



Islamic Environmental Ethics and Green Banking Adoption in Bangladesh: A Maqasid al-Shariah Perspective

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Received : August 02, 2026

Revised : September 26, 2026

Accepted : October 16, 2026

Online : October 19, 2026

Abstract

This research investigates the interplay of Islamic environmental ethics, environmental awareness, and the practice of green banking services in Bangladesh from a moral perspective of Maqasid al-Shariah. While green banking regulation has been growing in Bangladesh, prior institutional research suggests that practice is often a mix of substantive green finance and superficial digitization, oriented more toward secular Environmental, Social and Governance (ESG)-style compliance than toward Shariah-specific financial considerations (Islam et al., 2021a; Hatta et al., 2023); no ESG construct is measured directly in this study, which instead examines this tension from the customer side. With a deductive and quantitative approach, primary data were gathered from 100 purposively selected respondents who are customers of a single fully-fledged Islamic bank in Bangladesh by using a structured survey and analyzed with SPSS. The internalization of Islamic environmental ethics from Hifz al-Bi'ah (environmental protection) to Hifz al-Nasl (intergenerational equity) had a significant positive impact on customers' environmental awareness ($\beta = .456, p < .001$), which in turn was the strongest predictor of green banking adoption ($\beta = .486, p < .001$). This relationship was not moderated significantly by personal religiosity, indicating that the association of ethics and awareness is largely independent of personal religiosity. The results reveal a recurring paradox: a strong ethical demand for authentic sustainability on the part of the customer and a predominantly procedural approach on the part of the institutions. The study concludes that while Islamic financial institutions currently have a green banking approach with a compliance orientation, it is necessary for them to integrate environmental protection into their fiduciary trust (amanah).

Keywords: *Islamic Environmental Ethics, Environmental Awareness, Green Banking, Ecological Stewardship, Islamic Banks, Maqasid Al-Shariah*

INTRODUCTION

Bangladesh is one of the climate-vulnerable countries in the world, affected by climate change including rising sea levels, extreme climate change, coastal flooding and salinity intrusion, which poses a threat to livelihoods, agriculture and economic stability in a long term (Islam et al., 2021b). To address this, Bangladesh Bank has issued Green Banking and Environmental and Social Risk Management (ESRM) Guidelines (Bangladesh Bank, 2022; Khairunnessa et al., 2021), which have introduced green finance in the credit risk management and governance and investment strategy of financial institutions. Islamic banks, which make up a significant portion of the banking sector in Bangladesh, are already poised to spearhead this transition, as their principles are rooted in the Shariah, which emphasizes ethical responsibility, social justice and environmental care, while the Maqasid al-Shariah concept, especially Hifz al-Nasl (the preservation and continuity of future

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generations), provides a framework for sustainable finance (Monawer et al., 2021; Setiawati & Salsabila, 2023; Khan et al., 2023). Bangladesh is a particularly instructive site for testing this proposition: beyond its climate vulnerability, it combines Bangladesh Bank's comparatively mature, legally binding ESRM guidelines (Bangladesh Bank, 2022) with one of the largest full-fledged Islamic banking sectors in the region, which accounts for roughly a quarter of the country's total banking-sector deposits and investments (Nowrose, 2024). This co-occurrence of formal green-banking regulation and a substantial faith-based retail banking base is uncommon among climate-vulnerable, Muslim-majority economies, making Bangladesh a distinctive rather than merely convenient setting for testing whether Maqasid al-Shariah principles translate into customer-level green banking behavior.

This alignment is either substantive or nominal, and there is a controversy surrounding whether this is the case. Current studies indicate that the green initiatives in Islamic banks are seen more as a tool to enhance CSR performance and less as an obligation under Shariah and are found to be only in the form of procedural compliance (Islam et al., 2021a). The gap is caused by the lack of standardization of Shariah-environmental metrics, the lack of accountability mechanisms and weak operationalization of ethics in risk management (Fitriyanti et al., 2023). The question that is at stake is whether it is the case of faith-based stewardship for green banking in Bangladesh or just policy-driven compliance.

The existing literature on green banking in Bangladesh has primarily focused on the regulatory transparency and compliance, while there is not much attention given to its moral and theological aspects, especially how Hifz al-Nasl contributes to investment decision-making (Islam et al., 2021a). In general, the guidelines of Bangladesh Bank (2022) are procedural and there is not much operationalization of the Shariah-based environmental responsibility. This study aims to fill that gap by constructing and testing a framework of sustainable Islamic finance based on environmental maqasid ethics.

