Inês Leonor Nunes Department of Architecture, University of Coimbra, Coimbra

Jane Drew and Minnette De Silva Pioneering Participatory Architecture in Mid-Century India and Sri Lanka

Keywords

- Jane Drew; Minnette De Silva; Socially engaged architecture; India; Sri Lanka.

DOI - 10.14195/1647-8681_15_4 Jane Drew and Minnette De Silva made significant contributions to the architectural field, namely to the broader frameworks of the mid-twentieth-century Modern Movement and tropical architecture. They also pioneered inclusive design processes, in line with the discussion of human factors that was just starting to fuel the architectural agenda. Peons' Village in Chandigarh and Watapuluwa in Kandy are housing schemes resulting from participatory methodologies where both architects promoted dialogue with the populations and integrated regional specificities. The collective engagement, which occurred at different project stages, effectively involved future inhabitants in

decision-making and is reflected in the outcome of the projects. Drew and De Silva's socially engaged architecture envisioned project design as a co-creation process, contributing to redefining the architect's role, and aiming to foster a more equitable urban environment toward a better society. 1 Royal Institute of British Architects.

2 Le Congrès Internationaux d'Architecture Moderne or International Congress of Modern Architecture.

Introduction

This paper builds on the life and work of the British architect Jane Drew (1911–1996) and the Ceylonese architect Minnette De Silva (1918–1998). The research is part of my ongoing PhD thesis, entitled "The Social within the Tropical: The Community Engaged Architecture of Jane Drew and Minnette De Silva," which I have been developing, for the past two years at the University of Coimbra, in Portugal. My thesis explores the architectural approaches of Drew and De Silva within the Modern Movement and tropical architecture frameworks, developed since the establishment of their practices before the mid-twentieth century. Furthermore, it particularly emphasizes the pioneering participatory methodologies, including future users, that both architects led during the mid-1950s. This socially engaged approach to architecture is highlighted through two case studies: Peons' Village in Chandigarh, India, by Jane Drew, and the Watapuluwa housing scheme in Kandy, Sri Lanka, by Minnette De Silva.

In the first stage, the methodologies employed included a thorough analysis of Drew and De Silva's archives. Regarding Jane Drew, the Fry & Drew Papers, accessible in the RIBA Architecture Study Rooms of the Victoria & Albert Museum in London, are the main reference for studying her legacy.¹ They contain invaluable archival material, the majority unpublished, in particular Drew's autobiography. In the absence of a formal archive, Minnette De Silva's autobiography is the key textual primary source. The Life and Work of an Asian Woman Architect was posthumously printed in a single edition, in a lively scrapbook format, and documents De Silva's remarkable contribution to the Cevlonese, Asian, and worldwide architectural ground. Indeed, the autobiographies of both architects serve as the chief reference for this paper, and any unstated source should be understood to refer to them. The collection of primary sources encompassed a second phase of fieldwork in the two case studies. During my trips to India and Sri Lanka, I visited the remaining legacy of Drew in Chandigarh and De Silva in Colombo and Kandy. Comprehensive studies of the Peons' Village and Watapuluwa were complemented by interviews with the owners of the houses. The subsequent phase involved visits to additional archives, adding depth to the research endeavour. At the Canadian Centre for Architecture in Montreal, I explored the Pierre Jeanneret and Aditya Prakash fonds, with material of foremost importance about the Chandigarh project. Additionally, in the gta archives at ETH Zürich, I consulted documents related to the CIAMS, fostering a nuanced understanding of the social dimensions intertwined with the architectural narratives.²

Concerning the structure, firstly I will introduce the two key figures of the article, providing a literature review and contextualizing their participatory approach within the broader architectural scenario. Afterward, the focus of the article will be on the case studies. The chapter will delve into Drew and De Silva's participatory processes

- 3 The Modern Architectural Research Group, founded in England in 1933.
- 4 Anooradha Siddiqi, "Crafting the Archive: Minnette De Silva, Architecture, and History," *The Journal of Architecture* 22, no. 8 (17 November 2017): 1299–1336.
- 5 The Modern Architectural Research Group, founded in India in 1946. Marg in Sanskrit also means "the way forward." See Rachel Lee and Kathleen James-Chakraborty, "Marg Magazine: A Tryst with Architectural Modernity," ABE Journal, no. 1 (May 1, 2012).

and methodologies, highlighting the differences between their approaches and detailing the specificities of both projects regarding decision-making strategies.

