

Patterns of Contextual Adaptation: Interiority as a Design Framework for Café Spaces

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Abstract

This paper investigates interiority as an extension framework within adaptive multiplied pattern-based architectural design methodologies. While traditional pattern-based typological approaches are often regarded as repetitive applications of similar designs, a deeper understanding of interiority enables the reconceptualization of interior elements as adaptive pattern systems that respond to specific contextual needs, particularly in fast-moving commercial spaces. To explore this, the study employs a qualitative approach, analyzing six representative coffee shop designs in Indonesia, with a focus on Ejji Coffee shops. These case studies were selected due to their rapid proliferation and diverse spatial adaptations, offering valuable insights into the role of interiority in commercial architecture. The research methodology integrates parallel exploded drawing, visual cataloguing, and spatial element identification to delineate the interrelation between patterns, interiority, and thematic composition. Through four key elements with two-dimensional planes (thematic), three-dimensional furniture (objects), interior-exterior terrace composition (extension), and materiality (modules) with the study examines how interiority contributes to adaptive reuse and spatial efficiency. The findings reveal that thematic pattern-based interiority enhances flexibility, efficiency, sustainability, and aesthetic coherence, positioning interiority not merely as a spatial consideration for rapid commercial space design but as an integral design mechanism within the evolving landscape of commercial and retail architectural design.

Keywords: Interiority as Type-Based Design; Adaptive Reuse Architecture; Multiplied Design Strategy; Pattern-Based Spatial Framework; Contextual Modular Adaptation

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Introduction

Interiority as Adaptive Reuse Method

This paper aims to reflect on the concept of interiority as more than just the condition of interior spaces, but rather as an idea about adaptive spatial systems related to contextual commercial design strategies (Atmodiwirjo, 2018; Harani et al., 2021). Interiority, as a field of knowledge, is inseparable from its potential for continuous development in line with the evolution of urban society and its culture (Atmodiwirjo & Yatmo, 2021). On the other hand, interiority serves as a potential conceptual framework that enables spatial adaptability, allowing design interventions to accommodate evolving commercial functions and user needs. This perspective aligns with studies on makeshift spatial strategies (Harani et al., 2023), where urban interiors evolve through tactical adjustments to immediate environmental and economic conditions. The dynamic nature of cities inherently brings about the emergence of new building typologies and the evolution of existing design typologies. Interiority provides a framework for adaptability, enabling spatial

configurations to evolve through modular strategies that support contextual flexibility within commercial architecture. In this study, interiority is examined as a design methodology rather than just a spatial condition, demonstrating how adaptive reuse and modular design strategies enhance commercial architecture.

Coffee shops, as a rapidly evolving building typology, present valuable opportunities for studying design systematics. Many are not built from vacant lots but adapt existing structures, particularly shophouses, which serve as flexible bases for diverse spatial functions. Adaptive reuse extends the lifecycle of these structures, transforming them into functional spaces that meet contemporary demands (Lanz & Pendlebury, 2022; Li et al., 2021; Sosa et al., 2022) the adaptive reuse of built heritage buildings is becoming increasingly popular; as commentators have noted, this popularity can in part be attributed to the economic, cultural, and social benefits they provide to urban communities. In considering adaptive reuse, urban developers and planners seek to reach an equilibrium in the battle between time and space. Both academically and practically, the adaptive reuse of heritage buildings requires compatible, appropriate, and scientific means for assessing built heritage assets; however, currently, research in this area is still relatively meagre. To address this gap, this paper investigates research frameworks, methodologies, and assessment methods that concern the adaptive reuse of architectural heritage. In this paper, we examine the current literature on the paradigms for applying mixed methodologies: the multi-criteria decision model (MCDM). In commercial architecture, this strategy enables shophouses to evolve into varied typologies, accommodating urban economic shifts and changing consumer behavior. Beyond food and beverage consumption, coffee shops now function as dynamic spaces for work, discussions, and business meetings (Barkah et al., 2021). Key considerations in their selection include the ability to create an engaging visual experience (Barokah et al., 2020). Rather than adhering to rigid interior-exterior classifications, interiority operates as a fluid system, dissolving spatial boundaries and reinforcing adaptive design principles (Pimlott, 2018).

Coffee shops have evolved from being merely functional spaces to representations of profound design thinking (Putra & Silantara, 2024). Many coffee shops are designed with temporality in mind. Temporality in interior design facilitates adaptive reuse, allowing spatial modifications to align with evolving commercial functions. Temporality is believed to be one of the approaches to achieving spatial flexibility and sustainability (Rizqy & Safeyah, 2021). Temporary spaces in coffee shops can enhance the adaptability of spaces in line with their original buildings (Aguspriyanti, 2022). The integration of adaptive reuse principles within interiority enables spaces to remain flexible, ensuring continuity between past architectural forms and evolving functional needs. This approach maximizes sustainability by repurposing existing structures rather than relying solely on new construction. One emerging trend is the interior design based on Japanese style (Dinata et al., 2024; Limentie & Ismanto, 2022; Septiani & Marizar, 2021). This trend emphasizes that, in reality, there are numerous specific design approaches and strategies within a coffee shop.

Coffee shops, as an evolving spatial typology, showcase modular adaptation in response to the shifting preferences of contemporary urban society. Interior architecture plays a crucial role in this evolution, shaped by economic conditions, user demands, and prevailing trends (Till, 2009). Rapidly changing architecture, particularly designs with short lifespans, requires distinct strategies to remain functional and relevant. For coffee shop chains with multiple branches, the challenge lies in adapting to diverse land and building contexts. As third spaces, coffee shops foster strong connections with users (Widyaningsih et al., 2021), offering adaptive and flexible environments suited to varying spatial conditions. This makes interiority a compelling subject for expanding design methodologies. Ejji Coffee shops were selected as case studies due to their ability to integrate

into existing urban structures, providing insight into the intersection of modularity and adaptive reuse. Figure 1 illustrates six Ejji Coffee branches, each situated in different locations with unique contextual adaptations. Despite their variations, all operate within a regular shophouse base space is a common typology in Indonesia. The number assigned to each branch denotes its sequential position among Ejji Kopi's approximately 35 existing locations.



