

Greater Cambridge Partnership Joint Assembly

2 00 pm
Wednesday 24th February 2021
Virtual Meeting

During the Covid-19 pandemic GCP Joint Assembly and Executive Board meetings will be held virtually. These meetings will take place via Zoom and Microsoft Teams (for confidential or exempt items). Meetings will be live streamed and can be accessed from the GCP YouTube Channel - [Link](#).

Agenda

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- 2:00 pm Thursday 3rd June 2021

Membership

The Joint Assembly comprises the following members:

Councillor Dave Baigent (Vice Chairperson)	-	Cambridge City Council
Councillor Tim Bick (Chairperson)	-	Cambridge City Council
Councillor Mike Sargeant	-	Cambridge City Council
Councillor Noel Kavanagh	-	Cambridgeshire County Council
Councillor Lucy Nethsingha	-	Cambridgeshire County Council
Councillor Tim Wotherspoon	-	Cambridgeshire County Council
Councillor Ian Sollom	-	South Cambridgeshire District Council
Councillor Heather Williams	-	South Cambridgeshire District Council
Councillor Eileen Wilson	-	South Cambridgeshire District Council
Heather Richards	-	Business Representative
Christopher Walkinshaw	-	Business Representative
Dr Andy Williams	-	Business Representative
Karen Kennedy	-	University Representative
Lucy Scott	-	University Representative
Helen Valentine	-	University Representative

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For more information about this meeting, please contact Nicholas Mills (Cambridgeshire County Council Democratic Services) via e-mail at Nicholas.Mills@cambridgeshire.gov.uk

Greater Cambridge Partnership Joint Assembly

Minutes of the Greater Cambridge Partnership (GCP) Joint Assembly
Thursday 19th November 2020
2:00 p.m. – 5:10 p.m.

Present:

Members of the GCP Joint Assembly:

Councillor Tim Bick (Chairperson)	Cambridge City Council
Councillor Dave Baigent	Cambridge City Council
Councillor Mike Sargeant	Cambridge City Council
Councillor Noel Kavanagh	Cambridgeshire County Council
Councillor Lucy Nethsingha	Cambridgeshire County Council
Councillor Tim Wotherspoon	Cambridgeshire County Council
Councillor Ian Sollom	South Cambridgeshire District Council
Councillor Heather Williams	South Cambridgeshire District Council
Councillor Eileen Wilson	South Cambridgeshire District Council
Christopher Walkinshaw	Business Representative
Karen Kennedy	University Representative
Lucy Scott	University Representative

Officers:

Peter Blake	Transport Director (GCP)
Sarah Heywood	Strategic Finance Business Partner (CCC)
Ryan Howsham	Strategy and Programme Manager (GCP)
Simon Manville	Project Manager (GCP)
Niamh Matthews	Head of Strategy and Programme (GCP)
Nick Mills	Democratic Services Officer (CCC)
Gemma Schroeder	Project Manager Smart Cambridge (GCP)
Rachel Stopard	Chief Executive (GCP)
Isobel Wade	Head of Transport and Strategy (GCP)
Wilma Wilkie	Governance and Relationship Manager (GCP)

1. Apologies for Absence

The Chairperson welcomed Karen Kennedy, Director of the University of Cambridge's Strategic Partnership Office, and Lucy Scott, CEO of Eastern Learning Alliance, as new members of the Joint Assembly nominated by the University of Cambridge.

The Chairperson also welcomed Councillor Dave Baigent, who had replaced Councillor Mike Davey as a Cambridge City Council representative on the Assembly. The Chairperson expressed thanks to Councillor Davey for his support as the Vice-Chairperson.

Apologies were received from Heather Richards, Helen Valentine and Dr Andy Williams.

2. Appointment of Vice-Chairperson

It was proposed by Councillor Mike Sargeant, seconded by Councillor Noel Kavanagh and resolved that Councillor Dave Baigent be elected Vice-Chairperson of the GCP Joint Assembly for the remainder of the municipal year 2020/21.

3. Declarations of Interest

Councillor Dave Baigent declared a general non-statutory disclosable interest in relation to a number of items on the agenda as he was a member of Camcycle.

Chris Walkinshaw declared a general non-statutory disclosable interest as a Director of Cambridge Ahead.

4. Minutes

The minutes of the previous Joint Assembly meeting, held on 10th September 2020, were agreed as a correct record and the Chairperson agreed to sign a copy when possible.

5. Public Questions

The Chairperson informed the Executive Board that eight public questions had been accepted and that the questions would be taken at the start of the relevant agenda item, with details of the questions and a summary of the responses provided in Appendix A of the minutes.

It was noted that three questions related to agenda item 7 (Quarterly Progress Report), two questions related to agenda item 8 (GCP Future Investment Strategy), one question related to agenda item 9 (Public Transport Improvements and City

Access Strategy), and two questions related to agenda item 11 (Greenways: Haslingfield).

6. Petitions

The Chairperson notified the Joint Assembly that no petitions had been submitted.

7. Quarterly Progress Report

Three public questions were received from Anna Williams (on behalf of Camcycle). The questions and a summary of the responses are provided at Appendix A of the minutes.

The Head of Strategy and Programme presented a report to the Joint Assembly which provided an update on progress across the GCP's whole programme. It was highlighted that work was progressing as anticipated and the impacts of Covid-19 continued to be monitored across the GCP's programme. Only two projects had been identified with a red RAG status: the 'Cambourne to Cambridge / A428 Corridor' and 'Residents Parking Implementation'.

While discussing the Skills section of the report, the Joint Assembly:

- Observed that figures in the report covered the period up to September 2020 and queried when more up-to-date figures would be available, noting that the uptake of apprenticeships had dropped significantly in other areas of the country. The Head of Strategy and Programme acknowledged there was likely to be a drop in numbers, although noted that actions supported by the Joint Assembly and Executive Board at their previous meetings had been designed to address this issue. She informed members that updated figures would be circulated when they became available.
- Welcomed that the number of students connected with employers had exceeded the target, paying tribute to the work carried out by officers.

While discussing the Smart Places section of the report, the Joint Assembly:

- Requested an update on the progress of the Smart Signals project, particularly regarding the County Council's position on an expansion of the programme. It was confirmed that while discussions with the County Council were ongoing, an expansion beyond the four trial junctions would be considered in the future.
- Established that a new map on the Wayfinding totem outside Cambridge railway station indicated a suggested route to the city centre that passed along Mill Road.
- Argued that the ability to respect social-distancing measures needed to be taken into account when considering Digital Wayfinding proposals.

- Suggested that invitations sent by Addenbrookes Hospital and Royal Papworth Hospital could promote alternative modes of transport to patients visiting the Cambridge Biomedical Campus (CBC). The Chief Executive confirmed that the CBC was addressing the issue on its website, while implementation and improvement to Wayfinding around the campus was also currently being investigated. She also informed the Assembly that the CBC was looking to identify representatives from the local community to engage and put forward suggestions. Acknowledging these improvements, one member further argued that attention should also be given to the information provided on letters and leaflets that encouraged campus visitors to travel by car. Another member observed that current public transport provision made it difficult for some visitors outside the city to attend appointments in a reliable manner, although it was acknowledged that the Cambridge South East Transport project would improve the situation.
- One member suggested the GCP should respond to the current County Council consultation on the Mill Road bridge, supporting closure as this promoted cycling and walking as alternative modes of transport. In response, other members commented that this was not part of the GCP's remit and it was more appropriate for individuals and the partner bodies to respond.
- Confirmed that although data on the Mill Road bridge closure had not been included in the consultation documents, it was available to the public.
- Confirmed that the vehicles to be used in the Autonomous Vehicle Project would be electric.

While discussing the Transport section of the report, the Joint Assembly:

- Suggested that current signage on the A14 regarding the closure of the inbound lane on Histon Road failed to direct road users to exit at junction 33, instead of junction 32, which resulted in major congestion in northern areas of the city. The Transport Director acknowledged the concern and undertook to investigate.
- Commented on works being carried out on Histon Road and hoped that this would be completed before the start of the next academic year, to minimise the impact on students who had already suffered as a result of Covid. It was confirmed that the project was on track for completion in summer 2021, and that the GCP had an agreement with Stagecoach to provide more support if difficulties arose during the course of the scheme's delivery.
- Asked for an update on the planned review of resident parking schemes in Cambridge, noting that many residents were impatient to hear what was happening, particularly those that were very much in favour of schemes in their area. The Transport Director emphasised that the suspension enforced by the County Council was temporary and that a review would be carried out in early 2021, with the expected involvement of the GCP, allowing for a further update to be potentially provided at the Joint Assembly meeting in February 2021.
- Clarified that no progress had been made regarding the proposed Oakington Rural Travel Hub. While confirming that it had not been decided to abandon the scheme,

the Transport Director informed the Assembly that there were no immediate plans to progress the scheme.

- Observed that section 13.7 of the report indicated a decision on the planning application for the West of Cambridge Package scheme was expected by the end of 2020, although there was only one further County Council planning committee meeting before the end of the year. It was confirmed that the matter had been deferred and would be considered at the committee's meeting on 28th January 2021.
- Acknowledged that the Heathrow third runway decision would have implications on all major schemes across the country and would need to be considered alongside the impacts of Covid-19.
- Agreed to ask the GCP Executive Board to determine the next steps for the Cambourne to Cambridge project without further delay, emphasising the need for clarity on public policy such a large and important scheme. While recognising a difference of views among members, the Assembly acknowledged that an established consensus amongst the majority had been expressed at previous meetings.
- One member highlighted the need for progress with the scheme in order to maintain alignment with the East West Rail project, while another member suggested that the scheme should be considered from a broader perspective.
- Sought further detailed information on the technical comparison of alternative routes for the C2C project that had been carried out by consultants engaged by the Cambridgeshire and Peterborough Combined Authority (CPCA), which had not been published. The Transport Director observed that at the recent meeting a member of the CPCA Transport and Infrastructure Committee had requested that the report be made public and that the CPCA had agreed to do this. It was noted that at that meeting CPCA officers confirmed some of the details of the general appraisal and reported that the appraisal had been based on a number of factors and on none of the criteria had the CPCA's indicative proposal performed better than the GCP's proposals. On a number of the criteria the CPCA's proposals had scored worse.
- Clarified that the process established by the Department for Transport required the GCP to analyse, consult on and revise a single route alignment. Although it was possible to introduce alternative routes later in the process, the Transport Director noted that this would provoke challenges from transport officials and inspectors. It was suggested that the Joint Assembly should be provided with the opportunity to consider any alternative route proposed by the CPCA. One member observed that alternative routes had already been considered and discarded in favour of a preferred route, suggesting that consideration of further routes would lead to further significant delays to the project's delivery, while also creating unreasonable expectations for affected communities and stakeholders.
- Confirmed that if the Executive Board decided to progress the C2C scheme, the next stage would be to carry out a detailed Environmental Impact Assessment and

consultation. That stage would involve the GCP developing design proposals and mitigation proposals to overcome any challenges that had been raised. The Transport Director confirmed that the final approval of the project would not be sought until after these statutory processes had been completed.

8. GCP Future Investment Strategy

Two public questions were received from Lynda Warth (on behalf of Cambridgeshire British Horse Society) and Roxanne De Beaux (on behalf of Camcycle). The questions and a summary of the responses are provided at Appendix A of the minutes.

Councillor Susan van de Ven, County Councillor for Melbourn and Bassingbourn division, was invited to address the Joint Assembly. While welcoming the synergy of the various Greenways schemes across the network, she raised concerns about current levels of multi-use path maintenance and sought clarification on how the GCP would ensure that the Greenway schemes, once built, were properly looked after. The Transport Director noted that the GCP was working with the County Council to ensure the necessary resources for maintenance were available and undertook to provide an update when a plan had been finalised.

The Head of Transport Strategy presented the report, which included an updated version of the Future Investment Strategy (FIS) following the first gateway review, which also took into consideration the impacts of Covid-19. Originally developed and agreed by the Executive Board in March 2019, the FIS outlined how the GCP would invest in order to maximise the benefits for residents and businesses in Greater Cambridge through delivery of the City Deal. Despite a significant drop in movement and economic activity during the pandemic, it was proposed to continue with significant investment in sustainable transport infrastructure to support growth and environmental objectives, such as the partner councils' net-zero carbon commitments.

Attention was drawn to a survey of local businesses that the GCP had carried out with Cambridge Ahead, as detailed in section 2.18 of the report, which suggested that although changes were expected in issues related to future working practices, it was not possible to say at this stage when they would occur, how widespread they would be or even what form the changes were likely to take. Despite such uncertainties, it was argued that investment in public transport would nevertheless continue to be of high importance and the report proposed a reallocation of £50m to support this objective. It was highlighted that if the spending contained in the report, as well as that of accompanying reports on the agenda, was approved by the Executive Board, planned over programming would reach £121m. While it was argued that such a figure was appropriate given current uncertainties, additional funding or scheme prioritisation would become necessary in the future.

While discussing the report, the Joint Assembly:

- Clarified that alongside £500m Government Investment Fund grant funding, an estimated £103m matched funding had also been obtained to date. The Chief Executive acknowledged that opportunities for additional matched funding would

need to be identified in the future, for example through Section 106 contributions, borrowing, recoverable investment or income generation.

- Highlighted the importance of ensuring that the cycling network was wholly connected, without gaps in infrastructure provision between different schemes, although it was noted that part of the funding detailed in the FIS was intended to achieve exactly that objective.
- Suggested that greater focus could be given on identifying why people were deterred from cycling and identifying ways in which to encourage them. Members were informed that the GCP worked closely with the County Council on this, with engagement carried out to identify why people chose different modes of transport and how they could be influenced to change to more sustainable modes. It was also observed that support was given to cycling initiatives, such as Love to Ride.
- Considered whether it was preferable to either have a small number of electric buses across Greater Cambridge or to ensure all buses in the network complied with Euro 6 standards, especially given the lack of the charging infrastructure necessary for a large-scale electric bus network. The Head of Strategy acknowledged the dilemma, observing that Euro 6 buses continued to pollute, while electric buses were expensive. She argued that it was important to analyse how they performed in the Greater Cambridge environment and whether it would be necessary to progressively advance through different technologies with the final objective of zero emission vehicles.
- Argued that greater focus should be placed on expanding the capacity of transport interchanges to cope with continuously increasing numbers of commuters travelling into Cambridge. The Head of Transport Strategy informed the Assembly that around 11,000 additional parking spaces had been proposed as part of the scheme, although she acknowledged the need to improve onward connections. The long-term impact of Covid-19 on patterns of travel into Cambridge was still uncertain and being analysed.
- Observed that people with disabilities would not necessarily be able to benefit from improvements made to cycle infrastructure and public transport, and it was argued that greater attention should be given by the GCP to the needs of people with disabilities. The Assembly was assured that the requirements of people with disabilities were considered in the development of each individual project, as well as across the GCP's programme as a whole.
- Supported further investment in cycling schemes and zero emission buses, although members expressed concern about plans to fund this by reducing planned expenditure on improving public transport services by two thirds of its £75m budget. While it was recognised that there was an opportunity to secure some short term gains during the pandemic situation, it was argued that this should not detract from the ability to make equally fundamental changes to public transport. In supporting the report's proposals, the Joint Assembly asked the Executive Board to identify how the £50m reduction would be made up if and when the funding became necessary for longer term improvements.

- Suggested that the GCP should encourage and support the relevant bodies to work on overcoming potential water supply constraints as part of its own work on utilities' capacity issues.

9. Public Transport Improvements and City Access Strategy

One public question was received from Roxanne De Beaux (on behalf of Camcycle). The question and a summary of the response are provided at Appendix A of the minutes.

The Head of Transport Strategy presented the report, which provided an update on the city access project and the delivery of short term measures, while setting out work on potential packages of longer-term intervention. Despite the severe impact of the pandemic on public transport, it remained crucial to tackle issues of congestion and air quality in order to achieve net zero carbon commitments. Attention was drawn to figure 1 in section 2.17 of the report, which summarised the development of five packages of measures, including the short term, medium term and long term, taking into account the recommendations of the Citizens' Assembly and building on the three key themes of creating space for people, being environmental and zero carbon, and delivering high quality, affordable public transport.

While discussing the report, the Joint Assembly:

- Argued that the City Centre Freight Pilot failed to take into consideration the significant level of home deliveries that were causing an increasing number of issues in residential streets. The Head of Transport Strategy noted that the pilot was initially aimed at the city centre to establish how the businesses were serviced and how they serviced their customers, although she acknowledged concerns about residential deliveries and suggested that the pilot could be expanded in the future.
- Emphasised that the short term measures should all be implemented by the time the impacts of the pandemic began to become less severe, as their objective was to alleviate issues during the pandemic. It was confirmed that all the measures in the report would be either completed or substantially under way by the end of 2021, in accordance with the program that was agreed in February 2020, although one Member argued that the end of 2021 would be too late.
- Observed the growing appetite around the country for short term measures such as road closure schemes, and suggested that consideration should be given to developing further schemes in Cambridge and other towns in the Greater Cambridge area. It was also emphasised that measures should be monitored once implemented, in order to assess whether they should become permanent installations. The Assembly was assured that the GCP continued to work closely with the County Council on the programme of current and future road space reallocation. All the measures had been implemented by the GCP through Experimental Traffic Regulation Orders, and following the monitoring and consultation processes, a report would be presented to the Joint Assembly and

Executive Board to seek recommendations for the County Council on which schemes should be considered for becoming permanent.

- Observed that various Clean Air Zones had been postponed in other parts of the country and requested further information on their proposed inclusion in the long term strategy.
- Questioned whether a phased approach to implementing measures aligned with the Citizens' Assembly call for bold action and expressed concern that the city access programme was still in the design stage. Although passenger numbers currently remained low on public transport, it was argued that the situation could develop quickly, with a sudden return of users once the pandemic became less severe, and a phased approach could leave public transport services unprepared. It was also suggested that phasing would take time and remove the opportunity to shape and tailor projects, inevitably leading to a reactive approach. The Head of Transport Strategy noted that there were limits on how much could currently be done, due to evolving government guidance and the ongoing situation for transport operators and providers. Short term measures had been developed and then postponed as a result of the pandemic, including fare pilots and service increases, and these could be implemented at short notice when it became possible to do so. It was noted that while there were limits on what could be done in relation to bus services, the GCP was able to work on cycling initiatives while reducing the number of cars on the roads and levels of pollution.
- Clarified that the next review point mentioned at the end of recommendation (b) for the Executive Board would be in June 2021, and not June 2020 as indicated in the report. It was argued that this should be brought forward to allow more time for the development and implementation of schemes.
- Suggested that people would not wish to return to previous levels of road usage now that they had experienced drastic changes in road space during the pandemic, and argued that the GCP should be demonstrating how the future could look, with less traffic and better public transport.
- Welcomed the extensive evidence included in the report but argued that more attention should be given to large scale measures and projects rather than short term schemes. The Transport Director noted that the pandemic had created exceptional circumstances but acknowledged the Assembly's concerns and undertook to reflect on what further action could be taken.

10. Greater Cambridge Citizens' Assembly: One-Year On Report

The Head of Transport Strategy presented the report, which included an update on progress that had been made over the past year by the GCP in response to the Greater Cambridge Citizens' Assembly held in September and October 2019. A follow up workshop had been held in September 2020 in order to provide participants with an opportunity to review the original recommendations in light of the impacts of the

pandemic. It was proposed that a further update report could be presented one year down the line.

Noting that previous items on the agenda had involved discussion on the Citizens' Assembly, the Joint Assembly expressed its support for the report.

11. Greenways: Haslingfield

Two public questions were received from Lynda Warth (on behalf of Cambridgeshire British Horse Society). The questions and a summary of the responses are provided at Appendix A of the minutes.