This paper has the objective of exploring the still overlooked work of Jane Drew and Minnette De Silva, and therefore contributing to the growing scholarship that has been steadily unveiling the broader work of women architects, and more specifically those who were active during the twentieth century. Furthermore, in line with my PhD investigation, researching Peons' Village and Watapuluwa discloses Drew and De Silva's socially engaged approach to design, and highlights the projects as pioneering processes regarding citizen participatory design. As part of the tropical architecture framework, it demonstrates that social concerns, and not merely climatic factors, were present in the development of this adaptation of the Modern Movement to the climate of the tropics and moreover, that women architects were equally involved.

Jane Drew and Minnette De Silva

Jane Drew and Minnette De Silva shared time and places. They were both born at the beginning of the twentieth century-Jane Drew in England, and Minnette De Silva in Cevlon, currently Sri Lanka. Most of Drew's life was centred in London while extensively travelling, building a worldwide legacy. She worked mainly with her husband and lifelong partner Maxwell Fry, a crucial figure of the Modern Movement in England. They both belonged to the MARS Group, the British branch of the CIAM.³ In parallel, Minnette De Silva was born and raised in Kandy, a small town in the highlands of the Central Province in Sri Lanka, nestled between greenery-covered mountains and a central lake. In Kandy, De Silva also founded her lifetime office, from where she designed the thirty buildings that constituted her legacy.⁴ De Silva built exclusively on her native island, mainly in Colombo and Kandy. She worked mostly as a solo practitioner, accommodating only a few assistants, sporadically, throughout the years. However, she belonged to a major movement entitled MARG.⁵ Based in Bombay, its namesake magazine is still published today. She commuted primarily between Kandy and Europe, seemingly disconnected from the Sri Lankan architectural community. She regularly embarked on long trips, spending significant time abroad.

De Silva started her architectural studies in Bombay, only later completing them at the Architectural Association of London (1945–48), where Jane Drew graduated in 1934. During the 1930s, Drew's education remained officially in Beaux-Arts, despite the Modern Movement ideas were already flourishing, and later fully established during De Silva's study years. Hence, they both became affiliated with the modernist principles, namely due to their close relationship with Le Corbusier. He became a friend and an inspiration, whose influence is reflected in both architects' projects. Additionally, Jane Drew and Minnette De Silva participated in



the major architectural events of their time, namely the CIAMS of 1947 in Bridgewater, and of 1953 in Aix-en-Provence. They possibly met in the former, which De Silva attended as a student and a *Marg* magazine representative (figure 1). Being excellent networkers, they smoothly moved within similar social circles, connecting with the brightest minds of all arenas.

Drew and De Silva were also scarce women architects practising in the mid-century. Therefore, they faced general antagonism in the male-orientated architectural field. This group of women architects becomes even scarcer if considering only those operating in non-Western/ non-white territories. As mentioned earlier, De Silva built exclusively in Sri Lanka, with the greater part of her legacy dedicated to single-family dwellings. In contrast, Drew devoted herself dearly to programmes within the health and social spheres, despite her building portfolio including a panoply of other typologies and functions, signing projects in several countries. The list includes Sierra Leone, the Gambia, Ghana, and Nigeria (the former British West Africa), and also India, Iran, Kuwait, Mauritius, Gibraltar, Singapore, Thailand, Malaysia, England, and Sri Lanka. Most of these countries are located in the band between the Tropics of Cancer and Capricorn, generally designated as the tropics. As such,

fig. 1 CIAM 6, Bridgewater, 1947. Jane Drew (first row, centre, dressed in white) and Minnette De Silva (two chairs to the right). RIBA Collections.

