STRATEGIC TRANSPORT PROJECTS REVIEW

PROTECTING OUR CLIMATE AND IMPROVING LIVES

Appendix B - COVID-19 Addendum

February 2021

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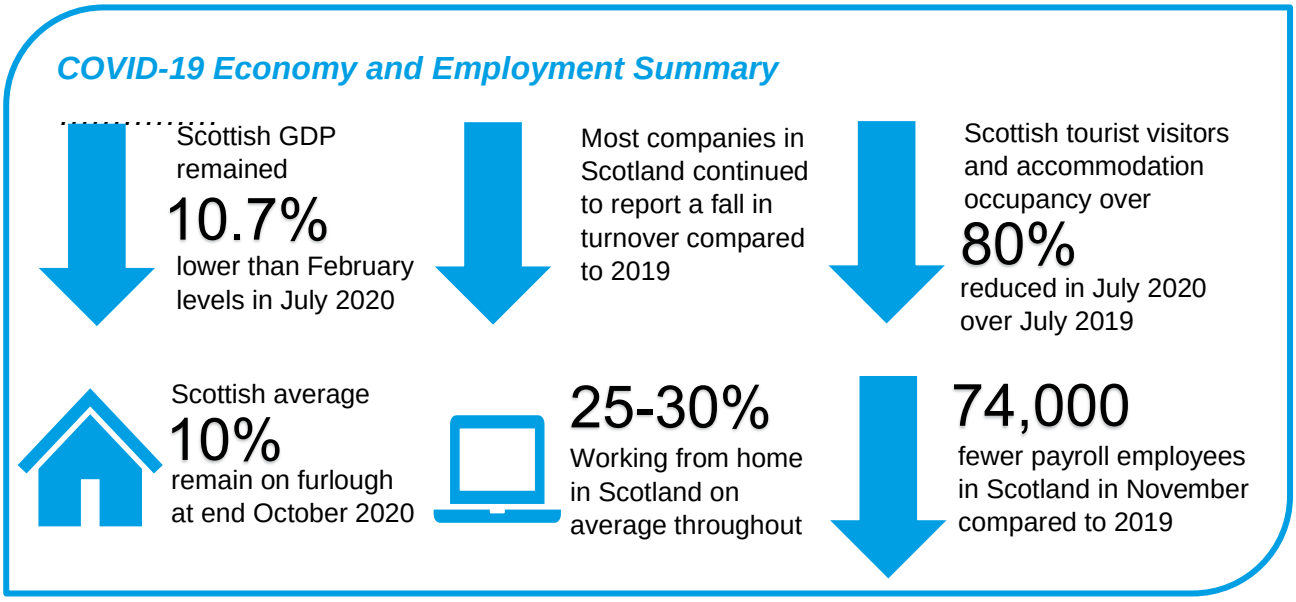
Contents

Executive Summary

This addendum outlines the impact on travel patterns and behaviours over time as the result of the COVID-19 pandemic and helps provide some level of foresight on how COVID-19 will impact on behaviours in the short to medium term. It draws on numerous data sources including work carried out by the Scottish Government and Transport Scotland, Google and the University of Leeds.

The Economy and Employment

The COVID-19 pandemic has resulted in a high level of uncertainty with respect to future economic forecasts. The advent of lockdown in late March all but halted activity in many sectors, due to the closure of non-essential services, shops and entertainment as well as many industries, that were unable to work remotely. As illustrated graphically below, the short-term impact is highlighted by a stark drop in Gross Domestic Product (GDP), business turnover values below expectation, a proportion of employees on furlough or working from home, and unemployment rising.



Equality can be expected to be adversely affected as the impacts are likely to dis-proportionately affect lower income households with reduced resilience to these uncertainties, and young people.

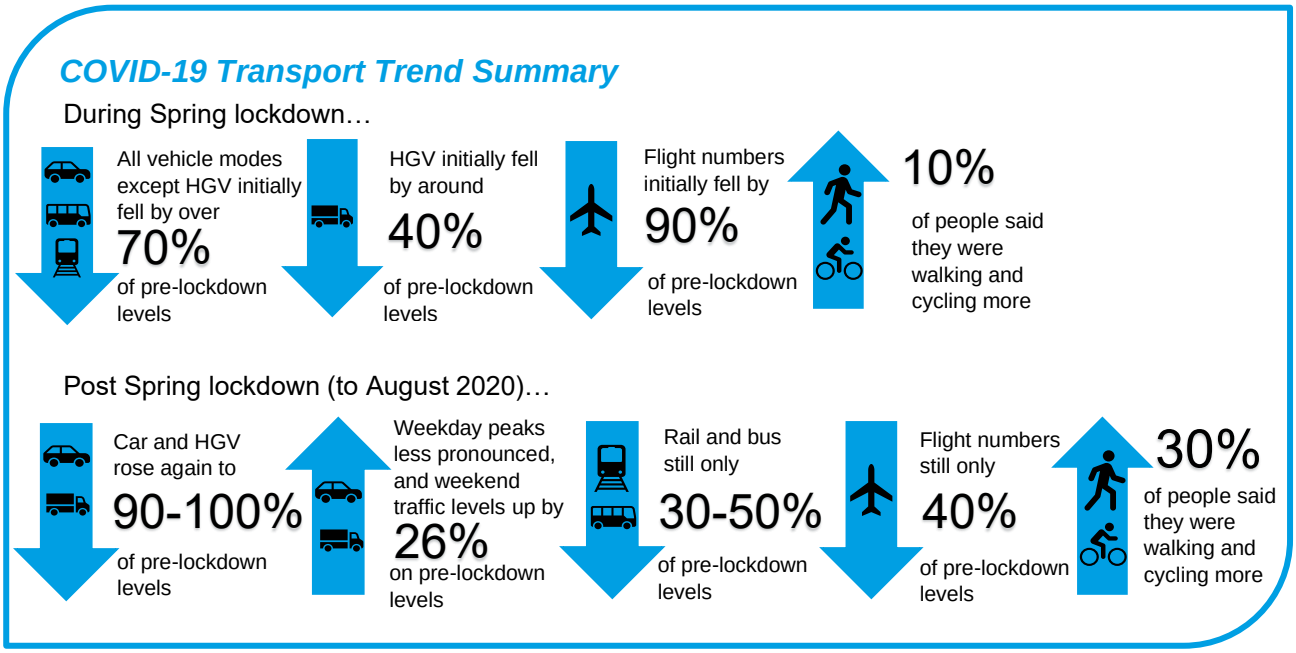
The Scottish tourist industry has been significantly impacted, with an overall decline in visitor numbers across urban, rural, coastal, highland and island locations across Scotland. Leisure and business travel have both been affected and the practice of working from home has reduced demand for urban accommodation, hospitality and retail even further. The lack of face to face meetings, conferences and exhibitions; reduction in performing arts, festivals and events as well as the decline of the night-time economy has exacerbated the urban decline in the tourist industry. Whilst domestic tourism showed promise of recovery with increased demand in August and September 2020, the future of the tourist industry in Scotland remains unclear.

Transport Trends

To stem infection rates the UK went into lock-down on 23 March 2020. People were advised to only leave their homes for essential purposes only, including to buy food,

access healthcare, essential work that could not be done from home, or for exercise once a day. A significant number of employees were put on furlough, and a large proportion of the workforce abruptly had to change the way they work, often working from home full time.

In response to this, travel reduced with significantly fewer vehicles on the roads and many flights grounded. However, cycling levels increased during the spring and summer compared to the previous year, and although walking trips reduced overall compared to usual levels, around 10% of people said they were walking and cycling more. Around 60% of walking/wheeling and cycling trips made were to exercise.

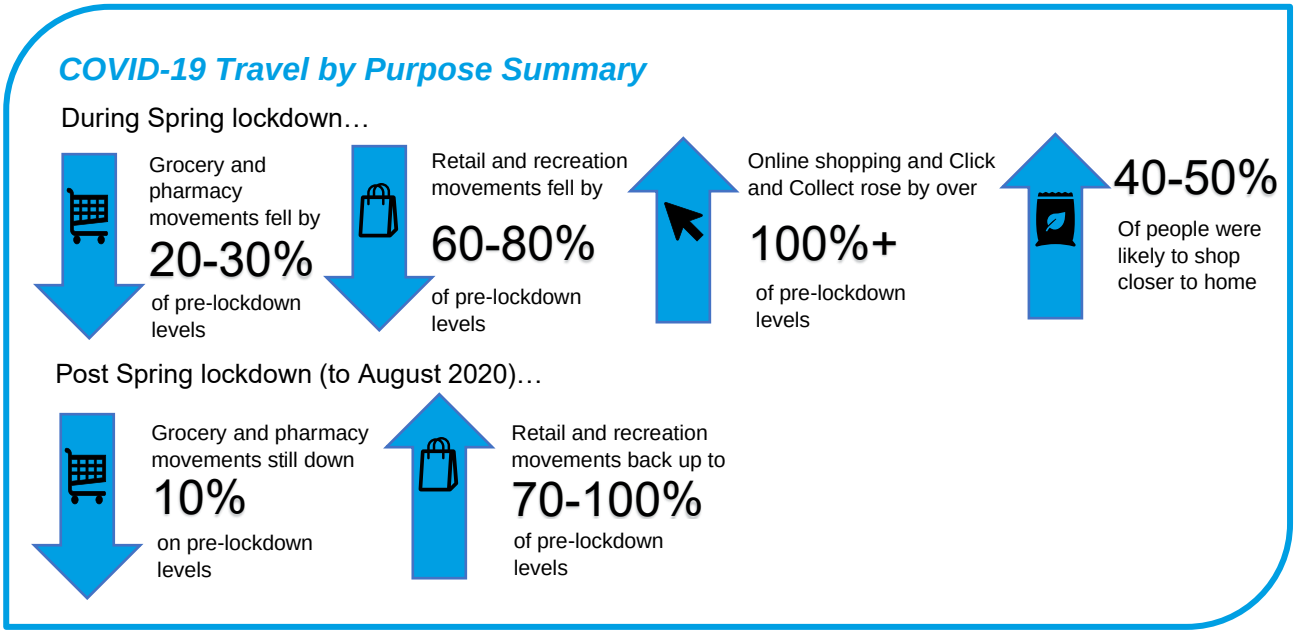


When restrictions began to ease at the end of May 2020, traffic levels gradually increased towards pre-COVID-19 levels as people opted for the car over public transport due to COVID-19 related personal safety concerns, and convenience. Peak hours on the roads became less pronounced as travel spread more throughout the day, and weekend traffic also increased. Despite this, the propensity to walk and cycle continued to increase with 30% of people saying they were walking and cycling more.

Travel by Purpose

The closure of non-essential services, shops and entertainment as well as many industries in the UK wide Spring lockdown significantly reduced non-essential movements. Lockdown substantially impacted on the way people shop – whilst traditional in store shopping and leisure movements significantly reduced as a result of Government messaging and closures, online shopping, grocery home deliveries and click and collect services increased substantially. As well as shopping online, people were also shopping for essential items closer to home.

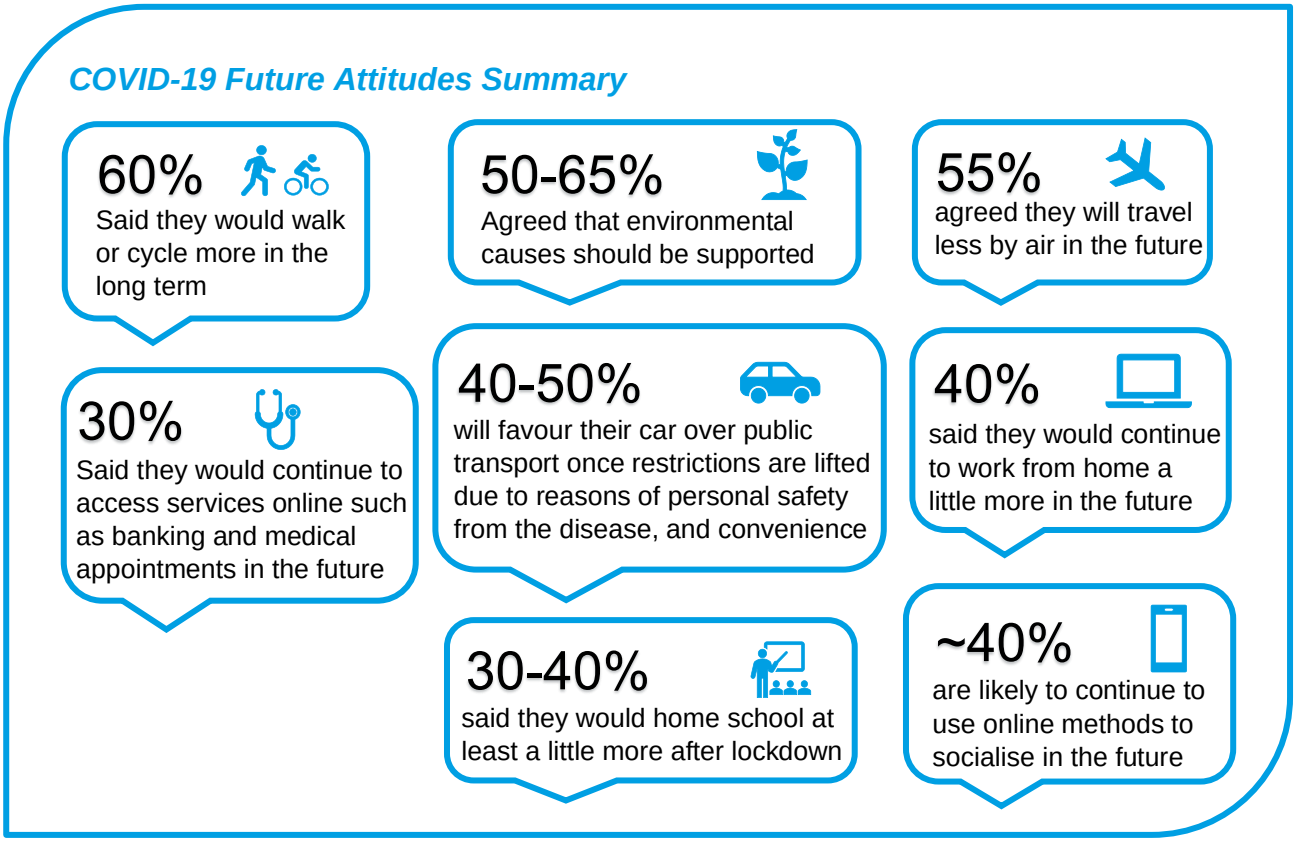
There was also increased uptake of using online facilities across a range of purposes, including socialising, entertainment, banking, healthcare, adult education and attending a place of worship.



As restrictions eased into the summer, retail and recreation movements returned close to pre-lockdown levels. This may have been partially fuelled by domestic tourism during the summer months, with the Highlands and Islands in particular seeing an increase in grocery, pharmacy, retail and recreation movements to 100-120% of pre-lockdown activity in July and August. However, it could also be attributed to seasonality given that the data is indexed to the same movements in January to March pre-lockdown.

Future Attitudes, Impacts and Opportunities

Research undertaken to understand public attitudes to transport and travel during the COVID-19 pandemic is being undertaken by both Transport Scotland, and Institute for Transport Studies, University of Leeds (ITS Leeds). The studies have monitored how attitudes to travel have changed throughout the past months and give an insight into how behaviour might impact on transport in the future.



In terms of travel by mode, the switch from public transport to car, seen during lockdown, is likely to continue at least until a vaccine is rolled out, with 40-50% of survey respondents during the Transport Scotland Public Attitude Surveys stating that they will use car more and avoid public transport when restrictions are lifted, partly due to high levels of concern around disease control and cleanliness with respect to Public Transport services but also due to the perceived convenience of car (15-21%).

The increased propensity to walk or cycle more in the long-term offers opportunities to go some way towards mitigating the anticipated traffic impacts if reluctance to use public transport persists, particularly in urban areas. To what extent the opportunities can be exploited is likely to depend on the implementation of successful policies to promote such change in the long term both in terms of investing in active modes and restricting motor traffic. Respondents to ITS Leeds surveys highlighted high levels of support for policies to boost environmental causes as part of the recovery whilst support for investment in roads and supporting aviation was at best mixed.

Long-term uncertainties around the continued need for social distancing and hence impacts on public transport capacity and commercial viability of public transport services may result in loss of services, or lower service levels in the longer term, resulting in disproportionate impacts on lower income groups who are more likely to use bus and less likely to have access to a car.

Whilst the long-term changes in terms of the prevalence of remote working are not yet known, it is reasonable to assume that this will be more common in the long term, particularly as businesses seek to reduce costs in times of uncertainty. Around 40% of respondents stated that they are likely to continue to work from home a little more. A reduction in work travel movement is likely to result, and this is likely to differ by mode due to differences in business locations and mode use between industry sectors.

There are opportunities for the revival of local shops and services following evidence of an increased likelihood to shop closer to home during lockdown. Retention of local shopping habits could be assisted by Transport Scotland's Transport Transition Plan policies to encourage local service access and create more attractive environments for example through the Spaces for People fund.

The decline in instore retailing may have longer term impacts, on development locations, travel to retail jobs and consumer trip volumes and distribution. Increased uptake of using online facilities across a range of purposes, including socialising, entertainment, banking, healthcare, adult education and attending a place of worship could lead to a reduction in discretionary travel in the future.

In addition to changes in the future level of demand, travel post-COVID-19 may also see changes in the peak profile of demand i.e. when people travel throughout the day. Catering for tidal peaks, formerly a key consideration in planning transport infrastructure and services may become less pressing as levels of commuting are reduced particularly to urban locations where the density of professional, white collar occupations is high. Weekly lows in indexed retail and recreation movements at weekends indicate that travel for these purposes has also spread more evenly through the week, although it is uncertain to what extent these trends will continue once the vaccine is rolled out and the impetus to avoid busy periods disappears.

Likewise, the impacts of the pandemic on tourism remains uncertain – although a higher proportion of people have chosen to holiday within the UK rather than go abroad during 2020, overall tourist numbers are significantly reduced. It is unclear if or when overseas tourism will recover. However, with the rollout of the vaccine and around 55% of survey respondents suggesting they will travel less by air in the future, there may be opportunity to capitalise on the domestic tourist trade.

Summary

In summary, the COVID-19 pandemic has resulted in an unprecedented level of uncertainty regarding transport trends in the medium to long term.

Forecasting future economic performance with any reliability is impossible until the duration of the epidemic is known. Lockdown has radically changed the way we go about our daily activities, changing demand for travel, trip distribution patterns, peak profiles and our choices with respect to our mode of travel. To what extent these changes carry on into the future depends on a range of factors including the time taken to roll out the vaccine and policies employed by Government to take advantage of the opportunities and mitigate the adverse impacts and uncertainties resulting from the epidemic. To this end, the STPR2 should take cognisance of the potential impacts of COVID-19 on travel and the economy, and capitalise on the opportunities identified, particularly in the shorter term (see overleaf).

The STPR2 will need to consider the following factors going forward:

Economy

- Monitoring and responding to economic trends;
- Monitoring and responding to equality impacts of the pandemic e.g. supporting economically disadvantaged society groups;
- Monitoring and responding to funding availability;
- Supporting economic recovery, particularly in the hardest hit industries (e.g. tourism, food and drink etc.), and the creation of new jobs; and
- Supporting future economic resilience to similar pandemics.

Overall Demand for Travel

- Monitoring and responding to travel demand trends e.g. longer term reduced travel demand, different times of travel, changes in travel patterns and mode etc; and
- Supporting local travel, access to local shops and services, and creating more attractive local centres.

Active Travel

- Capitalising on the propensity to walk and cycle through investing in these modes and maintaining momentum;
- Supporting active travel for work trips (particularly in urban locations), access to services (particularly locally), and for leisure.

Public Transport

- Monitoring and responding to public transport demand trends and service levels; and
- Supporting public confidence in public transport in the short term.

Road Travel

- Monitoring and responding to road travel demand trends.

Ferries and Aviation

- Monitoring and responding to travel demand trends and service levels.

Accounting for risk and uncertainty is an integral part of good practice in transport appraisal, as outlined in Scottish Transport Appraisal Guidance (STAG)[1]. COVID has resulted in deep uncertainty about the future relationships that drive the demand for transport. Normal sensitivity testing is insufficient to tackle this problem, reinforcing the need for adopting scenario planning techniques within the STPR2 appraisal, to represent a range of possible futures to form the backdrop for the policies and proposals examined.

A summary of the main Strengths, Weaknesses, Opportunities and Threats posed by the COVID-19 pandemic on Transport in Scotland is shown overleaf and will be used alongside the key conclusions to help shape the STPR2 process and outcomes.

[1] Transport Scotland, Scottish Transport Appraisal Guidance (STAG), 2008 www.transport.gov.scot/media/41507/j9760.pdf

Strengths

- Increase in propensity to walk and cycle.
- Some signs of travelling less e.g. more working from home, online shopping, shopping locally, homeschooling, accessing services online, socialising online.
- Some signs of travelling at different times i.e. peak hours are less pronounced, more 'off-peak' travel.
- Tourist industry seeing an increase in 'Staycations', particularly in Highlands and Islands.
- Strong support for environmental causes.

Weaknesses

- Weakened economy.
- Car traffic levels back to pre-lockdown levels, with increased traffic at weekends.
- Public transport use remains low, with people favouring the car due to personal safety from the disease and convenience.
- Air travel remains low, continuing to impact on business and tourism.
- COVID-19 impacts are likely to dis-proportionately affect lower income households and young people.

Opportunities

- Capitalise on propensity to walk and cycle through investing in these modes and maintaining momentum.
- Support local communities and shops to enable people to continue to shop and access services locally.
- Support work/education/shopping/accessing services from home through better online access.
- Maximise Scotland's tourist offer as fewer people travel abroad.
- Take advantage of strong environmental support through implementing more environmentally friendly measures.

Threats

- Recovery of economy and unemployment uncertain.
- Risk of another disease outbreak on vulnerable industries.
- Funding availability uncertain as cost of the crisis continues to increase.
- The potential for return to pre-COVID-19 travel trends and habits.
- Possible increase in car travel over pre-COVID-19 levels.
- Inability to reinstate public confidence in safety of public transport.
- Potential impact of uncertainties around future ferry patronage on viability of services and hence freight capacity to Islands.

1. Introduction

1.1. Purpose

The purpose of this addendum is to outline the impact on travel patterns and behaviours over time as the result of the COVID-19 pandemic and to outline market research findings on stated intentions of users and businesses going forwards to help provide some level of foresight on how COVID-19 will impact on travel patterns and behaviours in the short to medium term.

It is intended that the findings will be incorporated within the STPR2 Case for Change and be considered within the appraisal method and outcomes in determining the STPR2 priorities in the short, medium and long term.

1.2. Document Structure

The following provides a brief outline of the content of the COVID-19 addendum:

- **Chapter 1** - Purpose, Structure and Background, including key dates, an outline of the route map in Scotland, COVID-19 specific policy, and a description of data sources to support this Addendum;
- **Chapter 2** - Impact on the Economy and Employment, including tourism;
- **Chapter 3** - Transport Trend Analysis;
- **Chapter 4** - Travel by Purpose;
- **Chapter 5 –** Future Attitudes; and
- **Chapter 6** – Summary and Conclusion.

1.3. Background

The Coronavirus disease (COVID-19) was declared a global pandemic on 12 March 2020, with the first cases in Scotland notified on 1st March 2020. Extensive measures have been implemented across many countries, including Scotland, to slow the spread of the disease. In Scotland the current recommendations[2] are for everyone to stay at home as much as possible and severely restrict their interactions with others outside the household. The timeline below shows key dates and restrictions within Scotland since March 2020:

2020

16 March – People advised to limit social contact;

- 23 March – People advised to stay at home unless it is essential to go out;
- 29 May – Scotland enters phase one of lockdown easing, with businesses unable to facilitate home working encouraged to reopen, and short distance travel for outdoor leisure and exercise permitted;
- 19 June – Scotland enters phase two of lockdown easing, with up to three households able to meet outdoors, public transport increasing services, and people permitted to drive locally for leisure;
- 29 June – Non-essential retail opens in Scotland

[2] As of early December 2020

- 6 July – Opening of beer gardens and pavement cafes;
- 10 July – Scotland enters phase three of lockdown easing, with people able to meet indoors with another household, with up to 15 people outside, public transport operating close to a full service, and people permitted to drive beyond the local area for leisure;
- 15 July – Opening of many leisure facilities, including pubs and restaurants, tourist attractions and accommodation, and childcare facilities;
- from 11 August – Schools reopen. Local restrictions start to come in force across various areas of Scotland.
- 2 November – Five Tier COVID-19 System comes into place;
- 5 November – National lockdown in England commences;
- 2 December – UK approves the Pfizer/BioNTech COVID-19 Vaccine, and England lockdown lifted;
- 8 December - Vaccinations using the Pfizer/BioNTech vaccine begin in Scotland;
- 20 December – Travel between Scotland and rest of UK deemed illegal from midnight onward;
- 25 December – Restrictions eased for Christmas Day allowing up to three households to meet;
- 26 December – All of Scotland moves to Level 4.