EJJI KUTA (21)



EJJI TANGERANG (27)



EJJI SANUR (31)



EJJI CIBITUNG (32)



EJJI NORTHWEST (33)



EJJI METLAND (36)

Figure 1: Six Ejji Coffeeshop Design as Case Study (Source: Author's Document, 2025)

From Pattern to Contextual Adaptive Response

Pattern-based design approaches are not merely about replication, but rather their ability to adapt to specific contexts. Deconstructing precedents and reducing them to design principles is a requisite in applying pattern-based design frameworks (Plowright, 2014). Patterns or precedents often become identifiers within design (Redyantanu, 2021). Building upon the adaptability of interior spaces, pattern-based approaches offer a mechanism for scalable design interventions. By

incorporating contextual flexibility, these frameworks allow commercial interiors to shift dynamically while maintaining modular consistency. Pattern-based frameworks function as adaptive tools, evolving in response to diverse urban and commercial contexts rather than serving as rigid typologies. Patterns form types in design (Pevsner, 2023) and these types subsequently define a program closely tied to particular design characteristics. However, the diversity of contexts in design necessitates that patterns must be adaptive and flexible to various possibilities of duplication, including several duplication scenarios.

Types represent an effort to view architecture as a system. Identifying types also means streamlining the design process. Types are characterized by specificity in function, character, and style. Additionally, types may also depend on cultural and historical contexts (Forty, 2000). In the context of modern architecture, types emerge as a relevance to industrial technological advancements in construction and building design (Jenks & others, 1999). This is further refined by Plowright (2014) as a strategy in realizing architecture. Pattern-based typological approaches often employ precedents as a means of identifying key design elements. Contextual adaptation is the creativity of architects in redefining the types to be implemented.

With the current technological advancements and trends, types are expected not only to be imitated. Types should respond to various design disruptions, including the issue of rapidly changing architecture previously mentioned. Systems within types can become quite complex when understood as the entirety of the design process. Through adaptive reuse, pattern-based design frameworks extend beyond static replication, instead offering modular solutions that retain architectural integrity while enabling transformations suited to contemporary spatial programs. The presence of intermodal and collaborative systems, from modular-based design supporting the realization of certain types (Wallance, 2021), highlights this complexity. Modular architecture is a key term for achieving effectiveness and efficiency (Arisya & Suryantini, 2021), without neglecting its potential to expand in various design contexts.

Multiplied interiority extends beyond simple replication, serving as an adaptable spatial framework that responds dynamically to diverse urban conditions through modular flexibility and contextual transformation. This study refines the concept to focus on adaptive spatial systems that prioritize modular transformation rather than parametric formalism. In commercial architecture, particularly coffee shops, spatial strategies must accommodate replication across multiple locations while adapting to different site conditions. This approach ensures consistency in identity while allowing spatial flexibility. Interiority itself is not confined to the indoor spaces we understand as interior today (Pimlott, 2018). Beyond mere interior and exterior boundaries, interiority can be understood as a deeper dimension (McCarthy, 2005). Interiority can be the reading of a condition, which then has a relation to its potential to be interpreted as a design strategy (Atmodiwirjo & Yatmo, 2020). It is not just an effort to decorate the interior but designing the indoor space involves complexity equivalent to designing complete architecture.

Multiplied interiority enables adaptive and flexible indoor systems, redefining architecture as variable rather than static (Abudayyeh, 2021; Paramita, 2022; Stanek & Kaminer, 2007). Spaces operate contextually rather than homogeneously (Allen, 2012; Mullarkey, 1995) with modular prefabrication serving as a circular economic strategy (Silva, 2020). Reusability and duplication address commercial design challenges, integrating internal rules, logic, and systems (Eisenman, 1999; Rahim, 2010). Eiji Coffee shops illustrate adaptive multiplication through patterns, fragments, and spatial elements. This study reframes multiplied interiority as a method for adaptive spatial transformation, where modular systems support scalable configurations rather than static iterations. By combining modular adaptation and adaptive reuse, commercial interiors sustain typological identity while evolving to meet spatial demands.

Method

This study is a qualitative case study, representing its ideas. Qualitative studies are used to uncover deeper interpretative meanings (Creswell, 2018; Groat & Wang, 2013). The use of case studies is to illustrate reality and serve as a basis for translating various important abstract design ideas (Lucas, 2016). Interiority is a system of interior space design; thus, uncovering its elements becomes crucial, especially to identify the system working within it. The idea of types and modularity is certainly not new but seeing them work in various specific contexts has the potential to reveal the expansion of spatial design approaches. According to Brand (1995), buildings consist of various layered components, from the exterior to the interior. This idea is supported by uncovering interiority based on part-to-whole elements, where both are closely related (Rahim, 2010). This deconstruction design study uses element identification to reveal the design system, working in a multiplied manner across several designs simultaneously.

Design often occurs automatically due to its intensive repetition. However, reflecting on the design process that has occurred can uncover knowledge through the process of reflection in design action (Schön, 1988). In an effort to reveal a contextual type-based design approach, each element from approximately eight Ejji Coffee shops was deconstructed to trace its construction and configuration. Redrawing elements in parallel and separately supports this exploration (Lucas, 2019). Fragments and elements are essential to decompose because of their potential to be reassembled in various future contexts (Vidler, 1987). This statement asserts that the implementation of modules and interior elements is not merely for mass production purposes. More importantly, the effort of multiplication reveals adaptive and flexible strategies that are more explorative. Figure 2 presents parallel drawing data, duplicating both the designed and existing conditions as part of the analytical and design deconstruction process.

