

OPEN FOR BUSINESS

GAINING BUSINESS SUPPORT FOR TRANSFORMING CITY CENTRES

CREDITS

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FOREWORD

Walking, cycling and civic space is good news for business. Creating more attractive and welcoming spaces in cities encourages people to spend more time in cities and use the services and businesses on offer there. This offers huge opportunities to create successful businesses, support local employment and create lively, vibrant spaces in which more people want to spend their time.

Now is the time for local authorities in Scotland, to make bold decisions to deliver cities that prioritise people over vehicles. This could also include changes to transport logistics for businesses, such as the integration of cargo bikes for last-mile deliveries. Cities around the world are making plans for the path to net zero carbon emissions. Transport and business will be central to the success of this. Doing so offers great potential for cities and the people that live there, with benefits spanning from less congestion, cleaner air, a healthier population and busy, revitalised high streets.

The recommendations set in this report can help to make sure that people and businesses capitalise on the full potential of the transition towards cities which put walking, cycling and public transport first. Looking at the successes of European cities – such as Oslo, which recorded zero road fatalities in 2019 – can serve as a source of inspiration for cities here in Scotland. This research shows that creating cities designed around people not only makes sense socially and environmentally, but economically too.



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EXECUTIVE SUMMARY

INTRODUCTION

The role of private cars in urban areas is coming under increasing scrutiny. The rapid growth of car ownership in the mid-twentieth century has seen cars go on to define urban form and transport systems globally. Despite delivering certain benefits for society, such as access to services and employment, the dominance of cars in urban areas has also caused significant environmental, economic and social challenges for cities, including carbon emissions, air pollution, congestion and physical inactivity. As a result of these factors, many are calling into question the compatibility of cars with sustainable urban environments.

Many cities are now consequently placing a high priority on sustainable urban mobility solutions and prioritising walking, cycling and public transport ahead of private car use. One solution gaining increasing popularity across Europe is car-free city centres (CFCCs), defined as zones in the centre of cities in which car use is prohibited or severely restricted. By restricting the presence of cars and prioritising movement by sustainable modes of transport, CFCCs have the potential to deliver solutions to a number of challenges in urban areas, including carbon emissions, physical health, air quality, green space, and quality of life. However, one of the biggest challenges facing transforming city centres towards CFCCs is a lack of support from business stakeholders. Business stakeholders are known to commonly object to the introduction of measures to reduce car access. Given their important role as contributors to economic activity and employment, gaining the support of business stakeholders is one of the key prerequisites for the successful implementation of CFCCs. Understanding the concerns of businesses, and what can be done to address such concerns, is therefore of vital importance for Local Authorities seeking to implement CFCCs and address barriers to creating sustainable cities. The opposition often demonstrated by business stakeholders towards CFCCs, in spite of the potential economic, social and environmental benefits delivered by such schemes, raises questions regarding what can be done to address these concerns with CFCCs.

OSLO'S EXPERIENCE OF IMPLEMENTING A CAR-FREE CITY CENTRE

Oslo, Norway, stands out as a leading example of the large-scale implementation of transforming a city centre to put people first. Oslo has recently implemented arguably the most ambitious car-free project in Europe to date. Announced in 2015, Bilfritt Byliv, or 'Car-Free City Life', is considered to be the largest CFCC in Europe. Oslo has gained substantial attention for its efforts to reduce the use of cars in the city centre. However, opposition from business stakeholders is known to have arisen since the announcement of the scheme. suggesting that problems existed in the implementation of the CFCC and the impact this had on businesses in the city centre.

This report investigates how Local Authorities can best gain the support of business stakeholders in the creation of car-free city centres. In order to achieve this aim, three research questions are posed:

- **1.** What are the main concerns expressed by business stakeholders towards CFCCs?
- 2. To what extent are these concerns relevant and justified?
- **3.** What actions can Local Authorities take to address these concerns?

FINDINGS

BUSINESS STAKEHOLDER CONCERNS WITH OSLO'S CAR-FREE CITY CENTRE PLANS

Six primary points of opposition from business stakeholders were identified:

- **1. Shortcomings in communication,** with businesses expressing that they had received little information regarding the changes planned for the city centre.
- 2. Shortcomings in consultation and collaboration. All business stakeholders interviewed expressed that there were few opportunities to have input on the plans for Bilfritt Byliv.
- 3. The rate at which physical measures were implemented was also a cause for concern for business stakeholders, with a common view that the benefits of the scheme were not implemented fast enough.

- 4. The need for better integration of the CFCC into wider strategies for the city centre (e.g. transport, economy).
- 5. The support measures made available for businesses, with complaints made that businesses were not able to take advantage of the measures on offer, or that measures which would have assisted businesses on certain issues were not in place.

6. The economic impact of the CFCC on city centre businesses, with certain stakeholders claiming that their customer base could no longer access their shops, and as such they were suffering economically.

LOCAL AUTHORITY RESPONSE TO CONCERNS EXPRESSED BY OSLO'S BUSINESS STAKEHOLDERS

As part of the research, discussions were held with Oslo's Local Authority representatives regarding the concerns expressed by business stakeholders. It was acknowledged that early in the project there was a lack of clarity in the communication of both the planned measures and the purpose of Bilfritt Byliv, and that this had ramifications for how business stakeholders perceived the project. Specifically, this came from a lack of clarity in the messaging set out in the project, and a lack of strategy for communicating the project. With regards to consultation, Local Authority representatives largely recognised that more in-depth consultation could have been carried out with individual businesses, and that this would have helped to address their concerns.

Additionally, business stakeholders had not always been kept informed about the impact of their feedback on the design of the project. Extensive consultation was however undertaken with business organisations, which appears to have been crucial in overcoming some concerns (e.g. problems with delivery access). Concerns regarding the rate at which physical measures were implemented were largely understood by Local Authority representatives, with recognition that little emphasis was placed on immediately making use of or filling the space created by the removal of parking facilities, and that implementing measures earlier may have been useful for businesses. Concerns over an apparent negative economic impact of Bilfritt Byliv on city centre businesses were however contested by Local Authority representatives, with the point made that certain shops may be incorrectly attributing blame to Bilfritt Byliv when other issues were responsible for poor economic performance.

RECOMMENDATIONS FOR GAINING BUSINESS SUPPORT FOR CAR-FREE CITY CENTRE PLANS

Based on the concerns identified, the views of Local Authority representatives and business stakeholders, and the wider context of CFCCs, a series of recommendations for Local Authorities based around six themes are set out. These are expanded upon in Chapter 5:

Recommendation 1:

Close engagement and collaboration with business owners

Local Authorities should ensure close collaboration with business owners during the design and implementation of the CFCC to ensure that the views of the business community are captured and integrated into the project.

Recommendation 2: Build relationships with

business organisations

Efforts should be made to establish good relationships and build trust with business organisations, given their close relationship with businesses and knowledge of economic activity in city centres.

Recommendation 3:

Flexibility and responsiveness of Local Authorities

Throughout the consultation process, Local Authorities should demonstrate flexibility and responsiveness in the proposals for a CFCC and be willing to make amendments, based on feedback from business stakeholders.

Recommendation 4:

Develop a comprehensive communications strategy

A comprehensive communications strategy should be established at an early stage in a CFCC project to achieve clarity and consistency in communication, and to ensure that stakeholders are kept informed and engaged.

Recommendation 5:

Promote the benefits of the CFCC

Throughout the project, the benefits of a CFCC should be widely promoted to business stakeholders and the public.

Recommendation 6:

Document the change

The changes implemented throughout a CFCC should be well documented and communicated.

Recommendation 7:

Gather and share information on economic impact

Local Authorities should gather and share regular, reliable information on the economic impact of a CFCC.

Recommendation 8:

Deliver improvements early

Physical measures (e.g. public seating, greenery) should be implemented at a similar time to less favourably-viewed changes (e.g. removal of parking). In doing so, a Local Authority can demonstrate to businesses what is to be gained from reducing car access, not just what is being taken away.

Recommendation 9:

Implement and promote support measures based on the needs of businesses

Support measures should be considered to help businesses take full advantage of a CFCC (e.g. incentives to use newly created street space). These should be developed in cooperation with business stakeholders to ensure that relevant and useful measures are delivered.

Recommendation 10:

Establish a body to oversee the project

To ensure the smooth management and organisation of a CFCC, a body or team should be established to oversee and manage the project.

Recommendation 11:

Integrate CFCC into wider strategies for urban development

Integrating a CFCC within the wider context of a city is vital in achieving a coordinated and holistic approach to addressing a variety of urban development challenges in the city centre.

INTRODUCTION

The role of private cars in urban areas is coming under increasing scrutiny. The rapid growth of car ownership in the mid-twentieth century resulted in urban planning systems dominated by private vehicles in the following decades (Gargett, 2012; Nieuwenhuijsen, Bastiaanssen, Sersli, Waygood & Khreis, 2019). Cars have since gone on to define urban form, transport systems and the very lifestyle of individuals, in many cases being synonymous with individual liberty and economic success (Pharoah & Apel, 1995; Crawford, 2000; Varma, 2017). Cars have delivered undoubted benefits for society, such as access to services and employment (Nieuwenhuijsen et al., 2019). However, the dominance of cars in urban areas, coupled with increasing limitations on urban space, has also caused significant environmental, economic and social challenges for cities and their inhabitants. Car-dominated urban transport systems are well recognised to cause various problems, including carbon emissions, air pollution and congestion (Wooton, 1999; Zhiqiang et al., 2000; UNFCCC, 2018; Toledo & La Rovere, 2018). Additionally, car-dominated urban planning has been highlighted as causing a number of social and health issues, including social isolation. physical inactivity, ill health, and reduced access to green space (Khreis et al., 2016). As a result of these factors, many are calling into question the compatibility of cars with sustainable urban environments and a high quality of life (Bonanomi, 2002).