2021

- 4 January – First vaccinations of the Oxford
- 5 January – England and mainland Scotland goes into lockdown forbidding anyone to leave their home except for essential purposes.
-
- The COVID-19 pandemic remains ongoing with the situation globally and within Scotland developing constantly. The recent approvals and progress on rolling out a vaccine provides some hope of return to 'normal' life. However, the pandemic has had a significant impact on people's lives, including their behaviours, and the way they travel with potential longer term impacts.
-
- To this effect, analysis has been undertaken within this Addendum to understand the impact on travel patterns and behaviours over time as the result of the COVID-19 pandemic. This analysis may help to provide some level of foresight on whether, and if so, how COVID-19 will impact on behaviours in the short to medium term.

1.3.1. The Scottish Government's Route Map

The Scottish Government's route map through and out of the crisis was published on 21st May 2020[3]. It guided the Government's phased approach through and out of the COVID-19 pandemic through the summer and early autumn months. An overview is provided in Figure 1.

[3] Coronavirus (COVID-19): Scotland's route map through and out of the crisis, Scottish Government, May 2020

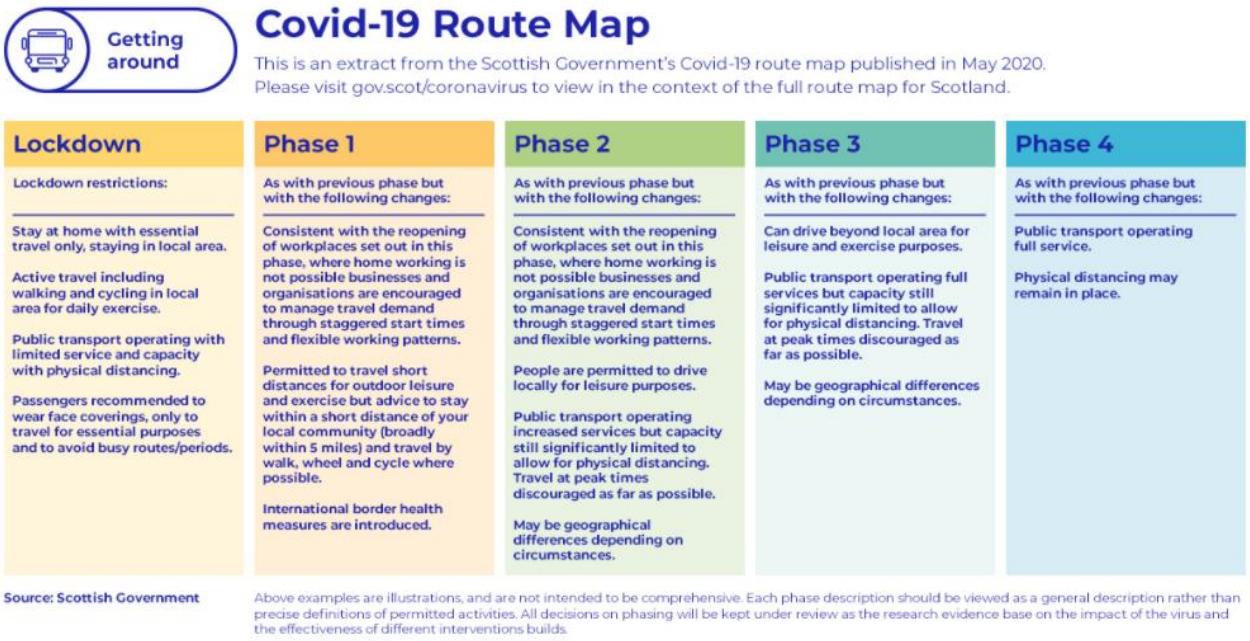


Figure 1: Scottish Government's Route Map

1.3.2. The Scottish Government's COVID-19 alert levels

The rise in COVID-19 cases in the early autumn months required a fresh strategic approach, providing a system for the implementation of temporary local measures. This was addressed through the Scottish Government's five level plan, which was published on 23rd October 2020 and is summarised in Figure 2.

LEVEL 0 – NEARLY NORMAL	LEVEL 1 - MEDIUM	LEVEL 2 - HIGH	LEVEL 3 – VERY HIGH	LEVEL 4 - LOCKDOWN
-Up to 8 people from 3 households can meet indoors -Up to 15 people from 5 households can gather outdoors -Leisure and entertainment open except nightclubs and adult entertainment	-Restrictions on indoor household mixing apply -Up to 8 people from 3 households can meet outside -Pubs, cafes and restaurants can serve food and alcohol, but close at 22:30 -Leisure and entertainment open except nightclubs and adult entertainment	-Up to 6 people from 2 households can meet outdoors and in hospitality settings -no non-essential journeys into Level 3 and 4 areas	-Up to 6 people from 2 households can meet outdoors and in hospitality settings -Pubs, cafes and restaurants cannot serve alcohol, and must close at 18:00 -All leisure and entertainment venues closed -Outdoor live events banned -No non-essential travel outside council area	-Up to 6 people from 2 households can meet outdoors -Closure of non-essential shops, entertainment, public buildings, gyms and hospitality except for takeaway service -No non-essential travel outside council area -Journeys within council area to be minimised

Figure 2 Scotland's Strategic Framework: Five Level Plan[4]

1.3.3. The Transport Transition Plan

[4] COVID-19 Scotland's Strategic Framework, Scottish Government, October 2020

The Scottish Government launched the Transport Transition Plan[5] on May 26th 2020. The Plan, which is continually evolving, outlines the action Transport Scotland has taken to date and the planning being undertaken to prepare the transport system in transitioning through and out of the COVID-19 pandemic.

Phase 3 of the Scottish Government's Route map saw public transport service levels increase to 60-70% operation in mid-July, rising to 90% in August[6]. Physical distancing on public transport services was reduced to 1 metre (from 2 metres in Phase 2), and vehicle capacity was reduced to approximately 40% depending on mode and vehicle configuration. Polls indicate that confidence in public transport services during the pandemic, and at the present time, remains low. The Plan aims to reassure public confidence by prioritising safety and preventing overcrowding as demand increases, and promoting sustainable travel choices to mitigate potential increases in car transport.

The Plan aims to provide a framework for transition out of the pandemic in line with the priorities of the National Transport Strategy (NTS2).

A fair restart

The Plan recognises that the impacts of COVID-19 are being felt unequally across different social groups and that the policy response must account for this. Estimates published by the Office for Budget responsibility (OBR) foresee a substantial reduction of the UK economy and increases in unemployment levels as a result on the COVID-19 pandemic and the impacts are likely to dis-proportionately affect lower income households with reduced resilience to these uncertainties, and young people.

Reduced confidence in the safety of bus services could differentially affect deprived urban communities where the number of cases is higher, and suburban /rural communities where people have to travel further to access employment and services, and existing pressures on the viability of public transport services are exacerbated by reduced passenger volumes and the expense of implementing required safety measures.

Concerns over safety of transport could increase isolation amongst older people and further reduce confidence in using public transport services amongst those with a disability.

A sustainable restart

The Plan aims to continue efforts to work towards net zero emissions by 2045 including through embedding sustainable behaviours, including increased walking and cycling and working from home.

Adapting the transport systems

The Plan sets out the following mode specific policies to adapt the transport system during the transition out of the COVID-19 pandemic.

[5] The Transport Transition Plan, Transport Scotland, May 2020. Available from https://www.transport.gov.scot/COVID-19-covid-19/transport-transition-plan/

[6] COVID19 Travel Trends, Transport Scotland: https://www.transport.gov.scot/media/49017/covid-19-scotlands-transport-and-travel-trends-during-the-first-six-months-of-the-pandemic.pdf

Active Travel

- Encourage local service access to increase mode share of active modes;
- Create a more attractive environment for active travel through Spaces for People fund (£30m);
- Renewed Smarter Choices, Smarter Places funding (£2m), including for projects which encourage staying local, making fewer journeys and promoting home working opportunities;
- Get older bikes back on the road through funding free bike repair and maintenance through the Scotland Cycle Repair Scheme;
- Working with delivery partners including Cycling UK, Cycling Scotland, Sustrans and the Energy Saving Trust to pivot their services to support the transition back to normal.

Bus

- Operator funding to maintain and increase services;
- Providing funding for temporary bus priority infrastructure in areas of high congestion through the Bus Priority Rapid Development Fund (£10m).

Rail

- Work with ScotRail and Network Rail to implement a range of measures to enable the restoration of rail services, on a phased basis, to pre-COVID-19 levels through the Rail Recovery Task Force.

Ferries

- Work with operators to support ferry services.

Tram and Subway

- Provision of emergency funding (£9m) to mitigate financial impacts.

Motorway and Trunk Road

- Restart construction activities in accordance with Scottish Government Route Map and Construction Sector Guidance.

1.4. Data Sources

The following data sources have been used to gain an understanding of economic and transport trends to support this Addendum.

Scottish Government Economy, Labour Market and Business Statistics

The Scottish Government publishes reporting on the latest data and analysis regarding the impacts of the COVID-19 pandemic on:

- The Scottish economy[7];
- Scotland's labour market trends[8]; and

[7] State of the Economy: September 2020, Scottish Government, September 2020. Available from https://www.gov.scot/publications/state-economy/pages/4/

[8] Scotland's Labour Market Trends: December 2020, Scottish Government, December 2020. Available from https://www.gov.scot/publications/labour-market-trends-december-2020/

- The business impacts of COVID-19[9].

Information is published on the Scottish Government website. This Addendum makes reference to the latest economy and labour market statistics published (in September 2020), and business impacts up until the end of October 2020.

COVID-19 Public Attitudes Survey Data

Transport Scotland is monitoring public attitudes to transport and travel during the COVID-19 outbreak through a telephone survey with a representative sample of over 16s across Scotland. The survey is intended to provide an understanding of the ways in which the COVID-19 pandemic is affecting current travel behaviour and intentions for future travel in Scotland. Ten waves of the survey have been reported, the first survey taking place in between 5th and 13th of May 2020, and the tenth taking place from 4th to 9th November.

COVID-19 Transport Scotland Six Month Travel Trends Reporting

Transport Scotland has been monitoring transport trends during the COVID-19 outbreak. This information provides a snapshot of travel across main modes when compared to the same time the previous year. The data has been used to inform more in-depth analysis of travel trends during the first six months of the epidemic, namely the period from 9 March to 6 September 2020. Analysis presented in this report reflects the data reported in Transport Scotland's six month review[10].

This report also presents travel trends by purpose, based on Google mobility data. This dataset monitors the aggregated movements of phone users. All data has been indexed by Google to the median of equivalent days during the period between 3rd January and 6th February 2020. Data is then aggregated into the following five regions:

- Strathclyde: SPT area but excluding Helensburgh and Lomond and including Dumfries and Galloway;
- South-east: SESTran area;
- North-east: Aberdeen and Aberdeenshire;
- Tayside and Central: Angus, Perth and Kinross, Dundee and Stirling; and
- Highland excluding Islands: Argyll and Bute, Highland and Moray[11].

It should be noted that mobility data for grocery and pharmacy, and retail and recreation only covers the period to 16 August as data for the subsequent period was unavailable pending a change in Google's processing methodology.

COVID-19 Transport, Travel and Social Adaptation Emergency Data Collection, University of Leeds

ITS Leeds is carrying out a research study to understand the transport and travel related impacts of COVID-19 across a range of UK locations. The study examines the following questions:

[9] Business Impacts of COVID-19 Survey(BICS) results, Office for National Statistics, available from: https://www.gov.scot/collections/business-and-innovation-statistics/#businessimpactofcoronavirus(covid-19)survey(bics)

[10] https://www.transport.gov.scot/media/48971/covid-19-scotland-s-transport-and-travel-trends-during-the-first-six-months-of-the-pandemic.pdf

[11] It should be noted that data for the three Islands Authorities is too sparse to be included.

- Where have virtual activities taken the place of physical activities? To what extent? What would need to happen to maintain this?
- Has the reduction in how often we do different activities led to new patterns of how we get things done?
- Longer-term, how will social distancing impact the attractiveness of public transport, cycling and car use?
- Which changes are due to social distancing itself, and which are due to the wider changes in the economy and people's finances?

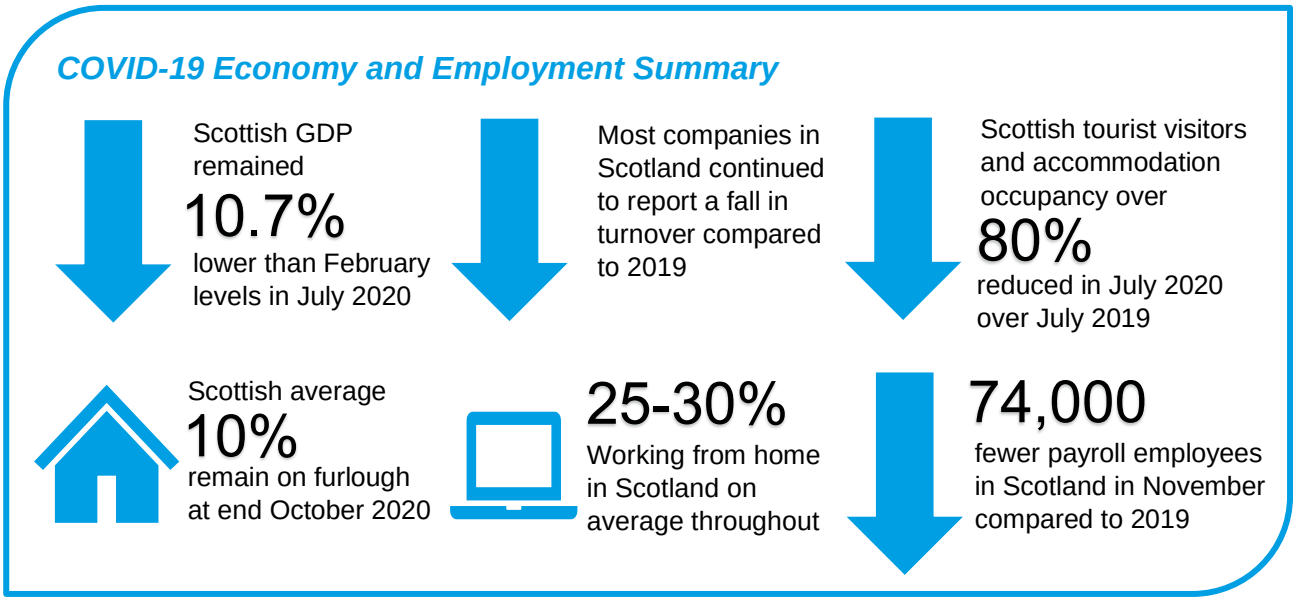
The study includes three waves of online quantitative surveys in 10 city-regions/areas, including Aberdeen City and Shire, Ayrshire, Edinburgh and Glasgow in Scotland, two waves of in-depth interviews including Glasgow and three waves of expert/ policy interviews. Wave 1 took place in July 2020, Wave 2 in September 2020 and Wave 3 is planned for February 2021.

The results presented within this Addendum have been extracted from a presentation on the results of Wave 1, which is the most recent publicly available data.

2. Impact on the Economy and Employment

2.1. Economy and Employment Impact Summary

The following graphic shows a summary of key statistics relating to the impact of COVID-19 on the economy and employment. The summary statistics reported are taken from the main body text within this Chapter of the Addendum.



2.2. Impact on the Economy

Gross Domestic Product (GDP)[12]

Scotland's GDP fell 19.4% in the second quarter of 2020, following a 2.5% fall in the first quarter, with sharp falls across the services, production and construction sectors. More recent data for July showed that GDP grew 6.8% in July, its third consecutive month of growth. Yet it remains 10.7% below its pre-COVID-19 level in February. This follows a similar pattern to the rest of the UK, with UK wide GDP levels remaining 11.7% below pre-COVID-19 levels.

Public Sector Borrowing[13]

UK wide public Sector borrowing in Quarter 2 and Quarter 3 2020 was £192.6 billion, £158.4 billion more than Quarter 2 and Quarter 3 2019. Tax received by Central UK Government amounted to £208.9 billion in Quarter 2 and Quarter 3 2020, £61 billion less than in Quarter 2 and Quarter 3 2019. This may in due course impact on the availability of funding for transport projects and increase public scrutiny of Government expenditure.

[12] State of the Economy: September 2020, Scottish Government, September 2020. Available from https://www.gov.scot/publications/state-economy/pages/4/

[13] Public Sector Finances, UK Statistical Bulletins, ONS. Available From https://www.ons.gov.uk/economy/governmentpublicsectorandtaxes/publicsectorfinance/bulletins/publicsectorfinances/previousReleases

Business performance[14]

Business activity in Scotland has been gradually stabilising since April as firms have adjusted to lockdown restrictions and have gradually resumed operations as restrictions have eased, with a return to growth seen in August 2020 for the first time since February. However, firms continue to reduce staffing levels signalling that many are operating below capacity and the need to contain costs remain clear challenges for some businesses.

In July 2020, most companies in Scotland continued to report a fall in turnover compared to 2019 (28.5 in the Monthly Business Turnover Index, with 50 being the same as last year). Accommodation and Food Services continued to be the industry with most businesses reporting a decrease in turnover over the year, followed by Culture and Recreation Services.

The extent to which business turnover remains below last year continues to emphasise the weak demand and operational challenges that businesses are facing. Cashflow challenges, alongside the level of uncertainty, are likely to have significant implications for the scale and nature of business investment and the pace at which it recovers.

Labour Market[15]

Scotland's unemployment rate has increased over the year by (0.6%) to 4.2% to October 2020 – this is below the UK rate of 4.9%. The number of payroll employees in November 2020 in Scotland had fallen by 3.1% (74,000) compared to the same month the year before – higher than the UK wide decrease of 2.7% over the same period.

For those who remained in employment, median monthly pay for employees in Scotland in November 2020 increased to £1,938, an increase of 4.2% compared to the same month the previous year, which is lower than the annual growth in median monthly pay for the UK over the same period (4.6%).

Retail[16]

Scottish retail sales fell sharply in November as Level 4 lockdowns came into force across Scotland, with overall sales falling by 10.2% compared with November 2019. This compares to a 3 month average decline of 8.1%, and a 12 month average decline of 11.2%.

Non-food retail in Scotland has been particularly impacted with sales falling by more than a fifth. However, with online retail better able to provide for demand in the market since the Spring 2020 lockdown, online-adjusted non-food saw a decline of only 4.8%. Food retail sales followed a similar pattern to previous months, increasing by 4.8% compared to 2019 levels.

Across Great Britain as a whole, retail sales for November 2020 increased by 2.4%

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[14] State of the Economy: September 2020, Scottish Government, September 2020. Available from https://www.gov.scot/publications/state-economy/pages/4/

[15] Scotland's Labour Market Trends: December 2020, Scottish Government, December 2020. Available from https://www.gov.scot/publications/labour-market-trends-december-2020/

[16] Scottish Retail Sales Monitor – Lockdowns Scupper Non-Food Hopes, Scottish Retail Consortium, December 2020. Available from https://brc.org.uk/retail-insight/content/retail-sales/scottish-retail-sales-monitor/reports/202011_scottish_rsm/

compared to November 2019, with feedback from businesses suggesting that consumers had brought forward Christmas spending. Although November sales were slightly down on October levels, sales had previously increased month on month between April and October 2020[17]. This was driven by a strong increase in sales online in comparison to reduced store sales. This reflects changes in retail behaviour due to the pandemic which saw an increase in the uptake of online sales which may persist in the medium to longer term.

[17] Retail Sales, Great Britain: November 2020. Available from https://www.ons.gov.uk/businessindustryandtrade/retailindustry/bulletins/retailsales/november2020

Tourism

The advent of the Covid-19 pandemic has dramatically impacted on the Scottish tourism industry, collapsing international demand and significantly reducing domestic visitor numbers. Since the initial lockdown in mid-March 2020 visitor numbers have declined substantially in urban, rural, coastal, highland and island locations across Scotland, with over an 80% reduction in visitor attraction numbers and accommodation occupancy rates in July 2020 compared to July 2019[18]. The demand for transport in terms of air, rail, ferry and road has reduced as the Government seeks to contain rates of infection. These massive downturns will drive unemployment and insolvency in the hospitality, tourism and travel sectors. From a consumer perspective this will mean less international and domestic connectivity, higher prices and reduced travel. Leisure and business travel have both been significantly impacted and the practice of working from home has reduced demand for urban accommodation, hospitality and retail even further. The collapse of meetings, conferences and exhibitions; reduction in performing arts, festivals and events as well as the decline of the night-time economy has exacerbated the urban decline in tourism.

Domestic tourism showed promise of recovery with increased demand in August and September 2020. This was fuelled by pent up domestic motivation to travel, and fewer people choosing to travel abroad. Such demand was for predominantly mainland rural accommodation supply in the self-catering, camping and caravan park sectors, and evidence presented in Chapter 4 of this Addendum suggests that the Highlands and Islands may have seen a bigger resurgence than other regions – in particular the areas accessible by car without being impacted by the COVID-19 related capacity constraints of the ferries. However, this modest recovery is likely to have been eroded by second waves of infection catalysing further restrictions on travel and tourism activities. This difficult economic environment will only be further accentuated by the uncertainty of Brexit and the lack of clarity regarding access, trade and transport. Notwithstanding this, the imminent rollout of a vaccine does provide some hope for recovery within the sector.

2.3. Impact on Employment

2.3.1. Business Impacts of COVID-19 Survey[19]

Lockdown has seen dramatic changes in the way people work. Figure 3 shows changes to working arrangements between 1st of June and 1st of November 2020 in Scotland. The data includes businesses who have not permanently stopped trading weighted by employment.

The proportion of the workforce working at their normal place of work increased from 36% in the first two weeks of June to 63% in the second half of October. However, this was primarily due to people returning from partial leave or furlough. The proportion of the workforce in this category decreased from 32% to 10% over the same period, while the proportion of the workforce working from home remained relatively steady, fluctuating between 24% and 28%.

[18] Moffat Centre, 2020.

[19] Business Impacts of COVID-19 Survey(BICS) results, Office for National Statistics, available from: https://www.gov.scot/collections/business-and-innovation-statistics/#businessimpactofcoronavirus(covid-19)survey(bics)

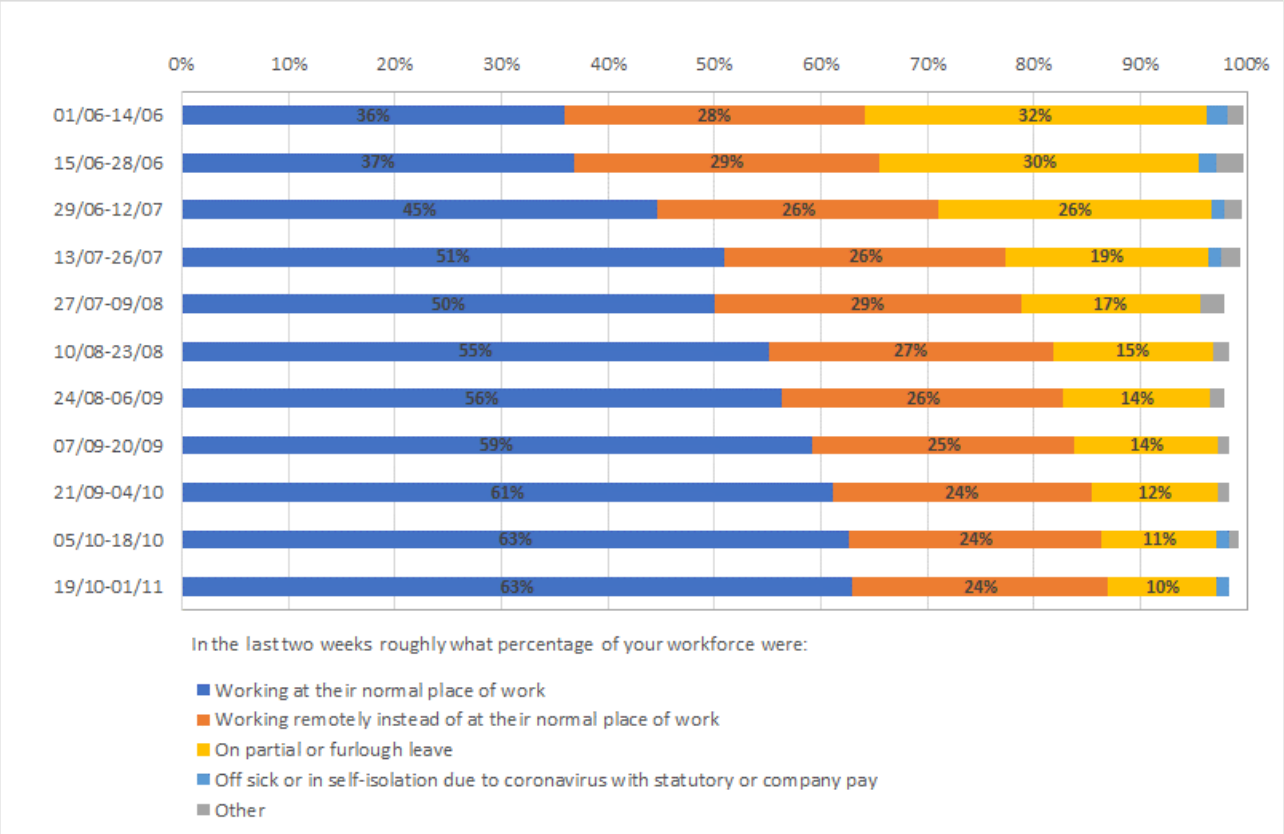


Figure 3 Proportion of Workforce Working at their Normal Place of Work, Working Remotely, Furloughed, etc, ONS BICS Surveys (Scotland weighted)

Figure 3 shows a breakdown of the proportion of the workforce working remotely, respectively, broken down by industry sector. The data shows substantial differences between industry sectors.