Accordingly, this study aims to assess the extent to which Maqasid al-Shariah principles inform the green-banking behavior of individual customers of a fully-fledged Islamic bank in Bangladesh. Building on Maqasid al-Shariah as a normative paradigm for environmental stewardship (i), the study develops and empirically tests a customer-level behavioral model in which customers' internalization of Islamic environmental ethics is hypothesized to shape their environmental awareness, which in turn is hypothesized to drive their adoption of green banking services, with religiosity tested as a boundary condition of this relationship (ii). The alignment of institutional green banking practice with these ethical principles, the ecological efficacy of existing green portfolios, and the comparison of the Islamic model with Western sustainability frameworks are engaged as literature-grounded interpretive discussion in Section 5, rather than as directly tested empirical objectives, since they would require institution-level data beyond the scope of the present customer survey. This study addresses the following research questions: RQ1 - to what extent does customers' internalization of Islamic environmental ethics predict their environmental awareness? RQ2 - to what extent does customers' environmental awareness predict their adoption of green banking services? RQ3 - does religiosity moderate the relationship between customers' environmental awareness and their adoption of green banking services?

Research Gap and Contribution

Existing scholarship on Maqasid al-Shariah and the environment remains largely doctrinal or institution-focused, theorising Hifz al-Bi'ah and Hifz al-Nasl as normative obligations or auditing regulatory compliance, without testing whether these ethics function as measurable drivers of customer behavior (Syihabuddin et al., 2023; Subedi & Bhattacharai, 2024). This leaves an empirical gap at the point where Islamic environmental ethics is theorized to matter most: the individual

customer whose choices ultimately determine whether green banking demand exists. This study addresses that gap by developing and testing a customer-level behavioral model that links Islamic environmental ethics, environmental awareness, religiosity and green banking adoption within a single empirical framework, tested using cross-sectional survey data from 100 customers of a fully-fledged Islamic bank in Bangladesh and analyzed via linear regression and moderation analysis (Hayes PROCESS, Model 1) — a contribution detailed further, in light of the study's findings, in Section 5.5.

LITERATURE REVIEW

This section reviews the theoretical and empirical foundations of Islamic environmental ethics, Maqasid al-Shariah, and green banking practice, before synthesizing this literature into a conceptual model and a set of testable hypotheses.

Maqasid al-Shariah and Environmental Stewardship

The extension of Maqasid al-Shariah from classical jurisprudence into ecological economics has generated substantial debate. Classical scholarship centers the five daruriyyat (essential objectives) on Hifz al-Mal, the protection of wealth (Sheikh et al., 2023). More recent scholarship, however, argues that profit maximization pursued at ecological cost is untenable, elevating Hifz al-Nasl (continuity of offspring) and Hifz al-Bi'ah (environmental protection) from auxiliary virtues (tahsisiiyyat) to existential imperatives (wajib) (Syihabuddin et al., 2023). Laldin (2020) considers the focus on intergenerational equity in Maqasid broadly to be in alignment with the United Nations Sustainable Development Goals (SDGs), but Khan and Haneef (2022) argue that the lack of binding international treaties, such as those in Bangladesh, cannot be achieved through spiritual accountability alone. Moniem (2021) refutes this respect for secular mechanisms and suggests that international treaties involve only negative screening while Maqasid involves impact-based financing. The same stance is taken by Sadek et al. (2025) who demonstrate that, the enforcement gap pointed out by Khan and Haneef can be filled by including Hifz al-Bi'ah in credit risk assessment, thereby interpreting Maqasid as the theological extension of SDGs.

A similar discussion relates to the compatibility of financial and ecological goals. Both Khuluq and Asmuni (2025) and Hassan and Noor (2025) consider the environmental limits as an operating cost and a constraint for profit maximization that gives preference to Hifz al-Mal. This dichotomy is refuted by Kobiyyh and Amri (2023) and Latif et al. (2023), who claim that Hifz al-Bi'ah is a physical prerequisite for the other daruriyyat because without viable ecosystems, Hifz al-Nasl cannot be maintained, thereby reframing environmental stewardship from a discretionary to an obligatory issue. Gueye and Mohamed (2022) place this change in the context of the concept of Khalifah (vicegerency) where responsibility for the natural environment (amanah) overrides short-term return on investment. However, as Islamic finance is not necessarily, and in many cases explicitly, aligned with the operational application of the Maqasid principles, even without direct connections to environmental issues, Islamic finance is structurally complicit in environmental degradation, including in vulnerable sectors like Bangladesh's Ready-Made Garment supply chains (Latifah, 2024).

Islamic and Western Sustainability Models

There are also unresolved tensions in the comparison of Islamic and Western sustainability paradigms. Laldin (2020) equates Islamic stewardship (Khalifah) with SDGs 12 and 13, but Bsoul et al. (2022) challenges the equivalence, making the argument that western sustainability still operates within a debt-driven, profit-maximizing capitalism, which it claims to seek to address. On the practical side, Khan and Haneef (2022) argue that the Western model of binding secular

agreements is more effective than responsibility based on faith in ensuring compliance in developing economies. [Islam et al. \(2023\)](#) respond that it is this fungible, unpaired-to-asset capital that makes it possible for the West to keep on extracting, and that only impact-certain instruments – such as Green Sukuk – can address the disconnect in emerging markets between financing practice and intergenerational equity ([Syihabuddin et al., 2023](#); [Hakim, 2024](#)).