With many Local Authorities now placing a high priority on environmental and social sustainability, sustainable urban mobility – transport systems prioritising walking, cycling, public transport – is becoming an increasingly popular concept (Newman, Kenworthy & Glazebrook, 2013; Varma, 2017; Hagen & Tennøy, 2018). Prioritising sustainable modes of transport whilst reducing the use of private cars is well documented to deliver benefits for urban areas by creating a more accessible, healthy urban environment without compromising economic activity (Gehl, 2013; Rydningen et al., 2017). Many measures exist to achieve such a shift away from private car use, including charging mechanisms, parking regulations and increased investment in sustainable modes of transport (e.g. Santos & Shaffer, 2004; Gössling, 2013; Dale, Frost, Ison, Quddus & Warren, 2017).

However, one solution gaining increasing popularity is car-free city centres (hereafter CFCCs), defined as zones in the centre of cities in which car use is prohibited or severely restricted. CFCCs are a diverse solution to reducing car use and transforming urban areas, and can involve various 'hard' and 'soft' measures including pedestrianisation, reductions in road space, measures to improve the quality of urban life, increased cycling infrastructure and improvements to public transport (Tønnesen, Meyer, Skartland & Sundfør, 2016). By restricting the presence of cars and prioritising movement by sustainable modes of transport, CFCCs have the potential to deliver solutions for a number of challenges in urban areas, including carbon emissions, physical health, air quality, and access to green space (TEST, 1989; Chiquetto, 1997; Longo, Hutchinson, Hunter, Tully & Kee, 2015; Khreis et al., 2016; Nieuwenhuijsen et al., 2019). Additionally, CFCCs have been proposed as a transformative step towards making cities more inclusive, accessible spaces and increasing the quality of urban life (Nieuwenhuijsen et al., 2019). CFCCs are now gaining increasing popularity as a concept across Europe, with a number of cities implementing or considering substantial reductions in car use in their centres (Tønnesen et al., 2016).

Despite the numerous potential benefits of CFCCs, many cities struggle to implement policies and actions which

facilitate a substantial reduction in car use (Nieuwenhuijsen 2019). One of the biggest challenges faced in achieving a transition to CFCCs is gaining support from business stakeholders (Topp & Pharoah, 1994; Nieuwenhuijsen et al., 2019). Although people-centred urban planning and reduced car use in urban areas has been widely documented to deliver potential economic benefits (e.g. Wright, 2005; Lawlor, 2014; Boussaw, 2016), proposals for CFCCs and other car-free projects routinely fail to gain support from business groups and retailers (Topp & Pharoah, 1994; Szarata, Nosal, Duda-Wiertel & Franek, 2017). Business stakeholders are key actors in society due to their contribution to local economic activity and employment opportunities, and can consequently exhibit substantial power in political decision-making processes, including in debates regarding urban planning (Wright, 2005; Keller, 2018). Given the important role of businesses in cities, gaining the support of business stakeholders is known to be one of the key prerequisites for the successful implementation of CFCCs (Nieuwenhuijsen et al., 2019).

Whilst business opposition can fall over time following the implementation of car-free projects (Wright, 2005; Szarata et al., 2017), a lack of support prior to implementation can cause significant challenges for Local Authorities aiming to develop CFCCs. Failing to gain support from businesses prior to implementation may make Local Authorities less willing to implement such schemes, particularly in Local Authorities with a delicate political situation. Understanding the concerns of business stakeholders, and what can be done to address such concerns, is therefore of vital importance for Local Authorities seeking to transform urban spaces through the creation of CFCCs. The opposition commonly expressed by business towards CFCCs, in spite of the potential benefits delivered by such schemes, raises guestions regarding the approach being taken by Local Authorities when implementing car-free areas in city centres.

Despite the increasing public interest in CFCCs and urban transformation projects (e.g. Cathcart-Keays, 2015; Bendix, 2019), academic research on the subject - in particular issues relating to engagement with businesses – remains scarce (Nieuwenhuijsen et al., 2019). Whilst there is general agreement in the academic literature on the potential benefits delivered by car-free planning, there appears to have hitherto been little focus on the means and approaches by which CFCCs can, or should, be implemented. Given the increasing interest from Local Authorities in implementing CFCCs (Hagen & Tennøy, 2018), there is a need to develop a better understanding of how Local Authorities can implement car-free projects which better meet the needs and expectations of a wide range of stakeholders, including business.

AIM AND RESEARCH QUESTIONS

The aim of this research is to investigate how Local Authorities can gain the support of business stakeholders in the creation of car-free city centres. In order to achieve this aim, three research questions are posed:

- 1. What are the main concerns expressed by business stakeholders towards CFCCs?
- 2. To what extent are these concerns relevant and justified?
- 3. What actions can Local Authorities take to address these concerns?

THE ECONOMIC CASE FOR TRANSFORMING CITY CENTRES



Many towns and cities across Europe have large central areas where people travelling on foot, by bike or by public transport have priority over private vehicles. This can come in many forms, such as pedestrianised streets, segregated cycle lanes, public squares and public transport corridors. Reducing car access and putting people first in cities creates urban environments in which people are both able to, and desire to, spend more time (Gehl, 2013; Szarata et al., 2017, Carmona et al., 2018). Creating spaces in which people can spend time, socialise and relax brings not only social benefits for people living in cities, but also economic benefits for businesses and wider society. Widespread evidence exists in academic literature of the potential for car-free urban planning to positively impact businesses (Lawlor, 2014; Szarata et al., 2017; Wright, 2005, Carmona et al., 2018). Whilst a variety of factors impact the economic success of cities - such as macroeconomic trends, changing consumer preferences and national government policies (Lawlor, 2014) - the economic benefits of creating car-free spaces in city centres remains important. With many high streets in Scotland and the rest of the UK in decline, transforming city centres to create attractive, vibrant and social spaces could be an important tool in revitalising city centres and creating economically successful places.

Evidence shows that prioritising people ahead of vehicles in city centres can deliver increases in the number of people accessing city centres, consequently leading to increased business sales. Hall and Hass-Klau (1985), providing one of the first economic assessments of car-free measures in city centres, identified an increase in both footfall and sales following the pedestrianisation of shopping streets in Germany. This has been confirmed in numerous subsequent studies which have shown increases in retail sales and visitor numbers following reductions in car access and increases in pedestrian access (e.g. Boussaw, 2016; Carmona et al., 2018). In their analysis of car restrictions in three areas of central Kraków, Poland, Szarata et al. (2017) found an increase in both the number of visitors and the length of time visitors spent in the area after car restrictions were introduced. Wright (2005) identifies four cases of cities in England and Germany in which turnover and

footfall increased following restrictions on car access to the city centre.

By increasing footfall and sales, car-free areas can aid the regeneration of retail streets. Shop vacancies have been shown to decrease following the introduction of car-free areas, in turn leading to increased employment in the area (Soni & Soni, 2016; Carmona et al., 2018). A study in Leicester compared shop vacancy rates on streets with varying degrees of car access (Wiggins, 1993, as cited in Wright, 2005). Shop vacancy rates were found to be positively correlated with car access, with the street with greatest car access having a vacancy rate of 15.1% and the street with least car access having a vacancy rate of 3.1% (Wiggins, 1993, as cited in Wright, 2005). Lawlor (2014) highlights the case of Altrincham where investment in public realm improvements have reduced shop vacancy rates from 30% to 8%, in doing so changing social perceptions of the town centre.

Research suggests that reducing car use on streets leads to increases in the value of commercial and residential properties. Urban areas with high quality pedestrian infrastructure have been demonstrated to have property values higher than those which prioritise private vehicles (Gilderbloom, Riggs and Meares, 2008). This is echoed by Wright (2005), who notes that property values tend to increase following the implementation of pedestrianised and public transport-oriented planning. Walking and cycling enhancements have also been found to increase land value by as much as 300% in certain cases (Lawlor, 2014). Increases in property value can consequently lead to high support for car-free projects from the resident population (Wright, 2005). However, whilst this benefits property owners, Sandahl & Lindh (1985) note that an increase in property values is unlikely to benefit retailers who rent retail space. Indeed, increases in property value can lead to higher rent prices, which results in higher operational costs for businesses (Topp & Pharoah, 1994). However, Brambilla and Longo (1977) argue that increasing rent costs can be mitigated through increased turnover.



CASE STUDY: OSLO

Oslo, Norway, stands out as a leading example of the large-scale implementation of a CFCC having recently implemented arguably the most ambitious car-free project in Europe to date. Announced in 2015, Bilfritt Byliv ('Car-Free City Life') is considered to be the largest CFCC in Europe ("Bilfritt Byliv", n.d.; Tønnessen et al., 2016). The scheme has included the large-scale removal of public parking spaces, the closure of streets to cars, measures to improve the quality of urban life, and the re-routing of car traffic throughout the city (Hagen & Tennøy, 2018; "Bilfritt Byliv", n.d.). Oslo has gained substantial attention and recognition for its efforts to reduce the use of cars in the city centre (e.g. Cathcart-Keays, 2015; Bliss, 2017; Peters, 2019).

