenarios	Greater accuracy + reduced risk
Project selection	Individual decisions limited by data	Automated assessment of feasibility and social impact	Better resource allocation
Property management	Manual routine maintenance	Predictive maintenance + IoT + real-time assessment	Cost savings + extended asset life

Revenue collection	Manual processes prone to error	Automation + Fraud detection + Automatic allocation based on criteria	Transparency + Full fairness
Community engagement.	Limited.	Digital platforms + chatbots + personalized recommendations.	Increased donations and trust.

Source: Prepared by the researcher.

e. Developing smart digital platforms for community engagement:

Smart endowment platforms can be built that combine (AI) and blockchain:

- chatbots that suggest personalised endowment projects based on the donor's interests.
- Real-time dashboards that track income and expenditure with complete transparency.
- Recommendation systems that build trust between the organisation, beneficiaries and donors.
- Integration with blockchain to ensure the traceability of funds (such as projects in Singapore and Malaysia).

Some international examples of smart waqf include: (Al-Asraj, 2025)

➤ Smart Agricultural Endowments (Indonesia): Using drones and artificial intelligence to survey soil and monitor endowment crops, whilst employing predictive analytics to select the most profitable varieties, thereby transforming vast tracts of land into sustainable production units.

➤ Digital Governance of Distribution (Saudi Arabia): Relying on graph matching algorithms to identify the most deserving beneficiaries with pinpoint accuracy, and automating the disbursement of waqf revenues in accordance with the endowers' stipulations via smart systems that ensure speed and complete transparency.

➤ Algorithmic Investment Portfolios (Malaysia): Managing endowment funds through smart trading software that selects Sharia-compliant stocks and automatically controls risk, ensuring strong financial returns that support the expansion of charitable projects.

➤ Satellite-based real estate monitoring (Türkiye): Using remote sensing

and deep learning technologies to monitor encroachments on endowment assets and protect architectural heritage, through real-time alerts enabling early intervention for maintenance or the recovery of rights.

➤ **Smart Assistant for Beneficiaries (Egypt):** Launching chatbots that understand natural language to guide beneficiaries and provide immediate waqf advice, thereby eliminating bureaucracy and facilitating round-the-clock access to waqf services.

5. The Algerian and Saudi experiences in waqf management and investment:

A comparison of the Algerian and Saudi experiences in waqf management serves as a living example of the transition from traditional asset management to technology-driven development investment.

a. The Algerian experience:

• Institutional and legislative framework:

The Algerian Ministry of Religious Affairs and Endowments has overseen the management of endowments since the country's independence. This was reinforced by the establishment of the National Office for Endowments and Zakat as a public body of an industrial and commercial nature, possessing legal personality and financial independence, operating under the supervision of the Ministry.

The legislative framework underwent a significant development with the 1989 Constitution, which recognised endowment funds and provided them with legal protection. This was followed by the Endowments Act No. 01-07 dated 28 Safar 1422 (corresponding to 22 May 2001), which amends and supplements previous provisions and expands the forms of endowment investment (such as leasing, joint ventures and direct investment).

In a recent development, Law No. 25-06 dated 23 Muharram 1447 (19 July 2025) on waqfs was enacted, which reinforces both traditional and modern investment forms. (National Office for Endowments and Zakat, 2026)

• Digital transformation initiatives:

➤ Strategic partnership with the United Nations Development

Programme (UNDP): On 4 November 2025, Algeria signed a partnership agreement with the UNDP to support the National Digital Transformation Strategy (2025– 2026). This partnership includes the introduction of blockchain and artificial intelligence technologies into the management of public institutions, including the endowments sector, with a focus on modernising public services and developing local skills. (Pessarlay, 2025)

➤ Real Estate Digitisation Agreement: On 30 December 2025, the National Office for Endowments and Zakat signed a cooperation and data-sharing agreement with the General Directorate of National Property. This agreement provides secure, dedicated access to the ‘fada eldjazair’ digital platform. The agreement enables: (APS, 2025)

- A comprehensive and accurate overview of all types of waqf properties.

- Identification of cadastral references, geographical locations, areas and property boundaries.

