When the Algorithm Says “Haram”: Governing AI in Shariah-Sensitive Functions

The gap between the product a Shariah board approves and the code an institution deploys is where the next generation of governance failures will occur

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Artificial intelligence is now embedded in the Shariah-sensitive functions of Islamic financial institutions: equity screening, customer advice, treasury allocation, zakat computation, sukuk monitoring, takaful underwriting, and smart-contract settlement. The industry has, for the most part, treated these deployments as technology projects. They are not. They are Shariah functions, and they require Shariah governance.

The scenarios below are illustrative. None describes a specific institution, and the figures in each are chosen to make the mechanism clear, not to report an event. The failure patterns, however, are the ones that arise whenever an algorithm is placed in a Shariah-sensitive role without governance designed for it.

Five scenarios

The screening engine that missed an acquisition.
A robo-advisory platform keeps a listed conglomerate in its compliant portfolio after the conglomerate acquires a majority stake in a conventional insurer. The screening engine relies on sector classifications refreshed quarterly; the classification code never changes, the debt ratios barely move, and the algorithm continues to return a pass. A single human reviewer covering several hundred names confirms the result. The Shariah board sees a quarterly summary with a high aggregate compliance score. Investors hold a non-compliant business for more than a year, and no purification is calculated.

> *Governance gap: no trigger for material corporate events; no requirement for human re-screening when one occurs; no audit trail linking the algorithm’s classification logic to board-approved criteria.*

The chatbot that invented a ruling.
A bank deploys a generative-AI assistant for customer inquiries on home financing and takaful. A customer facing job loss asks whether installments can be restructured and whether a late fee applies. The assistant, drawing on its general training data rather than the bank’s approved Shariah manual, cites a named standard and a specific permissible fee percentage. The standard says no such thing; the percentage is fabricated; and the bank’s own board had ruled that any fee beyond actual administrative cost is impermissible. The customer acts on the answer. The error reaches the Shariah compliance unit only because the customer complains.

Governance gap: no constraint tying the model's answers to the approved fatwa repository; no Shariah review of the training data; no logging of Shariah-sensitive queries for board review; no disclosure that the assistant is not a Shariah authority.

The treasury system that commingled funds.

A conventional bank's Islamic window adopts an AI-driven liquidity allocation system. The rules are correct on paper: Islamic deposits to commodity murabaha and sukuk; conventional deposits to interbank and money-market instruments. One parameter in the overflow logic is wrong. When the compliant pool is fully deployed, excess Islamic funds cascade to the next available pool, which is the conventional overnight desk. This happens repeatedly over several months and is discovered only in a year-end internal audit. The window's Shariah board learns of it weeks after that.

Governance gap: no pre-deployment Shariah review of the allocation logic; no real-time firewall or alert when Islamic funds approach a non-compliant pool; no direct escalation path to the Shariah board.

The zakat calculator that used the wrong year.

A widely used fintech app launches automated zakat: it reads account balances, tests the nisab, applies the haul, and prompts payment. The engineers, competent and without fiqh training, code the haul as 365 days. The Shariah requirement is a lunar year of roughly 354 days. For more than a year, zakat is triggered late for every user, and in edge cases deferred to the following cycle. The Shariah reviewer had approved the feature concept and never tested the calculation. A user with formal Islamic training notices the discrepancy.

Governance gap: the board approved a specification, not an implementation; no scholar-level verification of time computation; "auto-zakat" was classified as a technical feature rather than a Shariah function.

The smart contract that settled with interest.

A platform issues a blockchain-based sukuk with programmable profit distribution. The contract includes an automated late-payment provision. The developers, modeling on conventional bond contracts, hardcode the penalty to an interest-rate benchmark. The provision triggers twice before an external Shariah auditor, reviewing the code during a routine engagement, flags it. The board had approved a product document that said "compensation for actual loss." The deployed code said something else, and, once deployed, could not be changed without a hard fork.

Governance gap: no process connecting Shariah approval to the technical implementation; the board reviewed a description of the product rather than the instrument itself.

