



Urban Pressure and Cultural Resilience: A Conservation Study of Kampung Kauman Semarang, Indonesia

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ABSTRACT

This study investigates the sustainability of residential space in Kampung Kauman by examining both physical dimensions, including spatial structure, building facade, architectural style, and material character, and non-physical dimensions encompassing social, economic, and religio-traditional values that shape community life. Employing a qualitative-rationalistic methodology grounded in empirical field observation, structured interviews, and place theory, the research identifies that the sustainability of Kampung Kauman rests on a dialectical relationship between development and preservation, mediated by deeply embedded community values of togetherness (kebersamaan), economic empowerment, and Islamic tradition. The discussion reveals that the kampung's unique grid spatial structure, narrow alleyways (lorong), and distinctive gap spaces (lengkong) constitute irreplaceable physical assets, while intangible heritage: ritual practices, social solidarity, and religious identity, form the invisible architecture sustaining the settlement's life.

INTRODUCTION

The urban face of Indonesian cities, particularly historic cities, has undergone rapid transformation since independence: in population, physical settlement, and supporting infrastructure. City growth is inextricably linked with the unfolding of time; historical forces shaped urban morphology in the past (Tallo et al., 2014), while colonial legacies continue to influence the spatial duality visible today between elite governance and commercial cores on one side and peripheral settlements on the other.

Semarang, a city of 475 years with a strategically unique topography of highlands and coastal lowlands, has evolved as a major port city. During Dutch colonial rule under the *wijkenstelsel* system, the city was structured into ethnic kampungs: Pecinan (Chinatown), Kauman (Islamic quarter), Melayu (Malay quarter), Batik, and Kulitan districts, each bearing distinct spatial identities. Interaction between these communities has created a rich multicultural heritage that is part of Indonesia's national cultural wealth.

Kampung Kauman holds a uniquely important position in this landscape. Established during the reign of Ki Ageng Pandan Arang, the first Regent of Semarang installed by the Sultan of Mataram in 1547, the kampung developed in concert with Masjid Besar Kauman and the Kanjengan regency palace around the old Semarang alun-alun. Its name derives from multiple etymological interpretations: *nggone wong kaum* (the place of the religious community), *pakauman* (dwelling of the kaum), *kaum sing aman* (the secure community), or *qo'um muddin* (Islamic religious leaders). All converge on a single meaning: the dwelling place of Islamic scholars.

Today, Kampung Kauman faces acute pressures from commercial exploitation, unregulated street vending, and building alterations that erode the settlement's physical and cultural character. The kampung's distinctive grid spatial structure, narrow alleyways (*lorong*), and gap spaces (*lengkong*) are under threat, while the ritual cultural event of *Dugder*, unique to Semarang, has been displaced from the kampung to a new location. These dynamics raise fundamental questions about how a living historic settlement can remain sustainable in the face of rapid urban change.

This study aims to: (1) examine the sustainability of residential space in Kampung Kauman through its physical and non-physical character dimensions; and (2) provide research criteria for Kampung Kauman as an ethnic heritage area in support of Semarang's designation as a World Heritage City. The study employs place theory (Trancik, 1986; Schulz, 1984) and architectural conservation frameworks (Sudikno, 2017; Permen PUPR No.19/2021) to analyze the kampung's spatial continuity and formulate preservation strategies.

LITERATUR REVIEW

Architectural Conservation and Cultural Significance

Conservation is understood not merely as static preservation but as a dynamic process of protecting, sustaining, developing, and managing the architectural and cultural values embedded in historic environments (Permen PUPR No.19/2021). According to Sudikno (2017), cultural significance encompasses: historical value (physical evidence of the past), social value (community meaning), architectural value (stylistic character and technical innovation), rarity value, and aesthetic value (contribution to district identity and imageability).