- Accurate extraction of survey plans.

- Improving inventory, management, monitoring and optimal utilisation of waqf properties.

➤ Digitisation of religious services: In 2025, Algeria launched an electronic zakat payment system via the ‘Baridi Mob’ app, operated by the Algerian Post Office, in addition to electronic payment points and payment terminals. The first two electronic payments were made in July 2025, and an agreement was signed with the Algerian Post Office in December 2025 to develop these services. The system allows for easy and secure payment of zakat (via QR code or electronic cards), and is tax-exempt, thereby enhancing transparency and access to religious services. (APS, 2025)

b. The Saudi experience:

The Kingdom has moved from managing waqf purely as a charitable endeavour to a sector that contributes to GDP as part of Vision 2030.

- **Awqaf Investment Company:** It does not merely manage real estate, but also invests in shares, sukuk and investment funds. (Awqaf Investment Company, 2026)

- **Waqf investment funds:** These have made a quantum leap, with the

Artificial Intelligence as a Tool for Developing Waqf Investment Models – Opportunities and Challenges: A Comparative Study of Algeria and Saudi Arabia

number of specialised funds reaching 34 by the end of 2024 (27 public and 7 private), enabling individuals and institutions to contribute small amounts that are transformed into substantial, sustainable assets. The assets of these funds exceeded one billion Saudi riyals in 2024 (a 29.3% increase compared to the previous year), and continued to grow throughout 2025. (Awqaf Investment Company , 2024)

- **Data and Artificial Intelligence:** The Authority uses the ‘Waqfi’ digital platform, which enables full transparency, promotes community engagement, and offers innovative waqf products (such as waqf funds, beneficial waqf, and financing and investment). Data and artificial intelligence technologies (within the framework of the Authority’s strategy and Vision 2030) are used to analyse data, improve services, and support decision-making in waqf management. (Waqfy platform, 2026)
- **Portfolio growth:** Reports and established strategies indicate that Saudi endowment investments aim to maximise assets and diversify portfolios (real estate, financial and international) to enhance sustainability and contribute to the national economy within the framework of Vision 2030. (Previous estimates indicated assets exceeding 500 billion riyals, with historical targets of up to 350 billion riyals by 2030 for the non-profit sector’s contribution). (awqaf, 2026)

c. Comparison between the Algerian and Saudi experiences:

Table 3: Comparison between the Algerian and Saudi experiences

Point of comparison	The Algerian experience	The Saudi experience	Key observations
Institutional framework	National Office for Endowments and Zakat under the Ministry of Religious Affairs (since 2021)	General Authority for Endowments + Endowments Investment Company (independent commercial arm)	Saudi Arabia has greater commercial independence and institutional diversity
Strategic vision	A drive towards digitalisation,	Comprehensive Vision 2030 (aiming	Saudi Arabia is more ambitious in terms of

	modernisation and institutional cooperation	to increase the non-profit sector's contribution to 5% of GDP)	the economy and development
Funds and investment instruments	Relatively limited investment projects	34 endowment investment funds with assets of ~2.5 billion riyals + diversified investment portfolios	Saudi Arabia is highly advanced in diversification (shares, sukuk, public and private funds)
Digitalisation and transparency	The 'fada eldjazair' platform for property inventory + electronic zakat payments via Baridi Mob	The integrated 'Waqfi' platform (community participation, electronic payments, full transparency) + use of artificial intelligence	Saudi Arabia is more advanced in comprehensive platforms and community participation
Asset size and growth	Relatively modest revenues and projects, focus on inventory and recovery	Huge assets (historically in the hundreds of billions) and rapid growth in funds	Saudi Arabia boasts greater scale and international diversification
Main focus	Property inventory + property digitisation + electronic zakat payments	Sustainable investment + community participation + contribution to GDP	Algeria is in the database-building phase; Saudi Arabia is in the diversification and sustainability phase

Source: Prepared by the researcher based on various sources.