- 6 Dennis Sharp, "Registering the Diaspora of Modern Architecture," in *The Modern Movement* in Architecture: Selections from the DOCOMOMO Registers (Rotterdam: 010 Publishers, 2000).
- 7 See Mary Vance, Tropical Architecture: A Bibliography, Architecture Series–Bibliography;
 A-738 (Monticello: Vance Bibliographies, 1982); Jiat-Hwee Chang, A Genealogy of Tropical Architecture: Colonial Networks, Nature and Technoscience (London: Routledge, 2016).
- 8 For further development of this topic, see Inês Leonor Nunes, "Women Architects Disrupting Tropical Modernism: The Socially Engaged Work of Jane Drew and Minnette De Silva," *Traditional Dwellings and Settlements Review* XXXIV, no. II (Spring 2023): 7–22.
- 9 Sigfried Giedion, Architecture, You and Me; the Diary of a Development (Cambridge, Harvard University Press, 1958).
- 10 Minnette De Silva, "A House at Kandy, Ceylon," Marg (June 1953), 4.
- Alexander Tzonis, Liane Lefaivre, and Bruno Stagno, eds., *Tropical Architecture: Critical Regionalism in the Age of Globalization* (Chichester; New York; the Netherlands: Academy Press, 2001); Lefaivre and Tzonis, *Critical Regionalism: Architecture and Identity in a Globalized World* (Munich; New York: Prestel Pub, 2003).
- 12 Architectural Association School of Architecture.
- 13 Jane Drew and Maxwell Fry, Village Housing in the Tropics (London: L. Humphries, 1947); Idem., Tropical Architecture in the Humid Zone (Batsford, 1956); Idem., Tropical Architecture in the Dry and Humid Zones (B.T. Batsford, 1964).
- 14 De Silva, "Architecture in Sri Lanka," in Sir Banister Fletcher's A History of Architecture, 18th ed. (London, 1975), 86–145.
- 15 Stephen Hitchins, Fry, Drew, Knight, Creamer: Architecture (London: Lund Humphries, 1978).
- Hannah le Roux, "The Networks of Tropical 16 Architecture," The Journal of Architecture 8, no. 3 (1 January 2003): 337-54; Rhodri Windsor Liscombe, "Modernism in Late Imperial British West Africa: The Work of Maxwell Fry and Jane Drew, 1946–56," Journal of the Society of Architectural Historians 65, no. 2 (2006): 188-215; Ola Uduku, "Modernist Architecture and 'the Tropical' in West Africa: The Tropical Architecture Movement in West Africa, 1948–1970," Habitat International 30 (1 September 2006): 396-411; Jacopo Galli, "A Cosmopolitan Manual in Decolonizing Africa: Fry&Drew's Tropical Architecture in the Dry and Humid Zones," SAJ - Serbian Architectural Journal 8, no. 2 (2016): 193-216.

when the Modern Movement spread its wings from Europe to the world in the afterwar modern diaspora,⁶ the adaptation of the modernist language to the local climates of these new regions was called tropical architecture.⁷ Having extensively practised in these climates, Drew and De Silva are associated with the tropical architecture modernist 'branch'. Indeed, close attention to the local climate and to the natural factors of the places that they were building in is a predominant aspect of their architectural language.

However, despite being affiliated with the Modern Movement and tropical architecture, their approaches offered different perspectives.⁸ By integrating regional idiosyncrasies, namely the people and their traditions, as well as autochthonous material practices and objects, and, even further, other artistic forms as pledged by Sigfried Giedion's concept of "synthesis of the arts," they took the first steps towards what was later called regionalism.⁹ De Silva called her first commission, Karunaratne House, "an experiment in Modern Regional Architecture in the Tropics."¹⁰ Her line of thought is credited with anticipating critical regionalism by three decades.¹¹