Catanese & Snyder (1979) identify five criteria for conservation buildings: aesthetic distinctiveness, typicality, rarity, historical role, and superlative character. In urban scale, Pamungkas (1998) adds architectural, historical, symbolic, and contextual criteria. These frameworks collectively inform the evaluation of Kampung Kauman's heritage potential.

Conservation strategies under UU No.11/2010 include maintenance, protective restoration, rehabilitation, and adaptive reuse, each calibrated to preserve authenticity of form, spatial organization, style, materials, and technology. Crucially, revitalization is distinguished from mere physical repair: it re-integrates historic fabric into active urban life as a living monument rather than a dead artifact (Shirvani, 1985).

Place Theory and Residential Space

Trancik (1986) conceptualizes place theory as the intersection of people, culture, history, and natural environment. Space (space) acquires the quality of place (place) when it is imbued with contextual meaning from the cultural values of its inhabitants. As Schulz (1984) elaborates through the concept of *genius loci*, every place has a unique phenomenal character constituted by material substance, form, color, texture, and invisible cultural values.

Rapoport (1977) contends that spatial organization is essentially culturally determined: rules governing how people interact with and organize space and time reflect the socio-cultural complexity of communities, with religion and economic activity as primary generators of urban settlement patterns. Harry Launce Garnham (1980) identifies three components of place character: (a) physical features and appearance, the actual physical structure including buildings, landscape, and aesthetic quality; (b) activities and functions, how community members interact with and appropriate place; and (c) meaning and symbol, the deeper, often invisible layer of cultural significance attached to public space through human experience. Kevin Lynch's concept of imageability, as interpreted through Gestalt psychology, underlines that environmental quality is perceived holistically, through color, shape, motion, and sensory stimuli, making visual consistency and spatial coherence essential to the formation and maintenance of place identity.

METHODOLOGY

This study adopts a qualitative-rationalistic research design (Muhadjir, 1996; Creswell, 2010). The rationalistic approach constructs the analytical framework from existing grand theory, expert insight, and identified research gaps, while the qualitative approach ensures that findings remain grounded in the empirical reality of the study site. The researcher serves as the key instrument.

The research process comprised seven stages: (1) problem formulation through field observation in Kampung Kauman; (2) literature review to establish a theoretical framework; (3) identification of physical and non-physical research parameters; (4) primary data collection through field measurement, photography, and sketching; (5) secondary data collection through interviews with community leaders and residents; (6) analytical interpretation and conceptualization; and (7) conclusion through triangulation of data sources including archival documents, field observations, and interviews.

Physical parameters examined include: spatial structure of the area, building facade character, architectural style and periodization, and material, texture, and color composition. Non-physical parameters cover: social-cultural activity patterns, community organizational structures, and religio-traditional value systems that have shaped spatial formation.

The study site is delimited to Kampung Kauman Semarang, a high-density urban settlement bounded to the north by the old alun-alun, to the east by Jl. Kabupaten, to the south by Jl. K.H. Wahid Hasyim (Kawasan Kranggan), and to the west by Jl. Kauman. The area encompasses the Masjid Besar Kauman complex and its surrounding residential fabric.

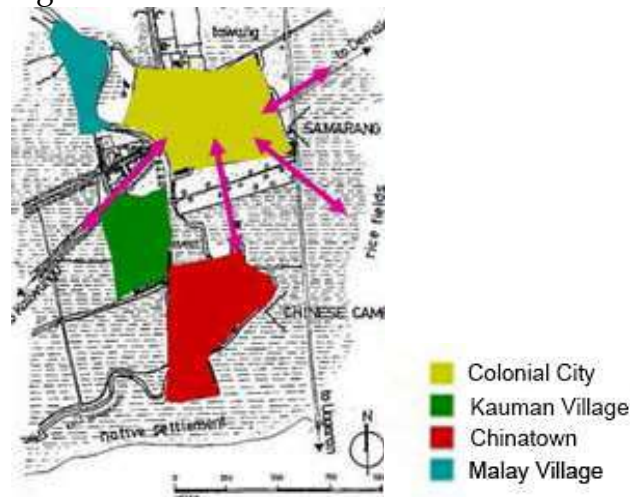


Figure 1. A Map of Research Object Areas in Kampung Kauman
(Source: Wijayanti, 2019)

