

The NiKKAF Model for Pesantren Sustainability: Developing a Value-Based Organizational Culture Framework for Islamic Educational Institutions

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Abstract: This study aims to develop the NIKKAF Model as a value-based organizational culture framework for explaining pesantren sustainability. It employed a qualitative approach and a comparative multiple-case design at Pondok Modern Darussalam Gontor, Pondok Pesantren Lirboyo Kediri, and Pondok Pesantren Mojosari Nganjuk. Data were collected through in-depth interviews with kiai, teachers, staff, santri, alumni, and community members, supported by participant observation and institutional document analysis. The data were analyzed inductively through data reduction, within-case presentation of findings, cross-case comparison, and conclusion verification. The findings reveal three distinct cultural architectures. Gontor exhibits a modern-institutional culture, Lirboyo maintains a traditional-cultural orientation, while Mojosari develops an integrative-adaptive culture. Despite these differences, all three institutions place Islamic values at the core of institutional life. The cross-case synthesis produced the NIKKAF Model, comprising Values, Leadership, Commitment, Consistency, Cadre Development, Adaptation, and Finance. Values shape identity; leadership drives internalization; commitment and consistency maintain stability; cadre development ensures regeneration; adaptation preserves relevance; and financial self-reliance supports autonomy and operations. The model operates cyclically through idea initiation, preparation, implementation, evaluation, and continuous improvement. Theoretically, this study extends organizational culture theory by positioning cadre development and financial self-reliance as core sustainability mechanisms. Practically, it supports pesantren in preserving identity while responding to social and technological change and professionalization demands.

Keywords: organizational culture, pesantren sustainability, NIKKAF Model, value-based leadership, cadre development, adaptation.

Introduction

Pesantren constitute a distinctive form of Islamic educational institution characterized by considerable institutional longevity. Their sustainability is reflected not only in their ability to maintain educational activities but also in the continuity of their values, moral authority, residential life, alumni networks, and public trust. In the Indonesian context, pesantren function as educational organizations, moral communities, centers for the reproduction of Islamic knowledge, and, in many cases, socioeconomic actors within their surrounding communities. The complexity of these functions means that pesantren sustainability cannot be adequately explained solely through administrative indicators, student enrollment growth, or budget availability. Instead, sustainability must be understood as an institution's capacity to preserve its cultural identity while selectively renewing its structures and practices.

Contemporary developments have intensified pressures on this capacity. Pesantren face curriculum modernization, the digitalization of learning, changing family aspirations, accountability demands, competition among educational institutions, and the need to professionalize their governance. The global health crisis also demonstrated that residential educational institutions must be capable of adjusting their leadership arrangements and modes of educational delivery without losing community cohesion. Pesantren have not responded uniformly to these new circumstances; their adaptive capacity is influenced by leadership architecture, cultural strength, structural flexibility, human resources, and financial support (Buanaputra et al., 2021; Hanafi et al., 2021; Muzammil et al., 2022). Therefore, the critical question is not merely why pesantren are able to survive, but how organizational culture translates values into sustainability mechanisms that can be transmitted across generations and operationalized.

Research on organizational culture emphasizes that shared values and assumptions shape how members understand organizational goals, make decisions, and interpret change. A strong culture can foster consistency, commitment, and members' identification with the organization; however, an overly insular culture may also hinder renewal. In educational organizations, culture is embodied not only in vision statements and formal symbols but also in leadership role modeling, routines, language, rituals, student guidance practices, reward systems, and the ways in which conflicts and misconduct are addressed. Culture is understood as a pattern of basic assumptions learned by a group as it addresses the challenges of external adaptation and internal integration (Esmacili et al., 2020; Strengers et al., 2022). This perspective is particularly relevant to pesantren because the transmission of values occurs through a holistic, twenty-four-hour experience that simultaneously involves

pedagogical, spiritual, and social relationships.

Recent literature indicates that a culture supporting sustainability must move beyond temporary programs toward embedding values in governance, decision-making, everyday practices, and organizational learning. A culture of sustainability is rooted in normative assumptions rather than merely in artifacts or policies (Assoratgoon & Kantabutra, 2023; Ketprapakorn & Kantabutra, 2022). From an institutional perspective, sustainability coherence can be achieved when curricula, operations, leadership, participation, and external relations are aligned toward a common direction (Holst, 2023; Holst et al., 2024; Menon & Suresh, 2020). Furthermore, formal governance plays an important role in transforming the sustainability agenda into an integral part of organizational culture (Niedlich et al., 2020; Roos et al., 2022). Although these findings provide a strong theoretical foundation, most were developed within corporate or modern higher education settings. The pesantren context possesses distinctive characteristics because religious values, the charisma of the *kiai*, scholarly traditions, communal living, and cadre development serve as its primary sources of legitimacy.

Research on pesantren over the past five years has highlighted several important elements. Spiritual leadership mediates values, social interactions, intuition, and reflection in decision-making processes (Karim, Bakhtiar, et al., 2025; Piwovar-Sulej & Iqbal, 2024). Pesantren have also demonstrated the capacity to cultivate multicultural attitudes grounded in their own internal value frameworks (Bukhori Muslim et al., 2024; Latif & Hafid, 2021), while integrating modern knowledge with universal Islamic values to produce graduates who remain locally rooted and globally open. At the same time, the restructuring of traditional education faces challenges related to standardization, recognition, professionalization, and alignment with government policies (Kosim et al., 2023; Nurtawab & Wahyudi, 2022). These findings indicate that values and adaptation are equally important, but they do not yet explain the systemic mechanisms that connect values, leadership, commitment, regeneration, innovation, and economic resources within a unified sustainability framework.

Another theoretical gap concerns the position of cadre development. Organizational studies generally tend to treat succession as part of human resource management, whereas in pesantren, cadre development also serves as a mechanism for cultural transmission. Cadres are prepared not merely to occupy organizational positions but also to understand core values, the ethics of service, scholarly traditions, and the boundaries of adaptation. Consequently, the failure of cadre development may disrupt the continuity of values even when organizational structures and physical assets remain intact. Conversely, robust cadre development enables an organization to renew its leadership without losing its identity. A similar perspective can be found in research on professional learning communities, which emphasizes leadership support, collective learning, and the distribution of organizational capacity as prerequisites for strengthening school culture (Alsaleh, 2024; Tahir & Musah, 2020; van den Boom-Muilenburg et al., 2024).

Financial self-reliance has also not always been conceptualized as an integral part of organizational culture. Excessive dependence on external funding sources may reduce decision-making autonomy and increase institutional vulnerability. In pesantren, the management of waqf, business units, tuition fees, alumni support, and social networks is often embedded in narratives of self-reliance and service. Economic resources are not ends in themselves, but instruments for safeguarding the institutional mission, providing educational services, financing cadre development, and preserving the freedom to determine the institution's direction. Therefore, the financial dimension must be analyzed alongside values and leadership rather than treated as a separate administrative variable.