Brief Literature Review

Jane Drew and Minnette De Silva led the way with a series of first-time achievements that challenged the instituted patriarchal discipline of architecture. Jane Drew was the first woman professor at Harvard and MIT Universities; the first woman to preside over the AA of London; and the first woman on the RIBA council.¹² Minnette De Silva was RIBA's first Asian woman associate; the first Asian representative in the CIAM; and the first women architect in Sri Lanka, as well as the country's first modernist architect. Apart from these pioneering achievements, and their significant building legacy, Drew and De Silva also assembled a robust published portfolio. Drew is co-author of Village Housing in the Tropics and Tropical Architecture in the (Dry and) Humid Zone(s), seminal books regarding tropical architecture.13 Conversely, De Silva's written oeuvre was also a vital component of her career. In addition to her autobiography, I highlight the eighteenth edition of Sir Banister Fletcher's A History of Architecture, where De Silva wrote the chapters about Southeast Asia, while lecturing at the University of Hong Kong.14

Accordingly, their theoretical and practical contributions throughout careers of almost half a century, are in dissonance with the attention received from architectural historiography. Jane Drew has a monograph showcasing the firm's body of work written in the late 1970s.¹⁵ Regarding her work with Maxwell Fry, a crucial and more recent book is *The Architecture of Edwin Maxwell Fry and Jane Drew: Twentieth Century Architecture, Pioneer Modernism and the Tropics*, by Iain Jackson and Jessica Holland. Also, important articles were written mentioning Drew and Fry's work in West Africa.¹⁶ Likewise, Minnette De Silva's legacy is

- 17 Ellen Dissanayake, "Minnette De Silva: Pioneer of Modern Architecture in Sri Lanka," Orientations, 1 January 1982; AA School of Architecture, David Robson – Minnette de Silva: The Life and Work of an Asian Woman Architect, 2016, https://www.youtube.com/ watch?v=R4JKQHLi8IU (10–12–2023); Tariq Jazeel, "Tropical Modernism/ Environmental Nationalism: The Politics of Built Space in Postcolonial Sri Lanka," Fabrications 27, no. 2 (4 May 2017): 134–52; Shiromi Pinto, "Reputations: Minnette De Silva," The Architectural Review 1463 (August 2019): 110–13.
- 18 Siddiqi, "Crafting the Archive."
- 19 Kiran Joshi, Documenting Chandigarh: The Indian Architecture of Pierre Jeanneret, Edwin Maxwell Fry, Jane Beverly Drew (Ahmedabad, India; Chandigarh, India; Wappingers' Falls, NY: Mapin Pub.; Chandigarh College of Architecture, 1999).
- 20 Iain Jackson, "Maxwell Fry and Jane Drew's Early Housing and Neighbourhood Planning in Sector-22, Chandigarh," *Planning Perspectives* 28, no. 1 (31 January 2013): 1–26.
- 21 David Robson, "Andrew Boyd and Minnette de Silva," MATTER (blog), 4 March 2015, https://thinkmatter.in/2015/03/04/andrewboyd-and-minnette-de-silva-two-pioneers-ofmodernism-in-ceylon/ (10–12–2023).
- 22 "C.I.A.M. 6," CIAM 6, https://www.ciam6.co.uk/ (10-12-2023).
- 23 Elisa Dainese, "From the Charter of Athens to the 'Habitat': CIAM 9 and the African Grids," *The Journal of Architecture* 24, no. 3 (3 April 2019): 301–24.
- 24 "Annexe: Liste des Grilles Presentees au CIAM 9," 42-JT-X-1, gta Archives, ETH Zurich. See also Inês Leonor Nunes, "Towards La Charte de l'Habitat: Jane Drew pioneering a 'more humane architecture' in Chandigarh," *CIDADES, Comunidades e Territórios* 47 (29 December 2023).

also addressed by a handful of authors.¹⁷ I underscore the more recent contribution from Anooradha Siddiqi, entitled *Crafting the Archive: Minnette De Silva, Architecture, and History.*¹⁸ Regarding the case studies, Kiran Joshi assembled a broader documentation covering the contributions of the senior architects of the Chandigarh project, arguably the most significant piece of literature about Drew's work in the Punjab capital.¹⁹ More specific, and exclusively dedicated to Drew and Fry's work in Chandigarh, is the article by Iain Jackson about Sector 22.²⁰ Unquestionably, De Silva's autobiography is the primary source about Watapuluwa. In addition, only David Robson's article on the online platform Matter is worth mentioning.²¹ These academic voids vis-à-vis Drew and De Silva, especially about the case studies, are an ongoing investigation whose comprehensive insights will be further explored in my PhD thesis. This article offers an overall preview.