One pattern

Not one of these scenarios involves bad faith. In each, capable professionals build a useful product. The failure is structural, and it is the same every time: the governance framework treats technology as an implementation detail rather than a governed Shariah function.

The board reviews the product document, not the code. Compliance checks the output, not the logic. Audit verifies the ratios, not the training data. The developer builds what the developer understands, and no one checks whether that understanding is Shariah-complete. The failures occur in the gap — between the specification and the deployed algorithm, between the fatwa and the function, between the standard and the smart contract.

> **The Shariah board approved the product. It never saw the code.**

What governance of algorithmic Shariah functions requires

The principles are not novel. They are the same principles that govern any Shariah-sensitive activity, applied to a domain the industry has so far exempted from them.

Competence. Someone in the governance chain must understand both the technology and the fiqh well enough to translate between them: to ask, before a chatbot is deployed, whether its answers are constrained to the approved fatwa repository; to ask, before a zakat feature ships, who verified the haul against the lunar calendar. These are governance questions, not technical ones, but they cannot be asked by a Shariah scholar who has never seen a model or by an engineer who has never opened a standard.

Independent oversight. Shariah governance must have direct sight of algorithmic decision-making, not a summary of its output. That means Shariah review of Shariah-sensitive logic before deployment, automated controls where funds or classifications can cross a compliance boundary, and escalation to the Shariah board on the first occurrence of a breach rather than after the audit cycle. The board's remit must explicitly include algorithms that make or shape Shariah-sensitive decisions, including underwriting and screening models whose outputs affect who is served and on what terms.

Auditability. Every Shariah-sensitive algorithmic decision should be traceable to the rule applied, the data at the time of decision, the board approval of that rule, and the date of last review. If an institution cannot produce that trace on request, the decision is not governed. In the first scenario above, the platform could not explain why the stock remained in the portfolio; the algorithm's reasoning was unreviewable by the board, untraceable by compliance, and unchallengeable by the investor.

Accountability. This is the principle that distinguishes Islamic governance from conventional AI-ethics frameworks. In Islam, a tool bears no moral responsibility; the human does. Taklif — accountability before Allah and the community — remains with the person who wrote the code, the person who reviewed it, the board member who approved the structure without verifying the implementation, and the executive who did not ask to see it. "The contract executed automatically" is not a defense. Every Shariah-sensitive algorithm should have a named, accountable human owner: not a department, not a vendor, a person.

Four questions for the board

Directors of Islamic banks, takaful operators, fintech platforms, funds, and Islamic windows can test their own institution with four questions.

1. **"Show us every Shariah-sensitive algorithmic decision made in the last ninety days, and the audit trail for each."** Not the dashboard or the compliance score — the rule applied, the data input, the approval date, the last review. If this takes more than a day to produce, the governance is nominal.
2. **"When did the Shariah board last review the actual code, model, or smart contract, rather than the product document?"** If the answer is never, the board has approved descriptions of products it has not seen.
3. **"What is our incident protocol for an AI Shariah failure?"** It should cover immediate escalation to the Shariah board, customer notification, purification calculation, and disclosure in line with applicable standards. Most institutions do not have one.
4. **"Who, by name, is accountable for Shariah compliance in our AI systems?"** If the answer is the vendor, the IT department, or the system, the amanah has been delegated to something that cannot hold it.

The bottom line

Artificial intelligence can screen equities faster than any human, compute zakat with precision, and monitor a sukuk portfolio in real time. It cannot perform ijtihad, bear taklif, or stand before a Shariah board and defend its reasoning. It cannot distinguish between a ruling that passes a ratio test and one that honors the maqasid of the Shariah. That distinction is the irreducible core of Islamic finance governance, and it belongs to trained, governed, accountable humans.

The next generation of models — agentic, capable of autonomous financial decisions — will make today's systems look rudimentary. If the governance architecture is not ready, the failures of the current cycle will be a warm-up. The question is not whether AI belongs in Islamic finance. It does. The question is whether governance is strong enough to ensure the algorithm serves the Shariah, and not the other way around.

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