The Saudi experience is more mature and economically ambitious, supported by Vision 2030, advanced investment tools and comprehensive digital platforms. The Algerian experience, meanwhile, currently focuses on the fundamentals of digital transformation (property inventory, international

partnerships, digitisation of zakat) and is making steady progress towards the valuation of waqf properties. Algeria could benefit from the Saudi model in developing investment funds and community participation platforms, as well as in strengthening the commercial autonomy of the body responsible for waqfs.

6. The role of artificial intelligence in the development of the two experiences (Saudi Arabia and Algeria):

The role of artificial intelligence varies according to each country's national context. Whilst Saudi Arabia benefits from advanced infrastructure and significant strategic support from Vision 2030, Algeria faces challenges in digitisation and the management of traditional assets. In both countries, AI contributes to enhancing efficiency and sustainability whilst maintaining Sharia compliance.

a. In the Kingdom of Saudi Arabia:

Saudi Arabia is a global leader in integrating AI with waqf investment, supported by the General Authority for Waqf and SDAIA (the Saudi Data and Artificial Intelligence Authority), and an increase in government spending on emerging technologies of over 56% by 2024, with investments reaching \$9.1 billion in AI companies. (Hassan, 2026)

- **Improving investment efficiency:** AI utilises predictive analytics and machine learning to assess returns, identify underutilised assets, and optimise revenue distribution; it also supports investment in major projects aligned with Vision 2030. (Shah, 2026)
- **Supporting strategic decision-making:** AI systems provide real-time reports, accurately measure social impact, and simulate multiple scenarios. They include services such as the 'Digital Waqf Advisor' and integration with devices such as Amazon Alexa for waqf advisory services. (Al-Duwian, 2023)
- **Expansion of global investment:** AI assists in analysing Sharia-compliant international markets, managing risk, and attracting foreign investment, supporting 'Smart Waqf' models that combine AI and blockchain.

b. In Algeria:

The focus here is on building digital infrastructure, particularly following recent legal amendments (such as Law 25-06) aimed at revitalising waqf and integrating it with investment.

- **Accelerating digitisation:** AI helps convert traditional records into digital databases, automate registration processes, and engage with the community via digital platforms.
- **Improving waqf asset management:** Analysing data to value properties and land, predicting maintenance needs, and suggesting optimal uses (development, leasing, or investment).
- **Enhancing transparency and combating corruption:** Detecting anomalies in financial operations, accurately tracking income and expenditure, and generating automated reports that minimise human intervention. (Pessarlay, 2025)

7. Challenges associated with the use of artificial intelligence:

Despite the significant benefits, the application of AI in waqf investment faces obstacles that must be overcome to ensure sustainability and Sharia compliance:

- **Technical challenges (infrastructure):** the lack of advanced digital networks, the difficulty of integrating AI with legacy systems, and the cost of training on big data; in Algeria, these challenges are exacerbated by the digital divide.
- **Legal and regulatory challenges:** the absence of a clear regulatory framework for AI in waqf, issues of intellectual property rights for models, and compliance with data protection laws.
- **Human challenges (skills shortages):** A shortage of experts who combine knowledge of waqf, Sharia law and artificial intelligence; staff training is required.
- **Sharia compliance challenges:** The extent to which AI algorithms comply with the conditions of the waqf (such as avoiding excessive risk or deception), and ensuring impartiality in distribution or decision-making; scholars and muftis must be consulted at every stage. (Awqaf Conference, 2026)

- **Cybersecurity risks:** Financial and personal data are vulnerable to attacks, threatening trust and security. This requires solutions such as encryption and blockchain.

8. Prospects for developing waqf investment using artificial intelligence:

Artificial intelligence represents a gateway to ‘Smart Waqf’, which combines sustainability and innovation to achieve a greater impact on community and economic development.

- **Development of integrated digital platforms:** platforms combining AI with blockchain to track funds with full transparency, chatbots for community engagement, and apps for easy and personalised giving.

- **Use of predictive analytics:** Forecasting returns, measuring social impact, and early risk detection to ensure the sustainability of the waqf. (Ismail, Misba, & Isa, 2025, p. 4707)

- **Integrating technology with Islamic finance:** creating ‘smart Sukuk’ or AI- powered waqf financing models, with a focus on sustainable investments such as Green Waqf.