This critique is no different with regard to ESG frameworks. As noted by [Hatta et al. \(2023\)](#) and [Islam et al. \(2021a\)](#), the deontological commitments of Islamic jurisprudence do not allow for a risk-based calculation and therefore secular ESG is fundamentally utilitarian in nature, focused on long-term financial risks. In fact, Islamic banks in Bangladesh have replaced this secular risk logic with deliberation based on ethical considerations, a cognitive offloading that diminished the spiritual commitment to compliance checklists, argue [Khairunnessa et al. \(2021\)](#). [Boudawara et al. \(2023\)](#) takes this a step further, saying that ESG's "do no harm" principle is by itself too weak and must be accompanied with the active approach of seeking collective benefit (Maslahah). [Aldhaheri \(2025\)](#) argues that this gap can only be bridged by the Islamic institutions by collectively combining the spiritual mandate of Hifz al-Nasl with the technical requirements of Environmental Risk Management (ERM) guidelines of Bangladesh Bank, and that ecological stewardship cannot be considered a risk-adjusted strategy; rather, it is a non-negotiable trust.

Green Banking Practice in Bangladesh

There is a wide divergence between empirical observations of the implementation of green banking in Bangladesh. According to [Subedi and Bhattarai \(2024\)](#), while Bangladesh Bank's ERM guidelines (2011, 2017, 2023) are being followed, it is a matter of 'secular regulatory pressure' rather than shariah motivation, and there is a general failure of implementation of guidelines in Islamic banks. A more positive picture is provided by [Alam et al. \(2023\)](#), who suggest that Islamic banks are innovating beyond negative screening to active environmental restoration. [Chakroborty et al. \(2025\)](#) challenge this, however, claiming that green finance in Bangladesh is still marginal and it is often treated as a mix of CSR activity or digitization of operations (paperless banking), which is more about the legitimacy of the contract than its environmental implications. According to [Syed et al. \(2026\)](#), this trend is due to regulatory homogenization: central bank pressure for standardized secular reporting inadvertently discourages deeper Maqasid-aligned innovation and leaves green banking as somewhat of an administrative signaling game and not a longer-term industrial sustainability game.

Conceptual Framework and Hypotheses

Based on this literature, the conceptual model of this study implies that environmental awareness is influenced by the internalization of Islamic environmental ethics and influences the adoption of customer green banking services, while religiosity moderates the awareness–adoption relationship. For clarity, the model's constructs are defined and operationalized as follows. Islamic environmental ethics (IEE) refers to customers' internalized acceptance of Hifz al-Bi'ah (environmental protection) and Hifz al-Nasl (the preservation and continuity of future generations) as binding moral obligations rather than discretionary virtues ([Syihabuddin et al., 2023](#)), measured through Likert items on wealth-versus-environment trade-offs and the Khalifah (vicegerency) role. Environmental awareness (EA) refers to customers' cognitive recognition of environmental externalities and their information-seeking behavior regarding conservation ([Khan et al., 2023](#)). Adoption of green banking services (AGB) refers to customers' self-reported use of, and willingness to switch toward or away from, green-labelled banking products and institutions on environmental grounds. Religiosity (REL) is operationalized here specifically as intrinsic, practice-oriented religiosity - the extent to which customers actively seek religious guidance for financial decisions

and prioritize Shariah-compliant transactions - rather than the fuller multidimensional construct reported elsewhere in the literature, which also encompasses religious belief, ritual observance and religious knowledge (Aldhaheri, 2025); this narrower operationalization is a scope condition of the present test of H3, revisited in Section 6.5.

In the modern era, Hifz al-Bi'ah is considered an existential imperative (wajib) for the preservation of Hifz al-Nasl, and not as an auxiliary virtue (Syihabuddin et al., 2023). This means that Khalifa (vicegerency) is not just socio-economic (Gueye & Mohamed, 2022), but a divinely-given responsibility (amanah), and ecological viability becomes a pre-condition for the other daruriyyat (Latif et al., 2023). The classical concept of Hifz al-Mal (security of wealth) is expected to be transformed into a greater awareness of the environment as customers learn to internalize these ethics (Sheikh et al., 2023).

H1: Islamic environmental ethics positively influence environmental awareness among customers of Islamic banks.

Whether this internalization translates into awareness may depend on religiosity. Without active religious engagement, individuals may default to cognitive offloading — reducing complex ethical judgement to compliance with generic ERM guidelines (Khairunnessa et al., 2021; Moniem, 2021). Religiosity is therefore theorized as a psychological intensifier that binds abstract ethical teaching to concrete environmental consciousness (Aldhaheri, 2025).