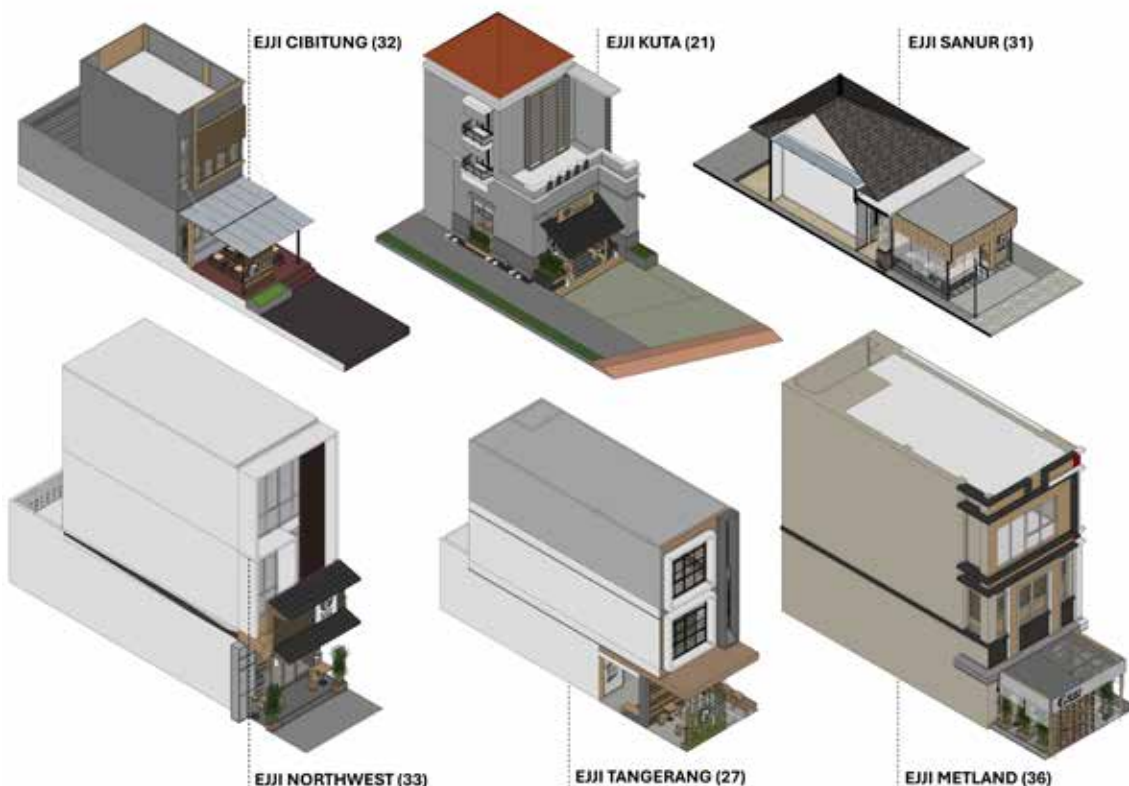


Figure 2: Parallel Drawing as Exploration Method

(Source: Author's Document, 2025)

The analysis was conducted by modeling digitally the entire study object, followed by tracing and layering each element with similar characteristics, which were then presented in a parallel format (Lucas, 2019). This stage focuses on cataloging objects within the existing interior system (Karimah & Atmodiwirjo, 2021), ultimately identifying spatial construction typologies and the adaptive reuse strategies employed. Based on the traced model system, layering, and catalog identification, the spatial system is interpreted and discussed towards the conclusion of this study. The intended interpretation is to establish a new understanding of how temporary iterations (Harani et al., 2023) within the prevalent shophouse typology, widely utilized for commercial purposes, can be read as an efficient and sustainable system. Figure 3 illustrates the analytical framework, employing layering and cataloging based on three-dimensional modeling.



Figure 3: Layering and Cataloging as Exploration Method

(Source: Author's Document, 2024)

Results and Discussion

Based on the findings, Ejji Coffee predominantly operates within the format of shop-house buildings. Shop-houses are a hallmark of mass architectural development in Indonesia. Interiority, as a strategy, emerges as an interior space-based design effort because the context of the exterior or the building architecture is something that already exists. Figure 4 illustrates the implementation of shop-house-based design, which is common in Indonesia, including in the buildings and design of Ejji Coffee, and serves as the criterion for the case study.

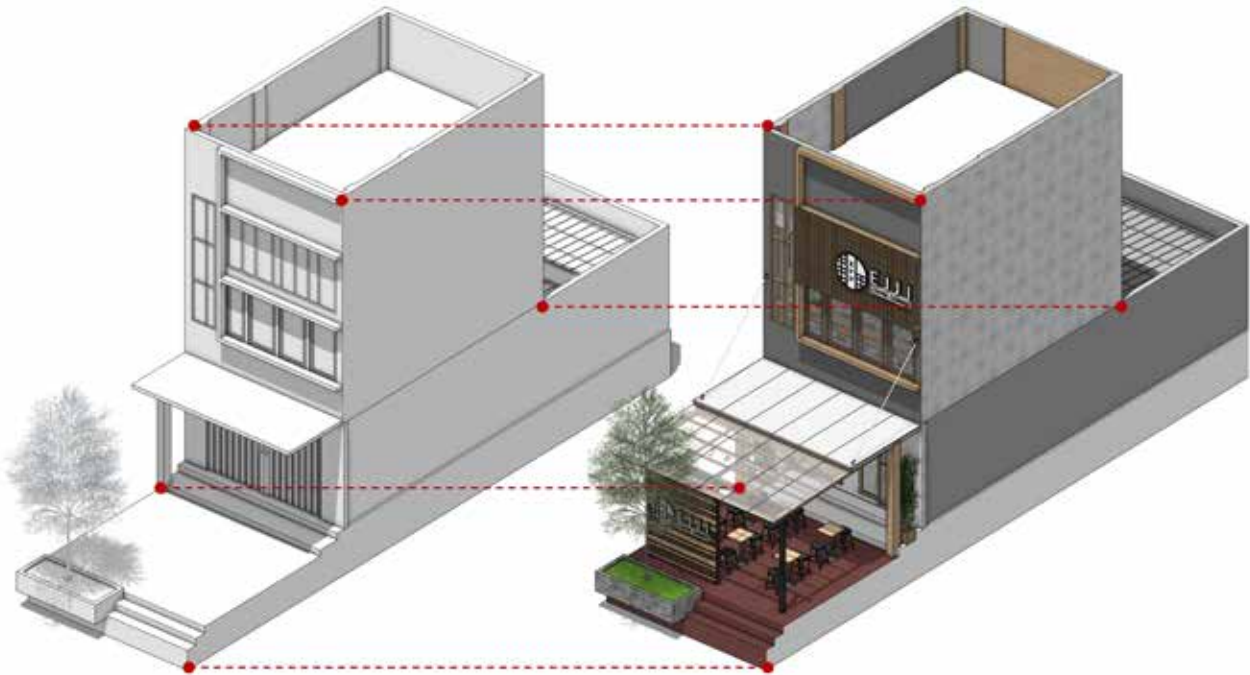


Figure 4: Ejji Coffee Design Based on Existing Building

(Source: Author's Document, 2025)

