A Systematic Review and Comparative Policy Analysis of Sharing Cities and Their Urban Governance

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Abstract: Under the influence of technological advancement, digitalisation, and mobile networks, sharing has gained a new dimension in the contemporary era. In the context of rising consumption and economic pressures, the sharing economy has emerged as a global model to promote efficient utilization of limited resources. Recent controversies have questioned how sharing city practices are integrated into urban space and whether they enable the equitable use of underutilised areas. In this context, the "sharing city" approach has been adopted in many cities worldwide. This study explored how sharing practices shaped urban spaces and examined the role of city governments in this process. The research was designed in two stages. First, a systematic review of the Scopus database selected 499 publications from 2016 to early 2025, of which 61 met the inclusion criteria and were analysed to understand the spatial and social impacts of sharing city practices. Second, twelve global cities that adopted sharing city strategies were compared in terms of policy orientation and roles of governance. The analysis demonstrated that the sharing economy produced both enabling and constraining effects on cities, particularly in housing, mobility, and public space. City governments employing a range of regulatory, incentive-based, and partnership-oriented instruments assume different roles, depending on local urban characteristics. By combining insights from the literature and cross-case analysis, the study developed a governance framework that linked municipal roles to specific sharing domains and highlighted areas where equity and data governance remained weak. The findings provide practical guidance for municipalities seeking to balance innovation with regulation, thus offering implementable tools to integrate sharing practices into sustainable urban planning.

Keywords: Sharing economy; Sharing city; Urban space; City governance; Systematic literature review

1. Introduction

The phenomenon of sharing behaviour has been identified as a fundamental characteristic that emerged during the evolutionary development of human beings. In prehistoric societies, the fundamental need for survival led to the establishment of an egalitarian social order characterised by the principles of sharing and cooperation (Agyeman et al., 2013; Belezas & Daniel, 2023). The practice of sharing has been profoundly influenced by the advent of internet technologies in the late 20th century. Through digital platforms, the sharing economy has expanded collective consumption across multiple sectors, including tourism where sharing practices involve accommodation, vehicles, and travel (Bratianu, 2018) as well as industry, home maintenance, and financial services. These transformations have reshaped the role of urban centres, thus highlighting new forms of cooperation and business models.

In recent years, within the scope of the sharing economy, urban areas have been increasingly conceptualised as spaces of consumption, social activity, and interpersonal connection, while simultaneously being transformed into domains where technology and knowledge are integrated. In this regard, the sharing economy has not only evolved as a business model but has also assumed a significant role in the reorganisation of cities as spaces of sharing and collaboration. Consequently, in the planning of urban areas, city governance, particularly municipalities, plays a

crucial role in actively engaging with the sharing economy and promoting sharing practices and services that contribute to transforming cities into shared urban domains (Bernardi & Diamantini, 2018; McLaren & Agyeman, 2015; Salice & Pais, 2017).

Although the sharing economy has been widely discussed as an innovative business model, studies that examined its spatial and governance implications remained limited. Addressing this gap is essential to understand how sharing practices influenced the transformation of urban spaces and governance structures. In recent years, there has been a growing body of research focusing on urban applications such as tourism, accommodation, transportation, shared spaces, and product sharing (Quattrone et al., 2022; Salice & Pais, 2017; Salvia & Morello, 2020; Zhou et al., 2020), comprehensive analyses integrating all dimensions remain limited. However, when the impacts of these practices on urban space and city governance are jointly examined, they point to notable structural transformations. On the one hand, cities highlight gains such as resource efficiency, social interaction, and diversification of economic participation; on the other, risks such as regulatory gaps, spatial inequalities, and the privatisation of public space become increasingly evident. In this context, the present study addressed the conceptual development of sharing economy and its implications in urban areas through a multidimensional assessment framed by city governance and urban spaces.

This emerging field of inquiry was represented in the literature by a limited number of comprehensive studies. Nevertheless, the proliferation of sharing-based practices across global cities, particularly within rapidly transforming urban structures, necessitates new policy frameworks and intervention strategies. In this regard, the notion of the sharing city has been incorporated into the governance policies of certain municipalities, positioning city governance as active agents of transformation. The sharing city offers a governance framework that seeks to strengthen urban commons, particularly through shared spaces, practices of interaction, and mechanisms of exchange.

The primary aim of this study is to examine the conceptual development of the sharing economy and the "sharing city" approach, and to explore their implications for urban spaces, with particular attention to the role of city governance in these processes. The study seeks to provide a holistic assessment of the social, economic, and spatial impacts of sharing economy practices in urban areas, while also identifying the regulatory and guiding roles assumed by city governance. In this regard, the integration of the sharing city approach into urban policies, the spatial transformations of cities, and the role of sharing economies in the context of sustainable urban development are analysed, thereby contributing to the literature at both theoretical and practical levels. Accordingly, the study posed the following research questions (RQ): "RQ1: What are the spatial effects of sharing economies in cities?", "RQ2: What are the positive and negative social, spatial, and economic effects of sharing practices in urban areas?", "RQ3: How is the integration of the sharing city approach into cities ensured?", and "RQ4: What is the role of city governance to tackle the impacts of sharing economies on cities?". In terms of methodology, this study employed a systematic literature review (SLR) supported by a comparative analysis of global cases recognised as sharing cities. The SLR examined publications indexed in Scopus (2016–2025) to identify how sharing economies intersected with urban space and governance, while the comparative component explored how these ideas were implemented in practice across different contexts. The study was structured in six chapters. The first two chapters outlined the theoretical framework and described the methodological approach. Subsequently, the concepts of the sharing economy and the sharing city were examined through the existing literature, with a particular emphasis on their reflections in urban areas. Following this, case studies of selected cities were analysed, focusing on the roles of city governance within these processes. The final chapter provided an overall evaluation.

2. Method

The study was designed with two complementary methods structured in two stages. Stage 1 involved a systematic literature review, while Stage 2 consisted of a comparative analysis of sharing cities. Both methods were developed in line with the conceptual framework and the overall research scope.

Stage 1: Systematic Literature Review

A systematic literature review is defined as the methodology used to create the theoretical and scientific basis necessary to explain a topic, involving the collection, understanding, synthesis, and evaluation of a series of scientific studies (Crossan & Apaydın, 2010). The Scopus database was used in this study. The novelty and contemporaneity of the research topic constitute an important factor in defining the boundaries of the research database and the time frame of the study. Preliminary investigations before the SLR revealed that studies addressing the research questions and objectives began to increase starting in 2016. The search was limited to publications published from 2016 to March 2025 (inclusive) to ensure the occurrence of keywords and to enable synthesis of the required evidence. The publications included in the review were limited exclusively to journal articles and book chapters. Although no explicit language filter was applied (see Appendix Table A1), the search results were almost entirely composed of English language publications. Additionally, studies to which the full text could not be accessed were also excluded from the evaluation. The evaluated articles consisted of studies in which the selected keywords relevant to the research topic were examined together. Within this scope, the studies

assigned the highest relevance level (1 point) were classified as those conducted in the field of urban planning, in which three or more keywords were used in combination. Conversely, the studies assigned the lowest relevance level (5 points) were evaluated as those focusing solely on a single sharing application and falling outside the scope of the research field (Figure 1).
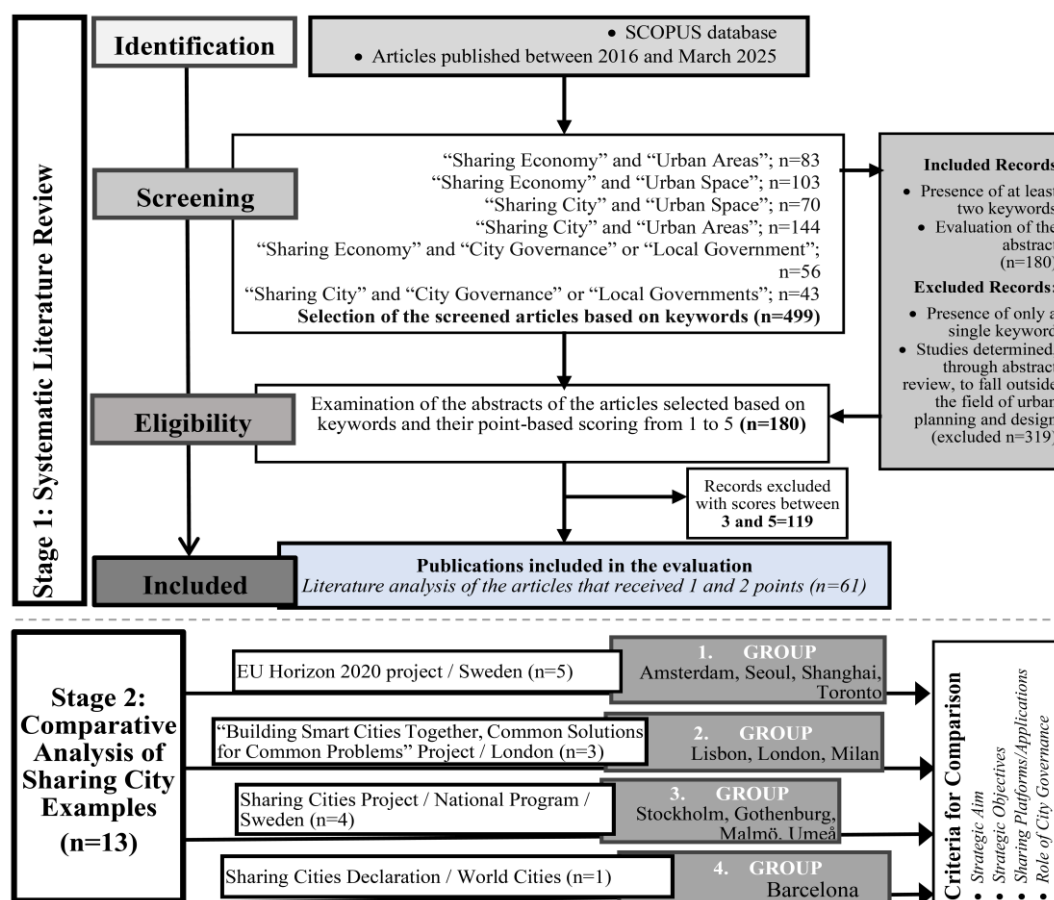