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OSLO: PROFILE

Oslo is the largest city in Norway and is both the country's political capital and financial centre. The city has undergone substantial growth since the mid-twentieth century, both in terms of population and area (COST, 2016). The population is around 670,000, with the greater Oslo region having a population of approximately 1.5 million (Hagen & Tennøy, 2018). The population of the city is expected to increase by around 30% by 2040, placing pressure on services such as housing, employment and transport in the coming years (Oslo Kommune, 2017). Oslo city centre is around 1.8km² in size, and is dominated by shopping, services and offices, with around 90,000 people working in the city centre area (Rydningen et al., 2017; Hagen & Tennøy, 2018).

CLIMATE GOVERNANCE IN OSLO

Environmental sustainability is playing an increasingly large role in Oslo Kommune's (i.e. the Local Authority) plans for the development of the city. Oslo Kommune has set out its ambition for the city to be 'Smart, Safe and Green' ('Smart, Trygg og Grønn'), which will involve substantial action to reduce the impact of the city on the local and global environment (Oslo Kommune, 2016b). Strong climate targets have been set through the Climate and Energy Strategy, which sets out the Local Authority's ambition to cut carbon emissions by 50% by 2020, and by 95% by 2030 compared to 1991 levels (Oslo Kommune, 2016a). These targets, among multiple other sustainability actions, resulted in the city being awarded the status of European Green Capital of the Year in 2019 ("European Green Capital: 2019 - Oslo", n.d.).

TRANSPORT IN OSLO

One of the largest challenges facing Oslo's transition to sustainability is the transport sector. As such, Oslo Kommune has initiated a number of major projects to adapt and improve Oslo's transport system in the coming years (Hagen & Tennøy, 2018). In comparison to many other European cities Oslo has a high share of journeys made by sustainable modes of transport, with around 63% of journeys being made by either public transport, on foot or by bike (Hjorthol, Engebretsen & Uteng, 2014). This is largely due to Oslo's relatively compact size and extensive public transport system, with the city being served by metro, rail, tram and bus networks. Effort to prioritise the public transport network in recent years has resulted in a growth in road traffic lower than the national average (Oslo Kommune, 2016b). However, the transport sector still accounts for around 61% of Oslo's carbon emissions, making it the largest source of emissions in the city (Oslo Kommune, 2016a). Carbon emissions are estimated to be evenly divided between passenger transport and freight transport (Oslo Kommune, 2016a). Private cars are the primary source of carbon emissions, whilst construction vehicles and freight vehicles also account for a substantial proportion of emissions (Figure 3-1).



Figure 3-1: Carbon emissions arising from transport in Oslo.

In an effort to reduce carbon emissions from transport, Oslo Kommune has set out a number of targets and actions. To reduce emissions from private cars, Oslo Kommune has set targets to cut car use by 20% by 2020 and by 33% by 2030 against 2016 levels (Oslo Kommune, 2016a). To achieve this, emphasis is being placed on adopting a sustainable transport hierarchy approach, whereby walking, cycling and public transport are prioritised ahead of private car use (Oslo Kommune, 2018a). This will largely be achieved by ensuring more journeys are made by public transport, for example by expanding the tram network, prioritising new housing along public transport networks and densifying future city development (Oslo Kommune, 2017; "Fremtidens Byreise", n.d.). Efforts are also being made to increase cycling in the city, with a target set for increasing the proportion of journeys made by bike from 5% in 2014 to 25% in 2025 (Oslo Kommune, 2016a). To deal with the car journeys that remain in Oslo, substantial efforts have been made to speed up the transition to electric vehicles (EVs). Over 20% of cars in Oslo are now electric, making it one of the global leaders on EVs ("Climate and energy statistics", n.d.). The rise of EVs has been aided by the use of various financial incentives, including the use of bus lanes, free parking and exemptions from tolls on the ring road ("Oslo – The EV Capital of the World", 2019).

BILFRITT BYLIV: CAR-FREE CITY LIFE

Oslo's plans for a CFCC began in 2015 following municipal elections which saw the Labour Party, the Green Party and the Socialist Left Party form a governing coalition (Berglund, 2015). One of the key outcomes of the coalition agreement was a plan to substantially reduce the use of cars in the city whilst improving conditions for public transport, walking and cycling by 2019 (Fouche & Solsvik, 2015). The 'Bilfritt Byliv' ('Car-Free City Life') programme was subsequently established with a plan created to establish a 1.3km² car-free area in Oslo city centre (Rydningen et al., 2017) (Figure 3-2). The car-free area is considered to be the largest in any European city (Tønnessen et al., 2016). The area is largely dominated by commercial properties and offices, with only around 1000 people living in the 1.3km² area (Rydningen et al., 2017). The area also has the lowest per capita car ownership in Norway, meaning a low likelihood of conflict with residents regarding car use restrictions (Rydningen et al., 2017). Continued access has been granted for delivery vehicles, people with disabilities, emergency vehicles, and in certain areas, limited private car use.



Figure 3-2: The extent of the CFCC project in Oslo city centre. Source: "Bilfritt Byliv" (n.d.).

1. STRATEGY AND ACTIONS

The overall aim of Bilfritt Byliv is to increase the attractiveness of the city centre and create an urban environment in which people enjoy spending time, whilst simultaneously reducing space for cars ("Bilfritt Byliv", n.d). Bilfritt Byliv is a key component of a number of wider strategies to transform the city centre of Oslo, including the Action Programme for Increased City Life (Oslo Kommune, 2018b). The Action Programme has three overarching strategic aims, which Bilfritt Byliv plays a key role in achieving: to improve connections to and through downtown; to increase interaction and synergies between strategic areas of the city centre; and to highlight and activate hidden spaces (Oslo Kommune, 2018b). Whilst the programme for Bilfritt Byliv officially culminated in 2019, a number of measures to reduce the use of private cars and increase city life will continue up until 2027 through the Action Programme (Oslo Kommune, 2018b). A notable strategic approach taken in Bilfritt Byliv is the decision to target interventions in three distincts zones in the city centre: the 'Cultural District'; the 'Recreation Trail'; and 'Pipervika XL'. Building Bilfritt Byliv around these zones has helped to focus efforts in key areas of the city, and to increase the connections and interactions between these areas (Oslo Kommune, 2019).

Bilfritt Byliv has been implemented in a staggered but rapid manner, with the project gradually rolling out between 2017 and 2019. A number of measures and interventions have been introduced throughout the project (Table 3-1; Figure 3-3). The first major intervention came in 2017 with six pilot areas testing measures to reduce car access and increasing the quality of urban space ("Pilotområder Bilfritt byliv 2017", n.d.). In 2018, the pilot areas were built upon by implementing permanent measures to give greater priority to pedestrians and the removal of over 760 public parking spaces (Oslo Kommune, 2019). Removed parking places have been converted into public space (e.g. seating, greenery), whilst also creating a number of parking spaces specifically for disabled people, tradespeople (e.g. carpenters, plumbers) and commercial deliveries (Hagen and Tennøy, 2018). The majority of the measures have been implemented in 2019 as part of the 'Car-Free Livability Programme', a suite of actions including the establishment of permanent measures to improve the quality of urban life (e.g. greenery, street furniture) as well as changes to street design across the city centre (Oslo Kommune, 2019). New street design has and will take various forms, including pedestrianisation with no private car access; 'market streets', providing wider pavements and one-way car access; and 'multipurpose streets', with provision for public transport and limited car access (Figure 3-4).

MEASURE	EXAMPLE AREA IMPLEMENTED
Street closure to private vehicles	Fridtjof Nansens plass, Øvre Slottsgate
Reduction of road space for vehicles	Rådhusgata, Myntgata
Removal of parking	City centre-wide
Artistic installations	Fridtjof Nansens plass
Furniture (e.g. tables, chairs, benches)	Youngstorget, Tordenskiolds gate, Øvre Slottsgate
Water fountains	Langkaia, Kontraskjæret, Grev Wedels plass
Public toilets	Christian Frederiks plass
Play areas	Myntgata, Grev Wedels plass, Langkaia
Increased lighting	Rådhusgata, Fridtjof Nansens plass, Myntgata
Greenery (e.g. flowers, plants)	Youngstorget, Kirkegata, Dronningens gate

Table 3-1: Measures implemented throughout the Bilfritt Byliv programme. Source: Adapted from Oslo Kommune (2019).





Figure 3-3: New public amenities introduced as part of Bilfritt Byliv on the central shopping street, Karl Johans gate (left), and outside the city hall on Fridtjof Nansens plass (right).



Figure 3-4: Map of Oslo city centre with the new street planning and car access restrictions. Source: Oslo Kommune (2019).

2. OPPOSITION

Despite receiving widespread positive coverage from international media (e.g. Clugston, 2019; Peters, 2019), Bilfritt Byliv has received considerable opposition from certain sources over the past four years since its inception (Cathcart-Keays, 2017). Opposition has largely taken the form of negative coverage of Bilfritt Byliv in the media (i.e. newspapers, social media) and has mainly arisen from two sources: opposition political parties, and business stakeholders. Political parties outside the governing coalition have expressed strong opposition throughout the project, raising concerns regarding the impact on citizens of restricting car access to the city centre (Mosveen, Johnsen & Johnsen, 2015). Opposition political parties do however appear to have reduced their opposition to Bilfritt Byliv since the project was initially announced (e.g. Eggesvik, 2016).

Business groups have also expressed concerns at various stages of the project. When plans were first announced regarding the intention to reduce car access in the city centre, many shop owners expressed concerns (Rydningen et al., 2017). Concerns were expressed by both business owners (e.g. Deshayes, 2018) and by business associations (e.g. Løken & Moskvil, 2015). Based on reports in the media, opposition appears to largely relate to concerns that customers would be unable to access shops, and the consequent economic impact on shops in the city centre.