Sectors with the lowest levels of working from home were those which required a physical presence such as Transport, Construction and Manufacturing. The Arts and Food and Accommodation services also saw low levels of working from home, though a significant proportion of staff in these industries were put on furlough (see Figure 5).

The sectors which are more easily able to work remotely, such as Information and Communication, and Professional, Scientific and Technical Activities saw relatively high levels of staff working from home throughout the period (around 55%-70%). Homeworking in these sectors is likely to continue to some extent in the medium to longer term, although the scale of the long-term change is uncertain.

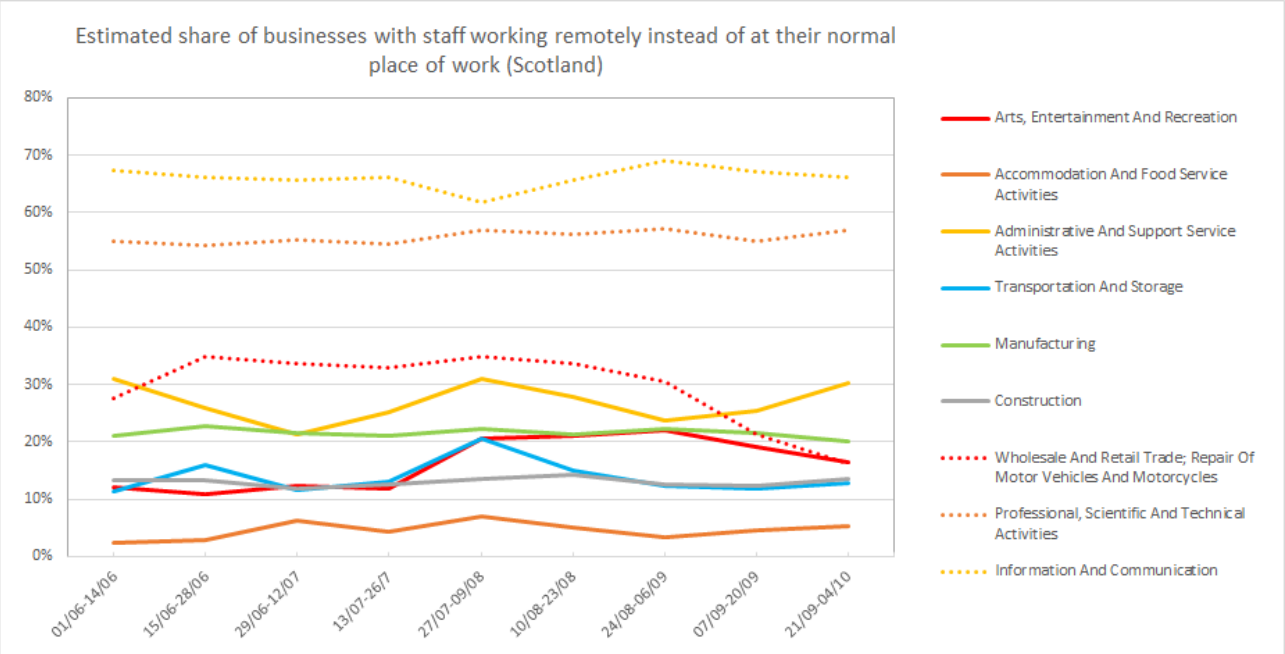


Figure 4 Proportion of Workforce Working Remotely by Industry, ONS BICS Survey (Scotland weighted)

Figure 4 shows the proportion of the workforce who were furloughed in Scotland during the period between 1st of June and 1st November.

There was substantial variability by sector, both in terms of the proportion of the workforce who were furloughed at the beginning of the period and the rates at which they returned. The highest furlough rates at the start of the period were recorded in the Arts, Recreation and Entertainment Sector (80% in June) and the Accommodation and Food Services (74%-78% in June), which largely ceased work overnight during the first lockdown. These sectors also saw the largest reduction in furlough rates as the economy re-opened. By the end of October, the proportion of the workforce furloughed had reduced to 26% and 36% in the two sectors respectively.

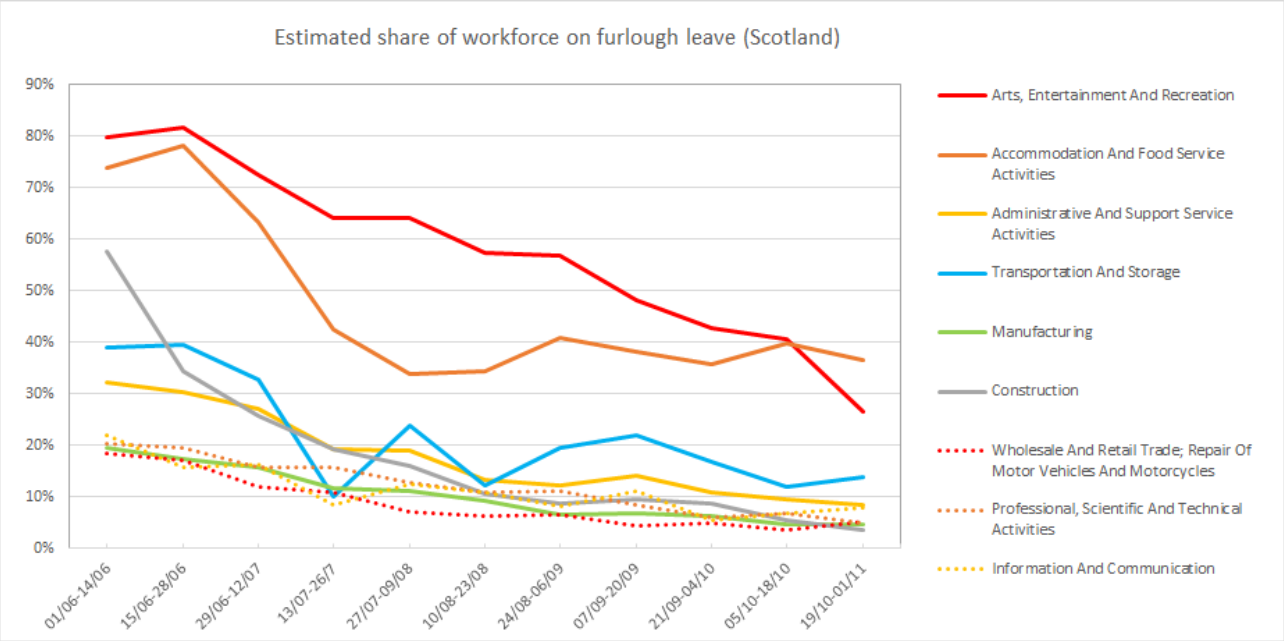


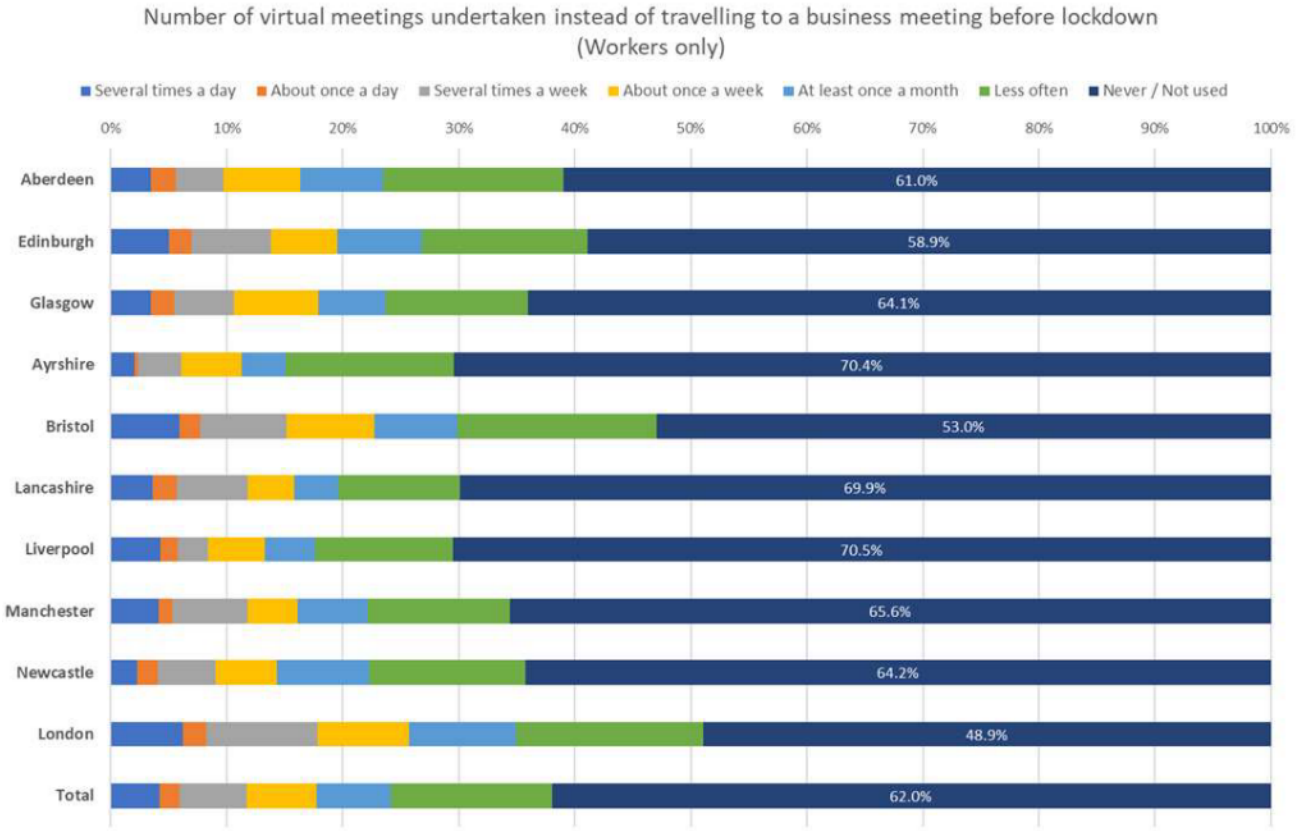
Figure 5 Proportion of Workforce Furloughed by Industry, ONS BICS Survey (Scotland, weighted)

Public Attitudes Surveys

The ITS Leeds research found that across the UK locations examined, the number of workers who commuted to work reduced to 30% of pre-lockdown levels. In the Scottish locations examined, homeworking five days a week or more increased between ten and twenty fold. Transport Scotland's Public Attitude Surveys showed similar findings, approximately 20% of respondents travelled to work in July (Wave 5 -20%, Wave 6 -21%) and in the region of 30% in the months between August and November (Wave 7 -32%, Waves 8&9 - 30%, Wave 10 – 28%). A substantial proportion of respondents expected that changes in the way they work will be longer term, with between 35% and 41% expecting that they will work from home more in the future.

There were geographic variations in the prevalence of home working during COVID-19. The highest levels of home working were recorded in Edinburgh where 52% of the ITS Leeds survey respondents worked from home five days a week or more and over 60% 3-4 days a week or more. Homeworking was less common in Ayrshire where the proportions of respondents who worked from home five days a week was 35% and 3-4 days a week was over 40%. This is likely to be linked to variations in the mix of employment by area. In Ayrshire 31% of respondents continued to state that their jobs could not be carried out from home, whilst the equivalent figure in Edinburgh was 19%.

Changing working arrangements are also reflected in the reported frequency of attending remote business meetings. The proportion of workers who said they never used the phone or internet instead of attending a business meeting dropped from a range of 59% to 70% to between 19% and 32%, across the Scottish survey locations (Figure 6).



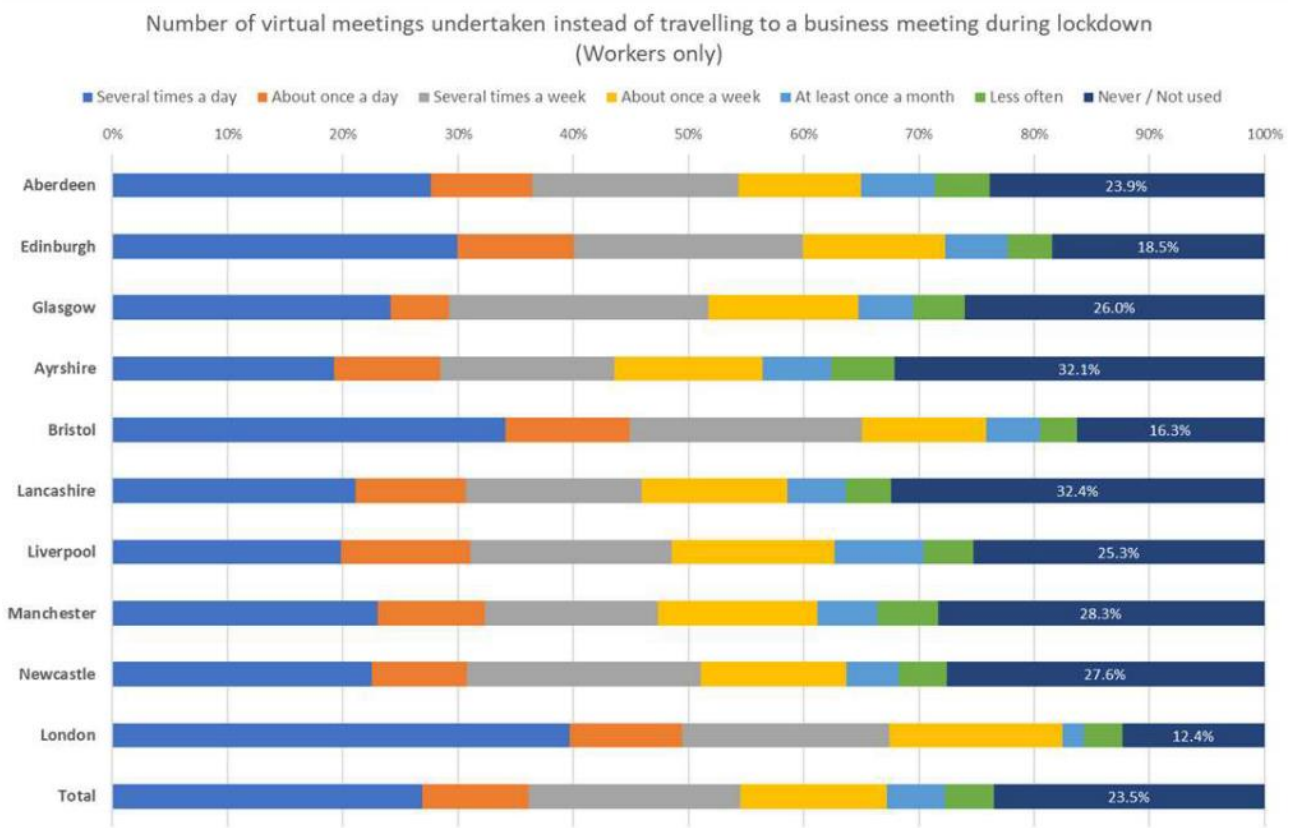


Figure 6 Prevalence of virtual meetings before and after lockdown, ITS Leeds Research

Figure 7 shows the proportion of respondents who said that they worked from home more than they liked. This was fairly consistent across the Scottish survey locations, ranging between 40% and 45%. This suggests that given the choice, the remaining 50+% of the workforce may continue working from home more in the future if given the choice. It is also noted that 68% of respondents across all research locations felt better set up to work from home in the future, confirming that opportunities to retain some increase in home working after COVID-19 are supported by improved facilities as well as workers preferences.

Figure 7 WFH during lockdown, choice and desirability, ITS Leeds Research

Figure 8 Home working, respondents' stated likelihood after lockdown, ITS Leeds Researchshows to what extent respondents stated they were more likely to work from home or undertake business meetings from home after lockdown. Based on the data, across the Scottish research locations, Edinburgh is likely to see the largest permanent increase in home working (30%) and Ayrshire is likely to see the lowest growth (17%).

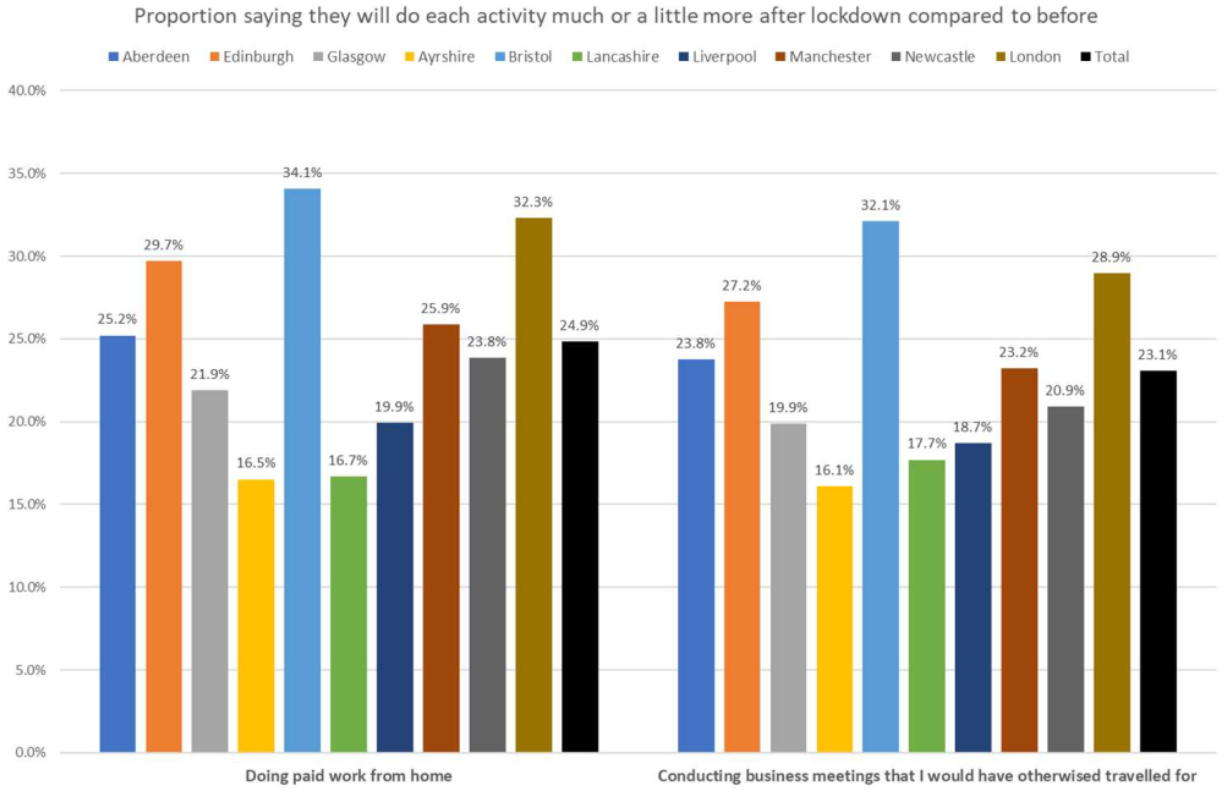
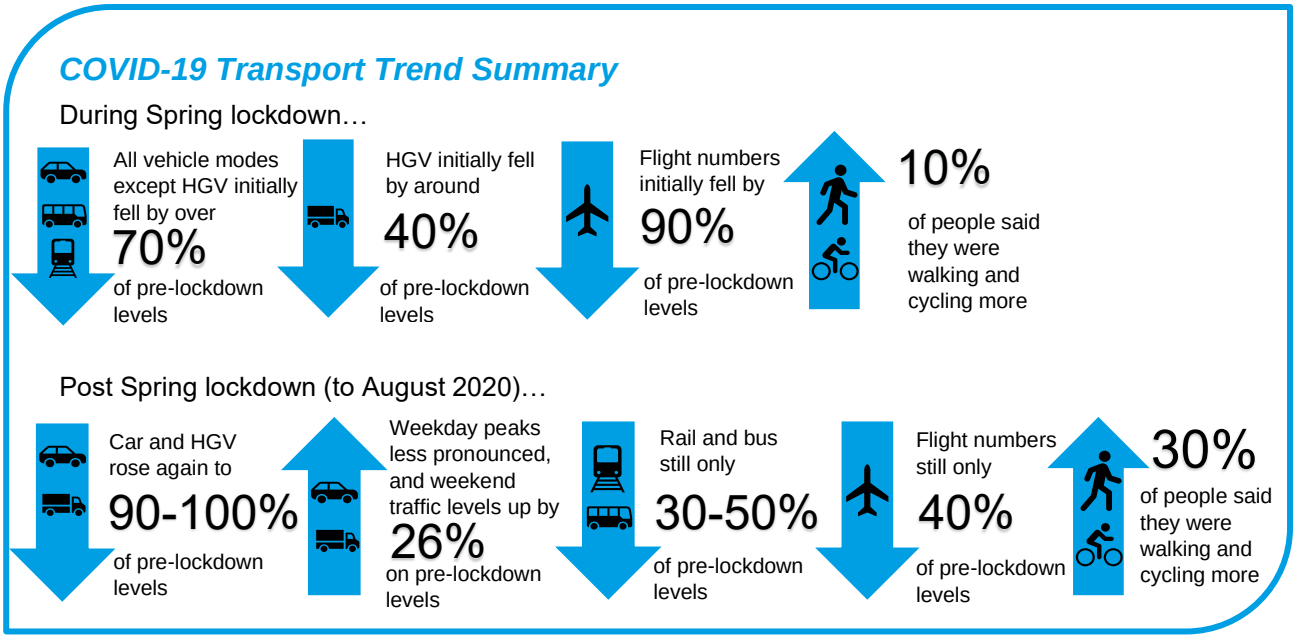


Figure 8 Home working, respondents' stated likelihood after lockdown, ITS Leeds Research

3. Transport Trend Analysis

3.1. Transport Trend Summary

The following graphic shows a summary of key statistics relating to transport trends seen during the COVID-19 pandemic. The summary statistics reported are taken from the main body text within this Chapter of the Addendum.



3.2. Mode Comparison

3.2.1. Mode Comparison Observed Trends

Figure 9 shows seven day average travel trends by mode, extracted from the Six Month Travel Trends Reporting. The data has been indexed to compare with the 2019 equivalent baseline period.

Due to limitations in the availability of data for a comparable period in 2019, trends for walking and cycling have not been included in the figure. Trends for these modes are presented in sections 3.3. Similar limitations applied to the availability of comparator data for commercial bus services and the comparison therefore reflects trends for concessionary bus travel only.