Environmental awareness, in turn, is expected to translate into behavioral adoption of green banking. Given evidence that Bangladesh's green banking sector conflates authentic ecological financing with superficial CSR activity and digitization (Chakroborty et al., 2025), and that Western ESG models remain risk-based rather than eco-centric (Hatta et al., 2023; Islam et al., 2021a), aware customers are expected to demand — and adopt — more substantively green financial products, including impact-based instruments such as Green Sukuk (Hakim, 2024; Syed et al., 2026).

H2: Environmental awareness positively influences the adoption of green banking services.

H3: Religiosity positively moderates the relationship between environmental awareness and the adoption of green banking services.

Taken together, this body of work establishes strong theoretical grounds for expecting Islamic environmental ethics to shape green banking behavior, but leaves this expectation empirically untested at the customer level, and leaves unresolved whether religiosity is a necessary condition for that ethical translation to occur or merely a common correlate of it. The present study is designed to close both gaps directly.

RESEARCH METHOD

Research Design

The research philosophy of this study is positivism, and the approach of the research is deductive, quantitative research because the goal of this study is to test the relationship between Islamic environmental ethics, environmental awareness, religiosity and the adoption of green banking (Saunders et al., 2023; Creswell & Creswell, 2018). The operationalization of the hypotheses was carried out using a structured survey, and tested statistically, which is more appropriate for causal explanation and generalization instead of inductive and qualitative design that was mostly derived from the book of Maqasid al-Shariah. To reduce common method variance, non-response bias and the instrument's invalidity, the questionnaire was pre-tested and the anonymity of the respondents was protected (Saunders et al., 2023; Stotmeister, 2024).

Data Collection

The primary data were gathered using a structured online survey (Google Forms) with five-point Likert-scale items from the customers of the fully-fledged Islamic banks in Bangladesh who had knowledge about green banking services. To minimize common method bias and self-report inflation (Stotmeister, 2024), the items were reverse coded and guaranteed anonymity. Primary data collection was considered over secondary sources due to the need to directly measure constructs of interest such as internalization of Islamic environmental ethics, religiosity and adoption of green banking practices which are unique to the context (Creswell & Creswell, 2018; Saunders et al., 2023).

Sampling

The target population for this study was the customer base of a single fully-fledged Islamic bank in Bangladesh with prior knowledge of green banking services - a population numbering in the hundreds of thousands, for which no complete, accessible sampling frame (e.g., a customer directory permitting random selection) was available to the researchers. Given this constraint, and because the study specifically requires participants with prior knowledge and experience of green, Shariah-compliant financing, a purposive, non-probability sampling method was used to recruit an achieved sample of 100 respondents (Bell & Bryman, 2022). To reduce the branch-level and geographic homogeneity this method can otherwise introduce, respondents were purposively recruited across several branches of the same institution located in different areas, rather than from a single branch (McNabb, 2021). This achieved sample of 100 customers is therefore drawn from one Islamic bank rather than multiple institutions; this single-institution scope is a deliberate boundary of the present study's design, consistent with the customer-level objectives set out in Section 1, and is revisited as a constraint on generalizability in Section 6.5.

Data Analysis

The data were cleaned in Excel and analyzed with IBM SPSS with the application of descriptive and inferential statistics: Linear Regression for H1 and H2, and the Hayes Process macro (Model 1) for the moderation test of H3, which was designed to determine the statistical significance of the hypotheses' relationships (McNabb, 2021; Hair et al., 2019).

Measurement Reliability, Validity, and Preliminary Diagnostics

Prior to hypothesis testing, the measurement model was assessed for internal consistency, convergent validity, and discriminant validity. Internal consistency was acceptable to good for all four constructs (Cronbach's α : IEE = .79, REL = .81, EA = .82, AGB = .76), and composite reliability was good for all four (CR: IEE = .86, REL = .88, EA = .88, AGB = .85). Convergent validity was supported, with average variance extracted (AVE) exceeding the .50 threshold for every construct (IEE = .61, REL = .64, EA = .65, AGB = .58). Discriminant validity was supported by the Fornell-Larcker criterion: the square root of each construct's AVE (.76-.81) exceeded its correlations with the other three constructs ($r = .13-.49$) in every pairwise comparison (Hair et al., 2019).

An exploratory factor analysis (principal-axis extraction, varimax rotation) on all 16 items confirmed the theorized four-factor structure. Sampling adequacy was good (KMO = .77) and Bartlett's test of sphericity was significant, $\chi^2(120) = 628.70$, $p < .001$, confirming the data were factorable. Four factors had eigenvalues above 1 (4.94, 2.35, 1.83, 1.23), matching the four hypothesized constructs, and every item loaded most strongly ($\geq .64$) on its intended factor with no cross-loading exceeding .33. Because religiosity (REL) was deliberately operationalized in this study as a single, narrow dimension — intrinsic, practice-oriented religiosity (Section 2.4) — rather than the broader multidimensional construct reported elsewhere in the literature, its four items

were expected to form one coherent factor; this is what the analysis showed (all four REL items loaded .74-.83 on a single factor), consistent with the scope of the present operationalization rather than evidence against religiosity's wider multidimensionality. Common method bias was addressed both procedurally (anonymity and reverse-worded items; Section 3.6) and statistically, via Harman's single-factor test: an unrotated factor analysis of all 16 items yielded a first factor accounting for 30.8% of total variance, well below the 50% threshold associated with a common-method-bias problem (Podsakoff et al., 2003), suggesting common method bias is unlikely to explain the observed relationships.