This study examines three pesantren in East Java that represent distinct organizational configurations: Pondok Modern Darussalam Gontor, Pondok Pesantren Lirboyo Kediri, and Pondok Pesantren Mojosari Nganjuk. Gontor is known for its modern institutional system and organizational discipline; Lirboyo is grounded in the *salaf* tradition, scholarly authority, and the exemplary conduct of the *kiai*; while Mojosari demonstrates the integration of tradition with a more formal and adaptive management system. Comparing these three cases enables the identification of context-specific elements as well as consistent patterns that transcend their typological differences.

On this basis, the present study aims to: first, analyze the characteristics of organizational culture in the three pesantren; second, explain the cultural mechanisms that sustain institutional continuity; third, synthesize the relationships among these elements within the NIKKAF Model; and fourth, formulate theoretical and practical implications for the management of value-based Islamic educational institutions. Accordingly, the following research questions are proposed: (1) How are the organizational culture architectures formed and sustained in the three pesantren? (2) Which elements explain sustainability across the cases? and (3) How do these elements interact within a cyclical model that can be used for institutional diagnosis and development?

Literature Review

1. Value-Based Organizational Culture

Value-based organizational culture refers to a system of meaning that places normative values as the primary reference points for behavior, leadership, policy, and evaluation. Values are not confined to ideal statements; rather, they are translated into habits, rules, role modeling, and social mechanisms. In Islamic educational institutions, values have both theological and managerial dimensions: they determine educational objectives, how authority is exercised, teacher-santri relationships, and the criteria for success. Spirituality-based educational frameworks emphasize that integrating values into educational design influences identity formation, social responsibility, and learning orientation (Chanifah et al., 2021; Ranz, 2021). Value-based education can also connect character development with sustainability competencies, provided that these values are instilled through consistent pedagogical practices and institutional environments (Brundiers et al., 2021; Huang et al., 2024; Kohl et al., 2021).

Theoretically, values must be distinguished from slogans. Values become part of an organizational culture when members share an understanding of their meaning and use them to evaluate actions. This process requires leaders who interpret, safeguard, and embody those values. Alignment between organizational culture and academic leadership practices is associated with managerial effectiveness, member engagement, and retention (Mohammadi & Salajegheh, 2023; Myllykoski-Laine et al., 2023; Tyagi, 2021). In religious organizations, this role is more intensive because leaders derive their legitimacy not only from their formal positions but also from their moral integrity, scholarly authority, and symbolic connection to tradition. Spiritual leadership in pesantren operates through reflection on values, social mediation, and reflective decision-making (Karim, Bakhtiar, et al., 2025; Karim, Fathurohman, et al., 2025), consequently, cultural authority emerges from the interaction between individual figures and institutional systems.

2. Sustainability, Consistency, and Adaptation

In this study, organizational sustainability is understood as the capacity to maintain identity, educational functions, social legitimacy, leadership regeneration, program relevance, and resource stability over time. This definition extends beyond operational continuity. An organization may continue operating while losing its values, public trust, or adaptive capacity; conversely, an organization that remains culturally sustainable can renew its structures without severing its identity. Studies of sustainability-oriented cultures indicate that long-term success depends on the relationship between normative orientation, governance systems, participatory practices, and learning capacity. Sustainability is therefore the outcome of interactions among multiple elements rather than the effect of any single variable.

Commitment and consistency connect values with action. Commitment reflects members' cognitive and moral attachment to organizational objectives, whereas consistency refers to the sustained application of values in policies, disciplinary practices, and routines. The two concepts are not identical. Commitment without consistency results in symbolic support that is never translated into action, while consistency without commitment may become mechanical compliance. In the context of digital change, members' readiness and affective commitment are influenced by an organizational culture that provides meaning and support for change (Haffar et al., 2023; Jewapatarakul & Ueasangkomsate, 2024). Sustainable change therefore requires a coherent value narrative, clear rules, opportunities for learning, and aligned role modeling.

Adaptation in a value-based organization does not imply accepting every innovation. Selective adaptation evaluates change according to its compatibility with organizational identity, educational needs, and the common good. Digitalization, for example, transforms communication structures, knowledge distribution, and working relationships; its effects are therefore not merely technical but also cultural (Grover et al., 2022). Flexible organizations can use technology to strengthen their missions while maintaining clear value boundaries. Rapid transformation requires organizations to demonstrate a high degree of elasticity so that they can adapt effectively to change (Reuschl et al., 2022). In pesantren, this elasticity is evident in their ability to modify teaching methods, expand networks, or establish formal systems without abandoning the traditions from which they derive their legitimacy.

3. Cadre Development and Financial Self-Reliance

Cadre development connects an organization across time. Through cadre development, tacit knowledge, an ethos of service, leadership skills, and institutional memory are transmitted. Systematic cadre development also reduces dependence on a single individual and creates opportunities for collective leadership. The relationship among leadership mindsets, cultural norms, human resource practices, and organizational resilience demonstrates that human development cannot be separated from culture (Zhang et al., 2023). In pesantren, student organizations, residential guidance, institutional assignments, the study of classical Islamic texts, mentoring, and

alumni engagement serve as arenas for cadre formation. These processes do not merely produce leadership successors; they also ensure that values can be reinterpreted by new generations.

The financial dimension provides the material foundation for all these mechanisms. A culture of self-reliance requires resources that are halal, productive, transparent, and directed toward the institutional mission. When resources are managed autonomously, pesantren have greater scope to preserve their educational orientation and develop innovations according to internal priorities. However, self-reliance must not diminish accountability. Financial sustainability must be linked to asset governance, income diversification, transparency, the financing of cadre development, and the protection of access to education. In this way, financial resources function as a safeguard for values rather than becoming the central value themselves.

Based on this synthesis, the preliminary research framework conceptualized pesantren sustainability as a multilayered relationship. Values constitute the core; leadership activates those values; commitment and consistency stabilize practices; cadre development reproduces culture; adaptation connects the institution with its environment; and financial resources sustain operational capacity and autonomy. This preliminary framework was used as an analytical orientation, while the final categories were developed inductively from the cross-case data.

Method

This study employed a qualitative approach with a comparative case study, or multiple-case study, design. A qualitative orientation was selected because the study sought to understand the meanings, practices, mechanisms, and organizational cultural contexts that sustain pesantren, rather than statistically testing relationships among variables. The case study approach allowed each pesantren to be understood as a bounded entity shaped by its history, structure, values, leadership, and institutional practices, while the comparative design enabled the researcher to systematically examine similarities and differences in patterns across cases (Creswell & Poth, 2017; Supriani, 2025).

The cases comprised Pondok Modern Darussalam Gontor in Ponorogo, Pondok Pesantren Lirboyo in Kediri, and Pondok Pesantren Mojosari in Nganjuk. The three sites were selected purposively because all had demonstrated long-term institutional sustainability while exhibiting distinct configurations of organizational culture. Gontor represents a modern-systemic configuration characterized by the institutionalization of values, collective leadership, discipline, and an established organizational system. Lirboyo represents a traditional-cultural configuration grounded in scholarly lineages (sanad), moral authority, adab, and the exemplary conduct of the *kiai*. Mojosari represents an integrative-adaptive configuration that combines pesantren traditions with the development of formal structures and governance systems.