The illustration emphasizes that interiority-based design efforts are highly relevant for this coffee shop model. Rapidly changing architectural trends make it a logical strategy to avoid creating new buildings for coffee shops. Reusing shop-houses or existing buildings provides an opportunity to reflect the concept of interiority within this design typology. Various design adjustments are made to transform generic architecture into a more specific design that aligns with the coffee shop's brand. Adding facades, additional exterior spaces, changing colors, and adding furniture are common strategies used. These adjustments, which do not alter the original building, involve non-structural elements, allowing for quick implementation to meet the commercial nature of the business.

Ejji Coffee is one coffee shop brand relevant to this case study. Its design effectively represents the characteristics mentioned earlier. Several studies indicate that this brand has achieved considerable customer satisfaction (Prasetyo, 2021; Zuhri & others, 2022). Taste quality, price, and spatial quality are key factors in customer attachment to the coffee shop's space. Specifically, Ejji Coffee consistently uses a Japanese theme applied to various visual elements and interior layouts in its design.

Japanese architectural trends are often used in various food and beverage-based commercial architectures. This is related to the theme's alignment with the food and drinks sold, or due to Japanese architecture's recognizable characteristic (Regina & Roosandriantini, 2022). Japanese architecture, in its implementation, includes various elements such as shape, material, structure, roof, doors, and floors (Klasto, 2019) as well as intimate spatial encounters with small houses (*kyōshō jūtaku*). Generally, Japanese architectural style shows closeness to nature, expressed through materials, the merging of indoor and outdoor spaces, and other design strategies. Another study mentions the elements of flexibility, efficiency, and simplicity that can be implemented in Japanese-style spatial design (Septiani & Marizar, 2021).

In the context of existing building-based design, it is not entirely possible to apply all Japanese design principles. At a minimum, building elements closely related to the interior, which are non-structural, can be customized to follow Japanese spatial pattern references. The object system, where objects serve as symbols beyond their functions, forms an integrated network and system (Baudrillard, 2005). This can be observed in figure 5, where most, if not all, Ejji Coffee shop designs explore space based on objects or elements without altering the existing architectural form. Six case studies were selected due to the diversity of spatial dimensions and configurations, while still meeting the criteria of using shop houses as the spatial basis.



Figure 5: Six Representation Layout Based on Objects Arrangement
(Source: Author's Document, 2024)

The deconstruction of elements is based on non-structural elements, primarily to uncover strategies of interiority. This study aims to identify at least two-dimensional elements, three-dimensional elements, the interplay of indoor and outdoor spaces, and the materiality of modules as per the previous theoretical review. This identification is not merely to demonstrate how interior spaces are constructed but to showcase a more fundamental abstract idea. That is, the use of modules and systems is not merely duplication, but multiplication closely tied to context-specific variations in each iteration.

Two Dimensional Planes: Thematic Interiority

The two-dimensional elements in this design include walls, partitions, doors, and windows. In interior design principles, two-dimensional elements play the most significant role as they clearly define boundaries, particularly vertical ones. It is evident that the Japanese theme is translated into a grid system, with wood texture and color evoking a natural ambiance. The theme is not merely an imitation of appearance (McGee & Park, 2022), but rather an effort to interpret the principles and adapt them to achieve a particular atmosphere and experience. Figure 6 shows the various elements identified in the design of Eiji Coffee.

