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Action Planning Network

# Planning Car-Lite Strategies

PIETRO L. VERGA, URBACT EXPERT


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## Insights from the Workshop

PIETRO L. VERGA, URBACT EXPERT

The "Planning Car-Lite Strategies" Workshop guided participants through a series of collaborative activities aimed at addressing car dependency within cities. The goal was to explore solutions for transitioning to a car-lite urban environment by focusing on specific local challenges and developing actionable strategies. It was an extremely interactive session, with a strong and proactive engagement by all participants!

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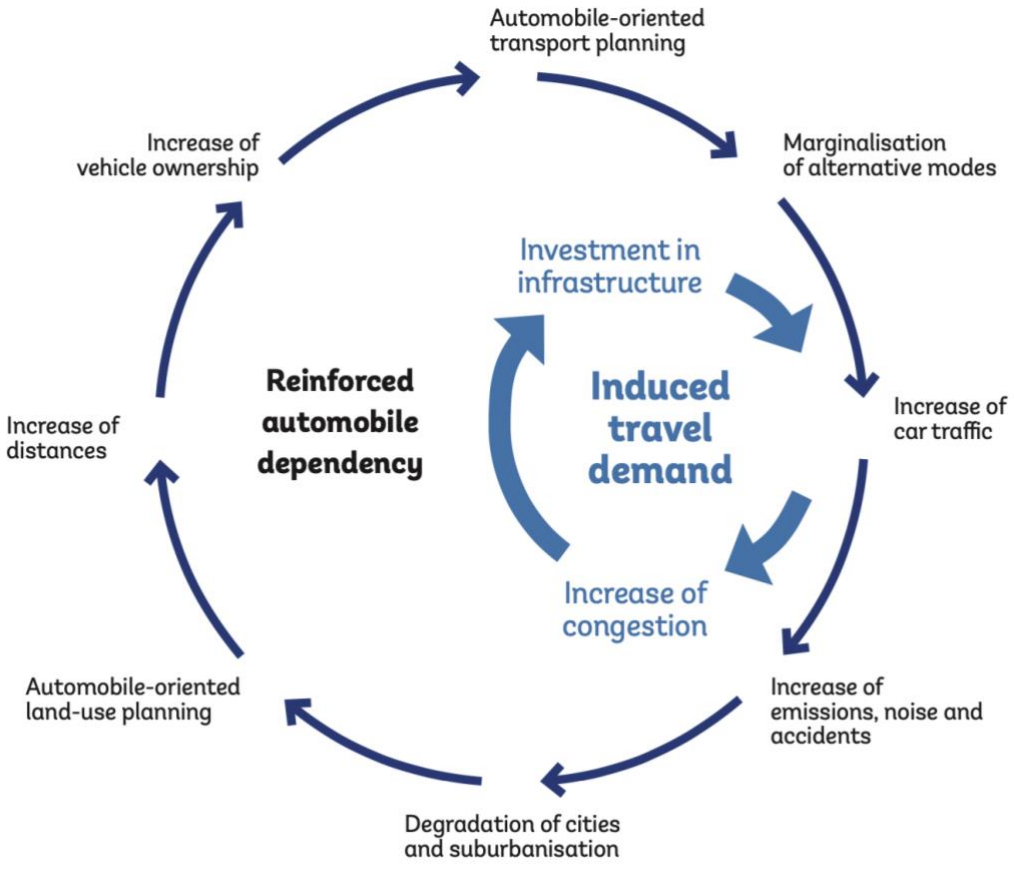
# Introduction