Figure 1. Flow diagram of systematic literature review (PRISMA 2020)

As outlined in Figure 1, the first step of the study involves the delimitation of the core concepts into paired groups, namely "sharing economy" or "sharing city" and "urban space" or "urban area" or "city governance" / "local government", followed by a comprehensive literature search ($n = 499$). In the second step, the collected studies were re-examined, taking into account the condition that the publications must contain at least two of the concepts examined in their keywords ($n = 180$). In the third step, the abstracts of the selected articles were reviewed and each was rated on a scale of 1 to 5 (Table 1). These studies within the scope of the research field were examined in terms of their abstracts, methodologies, and scope. At this stage, publications containing theoretical and analytical assessments that address RQ and discuss the concepts of the sharing economy, sharing cities, and urban governance were selected. Accordingly, publications awarded 1 point in the scoring system ($n = 35$) were defined as those that directly and comprehensively examined sharing practices in urban areas (RQ1, RQ2, RQ3, and RQ4). Publications scoring 2 points ($n = 26$) were identified as studies that conducted in-depth case analyses of specific sharing practices, excluding those that examined the sharing economy holistically (RQ1, RQ2, and RQ3). This distinction was made because the potential positive and negative effects of sharing economy practices have begun to emerge clearly in urban environments. For example, accommodation sharing platforms such as Airbnb have significantly impacted urban areas, necessitating regulatory interventions within the framework of city management. Similar examples identified in the field of study were considered important but were evaluated secondarily. Publications scoring 3 points were identified as those that directly examine the sharing economy but whose scope falls outside the context of cities and urban governance. Even if answers to RQ3 were found in these publications, they were not included in the review as they did not fall within the scope of the study. Publications scoring 4 points were those that addressed sharing economies sectorally and examined their structures in cities as a business model. Studies scoring 5 points were excluded from the evaluation because they were deemed methodologically and contextually unsuitable for the topic and scope of this research. In the fourth step ($n = 61$), articles rated 1 and 2 were subjected to an in-depth literature analysis, resulting in the selection of 61 studies

categorised as follows: "Sharing Economy" ($n = 55$), "Sharing City" ($n = 14$), "City Governance/Local Government" ($n = 16$), "Urban Space" ($n = 4$), and "Urban/City" ($n = 6$) (categories are not mutually exclusive; totals therefore exceed $N = 61$). The inclusion and coding results were double checked to ensure consistency, and any uncertainties were discussed among the authors before finalizing the dataset. Finally, in the last step, the findings were evaluated, and the results were presented.

Table 1. Criteria of the scoring system used in the systematic literature review

Scores	Criteria
1 point	Publications that theoretically and analytically evaluate the sharing economy, sharing cities, and city governance in an integrated manner (RQ1, RQ2, RQ3, and RQ4).
2 points	In-depth analytical case studies of specific sharing practices in urban areas (RQ1, RQ2, and RQ3).
3 points	Publications directly examining the sharing economy, with their scopes fall outside the context of cities and urban governance (RQ3).
4 points	Publications addressing sharing economies sectorally and examining their structure in cities as a business model.
5 points	Publications unrelated to the topic.

Stage 2: Comparative Analysis of Examples of Sharing Cities

In this stage, several sharing cities were examined to complement the systematic literature review and to provide concrete cases for comparative analysis. Twelve cities were selected based on both conceptual relevance and research feasibility. These cities have been widely recognized in international research projects and academic discussions on the concept of the "sharing city", and many have explicitly defined themselves as sharing cities. Their inclusion was motivated by the availability of reliable data, official reports, and project-based output documenting the development of sharing economy practices and governance strategies. This approach ensured that each case could be analysed with comparable sources within a consistent analytical framework. In this connection, the selected cities represent diverse geographical and governance contexts while collectively reflecting the most documented and policy-active examples of the sharing city approach.

The examined sharing cities addressed in this study consist of three cities from the London-led Sharing Cities project (Lisbon, London, and Milan), five cities from the Sweden-based project (Amsterdam, Melbourne, Seoul, Shanghai, and Toronto), four cities included in the Swedish national programme (Stockholm, Gothenburg, Malmö, and Umeå), and outside these initiatives, Barcelona, which adopted the Sharing Cities Declaration, amounting to a total of thirteen. Among the cases of sharing city to be considered within the scope of the projects, the city of Melbourne was not included in the evaluation due to the insufficient availability of reporting and related studies. In order to provide a comprehensive identification of the project cities, only its name was mentioned in the study. We therefore examined twelve cities, characterised by sustained sharing practices and active municipal support, selected on the basis of four criteria: (i) participation in recognised sharing-city programmes/declarations; (ii) availability of municipal and platform policy documents for 2012–2025; (iii) geographic spread; and (iv) policy-instrumental diversity to enable cross-context comparison (Table 2).

Table 2. Sharing cities examined within the scope of the study

Projects of Sharing Cities	Cities Studied in the Projects
EU Horizon 2020 Project Support / Sweden[1] *(Urban Sharing Sustainability, and Institutionalisation)*	Amsterdam, Seoul, Shanghai, Toronto
"Sharing Cities—Building Smart Cities Together: Common Solutions for Common Challenges" / London[2]	Lisbon, London, Milan
Sharing Cities Project / National Program / Sweden[3]	Stockholm, Gothenburg, Malmö, Umeå
The Sharing Cities Declaration / Signed by World Cities[4,5]	Barcelona

Note: [1]http://www.urbansharing.org/; [2]https://www.sharingcities.eu/; [3]https://www.sharingcities.se/; [4]https://www.sharingcitiesaction.net/; [5]70 cities that signed the Sharing Cities Declaration, "Barcelona adopted the Sharing City Declaration due to the need to enhance its economic structure and the inadequacy of city governance strategies in addressing issues such as social justice and environmental sustainability. In this respect, it differed from other cities and was therefore selected for this study".

At this stage, examples of sharing cities from different spatial and governance structures in the literature were comprehensively examined and evaluated through a comparative analysis. In the literature, sharing cities were viewed as introducing innovative and technological solutions to cities in developed countries, whereas applications in developing countries were considered a framework that contributed to the economic, social, and spatial development of cities. In order to prevent the uncontrolled spread of sharing applications in cities, city administrations are undertaking various interventions. These interventions vary according to the effects of sharing applications in the local structure. As there are no defined criteria in the structures of sharing cities yet, the cities examined in the project have different sharing characteristics due to the implementation of local interventions.

This situation plays an important role in the selection of sample cities in the study. The examination encompassed the systematic assessment of data regarding the objectives identified for each city, the strategic targets pursued, the sharing platforms implemented, and the roles assumed by city governance. The cities were classified according to international projects, national programmes, and declaration-based approaches, with particular attention to the spatial, administrative, and social impacts of the sharing economy. This method revealed the similarities and differences between cities and analysed how sharing economies were integrated into urban structures.