The Transport Director presented the report, which included an update on progress with developing the Greenways, outcomes from recent public consultations, and an outline of scheme details and budget proposal for the Haslingfield Greenway. It was noted that the scheme was the final Greenway to be presented at this stage of development, with all schemes returning to the Joint Assembly and Executive Board for final approval in 2021.

While discussing the report, the Joint Assembly:

- Welcomed the adaptations made to the route by officers following public consultations that had presented multiple different points of view.
- Expressed concern about the onward journey along Barton Road at the northern end of the route.
- Observed the narrowness of the footbridge over the M11 that would be used on the route and questioned whether modifications would be made to the bridge. The Project Manager confirmed that the bridge would not be modified, although officers were looking to improve the approaches or raise the parapets. He noted that as a minimum there would be mounting blocks on either side so that a horse could be led across.
- Suggested that sections of the route passing through Grantchester were narrow and would present constraints to cyclists. The Project Manager acknowledged that the width was not ideal and suggested that it would be necessary for users to give way to each other, although he noted that conversations were ongoing with neighbouring landowners.
- Expressed concern about the Grantchester Road crossing being on a 40mph stretch of road without a signalled crossing. The Assembly was informed that the design would be measured to calm or slow the traffic, while shortening the distance to cross. The detailed stage would involve a workshop for local people to discuss the best options.
- Welcomed the benefits to horse-riders offered by the scheme.

12. Date of Future Meetings

The Joint Assembly noted that the next meeting was due be held at 2:00 p.m. on Wednesday 24th February 2021.

Chairperson
24th February 2021

Appendix A – 19th November 2020 Greater Cambridge Partnership Joint Assembly
Public Questions and Responses – Listed by Agenda Item

	Questioner	Question	Answer
1	Camcycle	<p>Agenda Item 7 – Quarterly Progress Report</p> <p>Firstly, regarding item 10.8, Camcycle would like to ask officers which four junctions in Cambridge have been selected for the Smart Signals trial? There are many areas of the city where those walking and cycling must undergo long waits or the need to press 'beg buttons' despite pedestrian and cycle flows being higher than motor traffic flows, or where non-motorised users have to navigate complicated two-stage crossings.</p> <p>We'd like to know the criteria on which junctions have been selected for this trial. We would recommend that improving safety for those walking, cycling or wheeling must be the first concern, followed by a need to prioritise sustainable transport by improving the directness and convenience of key walking and cycling routes.</p>	<p>The following junctions have been selected for the Smart Signals trial:</p> <ul style="list-style-type: none"> • Robin Hood junction (Cherry Hinton. Road/Queen Edith's way). • Hills Road/Brooklands Avenue junction. • Hills Road/Cherry Hinton Road junction. • Cherry Hinton Road/Clifton Road junction. <p>The Robin Hood junction is being upgraded early next year with a revised layout and new signal equipment which will lend itself to the installation of new sensor equipment as part of the trial. The junction is well used by local bus services, pedestrians and cyclists, where delays are experienced by all modes during peak periods.</p> <p>The latter three junctions have been selected because of their close proximity, which will allow the pilot to test and assess the co-ordination of Smart Signal technology across a small network of signal controlled junctions. These junctions are located on key public transport routes and are heavily used by cyclists and pedestrians and are where significant delays are experienced by users of all modes throughout the day.</p> <p>Along with assessing the benefits for sustainable transport modes and reviewing the impacts on delays</p>

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			for all modes, the trial will also consider safety implications for all users.
2	Camcycle	<p>Agenda Item 7 – Quarterly Progress Report</p> <p>Our second question is regarding the timescales for delivery of new sections of the cycle network. In previous meetings we have stressed the need for accelerated delivery of the Greenways, and looking at table 11.1 we are concerned that the Eastern Access project is listed as due for completion in 2027. We hope that the aspects noted in the consultation as 'short term actions that could be delivered by 2025' such as new segregated cycle lanes on Newmarket Road could be rolled out much sooner than that and, in fact, follow on from experimental measures to reallocate roadspace planned for phase two of the county council's Covid-19 walking and cycling schemes. This is particularly important as there has been a fatality at the Barnwell roundabout already this year.</p>	<p>As noted by the questioner, the consultation for Cambridge Eastern Access is currently ongoing. If there is support for the programme then Phase 1 would be delivered during 2023/2024.</p> <p>The proposed programme for the delivery of the Greenways schemes is a realistic forecast which is heavily on how land negotiations progress. The team has previously committed to expedite scheme delivery when possible.</p>
3	Camcycle	<p>Agenda Item 7 – Quarterly Progress Report</p> <p>We'd also like to ask about delays to the Chisholm Trail. Why has the opening of the jetty been moved to spring 2021 and is phase two still on schedule to complete in 2022 as listed? What are the designs for the route at the station end of phase two?</p>	<p>The opening of the jetty has been delayed to early 2021 due to the ground conditions being worse than pre-commencement investigations indicated. The poor ground conditions require increased temporary works to facilitate the installation of a culvert.</p> <p>A review of the delivery and programme for phase 2 is due to be carried out. A new programme will be published on its completion, which will aim to deliver</p>

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			the trail aligned with other proposed developments in the area.
4	Lynda Warth on behalf of the British Horse Society	<p>Agenda Item 8 – Greater Cambridge Partnership Future Investment Strategy</p> <p><i>Active Travel</i></p> <p>Active Travel is defined in the Cambridgeshire and Peterborough Local Transport Plan as ‘walking, cycling and horse riding’. I very much appreciate the GCP’s use of this term in these meeting documents. However, the GCP definition of Active Travel on pg 175 is :</p> <p>‘any means of travelling that requires physical activity, such as cycling or walking’.</p> <p>Since the GCP’s projects need to comply with the LTP, the definition should be the same.</p> <p>The discrepancy between these two definitions is important because every reference to Active Travel improvements across Greater Cambridge calls for improvement of the ‘cycle network’. This Assembly has been informed on several occasions of the negative and dangerous impact on horse riders created by improvement to the cycle network which excludes provision for equestrians.</p> <p>The GCP sustainable transport programme acknowledges the need for equestrian provision:</p>	<p>The GCP uses the definition of active travel as set out in the Cambridgeshire and Peterborough Local Transport Plan.</p>

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		<p>‘The GCP is creating safe and easy routes for more active travel journeys to accommodate Greater Cambridge’s growing number of cyclists, along with those walking and horse-riding.’</p> <p>Yet ...</p> <p>3. Options and Emerging Recommendations pg 71</p> <p>3.6. Firstly, recognising the opportunity to encourage active travel and build on the emergency measures and existing GCP spend commitments, it is proposed that an allocation is made to enable targeted investment in gaps in the cycling network. Planned investments through the GCP programme, as well as by partners, will significantly improve the cycling network across Greater Cambridge.</p> <p>It is essential that any investment to resolve gaps or make improvements are to the Active Travel Network in Greater Cambridge to benefit and safety of all active travellers – this includes road space reallocation projects.</p> <p>Please will Board Members approve this hugely significant change?</p>	
5	Camcycle	Agenda Item 8 – GCP Future Investment Strategy	

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		<p>Camcycle is pleased to see recognition of the important role cycling can play in addressing local issues and contributing to GCP goals in the Future Investment Strategy report. It's clear that people want to cycle more, the government wants people to cycle more, businesses expect their employees to cycle more and public feedback from consultations and the Citizens' Assembly recognise cycling's role in tackling air pollution, congestion and climate change.</p> <p>We therefore strongly welcome the proposal for new investment to enable targeted investment in gaps in the cycling network and new criteria assessing whether transport schemes support the delivery of net-zero carbon objectives across Greater Cambridge.</p> <p>We'd like confirmation that this investment will be led by the forthcoming Local Cycling and Walking Investment Plan and ask when the plan will be published? Also, will investment in routes be spread across links within the city and out in the wider region so that rural communities share the benefit of improvement to active travel links?</p>	<p>The Local Walking and Cycling Infrastructure Plan will be a key factor in deciding where to invest additional funding in the active travel network, alongside other factors such as feasibility and value for money of potential schemes. Development of the Plan is led by Cambridgeshire County Council, who are aiming to consult on the draft plan in the new year.</p> <p>GCP investment in active travel includes the Greenways, supporting people to cycle in from villages, as well as investment within the city. If the Executive Board approve this additional allocation, further work will be undertaken to identify which schemes should be taken forward, looking across the whole Greater Cambridge geography.</p>
6	Camcycle	<p>Agenda Item 9 – Public Transport Improvements And City Access Strategy</p> <p>Camcycle welcomes more detail on the city access strategy and supports the short-term measures being implemented to encourage more people to walk and cycle. More secure cycle parking at workplaces and</p>	<p>Thank you for your questions. Taking the short-term measures first, I can confirm:</p> <ul style="list-style-type: none"> • The e-cargo bike loan scheme has a

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	<p>in the city centre is very important to address issues of cycle theft, particularly when seeking to increase uptake in the use of e-bikes. We also strongly support the city centre freight pilot with increased use of cycle logistics.</p> <p>Questions on short-term measures:</p> <ol style="list-style-type: none"> 1) What is the start date for the e-cargo bike loan scheme? 2) When are tranche 2 roadspace reallocation schemes likely to be implemented? 3) Has any support for those with disabilities who would like to cycle been investigated? Currently, there are significant financial barriers to those seeking access to adapted cycles such as handcycles or tricycles. <p>Camcycle also supports a more widescale programme of roadspace reallocation to create safe and attractive active travel routes and agree that if this is coordinated with a review of car parking and the city road network hierarchy, and communicated well as a whole scheme, it is more likely to achieve high levels of modal shift and public support. However, we believe that the recommendations underestimate the impact that could be had by fast, ambitious action. For example, Leicester's pop-up cycle network (11 miles in 10 weeks) has already increased cycling by 45% and school street schemes in London have had a huge impact on modal shift.</p>	<p>provisional start date of January 2021, subject to timely delivery of the bikes.</p> <ul style="list-style-type: none"> • The Government confirmed the emergency active travel fund allocations on 13 November. The GCP is working with the County Council on implementation of the tranche 2 roadspace reallocation measures. We expect to implement the GCP schemes in the New Year and will be able to give a firmer timeframe shortly. • In terms of supporting people with disabilities to cycle, the report proposes further work to maintain access to the city for people with disabilities and this will include looking at ways of improving access to sustainable travel options such as cycling. <ol style="list-style-type: none"> 1. In taking forward both short and longer-term work, the GCP continues to look at lessons from other places, including those you mention. For example, Paris was included in one of the European Studies drawn on in the 'Lessons from Elsewhere' paper and Rachel Aldred included Seville as a key example in her Citizens' Assembly presentation last year. 2. In terms of the longer-term, the paper sets out some of the challenges we currently face arising from the pandemic and its impact on public transport and travel patterns. It's also
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		<p>Questions on long-term schemes:</p> <ol style="list-style-type: none"> 1) Why were cities which have achieved significant modal shift to cycling in a short time not included in the Lessons from Elsewhere report? E.g. Seville, Paris, Ghent? 2) What timescales are envisaged for packages 3a, b and c? Are these dependent on the existence of the GCP's new Busway and Greenway schemes? 	<p>clear that there are areas where we can make progress – including with road space reallocation and addressing air quality issues. This would mean implementing the packages in a phased way – starting with further measures around road space and air quality, then reviewing and adding more measures at future points.</p>
7	Lynda Warth on behalf of the British Horse Society	<p>Agenda Item 11 – Greenways - Haslingfield</p> <p><i>Proposed Form of Greenway</i></p> <p>As this Assembly has previously been informed, whilst supporting the creation of multi user Greenways, the BHS needs to ensure that the existing amenity for horse riders is protected. To manage expectations and inform Assembly members before the £8m outline budget is approved, please could Peter Blake confirm the following:</p> <ul style="list-style-type: none"> • Haslingfield to Hauxton : the existing Bridleway will be kept in its original state and the new path is in addition to the Bridleway? • Haslingfield to Cantelupe Farm: 'improvements' will be suitable for equestrians? • M11 Bridge: will be suitable for horse riders through upgrade or by use of mounting blocks? 	<ul style="list-style-type: none"> • Haslingfield to Hauxton: the existing Bridleway will be kept in its original state or enhanced, and the new all-weather, multi-user path is in addition to the Bridleway, not at the expense of it. • Haslingfield to Cantelupe Farm: improvements will be suitable for equestrians. We will be in discussion in due course • M11 Bridge: is intended to be suitable for horse riders through upgrade of approach ramps and increasing parapet heights (subject to designs being agreeable to Highways England as the bridge structure is a HE). • Cantelupe Farm to M11 Bridge: the existing Bridleway will be kept in its original state or enhanced, and the new all-weather, multi-user

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		<ul style="list-style-type: none"> • Cantelupe Farm to M11 Bridge: this long, straight, grassy bridleway track that is open and safe for a canter will be retained and the new path is in addition to the Bridleway? • Upgrade of an existing footpath to link to the M11 Bridge: will be a Bridleway? • A link northwards to the Barton Greenway and follow Bridle Way and The Baulk path: will be in addition to the Bridleway? • Path from the M11 bridge to the Bridleway : will be upgraded to a Bridleway? • M11 Bridge to Burnt Close Grantchester: will be upgraded to a Bridleway? • Broadway to The Baulk path (north east end): will be upgraded to Bridleway with safe access for equestrians? • Cambridge Rugby Club to Barton Road and The Baulk: will be upgraded to Bridleway with a safe crossing of Grantchester Road for all users? 	<p>path is in addition to the Bridleway, not at the expense of it</p> <ul style="list-style-type: none"> • Upgrade of existing footpath link to the M11 Bridge will be a Bridleway • The link northwards to the Barton Greenway: will be in addition to the Bridleway, not at the expense of it • Path from the M11 bridge to the Bridleway : will be upgraded to a Bridleway • M11 Bridge to Burnt Close Grantchester : will be upgraded to a Bridleway • Broadway to The Baulk path (north east end) will be upgraded to Bridleway with safe access for equestrians. • Cambridge Rugby Club to Barton Road and The Baulk: will be upgraded to Bridleway with a safe crossing of Grantchester Road for all users.
8	Lynda Warth on behalf of the British Horse Society	<p>Agenda Item 11 – Greenways - Haslingfield</p> <p><i>Haslingfield to Hauxton</i></p> <p>Equestrian Access Groups were persuaded not to oppose the creation of a shared pedestrian / cycle path through Harston, despite having strong evidence of historic equestrian usage, on the grounds that a safe off road link would be provided for equestrians</p>	<p>The option for a bridge to provide off-road access to Trumpington Meadows Country park was removed from proposals following strong objections to the proposal through the public consultation process, including from the Wildlife Trust. Objections were</p>

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	<p>from Trumpington Meadows Country park to the Harston bridleway network.</p> <p>We feel very strongly that the decision not to create a new bridge to allow off road access to Trumpington Meadows Country Park is a missed opportunity for both the Melbourn and Haslingfield Greenways. This would create a much safer option for all users than having to use a path alongside the busy A10. The Hauxton P&R development with increased traffic will only exacerbate the existing danger at this point.</p> <p>Given the serious potential safety impact, please could this decision be revisited with a view to finding a suitable solution to allow this connection to be made which would be acceptable to the Wildlife Trust?</p>	<p>largely on the grounds of environmental and ecological impact of the proposed scheme.</p> <p>Our proposals for the Haslingfield Greenway do not prevent this from being revisited at a point in the future.</p> <p>The alternative route will come closer to the A10 but will provide a safe route for all Greenway users.</p>
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Greater Cambridge Partnership Joint Assembly
Public Questions Protocol

Please note that during the Covid-19 pandemic Executive Board and Joint Assembly meetings will be held virtually via Zoom. The meetings will continue to be live streamed via the GCP YouTube Channel - [Link](#). As a result there will be some temporary changes to arrangements for handling public questions. These will be kept under review and amended if necessary. Amended wording is shown in bold text below.

At the discretion of the Chairperson, members of the public may ask questions at meetings of the Joint Assembly. This standard protocol is to be observed by public speakers:

- Notice of the question should be sent to the Greater Cambridge Partnership Public Questions inbox [public.questions@greatercambridge.org.uk] no later than 10 a.m. three working days before the meeting.
- Questions should be limited to a maximum of 300 words.
- Questions should relate to items that are on the agenda for discussion at the meeting in question. The Chairperson will have the discretion to allow questions to be asked on other issues.
- Questioners will not be permitted to raise the competence or performance of a member, officer or representative of any partner on the Joint Assembly, nor any matter involving exempt information (normally considered as 'confidential').
- Questioners cannot make any abusive or defamatory comments.
- The Chairperson will decide when and what time will be set aside for questions depending on the amount of business on the agenda for the meeting.
- In the event of questions considered by the Chairperson as duplicating one another, it may be necessary for a spokesperson to be nominated to put forward the question on behalf of other questioners. If a spokesperson cannot be nominated or agreed, the questioner of the first such question received will be entitled to put forward their question.
- **Where meetings are held virtually, the expectation is that questions will be read out by an officer on behalf of the questioner. This is the preferred approach in the interests of efficiency as it reduces the likelihood of technical difficulties. However, should they wish to do so, questioners will retain the right to temporarily join the virtual meeting to ask their question (see below).**

- Details of the public questions accepted by the Chairperson will be circulated to members and published on the website along with other agenda papers in advance of the meeting.
- Individual questions will be read out at the relevant point in the meeting, usually at the start of the agenda item to which the question relates.
- The question will be answered at an appropriate point in the debate, usually as part of the introduction of the relevant item.
- Details of the questions asked at each meeting and a summary of the response given will be published online after the meeting and will included as an appendix to the minutes.
- In circumstances where the questioner has decided to ask their question virtually:
 - Individual questioners will be permitted to speak for a maximum of **two** minutes.
 - If any clarification of what the questioner has said is required, the Chairperson will have the discretion to allow other Joint Assembly members to ask questions.
 - The questioner will not be permitted to participate in any subsequent discussion and will not be entitled to vote.
 - **In the event of technical difficulties the Chairperson reserves the right to determine that in the interests of efficiency, questions will be read out on behalf of the questioner.**

PLEASE NOTE FROM 1st MAY 2019 THE E-MAIL ADDRESS FOR SUBMISSION OF PUBLIC QUESTIONS IS 'public.questions@greatercambridge.org.uk'

Public Transport Improvements and City Access Strategy

Report to: Greater Cambridge Partnership Joint Assembly

Date: 24th February 2021

Lead Officer: Peter Blake – Director of Transport, GCP

1 Background

- 1.1. In November and December 2020, the Joint Assembly and Executive Board considered a report on the City Access Project. This included an update on delivery of short-term measures and consideration of proposals for additional action in the context of the GCP's ambitions and the continuing pandemic situation. Following the discussion at the Joint Assembly, the Executive Board agreed to consider at the next meeting cycle how progress could be made towards further measures aiming to improve public transport and reduce congestion, air pollution and carbon emissions.
- 1.2. Tackling these issues is more important than ever – the pandemic has demonstrated the benefits of lower traffic levels for our health, environment and community. However, data suggests a clear risk of a car-based recovery without action. Building on the GCP's existing sustainable transport programme, there is an opportunity for the GCP to help shape and support a green recovery.
- 1.3. The Joint Assembly is invited to consider the proposals to be presented to the Executive Board to progress a comprehensive package of measures designed to promote sustainable modes of transport, and in particular to comment on:
 - (a) Supporting a significant uplift in use of sustainable transport as part of a green recovery, through:
 - delivering a package to incentivise use of public transport, as it transitions from central government support, based on the proposals outlined in the Systra 'future bus concept', and progressed in discussion with Cambridgeshire and Peterborough Combined Authority (CPCA) and operators (paragraph 5.4);
 - Enhancements to Park&Ride, including additional funding for the expansion of the Babraham site (paragraph 5.7); and
 - Agree to consult on and deliver a £20M prioritised package of further improvements to encourage cycling, aimed at addressing gaps and missing links in the cycle network (paragraph 5.8).