More extensive research appears to confirm reports in the media regarding a lack of support from business for Bilfritt Byliv. A report commissioned by Oslo Kommune in 2018 highlighted the negative views that many businesses hold regarding the car-free project (Rieck, 2018). A majority of businesses surveyed held negative views regarding the impact of Bilfritt Byliv on the number of people using the city centre; the measures and interventions introduced as part of the project; the impact of the project on business turnover; and the level of information received from Oslo Kommune regarding Bilfritt Byliv. The negative sentiments expressed by businesses towards various issues suggests Oslo Kommune has struggled to engage with and gain the support of businesses throughout the project.

3. PRELIMINARY IMPACT

Given Bilfritt Byliv has only recently been implemented, it is difficult to assess the full impact of the project. However, a limited amount of research has been carried out to gauge the impact on city centre businesses. To monitor the progress of Bilfritt Byliv, Oslo Kommune has commissioned annual assessments of visitor numbers and 'stays' in the city centre (i.e. time spent sitting in public seating, play areas etc). Whilst variation existed across different streets, the report for 2018 found an overall 10% increase in the number of pedestrians using the city centre compared to 2017, and a notable increase in the time being spent in the city centre (Polle, 2018). The report did not however find any substantial changes in people's opinions of the city centre, how people access the city centre, or how people spend their time in the city centre (Polle, 2018). Limited economic research has been conducted to date on the impacts on city centre businesses. However, a recent report from the Institutt for Bransjeanalyser (Institute for Industry Analysis) found that retail trade in Oslo city centre in 2018 was comparable to areas outside the city centre, suggesting that the car-free measures have not deterred people from shopping in the city centre (Hopland, 2019). Additionally, there appears to have been little change in how people are using or accessing the city centre. Hagen & Tennøy (2018; personal communication, 21 August 2019) found no notable change in either how often people were travelling into the city centre in 2018 or 2019 compared to 2017, nor the mode of transport being used to access the city centre. It is however important to consider that little time has passed since the introduction of car-free measures in the city centre. In the case of both economic impact and travel choices, it will be important to continue monitoring the impact in the coming years to assess the long-term impact of reducing car access in the city centre.

METHODOLOGY

3

This research was conducted through a qualitative approach, with the primary method of investigation being interviews. The purpose of these interviews was to gain a detailed, first-hand account of the events, actions and relationships of relevance to Bilfritt Byliv, as well as the opinions of relevant stakeholders on topics relating to Bilfritt Byliv and the urban development of Oslo city centre more generally.

INTERVIEWEE SELECTION

A process of theoretical sampling was undertaken to select interviewees. Theoretical sampling allows the researcher to identify individuals who are deemed to be most well informed regarding a particular subject, the aim of doing so being to achieve the most accurate account possible of the situation in question (Walliman, 2015). Three stakeholder groups were identified as being of particular importance: employees of Oslo Kommune agencies working on Bilfritt Byliv; business organisations with a focus on Oslo city centre; and business owners located in Oslo city centre. Interviewing stakeholders from both the Local Authority and business was considered important to achieve a diverse range of perspectives and attitudes towards Bilfritt Byliv, and a variety of views on the causes of opposition and solutions for gaining support from business. Interviewees were selected by reviewing policy documents and news articles relating to Bilfritt Byliv and identifying individuals and organisations of particular relevance to the project. Interviews were carried out with ten individuals, with an even split between business stakeholders and representatives of Oslo Kommune.

INTERVIEW QUESTIONS

A unique interview guide was created for each interviewee to suit the knowledge and experience of the person in question. The purpose of doing so was to ensure that the questions being asked were relevant, and that the topics for which interviewees had specialist knowledge could be focused on. An objective for the interviews was also to cover a wide range of issues relating to Bilfritt Byliv, the reason for doing so being to assess the connections between different topics. For example, interviewees were asked questions concerning wider threats facing the economy of Oslo city centre. By asking these questions important contextual factors were taken into account, achieving a more holistic approach to this research.



INTERVIEW APPROACH

A semi-structured interview approach was chosen, whereby a mix of both predetermined and open-ended, responsive questions are posed to interviewees (Walliman, 2015). Interviews were conducted face-to-face in Oslo, in all cases taking place in the office or shop of the individual being interviewed. A face-to-face approach was chosen as this was deemed to be the most reliable means of gaining maximum information from interviewees and ensuring that questions had been fully understood (Walliman, 2015). All interviews were conducted one-on-one between the author and the interviewee, with the exception of one interview where two interviewees were present at once. Interviews lasted for a maximum of one and a half hours, with the majority lasting one hour.

INTERVIEW ANALYSIS

Following transcription, interviews were analysed through content analysis, a method frequently used to analyse qualitative data (Hsieh & Shannon, 2005). By examining and interpreting text, content analysis enables conclusions to be drawn in a systematic, albeit subjective manner (Hsieh & Shannon, 2005). Conventional content analysis was chosen for this research, an approach which involves drawing conclusions from both the text as a whole and sub-sections of text (Tesch, 1990, as cited in Hsieh & Shannon, 2005; Morgan, 1993). During an initial analysis of text, notes were taken regarding potential themes and patterns within responses. These notes, or 'memos', were compiled, reviewed

and summarised to develop a set of key themes and concepts. This process is known as coding, whereby categories of response are identified to conceptualise information captured in interviews (Walliman, 2015). An iterative coding process was taken, where new and refined codes were added following an interview, upon which subsequent interview analysis could be based (Walliman, 2015). Through this process, themes, concepts and arguments were developed, facilitating both findings and points of discussion. Interviewees remain anonymous, but are described by whether they were a business stakeholder or a representative of the Local Authority (e.g. B1, B2, LA1, LA2).





FINDINGS

This section outlines the results of the investigation into the concerns of business stakeholders with Bilfritt Byliv. Throughout the interview analysis efforts have been made to construct a narrative, based on the perspectives of both business stakeholders and Local Authority representatives. Key findings based on business stakeholders' perceptions of Bilfritt Byliv, and Oslo Kommune's efforts to accommodate businesses, are set out. First, the approach taken by Oslo Kommune in consulting business stakeholders is documented to build on the policy document review. Secondly, business attitudes towards Bilfritt Byliv are set out. The relevance and justification of the concerns expressed by business stakeholders is then considered by reflecting on input from Oslo Kommune representatives.

APPROACH TAKEN BY OSLO KOMMUNE TO ENGAGE AND SUPPORT BUSINESS STAKEHOLDERS

It is evident that Oslo Kommune have placed a high priority on engaging stakeholders in the development of Bilfritt Byliv. Oslo Kommune has sought to go beyond legal requirements for stakeholder engagement by working closely with business (and other) stakeholders in the development of Bilfritt Byliv through a number of approaches (Interview LA2, LA4).

Consultation with business stakeholders has primarily been undertaken through Levende Oslo ('Living Oslo'), a public-private partnership aiming to create an attractive city centre and foster collaboration between the Local Authority and business stakeholders (e.g. business organisations, property owners) (Interview LA1, B2). Regular meetings have been held since the beginning of Bilfritt Byliv, the aim of which being to find solutions to create an attractive city centre and ensure that Bilfritt Byliv works well for businesses (Interview LA1). Levende Oslo also provided a platform for further collaboration; for example, the agency responsible for managing Bilfritt Byliv established further meetings with business organisations through Levende Oslo (Interview LA2). For Næringslivets Hovedorganisasjon (NHO), the Norwegian Chamber of Commerce, collaboration through Levende Oslo was considered a meaningful way to raise issues and overcome challenges (Interview B2). Levende Oslo "opened the door for dialogue" and was a useful opportunity for different stakeholders to understand each other's positions in more detail and work together to find mutually beneficial solutions (Interview LA5).

More detailed consultation with individual businesses during the implementation of changes at the street-level was carried out by Oslo Kommune. During the implementation of the pilot projects (see Chapter 2.4.1), the Local Authority sought input from businesses on the streets where changes were being implemented, and remained open to making changes based on feedback (Interview LA1). Efforts were made to engage with businesses as early as possible before changes were made on their street, with 'street groups' established on several streets to inform business about planned changes and to aid collaboration to address concerns (Interview LA1, LA4). Engagement was also undertaken through activities such as the 'Car-Free Saturdays', which one interviewee noted was a useful means of demonstrating to businesses how a street without car access could be a positive solution for businesses (Interview LA4). Additionally, support measures were introduced to encourage businesses in taking full advantage of the newly-created street space (Interview LA5). For example, reduced prices for the rent of public land (e.g. street space outside shops) and grants for the purchase of electric cargobikes were introduced. Some of these measures were created in collaboration with business stakeholders (Interview LA5). A full summary of the measures undertaken to support and engage businesses as part of Bilfritt Byliv is provided in Table 4-1.

The most important change made to Bilfritt Byliv as a result of consultation with businesses appears to be concessions made for delivery vehicle access. The original proposals for Bilfritt Byliv set out a two hour window for deliveries to businesses in the city centre, as well as access for tradespeople (e.g. plumbers, electricians). However, business organisations raised concerns with this, stating that this would not allow sufficient time for goods to be delivered. This concern was subsequently raised by NHO through Levende Oslo and presented to Local Authority representatives (Interview B2). Following discussions, a decision was taken to extend the delivery access to eight hours a day (Interview LA2, B4). Changes were also made to the parking bays for delivery vehicles, with additional spaces being made available (Interview LA1).

