



# Course Correction

## Reforming Melbourne's buses

August 2023

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## **Acknowledgment of Country**

Committee for Melbourne acknowledges the Traditional Owners of Country of the lands and waterways on which we rely. We pay respect to Elders past and present. We acknowledge and respect the unbroken spiritual, cultural and political connection the Aboriginal and Torres Strait Islander peoples have to this unique place for more than 2000 generations.

# Foreword

Over the past few decades, Melbourne's population has grown significantly, making it one of Australia's largest and fastest-growing cities. This has turned Melbourne into a vibrant hub of business, education, culture, sport and innovation. While this growth and success is positive and worth celebrating, it has also led to urban expansion, with residential developments and infrastructure projects stretching the city's boundaries. This expansion has brought about increased congestion and demand for public transport, especially in the outer suburbs. With Melbourne's population projected to reach 9 million by 2050, it becomes crucial to deliver an efficient transport system that meets the needs of all Melburnians and allows seamless mobility.

Committee for Melbourne's *Benchmarking Melbourne 2023* report reveals an emerging 'tale of two cities', reflecting a stark contrast between the exceptional city centre, which has more public transport options and services than the wider metropolis. The report highlights that in terms of the proportion of people who can reach the city centre within a one-hour public transport commute, Melbourne ranks 10th out of 14 peer cities. As a result, residents in the outer suburbs heavily rely on cars and face challenges accessing essential services, education, employment, healthcare and social activities. These challenges disproportionately affect individuals with limited mobility, low incomes and marginalised communities.

Addressing these challenges requires comprehensive solutions, starting with the reform of Melbourne's bus system. Buses play a critical role in connecting different areas of the city, serving as feeders to transit hubs and enabling transfers between different modes of transport. However, bus journeys in Melbourne only account for 1.62% of all trips annually, highlighting the untapped potential for bus usage in Melbourne.

Melburnians' lack of enthusiasm for the city's bus system is expected, given decades of prioritising car-centric infrastructure and providing infrequent, indirect and sometimes unreliable bus services. Even though owning a car costs between \$11,000 and \$16,000 per year and rising, which is significantly more than public transport options, approximately 87% of Melburnians still choose car ownership.

Revamping the bus system into a network of fewer, but more frequent and direct routes that connect with key transit and activity hubs, complemented by feeder services, can boost bus usage and reduce reliance on cars. Ensuring a comfortable and positive experience for passengers will be crucial. Although implementing this network presents challenges, effective communication about the benefits of bus reform – like improved health, lower living costs and positive environmental impacts – can drive support. Moreover, compared to costly road and rail projects, the investments needed for bus reform prove highly justified and cost-effective.

The Victorian Government's Bus Plan outlines the future of Melbourne's bus system and this report aims to support the plan by outlining the necessary ambition, clear targets and timelines for comprehensive reform within a reasonable timeframe. With 30% of bus contracts up for renewal in 2024, urgent action is needed to deliver substantial reform of Melbourne's bus system to deliver a modern network with direct, frequent, reliable and environmentally friendly services. The report addresses the challenges associated with reform, presents a vision for an optimised bus network and offers a feasible pathway to successfully implement comprehensive reform. Committee for Melbourne is committed to promoting collaboration between the government, business and the community to support this important endeavour.



Mark Melvin  
CEO, Committee for Melbourne



Dr Joesph Correnza  
Chair, Infrastructure and Sustainability Standing Committee

# Participants



**Paul Carter | Associate Principal, Arup**

*“Reforming Melbourne’s bus system could have a significant impact on peoples’ daily lives and help transform our city. An accessible, efficient, affordable, safe and green bus network will help ease congestion pressures, ensure all Melburnians can access social and economic opportunities and help drive down emissions. While bus reform is a challenging task, it is an essential one if we are to build a more efficient, equitable and sustainable transport system that meets the needs of people and the planet.”*



**Dr Laura Aston | Senior Planner, Arup**

*“To maintain its status as one of the world’s most liveable cities, Melbourne requires a bus system that enables seamless and convenient movement for its residents and visitors. This system must guarantee accessible, dependable and affordable transport for Melburnians living in marginalised communities, while actively pursuing decarbonisation.”*



**Dr John Stone | Senior Lecturer in Transport Planning, The University of Melbourne**

*“Cities worldwide are embracing the transformative power of green, efficient and inclusive bus services as a means to foster liveable and equitable urban environments, all while helping combat the climate crisis. Melbourne too, must seize this opportunity. Our city requires a rapid, frequent and interconnected network of electric buses that not only guarantee universal access to essential services and employment opportunities but also challenges the deeply ingrained reliance on cars.”*

## Our thanks

Committee for Melbourne would like to express its appreciation to our member organisations and their employees who contributed their time and energy to the development of this report.

Paul Carter | Associate Principal, Arup

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# ARUP



# COMMITTEE MELBOURNE<sup>FOR</sup>



# Executive Summary

Melbourne's bus system is an integral part of the city's public transport system, providing essential connectivity and mobility options for residents and visitors. It covers a wide area, serving both the inner suburbs and outer regions of Melbourne, making it indispensable in creating a more liveable, equitable and environmentally sustainable city.

Despite its importance, Melbourne's bus system no longer adequately meets the needs of the growing population. Infrequent and indirect services, unreliability, longer travel times, poor integration with other transport modes, safety concerns and relatively high carbon emissions, are a feature of the system. The following fast facts reflect these issues:



Bus usage in the city accounts for  
**1.62%**  
of all trips in Melbourne



**30 minutes**  
average service frequency of  
Melbourne's buses on weekdays



Average bus speed is  
**35%**  
lower than signed road speeds  
during the morning peak



Only  
**52 kilometres**  
of dedicated bus lanes throughout  
Melbourne



More than  
**95%**  
of bus stops do not have a  
pedestrian crossing within 20  
metres



Buses contribute up to  
**6%**  
of key air pollutants despite  
comprising just 0.5% of registered  
vehicles in Australia

With Melbourne's population forecast to surpass 9 million by 2050, approximately the same size as New York and London today, it will be essential to have a bus system that enables seamless mobility for all Melburnians. Failure to reform the bus system will erode living standards, exacerbate inequality and make it more difficult to reduce transport emissions.

## Reform benefits

Melbourne's bus system stands at a critical juncture, presenting an opportunity to embrace a transformative vision that revolutionises how the city's bus services cater to its residents. Bold, comprehensive reform that prioritises fast, frequent and direct services that are coordinated with the rail network, and which maintain equitable transport choice, could deliver substantial benefits for Melbourne:

- A reformed bus network that achieves the same levels of patronage as existing SmartBus services could reduce over 100 million private vehicle trips annually, or deliver 10% of additional travel demand, in Melbourne by 2030 (Arup).
- Between 330,000 to 870,000 metric tonnes of carbon dioxide equivalent could be saved in 2030 (equivalent to between 1.6% and 4.4% of Victoria's total annual transport emissions) with bus fleet electrification and mode share between 1.6% and 4% (Arup).
- Early delivery of high-quality transport infrastructure and services have shown to outweigh costs by up to 18:1 in one of Melbourne's major growth areas (RMIT University).
- By consolidating the service hours currently used to deliver 80 existing bus routes into 25 new routes, spaced at regular intervals of 1.5 to 2 kilometres and operating at high frequencies 24/7, a study suggests three times more people could access major activity centres in Melbourne's west within 30 minutes (The University of Melbourne).

Additionally, comprehensive bus reform will complement the Victorian Government's Big Build program and ensure that all Melburnians can connect with other transport modes and infrastructure.

Reforming the bus system is complex and challenging, requiring careful planning and coordination. A comprehensive pathway towards achieving reform is outlined, addressing elements essential to achieving successful reform.

## Recommendations

Building upon the case for reform and corresponding pathway, the Committee makes six key recommendations to help transform Melbourne's bus system:

1. **Develop a compelling public narrative:** articulate to Melbourne's residents the benefits of comprehensive bus reform for individuals, the community and the city.
2. **Deliver 10-minute services on key routes:** prioritise the delivery of a core network of bus services at least every 10 minutes along key routes that harmonise with the train and tram network, and invest in feeder services that connect the community with the core network, during this term of government.
3. **Have a reform plan prior to recontracting:** re-design the current bus system before the new bus contracts come into effect in 2025.
4. **Embed incentives into bus contracts:** include incentives for bus operators to increase patronage as part of the recontracting process and amend existing bus contracts that incentivise increased patronage.
5. **Re-invest any savings in the bus network:** ensure savings or additional revenues generated from bus reform is directly allocated to improving the bus network alongside an increase in investment.
6. **Create coalitions of support:** develop strong partnerships with key stakeholders to deliver comprehensive bus reform.

## 1.1 Introduction

Cities and regions worldwide recognise the significance of having an efficient, frequent, reliable, safe and environmentally friendly bus network. Transit authorities in London, Zurich, Stockholm, Singapore and Curitiba in Brazil are leveraging their bus networks to address various urban challenges.

Like these cities, Melbourne's bus system is an integral part of the city's public transport system, providing essential connectivity and mobility options for residents and visitors. It covers a wide area, serving both the inner suburbs and outer regions of Melbourne, making it indispensable in creating a more liveable, equitable and environmentally sustainable city.

Despite its importance to the city and its residents, Melbourne has an underperforming bus system that is not delivering value for the investment made by the Victorian Government. One key reason is that it no longer adequately meets the needs of the growing population by failing to provide convenient transport options across the entire city. This is reflected in issues such as infrequent services, unreliability and longer travel times, which contribute to a poor public perception of buses.

The Victorian Government has set forth a vision for a cleaner, integrated and contemporary bus network in *Victoria's Bus Plan (2021)* and is actively working towards implementing necessary improvements. Its plan is supported by the *Zero Emission Bus Transition* consultation paper, which details the government's proposed approach to making the transition to zero emission buses. Its vision and ambitions are reinforced by Infrastructure Victoria's extensive research on improving Melbourne's bus services, as outlined in *Get on board (2022)* and its associated *Bus Reform Community Research*, which form part of a comprehensive research investigation focused on bus reform in the city.

Committee for Melbourne (the Committee) has played a significant role as a vocal advocate addressing the transport challenges faced by Melbourne. In its 2020 report, *Transporting Melbourne*, the Committee emphasised the importance of developing and publishing a comprehensive, integrated transport plan that incorporates transport, land-use and economic development planning. Subsequent *Benchmarking Melbourne* reports highlighted the contrasting realities of a thriving city centre and a fragmented metropolis, underscoring the need for enhanced connectivity across the entire city to drive productivity improvements and social inclusion.

Building on this, the Committee is joining the growing number of voices calling for reform to Melbourne's bus system. It supports the Victorian Government's vision for a modern, productive and environmentally sustainable network that provides genuine transport choice for Melburnians. The government can take a vital step towards this vision by transforming the current system into a fast, frequent and connected network of electric buses.