Context

In the aftermath of World War II, the world faced financial crises, political instability, and urban chaos. The post-war devastation resulted in disbelief in the ideals of progress and modernity associated with the antebellum optimism and the Modern Movement ideology. Concurrently, the conflict exposed humanity's fragility, sparking a renewed curiosity about human life. This interest prompted the emergence of social sciences and the flourishing of human rights movements. This transformative period urged the establishment of a new order, prioritizing humaneness, an important shift for understanding Drew and De Silva's participatory initiatives.

In the realm of architecture, a transformative wave also emerged. A rising generation of young practitioners, contesting the industrial methods and massive complexes that marked the Modern Movement post-war housing reform, aspired to more socially engaged ideals. CIAM, the major stage of architectural debates, served as a barometer for these changes. Gradually, beginning in the post-war CIAM 6, and intensifying until CIAM 9 and 10, La Charte d'Athènes and the implicit functionalist city gave place to a debate around La Charte de l'Habitat. The concept of "habitat" encapsulated a novel theoretical discourse to "work for the creation of a physical environment that will satisfy man's emotional and material needs and stimulate his spiritual growth," advocating for a more humane architecture.²² Notably, CIAM 9 also witnessed a decentralization of the architectural field beyond the Western sphere.²³ Among other territories, Africa was presented, and Drew introduced Chandigarh.²⁴ Overall, these evolving ideologies laid the foundation for solidifying the social function of architecture as a powerful tool to frame the individual in society. Supported by the rising human sciences, architecture's new interdisciplinary and holistic approach started to prioritize links with other domains, namely sociology and anthropology.

- 25 Jackson and Jessica Holland, The Architecture of Edwin Maxwell Fry and Jane Drew: Twentieth Century Architecture, Pioneer Modernism and the Tropics (London; New York: Routledge, 2016).
- 26 Chandigarh is a widely studied topic. This list is merely a suggestion: Norma Evenson, *Chandigarh* (University of California Press, 1966); Ravi Kalia, "Chandigarh: A Planned City," *Habitat International* 9, no. 3 (1 January 1985): 135–50; Jaspreet Takhar, ed., *Celebrating Chandigarh* (Chandigarh: Grantha Corporation, 2002); Vikramaditya Prakash, *Chandigarh's Le Corbusier: The Struggle for Modernity in Postcolonial India* (University of Washington Press, 2002); Nihal Perera, "Contesting Visions: Hybridity, Liminality and Authorship of the Chandigarh Plan," *Planning Perspectives* 19, no. 2 (2004): 175–99.
- 27 Drew, "On the Chandigarh Scheme," Marg, October 1953; Idem., "Living: Sector 22," Marg (October 1961).
- 28 In Chandigarh, the governmental housing was designed according to the rank of the residents, ranging from Type 1 for higher employees, to Type 13 for the lowest.
- 29 Drew and Fry, "Planning and Development in Chandigarh, Chandigarh: Housing, Town and Country Planning Summer School," (London, 1963), F&D/4/1, Fry & Drew Papers, RIBA Archive; Drew, "Indigenous Architecture: Architecture in the Tropics," *Perspecta* 8 (1963): 57–58.