Recent research (see: Dutch Cycling Embassy, 2023) underscores the profound societal benefits of cycling when compared to the high costs of car dependency. Cycling offers advantages across economic, environmental, health, and social dimensions, making it a key component of sustainable urban mobility.
Economically, cycling is an accessible and cost-effective transport option, with significantly lower annual costs compared to car ownership. Each kilometre cycled generates a net social benefit, while car travel imposes societal costs. Cyclists also tend to support local economies, shopping more frequently and loyally compared to car drivers. Environmentally, bicycles produce minimal emissions throughout their lifecycle, improve local air quality, and help reclaim urban space for green areas and community amenities.
Cycling's health benefits are equally significant. It boosts physical fitness, extends life expectancy, and reduces the risks of chronic diseases such as obesity and type 2 diabetes. The mental health benefits include decreased risks of depression and stress. Furthermore, cycling enhances quality of life: it is associated with joy, freedom, and independence, particularly among children, who are able to navigate their environments safely. Socially, cycling is inclusive, allowing affordable access to jobs, services, and amenities, while also fostering interactions that promote a sense of community.
In light of these benefits, planning car-lite strategies is an urgent challenge for cities seeking to transition toward healthier and more sustainable urban environments. Effective and enduring solutions must address the root causes of car dependency by disentangling its drivers and mitigating their effects.
The workshop began with an analysis of the car dependency loop proposed by the Transformative Urban Mobility Initiative (2017).

## THE CAR-DEPENDENCY LOOP




**Source:** *Transformative Urban Mobility Initiative, 2017*

This framework helped identify three key dimensions of car dependency:

- **Local and Regional Transportation Networks**: This refers to the infrastructural dimension, encompassing how the design and quality of transport infrastructure influence and shape mobility and transportation options at both local and regional levels.
- **Public Transportation Services:** This covers the availability, quality, frequency, accessibility, reliability, and diversity of public transit options, which collectively determine the attractiveness and usability of public transport as an alternative to private vehicles.
- **Shops, Services, and Jobs Availability:** This pertains to the accessibility, spatial distribution, and variety of urban functions, including essential services, shopping opportunities, amenities, and job locations, all of which significantly impact how people meet their daily needs, commute, and choose their modes of travel

Examining the car-dependency loop and the primary dimensions influencing mobility choices served as a critical starting point for the workshop. Participants worked within their city teams to draft and discuss their "Local Dark Story" of car dependency, exploring how specific local conditions perpetuate reliance on cars.

## Local Dark News of Car-Dependency

The first exercise tasked the "City Teams" with creating a "Dark Story" poster to explore car dependency challenges within their cities. The exercise focused on the three key dimensions: **Local/Regional Transportation Network**, **Public Transportation Service**, and **Accessibility of Shops, Services, and Jobs**. Each team produced a newspaper-style front page, complete with headlines, images, and brief descriptive texts. These posters captured the specific issues their cities face in these areas, providing a clear and structured overview of how car dependency influences urban mobility and accessibility.

### CITY TEAMS AT WORK DRAFTING THEIR DARK STORIES

The "Dark Story" posters created by the City Teams captured key challenges related to car dependency in their urban contexts. The exercise highlighted both common issues shared across cities and unique, context-specific problems, forming a basis for further analysis of recurring themes and notable examples