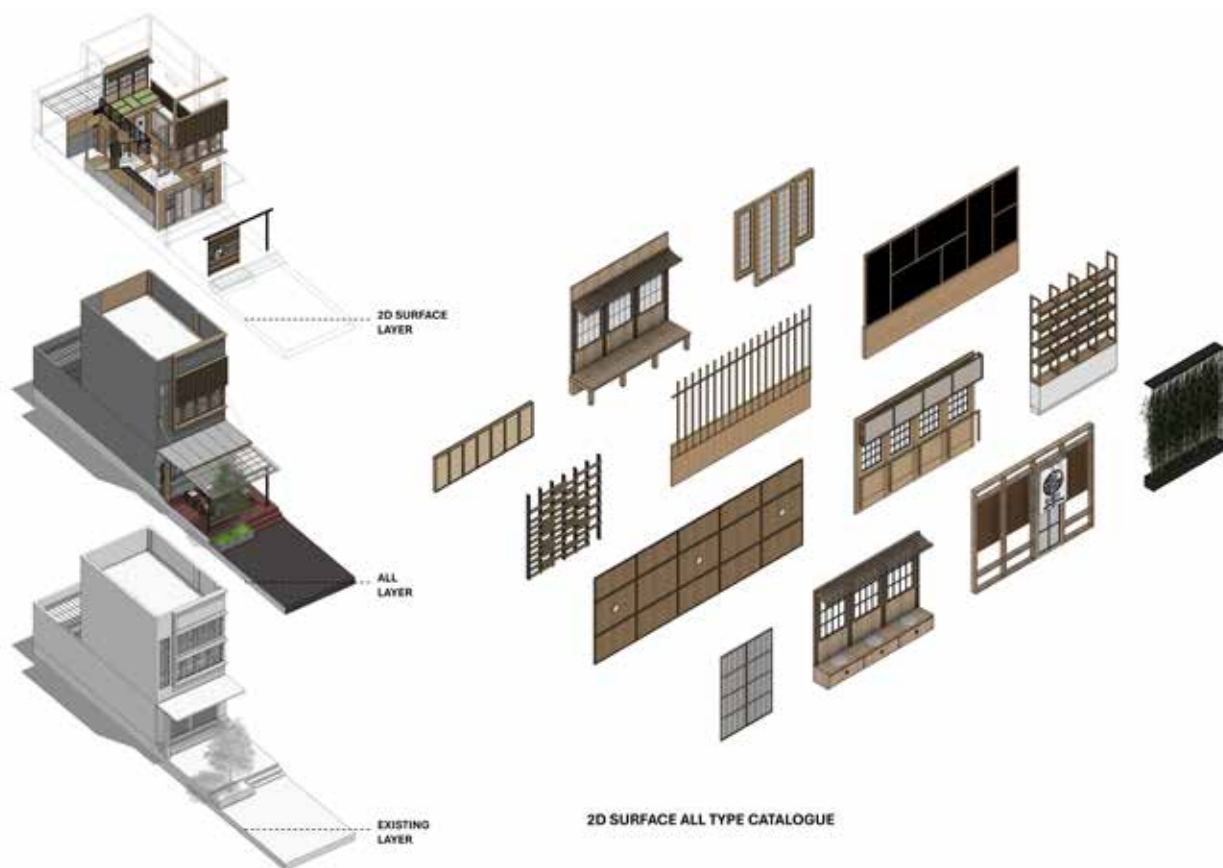


Figure 6: Two Dimensional Planes as Thematic Interiority
(Source: Author's Document, 2024)

These elements are primarily implemented within the wall sections of the room. Serving as welcoming features, Japanese-style doors and windows are used to define boundaries or function as portals to the interior space. These various elements demonstrate the addition of fragments that do not require alterations to the existing building structure. Thus, these decorative elements not only enhance the overall impression but are also easily constructible.

Three-Dimensional Furniture: Object Interiority

The three-dimensional elements in this design include furniture such as chairs and tables, as well as some potted plant elements. In interior design principles, three-dimensional elements or furniture, in addition to serving functional purposes, also illustrate spatial arrangement patterns (Zittoun, 2007). The placement of furniture in Ejji Coffee focuses on linear arrangements due to the elongated nature of shop-house buildings. Circulation areas and activity areas are distinctly separated by the use of furniture and the remaining space. Although these are freestanding objects, their consistency with the previously mentioned two-dimensional elements reinforces the Japanese style that characterizes this coffee shop. Picture 7 shows a catalogue of various three-dimensional elements, mainly furniture, in the coffee shop.

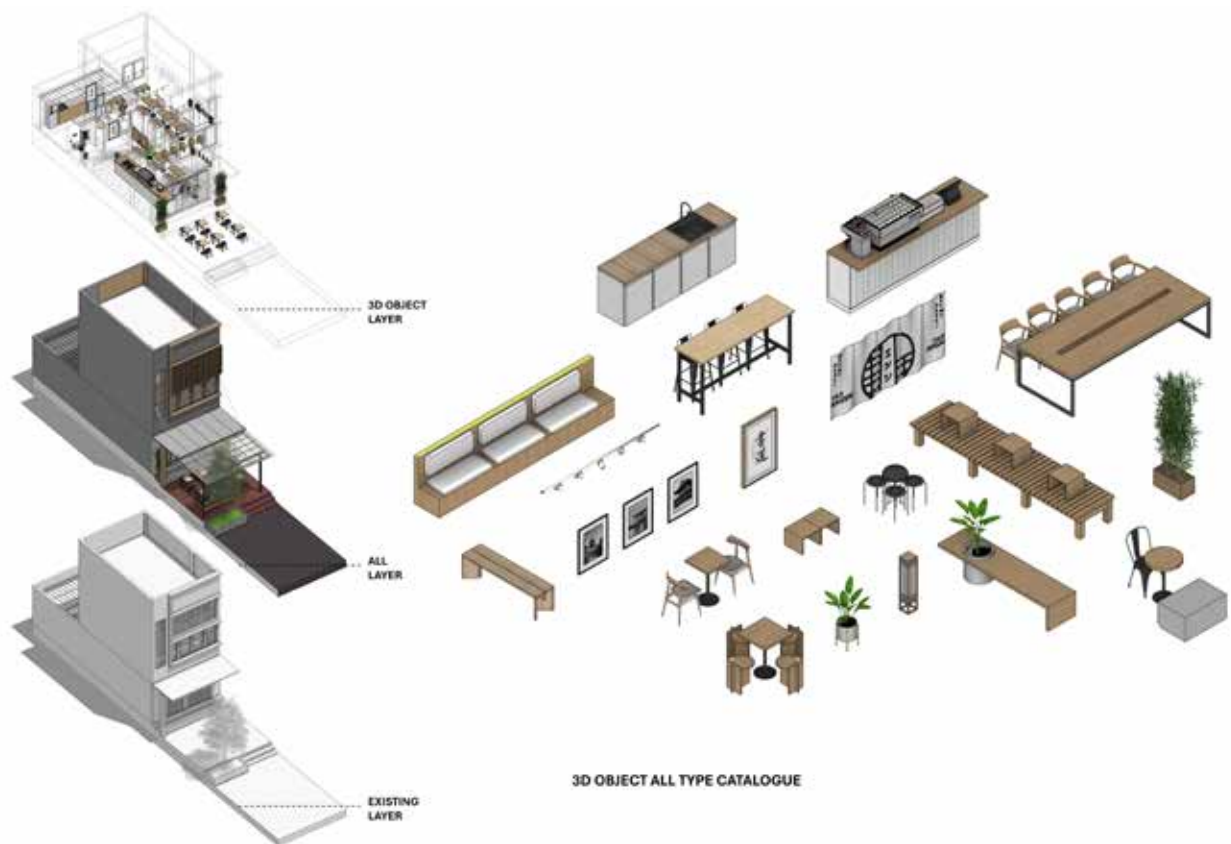


Figure 7: Three-Dimensional Furniture as Object Interiority
(Source: Author's Document, 2024)

These elements are primarily implemented in functional furniture, emphasizing the coffee shop's functionality through tables, chairs, and serving counters. They enhance the aesthetic and thematic consistency of the design without requiring structural changes. The modular furniture allows flexible layouts and supports various activities, aligning with the concept of interiority by leveraging the existing architecture. This strategic use highlights the importance of flexibility and adaptability in modern commercial architecture, enhancing the customer experience with a dynamic environment.