ACTIONS UNDERTAKEN

SUPPORT Measures: Financial	SUPPORT MEASURES: INFRASTRUC- TURE	SUPPORT MEASURES: OTHER	CONSULTATION AND COLLABORATION	COMMUNI- CATION AND PROMOTION
Increased financial grants for cultural activities ^A	Repurposing of public parking space for goods deliveries and commercial parking ^A	A shared events calendar to encourage stakeholders to carry out events ^A	Pop-up brainstorming workshops to help stakeholders set up activities in the city centre ^A	An information platform providing information about parking and goods deliveries ^A
Financial support for businesses to purchase electric cargo bikes ^E	Increased secure bike parking in areas of commerce ^B	A 'city accountancy' tool to monitor trade and industry in the car- free area ^A	Create venues where stakeholders can collaborate regarding activities for increased city life ^A	Focused promotion of Oslo city centre with clear information about measures and activities ^A
Reduced rent of public land within Ring Road ^{1E}	Creation of consolidation centres for city centre deliveries ^B	Aim to make parts of the urban realm available for use by businesses ^B	A dedicated action plan for participation ^A	Establishment and promotion of 'Car- Free Saturdays' in Oslo city centre ^A
		Provision of arrangements for events (e.g. power connectivity) ^B	Aim to facilitate cooperation with businesses on Tordensskiolds gate, Rosenkrantz gate and CJ Hambro's Place ⁸	An information platform about road construction during construction periods ^c
		Creation of a strategy to encourage the use of space along Tullinløkka and Torggata ^B		Engagement of stakeholders through information campaigns ^D

Table 4-1: Actions undertaken by Oslo Kommune to support and engage business stakeholders as part of Bilfritt Byliv.

Sources: $\mathbf{A} = \text{Car-Free Livability Programme (Oslo Kommune, 2019)}$, $\mathbf{B} = \text{Action Programme for Increased City Life (Oslo Kommune, 2018b)}$ $\mathbf{C} = \text{The Urban Development of Oslo (Oslo Kommune, 2017)}$, $\mathbf{D} = \text{Climate and Energy Strategy for Oslo (Oslo Kommune, 2016b)}$, $\mathbf{E} = \text{Oslo Kommune website ("Grants for the purchase of electric cargo-bikes for businesses", n.d.; "Grants, scholarships and stipends", n.d.).$

BUSINESS STAKEHOLDER CONCERNS WITH BILFRITT BYLIV

It was clear from the interviews that a number of concerns did exist amongst business stakeholders. Few issues were identified which had been entirely resolved, the most apparent of these being the changes to delivery vehicle access. As such, this section focuses solely on issues which persist, and those which have been partially resolved.

1. SHORTCOMINGS IN COMMUNICATION

One of the most common objections to Bilfritt Byliv was a lack of information regarding the implementation of the project. Business owners expressed that they had received little information regarding the changes planned for the city centre (Interview B3, B4, B5). It was felt that both the frequency of contact from the Local Authority regarding the planned changes to the city centre and the detail of information was lacking (Interview B4). Indeed, one business owner claimed that the street on which his business is situated was closed to car traffic with "no prior notice", and that the only information available regarding this change was from newspapers (Interview B3). The perception of a lack of information about planned changes was echoed by other stakeholders, who claimed that information was not accessible or easy to find for businesses (Interview B3).

A major problem caused by shortcomings in communication and a lack of information about Bilfritt Byliv was a sense of uncertainty in the business environment. This appears to have impacted the confidence of businesses in the economic sustainability of their operations and in making long-term investment decisions in their business. The primary cause of this uncertainty appears to have been a lack of clarity in the objectives and practicalities of Bilfritt Byliv. When Bilfritt Byliv was announced in 2015, there seems to have been immediate uncertainties regarding the implementation procedure and the extent of restrictions imposed on car use. Representatives from both NHO and Oslo Handelsstands Forening (OHF), the trade association for Oslo, expressed that there was a lack of clarity regarding, amongst other things, the changes to delivery vehicle access and the overall goal of the project (Interview B1, B2). This lack of detail resulted in unpredictable economic conditions for businesses in Oslo city centre (Interview B1):

"To us it [the goal of a car-free city centre] was most likely a golden target with absolutely no substance to it... The one thing our members want is stability, predictability. When you want to invest a million euros in one area or in one building, you need to have some sort of stability and certainty... **?**

Another issue arising from shortcomings in communication appears to have been business stakeholders and the Local Authority in many cases working on the assumption of different information regarding the economic impact of Bilfritt Byliv. Whilst early research suggests some positive impacts of Bilfritt Byliv, some business stakeholders held negative perceptions about the economic impact of the project (see 'Economic impact') (Interview B1, B3). Additionally, various figures were quoted regarding shop vacancy rates in the city centre (Interview B3, B4, LA5). This is explained by an apparent reliance on the media as a source of information, which was a recurring theme amongst business owners interviewed, who claimed that their information on Bilfritt Byliv largely came from newspapers, rather than official sources from the Local Authority (Interview B3, B4).

2. SHORTCOMINGS IN CONSULTATION

Despite the efforts made to consult and collaborate with various actors in the development of Bilfritt Byliv, business stakeholders commonly stated that they did not feel that consultation had been extensive enough.

All three businesses interviewed expressed that there were few opportunities to have input on the plans for Bilfritt Byliv. One business owner had been part of a meeting between businesses and Local Authority representatives, the aim of which was to identify concerns and find solutions (Interview B3). However, according to the business owner, there was no follow-up to this meeting and no further information was provided to participants (Interview B3). Even business representatives who were generally supportive of the project expressed that consultation had been limited (Interview B4, B5). The view that consultation with individual businesses was lacking was echoed by business organisation representatives, with one stating that more focus should have been put on direct engagement and dialogue with the owners of businesses in the city centre (Interview B2). There was a sense that information regarding the project was not being directed at the actual occupants of buildings in the city centre (Interview B2):

I think they could have had a lot more dialogue. They say they've had a lot of dialogue but I'm not so sure... They should go round more and speak to the tenants directly and not to the property owners. ""

Whilst extensive consultation does appear to have taken place with business organisations, some concerns were expressed regarding the process of engagement. It was claimed that meaningful consultation took some time to achieve, with little dialogue or collaboration achieved in the early stages of Bilfritt Byliv (B1). Additionally, questions were raised regarding whether such consultation actually delivered meaningful amendments to Bilfritt Byliv (Interview B1). This led to the view that

the engagement is still not where it should be... between the government and municipality ??

(Interview B1). One Local Authority representative also suggested that businesses felt that the Local Authority was going ahead with plans for Bilfritt Byliv without due consideration of the local needs and interests of businesses in the city centre (Interview LA5).

3. RATE OF IMPLEMENTATION OF PHYSICAL MEASURES

The approach taken for implementing changes to the city centre as part of Bilfritt Byliv raised concerns from business stakeholders. In particular, the decision in the early stages of Bilfritt Byliv to focus on removing parking spaces and reducing car access, whilst not delivering simultaneous improvements in the city centre, came under scrutiny (Interview LA1, B2, B5). It was argued that by not implementing physical improvements (e.g. greenery, public seating) early on, businesses (and the public) couldn't

See the big picture... that the city will be a nicer place to live if there are fewer cars ??

(Interview B2). Several stakeholders mentioned that failing to fill the space created by removing car parking resulted in businesses feeling that they were losing out as a result of the CFCC (Interview LA1):

[Businesses have said] 'if you take something away you need to put something back, or else you are you have only taken away from us... we [the businesses] didn't ask for this to be transformed, the municipality did'. "

4. NEED FOR GREATER CONSIDERATION OF STRATEGIC PLANNING ISSUES

Both business organisation representatives discussed the need for Bilfritt Byliv to integrate into wider strategic plans for transport and the economy in the city centre. There were suggestions that more emphasis could have been placed on using Bilfritt Byliv to rethink how the city centre is planned and managed for the efficient movement of people, enhanced public life and business activity. The representative for OHF discussed how creating a vibrant city centre requires "solutions other than just attacking one transportation mode", with a more joined-up approach needed to increase the attractiveness of the city centre and improve conditions for business activity. Both interviewees noted how lessons could have been applied from the approach commonly taken in shopping malls, which are strategically planned to enhance customer experience and create opportunities for businesses (e.g. where certain shops are located, how people can move around the mall) (Interview B1, B2). It was stated that a similar approach could have been applied in Bilfritt Byliv by placing more emphasis on integrating transport modes, for example by linking parking garages with tram and bus stops, but that this opportunity had been missed (Interview B1). One interviewee had recommended to Oslo Kommune that a body - made up of public and private actors - be established to manage and plan the city centre economy, and that doing so would have helped to integrate economic sustainability into Bilfritt Byliv (Interview B1). However, this suggestion was apparently not taken forward by Oslo Kommune, to the disappointment of certain business groups (Interview B1).

5. ISSUES WITH SUPPORT MEASURES

It was apparent that issues arose with the support measures for businesses provided by the Local Authority. Despite measures being implemented to aid businesses in the transition to the CFCC (as outlined in Chapter 4.1), frustrations were expressed regarding the inability of businesses to actually take advantage of certain measures. This was most evident in the case of the reduction in rent for the use of public land on streets in the city centre. This measure was intended to help businesses to make use of space outside their shops, in doing so creating more 'city life' (Interview LA1). However, several interviewees noted the limited application of this measure. According to one interviewee, public awareness of the policy was lacking, meaning that few businesses had enquired about the scheme (Interview B2). It was also mentioned that there was a lack of longterm certainty with the policy (Interview B2). This is a problem for businesses, who need long-term guarantees about the availability of reduced rent of land in order to invest in the use of the street space (e.g. high quality outdoor furniture for outdoor dining) (Interview B2). Additionally, restrictions exist on the type of organisations which can apply for a reduction in rent, limiting the ability of businesses to receive support (Interview LA1).