## Common Issues Across Cities

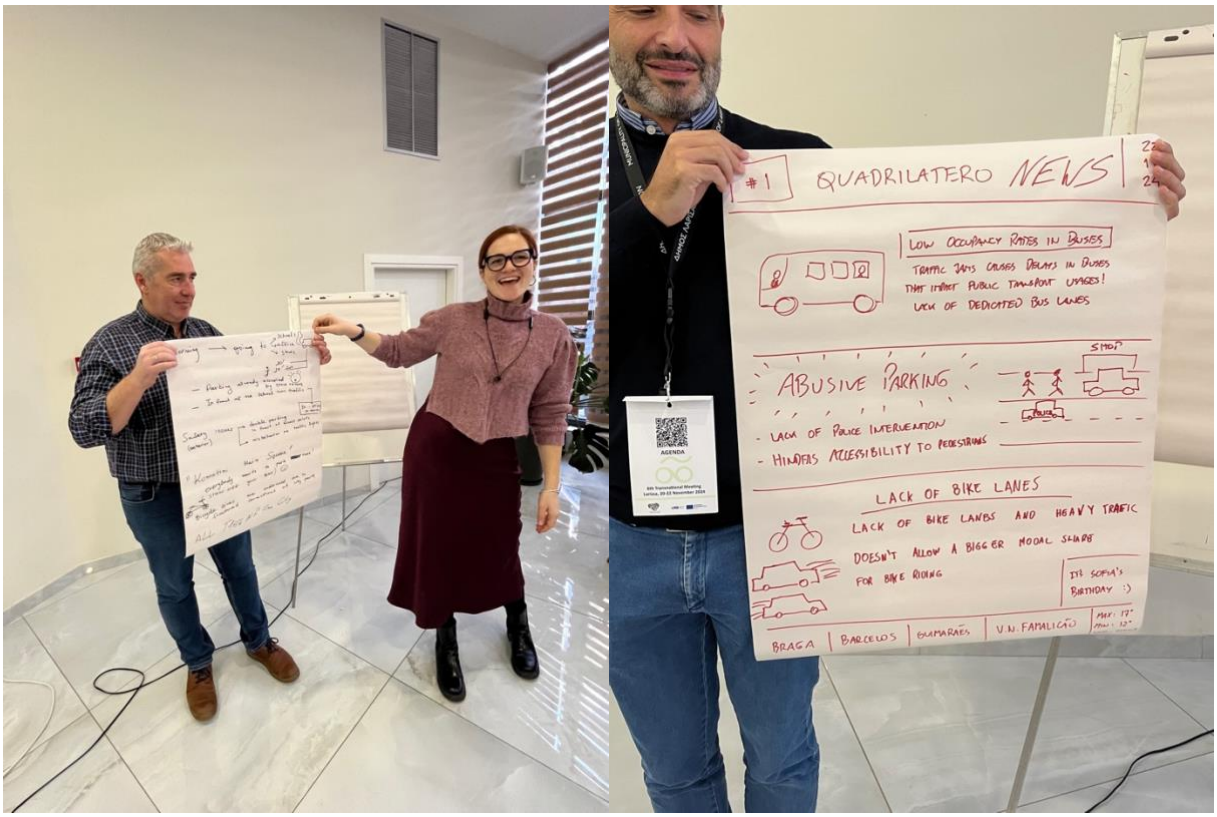
- **Traffic Congestion.** Many cities highlighted severe traffic congestion. Sofia reports residents spending 90 hours per year in traffic jams, while Strasbourg struggles with weekend gridlock near malls and schools. Ferrara also noted that buses frequently get stuck in traffic, especially during bad weather, further exacerbating delays and inefficiency in public transport systems.
- **Inefficient and Underutilised Public Transport.** Low occupancy rates and delays in public transport systems are widespread. Ferrara reported that interregional connections are almost non-existent, limiting mobility to nearby Bologna. Similarly, cities like Quadrilátero and Larissa noted underused buses, often due to traffic delays or the lack of incentives to use public transport.
- **Car Dependency and Insufficient Alternatives.** Over-reliance on private vehicles was a recurring issue. Poor cycling infrastructure, such as the fractured networks in Komotini and Quadrilátero, and limited public transport connectivity, as seen in Ferrara and Škofja Loka, create a vicious cycle where cars remain the dominant transport option.
- **Parking Issues.** Illegal or abusive parking emerged as a key problem in cities such as Ferrara, where the lack of enforcement obstructs public spaces, and Larissa, where pedestrian accessibility is hindered. This issue worsens congestion and disrupts urban mobility.
- **Environmental Impact.** Air pollution caused by car dependency was highlighted in several cities. For example, Ferrara reported significant traffic-related environmental concerns, while Strasbourg described pollution from the M35 highway impacting residential areas.
- **Lack of Cycling Infrastructure.** The absence of safe, continuous cycling networks was a shared concern. Ferrara's call to strengthen railway connections suggests an overarching need for alternatives to car travel, including better cycling and public transport integration.
- **Safety Concerns.** Issues like double parking in Komotini, unsafe e-scooter use in Larissa, and blocked cycle lanes in Strasbourg illustrate how mobility systems fail to prioritise safe and sustainable travel modes.
- **Behavioural and Cultural Challenges.** Cities like Ferrara and Komotini highlighted the social dimension of mobility challenges. Ferrara emphasised that behavioural changes are crucial to reviving city centres, while Larissa pointed out "selfish" behaviours such as illegal parking and misuse of public spaces.