- (b) Prioritising road space for sustainable transport and making it a more competitive choice, by discouraging car use through the proposals at paragraph 5.9, to:
- Develop a revised network hierarchy for Cambridge that prioritises sustainable modes of transport;
 - Bring forward a programme of road-space reallocation to deliver a revised hierarchy, building on schemes delivered through the active travel fund;
 - Develop and implement an integrated parking strategy aiming to promote sustainable travel and discourage car use, improve access and more effectively manage the use of on and off street parking to reduce congestion on the network; and
 - Fund the delivery of civil parking enforcement in South Cambridgeshire.
- (c) Work with bus operators, the Cambridgeshire and Peterborough Combined Authority and the County Council to reduce emissions by moving to zero emission services within the central area by 2025 and to Euro VI standards in the short term, including an appraisal of options to limit access to public transport vehicles, coaches, HGVs and taxis not meeting emissions criteria (paragraph 5.14); and
- (d) Further enhance sustainable transport options for people and businesses through the supporting measures identified in previous papers (paragraph 5.15).

2 Issues for Discussion

- 2.1 The GCP's public transport improvements and city access strategy sits at the heart of the City Deal, aiming to address some of the major pressures on the local economy by reducing congestion and pollution, and by providing people with better, more sustainable options for their journeys – key objectives of the Cambridgeshire and Peterborough Local Transport Plan.¹ Taking action on these issues is a key part of supporting a green recovery.
- 2.2 To achieve this, as we come out of the pandemic, Greater Cambridge and the wider travel to work area will need to embrace some of the flexibility in working locations and patterns adopted during the pandemic and make these work in the longer-term. At the same time, many people will still need to travel not just for work, but also for education, to access services, and for leisure – wherever possible, those journeys need to be made using ultra-low or zero emission public transport or by cycling, walking or another active travel option. This includes building on earlier initiatives to discourage car trips for school runs and considering how tourists access the city.
- 2.3 The GCP's sustainable travel plan is building new, high-quality, segregated infrastructure for active travel and public transport. Scheme delivery is underway with improvements being made across Greater Cambridge over the next 5 years. In parallel, the City Access Project has explored ways to deliver better, more

¹ <https://cambridgeshirepeterborough-ca.gov.uk/assets/Transport/LTP.pdf>

competitive sustainable transport. Extensive technical work has been undertaken and a series of initial actions were agreed in 2020 and set out in earlier papers.²

2.4 This technical work has shown that:

- Any package needs to combine interventions to support the uptake of public transport with one or more measures to discourage car use in order to maximise impact and free up road space;
- The scale of the challenge is such that significant measures are needed to address the issues; and
- The introduction of measures that discourage car use must be timed to ensure people have alternatives in place first.

2.5 The GCP has continued to monitor the impact of the Covid-19 pandemic and restrictions on travel and transport. The latest data is set out at Appendix 1 and shows a continuation of the trends seen previously through the third national lockdown. The impact on public transport continues to be particularly acute and, given the likely importance of a high-quality public transport network to the future success of Greater Cambridge and the wider area, getting people back on to public transport at an appropriate time will be key. Equally, with people returning to their cars faster than other modes following both the first and second lockdowns, there is a clear risk of a car-based recovery which could potentially make sustainable modes less attractive if congestion and pollution levels return.

3 Consultation and Engagement

3.1 Extensive engagement on the issues considered in this paper has previously been undertaken and reported to the Joint Assembly and Executive Board in earlier reports. Engagement has included Our Big Conversation (2018), Choices for Better Journeys (2019) and the Greater Cambridge Citizens' Assembly (2019).

4 Citizen's Assembly

4.1 In July 2020 the GCP published the response to the Citizens' Assembly³, followed in January 2021 by a One Year On Report setting out progress in implementing the response.⁴ This report takes the response a step further, by proposing a comprehensive package that will support the realisation of the vision proposed by the Citizens' Assembly and supported by the GCP. The detailed recommendations of the Citizens' Assembly have informed this package, in particular the proposals to provide better public and active travel options, create space for people and sustainable transport, and ensure proposals help to reduce air pollution and carbon emissions. A series of supporting measures, including many proposed by the Citizens' Assembly, is also being progressed. In bringing forward this package, the

² See particularly:

https://cambridgeshire.cmis.uk.com/ccc_live/Meetings/tabid/70/ctl/ViewMeetingPublic/mid/397/Meeting/1423/Committee/26/SelectedTab/Documents/Default.aspx

https://cambridgeshire.cmis.uk.com/ccc_live/Meetings/tabid/70/ctl/ViewMeetingPublic/mid/397/Meeting/1419/Committee/26/SelectedTab/Documents/Default.aspx

³ <https://www.greatercambridge.org.uk/asset-library/City-Access/Citizens-Assembly/GCP-Citizens-Assembly-response-July-2020.pdf>

⁴ <https://www.greatercambridge.org.uk/asset-library/City-Access/Citizens-Assembly/One-year-on-progress-implementing-the-Greater-Cambridge-Partnership-response.pdf>

GCP Executive Board has the opportunity to support a bold approach to delivering a green recovery.

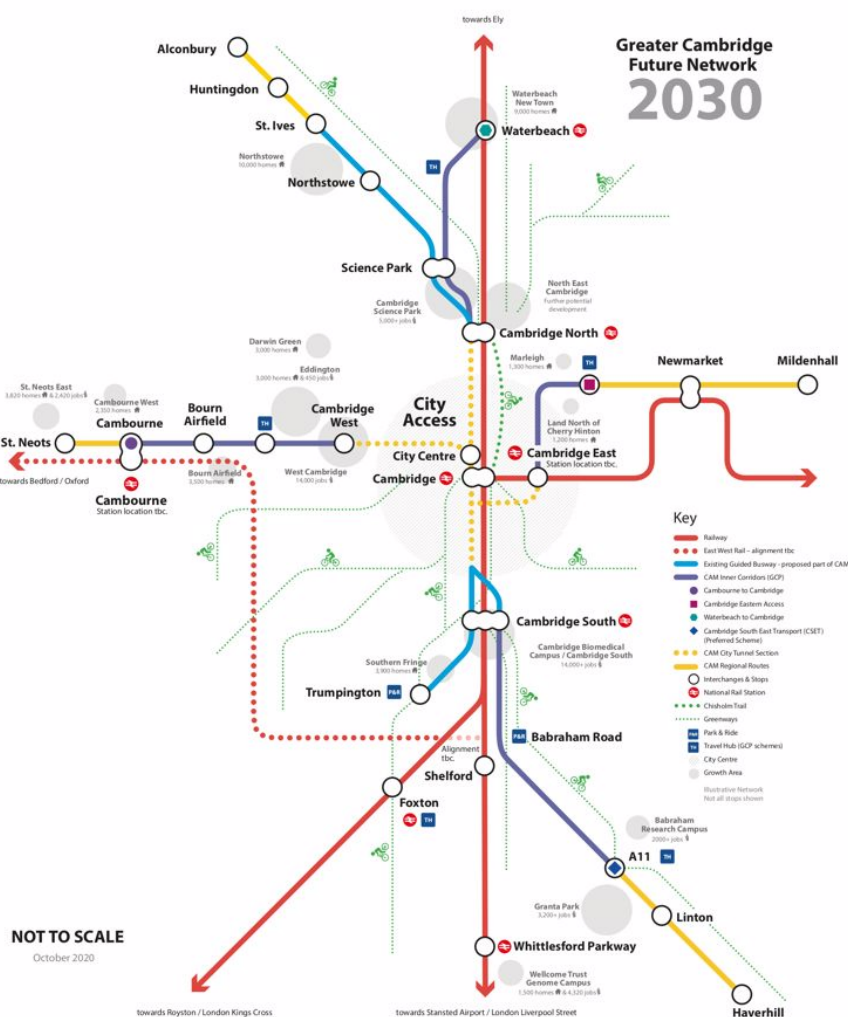
5 Options and Emerging Recommendations

5.1 As set out in previous papers, in order to address current and future transport issues, tackle climate change, and secure the future prosperity of our area, we need people to reduce their car travel and, if they do need to make a journey, to use sustainable modes of transport wherever possible. Offering people a competitive alternative to their car requires three things:

- New sustainable travel infrastructure;
- An enhanced network of public transport services; and
- A lever to manage down demand for car trips and create space for sustainable transport.

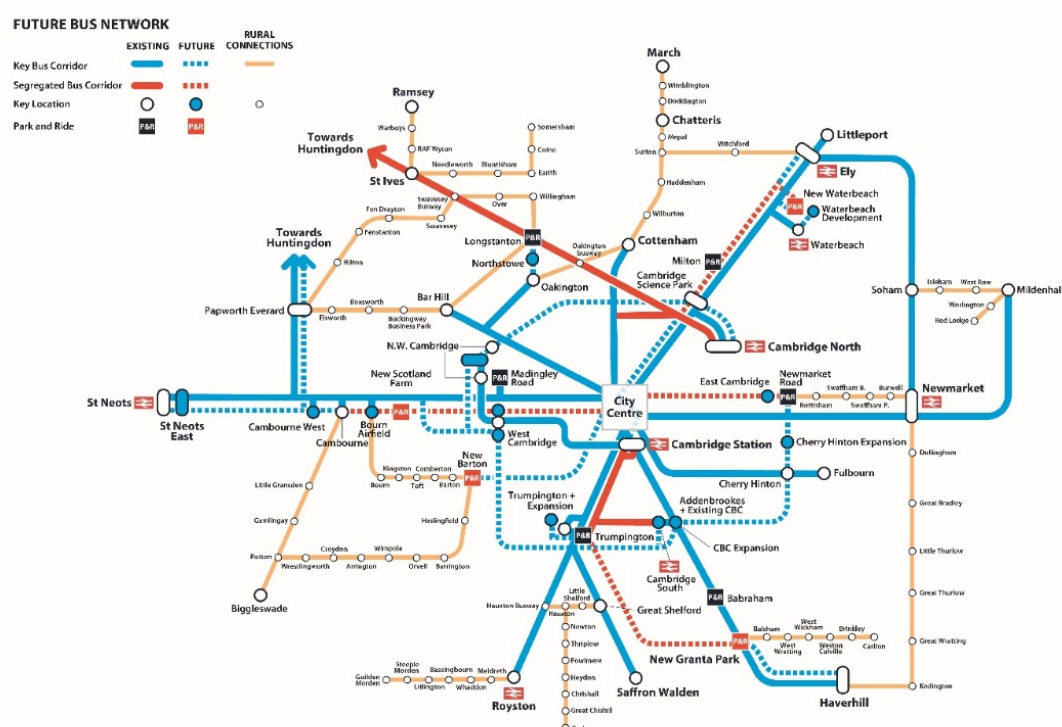
5.2 The GCP's sustainable transport programme will, alongside other projects being delivered by partners, provide the first of these, as shown in figure 1.

Figure 1: Greater Cambridge Future Network Map



- 5.3 Previous work has considered the second area – provision of an enhanced network of public transport services. The Cambridgeshire and Peterborough Local Transport Plan supports the delivery of better bus services to improve access to employment, education, services and leisure destinations.⁵ Using the findings from the CPCA's *Cambridgeshire and Peterborough Strategic Bus Review*, in 2020 Systra Ltd produced a future bus network concept for Greater Cambridge⁶. This aimed to set out how a new network could offer more people a competitive public transport option, supporting access to employment and services across the travel to work area and enabling inclusive growth. The future network concept is set out at figure 2.

Figure 2: Future Bus Network Concept



- 5.4 It is proposed that, as part of supporting a green recovery, officers work with the CPCA and operators to deliver a package to support the recovery, and incentivise use, of public transport, as it transitions from central government support. The package would be based on the proposals outlined in the Systra report and would include:

- Lengthening operating hours with bus services running from 5:00 a.m. to midnight on the core network;
- Increasing bus frequencies on the core network;
- Provision of additional bus routes and services, including the trial of additional rural services for Board agreement in July; and
- Development of a targeted fare pilot.

⁵ <https://cambridgeshirepeterborough-ca.gov.uk/assets/Transport/LTP.pdf>

⁶ <https://greatercambs.filecamp.com/s/8waVgal1mMIYNfJ9/d>

- 5.5 Longer operating hours and more frequent services will enhance the core network and offer an attractive, legible and dependable network for communities in and around Greater Cambridge. This is a key foundation to any further expansion of services. Building off this core network, the trial of additional rural services will offer the opportunity to test the concept advanced in the Systra report of providing more regular services connecting into the core network. Suggested locations for the trial will be considered with CPCA and operators and brought to the next meeting.
- 5.6 By investing to support the return of public transport, the GCP can help to support our local economy, offering improved access to employment areas and shaping a sustainable recovery from the pandemic. However, an ongoing revenue source will need to be found for any supported services that do not become commercially viable following the initial recovery period if a decision is taken for these to continue.
- 5.7 The role of Park&Ride will continue to be important in offering many people a sustainable travel option for the last few miles of their journey where currently there is little provision for them to undertake the whole journey this way. In the medium- to longer-term, the development of new travel hubs will offer multi-modal connections to an increased number of people. It is therefore proposed that, as part of this package, the GCP enhances Park&Ride and develops the travel hub offer by:
- Extending operating hours in line with the core network – this will support more people to use the service particularly those working in services and the nighttime economy;
 - Increasing the capacity of the Babraham site to offer 159 additional spaces from 2022/3, for £1.3m, which will help particularly with access to the hospitals and the biomedical campus. The project is being developed in collaboration with the County Council Energy Investment Unit and will include installation of solar panels above the parking spaces and infrastructure to bring generated power from the site to local end users;
 - Adopting the draft travel hub design principles at Appendix 2 to guide the development of the GCP's future sites, ensuring these are flexible, modern, multi-modal interchanges that are integrated with their local communities, as set out in the Cambridgeshire and Peterborough Local Transport Plan; and
 - Expanding cycle parking at all sites, including secure cycle storage.
- 5.8 The pandemic has seen more people try out cycling and supporting active travel has been identified as important to economic recovery and in building healthier, more resilient communities. Building on the draft Local Walking and Cycling Infrastructure Plans⁷, analysis has been undertaken of the current cycle network to identify gaps and missing links and consider how these could be addressed.⁸ This includes an initial prioritised list of missing links as set out in table 1 – addressing these over the coming years will need to utilise a variety of funding sources and involve alignment with other local projects. It is proposed that the GCP consolidates its current investment in the cycle network by consulting on and delivering a prioritised package of further improvements to encourage cycling, within an indicative envelope of £20m. The consultation would be undertaken in the summer

⁷<https://cambridgeshire.cmis.uk.com/ccclive/Meetings/tabid/70/ctl/ViewMeetingPublic/mid/397/Meeting/1535/Committee/62/SelectedTab/Documents/Default.aspx>

⁸<https://greatercambs.filecamp.com/s/OUMJPz728qHvjuvE/d>

and a further Board report would set out the suggested projects and seek agreement to funding.

Table 1: Initial Analysis of Cycling Missing Links (for consultation)

Scheme	Overall Rank	Cost* (Estimate)	Pros	Cons
AT134 (North-South) (Mowbray Road & Perne Road)	1	£11.5m	<ul style="list-style-type: none"> Connects with recently completed Dutch Rbt High cycling potential Relatively easy to deliver Supports emerging LCWIP Contributes to a coherent network 	<ul style="list-style-type: none"> Relatively high-cost scheme Good but not highest Vfm
AT134 (East-West) (Long Road & Queen Edith's Way)	2	£8.5m	<ul style="list-style-type: none"> Connects with recently completed Dutch Rbt Supports emerging LCWIP Relatively high value for money Contributes to a coherent network 	<ul style="list-style-type: none"> May encounter deliverability issues Low level of segregation achievable in sections
Hills Road - Regent Street	3	£10.5m	<ul style="list-style-type: none"> High cycling potential Relatively easy to deliver Supports emerging LCWIP Contributes to a coherent network 	<ul style="list-style-type: none"> Relatively high-cost scheme Cyclists required to use bus lane in sections
North Cambridge (Chesterton Road & Chesterton High Street)	3	£6.0m	<ul style="list-style-type: none"> High cycling potential Relatively low-cost scheme Relatively high value for money Supports emerging LCWIP Contributes to a coherent network 	<ul style="list-style-type: none"> Low level of segregation achievable in sections Deliverability issues including Mitcham's Corner Gyration
Milton	3	£4.5m	<ul style="list-style-type: none"> Supports emerging LCWIP Helps facilitate trips from Park & Ride 	<ul style="list-style-type: none"> High cost / low Vfm Low level of segregation achievable in sections
Queens Road	4	£5.5m	<ul style="list-style-type: none"> No bus stops impacted Relatively low-cost scheme Supports emerging LCWIP Contributes to a coherent network 	<ul style="list-style-type: none"> Relatively low cycling potential Few connections to key trip attractors May encounter deliverability issues Potential impact on coach parking
Huntingdon Road North	5	£1.8m	<ul style="list-style-type: none"> Connects with multiple schools and builds on existing infrastructure and route Relatively low-cost scheme Supports emerging LCWIP 	<ul style="list-style-type: none"> May encounter deliverability issues
Cherry Hinton Road	5	£8.0m	<ul style="list-style-type: none"> Relatively low-cost scheme Contributes to a coherent network 	<ul style="list-style-type: none"> May encounter deliverability issues Not identified in emerging LCWIP
City (North-South) (Lensfield Road, East Rd & Elizabeth Rd)	6	£13.0m	<ul style="list-style-type: none"> Contributes to coherent network Close to several key trip attractors 	<ul style="list-style-type: none"> High cost / low Vfm Would be difficult to deliver due to physically constrained sections
Impington - Milton	7	£1.5m	<ul style="list-style-type: none"> Relatively low-cost scheme Helps facilitate sustainable trips to P&R Supports emerging LCWIP 	<ul style="list-style-type: none"> Low level of segregation achievable in sections
Histon - Histon Road	8	£2.9m	<ul style="list-style-type: none"> Extends the planned Histon Road scheme into Histon Relatively low-cost scheme Supports emerging LCWIP 	<ul style="list-style-type: none"> May encounter deliverability issues Low value for money
Trumpington Road	9	£18.5m	<ul style="list-style-type: none"> Supports emerging LCWIP Contributes to coherent network 	<ul style="list-style-type: none"> High cost / low Vfm Would be difficult to deliver due to high number of junctions
Girton - Huntingdon Road	10	£2.4m	<ul style="list-style-type: none"> Relatively low-cost scheme Supports emerging LCWIP 	<ul style="list-style-type: none"> Low level of segregation achievable in sections May encounter deliverability issues Few connections to key trip attractors

Creating Space for Sustainable Transport and Discouraging Car Use

5.9 Analysis has shown that the third area of action needed to provide a competitive sustainable transport option is identifying and deploying one or more levers to manage down demand for car trips and create space for sustainable transport. The Cambridgeshire and Peterborough Local Transport Plan sets out the need for action to reduce demand for car travel to tackle congestion and pollution, and “ensure that Cambridge’s road network is prioritised for walking, cycling and public transport”.⁹ Previously published technical work has considered how this could be achieved.¹⁰ It is proposed that a blended approach of road space reallocation and changes to parking is used to prioritise road space for sustainable transport and make it a more competitive choice, through:

⁹ <https://cambridgeshirepeterborough-ca.gov.uk/assets/Transport/LTP.pdf>

¹⁰ See background papers

- Developing a revised network hierarchy for Cambridge that prioritises sustainable modes of transport;
- Bringing forward a programme of road space reallocation to deliver the revised hierarchy, building on schemes delivered through the active travel fund;
- Developing and implementing an integrated parking strategy which aims to promote sustainable travel and discourage car use, improve access and more effectively manage the use of on and off street parking to reduce congestion on the network; and
- Funding the delivery of civil parking enforcement in South Cambridgeshire.