3. Literature Review: Sharing Economy and Sharing City

3.1 Sharing Economy

The emergence of the sharing economy is the result of various technological, economic, social, and environmental factors (Akbari et al., 2022; Botsman & Rogers, 2010; Gerwe, 2021). Today, peer-to-peer (P2P) sharing activity occurs through digital platforms rather than close relationship-based structures in previous periods (Cohen & Muñoz, 2016; Fors & Ringenson, 2023). With this transformation, the sharing economy encompasses the joint production, distribution, exchange, and consumption of goods and services among individuals, groups, and organisations. In this context, the sharing economy is the most commonly defined in the literature as a network of markets in which individuals use various forms of payment to redistribute and access privately owned resources (Boyko et al., 2017; Fors & Ringenson, 2023; Li et al., 2019; Pan & Qiu, 2022; Quattrone et al., 2022). Many activities of the sharing economy create value not only through the use of products and the satisfaction of individual consumer demands, but also by building social capital and community relationships (Bouncken et al., 2020; Plewnia & Guenter, 2017). The process that begins with the circular economy essentially promotes the reuse, recycling, and life extension of products, thereby reshaping industries globally and significantly reducing environmental impacts. By reintegrating goods and materials into the economy, the need for new resource extraction is reduced, and the carbon footprint of production processes is minimized (Verna et al., 2025). Based on this understanding, some researchers regarded the sharing economy approach as an important economic movement because it can lead to more sustainable lifestyles by generating economic value, uniting people to safeguard environmental resources, and fostering social capital (Botsman & Rogers, 2010; Fors & Ringenson, 2023; Plewnia & Guenter, 2017).

The development of Global Positioning System (GPS) technology and mobile applications has enabled companies across different sectors to seamlessly connect suppliers and consumers in the provision and consumption of digitally facilitated sharing services, thereby allowing the rapid rise of the sharing economy (Gerwe, 2021; Puschmann & Alt, 2016). This system is significant in that it possesses large service domains on a global scale (Ding et al., 2023; Ma et al., 2022; Pouri & Hilty, 2021; Quattrone et al., 2022). In this context, it is observed that the sharing economy enables the systematic lending and borrowing of goods, particularly among private individuals, through the sharing of underutilised assets for financial gain (Hofmann et al., 2022; Jonek-Kowalska & Wolniak, 2022; Lho et al., 2022).

The temporary sharing of underutilised physical resources in cities through digital platforms emerges as an alternative production-consumption model. In this context, it is observed that online systems contribute to the more efficient use of resources and to the support of social sustainability in urban life (Li & Shao, 2022; Muschter et al., 2022; Serrano et al., 2020). The sharing economy is an umbrella term that encompasses a variety of definitions and applications (Lho et al., 2022). In particular, sharing everyday items such as houses, vehicles, bicycles, and tools with strangers has become a practice that has spread rapidly in urban areas. This process relies on trust mechanisms offered by digital platforms rather than pre-existing social relationships. Thus, the sharing economy has reshaped interaction between individuals while placing cities at the centre of this transformation (Fors & Ringenson, 2023; Mont et al., 2019; Palgan et al., 2020).

In addition to applications distributed at the local, regional, national, or international levels, it is possible to develop sharing practices that define a geographical scale encompassing an existing community or neighbourhood. Sharing platforms can be created in such a way that they may be utilised or promoted by existing communities. For instance, a neighbourhood may decide to adopt a sharing platform to enable residents to access goods and services. This facilitates the exchange of products, services, and other resources among local inhabitants who may not otherwise interact with one another. As another example, a local sports club may use a platform to share sports equipment among its members, representing a form of communal sharing applicable to any community. For platforms that prioritise social and environmental values, designing them for or within an existing community increases the likelihood of success (Fors & Ringenson, 2023; Steven, 2020). Moreover, sharing platforms contribute to enhancing local interaction and re-establishing social connections among communities that are geographically dispersed (Boyko et al., 2017; Gussen, 2020; Jonek-Kowalska & Wolniak, 2022; Mont et al., 2020; Pouri & Hilty, 2021; Sanchez Vergara et al., 2021a; Santala & McGuirk, 2019).

Sharing platforms approach sharing as a practice within the sharing economy, rather than as a substitute for traditional industrial sectors. These platforms delineate sharing as a practice encompassing shared spaces, shared

mobility, shared goods, shared consumables, and shared resources (Oskam & Boswijk, 2016; Palgan et al., 2020; Steven, 2020). Shared spaces are characterised by the presence of standard sharing practices, including but not limited to waiting rooms, apartments, attic storage spaces, and parking spaces. The concept of shared mobility encompasses a diverse range of activities, including the utilisation of bicycles, automobiles, watercraft, and electrically powered scooters, with the condition that these assets are facilitated through a digital platform, thereby mediating the interaction between two or more parties. The concept of shared goods is a pivotal one in the economic analysis of durables and non-durables. These goods encompass a wide range of items, including clothing, furniture, sporting goods, home improvement products, luggage, consumer electronics, and other household goods (Steven, 2020). With the increased utilisation and dissemination of sharing platforms in the academic literature, their evaluation as a solution to urban sustainability problems has become a salient issue.

The first sharing platforms that emerged worldwide with the sharing economy encompass various types. Some of the earliest global platforms include Freecycle.org (2003), created for the donation and exchange of second-hand goods; Kiva (2005), launched to facilitate crowdfunding and peer-to-peer lending; Airbnb (2008), designed to provide paid access to private accommodation for housing needs; and Uber (2009), developed to enable the paid sharing of private vehicles for transportation needs. These constitute the pioneering examples of sharing platforms most frequently examined in the literature.

In general terms, while the sharing economy is becoming increasingly integrated into existing urban systems, it is also subject to criticism by institutions and actors with conflicting interests. Some actors attempt to steer the development of the sharing economy in line with their own interests, while others argue that it has adverse impacts and that its growth should be slowed down (Enochsson, 2021; Fors & Ringenson, 2023; Jonek-Kowalska & Wolniak, 2022). More recently, debates have emerged suggesting that the sharing economy has the potential to render cities more adaptive, responsive, and resilient, although the extent of this capacity remains uncertain (Palgan et al., 2020; Palm et al., 2019). It has further been suggested that, over the time, it may provide solutions to the unequal distribution of underutilised urban spaces. Academic studies on this subject revealed the existence of diverse strategic approaches, modes of intervention, and methods that addressed these issues in urban areas.

3.2 Sharing City

The sharing economy is defined as a socio-economic ecosystem in which individuals engage in social interactions and cooperation for economic transactions, such as purchasing or bartering (Lho et al., 2022). The integration of this socio-technical structure into urban life has transformed both economic models and spatial practices. In recent years, it has become an indispensable part of urban life, thus compelling cities to adapt to this model and to develop approaches for its integration. With direct influence of the sharing economy on urban economies and social structures, the concept of the "sharing city" has emerged (Salice & Pais, 2017). The ambiguous boundaries of the sharing economy and the rapid growth of its activities in urban areas have created the urgency to address its effects through a regulatory perspective. At this point, sharing cities provide a conceptual framework for explaining both the degree of participation by cities in the sharing ecosystem and the ways in which this participation is reflected in urban life.

The concept of the sharing city is defined in multiple ways within the literature. Some scholars regarded it as an urban structure in which equipment, space, energy, and knowledge were shared through both offline and online communities. A sharing city constitutes an urban project that organises new forms of sharing to serve the city and society (Sanchez Vergara et al., 2021b). Bernardi & Diamantini (2018) conceptualised the sharing city as a structure in which the sharing economy "converge[d] with urban development", whereas Vith et al. (2019) interpreted it as "a focal point of action and a central actor in the nature and organisation of the sharing economy". In addition, the notion of the sharing city intersects with the "smart city" paradigm in certain approaches. In this regard, the sharing city is conceived as an urban structure with a digital ecosystem, supported by digital infrastructures that facilitate social innovation and the sharing economy. A sharing ecosystem reinforced by digital development not only strengthens the smart city framework in urban areas but also enables the integration of technological capacity with social benefits (Bernardi & Diamantini, 2018).

McLaren & Agyeman (2015) regarded the sharing city approach significant for the revitalisation of urban commons and the transformation of city governance into a collaborative structure. Within this framework, the sharing city is understood as a model that seeks to reduce both spatial and social inequalities through the sharing of goods, services, experiences, information, infrastructure, and spaces. With these features, sharing cities have the potential to create more intelligent, more sustainable, people-centred, and resilient urban environments in the face of socio-economic crises (Bernardi & Diamantini, 2018).

The manner in which cities approach the sharing economy can be categorised in two distinct ways. Some cities adopt a passive stance, waiting for sharing initiatives to emerge and mature before offering support. In contrast, other cities take an active role by promoting, guiding, and supporting the sharing economy at the local level through practical applications and the development of strategies (Madran & Yakın, 2018). These approaches differ, depending on the economic and social structures of the cities in which they are implemented.

In the literature, sharing cities, which are defined in various ways, enable the development of alternative urban

policies that prioritise social equality. However, the boundaries of the concept in practice remain unclear, rendering sharing cities not only a vision with great potential but also an area requiring critical evaluation. Therefore, when it is addressed not solely from a technology-centred perspective but together with participatory, fair, sustainable, and context-sensitive policies, the sharing city approach provides a strong framework for the future of cities.