Peons' Village in Chandigarh and Watapuluwa Housing Scheme in Kandy

Jane Drew and Minnette De Silva attended these events and were likely deeply influenced by these debates. In fact, their social motivations towards the people were aligned with or even preceded the CIAM discussions. For example, Jane Drew and Maxwell Fry, while working as West Africa town planners for the British Empire during wwII, had already stood up for the interests of the local people, advising contrarily to the colonial power. Afterward, they pioneered participatory methodologies during the 1950s. In particular, in Tema Manhean, Ghana, they promoted discussions with the future users of the projects and even changed initial layouts. As methods of collecting feedback, they organized exhibitions and constructed housing prototypes that were tested, criticized, and eventually amended.²⁵ Also, Minnette De Silva started to develop the study entitled "Cost-Effective Housing Studies" (1954–1955) during her student years. Moreover, the social concerns chiefly present in her architectural line of thought have been present since the Karunaratne House project, initiated in 1948. Peons' Village (1956), Watapuluwa (1955-1958), and the participatory methodologies employed are the culmination of the architects' social concerns.

Peons' Village, Chandigarh

As senior architect of the Chandigarh project (1951–54), Drew worked alongside Le Corbusier, Pierre Jeanneret, and Maxwell Fry. As Chandigarh was conceived as a new city, planned from the ground up, the design responsibilities were distributed among the four architects and their team of Indian architects.²⁶ Le Corbusier designed the city's masterplan and a hierarchized road grid that framed rectangular sectors, later designed by the other architects. Jane Drew is credited for the layout of Sector 22, the inceptive neighbourhood.²⁷ In addition, she designed fourteen building types, covering education, recreation, commercial, health facilities, and government housing. Regarding Drew's social preoccupations, I am especially interested in the communities that she created in Sector 22, referred to as peons' villages (figure 2).

Arising from the will to recreate the rural environment from which the residents came, peons' villages are organized as groups of approximately two hundred dwellings of Housing Type 13.²⁸ The complexes are walled, accessible by arches that mark entry points to pedestrian streets, and arranged around a green public space (figure 3). Type 13 was designed to house the peons, or messengers, the lowest-income governmental employees. In its design, Drew took Chandigarh's climate into consideration but also the residents' traditions and habits. For example, besides two rooms, a cooking veranda, a water closet, and a bath compartment, the typology includes a generous rear courtyard to facilitate Indian outside living habits, such as sleeping outdoors during the hot and monsoon seasons (figure 4). Cooking habits were also accounted for.²⁹ 30 Drew and Fry, "Planning and Development in Chandigarh," 10.

The awareness of the referred local specificities was achieved by in situ observation, but most by direct consultation with the future users, taken as a working participatory methodology:

> We had many meetings with our future clients, who told us all about the intricacies of Hindoo religious observance in the domestic routine, the separation of sexes, castes and occupations, of customs of sleeping and relaxation brought about by the climate. They told us of the need for sleeping on the roof or in the garden at certain times of year.³⁰



fig. 2 Plan of the Peons' Village by Jane Drew, Sector 22D, Chandigarh, India. Superimposition of Drew's masterplan with Google Maps. By author.



- Fry, "Autobiography, India" (London, 1983), 42, F&D/4/2, Fry & Drew Papers, RIBA Archive.
- 32 Ibid., 40.
- 33 Drew, "Letter to Caroline," 1988, 8, F&D/21/1, Fry & Drew Papers, RIBA Archive.
- Idem., "Reflections on My Life and Work" (London, 3 January 1993), 4–5, F&D/25/3, Fry & Drew Papers, RIBA Archive.

- fig. 3 Peons' Village by Jane Drew, Sector 22D, Chandigarh, India. Photograph taken in 2022 by the author.
- fig. 4 Peons' Village by Jane Drew, Sector 22D, Chandigarh, India. Photograph taken in 2022 by the author.

As mentioned, in a desire to work with all the involved parties in the project and actively include the collective input in the decision-making process, Jane Drew arranged extensive meetings, generating data to help in the projects. For instance, talking about the Sector 22 health centre, Fry recalled Drew "conferring with a young doctor [...] and designing with him."³¹ Also, referring to the shopkeepers, Fry pointed out that "we designed with them [...] and so successful was the outcome that they willingly built for us with their own money covered ways connecting their colonnade with the booths for the still poorer stallholders."³² In sum, Drew concluded: "I see that we have always practiced community architecture [...] we have consulted all those who were to use the buildings."³³