The selection of these cases followed the logic of theoretical replication rather than statistical representation. Under this logic, contrasting cases were used to assess whether the proposed sustainability mechanisms appeared only within a particular pesantren typology or recurred in different forms across multiple typologies. The study's generalization was therefore directed toward concepts, patterns, and mechanisms of organizational culture rather than statistical estimates concerning the entire pesantren population (Merriam & Tisdell, 2015; Yin, 2017).

The unit of analysis was organizational culture in relation to institutional sustainability. The analytical boundaries encompassed how values were formulated and transmitted, leadership patterns, the development of commitment, consistency between values and organizational systems, cadre development processes, responses to change, and the support provided by financial resources. The study was not intended to rank the pesantren but to explain how different organizational characteristics could generate value-based sustainability mechanisms.

Preliminary fieldwork and research authorization procedures were conducted in March 2025, while the primary data collection took place from June through December 2025. This period enabled the researcher to observe educational activities, student guidance, religious practices, administrative processes, decision-making, organizational activities, and the relationships between the pesantren and their surrounding communities. Several months of field engagement also enabled the researcher to compare participants' statements with practices that occurred repeatedly.

Participants were selected through purposive sampling based on their knowledge, experience, and direct involvement in the organizational life of the pesantren. This strategy was employed to obtain information from individuals capable of explaining the culture from diverse organizational positions, rather than to create a statistically representative sample. Participant selection proceeded iteratively and could be adjusted during the study when the preliminary analysis indicated a need to examine particular roles, events, or mechanisms in greater depth (Ravitch & Carl, 2020).

The participant groups comprised: (1) *kiai* or pesantren leaders as sources of information concerning values, legitimacy, institutional direction, and strategic decisions; (2) teachers or *ustaz* as those responsible for delivering education and transmitting values; (3) administrative staff and unit managers as implementers of organizational systems; (4) *santri* as those directly experiencing education, residential guidance, discipline, and cadre development; (5) alumni as custodians of institutional memory and observers of cultural continuity over time; and (6) members of surrounding communities as sources of external perspectives on social relationships and

institutional sustainability. This composition enabled the collection of perspectives from centers of authority, system implementers, those experiencing the educational process, historical networks, and the broader social environment.

The principal eligibility criteria required participants to have direct experience, relevant knowledge, or meaningful involvement with the pesantren under study; be able to articulate their experiences and perspectives; and be willing to participate voluntarily. Variation among participants was maintained according to their roles and proximity to organizational processes to prevent the data from being dominated by a single group or institutional narrative.

The number of participants was not determined mechanically at the outset. Data adequacy was assessed according to the representation of role groups, the richness of the information obtained, and the ability of the data to explain the mechanisms operating within each case. Recruitment ceased when the principal roles had been represented and additional interviews no longer extended the substantive explanation. These considerations of data adequacy were applied transparently rather than treated as a universal numerical target or the sole indicator of quality in reflexive thematic analysis (Braun & Clarke, 2021; Hennink & Kaiser, 2022).

Before data collection, each participant received information about the study's objectives, the nature of their involvement, data use, confidentiality, and their right to withdraw from the study. Consent was provided voluntarily. Personal names were anonymized in the transcripts and reports, while organizational positions and relevant contextual information were retained insofar as they did not lead to unnecessary identification.

Data were collected using three principal methods: semi-structured in-depth interviews, passive participant observation, and document analysis. The use of multiple methods was intended to capture organizational culture as expressed meanings, enacted practices, and formalized systems. All data collection activities were guided by the research questions and unit of analysis while remaining open to themes and events that emerged during fieldwork.

The in-depth interviews followed a semi-structured format. The interview guide covered key themes concerning the core values of the pesantren, the processes of value socialization and internalization, leadership patterns, decision-making, forms of commitment, rule enforcement, policy consistency, cadre development, responses to technology and social change, funding sources, and indicators of institutional sustainability. Follow-up questions were used to elicit concrete examples, explore significant events, and clarify discrepancies between formal policies and actual experiences. The semi-structured format maintained consistency across interview sessions while allowing participants to use local terminology, describe their experiences, and raise issues they considered important (Adeoye-Olatunde & Olenik, 2021).

The interviews were recorded with the participants' consent and subsequently transcribed for analysis. After each session, the researcher prepared contextual notes concerning the interview situation, the participant's organizational position, issues requiring clarification, and possible connections with other data. These notes helped maintain the connection between participants' accounts and the social and organizational contexts in which the data were generated.

Passive participant observation was conducted by positioning the researcher as an observer present within the pesantren environment without assuming organizational roles or influencing organizational decisions. The observations covered learning activities, residential guidance, religious practices, meetings, task allocation, interactions among community members, the use of organizational symbols and language, rule enforcement, the condition of facilities, and relationships between the pesantren and their stakeholders. Field notes were organized into two sections: factual descriptions of the situations observed and preliminary analytical reflections on patterns, tensions, or questions requiring further examination.

Document analysis included institutional histories, organizational structures, regulations, curricula, activity schedules, program reports, institutional data, official publications, photographs, and other documents explaining institutional values and governance. The documents were treated not merely as factual sources but also as cultural artifacts. Language choices, emphasized values, positions vested with authority, reporting formats, and resource allocation patterns were examined to understand how the pesantren formalized their identities and priorities.

Triangulation was performed by comparing information across participants, methods, and cases. Statements concerning discipline, for example, were examined against the experiences of santri, teachers' explanations, schedules, regulations, and observed practices. Statements concerning cadre development were examined through the backgrounds of administrators, assignment structures, alumni experiences, and mentoring mechanisms. These comparisons were used to deepen the interpretation, identify discrepancies, and reduce dependence on a single dominant narrative (Creswell & Poth, 2017).

All data were stored systematically using case codes and source categories. Access to transcripts, field notes, and internal documents was restricted to research purposes. During fieldwork, the researcher respected pesantren norms of conduct, communication hierarchies, places of worship, educational activities, and regulations governing the use of institutional documents.

Data were analyzed inductively, iteratively, and at multiple levels through within-case and cross-case analyses. The analytical process began concurrently with data collection so that preliminary findings could guide

the selection of follow-up interviews, additional observations, and documents requiring further examination. The NIKKAF framework was not imposed directly as an *a priori* coding scheme; instead, codes and themes were first developed from the data to ensure that the resulting model remained grounded in field experiences and practices.

The first stage involved data familiarization through repeated readings of interview transcripts, field notes, and documents. During this stage, the researcher identified preliminary ideas, significant events, local terms, recurring patterns, and contradictions. The second stage involved the initial coding of units of meaning related to values, leadership, attachment, rules, regeneration, change, resources, and manifestations of sustainability. Coding was conducted openly and remained subject to revision when new data expanded or challenged the preliminary interpretation (Miles et al., 2020; Saldaña, 2021).

The third stage involved developing categories and themes within each case. Conceptually related codes were grouped into themes, mechanisms, conditions, and consequences. The themes were reviewed against the entire dataset to ensure that they were adequately supported by evidence, had clear conceptual boundaries, and did not merely reproduce the interview questions. This stage followed the principles of reflexive thematic analysis, which positions the researcher as an active interpreter who constructs meaning through critical engagement with the data (Braun & Clarke, 2021; Byrne, 2022).