Cases also arose which suggested that Oslo Kommune needed to provide more flexibility in the support measures offered to help businesses adapt to new conditions in the city centre. This was exemplified in the case of one business, which planned to create a wine bar in their shop in order to enhance the shopping experience for people visiting their shop. However, the Local Authority was apparently not willing to grant an alcohol licence for the shop, with little reasoning given as to why this could not be implemented, beyond the fact that "this was not a normal request" (Interview B4). Additionally, certain stakeholders were frustrated that the Local Authority would

not consider granting more flexible opening hours for shops in the city on Sundays (Interview B1); however, the power to grant shops to open on Sundays appears to be reserved for the national government, not Oslo Kommune ("Norway's parliament puts block on extended Sunday trading", 2018).

6. ECONOMIC IMPACT

The impact of reducing car access on financial income was a concern for certain businesses. Whilst the majority of people using Oslo city centre travel by walking, cycling or public transport, concerns were raised regarding the economic impact of removing street parking (Interview B1). This largely relates to people on the outskirts of Oslo, who in many cases are apparently unwilling to use public transport to access the city centre (Interview B1, B3). This appears to be a problem for certain independent businesses offering either niche, specialist services or selling large items (e.g. furniture) with a customer base who frequently travel by car (Interview LA2, B3, B5). This was a particular complaint of one business owner,

who claimed that a large proportion of his customer base can no longer drive into the city centre and are not willing to take public transport, and that customers would instead use out-of-town shopping facilities. It was claimed that this is having a substantial impact on the economic viability of his business, and that the business would not survive if it remained in the city centre (Interview B3). It was also claimed that other niche or specialist shops have experienced a similar situation (Interview B1, B3). Other views were expressed that little effort has been made by the Local Authority to consider these shops with a customer base who primarily travel by car (Interview B1).

Frustration was also expressed that the 'city accountancy' tool to monitor the economic impact of Bilfritt Byliv on businesses across the city centre (see Chapter 4.1) had not been introduced earlier. This was the "number one issue" for the representative from OHF, who stated that introducing such a tool to monitor business activity (e.g. by monitoring changes in VAT levels) would have allowed Oslo Kommune to assess the on-the-ground impact of measures implemented through Bilfritt Byliv (e.g. reducing parking spaces) from the beginning of the project.

RELEVANCE AND JUSTIFICATION OF BUSINESS STAKEHOLDER CONCERNS

This section considers the relevance of the concerns expressed by business stakeholders based on discussions held with Local Authority representatives. A summary of the main successes and shortcomings of Bilfritt Byliv is provided in Table 4-2.

1. SHORTCOMINGS IN COMMUNICATION

There was a level of understanding within Oslo Kommune that business stakeholders' frustrations over a lack of communication and uncertain business conditions were in many cases warranted. As demonstrated in Chapter 4, efforts have been taken to establish good communications regarding planned changes, which in some cases does appear to have eased concerns (Interview LA2, LA4). Many of these actions were however only initiated in 2019 through the Car-Free Liveability Programme, and were therefore introduced late into the project. In particular, two issues with communications appear to have caused problems: A lack of clarity regarding the objectives of Bilfritt Byliv; and problems with the strategy for communicating changes taking place in the city centre.

MESSAGING AND OBJECTIVES

It was evident that in the beginning of the project there was a lack of clarity regarding the purpose of Bilfritt Byliv. Whilst the overarching goal of increasing the attractiveness of the city centre was obvious to those working on the project, the external communications of the project did not reflect this at first (Interview LA3, LA4). In the early phases of the project, there was a general perception amongst the public that the primary objective of Bilfritt Byliv was environmental, rather than to increase the attractiveness of the city centre (Interview LA2, LA5). Indeed, there was a suggestion that some of the early communications from the Local Authority relating to Bilfritt Byliv centred on the environmental benefits of the project, rather than the opportunities and importance of creating more 'city life' (Interview LA2).

A key point raised regarding the uncertainty surrounding Bilfritt Byliv was the decision to use the phrase 'bilfritt', or 'car-free', in the name of the project. According to those within Oslo Kommune, the decision to make 'car-free' a central component of the messaging sent a signal to businesses that all vehicle use would be banned in the city centre (Interview LA2, LA3). This prompted negative perceptions from businesses, who feared losing access to their shops and reduced numbers of customers (Interview LA2). This issue was recognised by those working closely on the project, with efforts consequently made to shift the focus from 'car-free' (Bilfritt) to 'city life' (Byliv) in the latter stages of the project (Interview LA2, B2, LA3). There was however a sense that for many people the name of the project still has connotations of cars being banned from the city (Interview LA3). It was noted that placing more emphasis on the benefits of the project and establishing common ground would have been useful in gaining support from businesses (Interview LA4):

We have something in common:The municipality and businesses want people in the streets... People shop, cars don't. ??

"...The main goal should be to have a more lively and vibrant city... And that is something that everyone can agree on, so that shouldn't be hard to communicate. "

An interviewee closely related to the political strategy of Bilfritt Byliv noted the mistake made in the beginning of the project in failing to set out clear messaging, stating that Oslo Kommune should have been much quicker in defining the purpose and overall message of the project (Interview LA5). Improvements were made over the duration of Bilfritt Byliv to make the purpose of the project clear to stakeholders; however starting off with greater clarity regarding the aim of Bilfritt Byliv would have provided more certainty for businesses and enabled discussions to take place to find suitable solutions for businesses (Interview LA5):

" I think [it would have helped] by saying 'this is the goal... we are not going to change the goal but we can have discussions about how to reach it', and being more concrete about what we are doing, what we're willing to change and what we're not going to change. "

STRATEGY FOR COMMUNICATING CHANGES

From the interviews with Local Authority representatives, it appears that there was a lack of strategy for the communication of Bilfritt Byliv in the early stages of the project. Internal systems were not set up in such a manner to clearly communicate the project to stakeholders, or to respond to requests for information from the media (Interview LA5). According to one interviewee Bilfritt Byliv placed a substantial amount of public attention on Oslo Kommune, to an extent which had not been seen before (Interview LA5). There was a lack of clarity regarding who had responsibility for tasks such as disseminating information and responding to media requests (Interview LA5). The result of this was that key information was not effectively disseminated to stakeholders. This was exemplified in one of the first major announcements of the plans for Bilfritt Byliv, which was in relation to the removal of public parking spaces (Interview LA1):

"When the car free city centre scheme was initiated and presented... [the municipality] said that in the first year we will take away 700 car parking spaces in the city centre on the street level. And that was like overnight in a way. So that started quite an aggressive campaign against it. "

It was recognised in retrospect that greater clarity was needed on the different exemptions which were going to be granted (e.g. delivery vehicles, people with disabilities) (Interview LA5). Once the project was moved to the Local Authority's planning department ('Plan, bygg og eiendom') greater focus was placed on providing information and communicating the benefits of the project, resulting in improvements to the guality of communications with stakeholders (Interview LA1). More recently, increasing effort has been placed on promoting the benefits of Bilfritt Byliv to gather support for the project and demonstrate the value of reducing car access in the city centre (Interview LA2). According to one Local Authority representative, there was little focus on publicly promoting Bilfritt Byliv in the early stages of the project. There was recognition that starting this earlier would have helped to address some of the concerns which arose (Interview LA5).

2. SHORTCOMINGS IN CONSULTATION

It was evident from the interviews that the consultation undertaken was a useful exercise and resulted in business stakeholders' views being incorporated into the design of Bilfritt Byliv (e.g. changes to delivery access). As demonstrated in Chapter 4.1, Oslo Kommune made efforts to engage with a range of business stakeholders to ensure that the views of business were taken into consideration in Bilfritt Byliv. However, certain issues did arise with the engagement and involvement of business.

There was recognition within Oslo Kommune that stakeholders had not always been kept engaged and informed about how their views were being incorporated into the design of Bilfritt Byliv (Interview LA3, LA4). Particularly in the early stages of the project, there were shortcomings in conveying to stakeholders what changes were made as a result of their feedback. According to one interviewee, this problem arose in part due to the change in organisational management of Bilfritt Byliv, during which time there may have been a lapse in engagement (Interview LA3). Those taking over the project may not have been aware of what changes were made as a result of feedback from stakeholders, and thus informing stakeholders which changes had been made was challenging (Interview LA3). It was claimed that in the early development of Bilfritt Byliv many meetings took place with various stakeholders, but this was followed by a long period of little engagement or further consultation, creating negative perceptions of the project (Interview LA3).

Additionally, there was recognition within Oslo Kommune that more consultation could have been undertaken with individual businesses, rather than business organisations. There was a feeling that more focus on consultation with individual businesses was a useful exercise in identifying a wider range of concerns, as well as demonstrating to business owners that the Local Authority was taking effort to address their concerns (Interview LA5). The case of the removal of parking spaces was raised as an example of where consultation with individual businesses had shortcomings (Interview LA2):

We had to remove 300 parking spaces in 2017... The main goal was to fill it with something, and I guess we could have been better in taking businesses into meetings and asking what we can do together, and not just doing it and saying this is what you get.