3.3 Sharing Economy and Sharing City in the Urban Context

Whilst the sharing economy and the sharing city share a similar conceptual foundation, the fundamental difference between them becomes evident in the diversity of actors and their relationship with the spatial context. The sharing economy is based on interactions among users, including providers and consumers, whereas sharing cities go beyond this structure by directly involving citizens, city governance, and other urban actors in the process (McLaren & Agyeman, 2015; Sanchez Vergara et al., 2021a). Consequently, the sharing city approach represents not only economic sharing but also a human-centred, participatory, and inclusive urban model. As emphasised in the study by Chan & Zhang (2019), while the sharing economy was largely shaped by digital platforms, the sharing city model was based on physical space and directly related behaviours, strategies, and practices that supported inter-community relationships to the urban context. Within this framework, spatial sharing becomes not only a domain for services but also a setting where social relationships and participatory practices are reproduced (Sanchez Vergara et al., 2021a).

A comprehensive review of the extant literature revealed that city governance emerged as a pivotal actor in the context of shared cities. This situation demonstrated that the approach under discussion was influenced not only by individual initiatives but also by multi-actor collaborations. The concept of a sharing city encompasses not only the sharing of services but also the collective implementation of urban governance. In this context, as stated by Sanchez Vergara et al. (2021a), they could be defined as structures that promoted participatory urban experiences formed through the collaboration of city governments, civil society, municipal units, and market actors.

The sharing economy and the sharing cities have much in common in terms of the locations in which these practices occur. A significant proportion of the extant literature on sharing cities focused on the sharing economy. In the paradigm of the sharing economy, urban space is conducive to economic, social, and environmental transformation (Agyeman & McLaren, 2017; Santala & McGuirk, 2019). Conversely, a significant proportion of critiques directed towards sharing economy platforms concentrated on the veracity of the purported positive social, environmental, and economic ramifications on urban areas. Furthermore, there are criticisms regarding the question of whether current sharing economy practices are consistent with the goals of sharing cities. For instance, the negative effects of accommodation platforms that contradict the fundamental principles of sharing, such as social justice and gentrification, are among the criticisms levelled (Barnes & Mattsson, 2016; Sanchez Vergara et al., 2021a). As a consequence of the literature review, the positive and negative approaches are compared in Table 3, which presents the findings obtained from the reviewed literature, as shown in Appendix Table A1 (*n* = 61).

The sharing city approaches hold significant potential for making cities more sustainable, fair, and inclusive. Nevertheless, current practices also entail various structural and governance-related challenges. The integration of advanced technologies and sustainable practices is transforming cities (Ulker Senkulak et al., 2025), and these transformations manifest in urban areas in different ways. As highlighted in the literature, the most frequently noted drawbacks included the deepening of socio-economic inequalities (Belezas & Daniel, 2023; Fors & Ringenson, 2023), incompatibilities with existing legal systems (Benli-Trichet & Kübler, 2022; Westerlund, 2020), gentrification and spatial conflicts (Ma et al., 2018; Zhou et al., 2020), digital divides (Ma et al., 2022), and threats to traditional sectors (Akbari et al., 2022; Liu et al., 2020). On the other hand, strong arguments existed in favour of the capacity of the sharing economy to support environmental sustainability, promote the efficient use of resources, and strengthen urban solidarity (Gussen, 2020; Ma et al., 2024; Seo & Lee, 2022; Zvolska et al., 2018). Building a sharing infrastructure and culture is one of the most important things cities can do to contribute to a fair and sustainable world (Hult & Bradley, 2017; Liu et al., 2025). In this context, sharing cities are seen as a tool that redefines common living spaces and transforms governance processes. The effectiveness of this transformation, however, can only be ensured through the integration of three essential elements: sustainable urban planning, aligning the sharing economy with legal and administrative frameworks, and strengthening social awareness by enhancing citizen participation. Cities must adopt citizen-oriented approaches in their governance and service provision, ensuring that digital systems prioritise transparency, accountability, and responsiveness to support sustainable urban development (Mutani et al., 2025). Urban sharing practices in sharing cities are considered to provide solutions to a wide range of global, economic, social, and spatial problems, including unsustainable overconsumption, social isolation, spatial inequalities, scarcity of resources and spaces, environmental degradation, and limited citizen participation (Palgan et al., 2021; Sanchez Vergara et al., 2021a).

Although spatial proximity and diversity are identified as fundamental conditions for the development of sharing practices (Widlok, 2020), it appears that a comprehensive and systematic definition of their impacts on urban space has yet to be established. Indeed, the ways in which different types of sharing, emerging at various scales and in diverse contexts, transform urban spaces that have not been examined in sufficient detail. Moreover, although urban spatial typologies such as parks, public spaces, co-housing, street event areas, and shared public amenities

have diversified, these formations still lack a universally accepted framework within the "sharing economy" or "sharing city" context (Santala & McGuirk, 2019).

Table 3. Impacts of positive and negative perspectives of sharing economy and sharing cities in the literature

Sharing Economy	Sharing Cities	References
Negative Perspectives		
• Expansion of sharing economy across urban sectors (transport, housing, and food) has intensified and complicated tensions in the existing socio-economic systems and infrastructures. • Sustaining collaborative governance is difficult due to the open and multi-stakeholder system structure of the sharing economy. • Whether the sharing economy offers concrete solutions to sustainability, climate change, and ecological preservation remains unclear. • Dominant actors on traditional sharing platforms can exacerbate social unsustainability through tax evasion, gentrification, social isolation, and exploitation. • Misalignment with existing systems and delayed legal frameworks disrupt stakeholders' economic and social relations. • Sharing economies can reshape class and production dynamics, worsen income inequality and working conditions, resulting in unemployment, and job insecurity. • For traditionally structured firms that lag in digital adoption, especially rental-based businesses, the sharing economy poses a competitive threat. • Development concentrates in advanced or fast-growing countries, while uptake and control remain limited in less developed or lagging regions.	• Definitions and documented urban impacts of sharing cities remain limited due to novelty, heterogeneous practices, and city-specific contexts. • Sharing practices may shape urban space, yet urban form can constrain their implementation and diffusion. • Sharing-economy applications can create property and ownership issues in cities. • Proliferating platforms reduce spatial demand for some traditional urban functions (e.g., factories, malls, and conventional offices). • Voluntary ethos of early sharing initiatives may erode under institutionalized "sharing city" frameworks. • Space-intensive sharing (accommodation and transport) can drive demographic shifts, gentrification, and heightened social tensions. • Unequal information and communication technology (ICT) access and use produce divergent urban-rural sharing-economy trajectories, reinforcing economic and spatial inequalities.	Akbari et al., 2022; Altinay & Taheri, 2019; Belezas & Daniel, 2023; Benli-Trichet & Kübler, 2022; Bocken et al., 2020; Chan & Zhang, 2019; Chen et al., 2019; Fiorentino, 2019; Fors & Ringenson, 2023; Huang et al., 2020; Jonek-Kowalska & Wolniak, 2022; Labaeye, 2019; Li & Shao, 2022; Ma et al., 2018; Ma et al., 2022; Mont et al., 2020; Muschter et al., 2022; Palm et al., 2019; Park, 2019; Pouri & Hilty, 2021; Salvia & Morello, 2020; Weber, 2024; Westerlund, 2020; Widlok, 2020; Zhou et al., 2020.
Positive Perspectives		
• Aligned with urban governance strategies, sharing-economy practices can deliver greener, more accessible, and more inclusive solutions for residents. • The sharing economy reshapes socio-economic relations and, through collaboration, is more productive in urban areas. • It enables innovative, collaborative governance for urban sustainability beyond traditional regulation. • It significantly helps deliver social and public services to disadvantaged urban groups despite legal and administrative constraints • They advance sustainability by lowering CO_2 emissions and improving the efficient use of idle resources • By fostering reciprocity and trust, sharing can rebuild community, boost interactions, and mend fractured relationships. • Efficient urban resource use through sharing reduces consumption and creates added value. • Sharing economies can drive inclusive growth and support more transparent, equitable regulation- especially in developing countries. • Sharing activities expand access to diverse goods and services across scales and distances, widening overall service reach.	• Sharing practices in sharing cities help reduce carbon emissions and resource intensity. • Integrating non-economic social sharing with market sharing can advance more sustainable urban societies. • By mobilizing citizen participation, sharing cities can curb rapid consumption and overuse of natural resources under global urbanization. • Promoting fair and sustainable development, renews infrastructure, and strengthens social welfare within existing systems. • Enhancing urban sharing effectiveness supports sustainable development by revitalizing underperforming areas and reusing underutilized buildings.	Akbari et al., 2022; Belezas & Daniel, 2023; Benli-Trichet & Kübler, 2022; Bernardi & Diamantini, 2020; Boyko et al., 2017; Ferreira et al., 2019; Fors & Ringenson, 2023; Gussen, 2020; Huang et al., 2020; Innella et al., 2024; Jonek-Kwolska & Wolniak, 2022; Labaeye, 2019; Liu et al., 2020; Liu et al., 2025; Ma et al., 2018; Ma et al., 2024; Moon, 2017; Palm et al., 2019; Palgan et al., 2021; Peltomaa & Tuominen, 2022; Puzio, 2024; Quattrone et al., 2022; Reddick et al., 2020; Salvia & Morello, 2020; Sanchez Vergara et al., 2021a; Seo & Lee, 2022; Wruk et al., 2019; Zvolska et al., 2018.