Regression assumptions were also checked. All four constructs showed skewness (-0.44 to -0.04) and excess kurtosis (-0.44 to 0.65) well within the $\pm 2/\pm 7$ range considered acceptable for OLS regression (Kline, 2011); the Shapiro-Wilk test nonetheless flagged minor departures from normality for all four constructs ($p < .05$ in each case), unsurprising given this test's sensitivity to small deviations at this sample size. Three cases exceeded $|z| > 3$ on at least one construct, and one case exceeded the Mahalanobis D^2 critical value for four variables at $p < .001$ ($D^2 = 20.32$ against a critical value of 18.47); re-estimating H1 and H2 with this case excluded changed neither the direction nor the significance of either path (both remained significant at $p < .001$, with standardized coefficients changing by less than .03), so it was retained in all analyses reported below. In the moderation model (Section 4.3), variance inflation factors for environmental awareness, religiosity, and their mean-centred interaction term were all below 1.2 (1.07-1.16), indicating multicollinearity was not a concern.

Ethical Considerations

A research ethics protocol was followed in the study, considering the sensitive financial and religious information (Bell & Bryman, 2022). Informed consent was secured through an online preamble that explained what the study involved and that there would be no penalty for taking part or withdrawing from the study. To reduce social desirability bias (Saunders et al., 2023), all responses were anonymized and identifying metadata removed.

FINDINGS AND DISCUSSION

Sample Characteristics

The sample had an age range mainly under 35 years, with 26-35 years (54.0%) and 18-25 years (28.0%) and the rest being older. Respondents had high educational levels, with 60.0% having a Bachelor's degree, 24.0% a Master's degree, and 5.0% a Doctorate. Table 1 reveals that the majority of the respondents had banked with their Islamic institution for 1-3 years (40.0%) and 4-6 years (28.0%) while all respondents (100.0%, $N = 100$) had prior knowledge of green banking, in line with the study's purposive sampling criteria.

Table 1. Demographic profile of respondents ($N = 100$)

Variable	Category	N	%
Age	18-25 years	28	28.0%
	26-35 years	54	54.0%
	36-45 years	6	6.0%
	46-55 years	3	3.0%
	56 years and above	9	9.0%
Education	High School / Diploma	8	8.0%

Variable	Category	N	%
	Bachelor's Degree	60	60.0%
	Master's Degree	24	24.0%
	Doctorate (PhD)	5	5.0%
	Other	3	3.0%
Duration with bank	Less than 1 year	16	16.0%
	1-3 years	40	40.0%
	4-6 years	28	28.0%
	More than 6 years	16	16.0%
Familiar with green banking	Yes	100	100.0%

Descriptive Statistics

Descriptive statistics for the four constructs are reported in Table 2. All four constructs show item means clustered narrowly between 3.70 and 3.91 (SDs approximately 0.81-0.96), indicating a generally consistent, moderate-to-strong level of agreement across items rather than meaningfully differentiated response patterns. Because the largest between-item difference within any construct (0.13-0.15 scale points) falls well within one standard deviation, individual item means are not interpreted here as ranked or substantively distinct from one another; each construct is instead described as a uniform response profile, with the inferential results in Section 4.3 forming the basis for the study's substantive conclusions. Islamic Environmental Ethics (IEE) items averaged 3.70–3.83. Religiosity (REL) items produced the highest mean band of the four constructs (3.77–3.91), consistent with a religiously observant sample. Environmental Awareness (EA) items ranged from 3.76 to 3.88. Adoption of Green Banking Services (AGB) items were the most tightly clustered of the four constructs (3.71–3.76, variance 0.649–0.693).

Table 2. Descriptive statistics by construct

Construct	Item	Mean	SD
Islamic Environmental Ethics	IEE1	3.79	.957
	IEE2	3.70	.859
	IEE3	3.80	.910
	IEE4	3.83	.853
Religiosity	REL1	3.77	.851
	REL2	3.89	.815
	REL3	3.87	.917
	REL4	3.91	.842
Environmental Awareness	EA1	3.78	.860
	EA2	3.88	.844

Construct	Item	Mean	SD
	EA3	3.83	.842
	EA4	3.76	.866
Adoption of Green Banking	AGB1	3.75	.821
	AGB2	3.72	.830
	AGB3	3.76	.806
	AGB4	3.71	.832

Inferential Results

A simple linear regression confirmed that Islamic environmental ethics significantly predicted environmental awareness, $F(1, 98) = 25.69$, $p < .001$, explaining 20.8% of variance ($R^2 = .208$, adjusted $R^2 = .200$). The effect was positive and significant ($B = 0.449$, $\beta = 0.456$, $t = 5.07$, $p < .001$), supporting H1. A second regression showed that environmental awareness significantly predicted adoption of green banking services, $F(1, 98) = 30.32$, $p < .001$, $R^2 = .236$ (adjusted $R^2 = .228$; $B = 0.442$, $\beta = 0.486$, $t = 5.51$, $p < .001$), supporting H2 (Table 3).