In this report *Course Correction - Reforming Melbourne's buses*, the Committee asserts that Melbourne's underperforming bus system is impacting liveability, entrenching inequality and compromising the city's response to the climate emergency. The report shares some of the experiences of Melburnians whose lives are constrained by poor bus coverage and service. It also outlines the opportunities linked to bus reform, identifies key enablers of the reform process and tables a compelling case for change that can captivate the community as the city strives to maintain, and indeed extend, its reputation as one of the world's most liveable cities.

## 1.2 Melbourne's current bus system

Melbourne's bus system forms an integral part of the city's transport system, providing connectivity and mobility options for residents and visitors. It covers a wide area serving both the inner suburbs and outer regions of Melbourne and is often the most readily available form of public transport for people living in the middle and outer suburbs. In a typical month, there are around 500,000 scheduled bus services across metropolitan Melbourne compared to approximately 67,000 train and 140,000 tram services.<sup>1</sup>

The bus system consists of approximately 400 regular bus routes that connect various residential areas, commercial centres, educational institutions, healthcare facilities, recreational sites and other important destinations. The frequency of bus services varies depending on the route and time of day, with more frequent services during peak hours and reduced frequency during off-peak periods.

The bus fleet is operated by privately owned bus companies under contract from the Victorian Government. Around 70% of metropolitan bus services are delivered by 13 private operators<sup>2</sup> through 28 separately negotiated contracts,<sup>3</sup> with the remainder of services delivered under the Metropolitan Bus Franchise agreement. The Department of Transport and Planning oversees Melbourne's bus system, including managing all bus service contracts.

The Victorian Government spends approximately \$800 million annually on metropolitan bus services to help ensure that the bus system is available to most Melburnians.<sup>4</sup> The metropolitan region is served by around 4,000 buses and 19,000 stops, ensuring that approximately 82% of all Melbourne's homes have a bus stop within a 400-metre radius.<sup>5</sup> Efforts are continually being made to improve the city's bus system, including route optimisation, service enhancements and the introduction of new technologies.



Image source: Kinetic



# 2

# Why Melbourne needs a better bus network

## 2.1 Underperformance

It is evident that the significant government investment in Melbourne’s bus system could be optimised to deliver better outcomes for Melbourne and its residents.

The most significant indicator suggesting that the system is under-performing is patronage, which has been steadily declining over the past few decades despite population growth.<sup>6</sup> Currently, buses account for 1.62% of mode share for all trips in the city<sup>7</sup> and could decline to 1.36% by 2030 under a business-as-usual scenario.<sup>8</sup> The main reasons why people are discouraged from using the bus are outlined below.

### Long journey times

Many of Melbourne’s bus routes are indirect and meander through suburban streets, resulting in long travel times. In some cases, bus routes are not optimised for passenger demand, leading to some bus services running with few passengers, while more popular routes are overcrowded and leave commuters dissatisfied. The competitiveness of bus travel time compared to other modes, especially private cars, plays a pivotal role in influencing mode choice among commuters. According to a survey conducted by Infrastructure Victoria, which involved 4,000 Victorians, journey time emerged as the most significant factor influencing individuals’ preference for bus travel.<sup>9</sup>

A resident of Wyndham notes that his partner cannot feasibly travel from Point Cook to work in Brimbank by public transport. A journey that takes 25 minutes by car would take two hours one-way and require multiple modes of transport.<sup>10</sup>

### Infrequent services

Many bus routes in Melbourne run infrequently, which can cause long waiting times, missed appointments and a loss of productivity. The average service frequency of Melbourne’s buses on weekdays is approximately 30 minutes,<sup>11</sup> meaning that users are required to carefully plan journeys rather than enjoy the freedom to ‘turn up and go’, offered by networks that operate with 10-minute frequencies or better.<sup>12</sup>

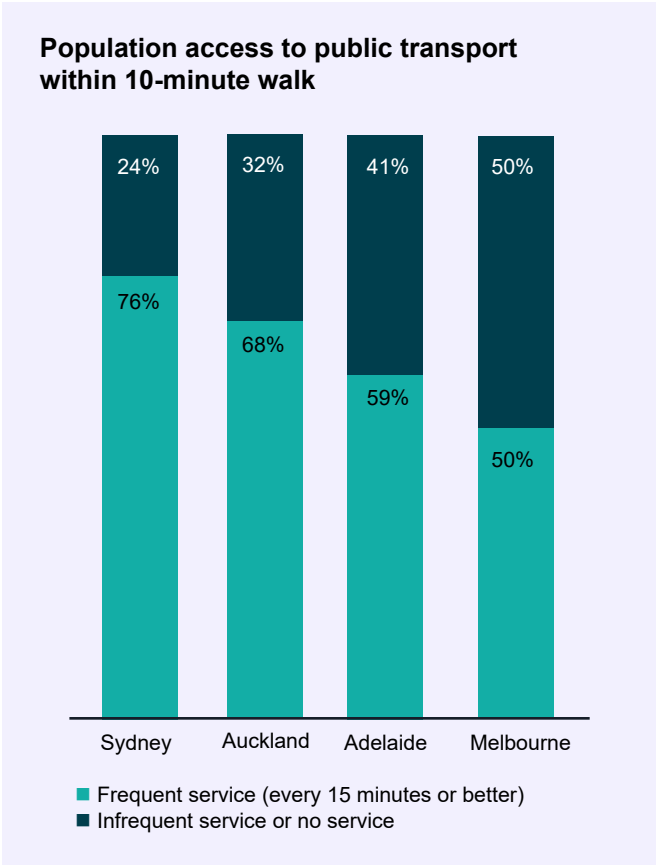


Figure 1 - Population access to public transport  
Source: Arup modelling using 2021 Census data and publicly available timetable data

## Poor integration

Melbourne’s bus system is not well-integrated with trains and trams. This can make it difficult for people to reach their destinations in a reasonable time. An analysis conducted in 2014 revealed that 45% of Melbourne’s bus timetables did not harmonise with the train network.<sup>13</sup> While timetable changes have improved the coordination of public transport services in recent years, there are opportunities to improve integration further.<sup>14</sup>

## Congestion and reliability

Melbourne’s bus system is impacted by congestion with bus speeds typically 35% lower than signed road speeds during the morning peak.<sup>15</sup> This situation results in delays and unreliable services, which makes it difficult for people to plan their journeys. With just 52 kilometres of dedicated bus lanes,<sup>16</sup> most of Melbourne’s buses are unable to avoid delays caused by car traffic.

## Accessibility

Access to bus services in Melbourne is a challenge, with the city’s rapid population growth outpacing the development of public transport and infrastructure, resulting in inadequate coverage and capacity to meet the increasing demand. Moreover, bus stops that are difficult to access discourage some commuters from utilizing the bus system. More than half of stops do not have formal pedestrian crossings or ramp access and despite 60% of bus stops being located on main roads, more than 95% do not have a crossing within 20 metres.<sup>17</sup>

*“The current bus routes have failed to keep up with the sheer growth and address the issue of transport disadvantage which can be a big reason people cannot get to jobs or sustain jobs, or even TAFE because there are no bus routes enabling access.”<sup>18</sup>*

Virginia Tachos, Councillor, Brimbank City Council

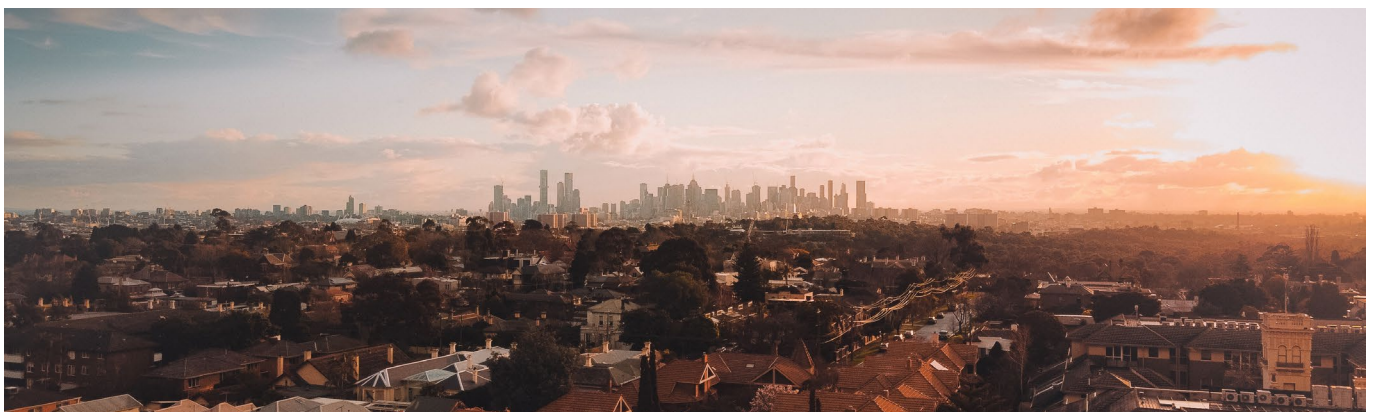


## Safety

Some bus routes in Melbourne are considered potentially unsafe, particularly for women and children. This is especially the case at night when some bus stops are not well-lit and have limited passing traffic. A 2010 survey on the safety perceptions of people using public transport revealed that 40% of people felt unsafe at night and 20% felt unsafe waiting at a bus stop at any time of day.<sup>19</sup> A recent Infrastructure Victoria survey revealed that 51% of respondents disagreed that they feel safe, or would feel safe, waiting at public transport stations or stops after dark.<sup>20</sup>

## Emissions

Diesel buses emit significant amounts of pollutants that contribute to local air pollution and climate change, leading to negative impacts on public health and the environment. Buses comprise only 0.5% of registered vehicles in Australia but account for up to 6% of key air pollutants and produce approximately 1.4 million tonnes of carbon dioxide.<sup>21</sup>



## 2.2 Challenges for Melbourne

Melbourne's under-performing bus system is more than just a standalone issue; it falls short in addressing the broader challenges facing the city. As Melbourne continues to experience growth and evolve, it becomes crucial to identify solutions that effectively tackle the interconnected challenges of liveability, equity and sustainability.

### Liveability

Melbourne's renowned liveability is under threat due to the challenges arising from population growth, coupled with rising trade and visitor volumes, which is straining the city's transport network and heightening congestion across the metropolitan region.

Between 2006 and 2016, Melbourne's population grew by nearly one million people.<sup>22</sup> With the current population standing at 5.2 million and forecast to surpass 9 million by 2050,<sup>23</sup> Melbourne is projected to reach the current size of major global cities like New York, Kuala Lumpur and London. Despite the increasing prevalence of remote work, the transport network must anticipate an estimated 3.5 million additional daily trips by 2030.<sup>24/25</sup>

**Such rapid growth will likely exacerbate road congestion, which already costs Melbourne \$4.6 billion annually and is expected to escalate to \$10 billion by 2030.<sup>26</sup>**

But congestion costs extend beyond diminished productivity and economic losses, imposing a range of other costs on people, including time loss and elevated fuel consumption, as well as detrimental effects on health and the environment.



# Equity

There is a noticeable difference in access to public transport for residents of Melbourne based on where they live and work. While inner areas of the city are better served by the tram and radial train network, the outer suburbs are primarily serviced by a bus system that does not adequately meet the needs of its residents.