This theoretical gap underscores the importance of micro-level analyses that seek to understand how and why sharing practices emerge in specific spaces. Consequently, there is a necessity for studies that evaluate the relationship between the sharing economy and physical space, not only in the context of technical infrastructure, but also in social, cultural, and symbolic contexts. In this framework, the remainder of the article will analyse the spatial and social impacts of sharing city applications through examples of different selected cities. This will provide an original assessment of the practical implications of theoretical discussions in local contexts.

4. Comparative Analysis of Sharing Cities

There are two notable aspects of the relationship between sharing and urban space. Sincere forms of sharing have been demonstrated to engender trust and equality. Furthermore, encounters have been shown to facilitate permeability in spatial areas (Widlok, 2020). The relationship between the sharing economy and the utilisation of urban spaces was first examined during the process of studying sharing cities. A review of the extant literature revealed that all sources evaluating the sharing city approach assessed it through examples of cities around the world that have implemented this approach as a project on their own. In this context, the processes through which city management policies, sharing platforms, and spatial sharing activities are designed have begun to be defined.

In recent literature reviews on the subject of sharing city projects, city governance has been promoting themselves as "sharing cities", and the number of model cities worldwide is increasing. In this field, numerous international and national projects are being carried out within the scope of many cities and city networks on a global scale. At the same time, alliances of sharing cities have also been established. City governments can assume a variety of roles by monitoring and regulating the activities of sharing economy platforms, actively participating in sharing initiatives, encouraging them, and initiating them. However, with some notable exceptions, a clear picture still does not exist regarding how sharing and the sharing economy are interpreted by city governance, how such interpretations affect governance strategies, and how these interpretations influence management approaches. In light of this uncertainty, an assessment was conducted within the scope of the study, drawing upon resources obtained from sharing city projects, as shown in Table 4 (Bernardi & Diamantini, 2018; Bocken et al., 2020; Enochsson, 2021; Jo, 2021; Jo et al., 2021; Lee et al., 2020; Leonette et al., 2021; Li et al., 2019; Mont et al., 2019; Mont et al., 2020; Näslund et al., 2021; Palgan et al., 2020; Salice & Pais, 2017; Salvia & Morello, 2020; Sanchez Vergara et al., 2021b; Steven, 2020; Tartari, 2021).

Firstly, examples of sharing cities were examined within the framework of a Sweden-based project supported by the EU Horizon 2020 programme, which jointly considered cities of Amsterdam, Melbourne, Seoul, Shanghai, and Toronto. The project involved an investigation of the named cities as a collective. The common objectives of all cities are to ensure environmental sustainability, support economic development, and sustain urban development through ecological approaches. Given the heterogeneity in urban characteristics and management styles, there is a divergence in the utilisation of sharing applications and process management. In the context of effective city governance and the provision of essential support, the establishment of sharing platforms that are tailored to the unique requirements of the community is of paramount importance. A comprehensive analysis of the characteristics of urban spaces, social structures, and citizen participation and demands has been conducted, providing a detailed overview of the current state of affairs. Conversely, the utilisation of shared vehicles and bicycles is prioritised and developed in all urban areas, with the overarching objective being environmental sustainability (Group 1 in Table 4).

Secondly, the cities of Lisbon, London, and Milan were examined within the framework of a London-based project conducted under the motto, "Building a Smart City Together, Common Solutions for Common Problems". The objective of this project is to encourage the evolution of these cities towards becoming competitive, innovative, and socially inclusive, with social participation as a priority. In light of the prevailing prioritisation of social structure, the establishment of shared platforms has emerged as a matter of priority in urban areas. Priority has been given to community-based applications where all sharing platforms are integrated, access to all data systems related to the city is available, and active public participation is ensured. Notwithstanding, there are also sharing applications that aim to prevent unemployment by creating different job sectors (Group 2 in Table 4). The expanded table can be found in Appendix Table A2.

In the examined cases, it has been determined that sharing economy approaches exhibit both similarities and differences among cities. Cities such as Amsterdam, Seoul, Lisbon, and London adopt innovation, sustainability, and citizen participation as common objectives. In this context, they aim to strengthen social inclusiveness, enhance energy efficiency, and ensure the effective utilization of resources. In these cities, the sharing economy is implemented through a governance model supported by municipalities and city administrations, while also promoting social participation. In cities such as Milan, Malmö, Gothenburg, and Umeå, social justice, community-based participation, and sustainable consumption come to the forefront. In these cities, the sharing economy is associated not with economic gain but with social solidarity, environmental responsibility, and the shared use of common spaces. Shanghai and Toronto demonstrate similarities in their objectives of economic development, digital infrastructure, and innovative growth. They regulate sharing practices as part of the economic system and ensure integration with private sector- supported platforms. The cities of Stockholm and Gothenburg, on the other

hand, display a shared environmental approach through practices focused on environmental sustainability and reduction of consumption. Barcelona, however, differs from these cities in that it addresses the sharing economy within a restrictive and regulatory framework, to introduce rules and limitations to ensure fair competition, prevent labour exploitation, and reduce negative impacts on the housing market. Therefore, most cities develop the sharing economy on the basis of innovation, sustainability, and social inclusiveness, whereas Barcelona, due to social justice concerns and weaknesses in its economic structure, adopts an approach that prioritises regulation and control.

Table 4. Comparative analysis of examples of sharing cities

	City	Aim	Strategic Objectives
Group 1	Amsterdam	To become an innovative, inclusive, and sustainable city that supports entrepreneurship and adapts regulations to strengthen the sharing economy	• Strengthen inclusion and sustainability via innovation • Support entrepreneurship • Scale the sharing economy citywide • Ensure accessible and inclusive services • Update laws and regulations
	Seoul	To establish an ecological framework within which the sharing economy can evolve organically (Seoul Metropolitan Government Ordinance on the Promotion of Sharing)	• Develop infrastructure • Promote economic growth • Ensure citizen participation
	Shanghai	To contribute to national and regional economic development, and to achieve innovative and low-carbon sustainable growth	• Develop the economy through the support of sharing-economy initiatives • Regulate legal and administrative decisions to ensure the integration of the sharing economy
	Toronto	To integrate the sharing economy into sustainable environment and urban development in line with long-term strategies	• Support sharing practices that can directly influence urban spaces beyond small-scale sharing platforms, physical product exchanges, and nonprofit business activities
Group 2	Lisbon	To be sustainable, competitive, participatory, creative, innovative, and citizen-oriented	• Provide smart living services • Support entrepreneurs • Take measures on energy efficiency, mobility, and social cohesion
	London	To transform neighborhoods and communities, regulate infrastructure, provide public services, and strengthen the city's economy	• Ensure active citizen participation • Develop digital infrastructure • Achieve accessibility and sustainability
	Milan	To conceive structural rethinking and strengthening of the relationship between economy and society, based on the creation of social bonds as the foundation of economic transformation	• Institutionalize participatory governance and co-decision within a durable institutional framework • Leverage urban idle capacity to enhance spatial efficiency while supporting social enterprises and the local sharing ecosystem
Group 3	Stockholm	-	• Adopt an environmental sustainability-oriented approach • Reduce consumption
	Gothenburg	To reduce the environmental impacts of consumption	• Increase the effectiveness of the sharing economy in the city as part of a solution for sustainable consumption
	Malmö	To ensure social justice and equality, and to address unemployment	• Achieve social justice and equality, • Address unemployment through the integration of sharing economies
	Umeå	To ensure planned development in environmental, social, cultural, and economic dimensions	• Support the local sharing ecosystem and entrepreneurs by focusing on innovative solutions for shared mobility, green spaces, resource efficiency, and sustainable consumption
Group 4	Barcelona	To eliminate unfair competition, reduce labor exploitation, mitigate rising housing pressures, and prevent urban gentrification	• Introduce restrictions and new regulations to mitigate the negative effects of the rapid spread of the sharing economy in the city

A general evaluation of the examined examples of sharing cities revealed the existence of both common trends and differentiated forms of implementation in the strategic approaches of cities towards the sharing economy. A notable commonality across these cities is the strategic positioning of the sharing economy as a catalyst for achieving objectives such as sustainability, digitalisation, and efficient resource utilisation. It is evident that practices such as electric vehicle and bicycle sharing, accommodation platforms, shared use of public spaces, and

physical product sharing are implemented in similar ways in many cities. Furthermore, in metropolitan areas such as Amsterdam, Toronto, Seoul, and Gothenburg, city governances have assumed a variety of multifaceted roles, including those of owner, provider, regulator, and investor. This phenomenon is indicative of the governance dimension of the sharing city approach.