The fourth stage involved cross-case analysis using a comparative matrix. Each case was compared in terms of the forms of value legitimacy, leadership patterns, the ways in which commitment was developed, mechanisms for maintaining consistency, cadre development processes, patterns of adaptation, financial support, and organizational risks. The matrix was used to identify similarities, differences, process sequences, conditions influencing particular mechanisms, and variations that performed similar functions. This analysis produced the modern-systemic, traditional-cultural, and integrative-adaptive cultural configurations without eliminating the distinctive characteristics of each pesantren.

The fifth stage involved formulating and verifying the NIKKAF Model. Cross-case themes were repeatedly examined using the following questions: Was each element supported by more than one type of source? Were the relationships among the elements evident in all three cases? Were there any negative cases or contradictory evidence? Could the model explain variations without homogenizing the institutions? The relationships among Values, Leadership, Commitment, Consistency, Cadre Development, Adaptation, and Finance were subsequently formulated as a systemic mechanism supporting pesantren sustainability.

Operationally, the analytical process combined data condensation, data display, and conclusion drawing and verification (Miles et al., 2020). Analytical memos were used to document changes in categories, the rationale for merging or separating themes, cross-case relationships, and the basis for interpretations. These records also explicitly distinguished among participants' statements, observational findings, documentary information, and the researcher's inferences.

The trustworthiness of the findings was maintained through four strategies. Credibility was strengthened through source and method triangulation, sufficient field engagement, examination of negative evidence, and peer debriefing. Dependability was maintained through an audit trail containing the interview guide, data collection logs, code lists, case matrices, analytical memos, and records of changes in analytical decisions. Confirmability was supported by traceable evidence and reflection on the influence of the researcher's position and assumptions. Transferability was facilitated through sufficient contextual description, enabling readers to assess the applicability of the findings to other pesantren or Islamic educational institutions.

Reflexivity was maintained throughout the study through a reflective journal and periodic reviews of how the researcher's background, proximity, expectations, and positionality could influence the questions, interactions, evidence selection, and interpretations. Peer debriefing was used to examine the soundness of the arguments and explore alternative interpretations rather than merely seeking agreement on codes. This practice was essential because the quality of qualitative research depends on researchers' transparency in explaining their reasoning processes and the influence of their subjectivity (Olmos-Vega et al., 2023).

Results and Discussion

1. Organizational Culture Architectures across Three Pesantren

The cross-case analysis shows that the three pesantren have distinct cultural architectures but share the same institutional logic: Islamic values are placed at the core, translated into leadership and educational practices, and subsequently sustained through social and structural mechanisms. The differences lie not in the presence or absence of values, but in how those values are institutionalized. Gontor emphasizes systems, Lirboyo emphasizes tradition and scholarly authority, while Mojosari emphasizes the integration of tradition with managerial adaptation.

Pondok Modern Darussalam Gontor exhibits a modern-institutional culture. The values of sincerity, simplicity, self-reliance, Islamic brotherhood, and freedom are not merely communicated as teachings but are embedded in education, residential guidance, student organizations, time discipline, institutional assignments, and

governance. Leadership tends to be system- and institution-based. Although individual leaders remain important, institutional sustainability is not designed to depend on a single figure. Organizational structures, rules, daily routines, and cadre development form an ecosystem that enables values to be consistently reproduced. Gontor's principal strength lies in institutionalization: values are supported by formal channels, behavioral indicators, and numerous settings in which they can be habituated.

This system also supports the expansion of institutional networks and leadership continuity. Cadres are cultivated from the time they become santri through organizational participation, institutional assignments, guidance, leadership practice, and alumni engagement. Cadre development is not separated from character education; managerial competence is assessed alongside commitment to institutional values. The waqf system and business units reinforce the ethos of self-reliance and provide a material foundation for institutional development. In the case of Gontor, the relationship among values, organizational systems, cadre development, and financial self-reliance is most explicit. A potential risk of this model is excessive formalization when rules are implemented without meaningful internalization. Role modeling and reflection therefore remain necessary to preserve the meaning underlying institutional discipline.

Table 1. Comparative Matrix of Organizational Culture Architectures in Pesantren

Aspect	Gontor	Lirboyo Kediri	Mojosari Nganjuk
Cultural architecture	Modern-institutional	Traditional-cultural	Integrative-adaptive
Core values	Sincerity, simplicity, self-reliance, Islamic brotherhood, and freedom	Adab, Islamic scholarship, scholarly lineage (sanad), simplicity, and respect for teachers	Pesantren values, adaptability, and professionalism
Leadership	System- and institution-based	Role modeling and the scholarly authority of the kiai	Collaboration between the kiai and organizational structures
Value internalization	Curriculum, residential guidance, student organizations, discipline, and institutional assignments	Study of classical Islamic texts, teacher-santri relationships, role modeling, and habituation of tradition	Character education, division of roles, and formal governance
Key strength / Main risk	Institutionalization and planned cadre development / Formalization without meaningful internalization	Scholarly legitimacy and preservation of tradition / Dependence on tacit knowledge and individual leaders	Flexibility without compromising institutional identity / Potentially blurred boundaries of adaptation

Pondok Pesantren Lirboyo exhibits a traditional-cultural orientation. Its cultural core rests on adab, Islamic scholarship, simplicity, scholarly lineage (sanad), respect for teachers, and the preservation of the traditional salaf heritage of pesantren. Values are transmitted primarily through the exemplary conduct of the kiai, the study of classical Islamic texts (kitab kuning), teacher-santri relationships, the habituation of a simple lifestyle, and close community ties. The scholarly authority and charisma of the kiai serve as powerful sources of legitimacy. Unlike Gontor, which emphasizes documentation and organizational structures, Lirboyo derives its strength from the continuity of practices, collective memory, and scholarly networks.

Lirboyo's culture demonstrates that tradition is not antithetical to sustainability. Tradition becomes a resource for adaptation when members understand which principles must be preserved and which elements may be renewed. The maxim of preserving the legacy of earlier scholars while adopting beneficial new practices illustrates this form of selective adaptation. Cadre development occurs through scholarly depth, service, close relationships with teachers, and involvement in institutional management. Public trust is built upon scholarly reputation, consistency in practicing adab, and alumni relationships. The principal challenge lies in transforming tacit knowledge into systems that can be understood by new generations without diminishing the moral authority and flexibility of tradition.

Pondok Pesantren Mojosari exhibits an integrative-adaptive culture. Pesantren values remain its foundation, while institutional management combines the authority of the kiai with a formal organizational system. Character education, governance, the division of responsibilities, and methodological renewal proceed in parallel. Its defining characteristic is flexibility: change is accepted insofar as it strengthens education and does not undermine institutional identity. Relationships with surrounding communities, public trust, and the ability to understand local needs constitute important institutional resources.

At Mojosari, sustainability does not rest on a system as formalized as Gontor's or a tradition as firmly established as Lirboyo's, but on the ability to bridge the two. Leadership is collaborative, involving both the kiai

and the institutional management structure. Adaptation to technology, educational needs, and managerial demands is undertaken gradually. This model demonstrates that pesantren can pursue professionalization without separating management from institutional values. Its principal risk lies in potentially blurred boundaries of change. Therefore, value consistency and evaluation mechanisms are required to prevent flexibility from devolving into pragmatism.