This unequal access to public transport in the middle and outer suburbs limits peoples' mobility and freedom, especially the large number of people who rely on public transport as their primary mode of travel. Many individuals and families encounter challenges in reaching essential services, education, job opportunities, healthcare facilities and the cultural and sporting life of the city.

As shown in Figure 2, the availability of public transport for accessing employment decreases as one moves away from inner Melbourne. In the middle and outer areas, job opportunities are relatively scarce, resulting in longer commuting distances for individuals seeking work and a higher reliance on car ownership. This trend is expected to continue, with analysis by Infrastructure Victoria revealing that population growth in new growth areas will far out-strip employment opportunities by 2051,<sup>27</sup> exacerbating the problem of inadequate and unequal connectivity across Melbourne.

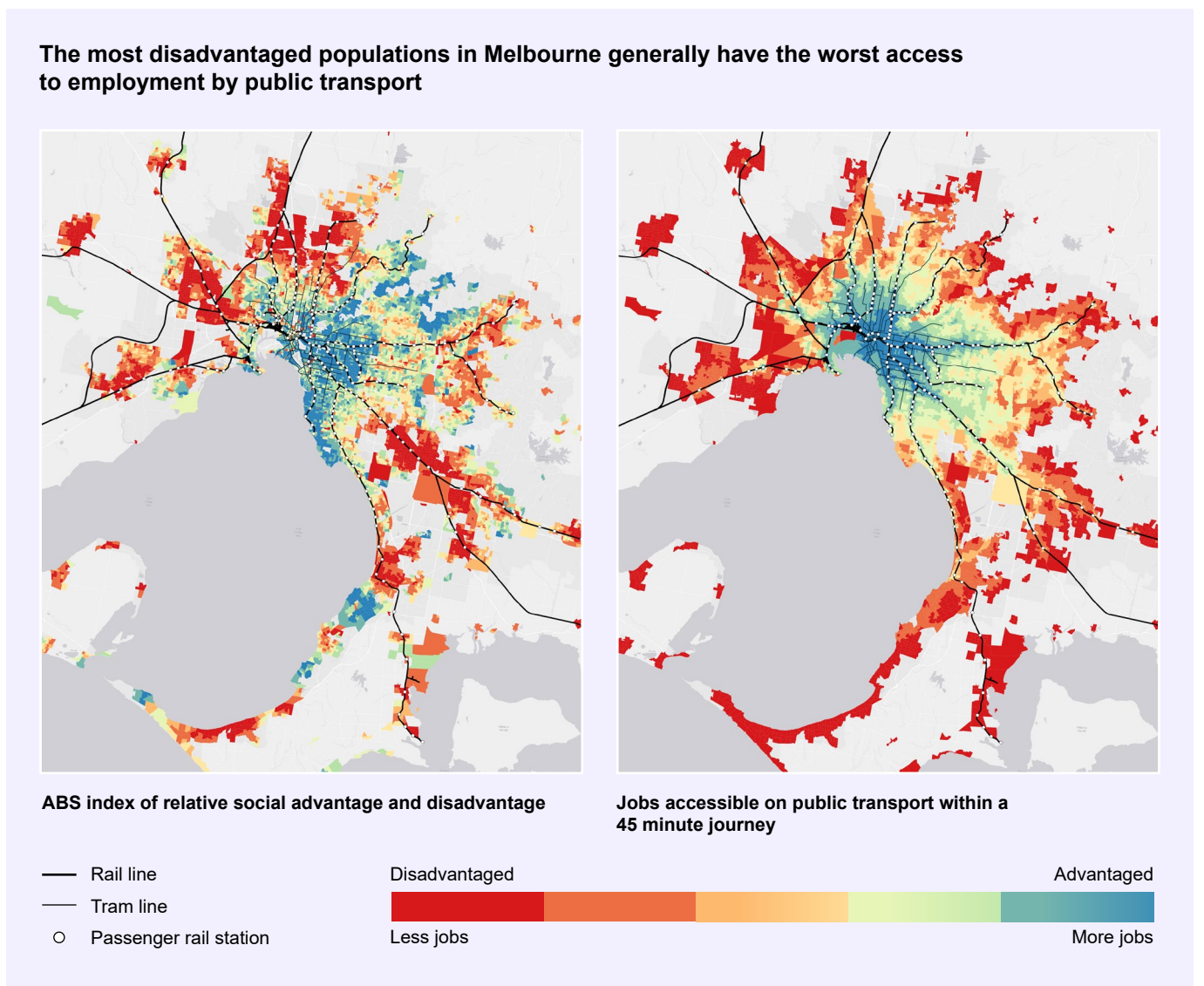


Figure 2 - 45-minute access to jobs by public transport in Melbourne (morning peak)  
Source: Arup modelling using 2021 Census data and publicly available timetable data

Every resident of Melbourne should have the freedom to move around the city without the necessity of driving a car. Failing to provide efficient public transport for all can perpetuate social and economic inequalities. Reforming the bus system could ensure inclusive access to opportunities for all residents.



## Climate

Addressing climate change is a pressing societal challenge. In recognition of this, the Victorian Government set a target to reduce greenhouse gas emissions to 50% below 2005 levels by 2030. Since then, it has raised its ambition and plans to introduce legislation to enforce a 75-80% reduction in emissions by 2035, with the ultimate aim of achieving net zero emissions by 2045.<sup>28</sup>

To achieve these targets, Melbourne must assume a leadership role in reducing its greenhouse gas emissions. Among the various sources of emissions in Melbourne, transport is second only to electricity generation, accounting for 25% or 20.8 megatonnes of carbon dioxide-equivalent emissions.<sup>29</sup> The city currently lags comparable cities in terms of sustainable travel, with only 27% of journeys to work being made through public or active transport, compared to 49% in peer cities.<sup>30</sup>

To help combat the climate emergency and lower emissions, Melburnians need to embrace changes in their transport habits. Currently, 87% of metropolitan households own at least one car.<sup>31</sup> Considering the projected population growth, the imperative to protect environmental assets and the uncertainties associated with climate change, reducing reliance on private car travel is essential. A critical step in encouraging sustainable transport practices is to reform Melbourne's bus system.

**Currently, bus journeys in the city account for 1.62% of all trips annually,<sup>32</sup> indicating significant potential to increase patronage.**



## 2.3 Bus reform challenges

The pursuit of bus reform in Melbourne is accompanied by a multitude of barriers and challenges, arising from various factors that encompass financial, political, economic, geographic and cultural considerations. To implement effective and sustainable reform, it is essential to delve into these complexities and explore potential solutions.

### Government budget priorities

Financial considerations pose a challenge to bus reform, with the allocation of tax-payer dollars by the Victorian Government partly determining the extent of reform. Budgetary pressures, macro-economic challenges and competing priorities can result in limited resources being made available for various bus reform initiatives. Consequently, securing the necessary funds to implement substantial changes remains a key challenge.

While bus transport has the advantage of requiring minimal new major infrastructure compared to other forms of public transport, there are costs associated with transitioning the bus fleet and associated depots to electric propulsion. Moreover, investment is needed to improve lighting, shelters, seating and pedestrian infrastructure around bus stops, and in communications infrastructure to deliver real-time information to passengers.

### Poor public perception

Melbourne's bus system has developed a negative public image. Issues of reliability, punctuality and frequency have eroded trust among potential passengers. Moreover, the perception of Melbourne's tram and train network, viewed as superior in terms of speed, frequency and reliability, reinforces the notion that buses are merely a last resort for people without access to a car.

Notwithstanding these factors, Melbourne's historical emphasis on promoting private vehicle usage, particularly in suburban areas, has resulted in a culture where driving is deeply ingrained in the daily lives of Melburnians. This was reflected in Infrastructure Victoria's recent survey, with three in five respondents indicating that they prefer other modes of transport over buses while seven in ten believed that they could not survive without a car.<sup>33</sup>

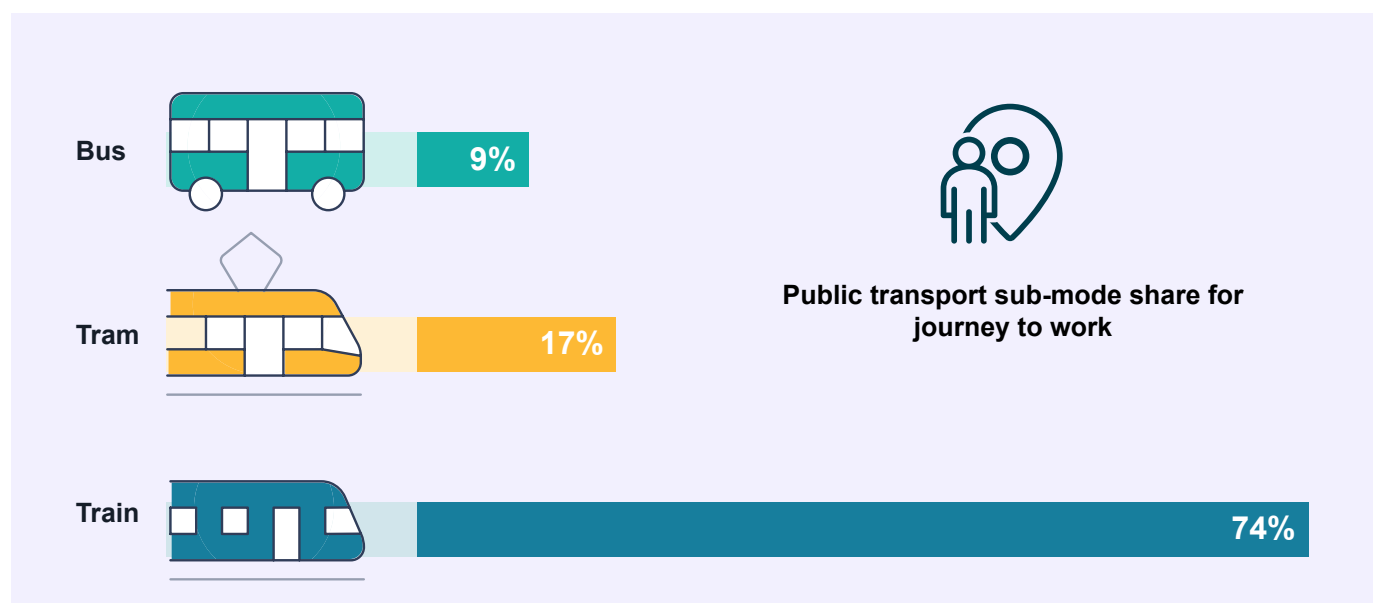


Figure 3 - Public transport sub-mode share for journey to work in Melbourne - percentage comparison

Source: Census data 2021





Image source: Kinetic

## Public resistance

Bus system reform can face significant opposition from existing passengers who have grown accustomed to certain service patterns. These bus users may resist changes they fear could negatively impact their travel habits, even if existing services are not efficient or effective options.