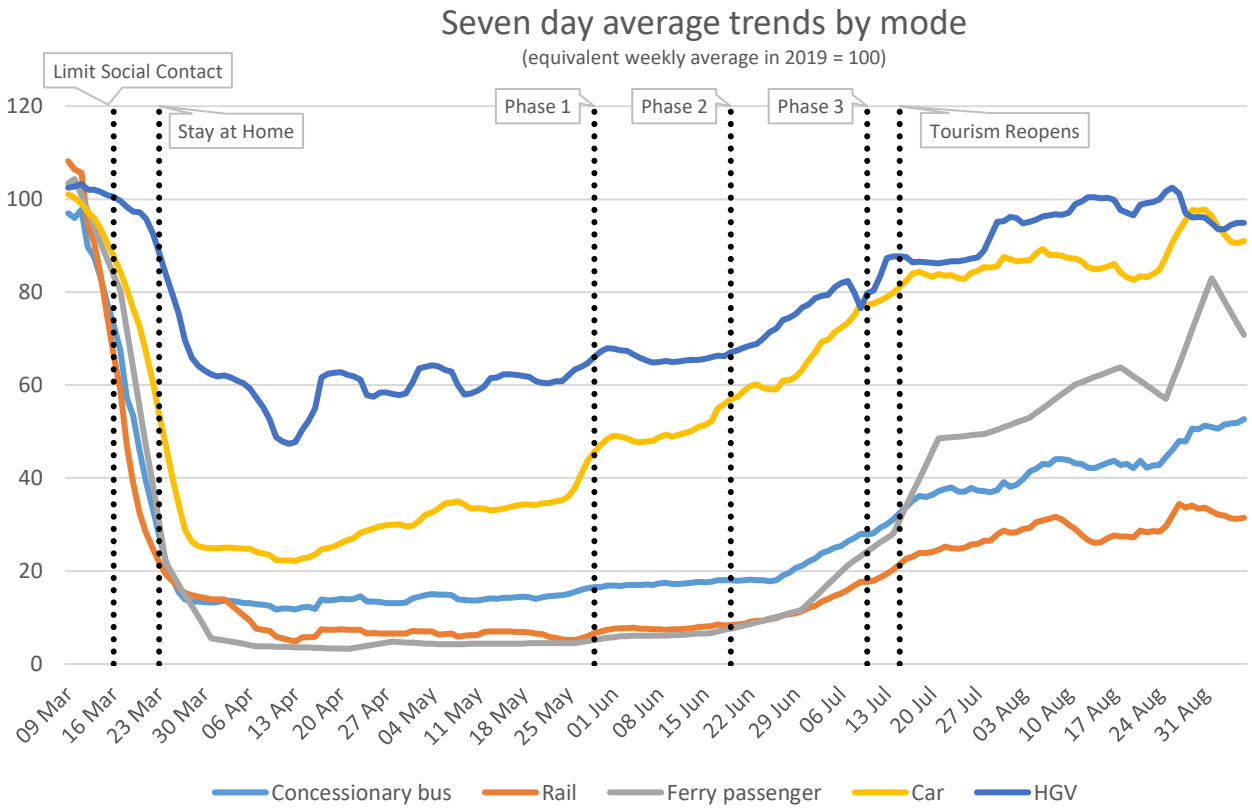


Figure 9 Travel by Mode, Seven Day Average Trends, Six Month Travel Trends Reporting

Key findings are:

- Activity for all motorised modes fell sharply at the start of the pandemic. HGV activity was less affected, retaining around 60% of 2019 activity levels in March and April. The most affected modes were rail and ferry, with passenger counts dropping to less than 10% of pre-lockdown levels;
- By late August car volumes (based on a selection of trunk road traffic counters) had almost recovered to 2019 levels, despite the continued application of certain restrictions including closure of many workplaces;
- Similarly, HGV traffic had largely recovered;
- Public transport passenger journeys recovered more slowly, and there were differences between the modes of transport;
- Rail recovered more slowly than bus, with passengers numbering around a third of 2019 patronage in August. Concessionary bus recovered to around 50% of 2019 patronage. This figure may be lower than for overall bus patronage due to the average age profile of concessionary bus pass holders;
- Ferry passenger numbers initially recovered largely in line with rail trends but experienced a boost following the re-opening of tourism in August. It should be noted that the sharp peak in August reflects a week of bad weather with vessels out of service for repair work in 2019, rather than an increase in patronage in 2020;
- It should also be noted that the number of commercial vehicles carried by ferries dipped less and recovered more fully than passenger numbers. In the first nine weeks following tourism reopening, ferries carried 96 per cent of other commercial vehicles

(coaches excluded) compared with 2019 levels. This reflects the importance of ferries as a supply line for the Islands. The potential impact of longer term reductions in ferry patronage represents a substantial risk in this context.

3.2.2. Mode Comparison Public Attitudes

Figure 10 Modes of Travel - Frequency of Use (More often), COVID -19 Public Attitudes Surveysand Figure 11 show the proportion of respondents during the TS COVID-19 Public Attitude Surveys who stated that they were using a range of modes of transport more or less often compared with pre-COVID-19. It should be noted that this data was not published for Wave 10, which took place in the week beginning 4th November.

A large proportion of respondents stated that they walked or wheeled more. During the May surveys, 8-9% of respondents stated that they walked or wheeled more. During subsequent survey waves this figure increased to over 30%. The proportion stood at 30% in the first week of October, compared with only 2% who said they walked or wheeled less. An increase in cycling was also recorded but the proportion of respondents who cycled more remained below 5% throughout the period covered by the surveys.

During May, 62% of respondents stated that they were driving less but this figure had decreased to 31% by the first week of October. The proportion of respondents who stated that they were driving more increased over time, to 28% in the first week of October. On balance, this suggests that based on stated mode use the net decrease in driving had shrunk to 3% by the first week of October, while many restrictions remained in place.

Nearly 20% of respondents stated that they were travelling by bus less throughout the surveyed period, with a marginal proportion stating that they did so more often than before lockdown. The October figures were 18% and 5%, respectively.

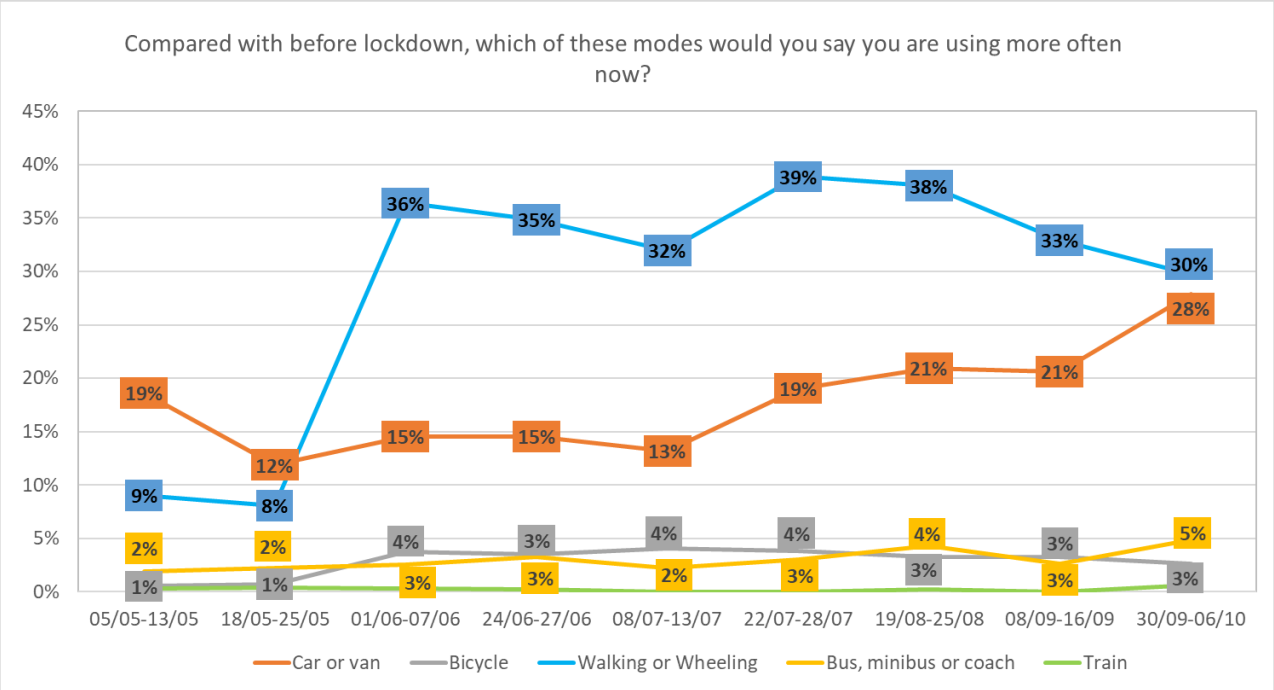


Figure 10 Modes of Travel - Frequency of Use (More often), COVID -19 Public Attitudes Surveys

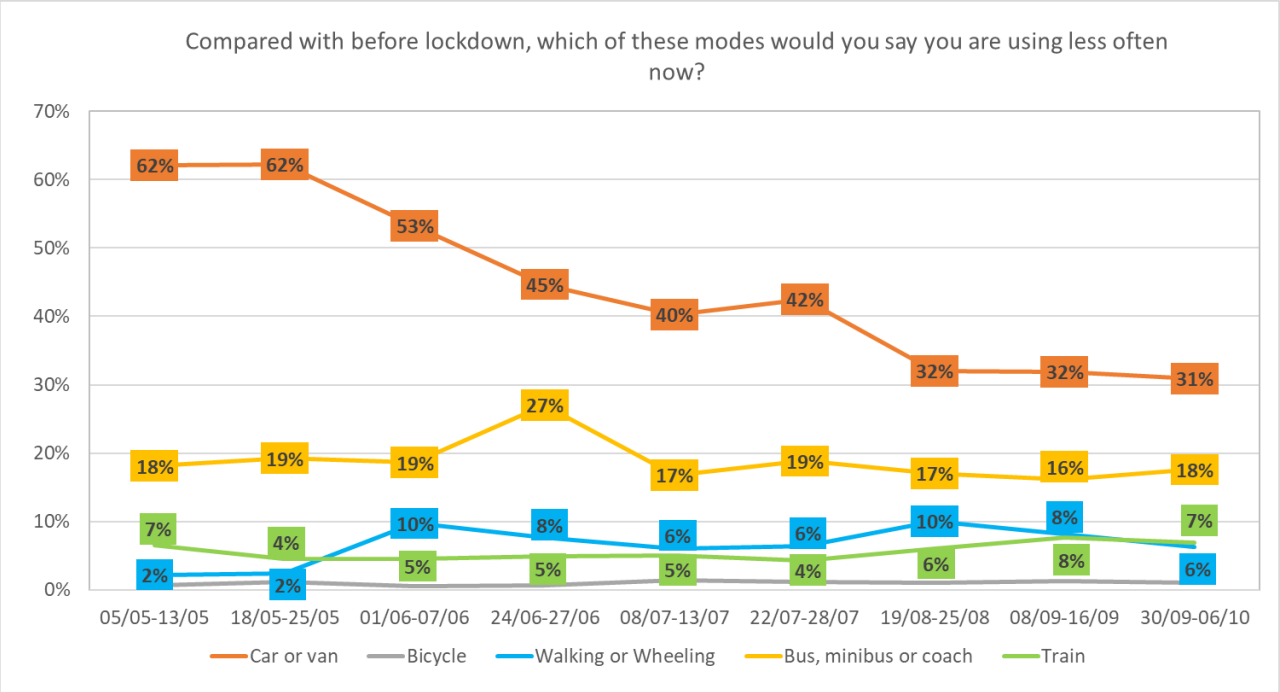


Figure 11 Modes of Travel - Frequency of Use (Less often), COVID-19 Public Attitudes Surveys

3.3. Active Travel

3.3.1. Walking

Figure 12 shows pedestrian activity data, based on Transport Scotland's analysis of active travel count data provided by Local Authorities and Cycling Scotland. Due to limitations in sufficient baseline data to enable comparison with an equivalent period in 2019, this data has been presented indexed to June 2019 average levels.

Any conclusions drawn from this analysis therefore require accounting for the impacts of seasonal variation on the comparison.

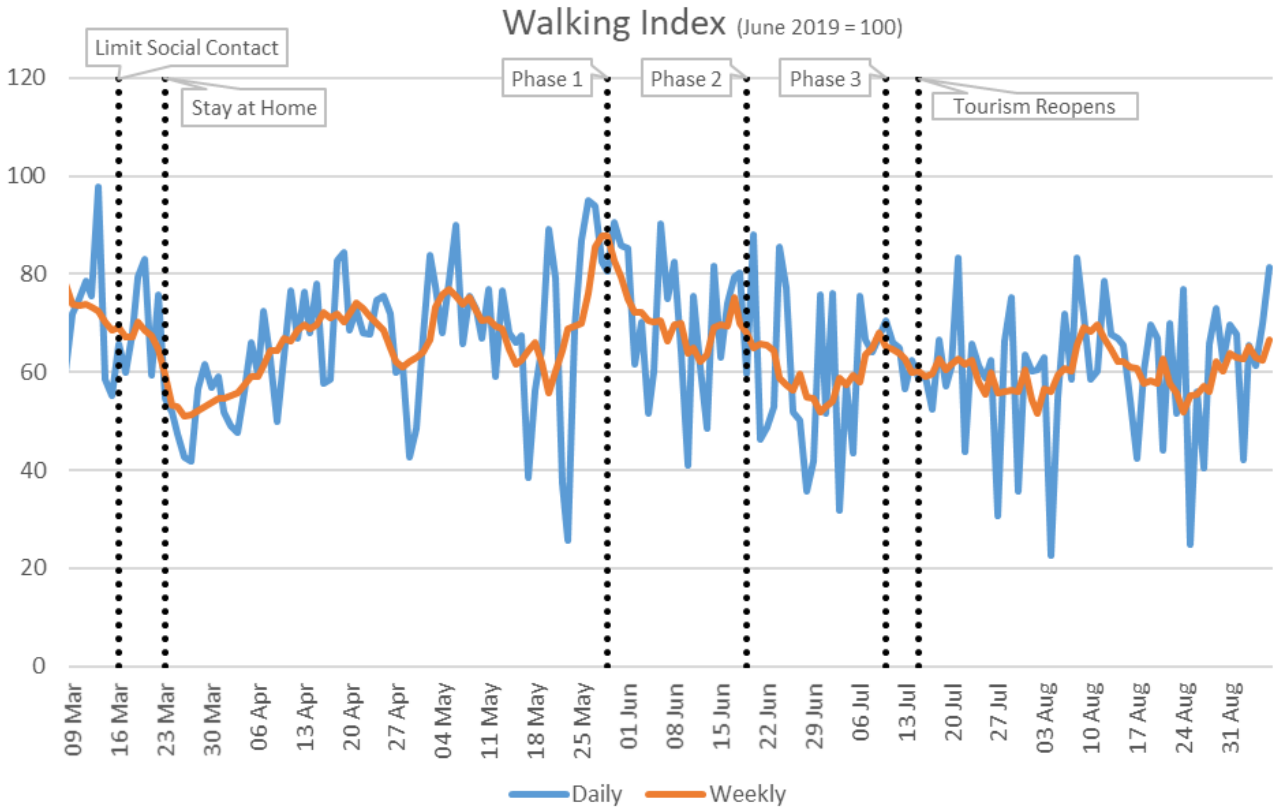


Figure 12 Walking Index, Six Month Travel Trends Reporting

Key observations:

- Walking activity dipped at the start of lockdown, from 70-80% just prior to the start of lockdown to 50-60% of June 2019 levels in late March/early April. The dip was less pronounced than for motorised modes;
- Walking activity was consistently below 2019 levels, with the seven day index fluctuating between approximately 50% and 90% of June 2019 levels;
- The TS Public Attitude survey suggest that the majority of walking and wheeling trips (57%) were made for outdoor exercise, with 16% to shop for groceries. Just 2% of walking and wheeling trips were to travel to/from work, although this low number is likely to be significantly influenced by the number of employees no longer travelling to work during the pandemic.
- Daily fluctuations are strongly influenced by daily changes in weather. In this context drier weather conditions in April, May and June may have influenced levels of walking. Given data is compared to June 2019, trends are also susceptible to seasonality between years e.g. June 2019 may have been drier than summer 2020.

3.3.2. Cycling

Figure 13 shows cycling activity indexed to June 2019 levels. The same notes regarding data sources and the availability of 2019 comparator data as in section 3.3.1 *Walking* apply.

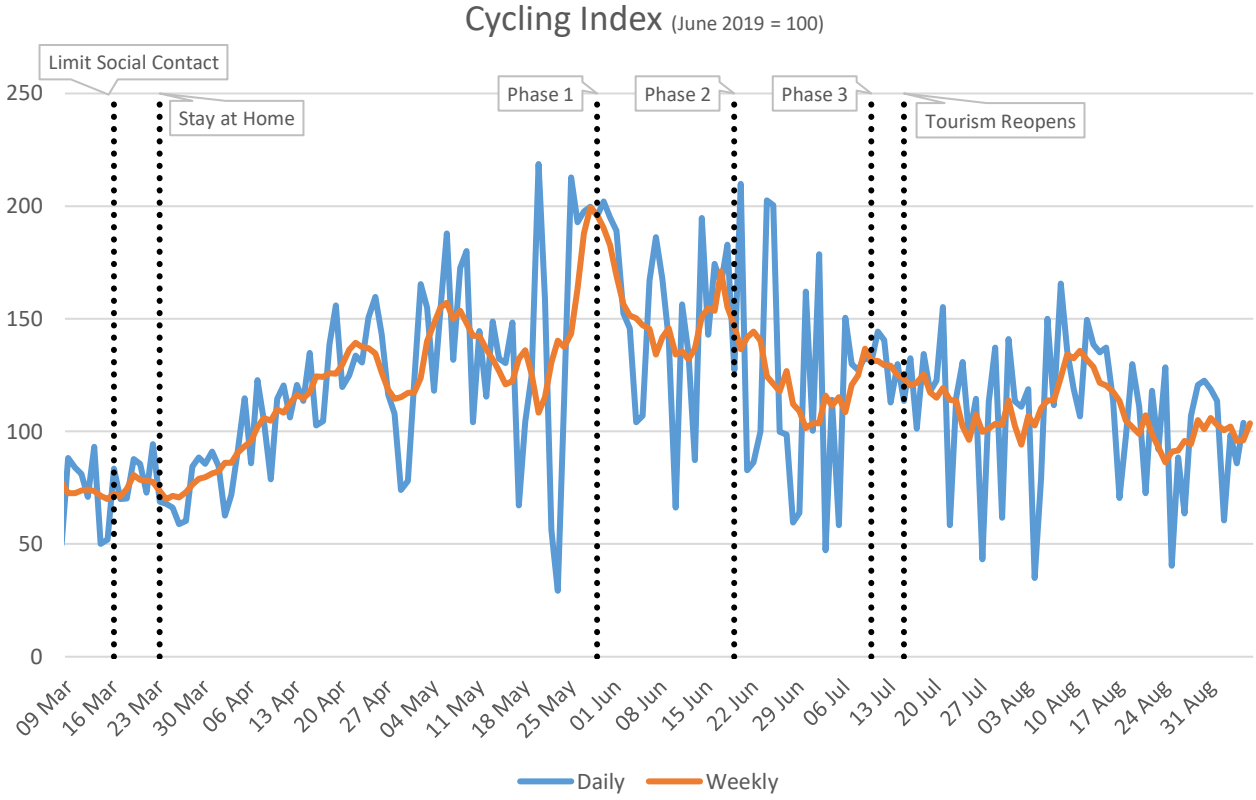


Figure 13 Cycling Index, Six Month Travel Trends Reporting

Key observations:

- In contrast to other modes cycling activity increased at the start of lockdown;
- Cycling activity reached levels higher than June 2019 activity in early April and remained above 100% June 2019 levels for much of the analysis period;
- The TS Public Attitude survey suggest that the majority of cycling trips (62%) were made for outdoor exercise, with 11% to shop for groceries. Around 8% of cycling trips were to travel to/from work, although this low number is likely to be significantly influenced by the number of employees no longer travelling to work during the pandemic;
- Cycling activity was lower towards the end of the period, in July and August, than in May and June. It is unclear to what extent this was driven by normal seasonal fluctuations in weather conditions affecting the comparison with the June 2019 baseline rather than the re-opening of the economy.

3.3.3. Active Travel Public Attitudes

There is a strong suggestion that COVID-19 may result in higher levels of walking and cycling in the longer term. The proportion of respondents during the TS research who agreed (strongly or somewhat) that they would walk or cycle more in the long-term was consistently above 60%, with the exception of July and November when the proportion was above 50%. In November (Wave 10) the figure was 59%, whilst only 22% disagreed (either strongly or somewhat) that they would walk or cycle more in the future.

3.4. Public Transport

3.4.1. Bus

Figure 14 shows bus passengers and services indexed to the equivalent period in the week beginning 2nd March 2020. Bus passenger indices are based on commercial ticket data provided by Ticketer, which includes data from most major bus operators in Scotland, with the exception of Stagecoach and Lothian Buses.

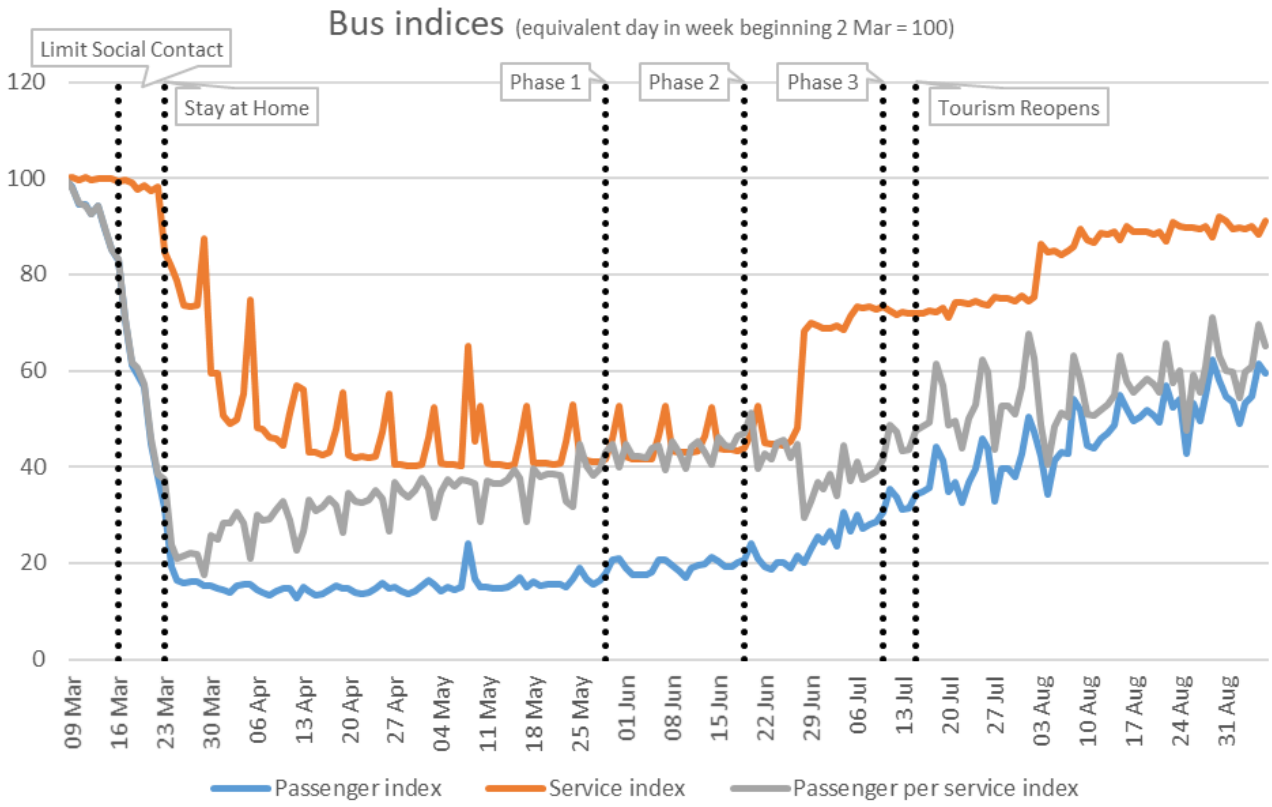


Figure 14 Daily Bus Indices (All passengers), Six Month Travel Trends Reporting

Key observations:

- Bus patronage fell sharply in the week preceding the start of lockdown, to around 15% of normal levels.
- Service levels declined more gradually in late March and early April and settled at around 40% of normal operations.
- Bus patronage increased in July and August, recovering between 50 and 60% of pre-lockdown patronage by late August;
- Service levels returned to around 90% pre-lockdown levels by the end of August;
- The difference between the recovery of service levels and passenger numbers may reflect reduced capacity due to the need for social distancing;
- Following the re-opening of tourism, the passenger index peaked each weekend, suggesting leisure activity recovered to a greater extent than commuter travel.

3.4.2. Rail

Figure 15 shows Scotrail patronage and service levels between 8th March and 6th September. Patronage has been indexed to an equivalent period in 2019, and services to pre-COVID-19 timetables.