- **Strengthening international cooperation:** Partnerships could be established with organisations such as the United Nations Development Programme (UNDP), which has supported the ‘Green Waqf’ framework in Indonesia and collaborates with Saudi Arabia; conferences such as the AI-Waqf Summit are also encouraged to facilitate the exchange of expertise between countries. (UNDP, 2022)

9. Conclusion:

Artificial intelligence is a powerful and effective tool in the development of waqf investment; however, it does not replace the human role nor does it obviate the need for Sharia supervision. Rather, it enhances this role by providing accurate data, rapid analysis and reliable predictions that assist in making better decisions in accordance with the objectives of Islamic law. True success requires striking a delicate balance between technical innovation and Sharia integrity, whilst ensuring transparency, avoiding bias, protecting data, and maintaining human oversight and Sharia fatwas at every stage.

With serious investment in building national capabilities (training in AI tools) and developing digital infrastructure, endowments in Saudi Arabia and Algeria can become a key driver of sustainable development and contribute effectively to achieving Sustainable Development Goals such as combating poverty, promoting education, and preserving the environment.

Study findings:

- **In Saudi Arabia:** Practical experience has shown that integrating artificial intelligence with Vision 2030 and ‘SDAIA (Saudi Data and Artificial Intelligence Authority)’ significantly improves investment efficiency, supports strategic decision-making, and opens doors to global expansion. The Kingdom has declared 2026 the ‘Year of Artificial Intelligence’, with government spending on emerging technologies set to increase by , exceeding 56% by 2024, and investments reaching \$9.1 billion in AI companies. This reinforces the ‘Smart Waqf’ model, which combines AI and blockchain to achieve greater transparency and better management of assets worth hundreds of billions.
- **In Algeria:** AI is helping to accelerate essential digitalisation, improve the management of waqf assets, and enhance transparency to combat corruption. The findings suggest that launching pilot projects in digitisation and financial anomaly detection will lead to the restoration of asset efficiency and the strengthening of community trust, particularly with recent legal amendments.
- **At a general level:** Studies have shown that AI applications reduce costs, increase returns, ensure regulatory compliance, and promote community engagement.
- **Social and developmental contribution:** Artificial intelligence helps to accurately measure social impact, identify projects with the greatest impact, and support ‘Green Waqf’ environmental models in collaboration with organisations such as the UNDP, thereby linking the waqf to climate and sustainable development goals.

In conclusion, AI represents an opportunity to revitalise the waqf institution and transform it into a modern and sustainable development tool, provided that Sharia and ethical guidelines are adhered to. Cooperation

between the two countries (Saudi Arabia and Algeria), and with international organisations, and the exchange of expertise through conferences such as the AI-Waqf Summit, will contribute to building a smart Arab-Islamic waqf model that serves current and future generations.

1. Bibliography

2. *Awqaf Investment Company* . (2024). Consulté le 02 28, 2026, sur Awqaf Investment Company: <https://awqaf.com.sa/ar>
3. *awqaf*. (2026). Consulté le 02 25, 2026, sur [awqaf.gov.sa: https://www.awqaf.gov.sa/ar/about-us/kingdom-vision](https://www.awqaf.gov.sa/ar/about-us/kingdom-vision)
4. *Waqfy platform*. (2026). Consulté le 02 27, 2026, sur <https://waqfy.sa/>
5. Al-Asraj, H. A. (2025). The role of artificial intelligence in developing Islamic waqf institutions {In Arabic}. *Global Islamic Economics Magazine*(158), 44–49.
6. Al-Duwian, A. F. (2023). *Utilising artificial intelligence in the work of the Awqaf* {In Arabic}. Consulté le 03 04, 2026, sur Sae: <https://sae.org.sa/mediaCenter/programs/spreadingCulture/adults/articlesList/83ed0dcd-a3b3-4e23-82ca-55047ca401ac>
7. Alkaabi, H. S., & Yaacob, A. B. (2026, 02 10). Artificial Intelligence and the Enhancement of Digital Governance of Islamic Awqaf. *International Journal of Academic Research in Business and Social Sciences*, 16(02), 358.
8. Alyemny, O., Al-Khalifa, H., & Mirza, A. (s.d.). A data-driven exploration of a new Islamic fatwas dataset for Arabic NLP tasks. *Data*, 08(10).
9. APS. (2025, 12 30). *Cooperation agreement signed between National Office for Endowments and Zakat and General Directorate of National Property*. Récupéré sur <https://www.aps.dz/algerie/actualite-nationale/mjsydz1t>
10. Awqaf Conference. (2026, 06 01). *Investing in Awqaf in the Age of Artificial Intelligence*. Consulté le 04 01, 2026, sur Awqaf Conference: <https://awqafconf.com>