- 5.10 Prioritising road space for sustainable transport has the potential to speed up journey times, improve reliability and improve safety by providing dedicated space for sustainable modes or reducing overall traffic levels to create better environments. Previous technical work has shown that, to address risks of displacement, it is important that any measures are accompanied by interventions to increase the availability and attractiveness of sustainable modes¹¹ – therefore changes will be introduced in conjunction with the improvements to sustainable travel set out above. In order to reduce rather than displace vehicle trips, it is also important to introduce parking restrictions in parallel with significant changes to road space.
- 5.11 The development of an Integrated Parking Strategy will identify how parking across Greater Cambridge can promote sustainable modes, discourage car use, improve access and more effectively manage the use of on and off street parking to reduce congestion on the network. The work will consider how changes could be made over time and as improvements to sustainable transport are made, so as to ensure access to the city particularly for those who currently have limited options to travel without a car. The GCP will work with the County Council and City Council to develop the Strategy for consideration by the GCP Joint Assembly and Executive Board and, as appropriate, by partners, in autumn 2021. A key part of a comprehensive approach to parking will be the delivery of civil parking enforcement in South Cambridgeshire to encourage use of designated parking facilities and address issues with problematic parking. It is proposed that the GCP provides funding to support the delivery of civil parking enforcement. Parking income is likely to remain an important part of Cambridge City Council and Cambridgeshire County Council's revenue and the Strategy will consider how an integrated approach could underpin future requirements, including ongoing support for civil parking enforcement.
- 5.12 Changes to the road network and to parking have the potential to impact more on those who find it harder to switch modes, particularly those with mobility needs. Work is underway to identify accessibility barriers to key locations in Greater Cambridge and develop plans to address these alongside the roll out of a more comprehensive approach to the management of road space and parking.

¹¹ <https://greatercambs.filecamp.com/s/thZgVi8Xqm1eClkj/fi>

Reducing Pollution and Emissions

- 5.13 Transport is the main contributor to air pollution in Cambridge, and transport accounts for 45% of carbon emissions in Cambridgeshire.¹² It has therefore been a key principle of the City Access Project to reduce emissions as part of a comprehensive approach. Earlier studies have identified that expansion of the bus network has the potential to worsen air pollution issues in central Cambridge unless cleaner vehicles are used.¹³ Meeting net zero commitments will also require both modal shift to public transport and for buses to be zero emission. The Cambridgeshire and Peterborough Local Transport Plan aims to “ensure transport initiatives improve air quality across the region, exceeding standards as set by the European Union”, with a particular focus on reducing emissions from taxis, buses, coaches, and HGVs.¹⁴
- 5.14 Taking into account some of the operational challenges of moving to zero emission buses immediately, it is proposed to work with bus operators and the CPCA to reduce emissions by moving to zero emission services within the central area by 2025, with a short-term milestone of moving to a Euro VI fleet to secure immediate air quality benefits. This would include undertaking an appraisal of options to limit access to public transport vehicles, coaches, HGVs and taxis not meeting emissions criteria.

A Comprehensive Package

- 5.15 The proposals set out above represent a blended approach, building on the work on packages of measures considered by the Joint Assembly and Executive Board in November and December 2020, and combining measures to deliver a better bus network, create space for public and active transport, and reduce air pollution. The package also includes a range of supporting measures already identified and being progressed through the city access project, such as finalising a freight pilot for the city centre, expanding the e-cargo bike pilot and exploring how an expansion of car club schemes using ultra low or zero emission vehicles could reduce car ownership.
- 5.16 The package has been informed by the preliminary Integrated Impact Assessment¹⁵, and consideration will continue to be given to its findings as the measures are developed further. There are elements of the original packages work that it is not proposed the GCP progresses at this time, but that may need to be returned to in future. This includes wider measures to support the decarbonisation of cars and identification of a longer-term funding mechanism to sustain public transport service enhancements. These areas will be informed by the impact of the measures outlined above, as well as wider strategic work including the Cambridgeshire and Peterborough Combined Authority's work on a Low Emission Vehicles Strategy and the outcome of the Bus Reform Taskforce's work examining alternative delivery options for bus services.

¹² www.greatercambridge.org/reducingairpollutionreport/

¹³ <https://consultcambs.uk/engagement/hq.com/1836/documents/2050>

¹⁴ <https://cambridgeshirepeterborough-ca.gov.uk/assets/Transport/LTP.pdf>

¹⁵ <https://greatercambs.filecamp.com/s/thZgVi8Xqm1eClkj/fi>

6 Alignment with City Deal Objectives

6.1 The City Access Project is designed to improve access, reduce congestion, and deliver a step-change in public transport, cycling and walking, alongside significantly improving air quality and reducing carbon emissions in Greater Cambridge. The proposals set out in this report will support the realisation of a series of benefits, including:

- Securing the continued economic success of the area through improved access and connectivity;
- Significant improvements to air quality and enhancements to active travel, supporting a healthier population;
- Reducing carbon emissions in line with the partners' zero carbon commitments;
- Helping to address social inequalities where poor provision of transport is a contributing factor; and
- Wellbeing and productivity benefits from improving people's journeys to and from employment.

7 Financial Implications

7.1 In December 2020, the GCP Executive Board agreed a revised city access budget for 2021-2023. Individual elements of the proposed package which go beyond the agreed budget will come forward to the Joint Assembly and Executive Board for full consideration once detailed proposals have been developed. This includes the proposed additional investment in the cycling network, and any investment in zero emission buses beyond the short-term expansion of the current pilot, where the request for approval of additional spend will cover impact on other priorities as agreed as part of the Future Investment Strategy.

7.2 The proposed additional £1.3m budget for the expansion of the Babraham Road Park&Ride is also reflected in the proposed budget within the Quarterly Progress Report.

Have the resource implications been cleared by Finance? Yes

Name of Financial Officer: Sarah Heywood

8 Next Steps and Milestones

8.1 Subject to the Executive Board's approval, delivery of the package set out above will commence. Reports on individual elements of the package needing further Joint Assembly consideration and Executive Board approval will be brought forward as required. Progress will include the following key milestones:

- The timing and precise nature of support for the recovery of public transport will be informed by the pandemic situation, public health guidance and developments in government policy, strategy and funding arrangements for bus services. The GCP will work with operators and the CPCA on the package of support in the coming weeks so this can be deployed when trigger points are met, and officers will bring a paper to the Executive Board

in July seeking agreement to elements including proposed locations for rural services trials;

- In terms of Park&Ride enhancements, detailed design for the Babraham Park&Ride will be undertaken with the aim of commencing construction in 2022;
- Consultation on a prioritised list of cycling schemes will be undertaken in mid-2021 with a report coming to the Joint Assembly and Executive Board in early 2022 for consideration and decision on which schemes to take forward and approval of funding;
- A paper on options for encouraging use of cleaner buses and HGVs will be brought forward in the autumn;
- Delivery of the experimental active travel schemes will continue with the implementation of tranche 2 in the next quarter, subject to County Council timescales. The Executive Board will be asked to make a recommendation on the future of the tranche 1 schemes to the County Council at their meeting in September;
- The GCP will work with the County Council on a draft network hierarchy for consideration, with the aim of consulting on this later in the year and seeking adoption by the County Council in 2022;
- The GCP will work with the County Council and City Council to bring forward an Integrated Parking Strategy in the autumn, with delivery from 2022; and
- An initial paper on accessibility looking at issues and options will be brought to the Joint Assembly and Executive Board this year.

List of Appendices

Appendix 1	Transport Data Pack
Appendix 2	Draft Travel Hub Design Principles

Background Papers

Source Documents	Location
Active Travel Investment Study	https://greatercambs.filecamp.com/s/OUMJPz728qHvjuvE/d
GCP Citizens' Assembly one-year on report	https://www.greatercambridge.org.uk/asset-library/City-Access/Citizens-Assembly/One-year-on-progress-implementing-the-Greater-Cambridge-Partnership-response.pdf
Preliminary Integrated Impact Assessment of Packages, Steer and Temple Group 2020	https://greatercambs.filecamp.com/s/thZgVi8Xqm1eClkj/fi
GCP Citizens' Assembly response	https://www.greatercambridge.org.uk/asset-library/City-Access/Citizens-Assembly/GCP-Citizens-Assembly-response-July-2020.pdf
Citizens' Assembly workshop report	https://www.greatercambridge.org.uk/greater-cambridge-citizens-assembly-workshop-2020
Cambridgeshire & Peterborough Independent Economic Review	https://www.cpier.org.uk/final-report/
Cambridgeshire and Peterborough Local Transport Plan	https://cambridgeshirepeterborough-ca.gov.uk/assets/Transport/LTP.pdf
Technical assessment of alternative measures proposed as an alternative to fiscal options to address future congestion in Greater Cambridge	https://greatercambs.filecamp.com/s/kLtJXgfboUldzqnC/d
Lessons from Elsewhere	https://greatercambs.filecamp.com/s/R1havJ4AXniu9Byr/d
Cambridge Clean Air Zone Feasibility Study	https://consultcambs.uk.engagementhq.com/1836/documents/2050
'Reducing air pollution, CO ₂ emissions and congestion in Cambridgeshire'	www.greatercambridge.org/reducingairpollutionreport/
Technical Note – Public Transport Investment Analysis	https://greatercambs.filecamp.com/s/vkcSQOwBi6wkfbhC/d

SYSTRA: Future Bus Network Concept	https://greatercambs.filecamp.com/s/8waVgal1mMIYNfJ9/d
Making Spaces for People Baseline Report, BDP	https://www.cambridge.gov.uk/media/7672/making-space-for-people-spd-baseline-report-chapters-1-to-4.pdf ; https://www.cambridge.gov.uk/media/7673/making-space-for-people-spd-baseline-report-chapters-5-to-8.pdf
Making Spaces for People: Central Cambridge Vision, Aims, Objectives & Strategies,	https://www.cambridge.gov.uk/media/7671/making-space-for-people-spd-central-cambridge-vision.pdf
'Cambridge Access Study: City Centre Traffic Management Options', Mott MacDonald	https://greatercambs.filecamp.com/s/vui4k4dFhZzfpNwg/d
'Technical Note: CSRM2 City Access Study', Atkins	https://greatercambs.filecamp.com/s/Y7X1ZanYaeSdFkSP/d
'Demand Management options report', Arup	https://greatercambs.filecamp.com/s/FLUqILPtqfnSuJdz/d
'Choices for Better Journeys: CSRM2 Runs', Atkins	https://greatercambs.filecamp.com/s/KpFq8bMrR0YLpSII/d
'Greater Cambridge Partnership: Integrated Impact Assessment – DRAFT Baseline & Scoping Report Summary Report', Steer and Temple Group	https://greatercambs.filecamp.com/s/UY0HyTe1emd3zzgg/d
'Report and recommendations – Greater Cambridge Citizens' Assembly on congestion, air quality and public transport', Involve	https://www.involve.org.uk/sites/default/files/field/attachemnt/GCCA%20on%20Congestion%20Air%20Quality%20and%20Public%20Transport%20-%20Full%20Report%20_0.pdf
'Our Big Conversation: Summary Report of Survey Findings', Greater Cambridge Partnership	https://cambridgeshire.cmis.uk.com/CCC_live/Document.ashx?czJKcaeAi5tUFL1DTL2UE4zNRBcoShgo=IT89Qvi2wNJefHSXNA3sktDKOhbbfuaFCHA5pO4gXOVa%2f2ym848cdw%3d%3d&rUzwRPf%2bZ3zd4E7lkn8Lyw%3d%3d=pwRE6AGJFLDNlh225F5QMaQWCtPHwdhUfCZ%2fLUQzgA2uL5jNRG4jdQ%3d%3d&mCTIbCubSFfXsDGW9lXnlq%3d%3d=hFflUdN3100%3d&kCx1AnS9%2fpWZQ40DXFvdEw%3d%3d=hFflUdN3100%3d&uJovDxwdjMPoYv%2bAJvYtyA%3d%3d=ctNJFf55vVA%3d&FgPIIEJYlo tS%2bYGoBi5oIA%3d%3d=NHdURQburHA%3d&d9Qji0ag1Pd993jsyOJqFvmyB7X0CSQK=ctNJFf55vVA%3d&WGewmoAfeNR9xqBux0r1Q8Za60lavYmz=ctNJFf55vVA%3d&WGewmoAfeNQ16B2MHuCPMRKZMwaG1PaO=ctNJFf55vVA%3d
'Choices for Better Journeys: Summary report of engagement findings', Greater Cambridge Partnership	https://consultcambs.uk.engagementhq.com/1836/documents/2464

Covid-19 – transport impacts

Data and monitoring report

This report is intended to:

Provide further updates on some of **the transport and mobility impacts of Covid-19 restrictions including trends during the third national lockdown and the introduction of additional restrictions through January 2021.**

- Indicate changes in key indicators by comparing **pre-Covid-19 lockdown data to the report production date on 09 February 2021;**
- Continue to track **daily/weekly data to provide a more detailed understanding of recent trends** and show the impact of on-going restrictions;
- Provide a basis for discussion for the Greater Cambridge Partnership to understand and identify existing challenges and future data needs

Data – key points to note:

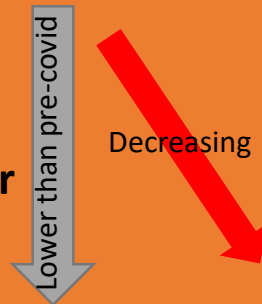
- Relevant comparison periods are noted throughout the report, dependent on historic data availability. Month on month comparisons do not provide useful analysis under the current circumstances, with the third national lockdown introduced on 05 January 2021.
- A number of datasets are **tracked daily from 1 Mar 2020 to 07 February 2021 with some recent updates to include more up to date data where possible.** The on-going monitoring through 2020/21 will allow partners to have a strong understanding of future trends, as the national lockdown ends and existing restrictions are eased.

Transport dashboard – Covid-19

- After the third national lockdown was introduced on 05 January 2021, there has been a clear impact on transport and mobility in and around Cambridge. There have been reductions in all monitored datasets including traffic flows, car parking, retail footfall and public transport use. The closure of non-essential shops as part of the third national lockdown has particularly impacted on footfall in retail areas and parking counts across the city.
- As the *work from home if you can* message has continued, there has been a clear impact on public transport use with overall ridership currently around 80% lower than the same point last year. Before Christmas, the largest reductions across the public transport network were on the Park and Ride network and the Guided Busway. As Park and Ride only services have been suspended, overall passenger counts have reduced further. Footfall around the train station remained low through most of 2020 and continues to be around 85% lower than the same point last year.
- Active travel in the city has reduced further, mainly due to worsening weather conditions. Counts of cyclists and pedestrians are lower than levels seen in March but this is mainly due to those cycling for exercise and leisure in lockdown 1 no longer doing this (or at least less frequently) due to the winter weather.

Traffic volumes

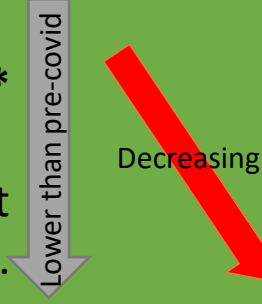
Average daily flows at monitored locations approximately **-54%* lower than the same point last year**



*Compared to the same point last year for **the whole month of January**

Air pollution

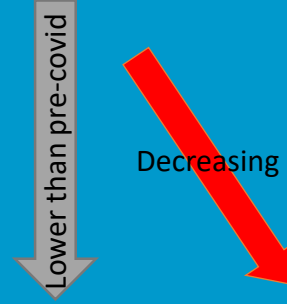
An average **-14% reduction*** in NO₂ recorded across monitoring locations against predicted levels for **January**.



*compared to average measurements across all sites in January from 2017-2019

Public transport

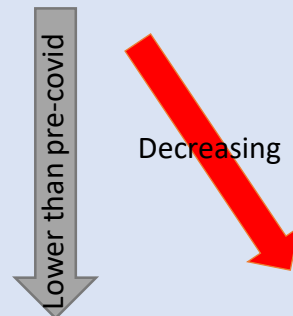
Approximate **-80%** reduction in overall bus use against expected* levels through January



* Expected levels based on historic ridership

Parking occupancy

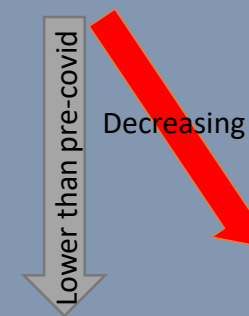
Average daily occupancy at multi-storey parking currently **-82%* lower than the same point last year for January**



*Compared to the same point last year for **the whole month of January**

Retail Footfall

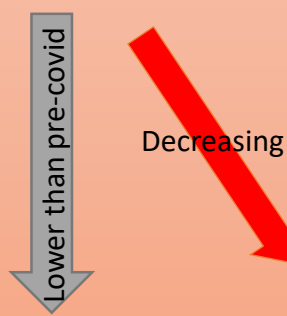
Average daily counts of footfall in retail areas are currently around **-73%* of the same point last year**



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*Compared to the same point last year for **the whole month of January**

Cycling and walking

Cycling counts: **-74% average reduction***
Pedestrian counts: **-55% average reduction***

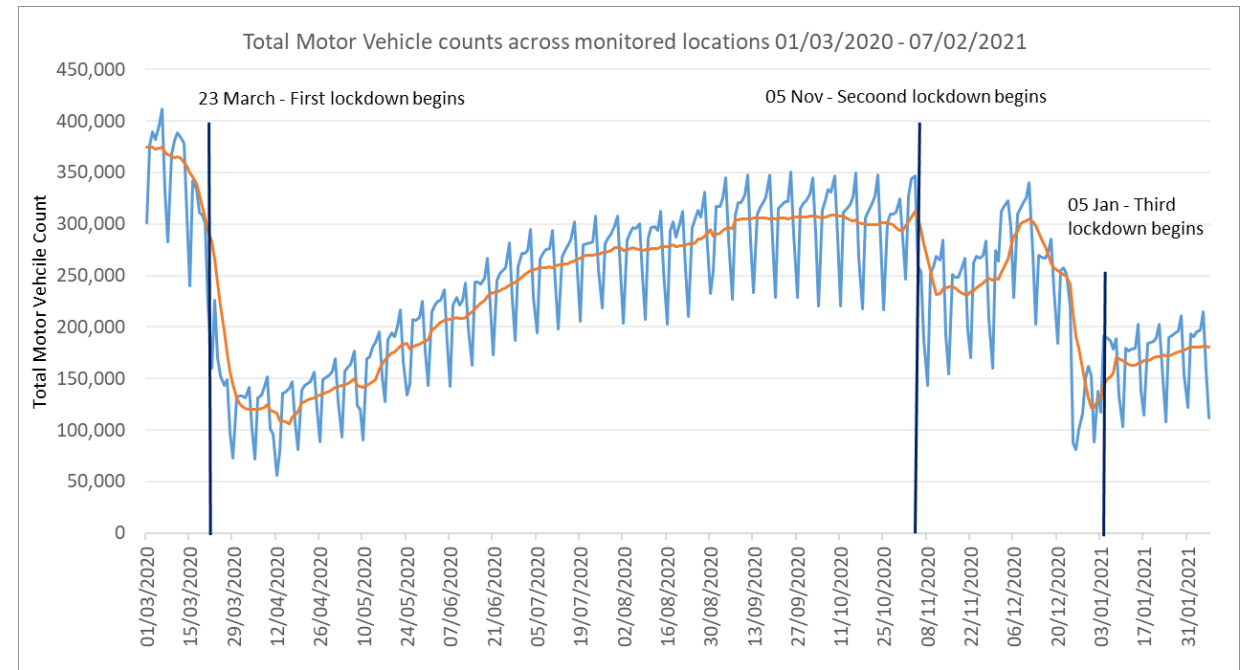


*Compared to the same point last year for **the whole month of January across monitored locations**

Traffic- Motor Vehicles- Overview-

Across monitored sites, overall flows of motor vehicles were approximately -54% lower than the same point last year. This includes an overall reduction of -27% in average daily traffic in January 2021 compared to December 2020. Traffic levels dropped in January in response to the third lockdown, mainly due to the closure of non-essential shops and the return of ‘stay at home’ message.