Mock-ups were another methodology seeking public participative intervention, and enabled the fine-tuning of projects accordingly. For instance, regarding the lowest categories of housing, Drew held: "before large numbers were built, we built prototypes of each different house type which were then lived in, criticized, and improved. In this way we found that the Indians [...] were willing to try out new ways of living."³⁴

Noteworthy is that the Chandigarh Project empowered a new chapter for housing design in India as the first city where every legal house had sewage, drinking water, and electricity. The effective engagement of several parties in the co-creation process was an innovative participative methodology with which Jane Drew prioritized the needs and aspirations of the residents, contributing to the success of the city. Nowadays, Peons' Village remains home to a diverse community of government employees.



- fig. 5 Peons' Village by Jane Drew, Sector 22D, Chandigarh, India. Photograph taken in 2022 by the author.
 - 35 De Silva, The Life & Work of an Asian Woman Architect (Colombo: Smart Media Productions, 1998), 207.

36 Ibid.

The liveliness and intimate scale of the compound, along with its public spaces, stand in stark contrast to the expansiveness found in other parts of the city. The preservation and maintenance of the houses are intricately tied to the residents. Their status as government employees leads to frequent changes in occupancy. Nonetheless, the majority of the houses are in satisfactory condition (figure 5).

Watapuluwa Housing Scheme, Kandy

Sri Lanka gained independence from the British Empire in 1948. During the post-colonial momentum, the country was challenged by housing shortages. In this momentum, a building society formed by a group of wives of public servants invited De Silva to develop an economic cooperative housing scheme in Watapuluwa, an area on the outskirts of Kandy. De Silva designed the masterplan of the scheme, encompassing two hundred and fifty houses—a novelty, for both the architect and the country (figure 6). De Silva described the project as such: "my problem was a challenging one — to house a varied group of individuals and families of differing incomes and backgrounds within the same development; and at the same time reducing costs to a minimum" (figure 7).³⁵

Like Jane Drew, Minnette De Silva was equally determined to focus on the users: "I made every effort to cater for the individual."³⁶ As a methodology, both architects promoted extensive consultations with the future residents, though De Silva went a step further and collected information through questionnaires. The inquiries, intended to personalize the mass scheme, ranged from families' income capability, sociocultural





- fig. 6 Watapuluwa housing scheme, Kandy, Sri Lanka. Superimposition of De Silva's masterplan with Google Maps. By the author.
- fig. 7 Watapuluwa housing scheme, Kandy, Sri Lanka. Photograph taken in 2023 by the author.

- Chanaka Talpahewa, "UN-Habitat Sri Lanka
 | Towards 'Housing for All' through Peoples'
 Participatory Process," https://unhabitat.lk/wpcontent/uploads/2020/10/WHD-PAPER-ARTICLE-BY-Chanaka-Talpahewa.pdf (2023–12–10).
- 38 De Silva, *The Life & Work*, 207.

fig. 8 Watapuluwa Housing Scheme, Kandy, Sri Lanka. Aerial photograph taken in 2023. By author. status, car usage, spiritual beliefs, preferable materials, cooking methods, and children's requirements. An example of a questionnaire is presented in De Silva's autobiography. After its analysis, De Silva called group meetings, divided according to housing cost, to discuss detailed aspects.

The outcome was a set of several housing plan typologies that each family could adjust according to their preferences. Moreover, it seems unlikely that De Silva designed and supervised the construction of all the plots, which opens the door for a self-built component. Consequently, no two houses are alike (figure 8). Thanks to all the preceding aspects, Watapuluwa was addressed as a pioneering project where, "for the first time in Sri Lanka, and perhaps in the world, an inclusive beneficiary participatory process/ approach was adopted in housing."³⁷ De Silva also recognized the originality of the initiative: "This project is really an early example of 'community architecture."³⁸

Nearly seven decades later, my recent fieldwork aimed to draw conclusions. Faced with the absence of archives or records, and relying solely on De Silva's elusive documentation found in her autobiography, the challenges are diverse, as it remains uncertain which houses were designed by De Silva. Through an examination of formal language, constructive details, and spatial grammar, I argue that certain houses





fig. 9 House by Minnette De Silva, Watapuluwa housing scheme, Kandy, Sri Lanka. Photograph taken in 2023 by the author.