## Diving In The Cities' Dark Story Headlines

- **Ferrara – Poor Interregional Connectivity.** Ferrara's "Dark Story" highlights its disconnection from Bologna and other regional hubs due to weak railway connections and limited public transport options. The striking image of commuters walking in storms underscores the human cost of mobility failures, making Ferrara an exemplary case of how infrastructure gaps amplify car dependency.
- **Škofja Loka – The "Green Town Mobility Trap".** Škofja Loka exemplifies how even "green" towns can suffer from car dependency. With limited local jobs and poor public transport, residents are forced to rely on cars, demonstrating the need for comprehensive planning that links employment, mobility, and urban design.

- **Strasbourg – Conflicts Between Transport Modes.** Strasbourg's blocked bike lanes and overcrowded school drop-off zones reflect the broader challenge of balancing space between transport modes. This case underscores the importance of better enforcement and thoughtful urban space allocation.
- **Larissa – Urban Mobility Chaos.** Larissa vividly portrays the chaos created by illegal parking, unregulated e-scooters, and empty buses. Its emphasis on freeing sidewalks and regulating behaviours highlights the role of urban design and enforcement in resolving mobility issues.
- **Sofia – Extreme Congestion.** Sofia's ranking as one of Europe's most congested cities shows the cumulative impact of poor public transport and over-reliance on cars. The city's struggles with traffic jams and environmental degradation are a stark warning of the consequences of car-centric planning.
- **Quadrilátero – Regional Cooperation Challenges.** The Quadrilátero municipalities (Braga, Barcelos, Guimarães, and Vila Nova de Famalicão) highlight the shared regional nature of mobility challenges. Their case exemplifies the need for collaborative solutions to address issues like poor bus usage and cycling infrastructure across interconnected cities.
- **Komotini: A City of Behavioural and Spatial Challenges**. Komotini identified behavioural issues and spatial constraints as central to its mobility struggles. Problems like double parking, unsafe traffic behaviours, and mismanagement of pedestrian zones were highlighted. Underused bike lanes and disconnected cycling networks exacerbate reliance on cars, while cultural norms like "showing off" cars in the main square reflect deeper social challenges.

## PRESENTING THE DARK NEWS




While each city faces unique challenges, the overarching themes of congestion, car dependency, underutilised public transport, and inadequate cycling infrastructure reflect the systemic nature of urban mobility issues. These findings call for comprehensive, multi-dimensional strategies that address infrastructure, policy, behaviour, and culture to create sustainable and inclusive mobility systems.

## Brainstorming Solutions

As part of the workshop's next phase, participants worked individually to brainstorm potential actions addressing the challenges identified in the "Dark Stories" created by other teams. This phase encouraged a forward-looking approach, asking participants to focus on:

- Developing short-term, medium-term, and long-term solutions to address car dependency challenges.
- Identifying the resources, support, engagement strategies, and communication methods required to implement these actions.

Participants used colour-coded sticky notes to jot down their ideas, which were then thematically clustered. This created a visual overview of proposed solutions, allowing everyone to reflect on and build upon the collective brainstorming in the final exercise.

**BRAINSTORMING AND CLUSTERING IDEAS**


### Proposed Solutions: Key Findings

The brainstorming session yielded a range of solutions, which can be grouped into six thematic areas:

#### Regulation and Enforcement

Participants proposed several measures to regulate car use and enforce better mobility practices:

- **Regulations and Licensing:** Introducing eco-taxes, permits for city car use, and higher fines for traffic violations to disincentivise car dependency.
- **Police and Campaigns:** Strengthening enforcement through patrols and policy awareness campaigns to address issues like illegal parking and traffic violations.
- **Car Access Restrictions:** Implementing low-emission zones and limiting vehicle access to city centres to encourage more sustainable mobility options.