Total motor vehicles recorded daily across Cambridge Vivacity Sensors and CA counters from 1 Mar to 07 Feb 2021



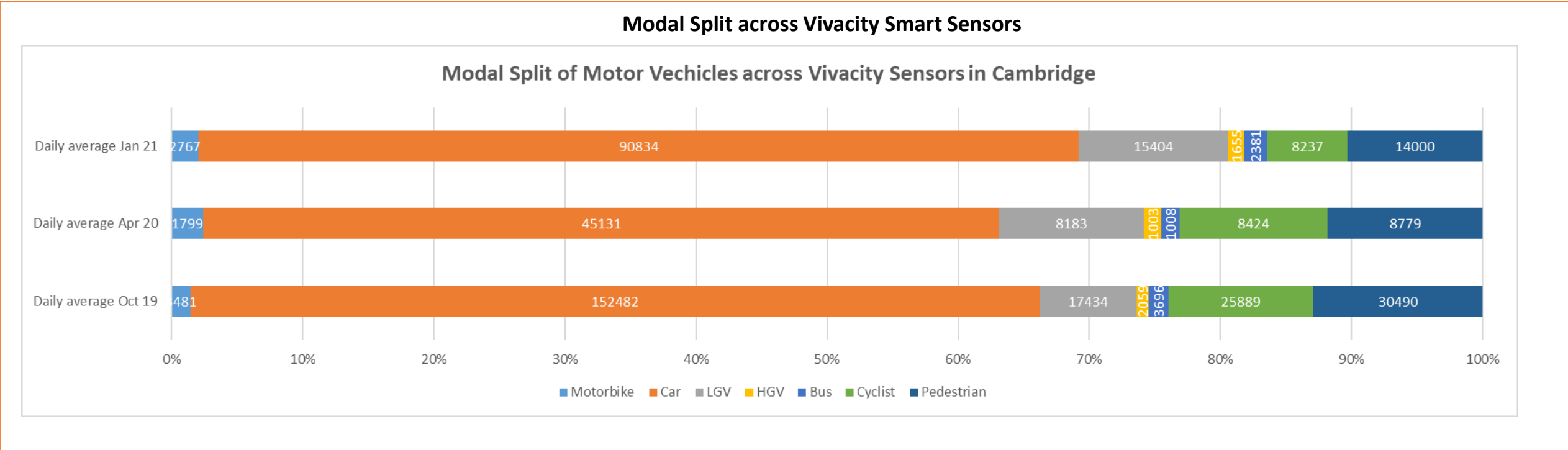
% change in daily average vehicle counts between 7th Jan-7th Feb 2021 and 9th Jan-9th Feb 2020, by key location

Location	All Vehicles	Motorcycles	Cars/Vans	Light Goods Vehicles	Heavy Goods Vehicles	Buses
Mill Rd 1	-58%	-39%	-58%	-73%	-18%	-29%
Mill Rd 2	-68%	-22%	-69%	-78%	-25%	-32%
Coldhams Lane	-36%	20%	-34%	-67%	-10%	-39%
East Rd	-46%	-3%	-45%	-63%	-27%	-67%
Hills Rd	-46%	-10%	-47%	-62%	4%	-29%
Newmarket Rd	-41%	-16%	-40%	-63%	-19%	-25%
Milton Rd 1	-36%	-8%	-36%	-54%	-25%	-8%
Milton Rd 2	-65%	-61%	-30%	-59%	-35%	-27%
Histon Rd 1	-70%	-64%	-70%	-81%	-47%	-60%
Histon Rd 2	-74%	-64%	-70%	-81%	-47%	-60%

- Traffic levels continued to see reductions throughout January, with a -27% reduction in January from December. A reduction of -33% is evident when we compare average daily counts in January 2021 to November 2020 (Second Lockdown).
- Motorcycles and Heavy Goods vehicles** have seen the smallest average decreases against the same time last year, with -25% less Heavy Goods Vehicles and -27% less motorcycles, compared to an average -50% reduction in Cars/Vans.

Traffic- Modal Split-

There was a clear shift in April 2020 with a decrease in the proportion of cars and an increase in the proportion of good vehicles. With the implementation of a third lockdown in January 2021, the proportion of cars and goods vehicles have increased against lockdown 1 levels but the absolute counts of motor vehicles are still much lower than pre-covid levels. This change in proportionate split when compared to the first lockdown is mainly due to a reduction in the number of cyclists and pedestrians on the road, as weather conditions have worsened.

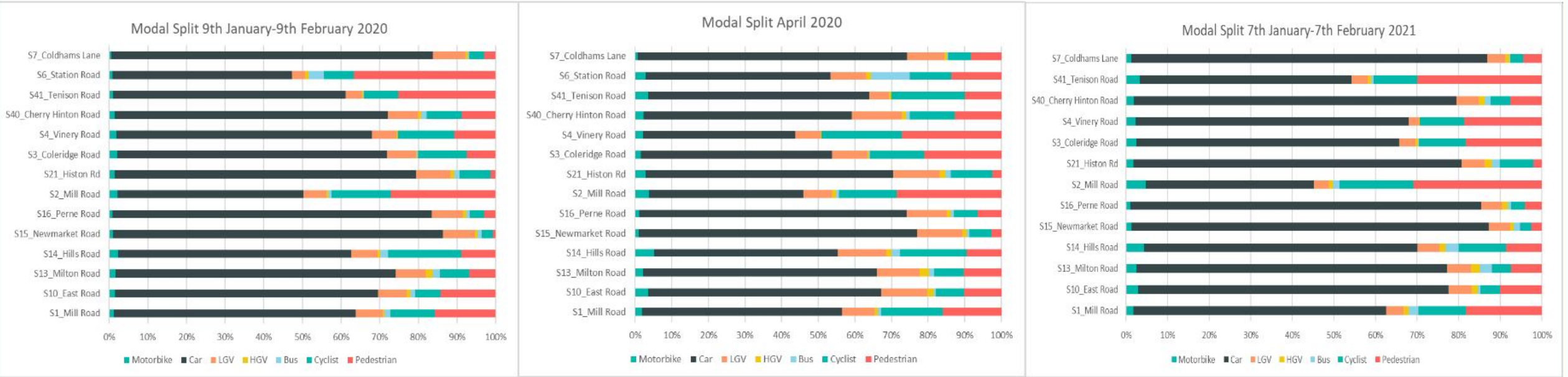


- Across all the sensors combined there was a increase in the proportion of cars and an increase in the proportion of goods vehicles in January 2021 compare to the first lock down in April 2020. This is mainly due to the proportion of Cyclist and Pedestrians decreasing compared to the first lockdown in April, this is likely influenced by the weather conditions.
- There has been a slight increase in the proportion buses on the road compared to the first lockdown, as many services have not reduced to levels seen during the first lockdown.

Traffic- Modal Split-

The overall proportionate modal split of vehicles in January 2021 is similar to that of January 2020, with slightly lower proportions of cyclists and pedestrians, and higher proportions of cars. There was a clear shift in April 2020 with a decrease in the proportion of cars and an increase in the proportion of goods vehicles and cyclists.

Modal Split of Motor Vehicles across Vivacity Sensors



Counts for Station Road were unavailable in the latest month

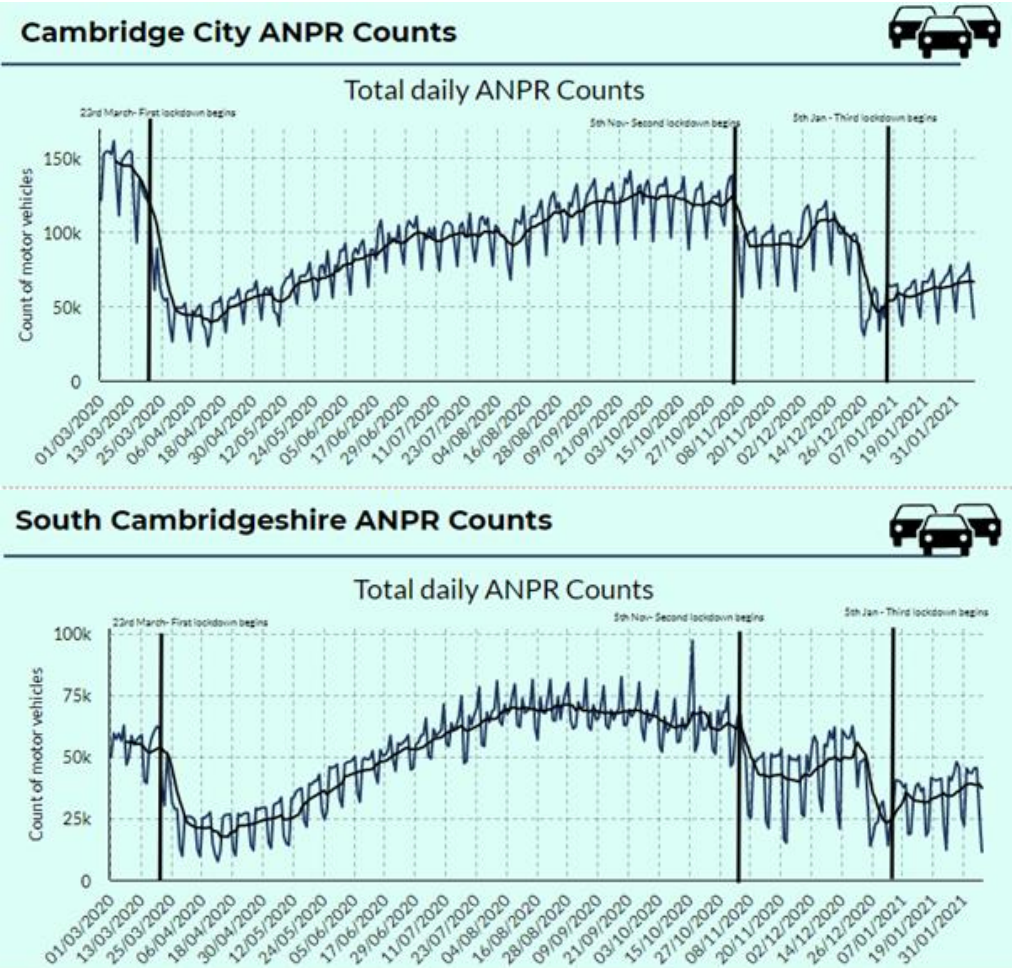
- The modal split in the latest month is showing lower proportions of cyclists and pedestrians across most sensors when compared to the same time as last year and April 2020.
- Overall, modal split in the latest month is showing more similar patterns to the same time last year than in April 2020, across all sensors (except for Mill road – but this is influenced by the closure of the Bridge since June 2020). However, the time of year and colder weather should again be noted as a key contributory factor.

Traffic Overview- Motor Vehicles ANPR Counts (Cambs Police)-

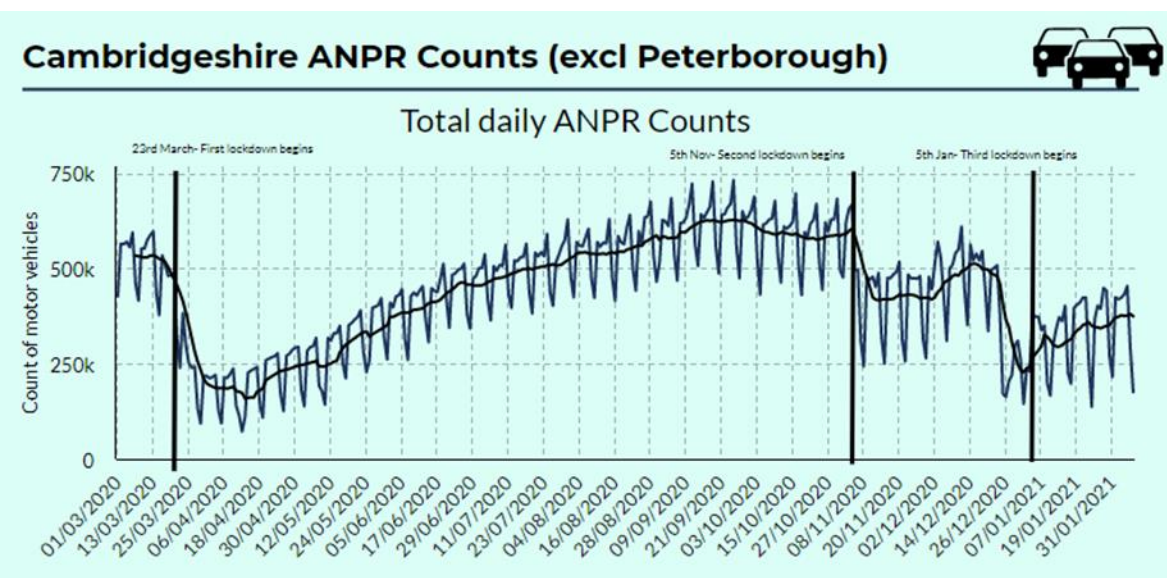
To help our understanding of traffic flow trends, Cambridgeshire Constabulary have been supporting through sharing total ANPR reads from their network of cameras at a district level. These cameras serve an operational function for the constabulary and are not designed nor installed for traffic monitoring. Rather, the headline reads should be used as a guide for overall flows.

Due to the cameras serving an operational function and the constabulary being unable to disclose the exact location of these cameras, more detailed analysis of locations or peak time flows is not possible. Therefore, it is not possible to say where exactly in the city or county these counts are, but trend analysis of daily counts over time is possible.

Cambridge and South Cambridgeshire Police ANPR Counts -01/03/2020-07/02/2021



Cambridgeshire Police ANPR Counts -01/03/2020-07/02/2021



- There have been further decreases in overall police ANPR reads since introduction of the third lockdown on 5th Jan 2021
- During January **overall Cambridgeshire traffic counts were -25% lower** than December. **Overall traffic counts were -34% lower in Cambridge and -24% lower in South Cambridgeshire.**

Air Pollution - It should be noted that Air Quality levels have been monitored by Cambridge City Council through the period of restrictions with the latest update currently covering headline data until the end of January 2021.

Overall **-14% reduction** of average levels of Nitrogen Dioxide (NO₂) recorded across all monitoring locations in January 2021, compared to average NO₂ measurements in January in 2017-2019.

All sites continued to record a fall in air pollution compared with the average of the data for the previous 3 years.

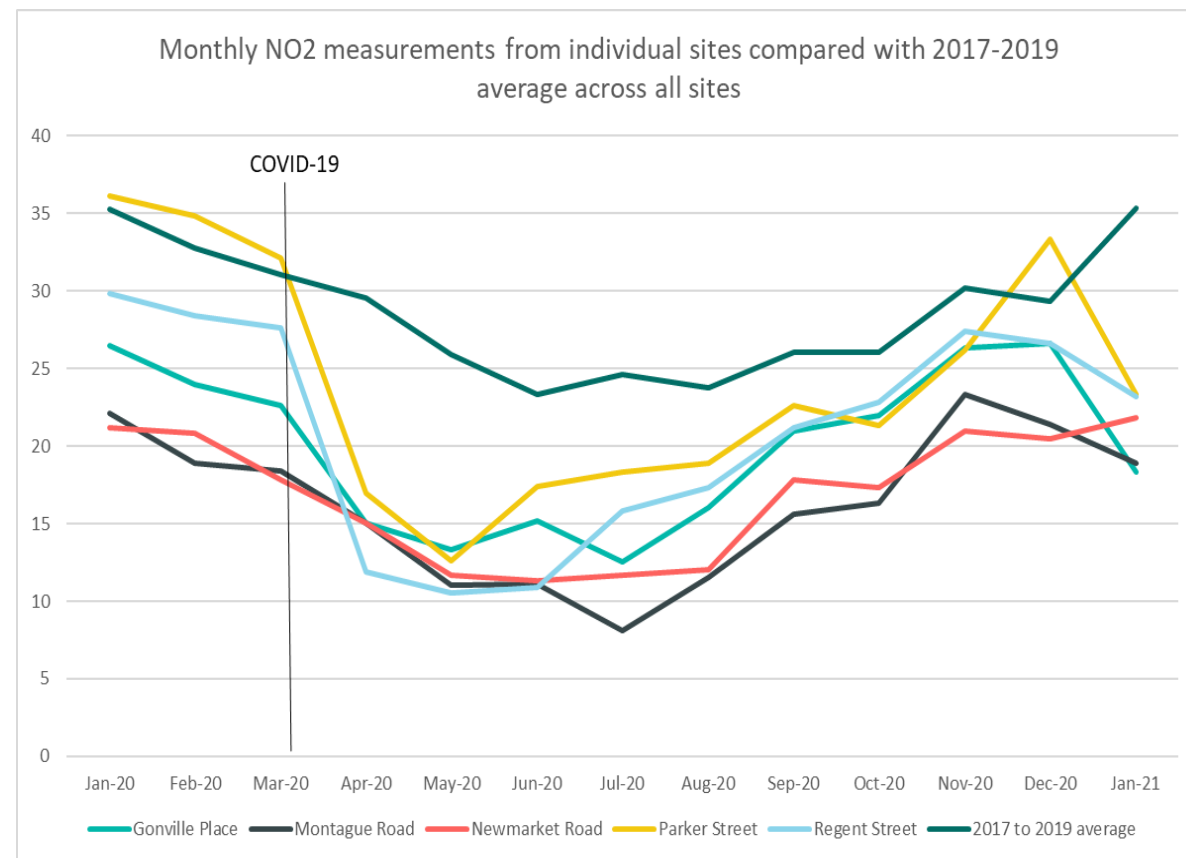
The air pollution measurements for January 2021 were on average lower by 4.6 micrograms per cubic metre than in December 2020; although this can vary as weather conditions change, **this is a bigger change than usual, influenced by tougher restrictions at the end of December and a national lockdown at the beginning of January.**

The average nitrogen dioxide measured in January 2021 was 6 micrograms per cubic metre lower than in January 2020. **The greatest difference was at Parker Street and the smallest difference was at Newmarket Road.**

More detailed analysis undertaken by Air Quality England examined the impact of reduced traffic flows and Industry on NO₂ concentrations throughout lockdown. They found that reduced emissions from traffic and industry are being seen in the measurements. Further information is available here:

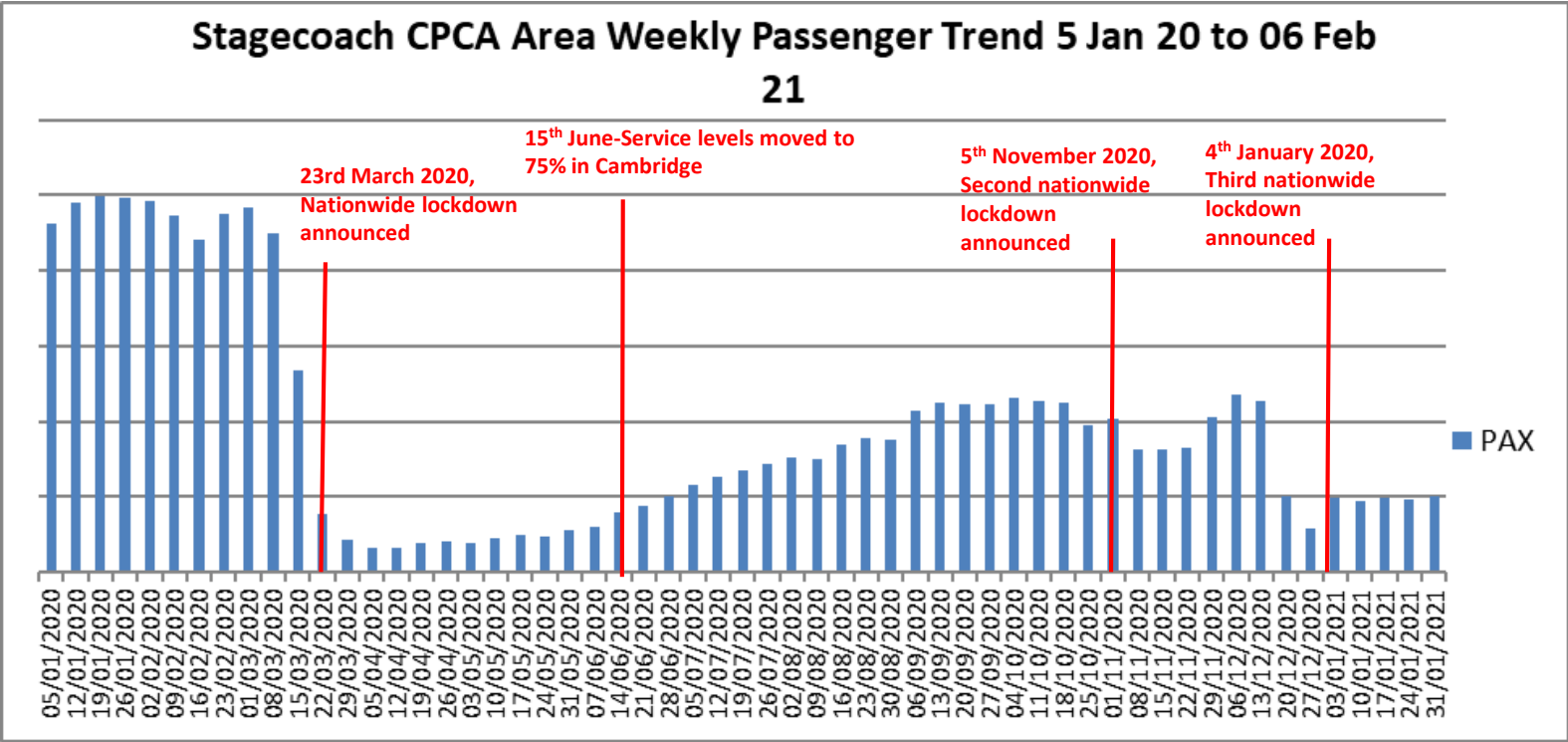
https://www.airqualityengland.co.uk/assets/reports/51/Cambridge-report_covid_analysis.html

Average NO₂ (micrograms per m³) reading by individual monitoring location, by month (including city wide average between 2017 and 2019)



<https://www.cambridge.gov.uk/air-pollution-during-the-coronavirus-lockdown>

Public Transport Use- To support the understanding of the return to public transport, Stagecoach have been sharing weekly updates with Cambridgeshire County Council Research Group . Due to the commercial sensitivity of this data, absolute counts of bus use have not been supplied. Rather, trend charts have been supplied to show when the reduction in patronage took place and where existing levels are currently at within this context.



Overall bus patronage remained stable through the whole of January with very little change week on week. Current levels of ridership are approximately -80% lower than the same point last year.

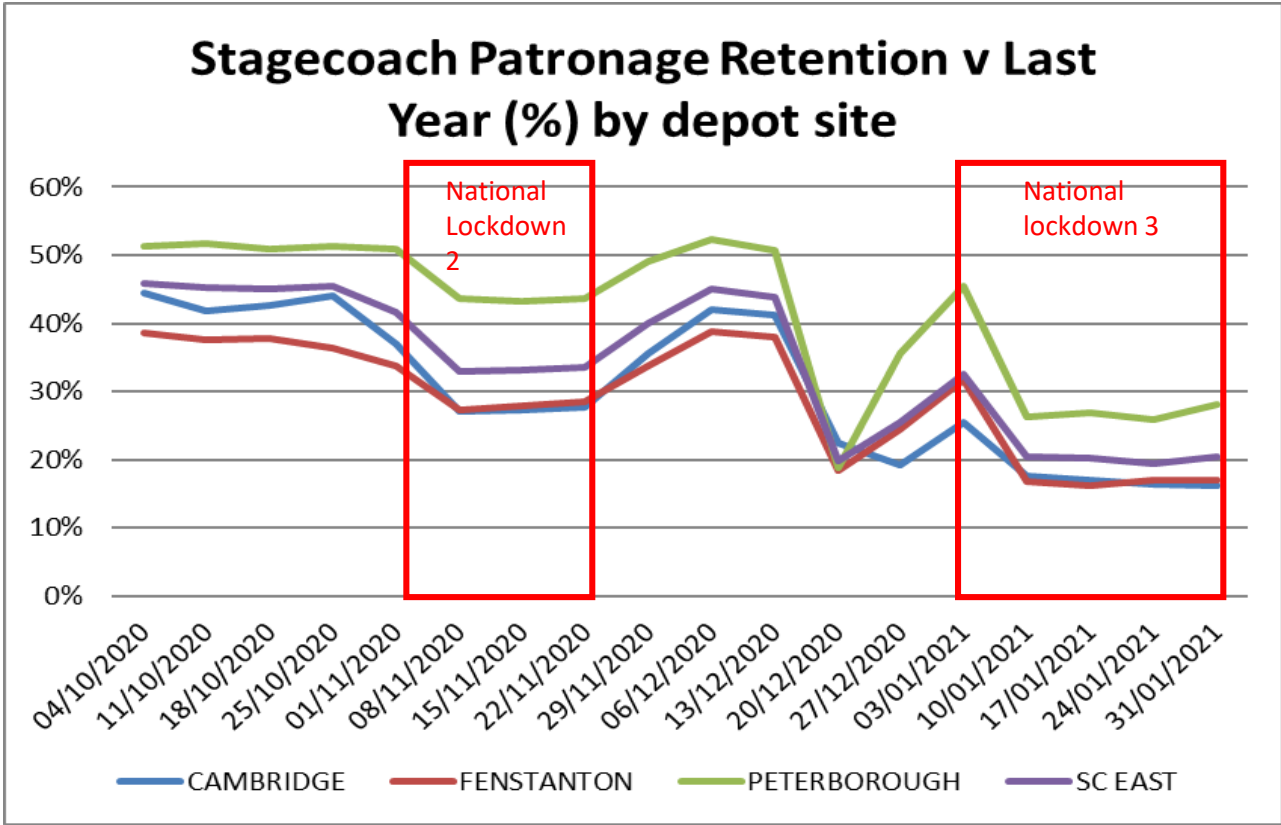
Park and Ride only services have been suspended during the third national lockdown, a reflection of the change in restrictions with the closure of non-essential shops and the work from home message.

Public Transport Use-

To support the understanding of the return to public transport, Stagecoach have been sharing weekly updates with Cambridgeshire County Council Research Group . Due to the commercial sensitivity of this data, absolute counts of bus use have not been supplied. Rather, trend charts have been supplied to show when the reduction in patronage took place and where existing levels are currently at within this context.

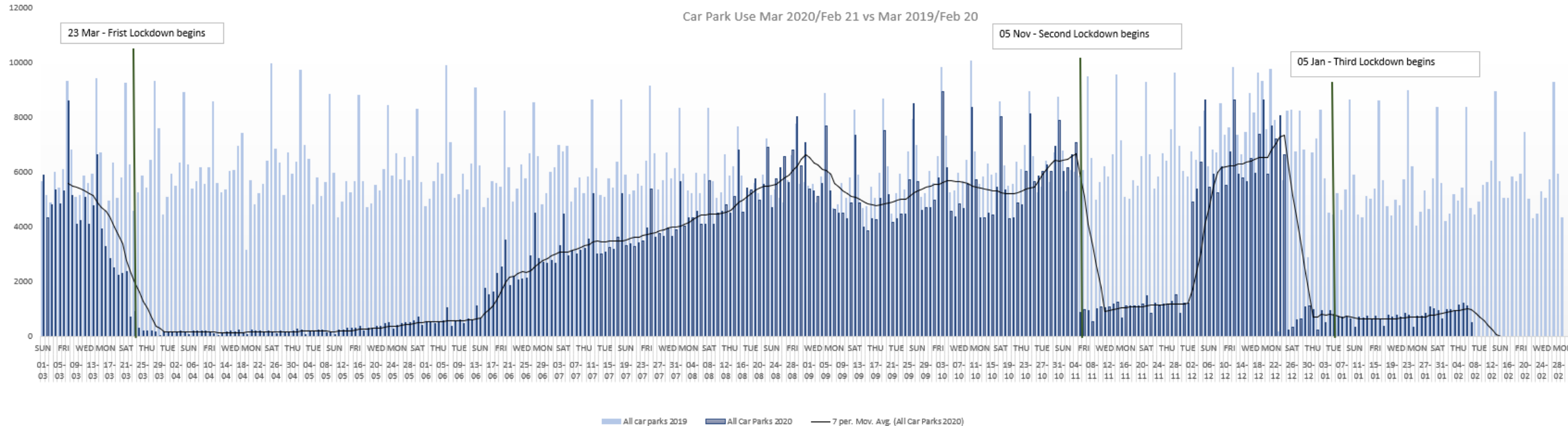
- The chart to the right shows that reductions in bus use that have been seen across the whole of the Cambridgeshire and Peterborough area. Reductions have been higher in Cambridge than Peterborough, likely to be reflective of industry and the ability to work from home.
- In the latest week of data (to 6 February 2021) bus use in and around the Greater Cambridge area was around -84% lower than the same point last year.

Stagecoach East: Weekly bus patronage as a % recovery against expected levels, by depot site- 04/10/20-06/02/21



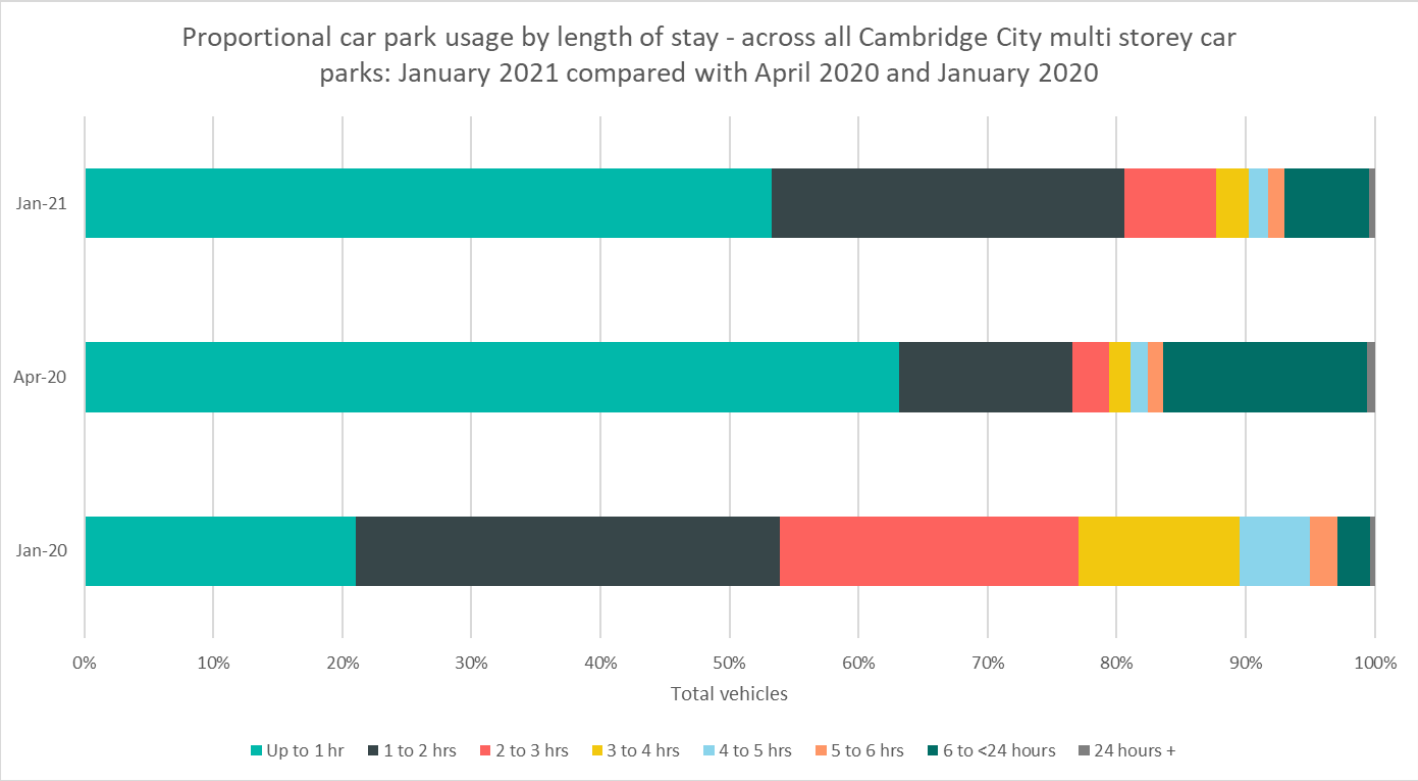
Parking occupancy- Summary

Cambridge City total car park usage 2020/21 compared to 2019/20



- Overall parking counts have continued to remain flat through January during the third national lockdown. The impact of the closure of non-essential stores is clear. There was an increase in overall parking of 15% in the latest week of data (to 07/02/21) when compared to the previous week but this is against a very low base and **overall levels remains -81% lower than the same point last year.**
- Multi-storey parking remains -82% lower** than the same point last year

Parking occupancy- Length of Stay



% Change across individual car parks against the same time last year

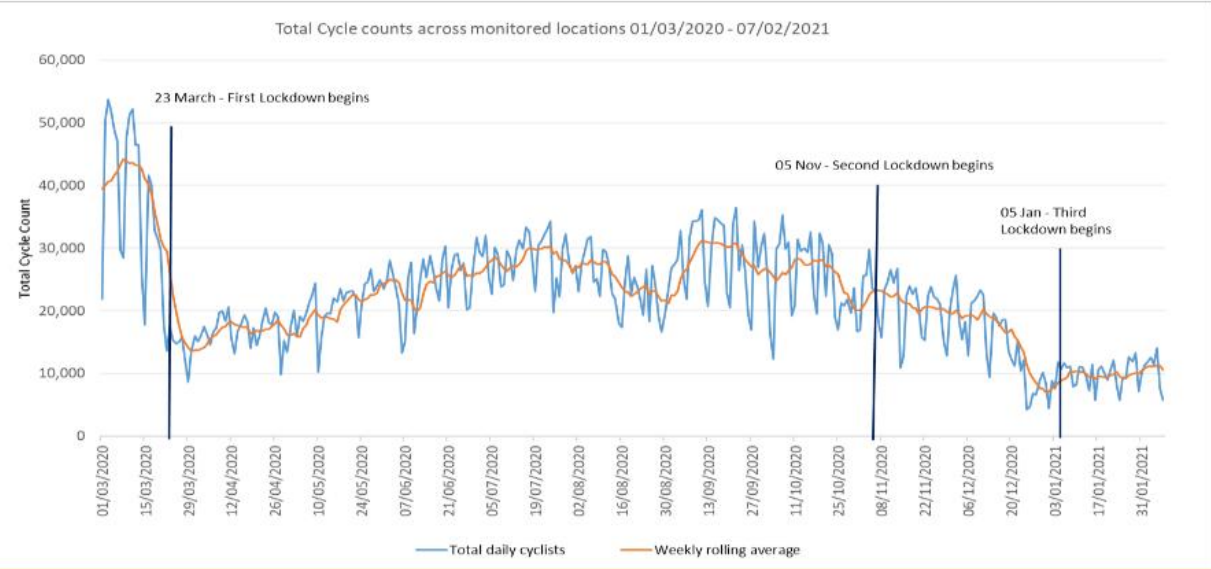
Car Park	% Difference January 2021/January 2020
Grand Arcade	-90%
Grafton East	-92%
Grafton West	-83%
Park Street	-86%
Queen Anne's	-92%

- Proportional car park usage in **April 2020** showed over 60% of users only parking for up to 1 hour.
- **January 2021** showed similar usage patterns to the first national lockdown in **April 2020**, although slightly more users were staying up to 2 hours, over 80% of all car park users left within 2 hours. This is 27% more than in **January 2020** where much higher proportions of users were staying up to 3 and 4 hours.

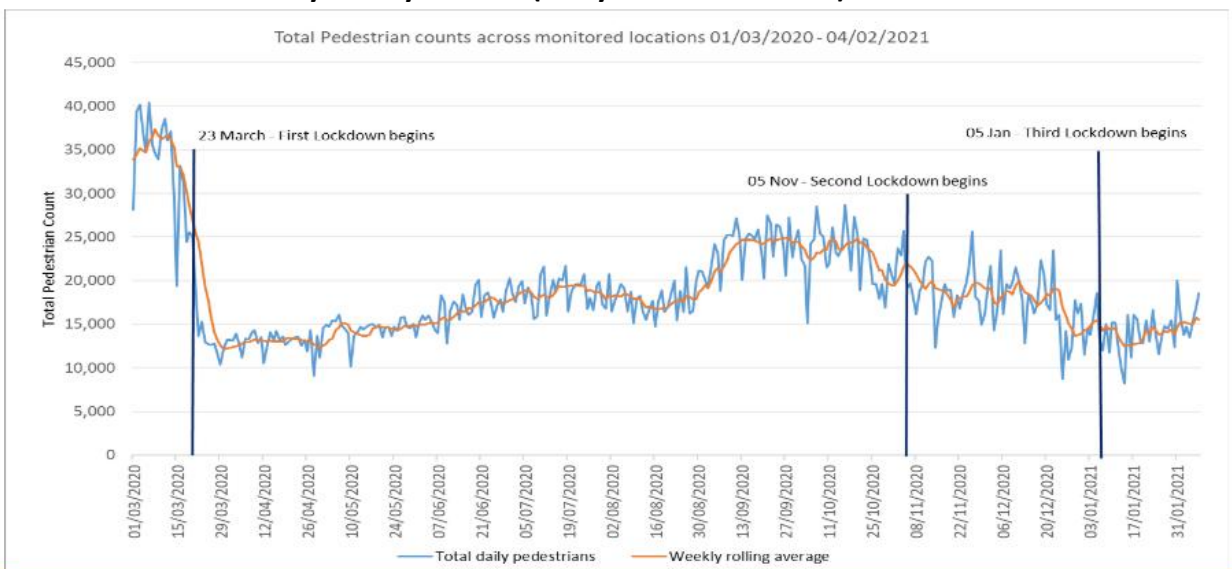
Cycling and Walking

-35% reduction in average daily cycling counts and **-20% reduction** in average daily pedestrian counts (areas away from main retail sites, averaged across monitored locations) in January 2021 compared to December 2020