This was a key factor in Adelaide where the proposed system reform was cancelled two weeks into the consultation period after a concerted campaign and widespread public backlash.<sup>34</sup> The focus of this backlash was primarily on route reductions, stop relocations and the potential impact of increased walking distances on specific user groups. While of a lesser scale of change, public resistance was evident in Melbourne's outer east when the government announced its intention to change the operation of some buses in the Yarra Valley.<sup>35</sup>

Strong public opposition and the fear of negative consequences can influence decision-makers to reconsider their plans for bus reform. The desire to avoid further criticism or reputational damage may lead decision-makers to prioritise maintaining the status-quo. Therefore, while bus reform can promote transport equity for many existing and potential users, it is important to address those segments of society who may be further disadvantaged if coverage is reduced.

## Planning and coordination

The planning and provision of bus services across Melbourne has not kept pace with growing and changing demands for travel. Changes in population density, residential patterns and commercial developments have rendered many existing bus routes inadequate or inefficient in meeting the evolving needs of the population.

There are several reasons that have contributed to this situation. The incremental planning approach applied in Melbourne has failed to identify and adequately address the changing shape of the city. Bus network design has not evolved with Melbourne's infrastructure developments, nor responded to modern modal patronage drivers like more direct and frequent routes. Furthermore, metropolitan bus contracts have not incentivised or facilitated optimal bus operations by failing to provide the commercial conditions necessary to drive patronage.

Additionally, Melbourne has a well-established network of roads, bus routes and stops. Altering this infrastructure to accommodate new routes or improve existing ones requires careful planning, coordination and investment, as well as consideration for passenger flow, road capacity and travel demand, especially in the post-pandemic environment.

# 3

## Opportunities for bus reform

### 3.1 A vision for Melbourne's bus network

Melbourne's bus system stands at a critical juncture, presenting an opportunity to depart from conventional thinking and embrace a transformative vision that revolutionises how the city's bus services cater to its community. To address the challenges of liveability, equity and sustainability, a bold and visionary approach is essential to unlock the full potential of Melbourne's transport system. The Committee envisions a bus network, guided by the following principles:

#### 1. Frequency and reliability

Buses should operate with high frequency and adhere to consistent timetables that operate for longer spans throughout the week, ensuring that passengers can rely on them for their daily transport needs. A network with frequent and direct services throughout the week should provide a more convenient and viable transport option for more passengers.

#### SmartBus: Raising the bar

Melbourne's SmartBus routes are more productive than the average bus service in the city. These routes operate at 15-minute frequencies on weekdays until 9pm and at 30-minute frequencies on weekends and week-nights until the last service. They comprise nine cross-city and orbital routes operating mostly along arterial roads and attract over 25 boardings per service hour, with some even exceeding 45 boardings per hour.<sup>36</sup>

In contrast, the average Melbourne bus route attracts 13 boardings per service hour.<sup>37</sup> This evidence suggests that when high-frequency, direct services are provided, Melburnians are more likely to use buses.

#### 2. Route planning

The bus network should feature well-designed routes that consider changing patterns of demand between residential areas and major destinations, including commercial centres, jobs precincts, hospitals, public transport hubs and universities. The routes should reflect modern, post-pandemic travel patterns and prioritise minimising travel time to ensure bus travel is competitive with other transport modes.

#### 3. Transit priority measures

Implementing dedicated bus lanes, signal prioritisation and busways across the city will significantly enhance the speed and reliability of bus services. These measures should enable buses to bypass traffic and other delays, ensuring efficient and consistent travel times.

#### 4. Mode integration

Seamless integration with other modes of transport, including trains, trams and active transport, is crucial. Passengers should enjoy convenient and seamless connections between different modes, promoting the use of public and active transport as a viable alternative to the car.

#### 5. Accessibility

Network planning should prioritise frequent and direct routes while providing adequate coverage to ensure access to the bus network for all Melburnians. Striking the right balance between these factors will enhance service quality without disproportionately affecting vulnerable residents. Furthermore, bus stops and stations should be easily accessible for people of all abilities and ages.



## 6. Comfort and amenities

All metropolitan buses should prioritise cleanliness, comfort and amenities to enhance the passenger experience. Equipping buses with features like air-conditioning, Wi-Fi and charging points should improve comfort and convenience for passengers during journeys.

## 7. Effective communication

Passengers should have easy access to accurate and up-to-date information about bus routes, schedules and potential delays. Clear and comprehensive communication channels, including websites, apps and well-placed signage, should empower passengers to plan their journeys and navigate the network effectively.

## 8. Clean, quiet and fast buses

A sustainable future requires the transition of the entire metropolitan bus fleet to electric buses, powered by renewable energy, to help reduce pollution, improve air quality, decrease carbon emissions and contribute to community health and well-being. These buses should also enable shorter dwell times at bus stops, using multiple doors and automated ticketing to provide a seamless passenger experience.

## 9. Safety

Implementing safety measures such as adequate crossing facilities, tactile paving and lighting around bus stops, should enhance residents' safety and encourage greater patronage particularly among vulnerable groups who may not otherwise reap the benefits of public transport. Maintaining a well-designed and separate walking network that prioritises pedestrian safety, with improved road speeds and street activation, should also be considered.

It is crucial for authorities to prioritise the changes that can make a substantial impact. The delivery of fast, frequent and reliable bus services that are coordinated with the rail network is paramount. By prioritising these reform initiatives, the government can address the pressing needs of commuters, instil confidence in the system's reliability and lay the foundation for future improvements. This approach should lead towards a commuter-centric and sustainable bus network that enhances the liveability and accessibility of Melbourne.



## Case Study: Auckland | New Zealand

In the early 2010s, Auckland faced stagnant public transport patronage despite population growth and increasing road congestion. To address this, their mayor set a goal of doubling patronage within a decade. A major part of the plan was to redesign the city's bus system, which was seen as complex and inefficient.

Auckland Transport (AT) embarked on a complete overhaul of the bus system, aiming for simplicity, improved access to frequent services and better integration with the rail network. The process was implemented in six stages over five years, preceded and followed by extensive consultation and public engagement.

The success of Auckland's new bus network relied on a comprehensive approach. AT recognised that a good network design alone would not be enough; service delivery, infrastructure and communication were also crucial. Close collaboration with bus service providers, infrastructure investments at key interchange locations and dedicated resources for communication and engagement were prioritised.

**40%**

more service hours with  
7% increase in costs



**68%**

of Aucklanders have access to  
frequent services



**10%**

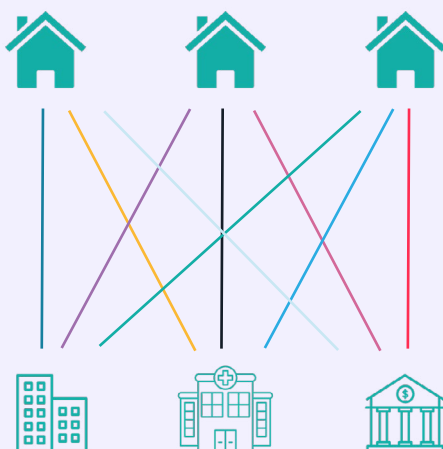
increase in network  
patronage

The impact of Auckland's new bus network has been significant. It is more efficient, providing 40% more service hours with just a 7% increase in cost.<sup>38</sup> Access to frequent service expanded to 68% of Aucklanders<sup>39</sup> and overall network patronage increased by 10%.<sup>40</sup>

Melbourne can learn from Auckland's experience:

- Communication and engagement are paramount to success, with a large, dedicated and appropriately resourced team required for the duration of the reform effort.
- High service frequencies and quality interchange infrastructure, along with a simpler and more connected hub and spoke network, can deliver substantial operating efficiencies.

**Direct service option (Auckland)**  
Infrequent overlapping routes



**Connective network option (Auckland)**  
Fewer routes, more frequency

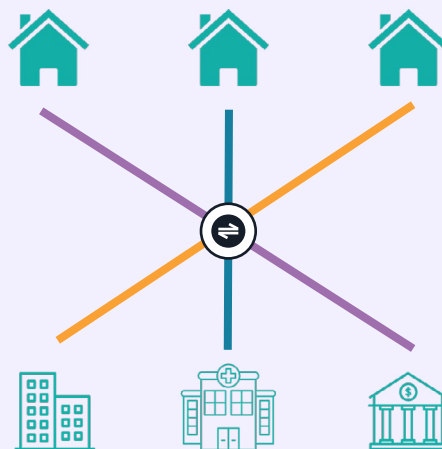


Figure 4: Depicting the change in Auckland's bus network to a simpler and better-connected hub and spoke model.

Source: Walker J, 'Auckland: The New Bus Network is Complete!', Human Transit blog, September 2018, accessed 18 May 2023.

## 3.2 Benefits of a better bus system

Delivering on this transformative vision for Melbourne's bus system could usher in a multitude of benefits that address the challenges associated with liveability, equity and sustainability, and deliver better long-term outcomes for the city and its residents.

### Increase patronage and alleviate traffic congestion

Reforming Melbourne's bus system could attract more passengers and help alleviate traffic congestion, with ample evidence to suggest that patronage would increase with an enhanced network that prioritises frequent, direct services over the 'coverage' principle that currently guides bus service planning in Melbourne.

A greenfield trial in Melbourne's outer east found that the frequent, more direct offering performed up to 40% better in terms of ridership than a coverage-focused system, holding service hours constant.<sup>41</sup> Similarly, system improvement initiatives in Brimbank, which focused on service uplift and straightening of routes, saw ridership increase by 10%.<sup>42</sup>

The success of the Doncaster Area Rapid Transit, which comprises four separate routes linking Manningham municipality with central Melbourne, is a prime example of what can be achieved with an enhanced offering. With frequent services, on-road priority measures, improved accessibility and park-and-ride options, patronage increased by 48% between its launch in 2010 and 2019.<sup>43</sup>

Information gathered through Infrastructure Victoria's recent survey supports these practical instances of increased ridership with people indicating that they would be willing to walk an extra five minutes to a bus stop if the bus journey was around 10% faster, or if the bus arrived every 20 minutes instead of 30.<sup>44</sup> Additionally, fare reform could have a significant impact on increasing patronage, with every dollar reduction on price for a one-way ticket (between \$1 and \$5) potentially increasing patronage across all destination types by around 14% – 19%.<sup>45</sup>

In a scenario where 60% of the reformed bus network is operational by 2030, and 25% more service hours are provided compared to the current network, Melbourne would move more people by utilising its existing transport assets more efficiently. If productivity levels like SmartBus are achieved (25 – 45 boardings per service hour), bus mode share in 2030 could reach up to 4% of total trips annually in Melbourne compared to the current 1.62%.<sup>46</sup>



Image source: Melbourne bus by Simon\_sees, 2022

#### Key statistic:

A reformed bus network that achieves the same levels of patronage as existing SmartBus services along key routes could reduce over 100 million private vehicle trips annually. This is equivalent to at least 10% of additional travel demand in Melbourne between now and 2030.<sup>47</sup>

This report advocates for at least 10-minute frequencies to achieve system-wide accessibility. Evidence suggests this kind of network would achieve superior patronage gains to those attainable by a SmartBus-style network.