It was noted that more in-depth consultation and engagement with individual businesses could have resulted in businesses ultimately being more positive about the changes taking place in the city centre (Interview LA5). It was also suggested that a new or additional platform for gauging the views of businesses (and other stakeholders) was potentially needed, as it was felt that the current consultation through Levende Oslo perhaps captured a limited range of views (Interview LA5).

3. RATE OF IMPLEMENTATION OF PHYSICAL MEASURES

Concerns expressed regarding the rate of implementation of physical measures (e.g. public seating) were somewhat appreciated by Oslo Kommune. There was a recognition that in the early stages of the project little emphasis was placed on making use of the new space created by the removal of parking facilities, and that this had contributed to negative perceptions from businesses (Interview LA3, LA4). It was also stated that providing businesses with information regarding the impact of the planned changes was not a worthy substitute for seeing physical changes on the street level (Interview LA4). There was a feeling that once physical measures

had been introduced, businesses began to realise the benefits of Bilfritt Byliv, and that implementing these measures earlier could have helped to address businesses' concerns (Interview LA3, LA4). It was also mentioned that implementing physical measures early on would have been useful for getting feedback from businesses, who could offer suggestions on improving the measures (e.g. which measures are working, which are not) (Interview LA5). However, it was noted that the right balance needs to be found between "having some pilots, doing something concrete in the street really fast, and also having enough time to plan" (Interview LA5). This highlights a challenge that is faced in balancing various demands when implementing a CFCC. Furthermore, given the need to act within the limited time period between municipal elections, finding a balance between adequate planning, due consultation with stakeholders and fast implementation of measures was a difficult task (Interview LA5).

4. NEED FOR GREATER CONSIDERATION OF STRATEGIC PLANNING ISSUES

The integration of Bilfritt Byliv into wider strategic issues was not directly discussed in interviews with Local Authority interviewees. However, by considering policy documents related to Bilfritt Byliv, it is clear that the CFCC is closely connected to a number of strategies for the urban development of Oslo. For example, the Climate and Energy Strategy for Oslo (Oslo Kommune, 2016b) makes explicit reference to the CFCC for its role in reducing carbon emissions in Oslo. Bilfritt Byliv is also closely connected to the Action Programme for Increased City Life (Oslo Kommune, 2018), Oslo Kommune's long-term plan for increasing the attractiveness and livability of the city centre. More generally, it is clear that Oslo

Kommune has placed a high priority on the sustainable development of Oslo, with plans for compact, sustainable growth of the city whilst prioritising the expansion of public transport modes across the city (Oslo Kommune, 2017). Whilst the comments made by business organisation representatives regarding the need for deeper integration of certain issues into Bilfritt Byliv do not appear to have been addressed fully in municipal plans, it is clear that considerable effort has been made to consider how Bilfritt Byliv ties into other strategies and wider plans for Oslo.

5. ISSUES WITH SUPPORT MEASURES

Several support measures were introduced by Oslo Kommune to aid and encourage businesses in making use of street space. This included financial support for businesses wishing to purchase electric cargo bikes, and reduced rent of public land outside businesses' premises to encourage the use of street space. However, the limited application of certain support measures was recognised by Local Authority representatives. This was most evident for the reduction in the rent of public land, which was intended to increase the use of street space outside businesses' premises. According to several interviewees, issues arose with offering businesses reduced rent of land within a specific area of the city, as this did not comply with certain European Union laws on government subsidies for business (Interview LA3, LA4, LA5). This meant that businesses were rarely able to receive this reduction in rent of public land. It was clear that there was a desire to provide support for businesses as part of Bilfritt Byliv, but that in some cases Oslo Kommune had a limited capacity and authority to support businesses. For example, it was stated that there are limited resources available to create more 'city life' and assist businesses (Interview LA4):

"The municipality... can say that the first floor should be 'active' [i.e. businesses open to the public], not offices, but they can't do anything else, for example they can't see if the shops needs some support... it's difficult for us in co-creation because we have so few tools when we do these schemes. "

6. ECONOMIC IMPACT

Based on the responses from Local Authority representatives, many of the points of objection expressed by business stakeholders appear to have legitimacy. However, concerns raised regarding the economic impact of Bilfritt Byliv were in many cases either questioned by Local Authority representatives, lacked supporting evidence, or appeared to have subsided since the start of Bilfritt Byliv. For example, upon the announcement of the large-scale reduction in public parking spaces in the city centre, certain business stakeholders raised concerns regarding the predicted loss of income for businesses, claiming that each parking spot removed was equivalent to reducing business activity by as much as 1.5 million Norwegian Kroner (~£125,000) per year (Interview LA1). However, according to one Local Authority representative, the same business stakeholders no longer make such claims about the economic value of parking spaces, which he believed to be greatly inflated. This suggests that business stakeholders were perhaps overestimating or exaggerating the importance of car access for business activity. This raises questions regarding the validity of, and evidence for, certain claims made regarding the supposed negative economic impact of Bilfritt Byliv.

Certain concerns raised by business stakeholders about the economic sustainability of some businesses were confirmed by Local Authority interviewees, who noted that some independent shops in the city centre are indeed struggling financially (Interview LA1, LA2). However, attributing economic losses to a reduction of car access is challenging, as a range of factors are known to influence business activity (Interview LA1, LA2). There was an impression that businesses were in some cases unfairly attributing blame to Bilfritt Byliv, and that other factors were in fact causing problems for their businesses (Interview LA1, LA2, LA4). The evidence available so far suggests that there has been a slightly positive overall economic impact since the first measures were implemented in 2017 (Polle, 2018; Hopland, 2019). However due to the limited available data on the economic impacts of Bilfritt Byliv, assessing the claims of business about negative economic impacts is challenging. Oslo Kommune has recently committed to introducing the 'city accountancy' tool to closely monitor changes in economic activity within the city centre (see Chapter 4.1); however, those within Oslo Kommune recognised that having such a tool from an earlier stage would have been useful to address concerns and would have "made our job easier, and with less conflicts" (Interview LA2).

KEY SUCCESSES AND POINTS FOR IMPROVEMENT

CATEGORY	SUCCESSES	POINTS FOR IMPROVEMENT
Communication	Focus on promotion of scheme in latter stages of project	Lack of strategy for communication of project; lack of clarity over purpose of project
Consultation	Good collaboration with business organisations	Little collaboration with individual businesses
Infrastructure	Implemented pilot projects to gauge impact	Late delivery of benefits (e.g. seating, greenery)
Strategic planning	Bilfritt Byliv aligned with wider strategies for climate, transport, urban development	Potential for deeper integration of economic development as part of Bilfritt Byliv
Support measures	Designed certain support measures based on feedback from business stakeholders	Little promotion of support measures; limited application of certain support measures
Economic impact	Signs of economic benefits and more people using the city centre	Uncertainties about impact on different types of shops; lack of in-depth monitoring system

Table 4-2: Key successes and points for improvement, based on the results of the interviews. Source: Author.

CONCLUSIONS

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CONCLUSIONS

The aim of this research was to investigate how Local Authorities can gain support from business stakeholders in the creation of CFCCs. In doing so, this research attempted to address a gap in the academic and wider literature regarding the concerns expressed by businesses towards CFCCs and other car-free schemes, and how Local Authorities can address these concerns to create CFCCs which better meet the needs of business stakeholders. The findings set out demonstrate that whilst some concerns arose relating to the premise of reducing car access in the city centre, many of the concerns appear to relate to the manner in which the project has been managed and implemented. This suggests that potential may exist for CFCCs to be created in a manner which better meets the needs of business stakeholders, if a carefully planned approach is taken when implementing the project. Given the limited number of CFCCs implemented to date, it is perhaps understandable that some problems arose in the case of Oslo. The ambition of Oslo Kommune in both the scale of the Bilfritt Byliv and the rate of which it has been implemented should be acknowledged.

This research builds on the hitherto limited academic debate regarding CFCCs. Some of the documented results share common features with previous studies of the views of businesses towards CFCCs, particularly on the importance of communication, consultation and delivery access (e.g. Sotiaux & Strale, 2017). Of particular interest is the close alignment of certain recommendations made in this research with solutions proposed in other literature for the successful implementation of car-free projects (e.g. Nieuwenhuijsen et al., 2019). This suggests that designing CFCCs which better meet the needs of business stakeholders could deliver wider benefits for the CFCC project, and indeed for society as a whole.

In reality, it will not be possible to gain support from all stakeholders for such urban transformation projects. However, the learnings from this research, and the recommendations set out below to gain support from business stakeholders by creating CFCCs which better meet the needs of businesses, and to allow Local Authorities to respond to the concerns of businesses when such concerns arise. It is clear that no single solution will be enough on its own to gain support from business stakeholders, given the multifaceted nature of the concerns raised. Instead a mix of solutions is likely to be needed, addressing a range of issues both small and large.



RECOMMENDATIONS

There are valuable lessons to be learned from the experience with Bilfritt Byliv, both from the successes in engaging with and supporting business stakeholders, and from the issues which arose. Based on input from both Local Authority representatives and business stakeholders, a number of actions were identified for designing and implementing CFCCs which address the concerns of business stakeholders (Figure 5-1). These recommendations, aimed at Local Authorities, have been formulated on the basis of both specific solutions suggested by interviewees, and by considering the context of the issues that have arisen with Bilfritt Byliv as a whole. Several of these recommendations have been identified in other studies focusing on a wider range of issues relating to CFCCs (e.g. Sotiaux & Strale, 2017; Nieuwenhuijsen et al., 2019), suggesting that these lessons are useful not only for potentially gaining the support of business stakeholders, but more generally for successfully implementing a CFCC.