11. Awqaf Conference Organizing Committee. (2026, 01 26). *Artificial intelligence in Awqaf: From traditional to smart management*. Consulté le 04 01, 2026, sur awqafconf.com: <https://awqafconf.com>
12. Awqaf Investment Company. (2026). *Awqaf Investment Company*. Consulté le 03 05, 2026, sur <https://awqaf.com.sa/ar>
13. Azab, M. A. (2025, 09 24). *Investing Waqf Funds through Contemporary Means {In Arabic}*. Consulté le 02 14, 2026, sur Mugtama: <https://mugtama.com/articles/>
14. Bouakkaz, N. (2022). Using blockchain technology to revolutionize waqf: The Finterra waqf chain model. *Economics and Sustainable Development*, 5(1), 141–142.
15. General Authority for Awqaf, Saudi Arabia . (2025, 09 30). *News: Awqaf Investment*. Consulté le 03 03, 2026, sur www.awqaf.gov.sa/ar/media-center/news/2a0b893d-960a-48e3-8977-15f5489cfaae
16. Hassan, R. (2026, 03 11). *Saudi Arabia declares 2026 'Year of AI' as it pushes digital transformation*. . Consulté le 03 13, 2026, sur Arab News: <https://www.arabnews.com/node/2636061/saudi-arabia>
17. <https://awqafconf.com/>. (2026, 1 28). Retrieved 4 1, 2026, from <https://awqafconf.com/%D8%A7%D9%84%D8%B0%D9%83%D8%A7%D8%A1-%D8%A7%D9%84%D8%A7%D8%B5%D8%B7%D9%86%D8%A7%D8%B9%D9%8A-%D9%81%D9%8A-%D8%A7%D9%84%D8%A3%D9%88%D9%82%D8%A7%D9%81-%D9%85%D9%86-%D8%A5%D8%AF%D8%A7%D8%B1%D8%A9-%D8%AA/>
18. Ismail, W. M., Misba, N. T., & Isa, N. A. (2025, 06 17). Reimagining waqf in the digital age: A framework for smart waqf governance through emerging technologies. *International Journal of Research and Innovation in Social Science*, 09(05), 4704–4714.
19. Jassim, N. (2024, 07 01). *Challenges of traditional waqf management {In Arabic}*. Consulté le 03 04, 2026, sur aktub.se/?p=24845

20. Kondile, P., Msomi, M. P., Moosa, B., & Okoro, C. (2025). Benefits and challenges of using satellite imagery for property valuation data collection. *CIB Conferences*.
21. National Office for Endowments and Zakat. (2026). *Legislative and regulatory texts {In Arabic}*. Consulté le 03 12, 2026, sur ONWZ, Algeria : <https://www.onwz.dz>
22. Pessarlay, W. (2025, 11 04). *Algeria partners with UNDP for its national digital transformation*. Consulté le 02 13, 2026, sur <https://coingeek.com/algeria-partners-with-undp-for-its-national-digital-transformation/>
23. Shah, A. (2026, 02 26). *Will Saudi Arabia's Waqf Renaissance Bring Tangible Results?* Consulté le 03 01, 2026, sur Eurasia Review: <https://www.eurasiareview.com/26022026-will-saudi-arabias-waqf-renaissance-bring-tangible-results-analysis/>
24. UNDP. (2022, 09 30). *Green Waqf Framework. Climate Promise*. Récupéré sur United Nations Development Programme: <https://climatepromise.undp.org/research-and-reports/green-waqf-framework>