2. Development of the NiKKAF Model

The comparison of the three cases yielded seven recurring elements that explain institutional sustainability: Values, Leadership, Commitment, Consistency, Cadre Development, Adaptation, and Finance. The acronym NiKKAF is derived from the Indonesian terms for these elements. Conceptually, the model comprises seven elements; operationally, however, it is organized into six dimensions because Commitment and Consistency are treated as a single domain of cultural control. Their conceptual distinction is retained to clarify their respective functions.

Values constitute the deepest layer and starting point of the model. They provide institutional identity, moral boundaries, educational orientation, and criteria for legitimacy. Although the three cases articulate their values differently, these values perform the same function: connecting Islamic teachings with the organizational way of life. Values become operative when translated into curricula, residential guidance, social relationships, rules, symbols, and decisions. This finding reinforces the proposition that a culture of sustainability requires a normative foundation that permeates organizational practices rather than merely being expressed through programs (Assoratgoon & Kantabutra, 2023). In pesantren, this normative foundation is particularly strong because values are closely connected to worship, adab, and service.

Table 2. Dimensions, Functions, and Institutional Indicators of the NiKKAF Model

NIKKAF Dimension	Sustainability Function	Institutional Indicators
Values	Provides institutional identity, moral direction, and decision-making criteria	Values are documented and understood; integrated into curricula, residential guidance, regulations, and evaluation
Leadership	Interprets, exemplifies, and mobilizes values	Long-term vision; role modeling; value-based decisions; division of responsibilities; leadership development
Commitment and Consistency	Strengthens collective commitment and maintains continuity of practice	Alignment between words and actions; standard operating procedures; discipline; monitoring; corrective actions; fairness in reward systems
Cadre Development	Renews leadership and reproduces organizational culture	Identification of potential candidates; institutional assignments; mentoring; scholarly development; transparent selection and placement
Adaptation	Maintains relevance without compromising institutional identity	Assessment of change; curriculum innovation; technology adoption; partnerships; evaluation of benefits and alignment with institutional values
Finance	Supports operations, innovation, and policy autonomy	Income diversification; waqf and business units; transparency; reserve funds

Leadership is the driving force that connects values to organizational systems. Kiai and institutional leaders interpret values, exemplify them, establish priorities, resolve tensions, and determine the boundaries of adaptation. However, the cross-case model indicates that sustainable leadership must move away from dependence on individual figures toward stronger institutional capacity. Gontor demonstrates systemically robust leadership, Lirboyo highlights the strength of exemplary conduct and scholarly authority, while Mojosaari demonstrates collaboration between individual leadership and organizational structures. Accordingly, the NiKKAF Model does not privilege any single leadership style; instead, it assesses leaders' capacity to preserve values, build systems, develop people, and foster organizational learning.

Commitment binds collective awareness, while consistency safeguards the continuity of practice. Commitment is manifested in a willingness to serve, loyalty to the institutional mission, and a shared orientation. Consistency is evident in rule enforcement, educational routines, discipline, and decisions aligned with institutional values. Together, values, leadership, and the combined domain of commitment and consistency create cultural stability. When change occurs, stability does not imply resistance to change; rather, it provides a point of

reference against which change can be evaluated. Within the framework of organizational change, a culture that provides direction can increase members' readiness and commitment to transformation (Haffar et al., 2023).

Cadre development is a mechanism for reproducing both culture and leadership. The NIKKAF Model conceptualizes cadre development more broadly than positional succession. It encompasses the identification of potential candidates, character education, the deepening of scholarly knowledge, institutional assignments, organizational experience, mentoring, evaluation, and placement. This process connects inherited values with future needs. Cadres who possess skills but lack an understanding of institutional values may alter the institution's identity. Conversely, cadres who are committed but lack managerial capacity may hinder institutional development. Sustainability therefore requires the integration of competence and character.

Adaptation is the capacity to respond to environmental changes without losing the institution's core identity. The three cases demonstrate different forms of adaptation: Gontor through the renewal of its systems and networks; Lirboyo through the acceptance of beneficial new developments; and Mojosari through the integration of management and tradition. Adaptation encompasses technology, teaching methods, curricula, communication, partnerships, and governance. These findings align with the view that digitalization transforms culture and requires new cultural resources (Grover et al., 2022). Within the NIKKAF Model, values function as a filter, while leadership and cadre development provide the capacity to implement adaptation.

The financial dimension provides structural support for maintaining operations and institutional autonomy. The cross-case findings highlight the importance of resource diversification, waqf, business units, alumni contributions, asset management, and transparency. Financial self-reliance enables pesantren to finance education, cadre development, teacher welfare, facility maintenance, and innovation. However, finance occupies a supporting layer rather than the core of the model. If financial priorities override institutional values, the organization risks experiencing mission drift; if financial considerations are neglected, its values and programs will lack a stable operational foundation. This balanced relationship distinguishes self-reliance from commercialization.

3. Challenges to Sustainability and Differentiated Responses

The field findings identify five categories of challenges that test the integration of the NIKKAF elements. The first challenge is educational modernization. Pesantren must respond to national curriculum requirements, emerging competency needs, certification standards, and parental expectations without compromising the depth of religious education. Modernization becomes a cultural problem when change is viewed merely as the addition of subjects or facilities. Within the NIKKAF Model, modernization must begin with an assessment of values and objectives: Which competencies are required? Which practices can be modified? Which elements must be preserved? Gontor responds through an integrated education system; Lirboyo preserves the core of salaf scholarship while creating space for beneficial new developments; and Mojosari develops an integrative format suited to the needs of its surrounding community.

The second challenge is technological development. Technology accelerates access to knowledge, administrative processes, communication with parents and guardians, institutional promotion, and alumni networking. However, it also introduces the risks of distraction, unequal levels of digital literacy, data security concerns, and changing patterns of knowledge authority. Digitalization is not culturally neutral because it transforms how organizational members interact and distribute information (Grover et al., 2022). Pesantren therefore require clear technology policies, teacher capacity development, safeguards for santri, and systematic assessments of benefits. Digital adaptation should be considered successful when it strengthens educational objectives, rather than merely increasing the number of devices or applications.

The third challenge is the globalization of values and the changing aspirations of younger generations. Through digital media and social mobility, santri encounter diverse perspectives, lifestyles, and identities. This condition may create a gap between the inherited language of values and the lived experiences of younger generations. Responses based solely on prohibition may produce superficial compliance; conversely, openness without a clear framework may weaken institutional identity. The NIKKAF Model therefore requires dialogical internalization: the rationale and relevance of values must be clearly explained, leaders must exemplify those values, young cadres must be given opportunities to ask questions and assume responsibility, and tradition must be presented as a source of ethical guidance for navigating the contemporary world.