Threshold Terrace: Extended Interiority

Most of the design of Ejji Coffee is based on shop-house buildings. Shop-houses generally have outdoor spaces in the form of terraces. At this coffee shop, the terraces are almost entirely covered, creating a blended space between the interior and exterior. The in-between space is a characteristic of interiority (Dincer et al., 2019). The indistinct boundaries lead to varied interpretations of the interior and exterior impression (Boettger, 2014). In this coffee shop, its application can be seen in figure 8. The picture shows various configurations of interior space expansion into the terrace to increase the functional capacity of the commercial space.

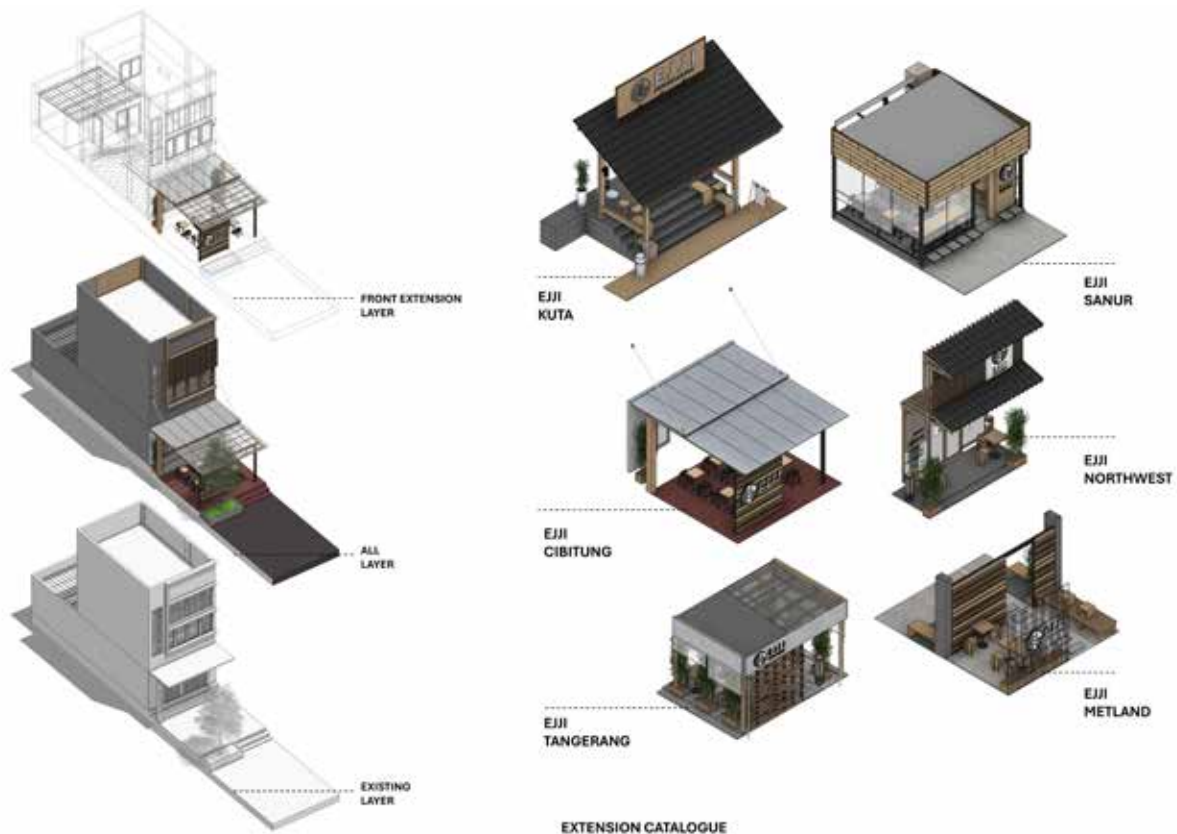


Figure 8: Extension on Terrace Space as Inside Outside Threshold

(Source: Author's Document, 2024)

This spatial expansion is largely implemented using lightweight structures, such as hollow iron and PVC roofing. The side coverings are either left open or use transparent partitions like curtains or plant-filled frames. This expansion aims to merge the interior and exterior spaces, allowing visitors to experience the overall Japanese style. The strategic choice of materials not only enhances the aesthetic appeal but also improves the functionality and flexibility of the space. By utilizing such adaptable structures, the design facilitates a seamless transition between indoor and outdoor environments, creating a harmonious blend of the two. Furthermore, this approach supports the commercial aspect of the coffee shop by providing additional seating capacity, thereby accommodating more customers. The resulting space is not only visually appealing but also practical, ensuring that the interior design aligns with the thematic consistency and operational needs of Ejji Coffee.

Materiality: Modular Interiority

The materials used in the design of this coffee shop primarily consist of synthetic materials such as HPL and multiplex. These materials possess modular characteristics, and thus, in design considerations, the dimensions of spatial components are often based on material unit sizes. Materiality is not merely a surface covering but embodies a deeper meaning akin to a design system (Picon, 2021). Figure 9 illustrates the modular material system functioning within the interior design of this coffee shop.