These patterns showed that the variations observed among cities were not coincidental but arose from deeper structural and governance factors. The differences are largely influenced by the prevailing governance traditions, the balance between state-driven and participatory approaches, the maturity of institutional systems, and the level of municipal autonomy. Cities with well-established welfare-state legacies, such as the Nordic cases, tend to implement sharing practices through collaborative and data-oriented partnerships. In contrast, cities where housing pressures or economic informality are more visible, such as Barcelona and Lisbon, approach sharing through regulatory measures combined with socially oriented governance initiatives. Overall, these findings suggested that the diversity across cases resulted from structural and cultural contexts determined how sharing themes were managed rather than from the thematic domains themselves.

5. Role of City Governments in Sharing Cities

Debates on digital transformation and urban governance provide an important foundation for understanding the role of the sharing economy in cities (Palgan et al., 2021). The advent of the sharing economy has given rise to a variety of perspectives not only on its development as an economic activity, but also on the role of cities as venues for sharing and collaboration (Bao et al., 2020; Bernardi & Diamantini, 2018; McLaren & Agyeman, 2015). The majority of studies included in the present literature review addressed the spatial impacts of sharing economy platforms and their positive contributions to sustainability. It is emphasised that the sharing paradigm should not remain confined to bicycle-sharing applications or other accommodation policies, such as Airbnb, but should be expanded to encompass the city as a system in all its dimensions (Gussen, 2020; Hult & Bradley, 2017; Labaeye, 2019; Ma et al., 2018; Mont et al., 2020; Palm et al., 2019).

City governances assume a balancing role in response to increasing demands. From an urban perspective, the governance approaches of the sharing economy vary across geographical contexts. These variations primarily depend on the sustainability challenges faced by different cities and the objectives they pursue (Innella et al., 2024; Ma et al., 2022; Mont et al., 2020). Labaeye (2019) emphasised that the sharing of entire cities would become the "guiding cities" for future urban development. This assumption supports the transformation of city governments from their current regulatory role to one that facilitates citizens' direct participation in governance, and the need to redesign the city as a "shared asset". In the contemporary context, cities are undergoing a transformation, with shared assets (including infrastructure, resources, and spaces) emerging as a key feature of this shift. This phenomenon is particularly pronounced in the densely populated world cities nowadays, as the increasing impact of digital technologies plays a pivotal role in this process (Gussen, 2020). Table 5 presents the relevant data, which summarize the findings from the reviewed literature as shown in Appendix Table A1 ($n = 61$). In order to ensure environmental and social sustainability in urban areas, it is imperative to regulate innovations in urban service areas that emerge in the context of the sharing economy at the local level (Peltomaa & Tuominen, 2022).

A plethora of studies in the extant literature have emphasised the structural problems caused by multiple factors arising from the development of the sharing economy in urban areas. These problems cannot be solved by a single actor (Ma et al., 2018). Therefore, it is emphasised that multi-stakeholder collaboration is required (Cao et al., 2023; Chamusca et al., 2019; Ma et al., 2018; Mont et al., 2020; Palm et al., 2019; Peltomaa & Tuominen, 2022; Zhang, 2019). Whilst both top-down and bottom-up governance approaches have their place in specific sharing contexts, the systematic structure that addresses cross-sectoral and cross-level collaborations between city governments, communities, and the companies/platforms that together constitute the sharing economy is lacking in urban contexts.

City governments have limited mandates over infrastructure, private initiatives, and services. In order to address these challenges, city governments must establish partnerships between public, private, and non-profit organisations, and actively participate in governance processes such as network-based decision-making (Palm et al., 2019). Moreover, the inherent multi-stakeholder characteristics of the urban sharing economy enable cities to adjust their visions and urban infrastructures in line with activities of the sharing economy by directing various sharing innovations once collaborative governance is implemented (Cao et al., 2023; Ma et al., 2018). In the literature, a broad range of municipal roles was defined based on application experiences at the city level. Vith et al. (2019) classified public governance strategies for the sharing economy as promotion, regulation, information, partnership building, alignment, expert knowledge, technology, and provision. Palgan et al. (2020) summarised municipal roles in sharing cities under four headings: city as a regulator, city as an enabler, city as a provider, and city as a consumer. According to this framework, city administrations can assume the functions of regulation, facilitation, collaboration, self-governance, and supply provision. Furthermore, it is necessary to identify the shareable assets of a city, reorganise all operations and policies in line with sharing approaches, and develop indicators appropriate to the vision of the sharing city (Agyeman & McLaren, 2017).

Table 5. Relationship among the sharing economy, urban governance, and urban space

Economic Impact	Social Contributions	Sustainable Environment
City Governance		
• Development of funding/credit systems by state or city governance	• Maintaining a fair and collaborative economic model • Creating a sharing infrastructure and culture • Active and strategic stakeholders • Network-based decision-making processes, involving public, private, and non-profit sectors • Community representation • Promotion of fair competition • Shaping consumption habits	• Regulating governance strategies • Setting sustainability goals • Integrating sharing platforms into policies and legislation • Formulating and implementing complex cross-cutting issues such as sustainability, circular economy, sharing, and experiential models • Integrating sustainable socio-ecological systems • Establishing the spatial infrastructure of sharing (shared mobility, shared utilities, public libraries, etc.)
Use of Urban Space		
• Sectoral diversity in urban areas (accommodation, mobility, and food) • Informal economy • Support for technological development • Collaborative consumption	• Shared cities (infrastructure, resources, and spaces) • Transformation of civil societies and human settlements • Reducing social inequalities • Refugee crisis • Improving living environments and fostering an integrated urban fabric • Urban image • Guiding urban renewal (accommodation, mobility, and reorganization of public spaces) • Place-based and community-specific transformations • Support for urban sharing practices • Establishing a healthier and more controlled urban food chain • Integrating urban safety and crime rates into urban planning within the sharing economy framework	• Limiting urban mobility (supporting clean energy and optimizing transportation resources) • Climate change • Smart services • Encouragement of active use of public space • Effectiveness during disasters such as severe pollution and pandemics • Reducing carbon emissions in urban areas • Reusing and repurposing idle and underutilized resources • Promoting joint uses to reduce environmental impact

In light of the global proliferation of the sharing economy, policymakers and public sector actors are confronted with challenges that are both unprecedented and closely linked to the emergence and rapid growth of this new economic paradigm. These challenges have given rise to governance concerns across multiple levels. Certain commercial sharing practices have resulted in complications, primarily due to their non-compliance with prevailing regulatory frameworks. The blurring of boundaries between producers, consumers, and workers, as a result of product demand, consumption patterns, and sharing platforms, complicates the enforcement of existing regulations. One example of this complexity is the ongoing debate over whether Uber drivers should be classified as employees. Governance gaps also stem from the fact that technological developments advance more rapidly than legal reforms, and from the emergence of unforeseen applications (Benli-Trichet & Kübler, 2022; Vith et al., 2019; Wegmann & Jiao, 2017). In some cities, sharing economy activities are not considered significant public policy issues requiring intervention. This has led governments or local authorities to take no concrete action (Benli-Trichet & Kübler, 2022). In order to ensure the participation of city governments in the sharing economy, five different types of governance have been defined according to the type of capacity that cities can have or take in different environments (Mont et al., 2019; Palm et al., 2019):

- Self-governing: Municipalities use their institutional capacity to manage their own activities.
- Governing by provision: Governance based on the role of the municipality as a provider of various goods and services.
- Governing through authority: Governance directed by a central authority with the power to mandate specific behaviors and impose sanctions in cases of non-compliance.
- Governing through enabling: Governance that involves the municipality using incentives such as subsidies, awareness campaigns, and facilitation of different types of initiatives to encourage and persuade desired behaviors.
- Collaborative governance: Governance characterized by partnerships based on an equal relationship between city governance and other actors.

Although sharing practices in cities extend far beyond institutionalised sharing economy models, for instance, through the emergence of cooperatives enabling the collective use of infrastructure, services, and environmental resources (Seo & Lee, 2022), the implementation of sharing-based projects such as mobility plans, community gardens, and shared public spaces still requires city governments to acknowledge and actively utilise sharing economy platforms (Sanchez Vergara et al., 2021b). City governments should focus their policies and regulations on achieving sustainability and promoting positive social, economic, and environmental outcomes. In this way, they can provide enabling and facilitative policies in cities, thereby encouraging actors to participate actively in the market of the sharing economy (Akbari et al., 2022; Connolly, 2020).