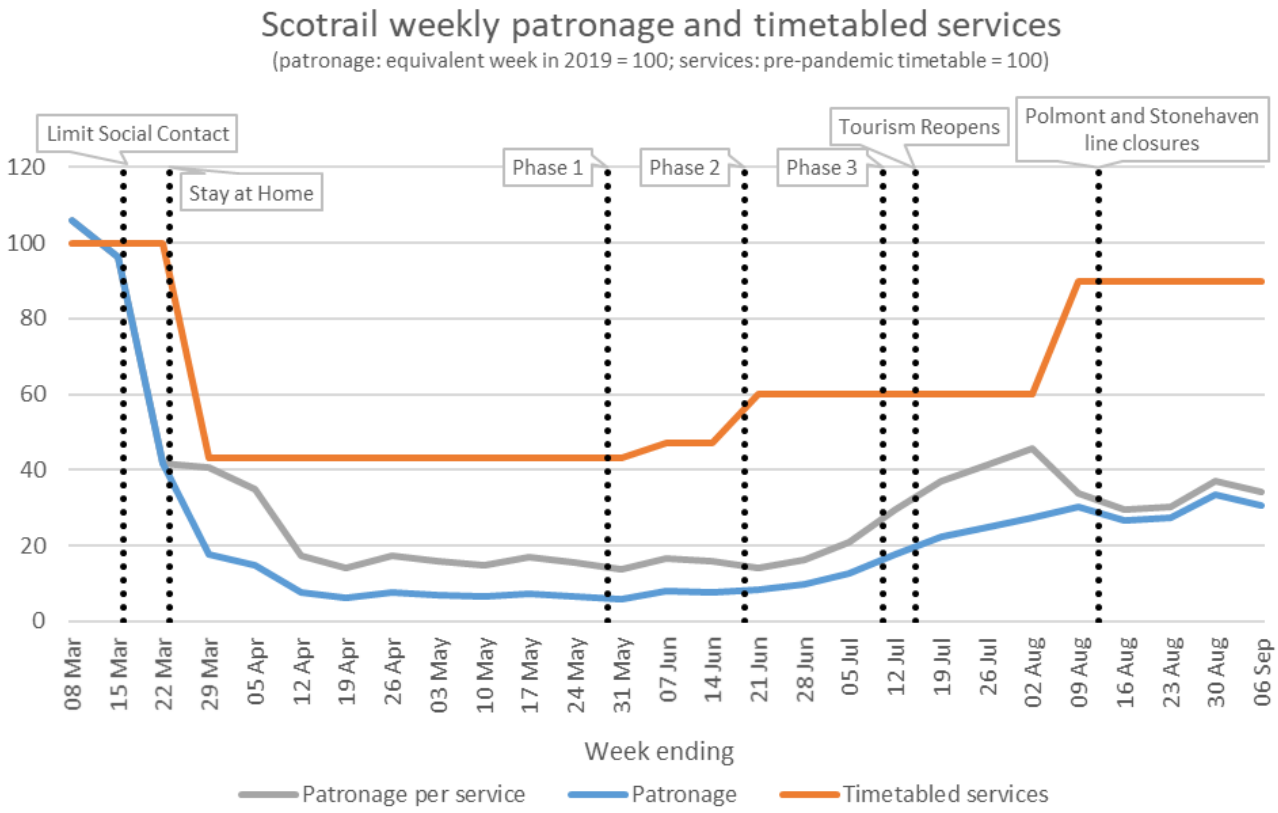


Figure 15 Scotrail Weekly Patronage and Timetabled Services, Six Month Travel Trends Reporting

Key observations:

- Rail patronage fell to lower levels than bus following the start of lockdown. Passenger volumes declined to around 8% pre-COVID-19 levels on weekdays and 3% during weekends;
- Patronage recovery has been slower than for bus, with services carrying around 30% of pre-COVID-19 passengers in August. Recovery slowed in that month partly due to line closures at Polmont and Stonehaven;
- Service levels recovered to around 90% of pre-COVID-19 timetables in August;
- In Phase 3, the passenger index started to peak at weekends suggesting a faster recovery of leisure purposes.
-

3.4.3. Ferry

Figure 16 shows CalMac (Hebridean and Clyde Ferries) and Northlink (to Orkney and Shetland) ferry patronage between the weeks commencing 9th March and 31st August. Patronage has been indexed to an equivalent period in 2019.

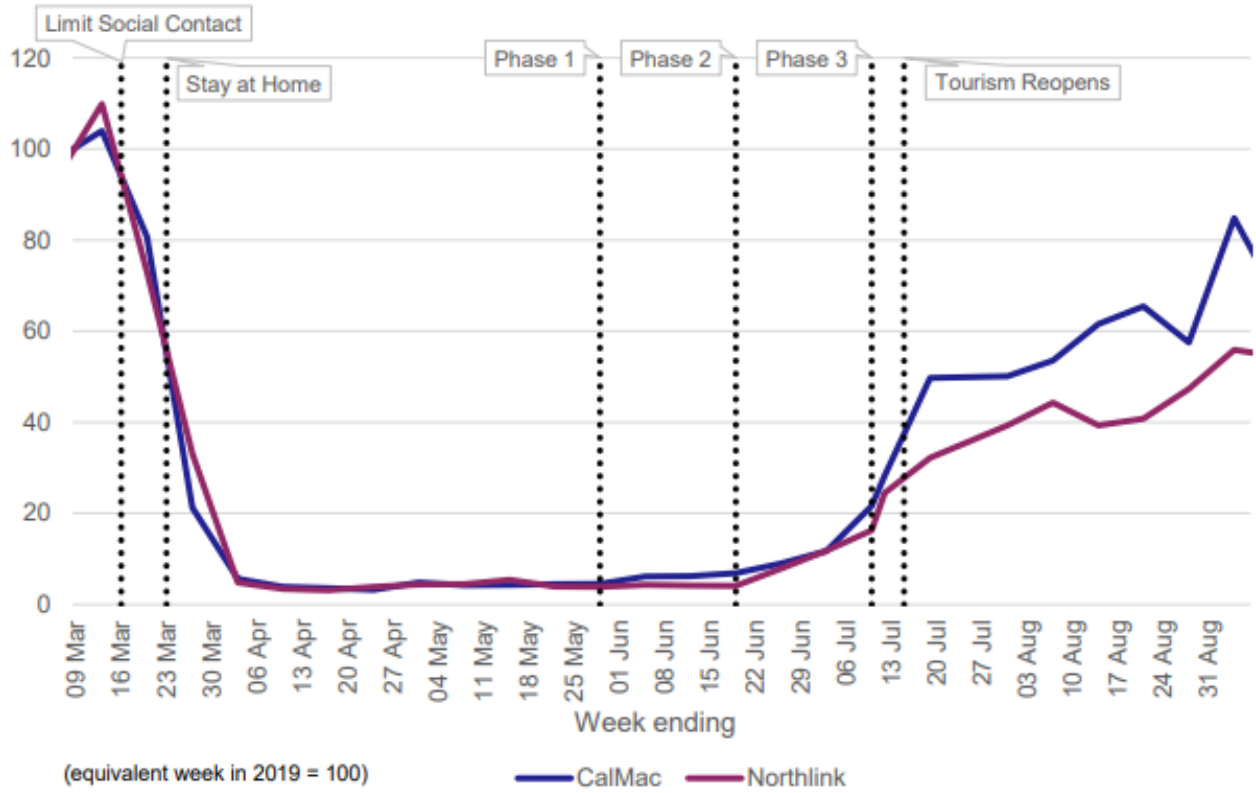


Figure 16 CalMac and Northlink Ferry Passengers Carried Weekly, Six Month Travel Trends Reporting[20]

Key observations:

- Ferry passenger numbers dipped sharply to less than 4% of 2019 levels at the start of lockdown, although the re-opening of tourism saw their revival to around 60% of 2019 levels by mid-August[21];
- CalMac ferries (serving the Hebrides and Clyde) saw a faster and stronger recovery in patronage than Northlink (to Orkney and Shetland).
- The number of commercial vehicles conveyed by ferry during the six month period dropped by around 40% during lockdown, but recovered to 80-100% of 2019 levels as restrictions eased.
-

3.4.4. Public Transport Public Attitudes

In November (Wave 10 of the Transport Scotland COVID-19 Public Attitudes Surveys) 41% of respondents stated that they will avoid using public transport and use their car or vehicle more when restrictions are lifted, and this proportion has remained relatively steady in the region of 40%-50% across the months from May to November.

Recorded attitude statements indicated that only between 20% and 24% of respondents

[20] The sharp rise in the CalMac index between the weeks commencing 24 and 31 August is misleading as it results largely from a week of bad weather with vessels out of service for necessary repair work in 2019 rather than any week on week increase in 2020 passenger numbers.

[21] Note that CalMac (5.6 million passengers in 2019) generally carry significantly more passengers annually that Northlink (348,000 passengers in 2019).

agreed that they would make more trips by public transport following the opening of more destinations (e.g. indoor shopping centres. hairdressers, pubs, etc), whilst 53% - 66% disagreed.

The survey also explored the reasons for this. A summary of the responses is provided in Figure 17 and Table 1. Few respondents expect to use public transport less due to reasons related to the availability of public transport services, although a small proportion (5% or less) noted poor service frequency.

Reasons related to disease control and cleanliness were consistently prominent throughout the periods surveyed. 34% of respondents raised concerns that others are still carrying the disease, 19% noted lack of social distancing and 16% concerns over hygiene during the November polls (Wave 10). Whilst these concerns are likely to be addressed in the long term through improvements in treatment and availability of vaccination, there is some uncertainty as to the extent to which this change in attitude is likely to continue to impact on public transport patronage in the medium to longer term.

Moreover, a substantial proportion of respondents (30% in November) expected to use car more for reasons of convenience and any increase in car use attributable to this may be difficult to reverse.

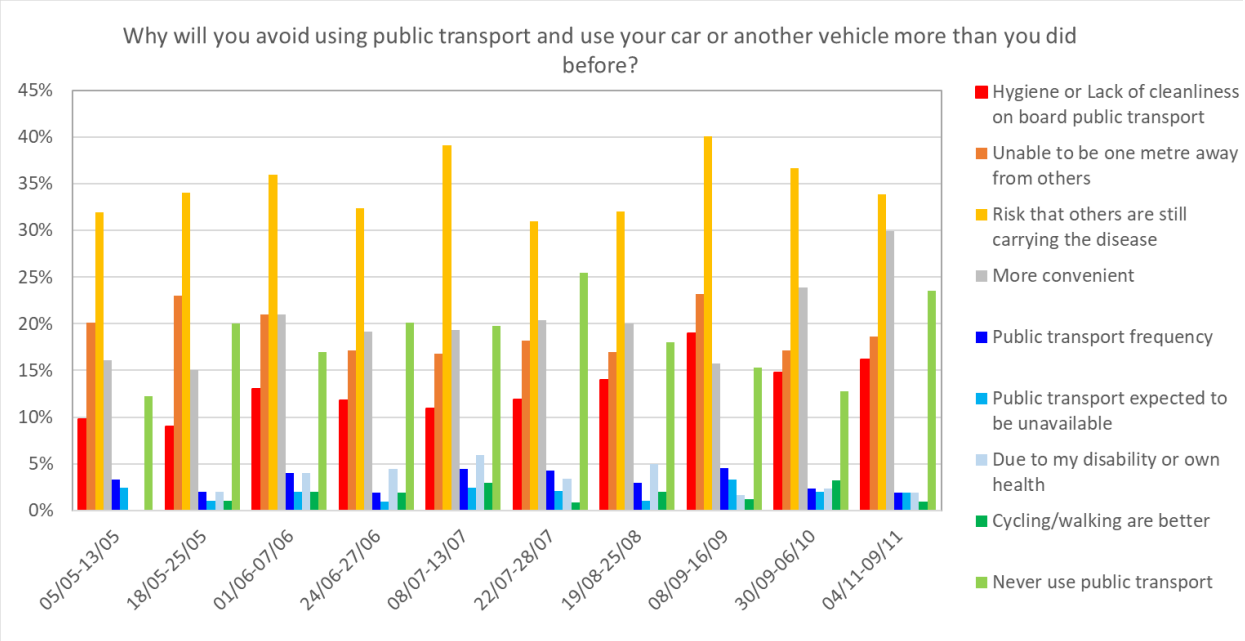


Figure 17 Respondents' Stated Reason: Why will you avoid using public transport and use your car or another vehicle more than you did before? TS COVID-19 Public Attitudes Surveys

Table 1 Respondents' Stated Reason: Why will you avoid using public transport and use your car or another vehicle more than you did before? TS COVID-19 Public Attitudes Surveys

STATED REASON	WAVE 1 (05/05-13/05)	WAVE 2 (18/05-25/05)	WAVE 3 (01/06-07/06)	WAVE 4 (24/06-27/06)	WAVE 5 (08/07-13/07)	WAVE 6 (22/07-28/07)	WAVE 7 (19/08-25/08)	WAVE 8 (08/09-16/09)	WAVE 9 (30/09-06/10)	WAVE 10 (04/11-09/11)
Hygiene or Lack of cleanliness on board	10%	9%	13%	12%	11%	12%	14%	19%	15%	16%
Unable to be one metre away from others	20%	23%	21%	17%	17%	18%	17%	23%	17%	19%
Risk that others are still carrying disease	32%	34%	36%	32%	39%	31%	32%	40%	37%	34%
More convenient	16%	15%	21%	19%	19%	20%	20%	16%	24%	30%
Cheaper now to drive	0%	0%	1%	0%	0%	0%	0%	0%	1%	0%
Roads less congested	1%	0%	0%	0%	0%	1%	0%	0%	0%	0%
Public transport frequency	3%	2%	4%	2%	4%	4%	3%	5%	2%	2%
Public transport expected to be unavailable	2%	1%	2%	1%	2%	2%	1%	3%	2%	2%
I have a company car	N/A	0%	0%	0%	0%	0%	0%	1%	0%	1%
Due to my disability or own health	N/A	2%	4%	4%	6%	3%	5%	2%	2%	2%
Cycling/walking are better	N/A	1%	2%	2%	3%	1%	2%	1%	3%	1%
Something else	18%	11%	8%	22%	7%	10%	22%	16%	25%	6%
Never use public transport	12%	20%	17%	20%	20%	25%	18%	15%	13%	24%

3.5. Road Traffic

3.5.1. Road Traffic Observed Trends

Car traffic experienced a reduction to slightly above a quarter of its pre-lockdown levels on weekdays and less than a fifth at weekends. This reduction was less than for public transport modes, which were subject to Government advice to avoid non-essential travel as well as passengers concerns regarding the risk of infection. Car traffic started increasing earlier and recovered more completely than public transport patronage. At the start of Phase Three it had returned to 77% of pre-lockdown levels, compared with 28% for concessionary bus use and 18% for rail patronage. By the end of August car traffic was largely back to pre-lockdown volumes. HGV traffic reduced less, fluctuating around 60% of pre-lockdown levels during most of April and May, and returned to about 95% pre-lockdown levels at the end of August.

Figure 18 and Figure 19 show the average hourly profile of vehicles passing a selection of trunk road Automatic Traffic Count (ATC) sites, on weekdays and weekends, respectively. The comparison includes the following periods:

- Pre-lockdown (2nd – 15th March);
- Lockdown (30th March – 12th April);
- Phase 1 of easing (1st-7th June);

- Phase 3 of easing (13th – 26th July); and
- After school return (24th August – 6th September).

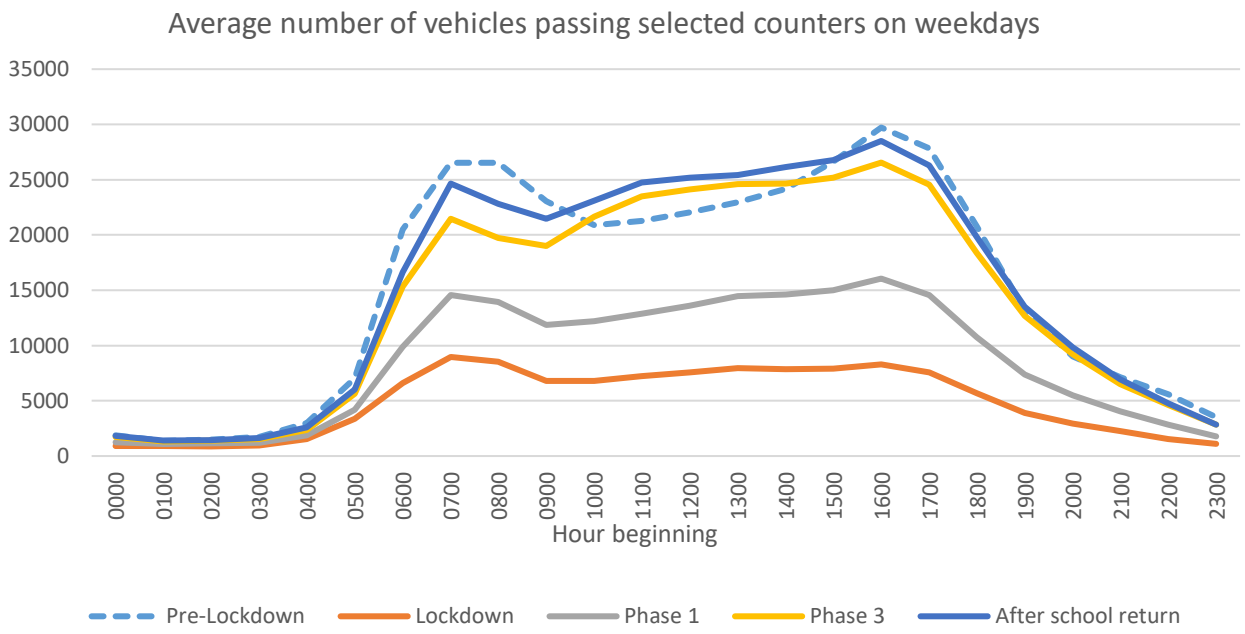


Figure 18 Road Vehicle Activity – Weekdays, TS Six Month Travel Trends Reporting

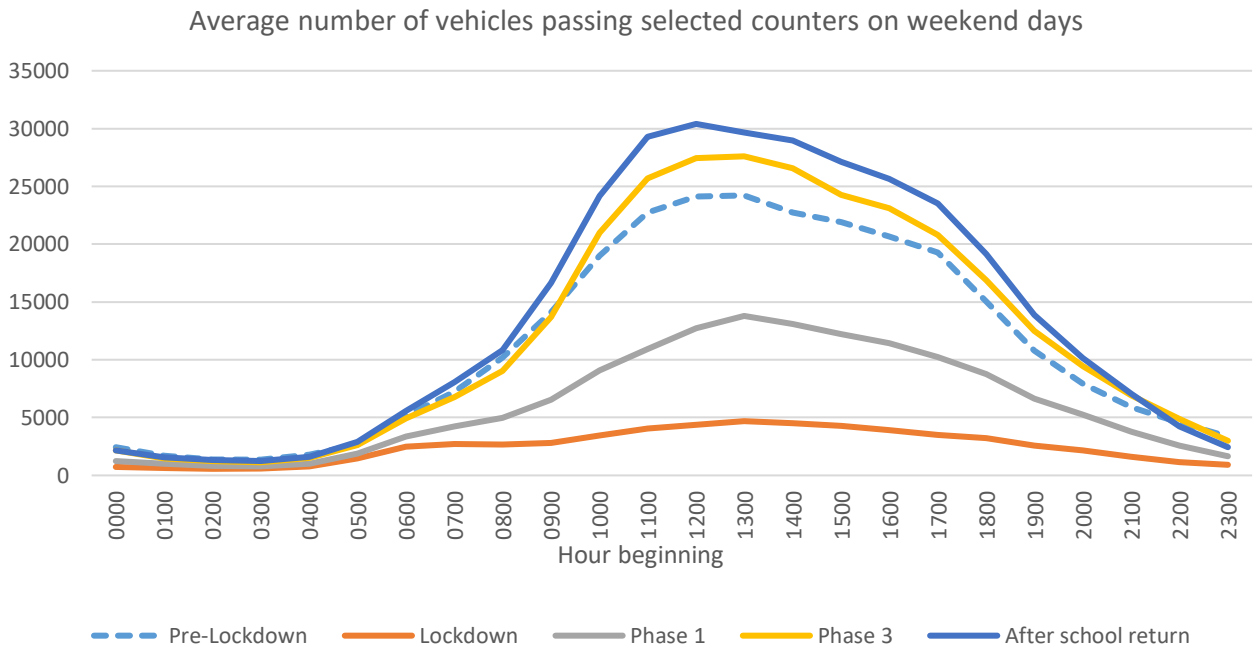


Figure 19 Road Vehicle Activity – Weekends, TS Six Month Travel Trends Reporting

Key observations:

- Reported traffic levels and observations are subject to seasonality effects. This is because pre-lockdown comparison is with early March, and traffic levels are generally higher in August than in March despite COVID-19 impacts.

- After the schools returned weekday traffic levels approximately returned to pre-lockdown levels, however, seasonality (see first bullet point) may mean traffic levels remained lower than might be expected at this time of year.
- The peaks were less pronounced than before lockdown, presumably due to the continued impact of higher rates of working from home. The AM peak was shorter, with peak traffic approximately 10% below pre-lockdown levels;
- Traffic levels no longer dipped during the day, but gradually increased between the hours of 9AM and 4PM, to a maximum 4% below pre-lockdown PM peak traffic;
- During the interpeak, weekday traffic levels were up to 16% higher than before lockdown (which may be attributed to seasonality);
- Following the easing of restrictions in Phase 3, weekend traffic volumes rose to above pre-lockdown levels. After schools returned traffic levels in the middle of an average weekend day were 26% higher than before lockdown. This could be attributed to seasonality since comparison is to early March (see first bullet point).

3.5.2. Car Ownership and Availability

Licence holders with no access to a car were asked to state their likelihood of acquiring a car in the next year, as shown in Figure 20.

There were statistically significant differences between survey locations. 40% of Glasgow and Ayrshire intending to get a car before lockdown were no longer likely to do so, whilst the likelihood in Aberdeen and Edinburgh increased. The stated likelihood of acquiring a driving licence reduced from 25% to 17% of non-licence holders across the survey locations (Figure 21). Whilst this is likely to show the impact of uncertainty as much as changes in attitude there may be opportunities to translate this into longer term decreases in car and licence ownership and hence car use. However, differences in intention to purchase a car are also likely to reflect socio-economic differences between the locations examined, and hence differences in household resilience to loss of income due to the epidemic.

Bike ownership also increased by about 7% in the Scottish survey locations, and this presents an opportunity to promote increased uptake of cycling in the future.

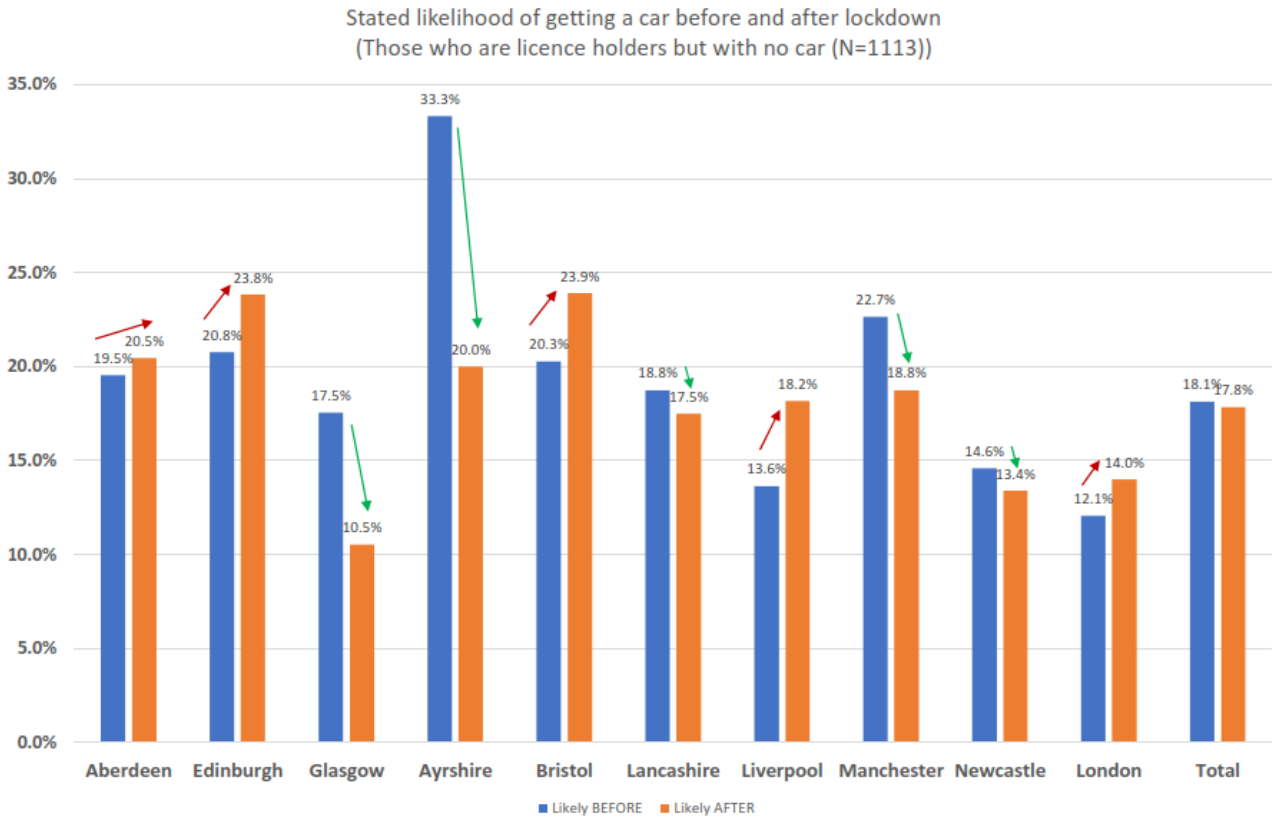


Figure 20 Respondents' stated likelihood of getting a car, ITS Leeds Research

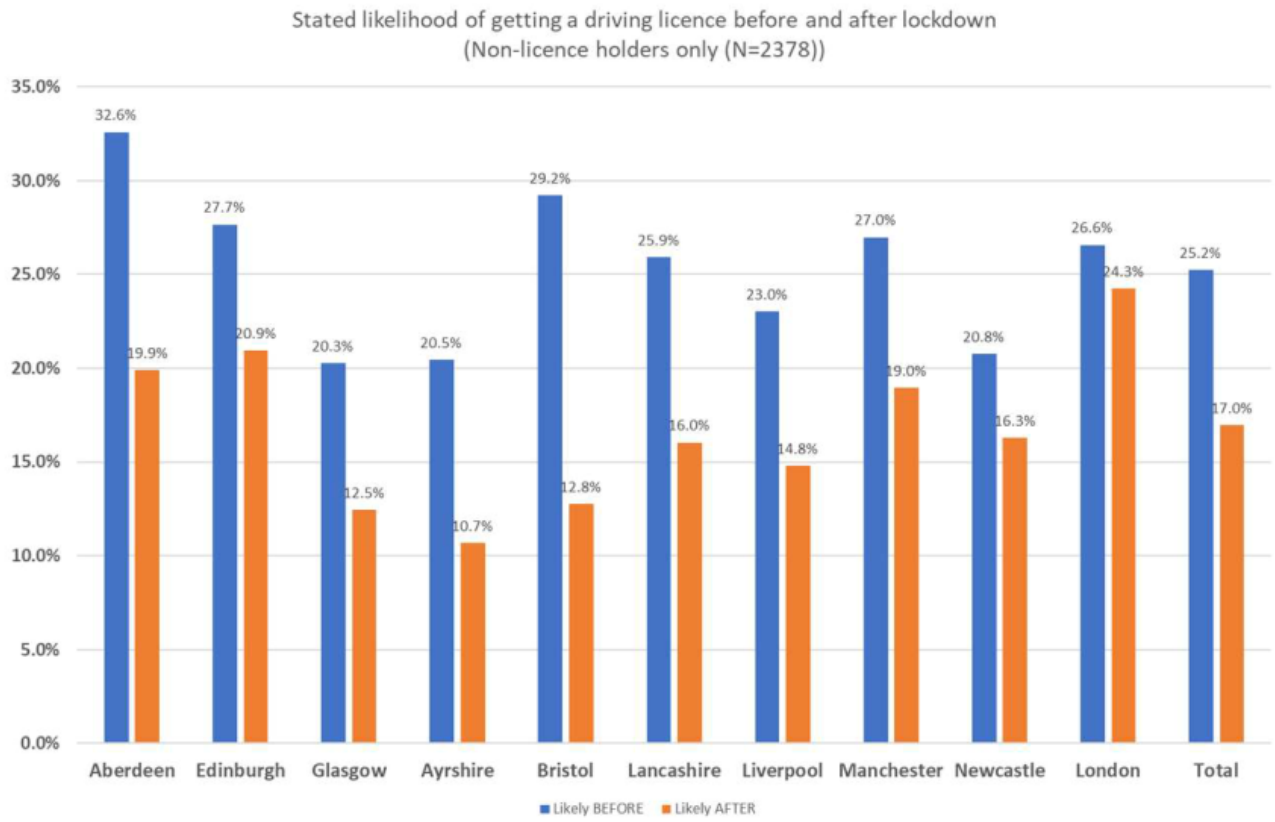


Figure 21 Respondents' stated likelihood of getting a driving licence, ITS Leeds Research

3.6. Air Traffic

3.6.1. Air Traffic Observed Trends

Figure 22 shows Scottish Air Control flight data, indexed to equivalent day in 2019. The data covers flights arriving in, leaving from or passing through the space monitored by Scottish Area Control. Whilst some maritime areas and part of Northern England are also included, this data should provide a better reflection of landings and departures at Scottish airports than datasets covering the wider UK. The data source does not provide information on passenger numbers.