Table 3. Regression results for H1 and H2 (* $p < .001$)

Model	B	SE	β	t	p	R^2	F
H1: IEE $\rightarrow$ EA	.449	.089	.456	5.07	<.001	.208	25.69*
H2: EA $\rightarrow$ AGB	.442	.080	.486	5.51	<.001	.236	30.32*

Because the conceptual model (Section 2.4) implies a sequential ethics $\rightarrow$ awareness $\rightarrow$ adoption pathway rather than two independent effects, a bootstrapped mediation analysis (10,000 resamples) tested whether environmental awareness carries the effect of Islamic environmental ethics through to green banking adoption. Islamic environmental ethics had a significant total effect on adoption ($c = 0.250$, $\beta = .279$, $p = .005$), and this effect was carried substantially through environmental awareness: the indirect effect was significant and its confidence interval did not include zero (standardized indirect effect = .206, 95% CI [.099, .342]; unstandardized indirect effect = 0.185, 95% CI [0.088, 0.307]). The direct effect of Islamic environmental ethics on adoption, controlling for environmental awareness, was not significant ($c' = 0.065$, $\beta = .073$, $p = .466$; bootstrapped 95% CI [-0.114, 0.239]), indicating that environmental awareness fully mediates the ethics-to-adoption relationship and accounts for approximately 74% of the total effect.

A moderation analysis using the Hayes PROCESS macro (Model 1, mean-centred) tested whether religiosity moderates the relationship between environmental awareness and green banking adoption (Table 4). The overall model was significant, $F(3, 96) = 11.18$, $p < .001$, $R^2 = .259$. Environmental awareness remained a significant predictor ($B = 0.388$, $t = 4.51$, $p < .001$), but the interaction between environmental awareness and religiosity was not significant ($B = 0.172$, $t = 1.30$, $p = .196$; $\Delta R^2 = .013$). H3 was therefore not supported: religiosity does not significantly moderate the relationship between environmental awareness and green banking adoption.

Table 4. Moderation analysis results (Hayes PROCESS, Model 1)

Predictor	B	SE	t	p	95% CI
Constant	3.712	0.058	64.41	<.001	[3.60, 3.83]
Environmental Awareness (EA)	0.388	0.086	4.51	<.001	[0.22, 0.56]
Religiosity (REL)	0.094	0.084	1.12	.266	[-0.07, 0.26]
EA × REL (interaction)	0.172	0.132	1.30	.196	[-0.09, 0.43]

Discussion

The results are then explained in relation to the research aim of the study, followed by positioning the results in the literature of the Maqasid al-Shariah and green banking and finally, the specific contribution and novelty of the study in light of the findings above will be presented.

Maqasid al-Shariah as a Normative Paradigm

The results indicate that the theoretical repositioning of Maqasid al-Shariah as not only an auxiliary ethical code is supported by the findings. The respondents' response to strong agreement to the statement that "Wealth generation should not be at the cost of the environment" ($M = 3.83$) and strong agreement to the statement "The role of the Khalifah is an existential imperative" ($M = 3.80$) empirically reflects the literature's reframing of Hifz al-Bi'ah as an existential imperative bound to Hifz al-Nasl ([Latif et al., 2023](#); [Syihabuddin et al., 2023](#)). The positive and significant role of Islamic environmental ethics on environmental awareness ($\beta = 0.456$, $p < .001$) indicates that Islamic environmental ethics acts as a true cognitive determinant for environmental awareness and not a rhetorical layer over secular compliance.

Institutional Practice versus Customer Expectations

There is a suggestive contrast, though not a directly tested one, between what customers in this sample express willingness to do and what prior institutional research describes banks as actually doing. Customers report willingness to move funds away from institutions financing environmentally damaging industries ($M = 3.76$) and heavy use of digital banking services ($M = 3.75$). Independently, [Chakroborty et al. \(2025\)](#) interpret similar patterns in the wider market as reflecting operational digitization rather than substantive ecological financing, and [Subedi and Bhattarai \(2024\)](#) and [Syed et al. \(2026\)](#) report that green-banking compliance in Bangladesh is driven more by secular ERM requirements and regulatory homogenization than by Shariah motivation. Because these institutional characterizations come from separate studies using different data and measures, they cannot be statistically compared with the customer attitude means reported here; the juxtaposition is offered as an interpretive reading of the literature alongside this study's findings, not as evidence of a measured gap between this bank's practice and its customers' expectations. If this juxtaposition holds, closing it would plausibly require moving beyond negative screening toward financial instruments that tie capital to concrete conservation results, such as Green Sukuk ([Hakim, 2024](#); [Aldhaheri, 2025](#)).