Table 3. Sustainability Challenges and Responses Based on the NIKKAF Model

Challenge	Institutional Risk	NIKKAF-Based Response
Educational modernization	Curriculum fragmentation or the weakening of educational identity	Begin with institutional values and objectives; integrate new competencies into the pesantren education system
Technology	Distraction, literacy gaps, data security risks, and changing social	Digital policies; teacher training; protection of santri; systematic assessment

	relationships	of benefits
Globalization of values	Superficial compliance, intergenerational conflict, or loss of direction	Dialogical internalization; role modeling; opportunities for young cadres to assume responsibility
Professionalization	Bureaucratization or tension between individual leaders and organizational structures	Distribution of authority; standard operating procedures; documentation; competency development grounded in amanah
Economic self-reliance	Funding dependency, commercialization, or weak accountability	Diversification of halal income sources; governance of waqf and institutional assets; transparency; focus on the educational mission

The fourth challenge is the professionalization of management. Growth in student enrollment, the increasing complexity of educational units, asset management, and accountability requirements necessitate a clear division of labor, documentation, standard operating procedures, information systems, and competency development. Professionalization may create tension if it is perceived as diminishing the authority of the *kiai* or replacing familial relationships. Findings from the three cases demonstrate that formal structures can coexist with moral authority when organizational functions and the boundaries of authority are clearly defined. Value-based professionalization does not shift the center of legitimacy; rather, it ensures that entrusted responsibilities are managed systematically, transparently, and sustainably.

The fifth challenge is economic self-reliance. Educational costs, teacher welfare, dormitory maintenance, facility development, and support for economically disadvantaged *santri* require stable resources. At the same time, pressure to generate revenue may encourage commercialization or shift institutional priorities. The NIKKAF Model positions Finance as a supporting dimension that must remain subordinate to institutional values. Business units, waqf, alumni contributions, and partnerships must be managed through careful planning, separation of functions, systematic reporting, and evaluation of their impact on the educational mission. This principle ensures that economic growth expands institutional benefits rather than creating new centers of vested interest.

These five challenges are interconnected. Technology requires funding and competencies; professionalization requires cadres; modernization requires leadership capable of articulating institutional direction; and the globalization of values requires internalization and consistency. Partial responses therefore often produce short-term improvements while shifting problems to other dimensions. The NIKKAF Model encourages institutions to examine cross-dimensional impacts before implementing policies. For example, the establishment of a business unit should be assessed not only in terms of profitability but also in relation to cadre requirements, oversight systems, alignment with institutional values, reputational risks, and contributions to education.

Across the three cases, the priorities for institutional strengthening differ. Gontor must continue to preserve the depth of meaning underlying its strong systems and institutional expansion. Lirboyo needs to document its institutional knowledge and expand its managerial capacity without weakening its traditions. Mojosari needs to clarify the boundaries of adaptation and strengthen its standards to ensure that flexibility remains consistent with institutional values. These differentiated priorities demonstrate the diagnostic function of the NIKKAF Model: it does not assign a single score that disregards context but helps institutions identify the dimensions most in need of strengthening.

4. NIKKAF Implementation Cycle

The relationships among the elements of NIKKAF are systemic. Values provide direction; leadership internalizes and mobilizes them; commitment and consistency ensure stability; cadre development sustains continuity; adaptation enables renewal; and financial resources provide support. These relationships do not follow a one-time linear sequence; rather, they operate cyclically. Each generation encounters a new environment, requiring values to be reinterpreted, future cadres to be prepared, and the system to be continuously evaluated. Therefore, sustainability is understood as an ongoing process of reproduction and renewal.

The first stage is the introduction of ideas. At this stage, the *pesantren* emphasizes that sustainability requires a cultural system rather than merely relying on the strength of tradition or individual figures. A long-term vision, core values, environmental challenges, and institutional needs are jointly formulated. The second stage is preparation. At this stage, values are documented and integrated into the curriculum and residential culture; leadership roles are clarified; regulations and standard operating procedures are aligned; cadre development pathways are designed; adaptation needs are mapped; and strategies for securing economic resources are developed.

Table 4. Stages of the NIKKAF Implementation Cycle

Cycle Stage	Managerial Focus	Key Output
Idea Proposal	Formulating values, a vision for sustainability, key challenges, and objectives for change	A shared understanding of the need for a value-based cultural system
Preparation	Designing the institutionalization of values, leadership, regulations, succession development, adaptation, and financial sustainability	Readiness of organizational structures, human resources, programs, and funding
Implementation	Putting the six dimensions into practice in education and day-to-day governance	An integrated NIKKAF sustainability system
Evaluation	Assessing implementation, value alignment, effectiveness, and long-term impact	A diagnosis of the level of sustainability and priorities for improvement
Improvement	Conducting reflection, documenting good practices, refining programs, and promoting organizational learning	A new cycle that is stronger, more relevant, and more accountable

The third stage is implementation. Values are operationalized through habituation, character education, teacher training, and the assessment of students' development. Value-based leadership is strengthened through role modelling, the distribution of responsibilities, and consistent decision-making. Commitment and consistency are demonstrated through integrity, standard operating procedures (SOPs), quality control, recognition, and corrective measures. Cadre development is carried out through identification, training, mentoring, selection, and placement. Adaptation is pursued through curriculum development, technology, learning innovation, and partnerships. Financial sustainability is promoted through the management of business units, productive waqf, the diversification of halal income sources, and accountability.

The fourth stage is evaluation. Evaluation is holistic, value-based, participatory, continuous, and contextual. The assessment examines not only whether programmes have been implemented, but also whether their implementation remains aligned with the institution's values and contributes to the development of long-term capacity. The indicators include the depth of value internalization, leadership quality, meaningful compliance, the effectiveness of cadre development, the relevance of innovation, and financial stability. Deliberative forums involving institutional leaders, administrators, teachers, and student representatives serve as spaces for organizational reflection.

The fifth stage is continuous improvement. Evaluation results are used to reinforce values, improve policies, refine cadre development, enhance adaptive capacity, and reorganize resources. Good practices are documented to ensure that they are not lost when personnel changes occur. These improvements subsequently inform the ideas and preparations for the next cycle. This mechanism transforms the pesantren into a learning organization—one that preserves its institutional memory while continuously renewing its capacity.

5. Theoretical Contributions and Positioning of the Model

The NIKKAF Model makes three theoretical contributions. First, it extends organizational culture theory by demonstrating that, within Islamic educational institutions, values perform a constitutive function rather than merely representing one dimension of culture. Values determine institutional identity, the legitimacy of leadership, the direction of adaptation, and the meaning attributed to resources. Second, the model incorporates cadre development as a core cultural mechanism. This perspective emphasizes that the sustainability of a value-based organization depends on the reproduction of people and meaning, rather than solely on organizational structures. Third, the model incorporates financial self-reliance as a foundation for value autonomy. Ideological and educational sustainability requires a material base that is managed in alignment with the institution's mission.

A further contribution lies in the integration of stability and change. The organizational culture literature frequently discusses consistency as an internal strength and adaptation as a response to external conditions. NiKKAF demonstrates that values and leadership bring these two elements together. Consistency ensures that adaptation does not lose its direction, whereas adaptation prevents consistency from turning into rigidity. This relationship is consistent with research on cultural norms and organizational resilience, which indicates that leaders' mindsets and human development practices influence an organization's capacity to endure (Zhang et al., 2023). In the pesantren context, however, resilience is further strengthened by distinctive forms of moral authority, tradition, and learning community.