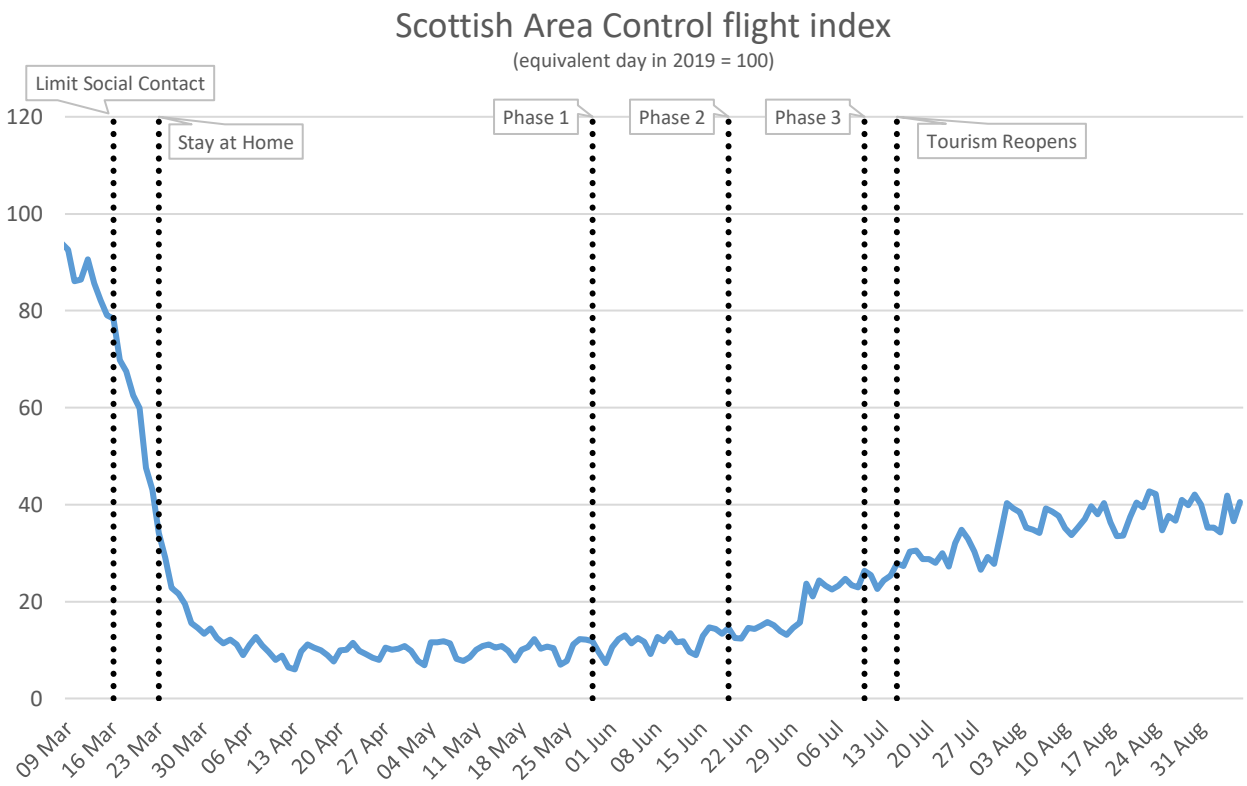


Figure 22 Flight Index, Six Month Travel Trends Reporting

Key observations:

- Flight numbers dipped to around 10% during lockdown;
- Following the re-opening of tourism, flight numbers recovered to a figure near 40% of 2019 levels;
- In July and August, service levels peaked at weekends, reflecting a faster recovery of leisure travel.

Figure 23 shows passenger arrivals to the UK for the first six months of 2020 compared with equivalent months in 2019. The data shows that international travel all but collapsed following the onset of the pandemic.

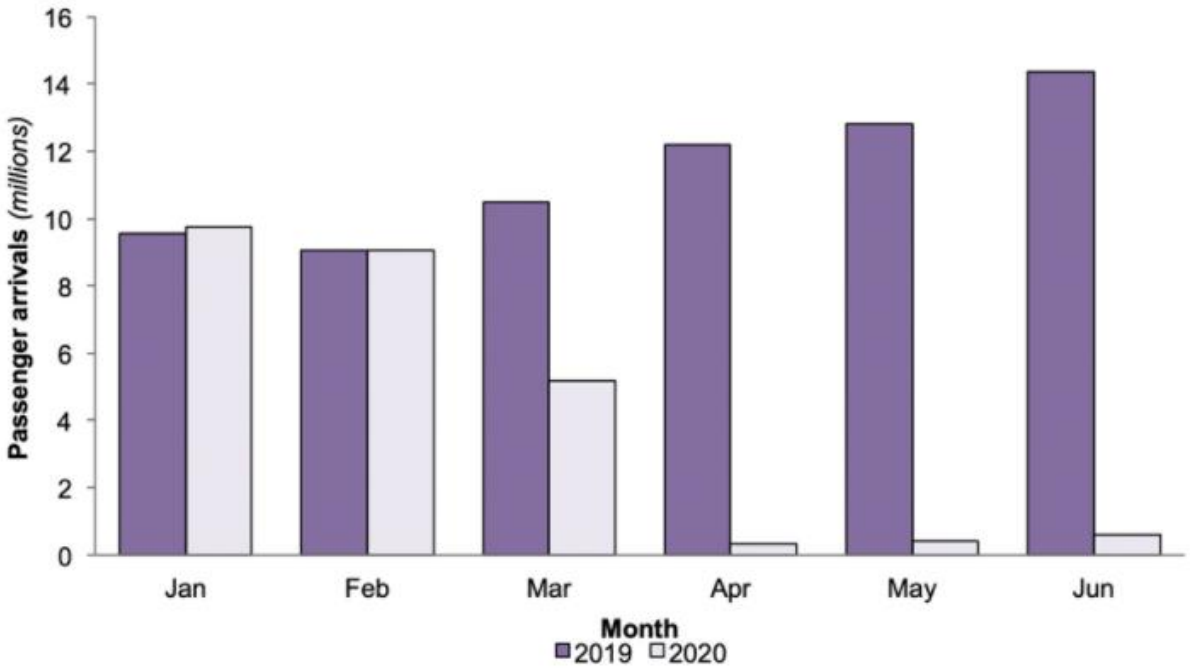


Figure 23 Passenger arrivals to the UK, by month January to June in 2019 and 2020[22]

3.6.2. Air Travel Public Attitudes

During the ONS Opinions and Lifestyle Surveys undertaken between 7th and 11th October 56% of respondents who lived within local lockdown areas and 55% who lived outside such areas, stated that the COVID-19 pandemic was affecting personal travel plans such as holidays and gap years. In excess of 50% of respondents during the May to October waves of the TS COVID-19 Public Attitudes surveys agreed that they will travel less by air in the future. The proportion who disagreed (somewhat or strongly varied between 21% and 25%. This suggest that the impacts on demand for flight capacity will linger at least in the short term.[23]

It should be noted that in November, the proportion who agreed they will fly less decreased to 41% while the proportion who disagreed increased to 38%. In contrast to the previous waves this suggests that the net reduction in the uptake of air travel could be

[22] Source: National Statistics, How Many people come to the UK each year (including visitors)? Home Office, September 2020, Available from https://www.gov.uk/government/publications/immigration-statistics-year-ending-june-2020/how-many-people-come-to-the-uk-each-year-including-visitors

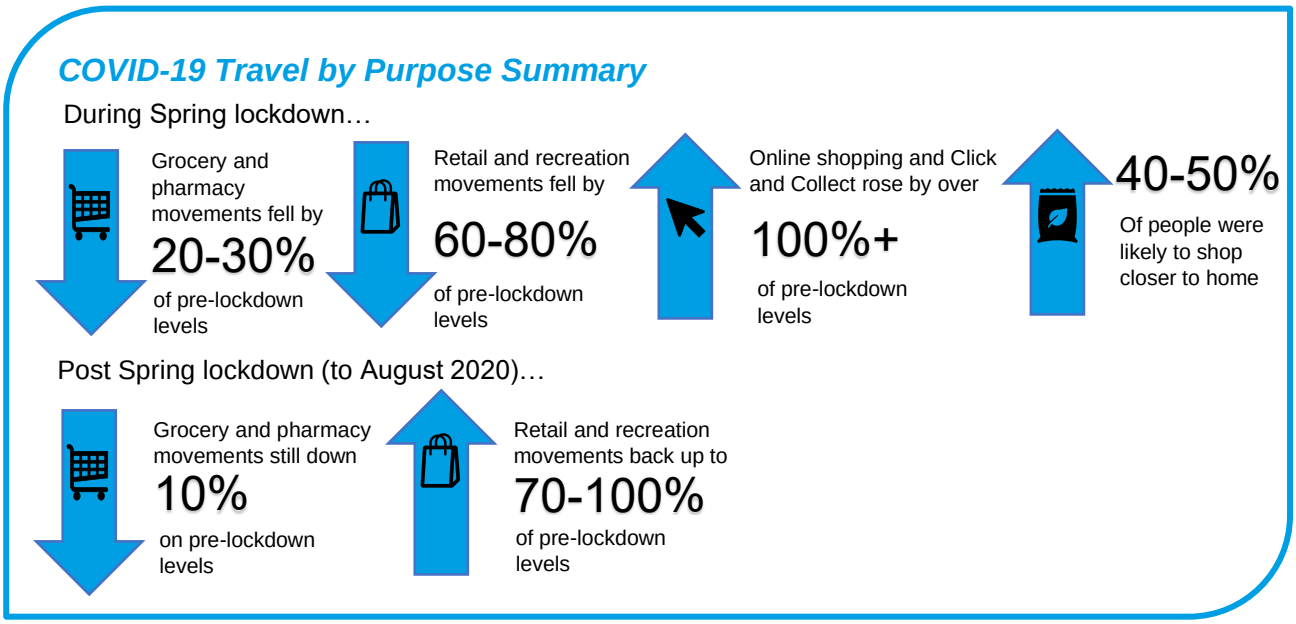
[23] Source: COVID-19 (COVID-19) roundup: People and social impacts, ONS, October 2020. Available from: https://www.ons.gov.uk/peoplepopulationandcommunity/healthandsocialcare/conditionsanddiseases/articles/COVID-19covid19rounduppeopleandsocialimpacts/2020-07-03

relatively small going forward, with November data indicating a net reduction in air travel of only 3% based on stated intention, as opposed to the previous waves which consistently suggested net reductions exceeding 25%. Further data over time would reveal whether this represents a sustained shift in attitudes.

4. Travel by Purpose

4.1. Travel by Purpose Summary

The following graphic shows a summary of key statistics relating to the impact of COVID-19 on travel by purpose. The summary statistics reported are taken from the main body text within this Chapter of the Addendum. Note that grocery, pharmacy, retail and recreation movements post lockdown exclude the Highlands and Islands which saw a significantly higher rise above pre-lockdown levels than other areas.



4.2. Workplace Movements

Figure 24 shows workplace movements, based on Google mobility data. This dataset monitors travel trends based on the movements of mobile phone users who have opted-in to Location History for their Google account. The dataset is indexed by Google to an average representing the median of equivalent days between 3rd January and 6th February 2020. The analysis excluded the three island local authorities, as data from these locations is to sparse to permit meaningful analysis.

It is noted that the data collection method likely resulted in capturing those with the clearest work/home travel patterns and may therefore under-represent non-standard work travel movements.

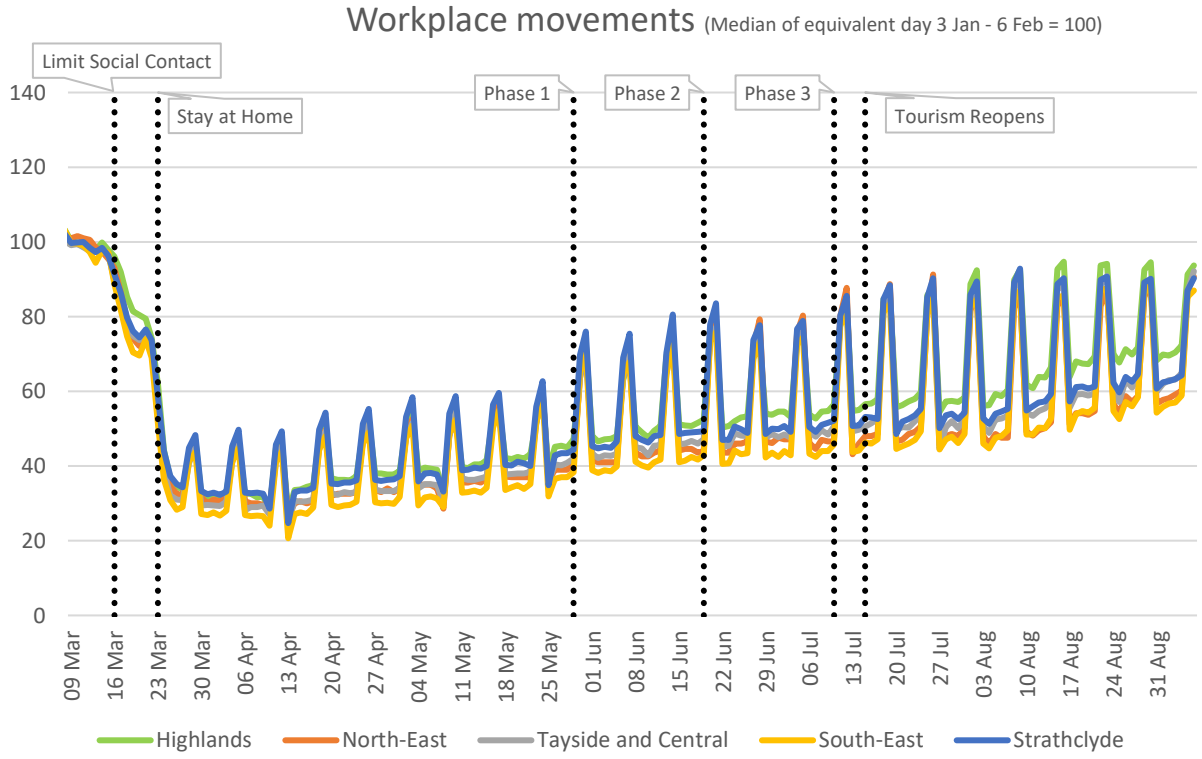


Figure 24 Workplace Movement Trends by Region, Six Month Travel Trends Reporting, Source: Google Mobility Data

Key observations:

- The data peaked each weekend, most likely as a result of differences in the representation of key workers in the weekday and weekend working populations. Before the onset of lockdown, the weekend workforce included a higher proportion of key workers than the weekday workforce. A higher proportion of key workers continued to travel to work during lockdown compared with the general working population, and this is evident in the weekend peaks when indexing against pre-lockdown data;
- At the start of lockdown, in late March and early April workplace movements dropped to about a third of the baseline period during weekdays and around 40% during weekends;
- The largest drop was seen in the South-East region and the smallest drop in Highland and Strathclyde;
- Workplace movements increased consistently between April and the end of August, reaching around 60% of pre-lockdown levels during weekdays and 90% during weekends by the end of August;
- The re-opening of tourism seems to have had a larger impact on workplace movements in the Highland region, which experienced the largest recovery during the month of August. Recovery rates were lowest in Edinburgh and Aberdeen.

Figure 25 shows modes used to travel to work during lockdown, grouped by the stated pre-lockdown travel to work mode. A high proportion of those using entirely private modes of transport continued to use the same mode, 95% of car drivers, 87% of cyclists and 82% of those walking continued to do so. 14% of those who previously used public transport walked to work during lockdown and 5% cycled. However, 22% of those who previously used public transport switched to car either as driver or as passenger and 13% of car

passengers switched to driving themselves. This presents a risk of substantially increased peak hour traffic levels should this trend continue as a larger proportion of the workforce travels to work.

Walking has proved the most popular alternative for those switching to another mode, capturing 2.4% of those who previously drove, 6.3% of former car passengers, 14.4% of public transport users and 4.9% of cyclists.

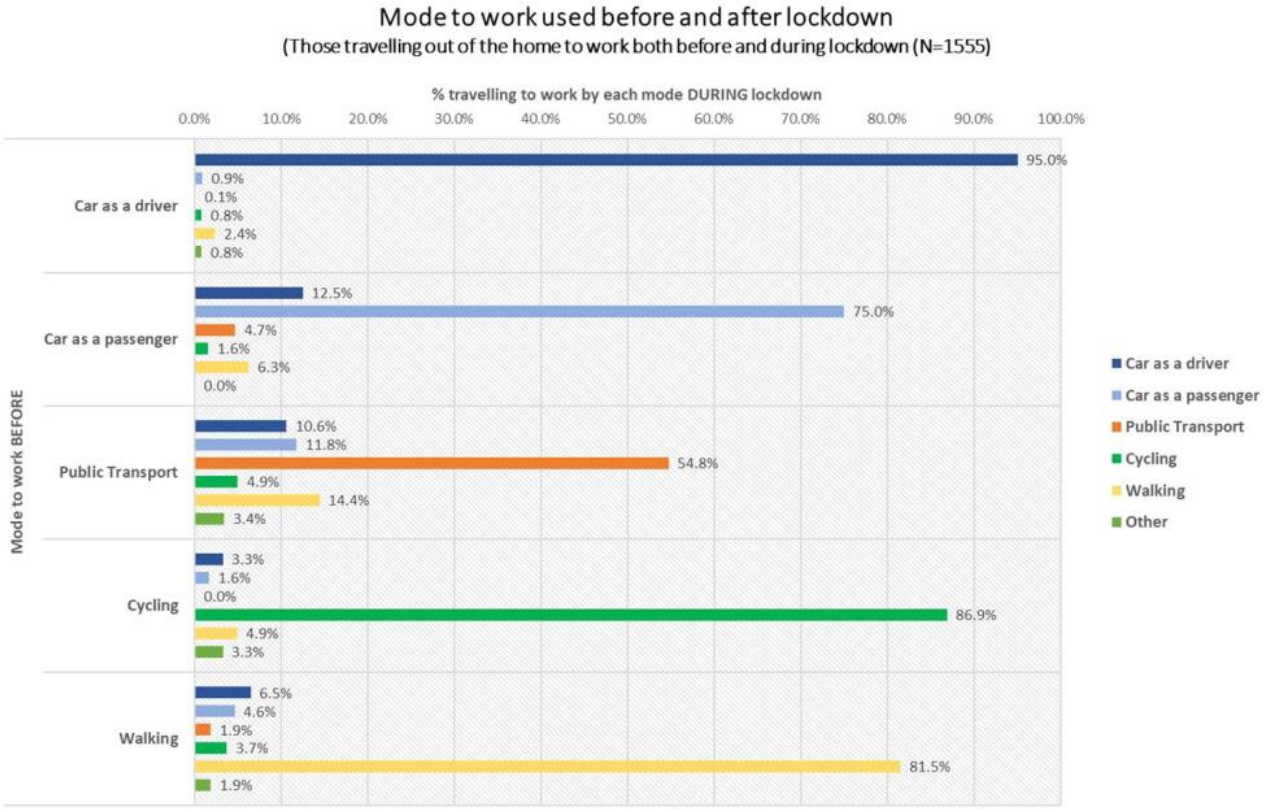


Figure 25 Travel to Work, Mode shift during lockdown, ITS Leeds Research

Figure 26 shows analysis of respondents' stated likelihood of using different modes to travel to work in the future, after lockdown. The analysis indicates that walking to work is expected to increase in all LAs examined, with the largest increase in Edinburgh (23%) and the smallest in Ayrshire (7%). Car use (as driver) in the Scottish locations is expected to increase by between 13% and 19%. Bus use is expected to decrease, less so in rural Ayrshire (-6%) where bus frequency and coverage is less developed, than in Scotland's cities. The largest decrease in travel to work by bus is expected in Edinburgh (-29%). Edinburgh is expected to see the largest increase in commuting by bike (14%).

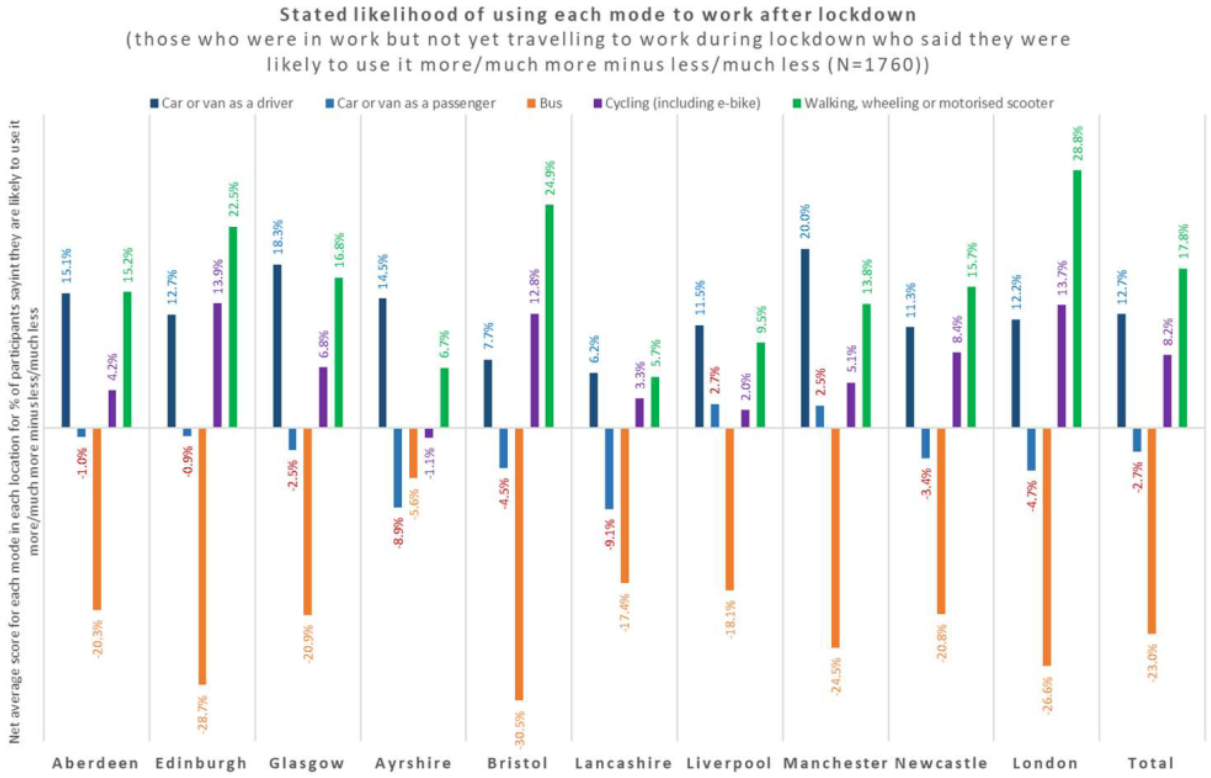


Figure 26 Changes in likelihood to use different modes after lockdown

4.3. Retail and Recreation Movements

4.3.1. Grocery and Pharmacy Movements

Figure 27 shows movements related to groceries and pharmacies, based on Google movement data. Due to a change in the processing methodology mobility data describing grocery and pharmacy movements presented in this section, as well as analysis of retail and recreation movements presented in section 4.3.2 was not released for the period from 17th August. As before, mobility data for these purposes has been indexed to the median of equivalent days between 3rd of January and 6th of February to provide a comparison with travel before lockdown.