## Case Study: Dublin | Ireland

Dublin's bus system has undergone significant transformation through the ongoing BusConnects program, which aims to improve bus services and address climate change. It includes investments in infrastructure, fleet, fare structure, ticketing systems and a redesigned higher capacity network.<sup>48</sup> The previous Dublin bus system was complex and lacked integration with other modes of transport. Fares, ticketing and scheduling were outdated and unable to meet current and future demand.<sup>49</sup>

The implementation of BusConnects started in 2021 after extensive consultation and is expected to be completed in 2024. This phased approach allows for adjustments based on feedback and post-implementation learnings. A customer experience program has been implemented to inform the public about service changes and address concerns.

Although parts of the BusConnects program are still ongoing, the New Dublin Area Bus Network has been generally successful, with an expected 36% increase in passengers and 79 million additional boardings per year.<sup>50</sup> The Dublin network redesign provides valuable insights for Melbourne:

- Redesigning a bus system should prioritise meeting current and future demands efficiently, without being overly constrained by the existing network.
- Phased implementation allows for flexibility and the ability to address unforeseen design and operational issues, increasing the chances of long-term success.

**36%**

increase in  
passengers



**79m**

additional  
boardings/year





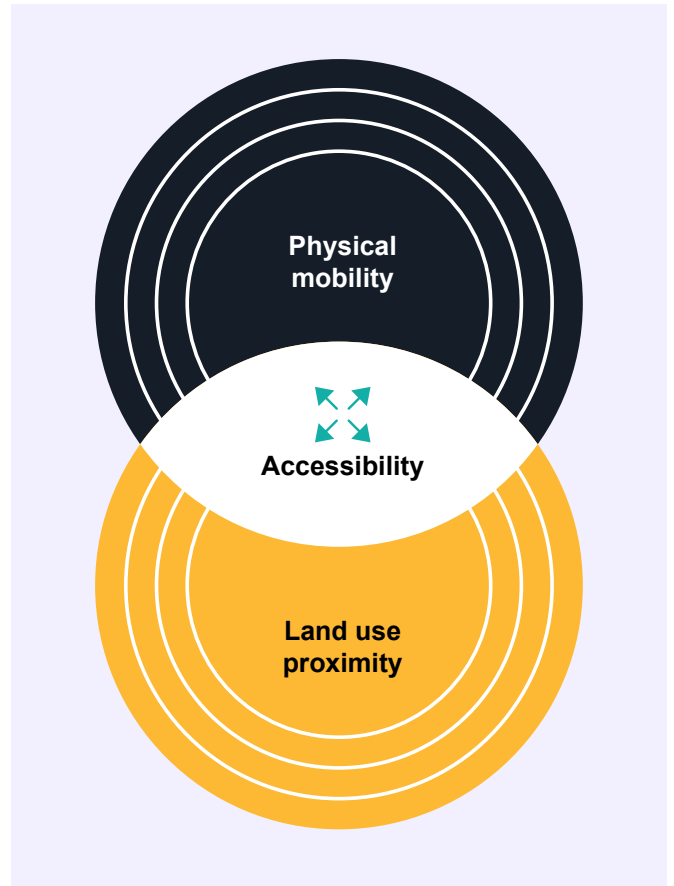
## Improve accessibility

A reformed bus system would enhance accessibility to essential services, educational institutions, employment opportunities and other important destinations, helping ensure active participation of all Melburnians in city life.

To showcase the potential improvements in accessibility through bus reform, the University of Melbourne undertook a comprehensive study, focusing on redesigning the bus system to better serve Melbourne’s major activity centres in the western region.

Melbourne’s western region is experiencing rapid population growth that is outpacing the available public transport infrastructure and services. The existing bus system suffers from lengthy travel times and inadequate connections, exacerbating inequalities and increasing car dependency. The study investigated the impact of implementing high-frequency corridors, evenly spaced bus services, convenient interchange points and prioritised lanes.

The findings of the study were enlightening. With the reformed network, the population catchment within a 30-minutes travel time of the western suburbs’ activity centres expanded by more than 250% during weekday peak periods and over 300% on evenings and weekends.<sup>51</sup> Figure 5 depicts two contrasting networks, with the ‘proposed bus network’ capable of supporting significant patronage uplift in Melbourne’s west.



**Key statistic:**

By consolidating the service hours currently used to deliver 80 existing bus routes into 25 new routes, spaced at regular intervals of 1.5 to 2 kilometres and operating at high frequencies 24/7, three times more people could access major activity centres in Melbourne’s west within 30 minutes.<sup>52</sup>



Figure 5 - Comparison of existing network with a concept for a ‘grid network’ in Melbourne’s west.  
Source: I Lawrie and J Stone, Better buses for Melbourne’s west, The University of Melbourne, 2022.

## Reduce carbon emissions

Reforming Melbourne’s bus system can help the Victorian Government meet its ambitious emissions reduction targets and ensure that Melbourne plays a significant role in addressing climate change. A vital first step in achieving its targets is to tackle the challenge posed by high-polluting diesel buses by transitioning to an electric bus fleet powered by renewable energy sources. By embracing cleaner and more sustainable buses and using these buses to deliver a new and attractive network, the government can reduce emissions while enhancing air quality, thereby promoting better health outcomes for the residents of Melbourne.

Cities in China, Europe and North America are exemplifying the advantages of transitioning to zero emission buses (ZEBs). Notably, China stands at the forefront with 98% of the world’s operational ZEBs, and Shenzhen has emerged as the global pioneer by fully electrifying its extensive fleet of 16,000 buses.<sup>53</sup> The Shenzhen Bus Group, a state-owned company responsible for bus transport services in Shenzhen, estimates that the transition to ZEBs resulted in the conservation of 160,000 tonnes of coal annually and a reduction of 440,000 tonnes in carbon emissions each year.<sup>54</sup> These remarkable achievements highlight the transformative potential of ZEBs in curbing pollution and promoting sustainability.

### Key statistic:

Between 330,000 to 870,000 metric tonnes of carbon dioxide equivalent could be saved in 2030 (equivalent to between 1.6% and 4.4% of Victoria’s total annual transport emissions) with bus fleet electrification and mode share between 1.6% and 4%.<sup>55</sup>

Note: To understand the potential contribution of bus reform to net-zero goals, high level scenario testing was undertaken, considering mode shift, private vehicle fleet electrification, electricity emissions, travel demand projections and available data. The lower estimate assumes modest productivity and higher private electric vehicle adoption by 2030. The upper estimate assumes higher productivity, more electrification of the bus fleet and a slower private electric vehicle uptake.

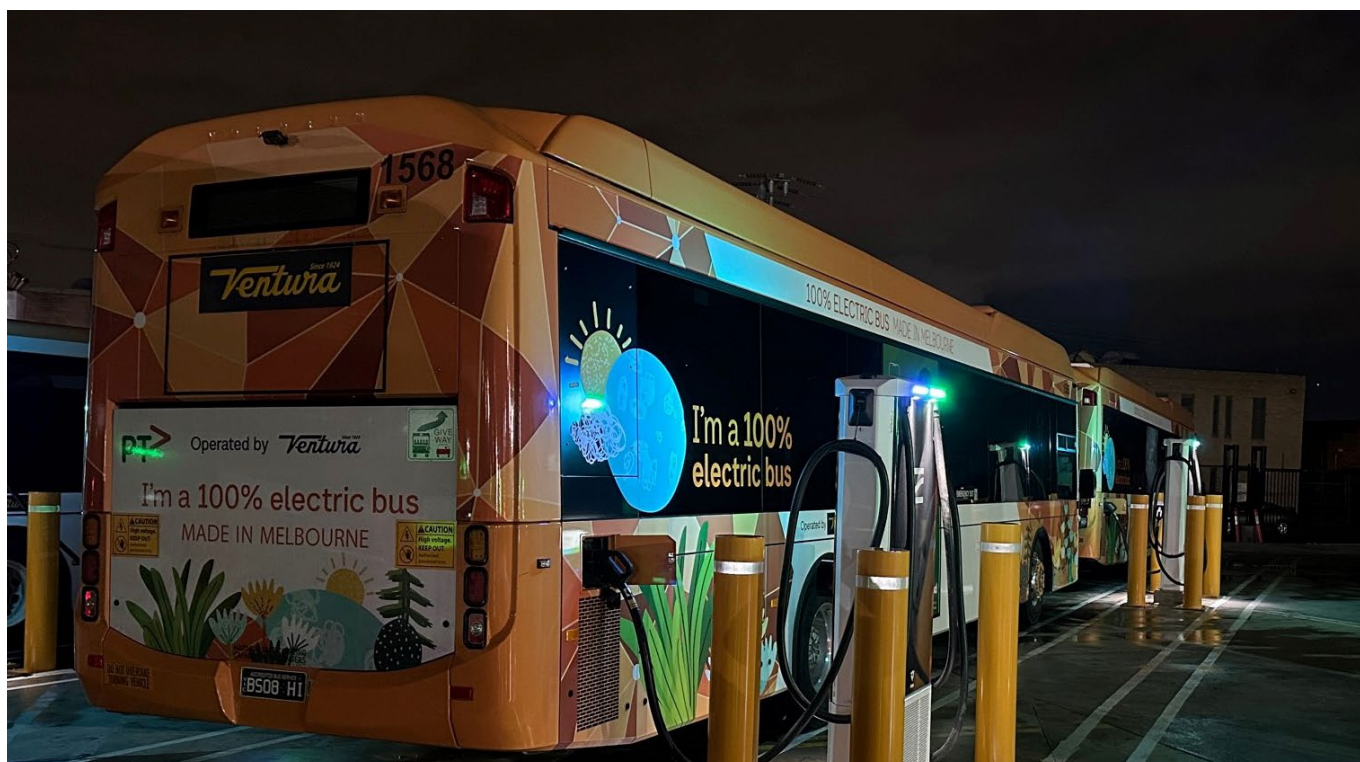


Image source: Ventura Bus Lines

## Optimise transport infrastructure

Reforming Melbourne's bus system should help establish convenient connections for people to other transport modes and infrastructure, including major infrastructure projects undertaken as part of the Big Build program. Driven by the Victorian Government, the program aims to deliver over 165 significant road and rail projects across the state to ensure smooth and efficient movement of people as both the population and commercial activities continue to grow.<sup>56</sup>

Several Big Build projects are underway in Melbourne, including the Metro Tunnel, North East Link and Suburban Rail Loop. It is imperative that all residents of Melbourne benefit from the substantial investments made in these projects, and others, to promote social and economic inclusivity, encourage the use of more sustainable modes of transport and to enhance community connectivity to foster social cohesion.

Cities worldwide have recognised the importance of distributing the advantages of significant transport infrastructure investments. The Better Bus Project in Boston aimed to revamp its bus system to better serve the community and enhance the socio-economic benefits of other major public transport initiatives.<sup>57</sup> By reforming Melbourne's bus system, the city can provide a similar advantage to the community. A rapid, frequent and connected electric bus network, integrated with major transport infrastructure, would enable effortless navigation and reduce private vehicle reliance for more Melburnians.