Literature-Based Reflection on Ecological Efficacy and Socio-Economic Implications

Environmental awareness is a significant predictor of green banking adoption in this sample ($\beta = 0.486$, $p < .001$), and respondents' expressed willingness to move away from

environmentally damaging investments ($M = 3.76$) is consistent with genuine customer-side demand for climate-related financial products; this study did not, however, collect data on the bank's actual green portfolios and so cannot itself assess their ecological efficacy. Drawing on [Chakroborty et al. \(2025\)](#), who describe green finance in Bangladesh more broadly as a blend of digitization and substantive ecological financing, this customer-side demand may not yet be matched by portfolios capable of translating it into tangible climate-adaptation outcomes, though confirming this would require institution-level data beyond the present design. At the socio-economic level, respondents' agreement that wealth generation should not come at ecological cost ($M = 3.83$), their awareness of firms' environmental externalities ($M = 3.83$), and their awareness of climate change's socio-economic impacts in Bangladesh ($M = 3.78$) are consistent with the theoretical position that intergenerational equity (Hifz al-Nasl) functions as a precondition for, rather than a constraint on, wealth maximization ([Sheikh et al., 2023](#); [Syihabuddin et al., 2023](#)). If institutions are to convert this customer-side ethical orientation into practice, the literature points toward portfolios directly connected to impact-based and binding conservation commitments ([Hakim, 2024](#); [Islam et al., 2023](#)); this study's data speak to customer attitudes and stated intentions, not to actual willingness-to-pay or portfolio outcomes.

Islamic and Western Models: A Literature-Based Comparison

In the comparative literature, Western ESG frameworks are characterized as primarily risk-management tools for long-term profitability, further constrained by their embeddedness in a debt-driven, profit-seeking financial system ([Bsoul et al., 2022](#); [Boudawara et al., 2023](#); [Islam et al., 2021a](#); [Hatta et al., 2023](#)), whereas the Maqasid alternative frames environmental protection as an existential matter linked to intergenerational continuity ([Syihabuddin et al., 2023](#)). This study did not measure any ESG construct or directly compare Islamic and Western financial products, so it cannot itself test this contrast empirically. What this study does show is that customers in this sample consistently prioritize ecological integrity over wealth creation ($M = 3.83$) and express willingness to withdraw from ecologically harmful financing ($M = 3.76$); read alongside the literature above, this is consistent with - though it does not on its own establish - the argument that Islamic finance could stimulate stronger demand for substantive sustainability than negative-screening-based Western ESG, provided institutions move beyond procedural mimicry toward proactive, impact-certain instruments such as Green Sukuk ([Hakim, 2024](#); [Islam et al., 2023](#)).

Contribution and Novelty of the Study

These findings support three distinct contributions. First, to the authors' knowledge, this is among the first studies to operationalize Islamic environmental ethics as a quantifiable construct and empirically test its relationship with environmental awareness and green banking adoption within a single model, rather than treating Maqasid al-Shariah purely as a normative-theological argument. The significant path from Islamic environmental ethics to environmental awareness ($\beta = 0.456$, $p < .001$) and from awareness to adoption ($\beta = 0.486$, $p < .001$) provides empirical grounding for a claim the literature has to date only asserted conceptually: that Maqasid-based ethics function as a genuine behavioral driver, not merely a rhetorical framing of secular sustainability.

Second, the non-significant moderation by religiosity ($\Delta R^2 = .013$, $p = .196$) is itself a novel and theoretically consequential result. It runs counter to the prevailing assumption in the Islamic finance literature that religiosity is the primary channel through which Islamic ethical teaching translates into pro-environmental behavior ([Aldhaheri, 2025](#); [Moniem, 2021](#)). Instead, the data suggest that internalized Maqasid environmental reasoning operates as a general cognitive schema that shapes environmental awareness largely independently of an individual's devotional intensity

— a distinction with direct implications for how Islamic banks segment and target sustainability-conscious customers, since ecological consciousness need not be assumed to track piety.

Third, by surveying bank customers directly rather than relying on institutional disclosures or policy documents, as most prior Bangladeshi green banking research has done (Subedi & Bhattarai, 2024; Chakroborty et al., 2025; Syed et al., 2026), this study provides rare demand-side empirical evidence. It documents a customer base with an ethically grounded readiness for authentic ecological finance ($M = 3.76\text{--}3.83$ across key items) that, read against the procedural, digitization-oriented institutional practices described in prior literature (Chakroborty et al., 2025; Subedi & Bhattarai, 2024; Syed et al., 2026), appears to exceed current institutional delivery. This apparent customer-institution “ethics gap” is an interpretive juxtaposition rather than a directly measured comparison, since customer attitudes and institutional practice were not assessed on a common scale within a single study; even so, it points toward reframing the policy problem in Islamic green banking from one of insufficient customer awareness to one of possible institutional under-delivery against an already ethically motivated market, a proposition future institution-level research should test directly.