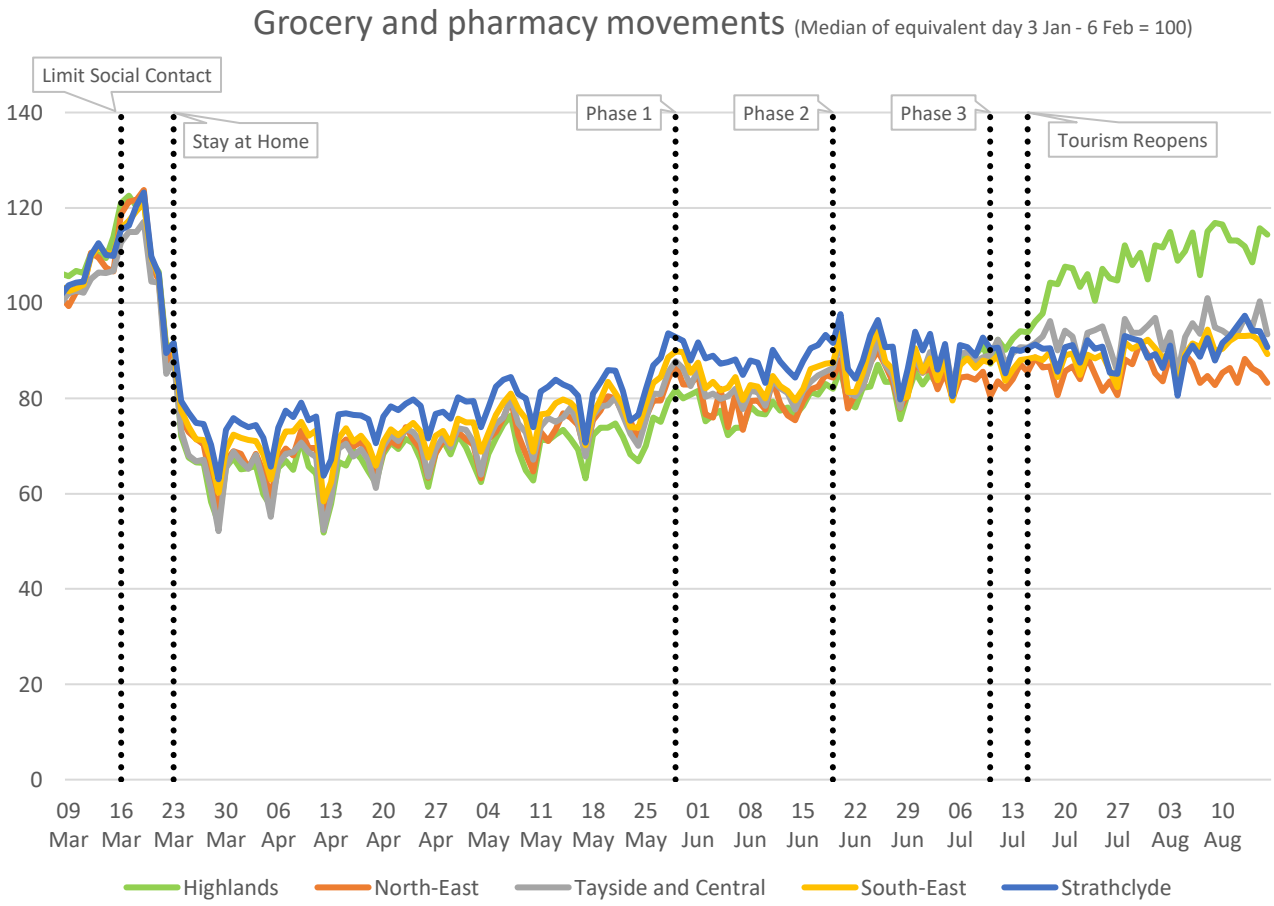


Figure 27 Grocery and Pharmacy Movements Trends by Region, Six Month Travel Trends Reporting, Source: Google Mobility Data

Key observations:

- Groceries and pharmacy shopping movements fell to around 70% of pre-lockdown levels on weekdays and 60% on Sundays, reflecting both that these are essential movements and Government advice to limit those movements to as few as possible;
- Groceries and pharmacy shopping movements rose to around 85-90% by mid-August;
- Following the re-opening of tourism, these movements rose faster in the Highlands region than elsewhere, reaching around 110% of pre-lockdown levels in early August. This is partly impacted by a greater degree of seasonality in this region (i.e. being indexed against January to February data), but may also be partly the impact of tourism.

4.3.2. Retail and Recreation Movements

Figure 28 shows trends in retail and recreation movements between 9th March and 16th August. The figures present data related to mobility within restaurants, cafes, shopping centres, theme parks, museums, libraries and cinemas. There are some gaps in data availability, notably for Strathclyde.

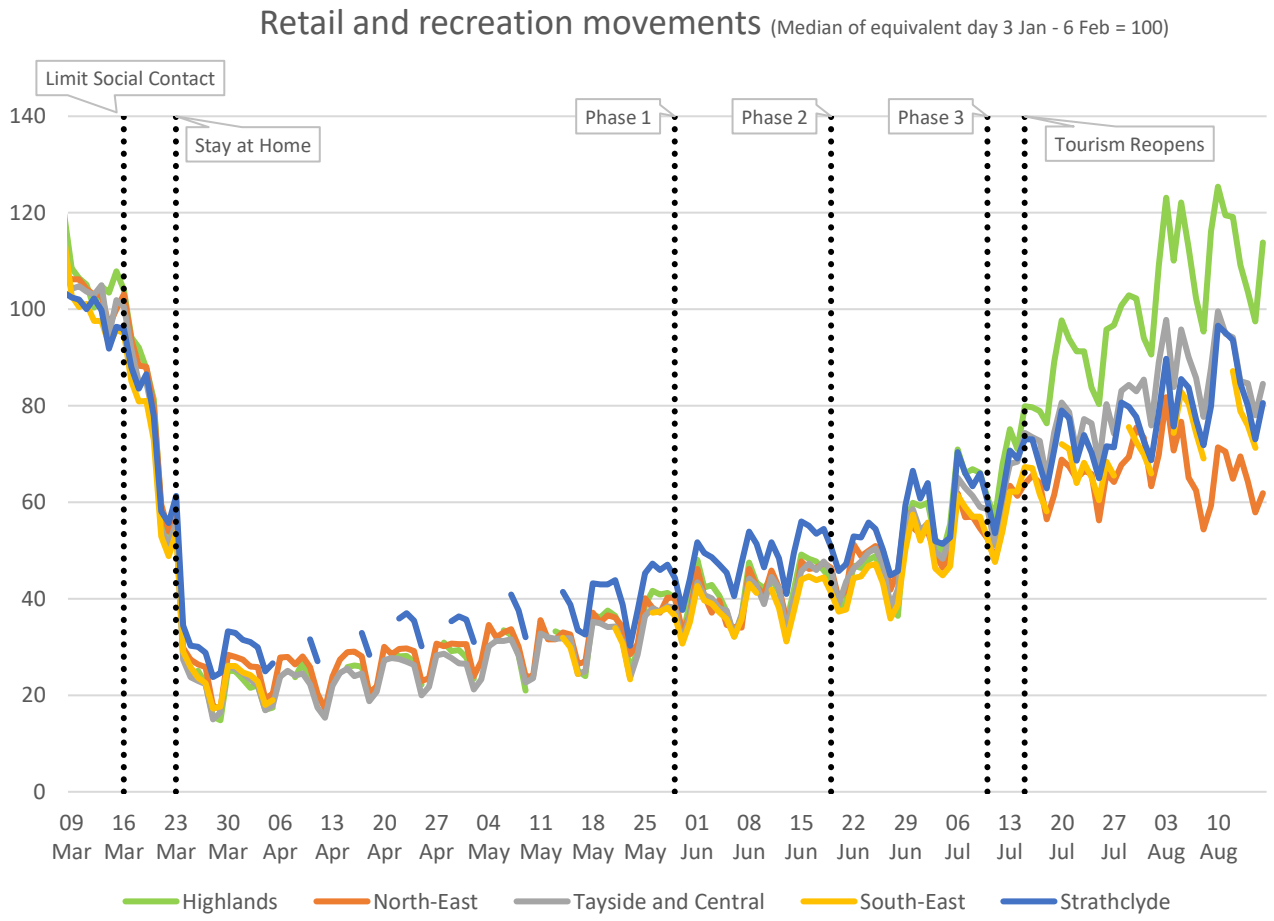


Figure 28 Retail and Recreation Movements Trends by Region, Six Month Travel Trends reporting, Source: Google Mobility Data

Key observations:

- At the start of lockdown, retail and recreation movements fell to a low of 20% of pre-lockdown levels at weekends and 30% on weekdays, primarily due to the closure of most non-essential retail and recreation facilities;
- In Phase 3 these movements consistently increased, fluctuating between 100-120% of pre-lockdown activity in the Highland region and between 70 and 100% in the South-East, Strathclyde and Tayside and Central. In August, retail and recreation mobility was lower in the North-East than in other regions (between 60 and 70%), presumably due to the impact of the local lockdown in Aberdeen;
- Weekly lows in the indexed data at weekends continued, possibly as movements were spread throughout the week to avoid busier periods.

Based on the ITS Leeds surveys, home deliveries saw a surge in popularity during lockdown, both personal deliveries for example from family members and from supermarkets. Similarly, respondents reported increased use of Click and Collect services. Shopping in person decreased both for large supermarkets and smaller grocery shops. These changes were more pronounced in the rural areas examined, Ayrshire respondents reported increases in personal home deliveries by nearly 700%, use of click and collect services by over 550% and home deliveries from a supermarket by over 100%. Respondents in Glasgow, where behaviour changed least stated that personal home deliveries and their use of click and collect services increased by over 150% whilst use of

home deliveries from a supermarket increased by between 50 and 100%. It should be noted that the increase in the uptake of home deliveries and click and collect services compares with a relatively small base. The use of Foodbanks also increased.

Evidence from the TS COVID-19 Public Attitude Surveys also suggests that people were far more likely to shop closer to home during lockdown with between 41 and 52% of respondents stating they were more likely and only 4-11% that they were less likely to do so.

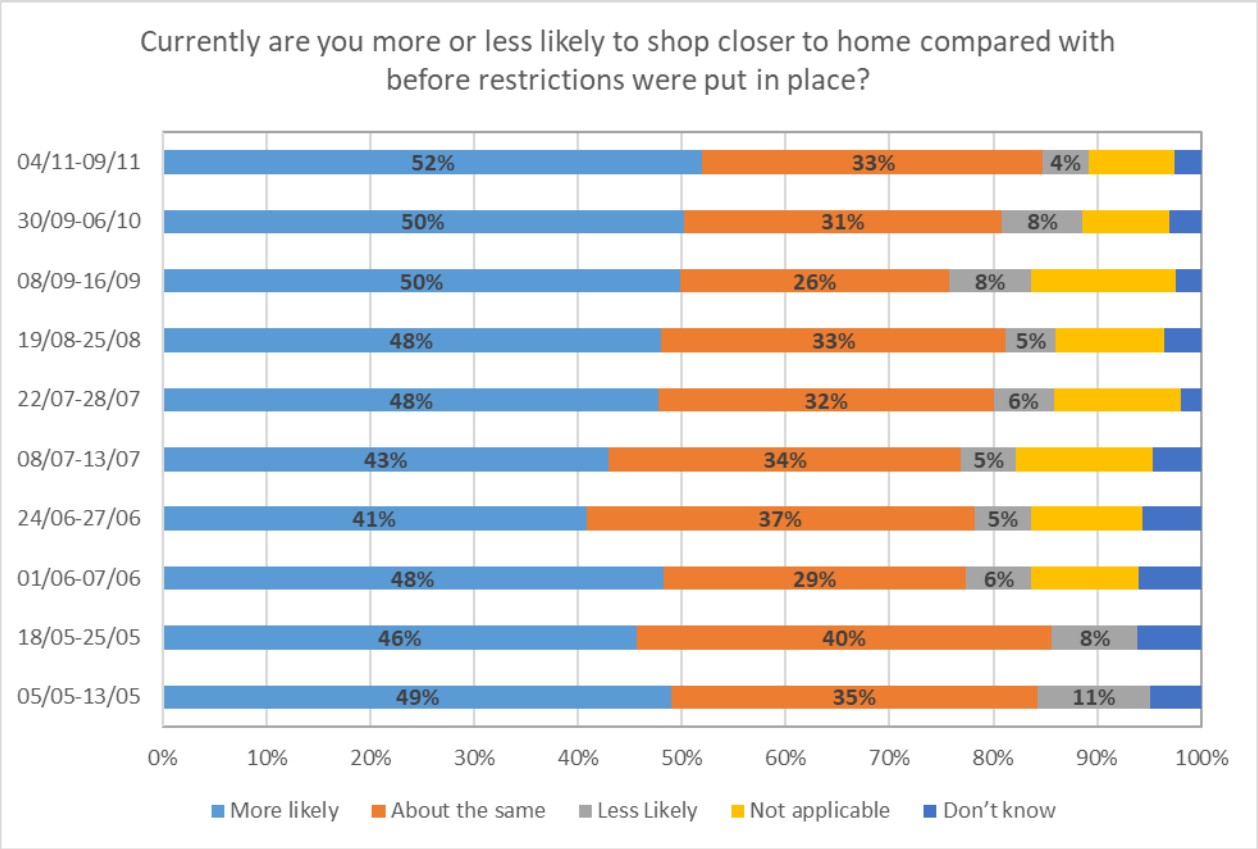


Figure 29 Respondents' Stated Likelihood to shop closer to home during lockdown, TS COVID-19 Public Attitude Surveys

4.4. Travel to Education

Over 10% of respondents in the Scottish survey locations included in the ITS Leeds surveys felt that after lockdown they would home school much more instead of travelling to education. The proportion of respondents who felt they would be home schooling at least a little more was between 30 and 40%. Note that this should be read with caution given that the question was part of a group of questions asking 'how much more or less, if at all, do you think you will use the internet…instead of physically travelling to do the following: home schooling'. Given the question was not tailored to this particular activity, it may have been interpreted in various ways by respondents (e.g. home schooling meaning homework, more home schooling being required rather than a choice etc.).

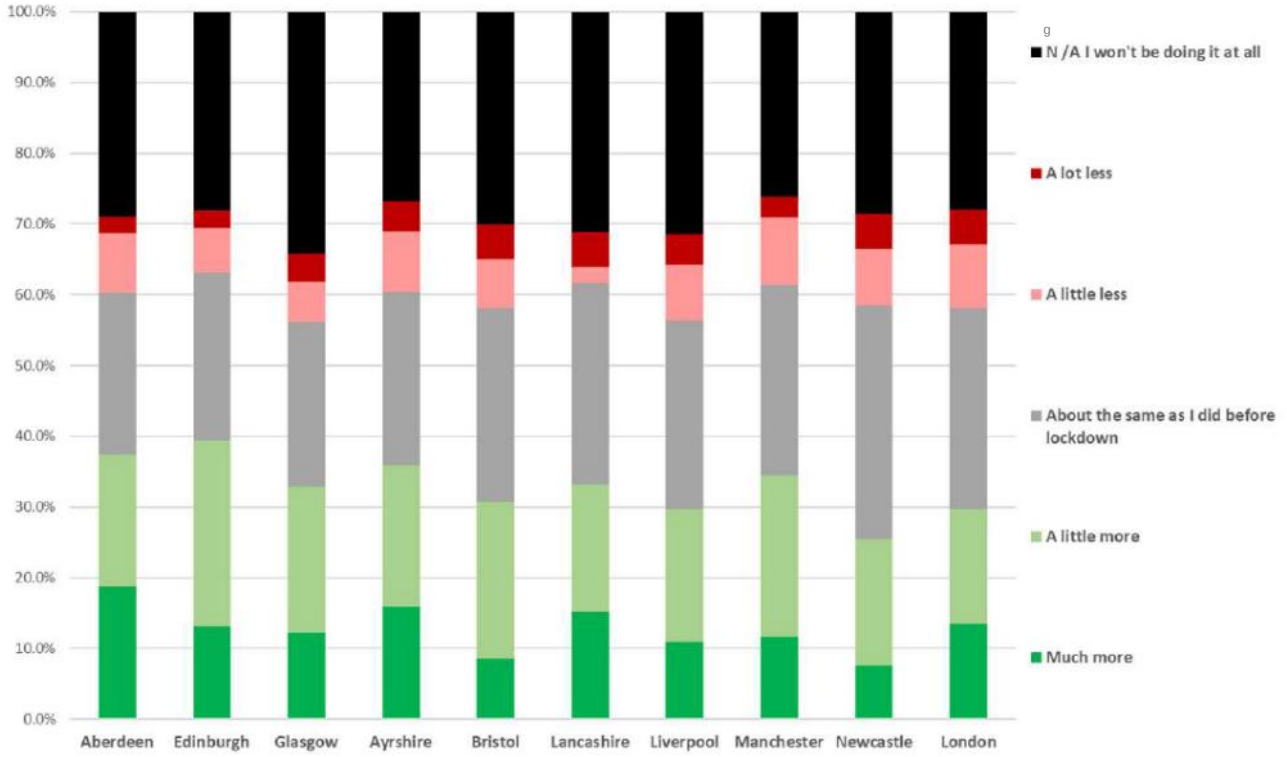


Figure 30 Intention to home-school after COVID-19, ITS Leeds Research

Respondents' stated likelihood of using a range of modes to travel to school after lockdown in the ITS Leeds survey (in July) suggested that all Local Authorities (LAs) are likely to see an increase in walking to school. Based on this data, the largest increase (20%) was likely in Edinburgh and the smallest increase in Aberdeen (11.1%) and Ayrshire (11.7%). Car use for the school run was likely to increase across all LAs most markedly in Ayrshire and Glasgow and least in Aberdeen. Likely reductions in public transport use fell in the 10-20% bracket. Edinburgh was the only LA where cycling to school is expected to increase by over 5% (7.7%).

However, based on the actual mode share data recorded by the TS Public Attitudes Survey after the start of the autumn term, the intention to walk more did not result in higher walk mode share, following the start of the autumn term. In fact, changes in mode use were relatively minor.

The TS Public Attitude Survey showed that 32% of respondents in Wave 7 (19/08-25/08) and 39% of respondents in Wave 9 (30/09-06/10) said that they had mainly walked and wheeled when dropping off their child at school or nursery in the past seven days. This figure was 6% lower than pre-lockdown levels reported by respondents, during both waves. There was also a minor reduction in bus use by 5% (Wave 7) and 3% (Wave 9), compared with pre-lockdown levels. However, this compares to a low baseline, with 5% of respondents in Wave 7 and 4% in Wave 9 stating bus was their main mode of travel to school before lockdown. Respondents' stated car use for the purpose was 3% higher compared with pre-lockdown levels in Wave 9 although no change was recorded in Wave 7.

4.5. Accessing Services

In addition to the above purposes the ITS Leeds survey also provided evidence that respondents used online methods to access a range of services online more than before lockdown, this included (at Scottish survey locations):

- Banking (24-29%);
- Healthcare (14%-20%);
- Adult education (7%-11%);
- Attending a place of worship (7-8%);
- Attending the post office (1-4%).

Over 30% of respondents across the UK indicated that they are likely to continue to access medical appointments more online once lockdown ends, less than 10% said they would do so less.

The increased uptake of using online facilities for a range of purposes could lead to a reduction in discretionary travel in the future.

4.6. Socialising, Leisure and Exercise

Figure 31 shows changes in the way social contact was made compared with the time before lockdown. This shows that the frequency of contacting friends and family by phone rose by 26% and 127% by phone and video call respectively, across all survey locations.

Between 33 and 44% of respondents in the Scottish survey locations expect to continue using online methods more to socialise with friends and family after lockdown. About a third of respondents across the UK indicated that they would go online more often to access entertainment such as films, plays and concerts, potentially reducing travel for these purposes.