Furthermore, the provision of frequent bus services is strongly associated with enhanced mode integration. Studies indicate that passengers are more inclined to transfer to other transport modes when bus service frequencies are at least every 10 minutes.<sup>58</sup> However, Infrastructure Victoria's survey of prospective bus users suggests that expectations are higher with respondents indicating a preference for a service frequency of five minutes or better on weekdays when transfers are necessary.<sup>59</sup>

## Save people money

Public transport fares are generally more affordable compared to the expenses associated with owning, fuelling and maintaining a car. A well-designed and efficient bus system can offer substantial savings in transport expenses for Melburnians, presenting a cost-effective alternative for individuals and households.

**Recent analyses reveal that owning a car costs between \$11,000<sup>60</sup> and \$16,000<sup>61</sup> annually and rising, compared to a yearly myki pass for bus travel that costs about \$1,800.<sup>62</sup> These findings highlight the significant disparity in costs between private car ownership and utilising the bus system.**

Moreover, an investigation focusing on the delivery of equitable and sustainable transport options in new Wyndham-based developments highlighted the benefits of early transport service provision. The study revealed that the advantages, encompassing physical health, social and economic benefits, and reduced car ownership costs, outweighed the associated expenses by an impressive ratio of 18:1.<sup>63</sup> This underscores the substantial value that can be derived from a well-implemented bus network, leading to household savings and enhancing overall community well-being.





## Value for money

Reforming Melbourne's bus system could offer exceptional value for the Victorian Government. Through network redesign and the implementation of a comprehensive market procurement strategy for approximately 70% of the network, the government can facilitate a substantial enhancement in bus services. This approach would complement and, in some cases, present a cost-effective alternative, to investing in some major transport projects that demand significant capital and resources.

The construction sector is facing shortages in skilled professionals and materials, resulting in cost pressures and project delays.<sup>64</sup> Reforming the bus system can facilitate efficient transport within the city at a fraction of the cost and time, without placing further pressure on the delivery of major transport infrastructure projects. Moreover, in a challenging fiscal and economic climate, it is prudent to implement cost-effective solutions that offer benefits in terms of health, quality of life, access to opportunities, global competitiveness and environmental preservation. Reforming the bus system can help achieve these objectives.

Market procurement reforms implemented in cities like London, Stockholm, Singapore and Sydney during the 1980s and 1990s have proven to deliver significant savings to the taxpayer. If successfully applied in Melbourne, the procurement process alone has the potential to generate substantial funds for bus investment. By utilising the savings from reform, the government can allocate resources to create a more frequent, direct, and well-connected bus network. Additionally, it could potentially invest in bus stop improvements, bus priority measures, communications technology and bus depot upgrades, after reforming the network.

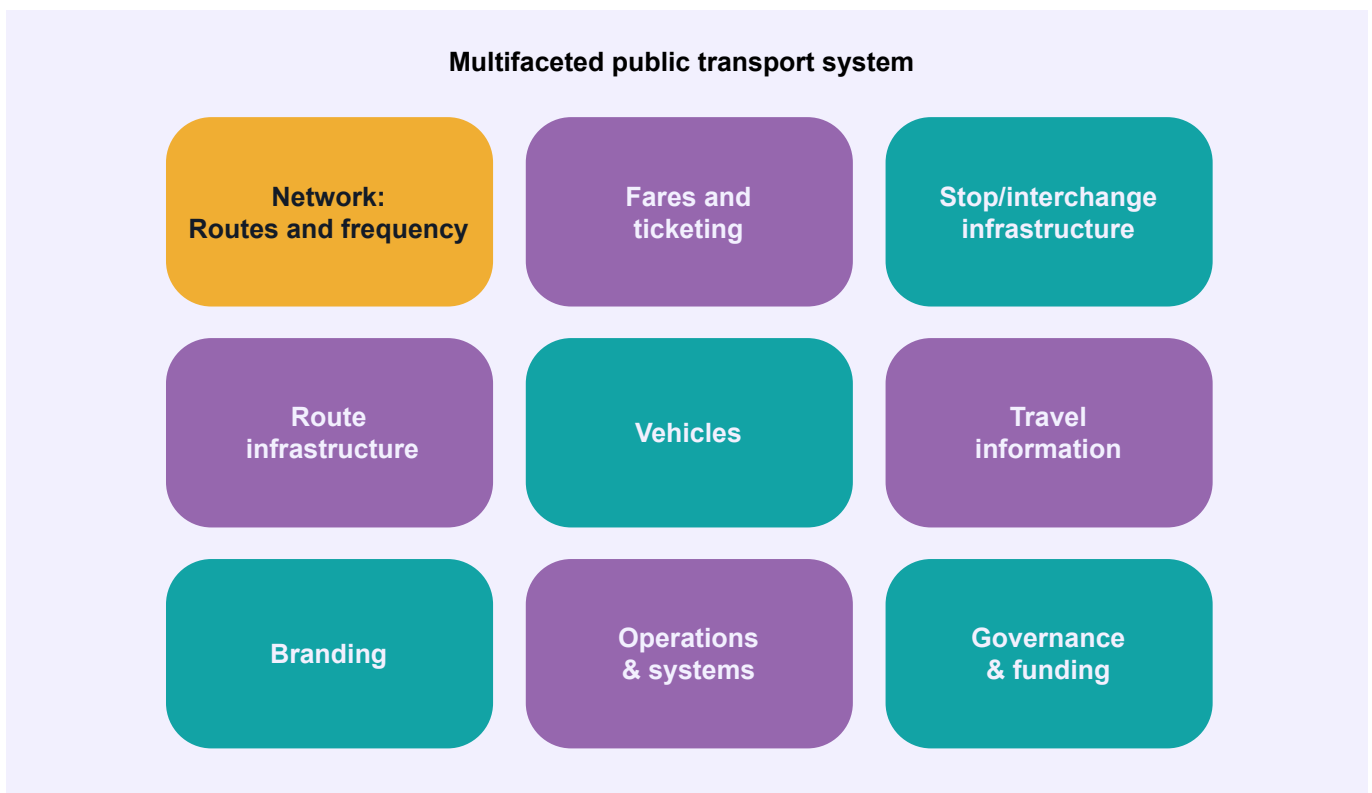


# 4 Pathway to bus reform

The preceding sections of this report have presented a compelling case for the reform of the bus system. The challenges and limitations of the current system, coupled with the potential benefits of bus reform, highlight the urgency and importance of this endeavour.

However, achieving the necessary reforms is a complex and challenging task that requires careful planning and coordination. In the following section, this report will outline a pathway towards achieving bus reform, addressing key elements encompassing:

- Reform principles
- Public narrative
- Network design and performance
- Recontracting
- Network investment
- Partnerships



## 4.1 Reform principles

The development of clear principles to guide the bus reform process is crucial for the effective and efficient implementation of any changes. These principles would serve as a roadmap, which could foster transparency, accountability and public trust throughout the reform process. Five principles are recommended.

### 1. Develop a clear and compelling vision

When formulating goals and objectives, establish explicit network design principles that will serve as the foundation for reform. These principles should embody essential concepts such as accessibility, efficiency, connectivity and sustainability.

## 2. Build a supportive coalition

Engage stakeholders and the community through consultations and workshops to shape and refine the network design principles. This approach ensures that all parties involved understand the potential benefits and trade-offs and can contribute to building wider community support for the reform agenda.

## 3. Create a comprehensive reform plan

Formulate a thorough plan that encompasses new bus routes and services, as well as infrastructure enhancements (such as priority allocation and stop amenities) in alignment with the established network design principles. The plan should closely integrate with other transport modes and respond to the travel needs of the community whilst addressing first and last mile access, and the impact on disadvantaged groups.

## 4. Implement a robust communication strategy

Effectively communicate the network design principles to the public, emphasising the benefits of reform. The communication strategy should foster a clear understanding of the rationale behind the proposed changes and how they align with the overarching vision. Widespread communication of the benefits can help build the social licence for reform. Prioritise briefings with stakeholders directly impacted by the changes and develop strategies that address their concerns.

## 5. Monitor, evaluate and refine the reform plan

Regularly assess the effectiveness of the reform plan, continually evaluating how well the network design principles are being implemented. This ongoing evaluation allows for adjustments and refinements to ensure the reform remains on track and achieves its objectives.

### 4.2 Public narrative

Global experiences with bus reform, including in Victoria, have highlighted the importance of establishing a clear and compelling narrative for reform. The public conversation surrounding bus reform plays a pivotal role in generating awareness and addressing the trade-offs involved, such as coverage versus frequency and direct routes versus transfers. By effectively communicating the objectives, benefits and potential challenges of bus reform, stakeholders can better understand the rationale behind the changes and are more likely to provide the government with the social licence to proceed with reform.

The Adelaide reform experience in 2020 serves as a cautionary example, highlighting the risks associated with insufficient opportunity for public understanding of the trade-offs involved in the allocation of bus services. It is crucial to ensure ample involvement of current and potential beneficiaries during the consultation period and proactively create awareness about the implications of service changes. When designing a new bus network, careful consideration should be given to the preferences of existing and potential users, taking into account a range of service attributes that contribute to a positive experience.

The Victorian Government should continue to leverage the ongoing work of its agencies, as well as the research and recommendations that are developed by Infrastructure Victoria, to build the public narrative for comprehensive reform, the benefits that can be delivered and demonstrate a clear understanding of users' needs.

## Case Study: Houston | US

Houston revamped its bus system in 2015, replacing a peak-oriented, low-frequency radial system with an all-day frequent grid network covering the entire city. The reform process lasted 18 months and involved extensive public engagement, with its 'clean slate' approach adopted by other US cities since.

Like Melbourne, Houston faced challenges due to its car-centric infrastructure and low population density. The bus system had not kept pace with demographic changes and lacked coverage in areas with high transit needs. Local bus service was infrequent and had limited operating hours. To address these issues, Houston's transit authority formed a strategic planning committee, which included stakeholders from various sectors. After intense discussions on coverage versus ridership goals, a draft network plan was developed. The plan realigned all local routes into a frequent grid network, integrating them with recently opened light rail lines.

Community engagement and public support, along with a 4% increase in the operating budget, were crucial to the success of Houston's reform. The decision to deviate from the cost-neutral objective of the reform allowed existing coverage routes to continue operating.

Although ridership gains were modest, they countered the decline seen in car-centric cities worldwide. Houston's bus ridership increased on local routes and park'n'ride routes,<sup>65</sup> with the light rail line experiencing the biggest gains due to improved integration with buses. Key learnings for Melbourne from Houston's bus reform include:

- Bus reform can enhance the benefits of major infrastructure projects, such as rail lines.
- Engaging with stakeholders and addressing trade-offs associated with reform is vital to anticipate community concerns and gain public support.
- With political will and dedicated resources, reforms can be implemented in relatively short timeframes.