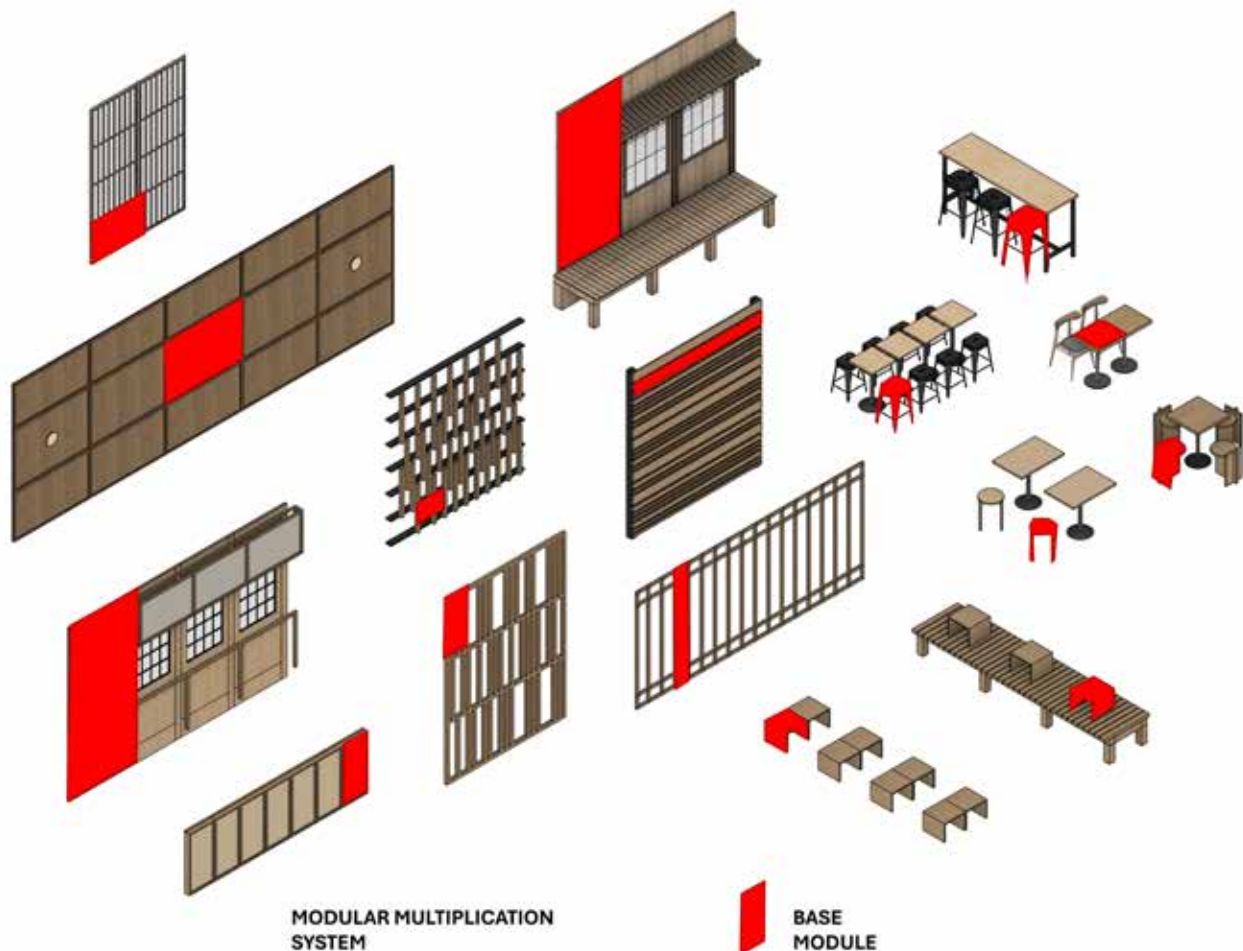


Figure 9: Materiality through Modular Interiority
(Source: Author's Document, 2024)

In addition to materials, the furniture used is modular. Its repetition facilitates highly flexible capacity arrangement, adjusting to the existing building. Duplication or multiplication occurs from the smallest material unit to larger elements within the interior space, such as walls, partitions, seating areas, and more. HPL material is used for its ease, cost efficiency, and easier reuse in subsequent design duplications. Additionally, wood-toned materials enhance the specific impression (Marinic, 2019) that this coffee shop aims to present.

Generally, interiority-based multiplication does not occur through simple duplication operations. Various contextual adjustments are made to achieve specific design objectives using modular strategies and type multiplication. From homogeneous entities, repetition occurs contextually through its elements. This study's deconstruction reveals the smallest units of the interiority system, which also operates in similar designs. These units systematically form specific variations in adaptation and flexibility concerning existing buildings. The key aspects of this interior design are flexibility, efficiency, sustainability, and maintaining consistent visual aesthetics for the commercial interests of the brand involved.

Reflection: Interiority as Sustainable Design Strategy

Adapting shophouses into coffee shops is a general example of how interiority can serve as a design framework. The concept of interiority as an adaptive design strategy offers a valuable approach in the fast-paced world of spatial business design, where sustainability and quick construction are crucial. This research explores four elements of interiority: 2D thematic walls and surfaces, 3D furniture, thresholds in open front terraces, and modular industrial materials, highlighting their role in supporting sustainability through fast construction and object-based design.

Thematic interiority, represented by 2D thematic walls, is a key element in creating a unique and inviting atmosphere within the coffee shop. Thematic walls, designed with murals, patterns, or colors that reflect the coffee shop's brand and aesthetic, allow for a quick transformation of the space without extensive structural changes. This approach is advantageous for fast construction, as surface treatments expedite the renovation process and minimize business downtime. Thematic walls are also cost-effective and flexible, supporting sustainability by reducing the need for frequent, resource-intensive renovations.

Object interiority involves the use of 3D furniture, which defines the functionality and aesthetics of the interior space. In coffee shop design, furniture such as tables, chairs, counters, and display units are crucial components. Object interiority emphasizes the selection of furniture that is both visually appealing and functional. Fast construction and object-based design are closely linked in this context, as modular and prefabricated furniture pieces can be quickly assembled and installed, reducing construction time and labor costs. Modular furniture also allows for easy reconfiguration, accommodating different layouts and customer needs. From a sustainability perspective, choosing durable and high-quality furniture reduces the need for frequent replacements, minimizing waste and resource consumption. Using sustainable materials, such as reclaimed wood or recycled metal, further aligns with sustainable design principles.