#### Reclaiming Urban Space

Reallocating urban space from cars to active mobility was a recurring focus:

- **Strict Parking Regulation:** Reducing car parking spaces and reallocating these areas for public and active mobility use.

- **Park & Ride Facilities:** Developing short-term parking on city outskirts to encourage multimodal transport.
- **Active Mobility Prioritisation:** Converting car-dominated spaces into areas for cycling, walking, and recreational use.

### 3. Awareness and Motivation

Participants recognised the importance of fostering behavioural change and public awareness:

- **Cycling Training:** Offering educational programmes to teach cycling skills to children and adults, building confidence and promoting safety.
- **Car-Free Days:** Encouraging residents to experience car-free environments as a way to promote alternative transport modes.
- **Public Campaigns:** Motivating citizens to embrace active transport through promotional activities and awareness campaigns.

### 4. Collective Services

Suggestions for improving shared mobility and public transport included:

- **Affordable Options:** Introducing free or affordable urban bus services and expanding car-sharing initiatives.
- **Targeted Solutions:** Proposals like "pedibuses" (walking buses for children) and shuttles to connect underserved areas.
- **Home-to-Home Services:** Providing cargo delivery and similar services to reduce reliance on private vehicles for logistics.
- **Mobile Public Services:** Bringing public services closer to citizens through mobile offices or information points

### 5. Planning and Integration

Strategic, long-term planning emerged as a critical priority:

- **Mobility Management Strategies:** Encouraging a balanced mix of transport modes through integrated planning.
- **Cycling Plans:** Establishing detailed cycling strategies for the next 5–10 years, focusing on infrastructure, safety, and accessibility.
- **Urban Integrated Planning:** Aligning transport and land-use planning to create compact, accessible, and sustainable urban areas.

### 6. Dedicated Infrastructure

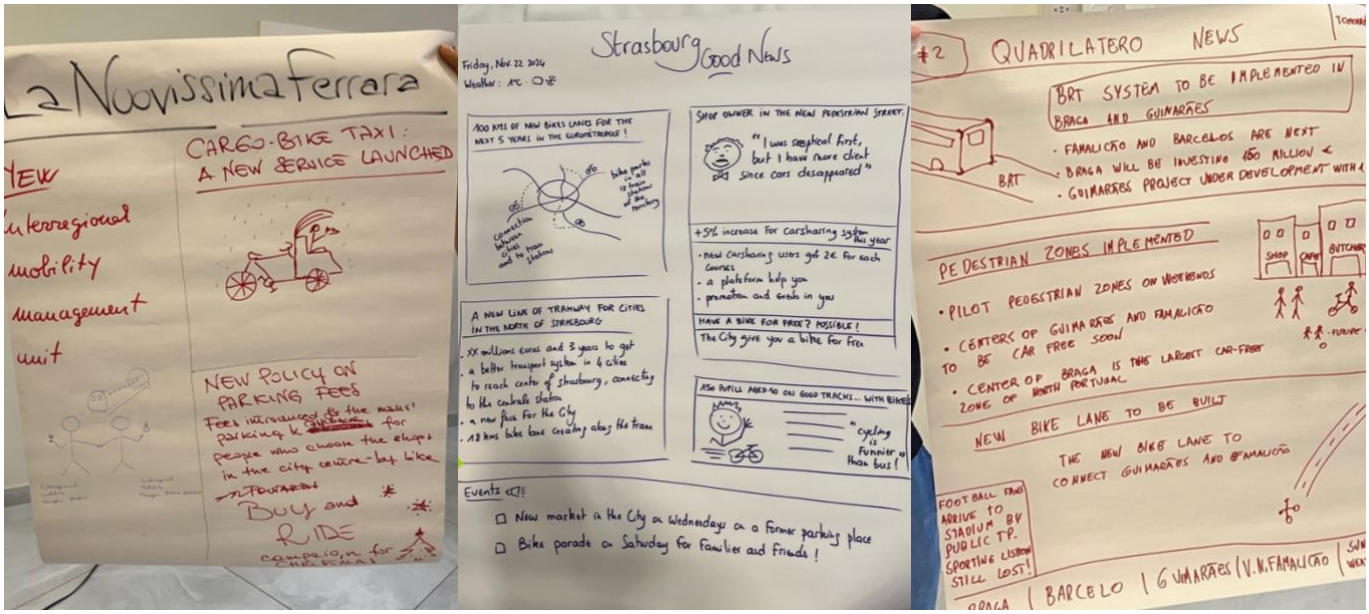
Investments in sustainable transport infrastructure were highlighted as essential:

- **Pedestrian Areas:** Expanding pedestrian zones to improve walkability and safety.
- **Bike Lanes and Routes:** Developing dedicated bike lanes with proper dimensions and connected networks, including green corridors and routes for children.
- **Sidewalk Improvements:** Clearing and building sidewalks to prioritise pedestrian mobility and ensure accessibility.

## Envisioning a Car-Lite Future: Insights from the "Newspapers of Tomorrow"

The "Newspapers of Tomorrow" exercise provided a platform for city teams to imagine a future where car dependency is minimised, and urban spaces prioritise sustainable mobility. Each city articulated a unique vision of transformation, showcasing a variety of strategies to achieve more accessible, liveable, and environmentally conscious urban environments. Below is a summary of the key ideas from each city, followed by general conclusions drawn from these forward-looking strategies.

### FERRARA, STRASBOURG, AND QUADRILATERO NEWSPAPERS OF TOMORROW




- **Ferrara: Bridging Regions and Innovating Locally**. Ferrara's approach combined interregional connectivity with local innovation. A new interregional mobility management unit was proposed to coordinate transport systems with neighbouring regions. Locally, the launch of a cargo-bike taxi service and revised parking fees, coupled with a "Buy and Ride" campaign, demonstrated the city's effort to reduce car reliance and promote sustainable travel behaviours.
- **Škofja Loka: Policies for Integrated Mobility**. Škofja Loka emphasised the importance of policy-driven change at both the state and municipal levels. On the state side, the city proposed disincentives for car use, such as higher parking fees and fuel taxes, alongside positive measures like free public transport and enhanced intercity bike lanes. Locally, the focus was on expanding bike lanes to connect public services, revitalising the city centre with shops and pedestrian-friendly areas, and introducing mobile public services to reduce unnecessary car trips.
- **Strasbourg: A Regional Mobility Hub**. Strasbourg envisioned a robust mobility network combining expanded cycling infrastructure, enhanced public transport, and pedestrianised streets. Plans included 100 kilometres of new bike lanes across the Euroterritoire and an 18-kilometre bike lane accompanying a new tramway in the city's northern areas. A thriving carsharing programme, free bike initiatives, and pedestrian-friendly markets demonstrated the city's commitment to rethinking urban spaces and fostering community engagement.
- **Larissa: A Model for Urban Mobility Success**. Larissa presented itself as a "success story" of urban mobility. The city introduced free mobility services, a demand-responsive transport system, and a smart parking management solution. Safety and inclusivity were prioritised through a 25 km/h speed limit, expanded bike infrastructure, and accessibility measures for disabled residents. Larissa also engaged

its youth and broader community in awareness campaigns, positioning itself as a leader in sustainable urban planning.