## 4.3 Network design and performance

To successfully reform Melbourne's current bus system, it is crucial to embrace and communicate modern practices in network and service design. Adopting an integrated network-based approach, closely coordinated with the operation of the rail and tram network, is vital for the success of public transport<sup>66/67</sup> and relies on several key principles for effective network and route design. It is important to provide clarity to affected users, allowing them to comprehend the overall impact of changes as well as the local implications and advantages. Embracing contemporary design principles is essential for achieving successful reform and can include the following:

### 1. Plan as a single unified multi-modal network

Organise core rapid and connector routes and support local and school routes into a seamless network that integrates with the rail and tram services, prioritising customer convenience. The network should prioritise overall accessibility instead of focussing solely on local travel needs. Minimise service duplication and maximise convenient transfer points to expand the network's coverage.

### 2. Design a frequent core network connecting key destinations

The network should focus on frequent, core services that connects key activity hubs efficiently and handles the majority of bus travel. In alignment with the Victorian Bus Plan, the core frequent network should be a combination of rapid transit, shuttle and trunk routes. These would provide fast and frequent connection to busy activity nodes like employment clusters, major train stations and shopping districts, and create direct and well-connected routes between them. A stable core network is crucial for the success of the supporting feeder services.

### 3. Arrange connector and local services around the backbone

Secondary connector services should connect to the core, frequent network and provide local access to shopping centres, train stations and major tram stops. School routes can be organised to cater to high, context-specific demand that is not otherwise met by connector or local services. Coverage focused routes, including potential demand-responsive services, should then be planned around the connector network to provide a social safety net and a minimum level of service for residents accessing local destinations.

### 4. Preference speed and directness on the core network

Minimise the use of deviations that reduce walking times or improve access to activity hubs away from the main corridor. These deviations often increase travel time for most passengers and negatively impact service performance. Core services should be designed as direct routes connecting key destinations with minimal deviation.

## 5. Ensure consistent routing and timetabling across the day

Minimise changes to core services that involve altering routes, operating hours, or frequencies, to create a simple and easy-to-understand network. Bus services should follow the same route throughout the day.

## 6. Integrate and co-ordinate services with convenient transfer and waiting times

Coordinate the scheduling of services to maximise the convenience of planned interchanges at key destinations and to allow for opportunistic interchanges at route intersections.

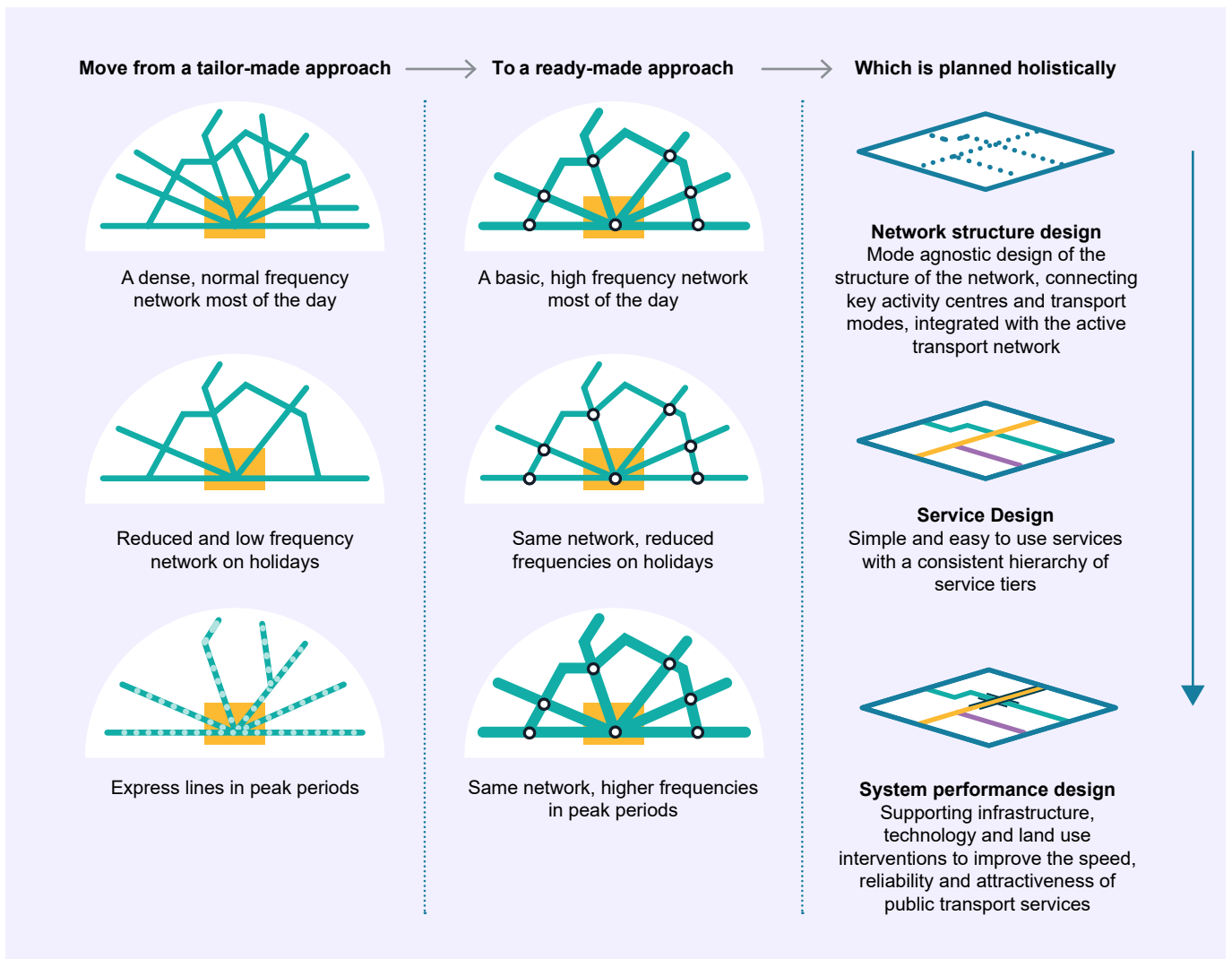


Figure 6: Moving from a tailor-made approach to a ready-made approach with high-frequency routes and simple service design.

Source: HiTrans, *Public Transport – Planning the networks*, 2005 and Arup 2023

After finalising the network strategy and service design (including determining the role for demand-responsive transport), additional improvements can be identified to enhance bus services. These include better bus stops with proper walking connections and improved interchange facilities. To maintain reliability and compete with car travel, service performance can be enhanced with measures such as traffic signal priority and dedicated bus lanes. Investing in fleet modernisation, fare reforms, customer information, branding and overall operations can further enhance the network.

## 4.4 Recontracting

The Victorian Government has begun the process of recontracting 30% of the metropolitan bus system. As part of this process, it intends to facilitate a competitive and transparent bidding process to help increase efficiency, improve value for money, ensure high quality services, promote innovation and technology integration, and to ensure all participants have a fair chance to compete. With the recontracting process to take effect in July 2025, the Committee suggests that the government adopt the following three-stage process for bus refranchising:

### Stage One: Market sounding

The Committee acknowledges the government's intention to conduct a market sounding exercise involving both incumbent and non-incumbent bus operators. While it is crucial to prioritise potential taxpayer savings and the transition to ZEBs during this phase, it is important that additional needs are addressed as well. The market sounding should highlight the importance of the network design and performance as outlined above and include:

- Revised bus routes that better connect the community with key activity hubs.
- More frequent services along key metropolitan corridors.
- Incentives that encourage bus operators to increase patronage.
- Contract areas that service appropriate geographic regions rather than the current fragmented contract areas.

Neglecting to address these issues during the market sounding phase will result in Melbourne maintaining an underperforming bus system that fails to adequately serve the population and perpetuates car dependency throughout the city.

### Stage Two: Invitation to Tender / Request for Proposal

The Committee is aware of the government's plan to release the bus procurement contracts by late 2023, with the anticipated invitation for all interested bus operators to participate in the bidding process. In this regard, it is crucial for the government to conduct a comprehensive assessment of prospective operators beyond the considerations raised in Stage One. The evaluation should determine whether these operators will:

- Support the redesign of the bus system to optimise bus services.
- Support a system of incentives that encourage increased patronage.
- Submit to public accountability through the publication of a 'league table' that assesses operators performance across various metrics and in relation to other operators.
- Support a timetable for reform that is staged over the coming decade.

The government should view the bus operators responses to these issues as an integral part of the decision-making process, giving preferential consideration to operators who demonstrate receptiveness to these conditions compared to those who are not. By prioritising operators who align with these requirements, the government can ensure that the chosen operators are committed to meeting the desired objectives and contributing to the overall success of the bus reform efforts.

During this phase, it is desirable for bus operators to participate in a bidding process for a reformed network informed by Victoria's Bus Plan and associated community engagement, as well as Infrastructure Victoria's concurrent research.

However, if a network plan is not complete in time for October 2023, when operators are invited to bid on the contracts, these operators should be given the opportunity to propose network modifications that align with the government's objectives and specific criteria. For instance, the criteria may entail ensuring that all Melburnians have access to a service every 10-minutes or better within 800 metres (the core network), supported by local services providing a social safety net for all. The consideration of these modifications could be incorporated into broader plans for community and stakeholder engagement prior to implementation.



The timing of Stage Two is crucial to the success of the bus reform process. Given that the procurement process usually takes around four to five months to reach completion, it is essential that contracts are awarded to successful operators by no later than June 2024. This timeline provides operators with a minimum of one year to properly align their services with the contractual requirements. Adhering to this schedule should ensure a seamless and efficient transition to the new bus services.

## Stage Three: Recontracting commencement

Upon the commencement of the new bus contracts on 1 July 2025, it is essential for the government to establish effective mechanisms to monitor and ensure the adherence of bus operators to the contractual obligations. Several actions can be taken by the government to achieve this, including:

- Set clear and measurable key performance indicators, specifying the expected service levels, punctuality, customer satisfaction, safety standards and other relevant metrics.
- Establish a robust monitoring and evaluation system to assess the performance of the contracted operators.
- Issue penalties for non-compliance and incentives for exceptional performance, with these provisions to be outlined in the contracts.
- Maintain open lines of communication with the operators by scheduling regular meetings and feedback sessions.
- Actively engage with the public to gather feedback on bus services and address any issues or complaints.
- Periodically evaluate the performance of the operators and consider contract renewal or termination based on their adherence to contractual obligations and overall performance.





## Case Study: Greater Manchester | UK

Faced with declining bus use and the need for an integrated public transport system, the mayor of Greater Manchester decided to bring buses back under local control through franchising. Public support was strong,<sup>68</sup> although two bus operators legally challenged the mayor's plans. The challenge was dismissed and the first major contracts under the new franchising system were awarded in December 2022.

To ensure value for money, the Greater Manchester Combined Authority (GMCA) adopted a franchising approach where it controls the depots and leases them to successful bidders. Acquiring the depots from existing operators was complex, but GMCA negotiated depot transfers and had alternative options in place if operators were unwilling to cooperate. GMCA's depot strategy represented the best outcome for all parties by reducing the likelihood of existing operators having stranded assets and minimised the transition risk from significant reorganisation of people, routes and assets.