RESEARCH RESULTH DISCUSSION

Historical Formation and Urban Development of Kampung Kauman

Semarang's earliest urban nucleus coalesced around the late 15th century when Ki Ageng Pandan Arang established a settlement with a small harbor at Bergota. Following his death, Ki Ageng Pandan Arang II relocated the center northward. In 1547, Sultan Mataram appointed the first Regent, who built his istana (palace) at Bubakan, facing north with an alun-alun and mosque at the western side. This proto-urban pattern, istana, alun-alun, mosque, pasar, mirrors the standard Javanese city model and gave birth to Kampung Kauman as the residential zone of Islamic scholars and mosque administrators.

By the mid-18th century, Semarang had crystallized into four distinct administrative nodes: Loji/Kota Lama (Dutch fortress city), Kauman (Islamic regency center), Pecinan (Chinese commercial district), and Kampung Melayu (Malay quarter). The Kali Semarang river served as the vital artery connecting these nodes commercially, while VOC's wijkensstelsel formalized their ethnic separation. This four-part structure, still partially legible in the contemporary city fabric, constitutes Semarang's foundational urban heritage.

The Kampung Kauman sub-districts: Bangunharjo, Patehan, Kepatihan, Butulan, Pompo, Krendo, Kemplongan, Pungkuran, and others, bear names that encode the settlement's functional history: Patehan (tea production), Getekan (raft use during floods), Pompo (fire-fighting water pump location), Krendo (coffin storage), and Kemplongan (batik wax-removal workers). This toponymic heritage represents a living documentary record of the kampung's economic and social life across centuries.

Physical Character and Spatial Structure

The dominant physical characteristic of Kampung Kauman is its orthogonal grid spatial structure, a pattern of perpendicular alleyways (lorong) dividing the settlement into compact residential blocks. Within this grid, the distinctive lengkong (gap spaces between houses) were originally created at regular intervals for security and utility in the dense urban fabric. Today, langgar (small prayer rooms) are discoverable within these lorong, embedded between the rows of varied residential buildings.

The kampung's important structures constitute an integrated civic-religious-commercial ensemble (See Figure 2): (1) The Kauman Great Mosque, completed in 1749, rebuilt after the 1885 lightning strike and restored in 1904, serving as the spiritual center of the Islamic community and the site of the Ramadan announcement ceremony ending the Dugder festival; (2) Kanjengan (The Resident of The Regent), the former regent's palace complex with a wide *pendapa* and flanking wings, now converted into a modern shopping center, a loss of irreplaceable civic heritage; (3) The old Alun-Alun (Square) of Semarang, recently restored as a public square with Friday-Sunday culinary markets; (4) Johar Market, Thomas Karsten's 1939 masterpiece with its innovative mushroom-column structure solving ventilation and lighting challenges; and (5) Pedamaran Market, the historic damar (wax) market connecting Pecinan to the commercial core.



Figure 2. A Map of Kampung's Important Structures

Source: Sudarwani, 2024

The architectural character of residential buildings reflects multiple historical periods from the Ki Ageng Pandanaran era through the colonial period, producing a diverse typology: Javanese vernacular houses, Indies colonial villas, and post-independence Jengki-style houses (asymmetric roofline) coexist in the same alleyways. A documented example is the 1920-built house at Jl. Kauman Mustaram No. 54, renovated in 1995, which retains its original street facade while accommodating a mixed-use commercial function. This authentic heterogeneity constitutes a significant architectural asset.

Physical parameter assessment reveals that the grid spatial structure and the facades of surviving period buildings constitute the essential physical character that must be conserved. In alignment with UNESCO's Historic Urban Landscape (HUL) framework, the management challenge is not to freeze the kampung in time but to develop a Management of Change protocol—ensuring that future urban pressures are responded to in ways that respect and reinforce existing spatial and architectural characteristics.