- **Sofia: Building Sustainable Habits**. Sofia's vision revolved around fostering behavioural change through car-free weekends, new cycling infrastructure, and improved public transport. The introduction of 10 kilometres of bike lanes, an electric bike-sharing system in residential areas, and a revised public transport timetable showcased the city's determination to provide practical alternatives to car use while promoting a culture of sustainable mobility.
- **Quadrilátero: Regional Collaboration for Sustainable Mobility**. The Quadrilátero municipalities focused on integrated regional solutions. Their vision included implementing a Bus Rapid Transit (BRT) system in Braga and Guimarães, which will eventually expand to Barcelos and Vila Nova de Famalicão. Additionally, the region proposed creating new pedestrian zones in city centres, including Braga becoming the largest car-free zone in northern Portugal, and constructing a bike lane connecting Guimarães and Famalicão.
- **Komotini: Inclusive and Accessible Urban Spaces**. Komotini prioritised inclusivity and accessibility in its vision. The city highlighted new bike and pedestrian paths connecting the university to the city centre and the establishment of a pet-friendly park. Initiatives to make 50% of local beaches accessible and pedestrianise the city centre were key aspects of its strategy, demonstrating a focus on creating an equitable urban environment for all residents and visitors.

The visions presented in the "Newspapers of Tomorrow" demonstrate a shared commitment to reimagining urban mobility and reducing car dependency. Across all cities, common themes emerge that highlight a collective understanding of the challenges and opportunities in achieving car-lite urban environments:

### Integrated and Multi-Modal Mobility Systems

Cities like Ferrara and Quadrilátero prioritised regional connectivity through coordinated transport networks, such as interregional mobility management units and Bus Rapid Transit (BRT) systems. These strategies underscore the need for holistic planning that seamlessly integrates public transport, cycling, and walking infrastructure.

### Reclaiming Urban Space for People

The transformation of car-dominated areas into pedestrian-friendly and community-oriented spaces was a central theme. Cities like Strasbourg and Larissa showcased how pedestrianised streets and public markets can reinvigorate local economies, while Komotini emphasised accessible and inclusive urban spaces.

### Policy-Driven Behavioural Change

Several cities, including Škofja Loka and Sofia, highlighted the role of regulatory measures, such as increased parking fees, fuel taxes, and speed limits, in discouraging car use. These were paired with incentives like free public transport and bike-sharing schemes to encourage sustainable mobility habits.

### Investing in Cycling Infrastructure

Expanding and connecting bike lanes was a priority across all cities. From Strasbourg's extensive regional bike network to Škofja Loka's intercity routes and Larissa's safe bike parkings, these investments reflect a commitment to making cycling a safe, viable, and attractive alternative to driving.

### Fostering Community Engagement

Cities like Larissa and Strasbourg demonstrated the importance of community involvement in fostering a culture of sustainable mobility. Educational campaigns, youth-led initiatives, and public events like bike

parades and car-free weekends not only raised awareness but also encouraged participation and ownership among residents.

### Accessibility and Inclusivity

Komotini and Larissa exemplified how inclusive planning can prioritise accessibility for all, including disabled residents and tourists. Initiatives like accessible beaches, demand-responsive transport, and dedicated bike routes for children highlight the potential of equitable urban design.

## Conclusions: Planning Car-Lite Strategies

The "Planning Car-Lite Strategies" workshop underscored the urgency and complexity of addressing car dependency in urban environments. Through collaborative exercises and forward-thinking approaches, participants identified shared challenges, innovative solutions, and actionable strategies to transition toward sustainable urban mobility.

Across the cities, common themes emerged: the need for integrated and multi-modal mobility systems, investments in cycling and pedestrian infrastructure, and the prioritisation of accessibility and inclusivity for all. These efforts were complemented by policy-driven initiatives and community engagement, highlighting how behavioural change and public participation are integral to success.

The visions presented in the "Newspapers of Tomorrow" exemplify how cities can reimagine urban spaces as places for people, not cars. By combining infrastructure investments, regulatory frameworks, and cultural shifts, these strategies offer a path toward greener, healthier, and more liveable urban environments. The workshop’s outcomes provide not just solutions for the participating cities but also a replicable framework for other urban areas striving to achieve a car-lite future.