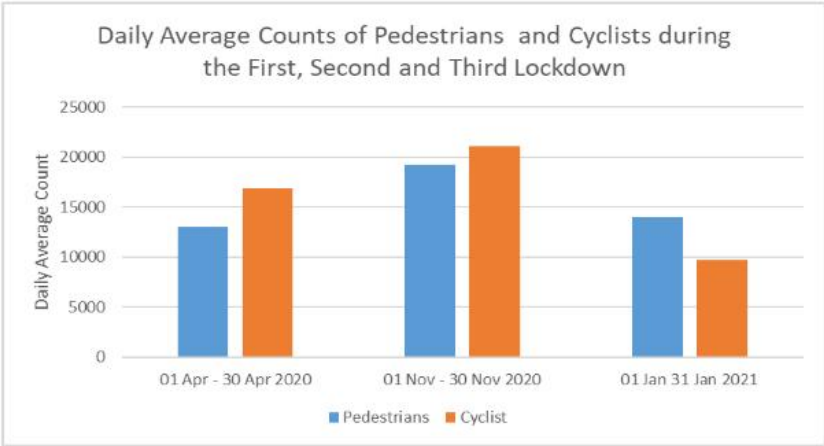
Cyclists recorded across sensors and CA counters from 01 Mar 20 to 07 Feb 21



Pedestrians recorded by 22 city sensors (away from retail areas) from 01 Mar 20 to 07 Feb 21

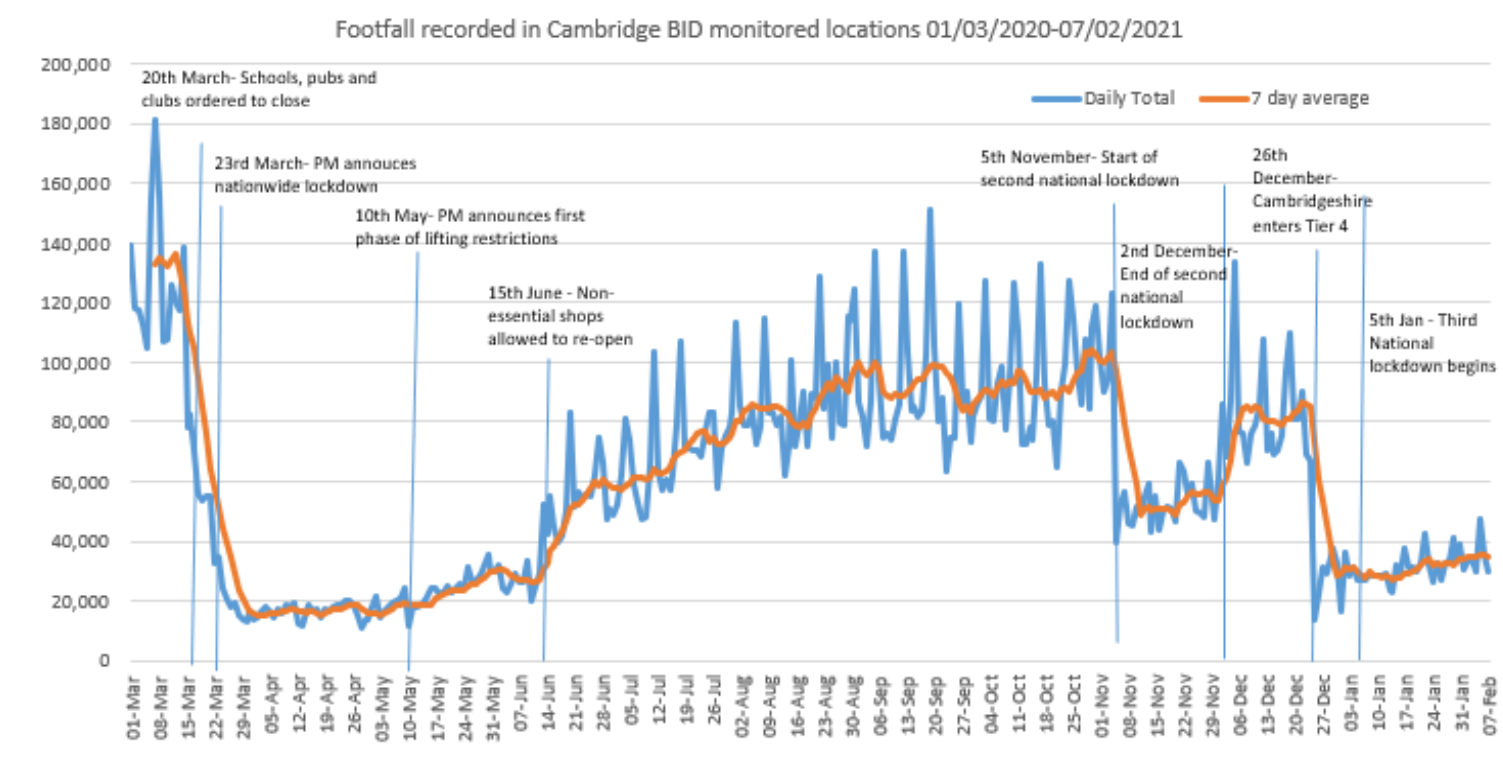


- When comparing January 2021 to December 2020 there has been a **-35% reduction in cyclists** and a **-20% reduction in pedestrians**.
- January saw decreases in both average daily cycle (-54%) and pedestrian counts (-27%) when compared to the second lockdown November. This was likely influenced by the introduction of the third lockdown and a worsening of weather conditions.



Cambridge City- Overall Retail Footfall

Daily Recorded Footfall in all Cambridge BID retail locations



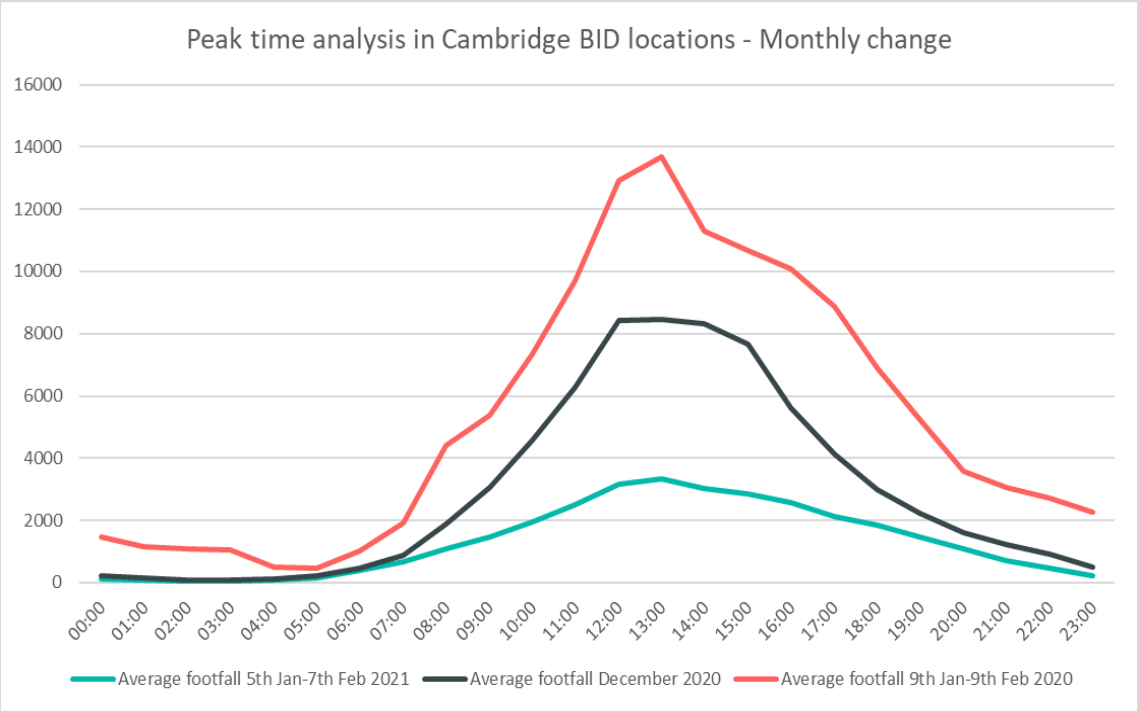
Comparing average daily footfall in January 2021 against December 2020 shows a **-56% decrease in overall footfall**, this highlights the impact of the third national lockdown which began on the 5th of January.

Overall retail **footfall across all Cambridge City locations has seen little change over the past few weeks, with a 1% increase** when comparing overall counts in the latest week (01/02/21-07/02/21) to the week before (25/01/21-31/01/21).

Retail footfall is down by -67% when compared to the last week of October, just before we entered the November lockdown and down by -73% when compared to the same time last year.

Cambridge City- Overall Retail Footfall by time of day

Hourly Recorded Footfall in all Cambridge BID retail locations*- *Comparing the latest month to the month before and the same point last year*

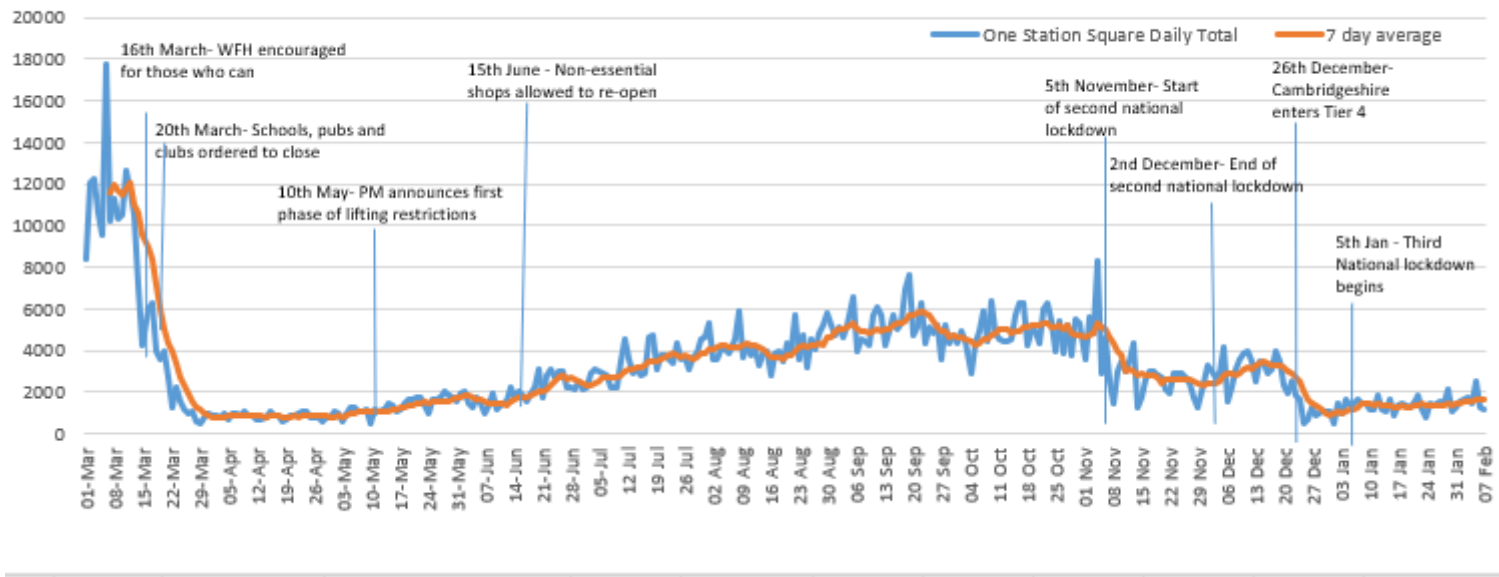


Time of day analysis highlights that peak times had started to return in December 2020, however since we have entered another national lockdown, the -56% decrease in footfall from December to January has been spread throughout the day, with only a small lunchtime peak evident under the current restrictions.

Footfall at One Station Square-

Daily Recorded Footfall at One Station Square only

Footfall recorded at One Station Square 01/03/2020-07/02/2021



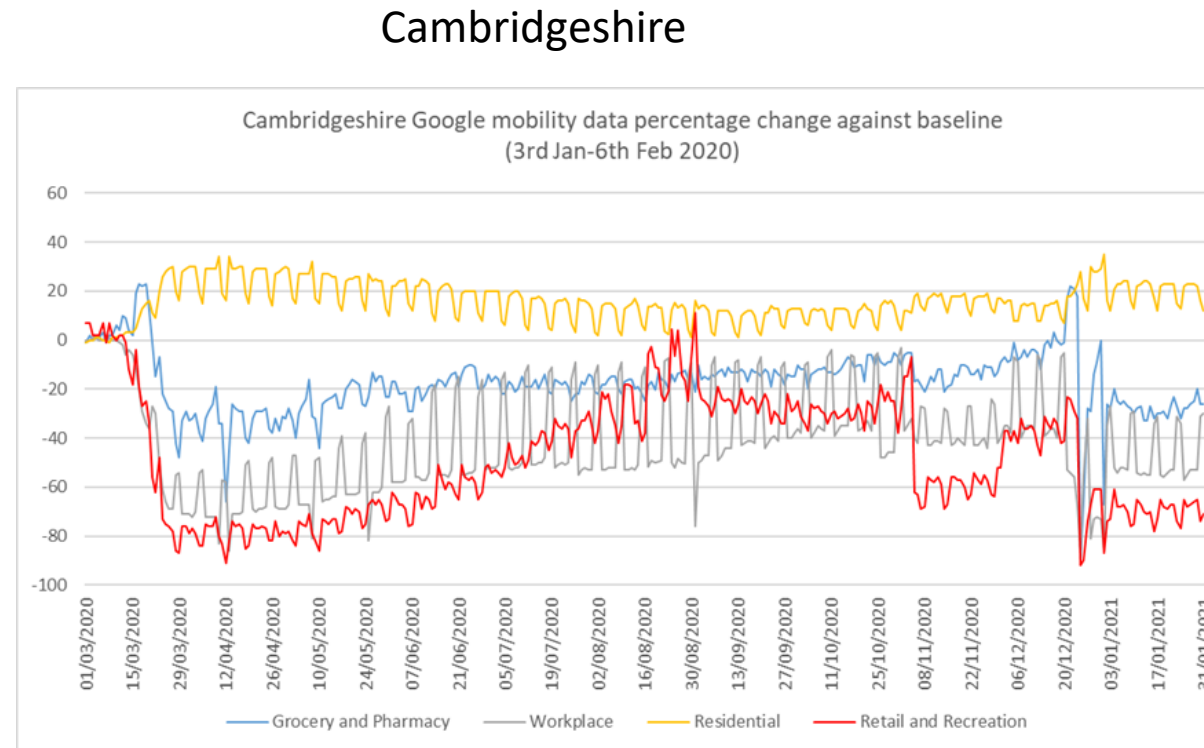
Comparing average daily footfall in January 2021 against December 2020 shows a **-46% decrease in footfall at One Station Square**, this highlights the impact of the third national lockdown which began on the 5th of January.

Overall retail **footfall across at One Station Square locations increased by 10%** when comparing overall counts in the latest week (01/02/21-07/02/21) to the week before (25/01/21-31/01/21), although this is against a very low base.

Overall footfall at One Station Square is down by **-69%** when compared to the last week of October, just before we entered the November lockdown and down by **-85%** when compared to the same time last year.

Google Mobility Data- Cambridgeshire-

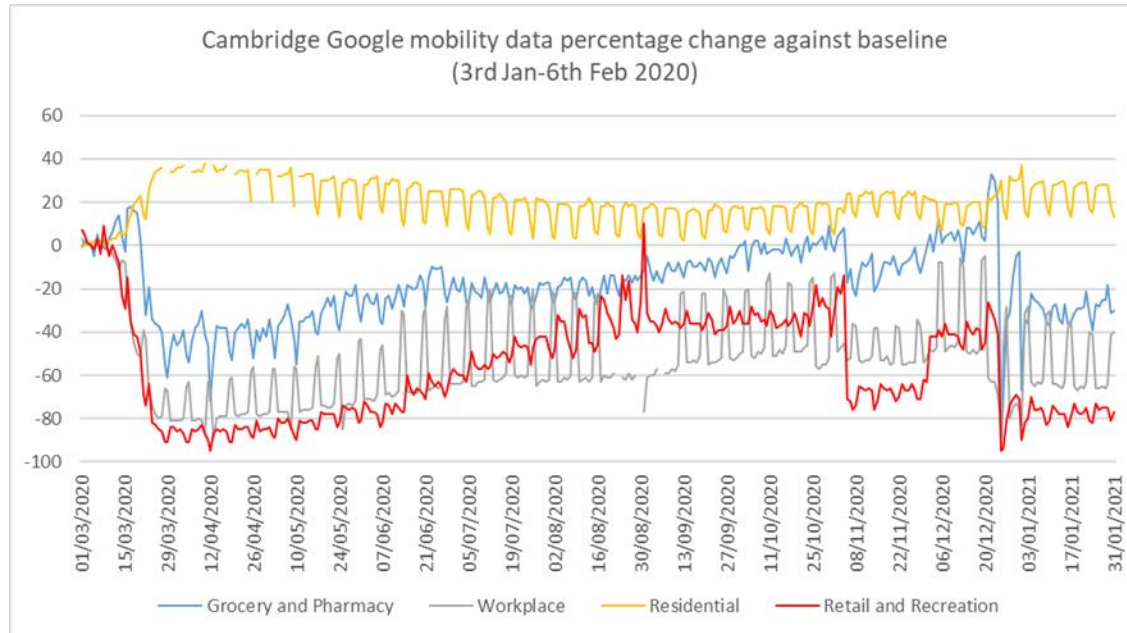
Data gathered from Google account holders location history. The comparison of social mobility change is based on the most recent several weeks up to the report date (31st January) compared to the median of the corresponding day in the baseline period (3rd Jan-6th Feb 2020)



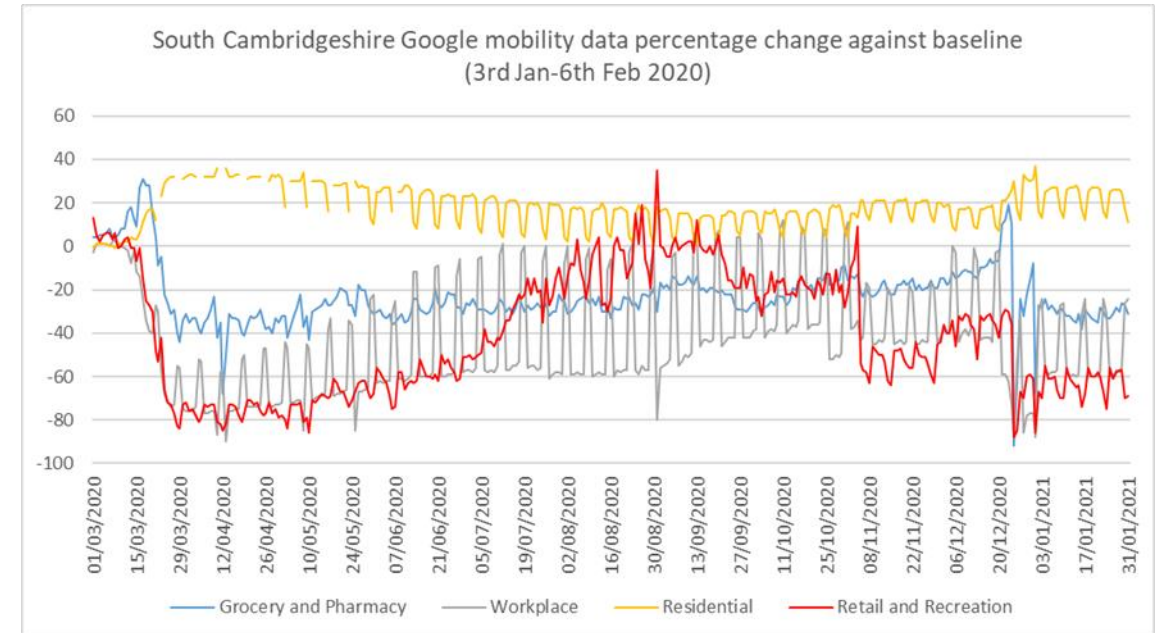
- Grocery visits were **-3% further away from the baseline in the 7 days to 31st January** compared to the 7 days prior and are now **-26% below the baseline**.
- **Workplace visits** were **-1% further from the baseline** in the last 7 days compared to the 7 days prior and are now **-47% below the baseline**.
- **Residential visits** were **did not change** in the last 7 days and are **20% above the baseline**.
- **Retail and Recreation** visits were **-2% further away from the baseline** in the 7 days to 31st January compared to the 7 days prior and are now **-68% lower than the baseline**.