GMCA also implemented a Residual Value Mechanism to facilitate the sale of vehicles from incumbent operators' fleets to incoming operators, ensuring a smooth transition between franchises. Greater Manchester's franchising approach provides key learnings for Melbourne:

- State intervention is necessary to create a market for new bus franchises by removing barriers to entry and fostering competition.
- Government support is crucial in managing the risk associated with upgrading depots and transitioning to a decarbonised fleet.



## Existing contract reform

While focus is placed on recontracting 30% of Melbourne's bus services, it is crucial to recognise that the need for reform extends to the entire bus system during the current term of government. To achieve this goal, the government should take an active role in describing its preferred network for each region within Melbourne. With a clear vision, the government can outline its desired structure of the entire bus network and engage with all bus operators to make the necessary changes that align with its vision.

To implement these reforms with current operators, it is essential that the government consider the practicalities and constraints of each contract. By working within the limitations of the contracts, the government can ensure that the necessary changes are made while maintaining a balance between service improvements and contractual obligations.

## 4.5 Network investment

The investment needed for bus system reform can be divided into four components:

1. Capital expenditure for depot and vehicle electrification.
2. Additional capital costs for infrastructure enhancements, including on-road bus priority, and passenger comfort and safety.
3. Resourcing for communications and engagement to support design and delivery of bus reform.
4. Ongoing operational costs for running buses (a modest increase in current costs).

This report focuses on providing a brief overview of the considerations for investing in the ongoing operational cost of a reformed bus system and the up-front investment required for enabling infrastructure. The costs related to reform delivery and electrification are not covered in this report.

### Operating budget

The proposed vision in this report suggests reallocating resources for bus services to achieve a balance between frequent, direct routes and those with lower frequencies but wider coverage. A modest increase of approximately 25% in the current operating budget of around \$800 million per annum could result in a frequent network with 10-minute service intervals or better.<sup>69/70</sup>

In peer cities that have implemented bus reform, additional budget increases have been necessary to maintain coverage routes. The experience in Adelaide and Houston indicates that a contingency budget of approximately 4% may be needed to ensure the continued operation of coverage services in areas that serve vulnerable populations. Exploring various service propositions is necessary to ensure sufficient coverage that complements the core network. Investing in stop amenities, on-road priority, real-time information and signal priority must also be factored in.

Overall, a reformed network's future operating budget may necessitate an increase of up to 30% in annual expenditure compared to the current system. However, the reinvestment of savings generated through the recontracting process could reduce the expenditure needed to reform the system.





## 4.6 Partnerships

Creating strong coalitions of support and actively engaging with the community are indispensable elements in achieving successful bus system reform. These efforts play a pivotal role in shaping a robust public narrative, which is particularly vital when facing criticism during policy reform and substantial changes to the transport network. This report examines the important stakeholders involved in bus reform and highlights their respective roles in driving the success of the reform process.

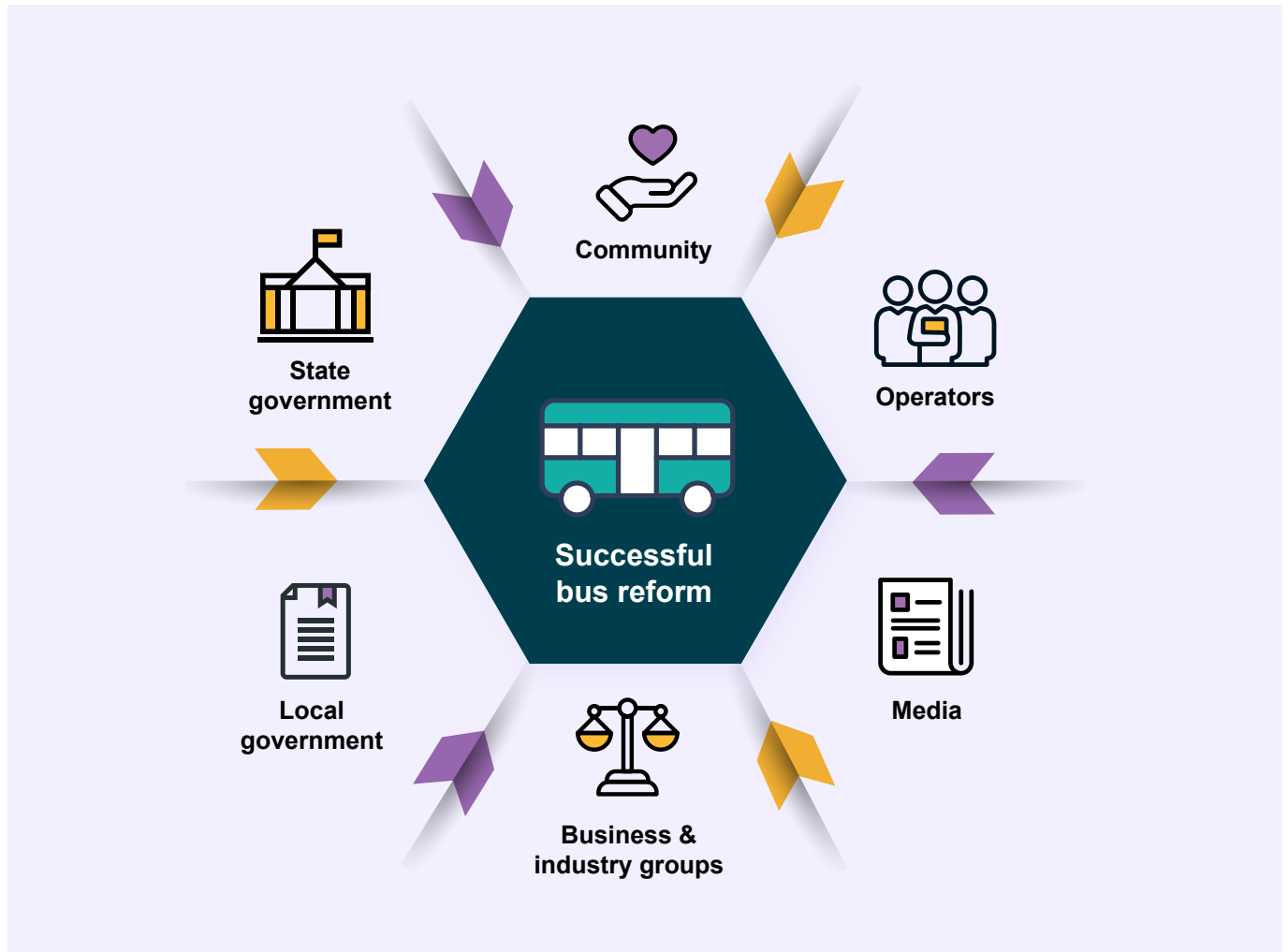


Figure 7: Groups and contributors affecting a successful bus reform

### State Government

The Victorian Government provides policy direction, funding and regulatory oversight, including establishing frameworks for procurement and contract management. It can develop and implement strategic plans, including the coordination of the bus network with other modes of transport and land use planning. Although the Department of Transport and Planning has developed Victoria's Bus Plan, bus reform encompasses various policy benefits that fall under the purview of other portfolios. These portfolios include climate change, crime prevention, disability services, energy, health, housing, urban development and women's affairs. To unlock and maximise the comprehensive benefits of bus reform, it is crucial to foster interdepartmental collaboration to ensure that the full range of benefits are identified, harnessed and effectively communicated.

### Community

The community is directly impacted by changes to the bus system and includes current bus users, residents affected by proposed new routes, non-bus users, transport user associations and community representative groups with a focus upon equity. Their input and feedback during the consultation process help shape the design of the new network, ensuring it meets their needs and addresses their concerns. Community engagement also fosters a sense of ownership and promotes acceptance of the reform measures.

## Bus operators

Bus operators are responsible for delivering the bus services. Their expertise and operational knowledge contribute to the development of efficient and effective service plans. Close collaboration between bus operators and government authorities is essential to ensure a smooth transition, optimise service delivery and monitor performance against agreed targets. In addition to traditional bus operators, community transport operators should also be consulted. These businesses currently provide shuttle and demand-responsive services to vulnerable community members. Their operating model may lend itself to expansion and integration with the public transport network to provide first and last-mile access to traditional bus services for those who cannot access it by other means.

## Local Government

Local government authorities have an important role, especially in terms of land-use planning and infrastructure provision. They can work with state government authorities and bus operators to align bus services with local development plans, identify priority areas for service improvements and facilitate infrastructure upgrades such as enhanced connecting walking routes, bus stops and shelters. Local government authorities also engage with the community to gather feedback and advocate for local needs.

## Business and industry groups

Business and industry groups can provide insights into the transport needs of businesses and industries. They can advocate for improved bus services to support workforce mobility, economic development and accessibility to commercial areas. Collaboration with these groups can help identify opportunities for public-private partnerships and explore innovative funding models.

## Academia

Academia can contribute through research, analysis and data-driven insights. It can evaluate the effectiveness of reform measures, assess the impact on various stakeholders and provide recommendations for continuous improvement. Academic institutions can also support capacity-building efforts by offering training and education programs related to bus planning, management and sustainable transport practices.

## Media

The media can inform the public about bus reform initiatives, generating awareness and facilitating public discourse. They can highlight the benefits of bus reform, share success stories, and help address misconceptions or concerns. The media's role in holding stakeholders accountable and providing a platform for diverse perspectives contributes to transparency and accountability.



# 5 Call to action

## Recommendations

Building upon the compelling case and the outlined pathway for bold and comprehensive bus reform presented in this report, Committee for Melbourne urges the Victorian Government to take decisive action by implementing the following initiatives to deliver an improved bus network for Melbourne:

- 1. Develop a compelling public narrative:** articulate to Melbourne's residents the benefits of comprehensive bus reform for individuals, the community and the city.
- 2. Deliver 10-minute services on key routes:** prioritise the delivery of a core network of bus services at least every 10 minutes along key routes that harmonise with the train and tram network, and invest in feeder services that connect the community with the core network, during this term of government.
- 3. Have a reform plan prior to recontracting:** re-design the current bus system before the new bus contracts come into effect in 2025.
- 4. Embed incentives into bus contracts:** include incentives for bus operators to increase patronage as part of the recontracting process and amend existing bus contracts that incentivise increased patronage.
- 5. Re-invest any savings in the bus network:** ensure savings or additional revenues generated from bus reform is directly allocated to improving the bus network alongside an increase in investment.
- 6. Create coalitions of support:** develop strong partnerships with key stakeholders to deliver comprehensive bus reform.



# End notes

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## About Committee for Melbourne

Committee for Melbourne is an apolitical, not-for-profit, member-based entity that brings together over 140 organisations from greater Melbourne's business, academic and civic sectors, who share a common vision to make Melbourne a better place to live, work and do business.

As an independent organisation we represent no single interest group or political position, but seek to challenge conventional thinking and to develop innovative ideas to continue to enhance our position as an economically prosperous and highly liveable global city.

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