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RECOMMENDATIONS FOR GAINING BUSINESS SUPPORT FOR CFCCS



CONSULTATION & COLLABORATION

The value of collaborating with business stakeholders in the design and implementation of CFCCs is clear. Three key lessons have been identified from the experience of Bilfritt Byliv to achieve better relations with business stakeholders.

CLOSE ENGAGEMENT AND COLLABORATION WITH BUSINESS OWNERS

It is evident that closely involving a wide range of businesses from project inception through to implementation can deliver a CFCC which addresses the concerns of business stakeholders. By engaging businesses and recognising their role as creators of 'city life', an opportunity is presented to gather a wide range of views and assess the various concerns that are held by business owners. Businesses are well positioned to make assessments about the on-the-ground implementation of CFCC projects, given their in-depth knowledge of the local area and the fact that they will be able to see how changes made are impacting the use of the streets.

BUILD RELATIONSHIPS WITH BUSINESS ORGANISATIONS

As well as engaging with individual businesses, effort should be made to consult and collaborate with business organisations from an early stage, given their political significance and their relationship with businesses. Establishing a platform for collaboration was a vital step in building the relationships between Oslo Kommune, the business community and other city stakeholders. This was done in Oslo with the Levende Oslo partnership, but there is an argument for implementing an even stronger form of collaboration with more regular contact and perhaps greater sharing of decision-making or management for the business community. Such a group should meet regularly to keep all stakeholders informed about the development of the project, and to ensure that concerns or issues can be raised in a timely manner. Additionally, undertaking research in cooperation with business organisations would be a useful means of establishing good relationships between business organisations and Local Authorities.

FLEXIBILITY AND RESPONSIVENESS OF LOCAL AUTHORITIES

Local Authorities showing a willingness to be flexible and open to changing proposals is important in addressing the concerns of business stakeholders. Showing a willingness to amend proposals put forward is important not only in addressing concerns, but also in demonstrating that the Local Authority places value on the opinions and needs of businesses. Even in cases where the Local Authority is not willing to make amendments, it appears important that the reasons for this are well communicated to those asking for changes to be made, so that the rationale behind the decision-making of the Local Authority is at least clear.

COMMUNICATION AND PROMOTION

The experience from Bilfritt Byliv shows that developing a coherent approach to communications is vital in keeping stakeholders informed and addressing potential concerns. Three key learning points were identified for developing effective communications.

DEVELOP A COMPREHENSIVE COMMUNICATIONS STRATEGY

Developing a comprehensive communications strategy early on in the project - clearly setting out the objectives and key messaging - would help to provide clarity about the intentions of the project and demonstrate to businesses what the Local Authority is trying to achieve. Stakeholders should be kept well informed about both when and why planned changes are taking place. A communications strategy should be implemented as early as possible in order to set the narrative for the project and minimise the risk of negative perceptions being created in the media at the start of the project. Once there is clarity regarding the intentions of the Local Authority, more focused discussions can be held with stakeholders over how to reach the objectives set. This also allows a distinction to be made between issues which are subject to change, and issues which are not going to be changed. Focusing on and clearly conveying objectives such as creating a more attractive city centre and improving the quality of urban life - one of the most

common objectives in CFCCs - can help to build consensus about the direction in which the city centre should go. Additionally, choosing a project name which emphasises the benefits of the project, rather than focusing on reducing car access, appears key. Selecting a name which focuses on the positives of the project and highlights shared interests, such as a more livable, vibrant city, could be an important tool in framing the CFCC in a positive light and finding common ground.

RECOMMENDATION 5: PROMOTE THE BENEFITS OF THE CFCC

Highlighting the benefits and successes of CFCCs from an early stage could help to convince business stakeholders of the opportunities arising from the project. Efforts should be made to promote successful case studies and supportive stakeholders (e.g. through promotional videos). Doing so in the early stages of the project could help to challenge negative sentiments regarding the impact of the project on city centre businesses. Being positive and highlighting the successes of CFCCs in the messaging of the project is an important tool for building public confidence in the project and combating the negativity commonly displayed in the media.

Effectively communicating the on-the-ground changes taking place throughout the project appears to also be a key step in gathering support for CFCCs. This is vital in showing the positive changes that are being delivered as part of the project. This is relevant for both the physical measures being introduced throughout the implementation of the project, and the changes which have been made to the project as a result of feedback from stakeholders. Communicating the implementation of physical measures is important in avoiding the issue which arose in Oslo of businesses feeling that the project was taking away valuable services (e.g. parking spaces), rather than delivering benefits. Showing business stakeholders how their views have influenced the design of the project is also a useful tool in addressing concerns regarding the project and demonstrating they have an active role to play in the city centre.

MONITORING IMPACT

GATHER AND SHARE INFORMATION ON ECONOMIC IMPACT

Limited information on the impact of Bilfritt Byliv, particularly with regards to the economic impact, was highlighted by both Local Authority representatives and business stakeholders as causing problems for the project. Having shared information is important for bringing a focus to the project and ensuring that all stakeholders are able to make judgements about a CFCC on the basis of the same sources of information. Implementing a detailed system - as has been done with the 'city accountancy' tool in Oslo - to monitor the economic impact of a CFCC from an early stage could help to address concerns regarding the economic impact on retailers, and importantly could help to counter some of the questionable claims commonly made by certain businesses and the media. This information should be reliable and open, allowing stakeholders to have an accurate overview of the impact of the project on different areas of the city. If issues are identified (e.g. localised decline in economic activity), remedial action could consequently be taken by the Local Authority and business stakeholders to improve the situation for businesses.

IMPLEMENTATION OF MEASURES

DELIVER IMPROVEMENTS EARLY

It is evident that implementing measures on the street level at an early stage in a CFCC could help to demonstrate the benefits of and ease concerns about the impact of the project. This applies not only for permanent measures but also temporary measures (e.g. temporary public seating), which may be necessary on streets which are undergoing long-term transformations (e.g. re-allocation of street space). Doing so provides a useful indication to the public and businesses of what those streets will look like in the future. However, care should be taken to test the measures being implemented through trial phases, and to gauge the views of businesses (as well as residents and other stakeholders) so that improvements can be made if problems arise with the measures implemented.

SUPPORT MEASURES

IMPLEMENT AND PROMOTE SUPPORT MEASURES BASED ON THE NEEDS OF BUSINESSES

Offering support for businesses in the transition to CFCCs holds potential for gaining support from these stakeholders. Offering measures developed in cooperation with businesses could be a useful means of identifying potential issues and finding common solutions to help businesses play an active role in creating an attractive city centre. Ensuring that businesses are made aware of the support available to them through advertising and communication will be important in increasing the uptake of support measures provided by the Local Authority. Efforts should therefore be placed on engaging businesses about the measures which are relevant to them and explaining how support can be received. Implementing support measures would however require committed funding from the Local Authority to provide confidence to businesses about the long-term certainty of the support.

PROJECT ORGANISATION

It was clear that strategic planning and project organisation is vital to the successful implementation of a CFCC, and for delivering a project which meets the needs of business stakeholders. Two main lessons to deliver a comprehensive strategy and organisation of a CFCC project were identified.

ESTABLISH A BODY TO OVERSEE THE PROJECT

There is great value in establishing a body or team to oversee the organisation of a CFCC project. This group would be responsible for managing various aspects

of the project, including communications, consultation and coordination of action across different government departments. Whilst different agencies within a Local Authority may still have responsibility for implementing aspects of the project (e.g. planning, business and environment agencies), establishing a group which can coordinate action across different agencies could be important in achieving a holistic approach to the CFCC. Ensuring a joined-up approach between the various agencies of the Local Authority is important in achieving clear communication and cooperation between departments, and more generally maximising opportunities for increasing the livability of the city centre. However, what appears key is that this is not simply an administrative body, but rather has the ability to make decisions and take action, or at least to recommend solutions to elected representatives. Such a body should also be comprised of individuals with a practical knowledge of the project so that concerns or queries about specific measures can be adequately addressed.

INTEGRATE CFCC INTO WIDER STRATEGIES FOR URBAN DEVELOPMENT

Integrating a CFCC within the wider context of a city is vital in achieving a coordinated and holistic approach to addressing a number of issues in the city centre. Efforts to integrate and align the CFCC with long-term plans for the city as a whole could help in reaching the goals of the CFCC and creating a more attractive and livable city centre, in doing so addressing some concerns raised by business stakeholders. In particular, achieving a joined-up and aligned approach between a CFCC and issues such as transport, housing, urban planning and the economy appears to be of particular importance. Doing so ensures that a CFCC is not seen in isolation and can become an integral part of a range of strategies for the urban development of a city as a whole.

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PUTTING PEOPLE FIRST MAKES CITIES WORK BETTER FOR EVERYONE – INCLUDING BUSINESS.

Across the world, a growing number of cities are starting to design their centres for people, not cars. Making cities easier to get around by foot, bike and public transport has a range of social and environmental benefits – but crucially also brings economic benefits too. With high streets facing decline, creating vibrant and social spaces in city centres offers an opportunity to revitalise urban economies. This report builds on the experiences of businesses, business organisations and the local authority in Oslo, Norway, which recently completed a transformation of its city centre putting walking, cycling and public transport first. This report sets out how car-free city centres can be designed to better meet the needs and expectations of businesses, and demonstrates how Scottish cities can create sustainable, successful urban centres.



Transform Scotland is the national alliance for sustainable transport, bringing together organisations from the private, public and voluntary sectors.

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