39 Ibid., 219.

definitely bear the architect's signature (figure 9). However, it is equally apparent that participants who selected De Silva's layouts have often extended and transformed them. The total area underwent gentrification, erasing almost all traces of the original participants. It is also clear that, as land prices rose, plots were subdivided, and many houses were or are being unhesitatingly demolished, regardless of their patrimonial value.

Conclusion

Peons' Village and Watapuluwa are illustrative of two successful housing schemes designed with the effective inclusion of future inhabitants. In the final comments on De Silva's biography, she emphasized how "people seemed very happy there [...] a tremendous felicitous community spirit."³⁹ These aspects are precisely the ones that I felt the most during fieldwork, on my daily explorations of Drew's Peons' Village. In parallel, the attentiveness to climatic components, the seamless integration of local costumes and traditions into the housing design, the skilful management of a strict budget and available materials and manpower, as well as the sensitivity to comprehend and meet the future users' needs and aspirations, all played pivotal roles in the projects' accomplishment. These features, closely tied to the architects' individual design capabilities, deserve as much emphasis as their facilitation of the co-creation process.

Likewise, the methodologies and motivations driving Jane Drew and Minnette De Silva's creative processes should be situated within the evolving architectural framework of their era. Their practices were intricately woven into the emerging theoretical discourses being formed since the

- 40 Sherry Arnstein, "A Ladder of Citizen Participation," *Journal of the American Institute of Planners* 35, no. 4 (1 July 1969): 216–24.
- 41 Jennifer Mack, "Urban Design from Below: Immigration and the Spatial Practice of Urbanism," *Public Culture* 26 (19 December 2013): 153.

post-war period, claiming a more humane architecture. While Drew advocated for close engagement through consultations, probing into people's needs, habits, and cultural factors, promoting prototype construction to gather information to improve the designs, De Silva took a step further. After the groundbreaking use of questionnaires and more specific group meetings, she granted a level of design flexibility that allowed residents not only to plan but potentially even build their own houses. The distinctions between these two projects underscore that participation lacks a standardized procedure, an accepted version, or a one-size-fits-all methodology, as users and communities are never alike.

In line with this, it should also be acknowledged that the distinct approaches between Drew and De Silva are inherently tied to the scope of the projects. Despite having a similar number of plots, Drew was simultaneously assisting in the design of the entire city of Chandigarh. Moreover, unlike De Silva, who was engaging with her own people in her country, Drew navigated a social and cultural environment that differed from her own. Her willingness to improve the lives of the lower strata of Indian people by hearing, considering, and incorporating their opinions should be considered highly innovative.

In conclusion, both architects, with their distinct challenges and contexts, stand out for their groundbreaking efforts in their own right, especially considering that they occurred in the mid-1950s, a time when "human architecture" was just taking the first steps, and that participatory architecture only gained wide-ranging visibility in the 1960s. Aligning with the rungs of the "ladder of citizen participation," Drew and De Silva validated end-user inputs that influenced the built design.⁴⁰ Their commitment to "sensitive, piecemeal, and specifically participatory planning" diverged from the established "top-down" or "from above" approaches, seemingly reflecting the influence of the social sciences. ⁴¹

Lastly, these projects demonstrate how a participatory process, serving as the driving force behind co-creation, redefined the architect's role in the design process, utterly dissonant with that of the modern architect. In the proximity of the user, the architect evolved beyond a creator of form, becoming a plural and holistic facilitator within co-creation. In Watapuluwa, this transformation was so profound that the question of authorship, so dear to architecture, became inconclusive, underscoring the unpredictable nature of participation. Above all, Jane Drew and Minnette De Silva championed community architecture as a platform for collective engagement with the people, and as a tool to contribute to a more humane architectural practice.

Acknowledgements:

This paper is part of my PhD research, funded by a grant from the Portuguese Foundation for Science and Technology (FCT).