From the perspective of educational sustainability, the model supports a whole-institution approach (Holst, 2023). It emphasizes the need for coherence among learning, operations, leadership, and participation. NiKKAF

translates this principle into the pesantren context by incorporating teacher-student relationships, cadre development, scholarly traditions, waqf, and business units. Formal governance can promote a culture of sustainability, while the findings from the Lirboyo case demonstrate that culture may also rest on strong informal mechanisms (Roos et al., 2022). Formalization, therefore, is not the only pathway. What matters most is the coherence between the values an institution claims to uphold and the practices experienced by its members.

The model also explains why a single management format cannot be uniformly applied to all pesantren. Gontor, Lirboyo, and Mojosari achieve sustainability through different configurations. Gontor demonstrates strength in institutionalization, Lirboyo in cultural transmission, and Mojosari in adaptive integration. The NIKKAF Model does not impose homogenization; instead, it provides a set of shared dimensions for assessing whether a particular local configuration is sufficiently robust. Thus, the model is substantive and context-sensitive, while retaining an analytical structure that can be tested in other value-based educational institutions.

6. Mechanisms and Conceptual Propositions of the NIKKAF Model

Further analysis indicates that the NIKKAF Model operates through five mechanisms. The first mechanism is internalization, namely the transformation of values from normative formulations into behavioural orientations. Internalization occurs through role modelling, language, repetition, experience, and social correction. The second mechanism is stabilization, which refers to the establishment of order through commitment, rules, discipline, and consistency in decision-making. The third mechanism is reproduction, namely the transmission of values, knowledge, and authority through cadre development. The fourth mechanism is renewal, which involves the selective assessment and adoption of change. The fifth mechanism is institutional support, namely the provision of financial and organizational resources that enable all the other mechanisms to function. These five mechanisms explain why the strength of an organizational culture cannot be assessed solely on the basis of the intensity of its rituals or the popularity of its leading figures.

Internalization without stabilization results in values that are understood but not consistently implemented. Stability without reproduction may enable an organization to remain strong during a particular period, but leaves it vulnerable when generational succession occurs. Reproduction without renewal produces loyal cadres who are nevertheless unprepared to face new environments. Renewal without values may generate rapid change but lead to the loss of institutional identity. All these mechanisms also require adequate resource support. Cadre-development programmes, teacher development, technology, dormitory maintenance, and curriculum innovation cannot be sustained without sufficient funding. Consequently, the failure of one dimension may reduce the effectiveness of the entire system, even when the other dimensions appear strong.

The cross-case findings also reveal the principle of equifinality, according to which multiple cultural configurations can produce organizational sustainability. Gontor achieves stability through strong institutionalization; Lirboyo through scholarly authority and cultural transmission; and Mojosari through its capacity to integrate tradition with formal governance. No single configuration is universally superior. The determining factor is the alignment among dimensions. In pesantren that depend heavily on individual figures, cadre development and documentation need to be strengthened. In highly systematized pesantren, the internalization of values and the practice of reflection must be maintained. In adaptive pesantren, normative boundaries and policy consistency must be clearly established. The NIKKAF Model is therefore configurational rather than a single structural prescription.

Based on these patterns, a number of conceptual propositions are formulated. These propositions are not substitutes for empirical findings; rather, they constitute statements of relationships that can be tested in future studies. Each proposition connects particular dimensions with sustainability outcomes while recognizing the interdependence among dimensions. The model predicts that strong values do not automatically result in sustainability when leadership, cadre development, adaptation, or resources are inadequate. Conversely, managerial and financial excellence is insufficient when an organization loses the sources of its identity and moral legitimacy.

Table 5. Conceptual Propositions Derived from the NIKKAF Model

Code	Conceptual Proposition	Testing Implications
P1	The stronger the internalization of values, the stronger the institutional identity and public trust, provided that these values are reinforced through role modeling and consistent practice.	Examine the relationships among values, behavioral consistency, members' organizational identification, and public trust.
P2	Values-based leadership enhances institutional resilience when it develops robust systems and collective capacity rather than dependence on individual figures.	Compare the effects of role modeling, role distribution, documentation, and succession planning.
P3	Commitment and consistency mediate the relationship between organizational values and institutional stability.	Examine the gaps among formally stated values, member commitment, meaningful adherence, and program

		continuity.
P4	Cadre development mediates the relationship between organizational culture and intergenerational continuity.	Assess the quality of leadership development pathways, succession readiness, value retention, and the competencies of emerging leaders.
P5	Adaptation has a positive effect when it is guided by organizational values and supported by the organization's learning capacity.	Assess the appropriateness of innovations, digital readiness, reflective practices, and the preservation of organizational identity.
P6	Financial independence strengthens institutional autonomy and innovation when resources are managed transparently and aligned with the organization's mission.	Examine income diversification, accountability, reserve funds, and mission-aligned resource allocation.
P7	Synergy across multiple dimensions produces greater sustainability than strength in any single dimension considered separately.	Apply configurational analysis or interaction models to a sample drawn from multiple pesantren.

The leadership proposition positions leaders as mechanisms of translation rather than as the sole source of organizational culture. Effective leaders translate values into priorities, symbols, rules, and learning processes while simultaneously creating structures that enable the culture to endure beyond their tenure. This distinguishes productive charismatic leadership from personal dependence on a particular leader. Leadership becomes sustainable when moral influence generates collective capacity and develops a new generation of leaders. This finding is consistent with evidence that leadership, cultural norms, and human resource development practices are interconnected in building organizational resilience (Zhang et al., 2023).

The adaptation proposition emphasizes the role of values as a filtering mechanism. Organizations that focus exclusively on stability may respond too slowly to change, whereas those that focus solely on innovation may lose coherence. Selective adaptation requires pesantren institutions to distinguish between their core principles and the ways in which those principles are expressed. The principles of sincerity, adab, scholarship, and service are preserved as the core, while technology, methods, structures, and partnerships may be updated. Through this distinction, change is understood not as a threat to tradition, but as a new means of achieving the same fundamental objectives.

The financial proposition explains that resource autonomy strengthens an institution's ability to preserve its values and determine its priorities. However, this relationship is not invariably positive. Unaccountable business units, poorly directed asset expansion, or dependence on particular funding sources may create new risks. Therefore, financial independence within the NIKKAF Model encompasses resource adequacy, diversification, transparency, productivity, and alignment with the institutional mission. Economic decisions must be assessed in terms of their effects on access to education, the quality of student care, teacher well-being, leadership development and succession, and public trust.

Overall, the synergy proposition states that the highest level of sustainability emerges when the six operational dimensions reinforce one another. Synergy does not mean that all dimensions must take the same form in every pesantren. Rather, each dimension must reach a sufficient threshold and maintain coherent relationships with the others. This model provides a basis for developing a diagnostic index or rubric; however, any measurement framework must remain sensitive to the context, history, and typology of each pesantren.