CONCLUSIONS

Summary

This study aimed to understand the intersection of Islamic environmental ethics and environmental awareness and green banking adoption in the context of Islamic banking in Bangladesh based on the normative framework of Maqasid al-Shariah. The internalization of Islamic ecological principles (from Hifz al-Bi'ah to Hifz al-Nasl) highly significantly predicted customers' environmental awareness that is the strongest factor that caused the adoption of green banking, which in turn was not significantly moderated by the levels of religiosity suggesting that the ethics-awareness link is almost independent of individual levels of religiosity. All these results point to one consistent dichotomy: there is strong customer demand for sustainability, based on ethical considerations; on the other hand, the green banking approaches of institutions are still predominantly procedural, where green bank equals digitization or standard CSR activity.

Recommendations

Three recommendations follow. First, Islamic banks should move beyond operational digitization and develop proactive, impact-based instruments — particularly Green Sukuk — that bind capital to measurable conservation and climate-adaptation outcomes, directly operationalizing Hifz al-Bi'ah. Second, regulators should revise Bangladesh Bank's Environmental Risk Management guidelines to incorporate Maqasid al-Shariah principles explicitly, shifting the compliance standard from risk mitigation toward proactive intergenerational equity. Third, banks should leverage customers' high environmental awareness by communicating the concrete ecological impact of specific investments rather than generic CSR messaging, given customers' demonstrated willingness to sanction ecologically harmful financing.

Theoretical Implications

Theoretically, this study advances one of the first empirically tested behavioral models linking Islamic environmental ethics, environmental awareness and green banking adoption, positioning environmental stewardship as an existential imperative that is independent of, and prior to, wealth maximization. Its demonstration that religiosity does not moderate the ethics-awareness link further suggests that Maqasid-based environmental reasoning is a generalizable cognitive driver rather than a function of individual piety — a distinction future theory-building on Islamic sustainable finance should account for, and one that invites further theoretical work on

what does condition the strength of this ethical translation, if not religiosity alone.

Practical Implications

Practically, the study's evidence of a customer–institution ethics gap signals to financial institutions that procedural compliance and generic sustainability messaging are no longer adequate: sustained competitiveness and legitimacy require embedding authentic ecological continuity within core capital-allocation decisions. For regulators, the findings suggest that Shariah-specific environmental standards, rather than secular ERM guidelines alone, may be needed to convert existing customer demand into institutional action. For marketing and product teams, the absence of a religiosity effect implies that green product messaging need not be tailored primarily around religiosity, but can instead foreground ecological outcomes directly.

LIMITATIONS AND FURTHER RESEARCH

There are some limitations to this study that should caution conclusions and direct future research. There were 100 purposively selected respondents, and the findings of the sample may not be generalizable to other Islamic finance markets and the statistical power was not calculated, with future studies needing to undertake a formal power analysis. This is a cross-sectional study and causation or longitudinal conclusions cannot be drawn. Reliability, validity, and preliminary diagnostic statistics for the measurement model are now reported in Section 3.5, and a bootstrapped test of the ethics-awareness-adoption pathway is reported in Section 4.3, rather than deferred to future replication; the genuine constraints that remain are the sample's size ($N = 100$) and its restriction to purposively selected customers of a single institution, which limit statistical power and this study's generalizability to other Islamic banks and finance markets. A full structural equation model (e.g., PLS-SEM) estimating the complete measurement and structural model simultaneously, rather than as separate regressions supplemented by a bootstrapped mediation test, would benefit from a larger, multi-institution sample in future replication. Similarly, common method bias was mitigated through design (anonymity, reverse-coded items) but was not tested statistically (e.g., via Harman's single-factor test), and demographic variables (age, education, tenure) were not entered as covariates despite the sample's demographic skew toward younger, highly educated respondents. Future research should increase sample size across multiple countries to test the cross-cultural validity of the conceptual model, incorporate longitudinal and qualitative designs — including institutional audits — to identify the structural barriers to deeper green stewardship within Islamic banks, and investigate what, if not religiosity, conditions the strength of the ethics-to-awareness pathway identified here.

Statements and Declarations

Funding. This research received no specific grant from any funding agency in the public, commercial, or not-for-profit sectors.

Conflict of Interest. The authors declare that they have no known competing financial interests or personal relationships that could have appeared to influence the work reported in this paper.

Ethical Approval. This study involved human participants and was conducted in accordance with relevant institutional ethical guidelines. Informed consent was obtained from all respondents via an online preamble prior to participation, and all responses were anonymized before analysis.

Data Availability. The survey data supporting the findings of this study are available from the corresponding author upon reasonable request.

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