Extended interiority, the third element, involves the design of thresholds in front terraces. These thresholds serve as transitional spaces between the exterior and interior of the coffee shop, enhancing the overall customer experience. In shophouse adaptations, the front terrace provides an opportunity to extend the interior space outward. Designing effective thresholds involves considering seating, lighting, landscaping, and signage to create a cohesive and inviting entryway. The use of weather-resistant materials and modular elements allows for quick installation and adaptability to changing seasons or customer preferences.

From a sustainability standpoint, the extended interiority of front terraces can contribute to energy efficiency by incorporating shading devices that reduce indoor cooling needs. Additionally, incorporating plants and greenery improves air quality and creates a pleasant environment for customers. Figure 10 illustrates a minimal intervention in the existing structure, incorporating an interior system that allows for future expansion or modifications due to the dynamic nature of commercial spaces, including brand changes.

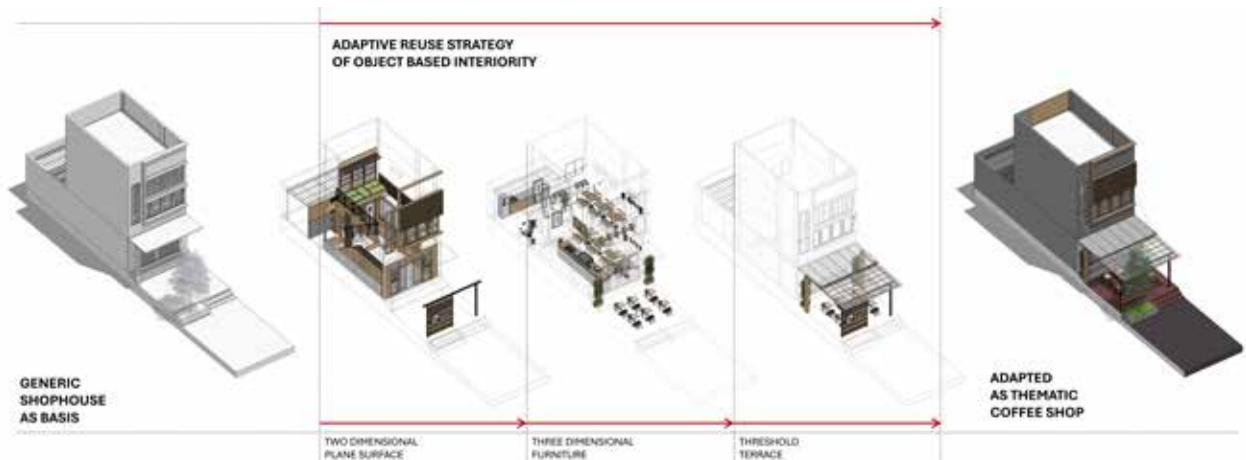


Figure 10: Minimal Intervention through Multiplied Addition System
(Source: Author's Document, 2024)

The fourth element, modular interiority, focuses on the use of modular industrial materials. Modular interiority refers to the incorporation of prefabricated and standardized materials, such as high-pressure laminate (HPL), wood, and other industrial materials known for their durability, versatility, and ease of installation. In coffee shop design, modular industrial materials offer several advantages, including quick and efficient installation, which reduces construction time and business disruption. These materials can be easily replaced or updated, providing flexibility in design and maintenance, crucial in the fast-paced world of spatial business design. Sustainability is a key consideration when selecting modular industrial materials. Environmentally friendly materials, such as sustainably sourced wood or recycled HPL, minimize the ecological impact of the renovation process. The durability and longevity of modular materials reduce the need for frequent replacements, contributing to a more sustainable design.

Despite the advantages of interiority as an adaptive design strategy, a notable research gap exists in positioning interiority beyond merely the condition of the interior (Atmodiwirjo & Yatmo, 2019; Hedges, 2019; McCarthy, 2005). To fully embrace interiority as a design framework, it is essential to recognize its potential to promote sustainability in the fast-paced era of spatial business design, such as coffee shops. Interiority should be understood as a holistic approach that encompasses thematic, object, extended, and modular elements. Integrating these elements into the design process allows for the creation of adaptable, functional, and sustainable spaces that meet the evolving needs of businesses and customers. Interiority as a design strategy also encourages innovation and creativity, enabling designers to explore new possibilities and push the boundaries of traditional interior design.

In summary, interiority as a design framework provides a valuable approach to adapting spaces such as shophouses into coffee shops. By focusing on the elements of 2D thematic walls, 3D furniture, thresholds in front terraces, and

modular industrial materials, designers can achieve fast construction, object-based design, and sustainability. However, positioning interiority as a comprehensive design strategy is crucial, recognizing its potential to drive innovation and promote sustainability in the dynamic world of adaptive based-spatial business design. As the demand for adaptable and sustainable spaces continues to grow, interiority will play an increasingly important role in shaping the future of commercial, adaptive reuse-based design.

Conclusion

This study introduces four interiority strategies with theme-based, object-based, expansion, and modularity with redefining interiority beyond space or decoration. These strategies form an integrated design framework rooted in multiplied design, which transforms homogeneous entities into flexible configurations suitable for diverse contexts, especially adaptive on existing buildings. This inherent flexibility reinforces type-based design as a sustainable approach, promoting building reuse for cost efficiency and waste reduction. Furthermore, the resulting aesthetics maintain brand identity and serve as a commercial asset. Rather than simple repetition, types are presented as adaptable frameworks, capable of deconstruction and reassembly.

While focusing on coffee shop case studies, this qualitative research seeks to raise broader awareness of these strategies. Its key contribution lies in establishing interiority as an adaptive, flexible, and contextually multiplied design strategy, aligning with sustainable architectural principles. This collection of variable strategies forms a valuable system applicable across various design contexts, significantly enriching the theoretical discourse on interiority and pattern-based design. Ultimately, this research solidifies interiority strategies as a cohesive system, providing practical and sustainable solutions for variable contemporary design challenges.

Acknowledgement

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