7. Implications For Educational Management

In practical terms, pesantren administrators may use the NIKKAF Model as a diagnostic instrument. The first step is to map the institution's core values and identify evidence of their implementation. Values that appear only in institutional documents need to be reinforced through the curriculum, role modeling, routines, and decision-making processes. The second step is to assess whether the leadership has established effective systems, distributed responsibilities, and prepared successors. The third step is to examine the gap between verbal commitments and consistency in practice. The fourth step is to evaluate the leadership-development pathway, from the identification of potential candidates to their eventual placement. The fifth step is to determine whether innovations genuinely address institutional needs while remaining grounded in core values. The sixth step is to assess financial health, diversification, transparency, and mission orientation in financial management.

For policymakers, support for pesantren should not be limited to infrastructure assistance or administrative standardization. Institutional-strengthening programs should include value-based leadership development, documentation of cultural practices, succession and leadership-development systems, digital literacy, the management of waqf and business units, and institutional accountability. Policies should also respect the diversity of pesantren typologies. Standardization that disregards institutional history and local authority may weaken organizational culture. Conversely, recognition without capacity-building may allow structural vulnerabilities to persist. A partnership-based approach should position pesantren as active agents that interpret and respond to

change, rather than merely as recipients of government or institutional programs.

Table 6. NIKKAF-Based Diagnostic Guidelines and Priority Actions

Decision Area	Diagnostic Question	Priority Actions
Values and Identity	Do members of the pesantren community understand the significance of its values and recognize evidence of their consistent implementation?	Clarification of values; integration into the curriculum; reflective forums; leadership role-modeling
Leadership	Are decisions, role allocation, and leadership succession guided by a long-term vision?	Leadership development; delegation of responsibilities; documentation of decisions
Leadership Development and Succession	Do prospective leaders receive adequate experience, mentoring, and evaluation?	Talent mapping; leadership development pathways; progressively assigned responsibilities; competency and character evaluation
Adaptation	Do innovations address emerging needs while remaining consistent with the institution's core values?	Needs assessment; pilot testing; impact evaluation; strengthening digital literacy
Financial Management	Is the institution's financing sufficiently stable, transparent, diversified, and mission-oriented?	Strengthening business and waqf units; accounting systems; internal audits; reserve funds
Organizational Learning	Do evaluations lead to meaningful change and generate properly documented knowledge?	Regular consultative meetings; a database of best practices; follow-up actions and progress indicators

For other Islamic educational institutions, the NIKKAF Model offers an approach to integrating institutional identity with professionalization. Strengthening organizational structures does not necessarily entail the secularization of values; documentation does not have to replace exemplary conduct; technology does not have to eliminate human relationships; and enterprise development does not have to displace the educational mission. The key lies in placing values at the center of decision-making and employing cyclical evaluation to ensure continued alignment.

8. NiKKAF-Based Institutional Maturity Evaluation

For evaluation purposes, the six operational dimensions of NiKKAF can be interpreted as levels of institutional maturity. The initial level is characterized by values that remain largely declarative, highly personalized leadership, inconsistent regulations, incidental cadre development, reactive adaptation, and unstable sources of funding. The developing level becomes evident when an institution begins to document its values, distribute roles and responsibilities, establish cadre development programs, experiment with innovations, and improve its financial reporting systems.

The integrated level is achieved when values, leadership, organizational systems, cadre development, adaptation, and financial capacity are interconnected within institutional planning and evaluation. The sustainable level is characterized by the organization's ability to engage in continuous learning, navigate leadership transitions, respond effectively to crises, and maintain public trust without losing its identity.

Institutional maturity should not be assessed solely on the basis of leaders' perceptions. Evidence should be collected from documents, actual practices, and the experiences of teachers, students, alumni, and members of the surrounding community. Each dimension can be assessed across three layers: the existence of relevant policies, the consistency of their implementation, and their long-term impact.

For example, cadre development should not be evaluated merely on the basis of whether a training program exists. The evaluation should also examine whether participants receive practical assignments, mentoring, feedback, leadership opportunities, and placements appropriate to their competencies. Similarly, financial self-reliance should not be assessed solely in terms of the amount of revenue generated, but also in relation to financial stability, diversification, transparency, risk management, and contributions to the educational mission.

The annual evaluation may be integrated into the pesantren's institutional work-planning meeting. The results of the NIKKAF assessment can be used to select two or three strategic priorities and to determine the relevant indicators, responsible personnel, required resources, and review schedules. A gradual approach is more realistic than attempting to improve all dimensions simultaneously.

Nevertheless, cross-dimensional effects must still be examined. Technological development, for instance, should be accompanied by training, ethical policies, adequate funding, and the preparation of competent personnel

to manage the technology. Through this mechanism, the NIKKAF Model functions not merely as an academic concept, but also as an organizational learning instrument that can be adapted to the size and typology of different pesantren.

9. Limitations and Future Research

This study has several limitations. First, it focuses on three pesantren in East Java with long institutional histories and strong legitimacy. Consequently, the configuration of NiKKAF may differ in newly established pesantren, women's pesantren, small-scale pesantren, or pesantren located outside Java.

Second, although the qualitative approach provides an in-depth understanding of the underlying mechanisms, it does not measure the strength of the relationships among the dimensions. Third, the financial analysis focuses on the cultural and institutional functions of financial resources rather than on an audit of financial performance. Fourth, organizational change was observed only within a specific research period; therefore, the dynamics of succession and long-term adaptation require longitudinal investigation.

Future research could develop a NiKKAF measurement instrument, test its construct validity across a broader population of pesantren, and examine the relationship between the model and public trust, educational quality, teacher retention, crisis resilience, and social performance. Cross-national comparative studies could also assess whether cadre development and financial capacity perform similar functions in other faith-based boarding schools. In addition, action research could examine the NIKKAF cycle as an organizational development intervention implemented over several years.

Conclusion

The sustainability of pesantren results from the integration of cultural foundations and institutional capacity. The three cases demonstrate distinct pathways: Gontor through modern institutionalization, Lirboyo through traditional-cultural transmission, and Mojosari through adaptive integration. Despite these differences, all three converge on a common principle: Islamic values serve as the core foundation guiding leadership, education, social relationships, and organizational decision-making.

The NiKKAF Model synthesizes seven elements—Values, Leadership, Commitment, Consistency, Cadre Development, Adaptation, and Financial Capacity—into six interdependent operational dimensions. Values provide direction; leadership mobilizes the organization; commitment and consistency ensure stability; cadre development ensures continuity; adaptation facilitates renewal; and financial capacity provides institutional support.

The model operates through a cycle of idea formulation, preparation, implementation, evaluation, and continuous improvement. Sustainability, therefore, is not a static condition, but rather an organization's capacity to reproduce its identity while continuously learning to respond to change.

The findings confirm that the professionalization of pesantren does not necessarily diminish their traditional or spiritual character. Professionalization becomes productive when organizational structures, technology, and resources are positioned in the service of institutional values. The NIKKAF Model can therefore be employed as a framework for the analysis, diagnosis, and development of Islamic educational institutions seeking to endure across generations while remaining relevant, self-reliant, and firmly rooted in their identity.

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