Non-Physical Character: Value-Based Space

The sustainability of Kampung Kauman cannot be fully understood through its physical fabric alone. Three interlocking value systems generate and regenerate the non-physical character of the kampung's residential space:

- a. Communal Space Values (Nilai Ruang Bersama). The kampung is organized around a deeply held principle of shared space and reciprocal relationships. During communal religious gatherings (pengajian), residential interiors are opened to the community, spatial boundaries between private and semi-public dissolve in service of social solidarity. This communal ethos generates spatial behaviors: accessible thresholds, open facades, active street life, that give the kampung its distinctive urban vitality. The communal space is characterized by accessibility, catalytic function for neighborhood relations, psychological safety, social learning, and communicative richness.

- b. Economic Space Values (Nilai Ruang Ekonomi). The kampung's proximity to Pasar Johar and Pasar Pedamaran has historically anchored an entrepreneurial economy. Residents have adapted houses to mixed-use functions, ground floors repurposed as commercial spaces, through a process of spatial negotiation that prioritizes economic empowerment (keberdayaan) without abandoning residential identity. This adaptive reuse, revitalization driven by internal community agency, demonstrates a capacity for organic modernization that coexists with tradition.
- c. Religio-Traditional Space Values (Nilai Ruang Tradisi dan Keagamaan). Islamic religious practice is not a discrete activity in Kampung Kauman but the animating spirit of its entire spatial and social organization. Weekly pengajian (Thursday evening Quranic study) cycles through household spaces; male gatherings convene at the masjid while women's circles rotate through residential spaces regardless of house size. Mosques: Masjid Assajidin, Masjid Al Iman, and the Masjid Besar, function as spatial anchors around which daily and ceremonial life is organized. The belief that the masjid is a sacred space that must be preserved in situ and cannot be relocated is a powerful conservative force against destructive spatial transformation.

Sustainability Mechanisms and Threats

The findings reveal that Kampung Kauman's residential space sustainability operates through a dual mechanism: physical development and preservation on one hand, and value-based spatial regeneration on the other. These two tracks are not in tension but are mutually constitutive: the physical fabric provides the container for community life, while community values provide the meaning that justifies preservation of the container.

This dynamic corresponds to what Setiawan (2000) identified as the 'last fortress' function of urban kampungs in Indonesian cities facing crisis: their resilience derives not from economic power or formal planning but from neighborhood cohesion rooted in shared spatial experience. Kampung Kauman's neighborhood relations extend beyond internal solidarity to encompass exchange relationships with the surrounding commercial zone, a form of anti-segregationist spatial connectivity that counters the urban fragmentation common to modern Indonesian cities.

However, three structural threats jeopardize this sustainability: (1) Individualization of space: commercial pressures are transforming communal orientations toward individualistic and functional spatial relationships, eroding the shared-space ethos. (2) Weakening of tradition and identity: modernization processes aligned with functional values rather than tradition are severing residents' cultural continuity with their spatial heritage. (3) Exploitative spatial dynamics: economic pressures have generated extractive relationships with kampung space, particularly through informal vending occupation of pedestrian corridors and public space, undermining both the spatial order and the community's quality of life.

The conversion of the Kanjengan complex to a modern shopping center stands as the most severe case of heritage loss. This structure was not merely a building but the civic identity of Kampung Kauman, the symbolic integration of religious authority (Masjid Besar), political authority (kanjengan), and community assembly (alun-alun) that defined the Javanese urban ideal. Its destruction severed the spatial trinity that gave Kampung Kauman its coherence as a place. Restoration of the Kanjengan to its civic function is therefore not a matter of aesthetic preference but of existential cultural significance for the kampung's sustained identity.