The academic literature emphasised that sharing economy practices which have been primarily developed in technologically and economically advanced countries should also be effectively expanded to developing nations and other cities. As observed particularly in the examples of sharing cities examined within the scope of the research, significant differences emerge in the strategies and practices of sharing cities. In developing countries, the sharing economy is supported not only as a means of economic development but also as a tool for achieving sustainable and inclusive development with social objectives. Furthermore, in these contexts, the sharing economy provides affordable access to goods and services such as cars, houses, facilities, and tools, which might otherwise be excessively expensive in a regular market. At the same time, it is also regarded as an important factor in reducing overall consumption (Moon, 2017).

City governance should move beyond the conventional roles associated with the sharing economy. In this context, city governance should not only act as a rule-setting authority but also assume the role of a "network governor" that ensures data governance, manages digital platforms, and coordinates multi-actor collaborations. This role enables cities to integrate data emerging from different sharing domains (such as mobility, accommodation, and public spaces), develop intelligent decision-making mechanisms, and continuously update their policies. In addition, as a result of the evaluations, the role of city governance as a co-producer also comes to the forefront. In this approach, city governance can collaborate with community initiatives, local enterprises, and digital platforms to participate in production processes, thus ensuring citizen involvement in the design of urban services. In this way, the social dimension of the sharing economy is strengthened, and citizens become active participants in the governance process.

As shown in the literature, governance interventions to regulate sharing practices in urban contexts cannot be applied through a single and uniform model. City governments therefore need more adaptive and flexible approaches that encourage innovation and allow timely responses to emerging challenges. Given the rapidly changing nature of the sharing economy, such adaptive frameworks, through pilot projects or temporary permits, can support experimental initiatives while enabling the early identification of potential risks such as housing crises or safety issues.

Building on this perspective, systematic literature reviews and comparative city analyses reveal that the integration of the sharing city approach into urban systems is ensured through four mutually reinforcing mechanisms: (i) regulatory and policy adjustments, (ii) digital infrastructures that enable resource exchange, (iii) municipal coordination structures, and (iv) multi-stakeholder participation processes.

In conclusion, it is evident that city governance holds a decisive role in the development of the sharing economy. Through legal regulations, taxation mechanisms, prohibitions, and policy instruments, they guide this process at times restricting certain practices, while at other times promoting their diffusion and supporting specific sharing organisations. In this context, the establishment of public–private partnerships and the balancing of competitive pressures in the market can contribute to a more sustainable functioning at the urban scale. However, for these objectives to be realised, city governance must develop cooperation with different social actors and focus not only on the initiatives themselves but also on strengthening institutional and legal frameworks. By doing so, it will be possible to enhance trust in the sharing economy and institutionalise this model in urban areas in a more effective and sustainable manner.

6. Discussion and Conclusions

In the past decade, the sharing economy emerged not only as an alternative economic model on a global scale but also as a socio-spatial paradigm that reshaped urban transformation. Facilitated by digital platforms, it has altered the ways individuals access goods and services, created new configurations in the use of urban space, and transformed the delivery of public services and the dynamics of social interaction. This transformation should be understood not only as an economic restructuring but also as a multi-layered process that requires analysis in terms of spatial justice, governance, social interaction, and sustainability.

The idea of the "sharing city" builds on this trajectory but goes beyond the exchange of goods and services by treating urban areas as shared commons. In principle, this vision requires active participation of citizens as users, producers, decision-makers, and regulators. In practice, however, citizen involvement often remains limited. Instead, the direction of sharing practices is shaped largely by technology firms and public authorities, which raises concerns about market-oriented framings and weak civic participation. The literature further pointed to structural

problems that no single actor could resolve, in order to highlight the need for collaboration across governments, platforms, and communities. Yet, institutionalised structures that enable such cross-sectoral and multi-level cooperation remain scarce.

As sharing practices expand into housing, mobility, and other sectors, they increase the complexity of urban economies and infrastructures. Their wider impacts are still evolving, so the design of new policies and strategies are considered essential. Evidence showed that success depended heavily on adopting principles of collaborative governance. Developed cities often manage this with more strategic policies and stronger institutional support, while in many developing cities, the sharing economy grows in fragmented or market-driven forms and may aggravate urban poverty or exclusion. In this context, city governments must adopt key principles of governance, digitalization, sustainability, and social inclusiveness to effectively regulate and integrate sharing economy practices into urban systems.

Interactive decision-making processes should be established among public authorities, the private sector, civil society organizations, and citizens. Developing institutional frameworks that bring together different stakeholders of the sharing economy is crucial in this regard. Accordingly, local administrations should act as coordinators of data governance, digital platforms, and multi-actor collaborations. This would enable the monitoring of sharing activities within cities, the establishment of data-informed decision-making mechanisms, and the continuous adaptation of policies in response to evolving urban needs.

However, one of the main challenges to the development of sharing economy practices in cities lies in the rigidity of legal and administrative frameworks. Therefore, city governments must ensure that existing legislation can adapt to the fast-changing and dynamic structure of digital sharing platforms. As a solution, flexible and experimental regulatory models based on pilot projects can be developed to test innovative policy approaches. Moreover, fostering public–private partnerships can help ensure that sharing economy initiatives are institutionalized not only within market-oriented frameworks but also with a focus on public interest.

From both economic and social perspectives, the sharing economy should be regarded as a policy domain that strengthens urban solidarity and community-based production. City governments should take on a co-productive role by collaborating with community initiatives, local enterprises, and digital platforms, thereby promoting citizens' active participation in the design and delivery of urban services. At the same time, spatial planning processes should be aligned with the principles of the circular economy to enhance resource efficiency, reduce carbon emissions, and contribute to urban sustainability.

All these policy measures should be addressed within an integrated framework consistent with environmental, social, and economic sustainability principles. City governments must also develop preventive strategies against potential negative impacts of sharing practices, such as pressures of the housing market and labor exploitation while ensuring fair competition, strengthening social equity, and promoting spatial justice. Furthermore, combating climate change, reducing carbon emissions, and improving energy efficiency should be placed at the core of sharing economy policies. By doing so, cities can approach the sharing economy not merely as an economic model but as a comprehensive and sustainable urban transformation strategy.

The literature also pointed to the potential of sharing to rebuild collective cultures, trust-based relations, and local solidarity. To realise this potential, cities must act not only as regulators but also as visionary actors by building sharing infrastructures, supporting these practices with policy indicators, and adopting a long-term public interest perspective. As a practical step, monitoring a core set of indicators such as short-term rental intensity and affordability, public-space co-use, shared-mobility uptake by income groups, platform compliance and the coverage of community-based infrastructures can make policies more trackable. The main contribution of this study is to propose a transferable governance framework that connects specific policy instruments across the domains of mobility, housing, public space, and digital platforms, implying that city administrations can perform more effectively in the inclusive and innovative roles outlined above, in addition to their regulatory, enabling, and investing functions.

This framework enables comparative and context-sensitive assessments of how sharing practices can be steered toward sustainability. In practice, cities that combine regulatory measures such as limits on short-term rentals and data-sharing requirements with enabling tools such as open-data platforms, civic partnerships, and shared infrastructure are better positioned to align sharing initiatives with equity and resilience goals. In conclusion, the impacts of the sharing economy in cities are shaped by contextual conditions, governance structures, regulatory environments, and levels of civic engagement. When well designed, such structures can contribute to social equity, spatial justice, and environmental sustainability. The realisation of this potential depends on comprehensive legal frameworks, active citizen participation, and integrated governance systems. Future research should examine how these processes unfold in different local contexts, assess their impacts across various city typologies, and identify which governance models yield more successful outcomes through comparative analysis.

Author Contributions

Data Availability

Not applicable.

Conflicts of Interest

The authors declare no conflict of interest.