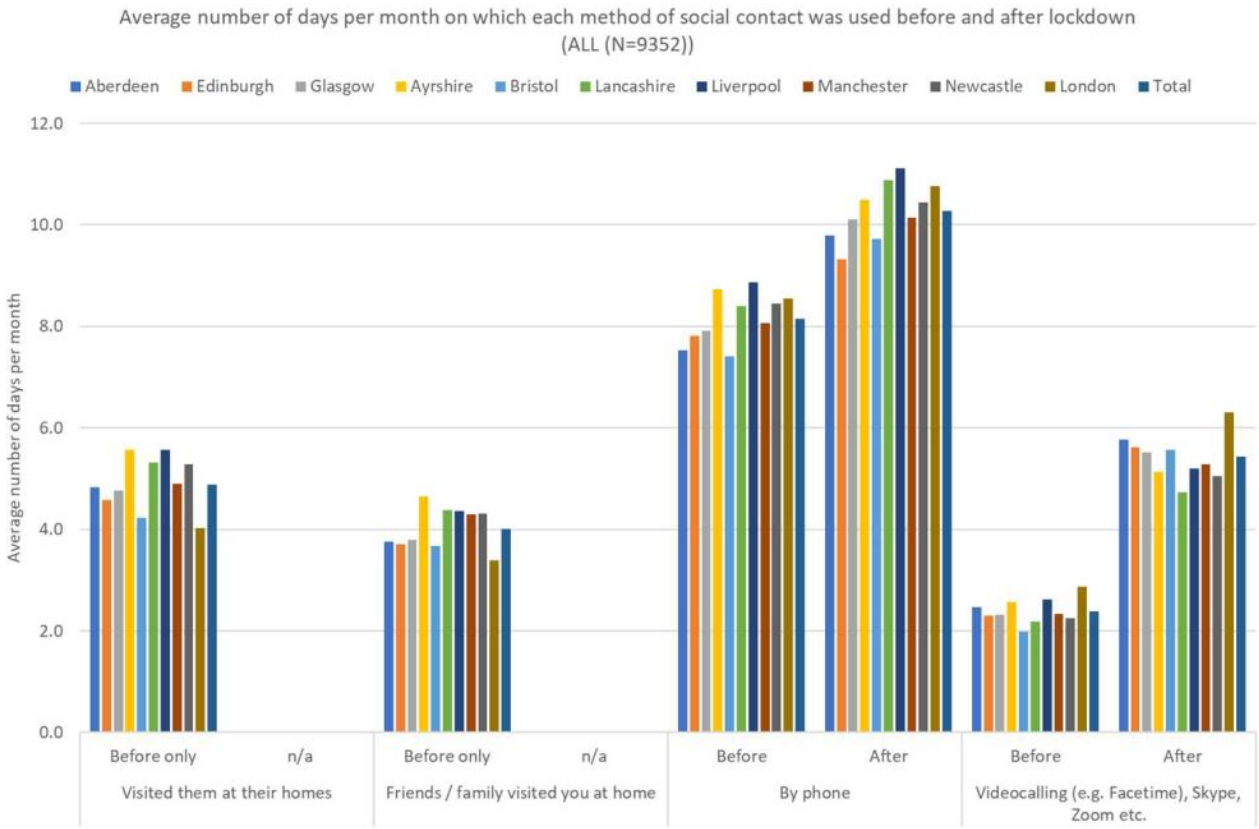


Figure 31 Changes in social contact during lockdown, ITS Leeds Research

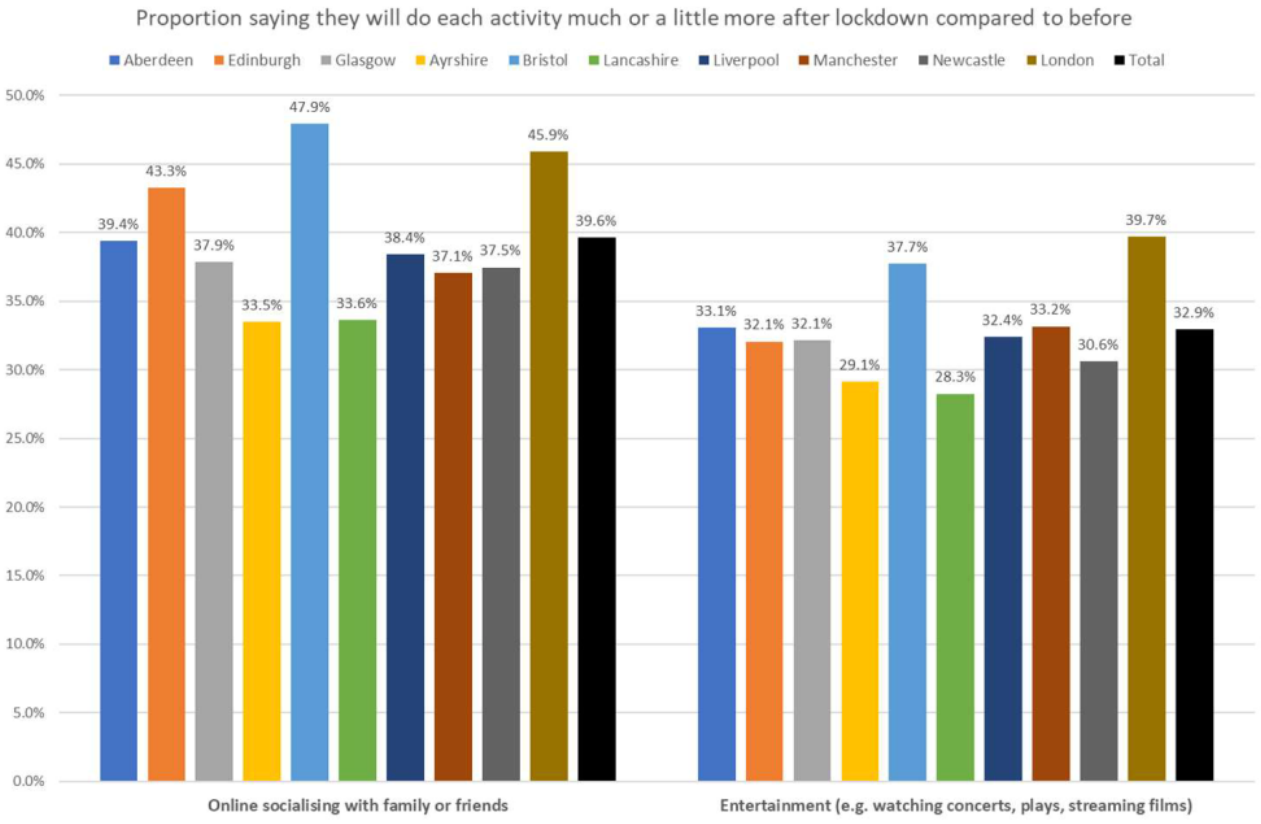
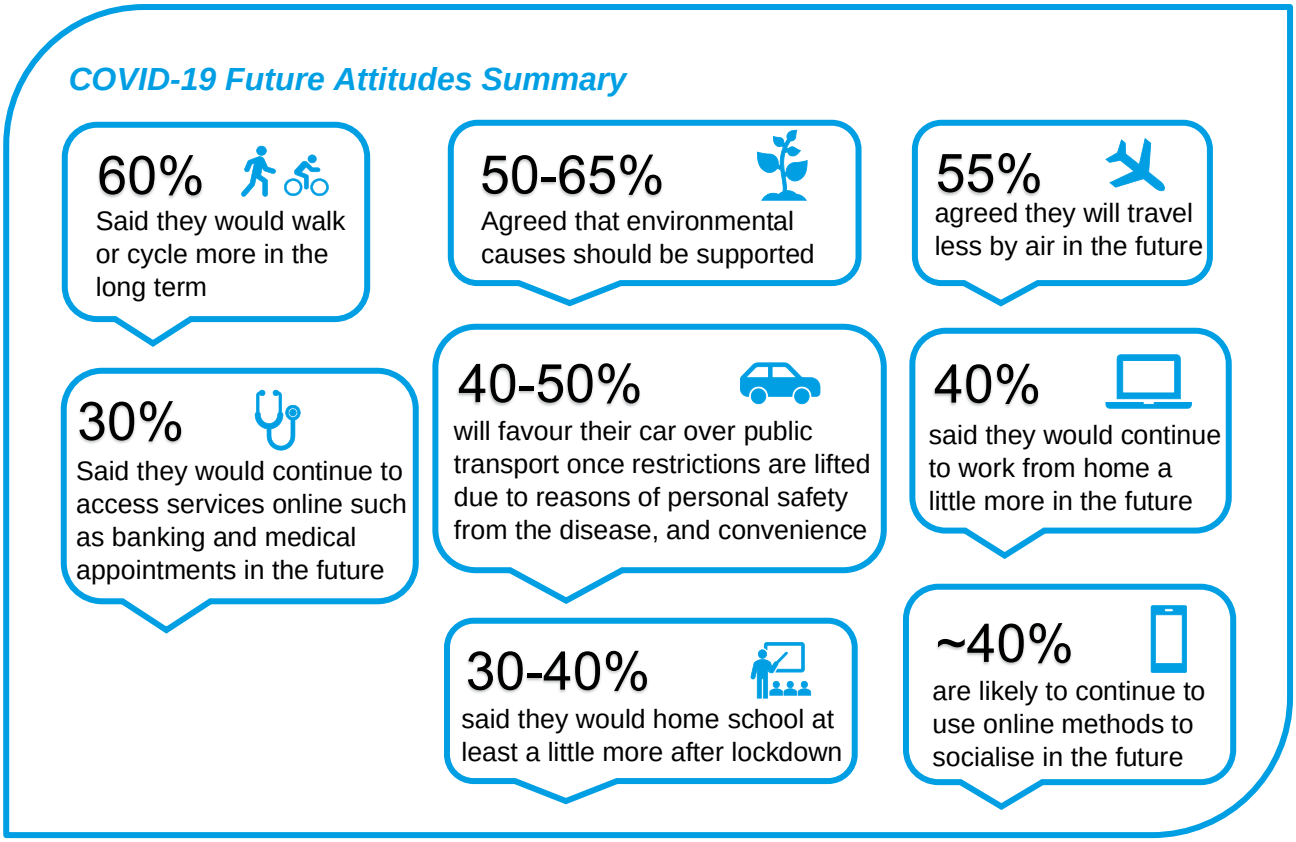


Figure 32 Respondents' Stated Intention Online Socialising After Lockdown, ITS Leeds Research

5. Future Attitudes

5.1. Future Attitudes Summary

The following graphic shows a summary of key statistics relating to the impact of COVID-19 on future attitudes likely to impact on transport. The summary statistics reported are taken from the main body text within Chapters 4 and 5 of this Addendum.



5.2. Future Transport Related Priorities

Figure 33 shows respondents' agreement regarding a number of transport related priorities for economic recovery, extracted from the ITS, Leeds research. This shows a high level of support for boosting environmental causes as part of the recovery, 50%-65% of respondents across the Scottish survey locations agreeing that this should be supported. Only between 10% and 15% disagreed. By contrast, only around 30% agreed that roads should be funded, an almost equal number (around 25% disagreed); and around 20% agreed that the aviation industry should be bailed out as part of the recovery package, whilst 40-45% disagreed. Support for road building tended to be stronger in rural areas, than in cities.

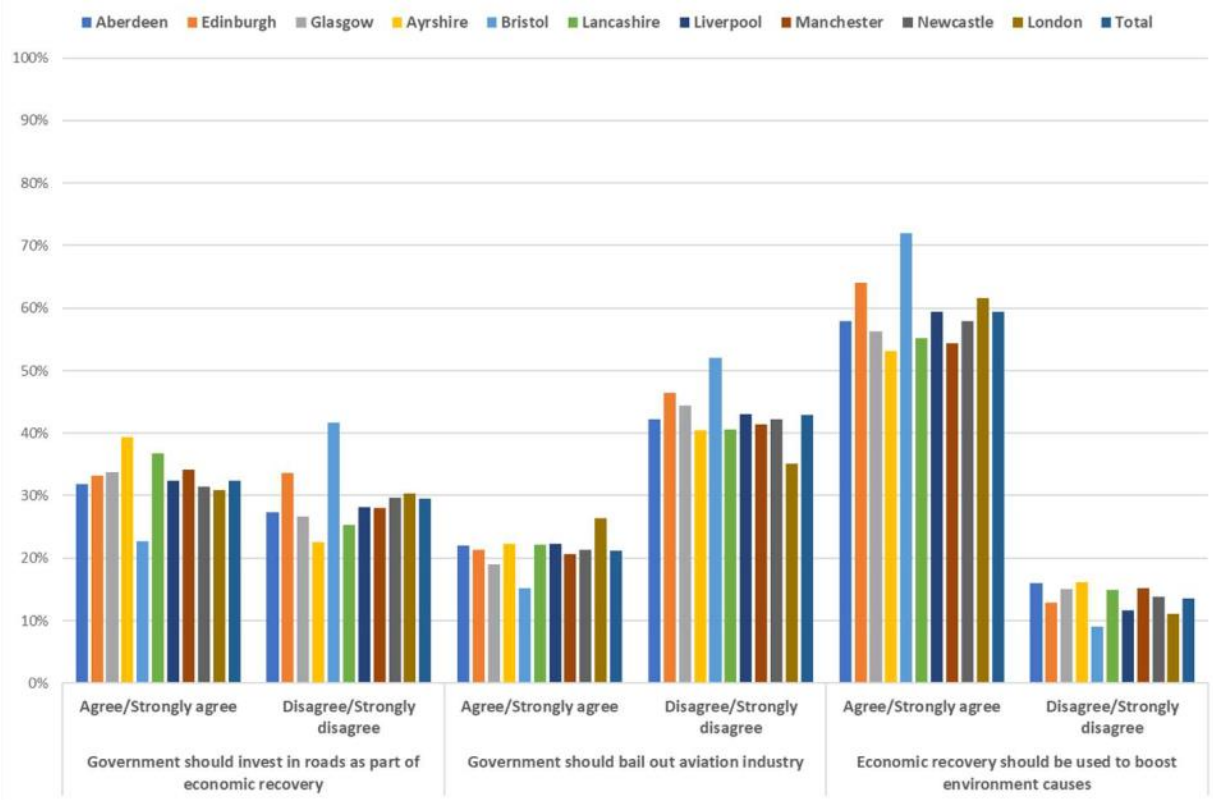


Figure 33 Attitudes to priorities for the economic recovery, ITS Leeds Research

6. Summary and Conclusions

The preceding chapters outlined some of the substantial changes that have affected the way people work, live and travel as a result of the COVID-19 pandemic. This section summarises these changes and opportunities and makes recommendations as to how they could be considered within the STPR2 appraisal approach.

6.1. Economy

The COVID-19 pandemic has resulted in a high level of uncertainty with respect to future economic forecasts which are directly linked to planning transport and future of demand for travel. The advent of lockdown in late March all but halted activity in many sectors, due to the closure of non-essential services, shops and entertainment as well as many industries, that are unable to work remotely.

The short-term impact is highlighted by a stark drop in GDP in Scotland, which despite a level recovery in the preceding months remained 10.7% below the February 2020 value in July 2020. Unemployment increased, with a reduction in the number of payroll employees by 74,000 in November 2020 compared with the same month the previous year.

The full scale of the longer term impact is as yet unknown. Government support for businesses over the months preceding September 2020 has kept many from closing, while jobs have been protected through the Government's furlough scheme. However, most businesses in Scotland reported turnover values below expectation in July 2020 compared to the previous year, highlighting uncertainties around the long-term impact of the pandemic in terms of business health and hence on the economy and labour-market. The volume of development that transport proposals are designed to support is likely to be affected and so may the distribution of developments as businesses consider alternatives such as a move to cheaper out of town sites.

Tourism has been significantly impacted by the pandemic and the long term impacts on UK tourism remain uncertain – although more people are choosing to holiday close to home within the UK, overall tourist numbers are significantly reduced.

Equality is likely to be adversely affected as the impacts are likely to dis-proportionately affect lower income households with reduced resilience to these uncertainties, and young people, and the impacts on different groups in society will need to be considered.

The pandemic has also led to an increase in public sector borrowing and reduction in tax receipts, which is likely to impact on the availability of funding for transport as well as increased public scrutiny of Government expenditure and this will need to be taken into account when assessing the deliverability of transport proposals.

STPR2 will need to consider the following factors regarding the economic situation going forward:

- Monitoring and responding to economic trends going forward;
- Monitoring and responding to equality impacts of the pandemic e.g. supporting economically disadvantaged society groups;
- Monitoring and responding to funding availability going forward;
- Supporting economic recovery, particularly in the hardest hit industries (e.g. tourism, food and drink etc.), and the creation of new jobs; and
- Supporting future economic resilience to similar pandemics.

6.2. Overall Demand for Travel

To stem infection rates the UK went into lock-down on 23 March. People were advised not to leave their homes other than for essential purposes only, including to buy food, access healthcare, essential work that cannot be done from home, or for exercise once a day. A large proportion of the workforce abruptly had to change the way they work, often working from home full time, with around 40% stating that they are likely to continue to do so more often after lockdown. Analysis of working from home by industry sector highlighted that the prevalence of working from home and the rate of return to workplaces has differed by sector. White collar sectors, including Professional, Scientific and Technical Activities and Information and Communication showed consistently high rates of home working, whilst home-working rates in other sectors such as Education and Wholesale and Retail Trade declined as restrictions eased.

Differential vulnerability to COVID-19 disruption between sectors and differences in their suitability to home-working between sectors is likely to create geographical differences in the recovery of workplace movements, and such variations are visible in data showing the recovery of workplace movements by region to-date.

In August, weekday commuter movements remained substantially below pre-COVID-19 levels. Many restrictions still applied, and long-term changes in terms of the prevalence of remote working are not yet known, however it is reasonable to assume that this will be more common in the long term, particularly as businesses seek to reduce costs in times of uncertainty. A reduction in work travel movement is likely to result, and this is likely to differ by mode due to differences in business locations and mode use between industry sectors. A reduction in commuter travel is also likely to impact on trip numbers and distribution for discretionary travel, including access to services and shopping as these trips move closer to home.

Lockdown has also substantially impacted on the way people shop. Government advice during lockdown limited movements to as few as possible. Online shopping increased substantially so did demand for grocery home deliveries and click and collect services. The decline in instore retailing may have longer term impacts, on development locations, travel to retail jobs and consumer trip volumes and distribution.

There are opportunities for the revival of local shops and services as based on evidence from the TS Public Attitude Surveys, which reported a substantial increase in their likelihood to shop closer to home during lockdown. Retention of local shopping habits

could be assisted by Transport Transition Plan policies to encourage local service access and create more attractive environments for example through the Spaces for People fund.

Increased uptake of using online facilities across a range of purposes, including socialising, entertainment, banking, healthcare, adult education and attending a place of worship could lead to a reduction in discretionary travel in the future.

In addition to changes in the future level of demand, travel post-COVID-19 may also see changes in the peak profile of demand. Catering for tidal peaks, formerly a key consideration in planning transport infrastructure and services may become less pressing as levels of commuting are reduced particularly to urban locations where the density of professional, white collar occupations is high. Weekly lows in indexed retail and recreation movements at weekends indicate that travel for these purposes has also spread more evenly through the week, although it is uncertain to what extent these trends will continue once the vaccine is rolled out and the impetus to avoid busy periods disappears.

STPR2 process need to consider the following factors regarding overall demand for travel going forward:

- Monitoring and responding to travel demand trends going forward e.g. longer term reduced travel demand, different times of travel, changes in travel patterns and mode etc; and
- Supporting local travel, access to local shops and services, and creating more attractive local centres.

6.3. Active Travel

Cycling was the only mode that recorded increases in trip volumes throughout lockdown, although absolute trip volumes remain low compared with other modes. Walking activity also remained relatively high, with the weekly index fluctuating between 50 and 70% of June 2019 levels during the months between April and August. The proportion of respondents' during the TS Public Attitudes Surveys who stated intention to walk or cycle more in the long-term was consistently above 60% (with the exception of July), indicating that there are opportunities for longer term behaviour change. Around 60% of walking/wheeling and cycling trips made were to exercise, with an average 20% to shop. Relatively few of the trips were made to travel to work (2-8%), which is likely to be significantly influenced by many employees not travelling to their usual place of work during the pandemic.

Lockdown also saw changes in shopping behaviour, with between 41% and 50% of respondents in the TS Public Attitudes Surveys indicating that they were more likely to shop closer to home compared with before the onset of restrictions. Transport Scotland's Transport Transition Plan travel demand messaging aims to encourage people to stay in their local area for services and walk, wheel and cycle for these journeys and provides funding for such initiatives under the Smarter Choices, Smarter Places programme in an attempt to embed these changes in the longer term.

The plan also includes policies to increase cycling, including assistance to get older bikes back on the road through funding free bike repair and maintenance through the Scotland Cycle Repair Scheme and working with delivery partners including Cycling UK, Cycling Scotland, Sustrans and the Energy Saving Trust to pivot their services to support the

transition back to normal, making it more likely cycling could play an increased part in the transport mix in the longer term.

Analysis of mode shift in travel to work undertaken as part of the ITS Leeds Research indicated that walking was the most popular mode for those switching to another mode during lockdown, capturing 14.4% of public transport users, 6.3% of car passengers, 4.9% of cyclists and 2.4% of former drivers. Based on analysis of respondents' travel to work, levels of walking to work are likely to increase for those returning to work in the future across all survey locations in Scotland. Cycling to work is also expected to increase although to a lesser extent and in the urban locations only. This offers opportunities to go some way towards mitigating the anticipated traffic impacts of the return to work if reluctance to use public transport persists, particularly in urban areas. Based on Ayrshire data the surveys indicate fewer opportunities to promote active travel to work in rural areas, where there is less evidence of mode shift as a result of COVID-19.

To what extent the opportunities can be exploited is likely to depend on the implementation of successful policies to promote such change in the long term both in terms of investing in active modes and restricting motor traffic. Respondents' stated attitudes preferences recorded by the University of Leeds surveys highlighted high levels of support for policies to boost environmental causes as part of the recovery whilst support for investment in roads and bailing out aviation was at best mixed, and this is a promising starting point for promoting sustainable modes of travel in accordance with NTS2.

STPR2will need to consider the following factors regarding active travel going forward:

- Capitalising on the propensity to walk and cycle through investing in these modes and maintaining momentum;
- Supporting active travel for work trips (particularly in urban locations), access to services (particularly locally), and for leisure.

6.4. Public Transport Patronage

Public transport patronage dipped sharply at the start of lockdown as Government advice recommended avoiding all but essential travel by public transport.

Rail patronage reduced to lower levels than bus patronage, and recovered more slowly, probably due to the prevalence of use of rail services for commuter travel. By the end of August rail patronage was still as low as 30% of 2019 levels, whilst bus patronage had recovered to around 50 to 60% of pre-COVID-19 levels. The dramatic drop and slower recovery of rail services have exposed the vulnerability of rail to fluctuations in commuter movements.

Public transport patronage has also recovered faster at weekends than on weekdays, suggesting leisure activity has recovered to a greater extent than commuter travel. There is therefore potential for long term changes in the user and peak demand profiles for public transport, which may differentially affect different modes.

A high proportion of respondents in the Transport Scotland Public Attitudes Surveys (40-50%) state that they will use car more and avoid public transport when restrictions are lifted. Evidence from the surveys suggests that concerns over the potential risk of infection and hygiene remain high. Availability of a vaccine and measures to improve hygiene and

safety may mitigate these concerns, but it remains unclear to what extent.

In the short-term Government continues to support bus services through providing operator funding to maintain and increase services, as well as funding for temporary bus priority infrastructure through the Bus Priority Rapid Development Fund.

However, there are long-term uncertainties around the continued need for social distancing and hence impacts on public transport capacity and commercial viability of public transport services bus services and this may result in loss of services, or lower service levels in the longer term, resulting in disproportionate impacts on lower income groups who are more likely to use bus and less likely to have access to a car.

STPR2 will need to consider the following factors regarding public transport going forward:

- Monitoring and responding to public transport demand trends and service levels going forward; and
- Supporting public confidence in public transport in the short term.

6.5. Road Travel

Private car use has not been subject to the same Government advice to avoid non-essential travel as restrictions eased and are less exposed to concerns over infection and hygiene. As a result, road traffic recovered faster than public transport. Based on traffic volumes recorded by a range of trunk road counters traffic volumes had largely returned to pre-pandemic levels by the end of August, despite the continued closure of parts of the economy.

A substantial proportion (22%) of respondents in the ITS Leeds Research who previously travelled to work by Public Transport switched to car during lockdown and 13-19% of respondents who are not working expect to drive more when returning to work. 40-50% of survey respondents during the TS Public Attitude Surveys stated that they will use car more and avoid public transport when restrictions are lifted, partly due to high levels of concern around disease control and cleanliness with respect to Public Transport services but also due to the perceived convenience of car (30% in November).

Based on trunk road traffic count data there was an increase in inter-peak (+16%) and weekend traffic (+26%), highlighting risks that peak hour congestion could spread to other time periods. However, these increases may be attributed to seasonality. All these indicators highlight that road traffic may increase in the future, with associated impacts on journey times reliability and safety.

However, the ITS Leeds research also showed a reduction in the intention to get a driving licence and in some locations reduced intention to purchase a new car. Whilst this is likely to be driven largely by uncertainty rather than preference and hence change in the longer term, it may provide a window of opportunity for policies to reduce car use.

STPR2 will need to consider the following factors regarding road travel going forward:

- Monitoring and responding to road travel demand trends going forward.

6.6. Aviation and Ferries

Lockdown saw international travel grind to a halt, with passenger arrivals in the UK during the month of June falling from over 14 million in 2019 to less than 1 million in 2020. The Scottish Area Control flight index also indicated that flight capacity fell sharply, to 10% of 2019 levels in April and May. In August, following the re-opening of tourism, flight numbers were still below 40% of 2019 levels. Stated intention recorded during the TS Public Attitudes Surveys indicated a level of commitment to flying less in the future, with 55% of respondents agreeing that they would fly less in the future compared with 25% who disagreed. The dip in passenger numbers as well as reduced flight capacity due to need for social distancing, together with prevalence of stated intention to fly less in the future present an acute risk for viability of the industry.

Ferry passenger numbers also dipped sharply at the start of lockdown, although the re-opening of tourism saw their revival to around 50-60% of 2019 levels by mid-August. However, as with other public transport modes there is a risk that reduced passenger number in the longer term impacts on the viability of services for freight and passenger transport.

STPR2 will need to consider the following factors regarding aviation and ferries going forward:

- Monitoring and responding to travel demand trends and service levels going forward.

6.7. SWOT Analysis

An analysis of the main Strengths, Weaknesses, Opportunities and Threats posed by the COVID-19 pandemic on the ability of Transport in Scotland to achieve the outcomes of the National Transport Strategy is included overleaf. In understanding these we can shape the STPR2 appraisal to address or take advantage of them.

Strengths

- Increase in propensity to walk and cycle.
- Some signs of travelling less e.g. more working from home, online shopping, shopping locally, homeschooling, accessing services online, socialising online.
- Some signs of travelling at different times i.e. peak hours are less pronounced, more 'off-peak' travel.
- Tourist industry seeing an increase in 'Staycations', particularly in Highlands and Islands.
- Strong support for environmental causes.

Weaknesses

- Weakened economy.
- Car traffic levels back to pre-lockdown levels, with increased traffic at weekends.
- Public transport use remains low, with people favouring the car due to personal safety from the disease and convenience.
- Air travel remains low, continuing to impact on business and tourism.
- COVID-19 impacts are likely to dis-proportionately affect lower income households and young people.

Opportunities

- Capitalise on propensity to walk and cycle through investing in these modes and maintaining momentum.
- Support local communities and shops to enable people to continue to shop and access services locally.
- Support work/education/shopping/accessing services from home through better online access.
- Maximise Scotland's tourist offer as fewer people travel abroad.
- Take advantage of strong environmental support through implementing more environmentally friendly measures.

Threats

- Recovery of economy and unemployment uncertain.
- Risk of another disease outbreak on vulnerable industries.
- Funding availability uncertain as cost of the crisis continues to increase.
- The potential for return to pre-COVID-19 travel trends and habits.
- Possible increase in car travel over pre-COVID-19 levels.
- Inability to reinstate public confidence in safety of public transport.
- Potential impact of uncertainties around future ferry patronage on viability of services and hence freight capacity to Islands.

6.8. Summary

In summary, the COVID-19 pandemic has resulted in an unprecedented level of uncertainty regarding transport demand and behaviour in the medium to long term.

Forecasting future economic performance with any reliability is impossible at the moment. Lockdown has radically changed the way we go about our daily activities, changing demand for travel, trip distribution patterns, peak profiles and our choices with respect to our mode of travel. To what extent these changes carry on into the future depends on a range of factors including the time taken to roll out a vaccine and policies employed by Government to take advantage of the opportunities and mitigate the adverse impacts and uncertainties resulting from the epidemic. To this end, the STPR2 should take cognisance of the potential impacts of COVID-19 on travel and the economy, and capitalise on the opportunities identified, particularly in the shorter term.

Accounting for risk and uncertainty is an integral part of good practice in transport appraisal, as outlined in STAG. However, sensitivity testing (i.e. pushing trends to extremes) may not be sufficient for the current unprecedented levels of change, reinforcing the need for adopting scenario planning techniques within the STPR2 appraisal, to represent a range of possible futures to form the backdrop for the policies and proposals examined.