The displacement of the Dugder festival, Semarang's unique pre-Ramadan celebration, from the kampung to the new Masjid Agung Semarang (built 2007) represents a parallel non-physical loss. Ritual is the social enactment of collective memory in space; its relocation constitutes a form of intangible heritage displacement that weakens the affective bond between the community and its historic spatial territory.

From the perspective of conservation theory, Kampung Kauman demonstrates that the Indonesian conservation challenge differs fundamentally from European models. In Semarang, as throughout Indonesian cities, social values are stronger than physical systems (Cohen, 1999). Successful conservation here cannot prioritize the physical over the social: it must simultaneously maintain the built fabric, preserve the spirit (*genius loci*) of the community, and support the economic empowerment (*keberdayaan*) that enables residents to remain as active agents in their own heritage. Revitalization that produces dead monuments fails; the objective is life monuments, spaces that continue to function as meaningful, inhabited, productive places.



Figure 3. Shop houses in Kampung Kauman

The concept of 'local genius and genius loci' (Schulz, 1984) is thus not a static heritage inventory but a dynamic principle of spatial reproduction. The three capital requirements for effective community-led conservation: spatial consciousness, organizational social trust, and economic resilience, must be actively cultivated through government policy that goes beyond regulation to encompass genuine community empowerment.

Kampung Kauman's exceptional historical depth, spanning Hindu, early Islamic, Sino-Islamic, Dutch colonial, independence, and contemporary eras, satisfies multiple UNESCO World Heritage criteria: Outstanding Universal Value through its multicultural urban landscape; authenticity through surviving architectural fabric and living cultural practice; and integrity through its still-legible spatial structure. The Semarang city government's investment in preservation is therefore not only a cultural obligation but a strategic commitment to positioning Semarang competitively within the global heritage tourism economy.

CONCLUSION AND RECOMENDATIONS

This study demonstrates that the sustainability of residential space in Kampung Kauman Semarang is governed by the interplay of two co-dependent forces: the development and preservation of physical space, and the reproduction of community values that generate meaning, solidarity, and adaptive resilience. Four principal conclusions emerge:

- a. The kampung's physical sustainability rests on its distinctive orthogonal grid structure, the network of lorong and lengkong, and the diverse architectural typology spanning multiple historical periods. These elements constitute irreplaceable spatial assets whose transformation must be governed by a UNESCO-aligned Historic Urban Landscape (HUL) management framework that actively manages change rather than resisting it. Any future development planning must be anchored in respect for these spatial uniquenesses.
- b. The kampung's non-physical sustainability is sustained by three deeply embedded value systems: communal space values, economic empowerment values, and religio-traditional values, that function as an invisible architecture binding residents to their spatial heritage. Conservation policy must explicitly recognize and protect these intangible dimensions alongside physical fabric.
- c. The destruction of the Kanjengan complex and the displacement of the Dugder festival represent critical losses of both tangible and intangible heritage. The restoration of the Kanjengan to its original civic function, as a spatial counterpart to the Masjid Besar and alun-alun, is a priority recommendation for restoring the kampung's spatial coherence and strengthening its sustainability.
- d. Semarang's multi-era historical trajectory, from Hindu, Islamic, Sino-Islamic, Dutch colonial, through independence to the present, uniquely qualifies it for nomination as a UNESCO World Heritage City. The Semarang city government should increase its heritage conservation budget, strengthen community-based governance of the kampung, and formally advance the World Heritage nomination process, with Kampung Kauman as a central element of the Outstanding Universal Value argument.

Effective conservation of Kampung Kauman demands a paradigm shift: from physical-object preservation toward socially inclusive, value-based conservation that treats the community as the primary heritage asset. Government policy must move beyond regulatory compliance to active community empowerment, cultivating the spatial consciousness, organizational solidarity, and economic resilience that enable Kampung Kauman's residents to remain the living guardians of their own irreplaceable heritage.

ADVANCED RESEARCH

Further research is still being conducted to gain a deeper understanding of "Urban Pressure and Cultural Resilience: A Conservation Study of Kampung Kauman, Semarang, Indonesia".

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