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Appendix

Table A1. Publications evaluated in the literature review (*n* = 61)

No.	Author/Year	Evaluation Score
1	Akbari et al., 2022	2
2	Altinay & Taheri, 2019	2

3	Bao et al., 2020	1
4	Barnes & Mattsson, 2016	1
5	Belezas & Daniel, 2023	1
6	Benli-Trichet & Kübler, 2022	1
7	Bernardi & Diamantini, 2020	1
8	Bocken et al., 2020	2
9	Bouncken et al., 2020	2
10	Boyko et al., 2017	1
11	Cao et al., 2023	1
12	Chamusca et al., 2019	2
13	Chan & Zhang, 2019	1
14	Chen et al., 2019	1
15	Connolly, 2020	2
16	Ding et al., 2023	2
17	Ferreira et al., 2019	2
18	Fiorentino, 2019	1
19	Gerwe, 2021	2
20	Gussen, 2020	1
21	Hofmann et al., 2022	2
22	Huang et al., 2020	1
23	Hult & Bradley, 2017	1
24	Innella et al., 2024	1
25	Jonek-Kowalska & Wolniak, 2022	1
26	Labaeye, 2019	1
27	Lee et al., 2020	1
28	Lho et al., 2022	2
29	Li et al., 2019	2
30	Li & Shao, 2022	2
31	Liu et al., 2020	1
32	Liu et al., 2025	2
33	Ma et al., 2024	2
34	Ma et al., 2022	1
35	Ma et al., 2018	1
36	Mont et al., 2020	1
37	Moon, 2017	1
38	Muschter et al., 2022	1
39	Oskam & Boswijk, 2016	2
40	Palgan et al., 2021	1
41	Palm et al., 2019	1
42	Pan & Qiu, 2022	2
43	Park, 2019	1
44	Peltomaa & Tuominen, 2022	2
45	Pouri & Hilty, 2021	2
46	Puzio, 2024	2
47	Quattrone et al., 2022	2
48	Reddick et al., 2020	1
49	Salvia & Morello, 2020	1
50	Sanchez Vergara et al., 2021a	1
51	Santala & McGuirk, 2019	1
52	Seo & Lee, 2022	2
53	Serrano et al., 2020	2
54	Westerlund, 2020	1
55	Weber, 2024	2
56	Wegmann & Jiao, 2017	2
57	Widlok, 2020	1
58	Wruk et al., 2019	1
59	Zhang, 2019	1
60	Zhou et al., 2020	1
61	Zvolska et al., 2018	2

Table A2. Comparative analysis of cases of sharing cities

City	Aim	Strategic Objectives	Sharing Platforms/Applications
Group 1 Supported by the EU Horizon 2020 Project / Sweden			
Amsterdam *(Amsterdam*	To become a city that fosters innovation while	• Strengthening social inclusion and sustainability through innovation;	ShareNL (Information and networking organization),

became the first European "Sharing City" in 2015, initiated by shareNL, an information and networking organization.)	ensuring social inclusiveness, sustainability, and supporting entrepreneurship. To stimulate the sharing economy, ensure that it serves all citizens, and adapt rules and regulations accordingly. *(Sharing Economy Action Plan, 2016)*	supporting entrepreneurial activities. • Invigorating the sharing economy citywide and ensuring accessible, inclusive service for all citizens. • Adapting / updating existing laws and regulations in parallel with the transformation required by the sharing economy (Sharing Economy Action Plan, 2016). • Strengthening institutional cooperation with shareNL aimed at increasing information and networking capacity.	Electric scooter sharing, Electric bike sharing (OV-fiets), Car sharing (Snappcar, MyWheels, Green Wheels, ConnectCar, Buurauto, Car2Go, Peerby), Physical product sharing, Accommodation sharing (Airbnb, Felyx, Urbee, Seats2meet, Booking.com, HomeExchange), Food sharing platform (Thuisafgehaald).
Seoul *(Seoul became the first city to define itself as a "Sharing City" in 2012.)*	To establish an ecological framework within which the sharing economy can evolve organically (*Seoul Metropolitan Government Ordinance on the Promotion of Sharing*).	• Development of the necessary infrastructure to become a sharing city, • Support for sharing organizations that drive economic development, • Raising awareness and enhancing knowledge regarding civic participation in sharing practices.	Sharehub (Local community of sharing platforms) Public spaces and facilities (44), Experience, skill, and knowledge sharing (28), Product sharing (18), Education (13), Arts (10), Accommodation (9) Vehicle sharing (Nanum), Public parking space sharing, Public facility sharing platforms, Traditional Korean housing accommodation platform (Kozaza), Open data sharing platform, Accommodation sharing platforms (Airbnb, Wehome),
Shanghai	With the aim of contributing to national and regional economic development, the city seeks to achieve innovative and low-carbon sustainable growth (*Shanghai Master Plan 2017-2035*).	• Developing the economy through the support of sharing-economy initiatives, • Regulating legal and administrative decisions to ensure the integration of the sharing economy.	Bicycle sharing (Meituan Bike, Mobike, Ofo), Accommodation sharing (Airbnb, Tujia, Xiaozhu, Zhubaijia, Booking.com, Couchsurfing), Ride-hailing and online taxi sharing (DiDi), Electric vehicle sharing (EVcard), Physical product sharing
Toronto	In line with long-term planning frameworks such as the Long-Term Waste Management Strategy, the Resilience Strategy, and the Climate Emergency Action Plan, the city aims to integrate the sharing economy into urban development.	• Supporting sharing practices that can directly influence urban spaces beyond small-scale sharing platforms, physical product exchanges, and nonprofit business activities.	Vehicle sharing (Uber, Lyft, Communauto, Turo), Bicycle sharing (Bike Share – local application), Accommodation sharing (Airbnb, VRBO), Storage space sharing (Spacefy, Bagbnb, AJ Self Storage), Private parking space sharing (Rover), Electric bicycle sharing (Dropbike)
Group 2 Building Smart Cities Together: Joint Solutions for Common Challenges			
Lisbon	The city aims to be sustainable, competitive, participatory, creative, innovative, and citizen-oriented.	• Attract more residents by improving housing quality, offering smart living services, and creating opportunities for smart ageing. • Stimulate the economy and increase employment by investing in R&D • Attract more entrepreneurs • Increase demand for higher education • Enhance the quality of life in the city through measures on energy efficiency, mobility, and social cohesion.	Sharing Lisboa: Electric Bicycle Sharing Municipality-organized Keyless Car Sharing Urban Sharing Platform (USP)
London	• Transforming neighborhoods and communities	• Ensure active citizen participation in the municipality's service transformation processes.	E-Cargo Bike Sharing / Business Model, E-car (Zipcar, Easycar, Carplus, Drivenow,

City			
	• Regulating/organizing infrastructure • Provision of public services • Strengthening the city's economy	• Develop digital infrastructure • Use resources efficiently to create low-carbon, healthy, and livable settlements. • Improve the transportation structure and accessibility • Develop sustainable transport systems (walking, cycling, and electric vehicle sharing) • Foster economic development	Getaround, Hiyacar), Smart Bus Parking Areas (Justpark), Keyless Car Sharing Bicycle Sharing (Obike, Ofo)
Milan *"In 2014, the City of Milan became the first public authority in Italy to approve a document on the sharing economy, namely the 'Milan Sharing City.'"*	The sharing economy is conceived as a structural rethinking and strengthening of the relationship between economy and society, based on the creation of social bonds as the foundation of economic transformation.	• Institutionalize participatory governance and co-decision through CoHub. • Define the institutional framework and ensure continuity via Milan Sharing City (2014). • Leverage urban idle capacity and enhance spatial efficiency. • Support social enterprises and the local sharing ecosystem.	CoHub (participatory decision-making platform) Gaia Shared Housing Center
Group 3 Sharing Cities Project / A National Program / Based in Sweden			
Stockholm	-	• An environmental sustainability-oriented approach • Reduction of consumption	Car Sharing (Sunfleet) Parking Sharing (Car2go, Drivenow) Second-hand item libraries
Gothenburg	Reducing the environmental impacts of consumption *A collaborative economy has been established in Gothenburg through cooperation between civil society organizations and city governance.* *Five main municipal governance mechanisms are identified: regulator, provider, enabler, self-governing, and collaborator.*	• Increasing the effectiveness of the sharing economy in the city as part of a solution for sustainable consumption	DIY Workshops (Bicycle Kitchen), Physical Product Sharing (Free Products, Second-hand Clothes, and Car Pools), Smart Mapping Platform, Urban Land Sharing (Grow Göteborg), Sharing and the City Project, Shared use of public spaces
Malmö *(Renowned for its state-of-the-art bicycle infrastructure)*	Ensure social justice and equality, and address unemployment	• Achieve social justice and equality, and address unemployment through the integration of sharing economies.	Bicycle Sharing (Donkey Republic), Computer and Book Sharing (Garaget), Bicycle Repair Workshops (Bicycle Kitchen), Sports Equipment Sharing (Fritidsbanken), Co-living Projects Sharing of skills (e.g., sewing, carpentry, digital production) through the municipality's art and community center There is no need for regulating accommodation sharing in Malmö, as housing units are already managed through rule-based cooperatives.
Umeå	Ensure planned development in environmental, social, cultural, and economic dimensions.	• Support the local sharing ecosystem and entrepreneurs by focusing on innovative solutions for shared mobility, green spaces, resource efficiency, and sustainable consumption.	Development and implementation of a concrete Action Plan for Sharing Activities in Umeå, based on the identified need for such a plan (Holistic Sharing Activities)

			Promoting the use of publicly owned green spaces as venues for community events—such as book sharing, food sharing, and talent sharing (e.g., music)—through sharing applications.
		Group 4 UP, Sharing	
Barcelona	• Eliminate unfair competition • Reduce labor exploitation • Mitigate the pressure of rising housing prices • Prevent the gentrification of urban areas	• Introduce restrictions and new regulations to mitigate the negative effects of the rapid spread of the sharing economy in the city.	Bicycle Sharing Regulation of Public Transport Systems Car Sharing Accommodation Sharing