Google Mobility Data- Districts-

Data gathered from Google account holders location history. The comparison of social mobility change is based on the most recent several weeks up to the report date (31st January) compared to the median of the corresponding day in the baseline period (3rd Jan - 6th Feb 2020)



- Grocery visits were **-3% further from the baseline in the 7 days to 31st January** compared to the 7 days prior and are now **-26% below the baseline**.
- **Workplace visits did not change** in the last 7 days compared to the 7 days prior and are **-58% below the baseline**.
- **Residential visits were -1% further from the baseline** in the last 7 days and are now **24% above the baseline**.
- **Retail and Recreation visits were -2% further from the baseline** in the 7 days to 31st January compared to the 7 days prior and are now **-76% lower than the baseline**.



- Grocery visits were **-3% further from the baseline in the 7 days to 31st January** compared to the 7 days prior and are now **-29% below the baseline**.
- **Workplace visits were -2% further from the baseline** in the last 7 days and are now **-49% below the baseline**.
- **Residential visits were -1% further from the baseline** in the last 7 days compared to the 7 days prior and are now **22% above the baseline**.
- **Retail and Recreation visits were -1% further from the baseline** in the last 7 days compared to the 7 days prior and are now **-61% lower than the baseline**.



Travel Hub Design Principles

Final Report

February 2021

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Greater Cambridge
Partnership

Travel Hub Design Principles

Final Report

February 2021

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1 Introduction

1.1 Background

The Greater Cambridge Partnership (GCP) has been developing a number of multi-modal travel hubs around the Greater Cambridge area as part of a wider transport package, developing the sustainable transport offer for the city region, and facilitating the use of non-car modes for all or part of the journey.

The development of the emerging Cambridgeshire Autonomous Metro (CAM) scheme has provided additional impetus for the development of travel hubs and emphasised the ‘network’ aspect of travel hubs within a growing city region.

Multi-modal travel hubs will increasingly play a key role in travel in the Greater Cambridge area – particularly for a rural population with traditionally poor access to public transport.

1.2 Aims of this paper

This paper aims to provide some key principles for the design and development of travel hubs that will:

- Drive an integrated approach to the development of travel hubs, both in terms of their role as defined in the Cambridgeshire & Peterborough Local Transport Plan in improving access to the transport network, and improving connectivity in a local area / corridor as well as how they function as a network supporting access to Cambridge by sustainable modes;
- Ensure travel hubs are designed with the future in mind, setting out how they can be designed to be flexible and adaptable to future developments in technology and travel behaviours; and
- Demonstrate how the design and development of travel hubs can support City Deal and partner ambitions around modal shift, improving air quality and moving to net zero carbon.

Section 2 of the paper looks at the national and local context for travel hubs, the existing network of travel hubs across Greater Cambridge and how this is planned be enhanced through the development of further travel hub sites as part of current GCP projects.

Section 3 sets out design considerations that will enable the GCP travel hubs to be developed in a way that will ensure that they can provide the interchange facilities and services required, and can continue to do so as the transport network continues to evolve.

Appendix A looks at the future considerations for designing travel hubs, and Appendix B provides a review of travel hub examples from the UK and Europe.

2 Local and National Context

2.1 National Background

The Department for Transport's (DfT) Transport Investment Strategy (2017) recognises the need to “add new capability to the urban network” both to “transform travel in particular corridors” and “provide opportunities for the travelling public to make journeys in a new way”. The DfT (2017) states that these “new opportunities” can be provided in several different ways, which are summarised below:

1. Creating new routes;
2. Investing to better integrate different parts of the network; and
3. Delivering step-changes in capacity by bolstering existing routes with stretches of new infrastructure.

The alignment of the principles of multimodal integration with points 2 and 3 above demonstrates that the development of new transport interchanges, where the private car is not the only mode of access, supports the DfT's agenda of sustainable transport investment. Multi-modal integration through the development of schemes such as travel hubs, thus has the potential to play a crucial role in improving the connectivity, accessibility and capacity of the transport network.

Several cities and city-regions have adopted travel hubs as a means of delivering this integration and providing the step-change in access to new and improved transport networks.

2.2 Local Context

2.2.1 Supporting the City Deal

The Greater Cambridge Partnership was formed as the delivery body for the Greater Cambridge City Deal, bringing investment to the area to support the creation of 44,000 new jobs and 33,500 new homes.

Part of the GCP's remit is to address the transport challenges faced by the region over the next decade and beyond. The GCP's (pre-pandemic) forecasts suggest that if action is not taken, then by 2031:

- Traffic in Cambridge will increase by over 30% in the morning peak;
- Traffic in South Cambridgeshire will increase by almost 40% in the morning peak; and
- The time spent in congestion will more than double.

To address these challenges the GCP is developing schemes to deliver public transport improvements on four key corridors – outlined below – as well as delivering an extensive network of cycle-ways. These improvements aim to keep the Greater Cambridge area well connected regionally and nationally, and connect people to homes, jobs, study and opportunity. Travel hubs will play a key part in improving access to these networks.

2.3 Travel Hubs in Greater Cambridge

2.3.1 Local Transport Plan Guidance

Locally, the Cambridge and Peterborough Combined Authority (CPCA) provides some guidance within the Local Transport Plan on what a travel hub might be expected to include:

A place of transport interchange providing easy access to the whole transport network with cycle parking, taxi call points and access to car club vehicles, drop off points and at larger locations park and ride facilities.¹

While this includes reference to specific modes of transport which may be included in a travel hub, the reference to easy access to the whole transport network encompasses the main aim of the sites.

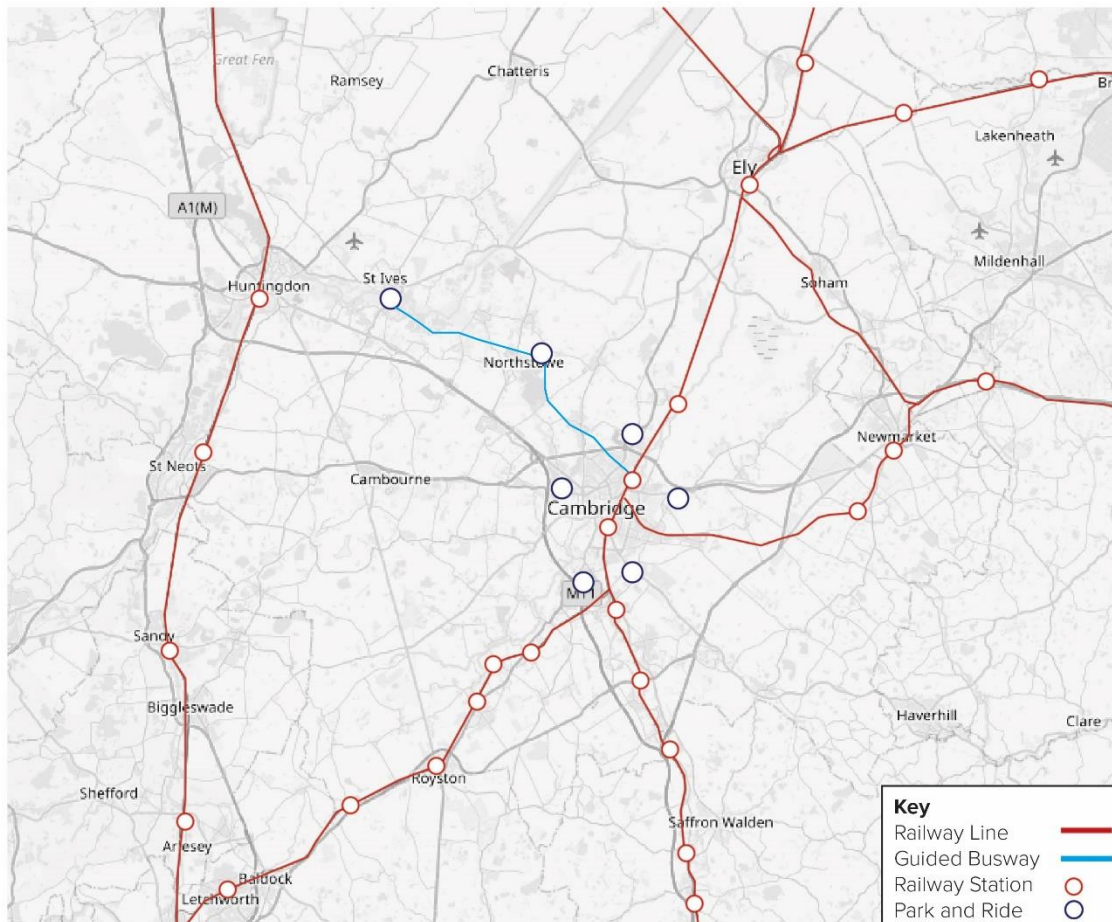
2.3.2 Existing Travel Hub Network

Figure 2.1 shows the existing network of Park & Ride sites² and rail stations across Greater Cambridge and the wider area.

¹ The Cambridgeshire & Peterborough Local Transport Plan, CPCA, 2020

² Park & Ride is used in this report to relation to existing Park & Ride sites and services and where Park & Ride is referred to in other plans and reports

Figure 2.1: Existing Travel Hub Network



2.3.3 Relevant Projects

Figure 2.2 identifies the key projects relevant to travel hub development in the CPCA Local Transport Plan area strategy for Greater Cambridge, including:

- Cambridgeshire Autonomous Metro
- East West Rail
- A10 Park & Ride, Waterbeach
- Waterbeach Station relocation
- Milton Park & Ride expansion
- Newmarket Road Park & Ride relocation
- Newmarket to Cambridge track doubling
- Granta Park Park & Ride (A11 Travel Hub)
- Cambridge South Station
- M11 Park & Ride additional capacity (Cambridge South West Travel Hub)
- Scotland Farm Park & Ride
- Longstanton Park & Ride additional capacity

Figure 2.2: Local Transport Plan Summary of Key Projects in Greater Cambridge



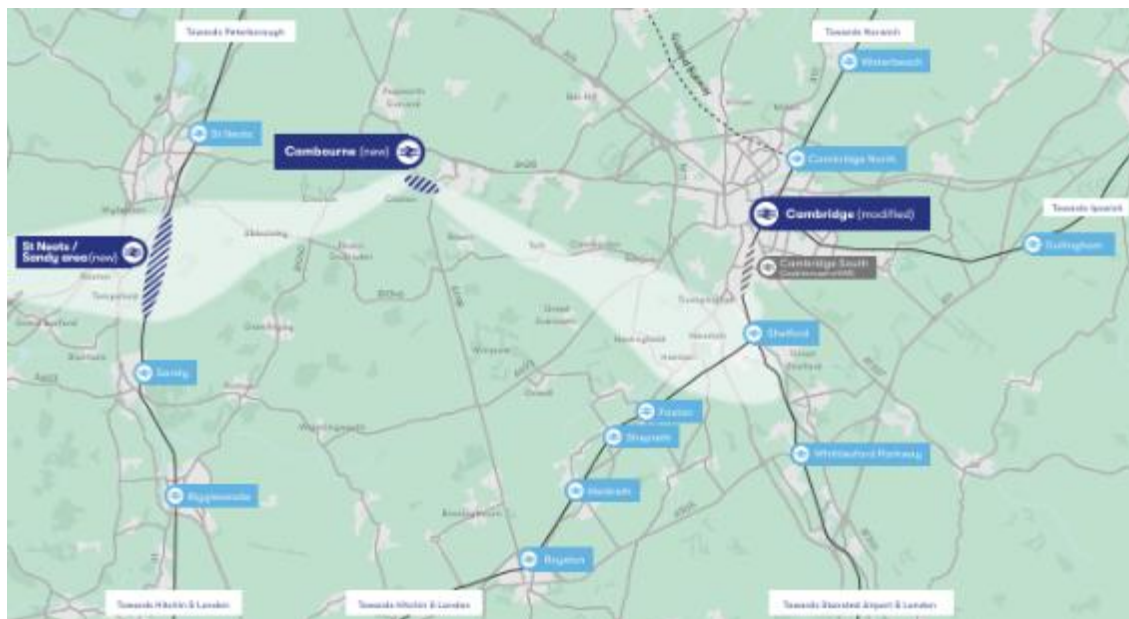
Source: The Cambridgeshire & Peterborough Local Transport Plan, CPCA, 2020

The Local Transport Plan advocates that:

Park & Ride sites will continue to provide sustainable options for those who do not have a feasible alternative to the car. These will be better integrated into surrounding local transport networks, acting as travel hubs with high-quality interchange between CAM and local bus and demand responsive services, together with the walking and cycling network

Figure 2.3 shows the currently defined preferred route option area for the part of the Central Section of the East West Rail project within Greater Cambridge. East West Rail are currently developing options for a preferred route alignment within this area. Although the exact location is currently unknown, the proposal for a new rail station at Cambourne as part of this project is relevant to travel hub development.

Figure 2.3: East West Rail Preferred Route Option Area



Source: East West Rail

2.3.4 Current GCP Projects

The GCP is currently developing a number of travel hub sites, some in conjunction with the development of a public transport route, others in areas already well served by public transport where access to the network could be improved. The current GCP projects within which new travel hubs are proposed or are options under consideration are summarised below.

Foxton Travel Hub is a proposed site adjacent to the existing rail station at Foxton, on the A10 corridor, and the Melbourn Greenway route. The plans for the site include access from the A10 active travel route, a new pedestrian route to the station at Foxton, secure cycle parking and 500 car parking spaces including EV charging and Blue Badge parking. Local bus services will serve the travel hub via relocated bus stops on the local road network.

Cambridge South West Travel Hub is a proposed site close to the junction of the A10 and M11, providing good access to the local transport network from these major routes. The plans for the site include an off-line bus route serving the site, providing services into the centre of Cambridge and the Cambridge Biomedical Campus, as well as an active travel route avoiding the M11 junction. The site will include secure cycle parking, bus terminal facilities and is intended to be the south west terminus of the future CAM network. 2,150 car parking spaces will be provided on-site, and facilities will include Blue Badge parking and solar car ports providing energy for EV charging. This project will deliver the “M11 Park & Ride additional capacity” identified as a key project in the Local Transport Plan.

The **Cambridge South East Transport** project will deliver a new public transport route between the A11 at Babraham and Cambridge. The proposed route runs from a new travel hub near the A11 Fourwentways junction to the Cambridge Biomedical Campus via Sawston, Stapleford and Great Shelford connecting to the planned Cambridge South Station and existing guided busway. This route is intended to become part of the future CAM network. The planned travel hub facilities include 350+ cycle parking spaces, a facilities building and active travel connections to the Babraham Research Campus and Granta Park, and up to 2,000 car parking

spaces. The proposed A11 Travel Hub will deliver the facility identified as “Granta Park Park & Ride” in the Local Transport Plan.

The **Cambourne to Cambridge** project is a potential public transport route to the west of Cambridge, serving the A428 corridor to Cambourne. The route is intended to become part of the future CAM network. The recommended preferred route included a new travel hub site at Scotland Farm, immediately to the north of the A428 Hardwick junction, as identified in the Local Transport Plan. Work on the project, other than preparation for the EIA, is currently paused pending an independent audit of the assumptions and constraints behind the development of the proposals.

The **Cambridge Eastern Access** project has recently consulted on options which include the relocation of the Newmarket Road Park & Ride to a larger travel hub site closer to the A14.

The **Waterbeach to North East Cambridge** project is currently consulting on options for a segregated public transport route in this corridor. This route is intended to become part of the future CAM network. Previous studies for this corridor have proposed a new A10 corridor Park & Ride site, north of Waterbeach, served by a public transport route to Cambridge and it is proposed to look at additional or relocated Park & Ride / travel hub capacity in a future stage of the project. “A10 Park & Ride, Waterbeach” is identified as a key project in the Local Transport Plan. There are separate plans for the relocation of Waterbeach rail station as part of the proposals for the New Town north of Waterbeach.

Whittlesford Railway Station was proposed in the Rural Travel Hubs feasibility study as a pilot site for the development of a Rural Travel Hub. The subsequent Whittlesford Station transport masterplan study has undertaken an in-depth look at the range of issues affecting access to the station, with a primary focus on improving sustainable transport options. The process has considered how best to meet an agreed vision to “create an accessible multi-modal travel hub which forms a strategically important interchange and gateway to facilitate sustainable local economic growth”. From this process a Transport Investment Strategy for the station area has emerged, comprising 33 proposed schemes which, collectively, are intended to achieve this vision.

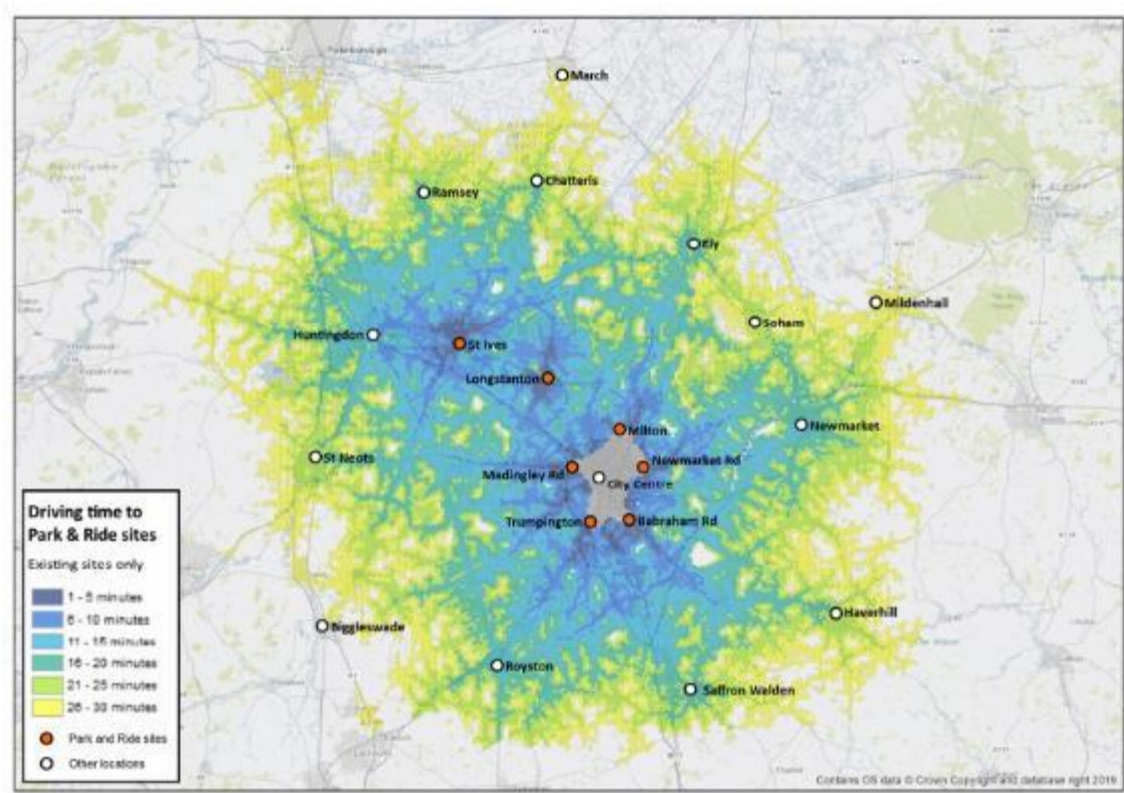
2.3.5 Park & Ride Catchments

Figure 2.4 and Figure 2.5, reproduced from the report ‘GCP Cambridge Bus Network Planning: Future Bus Network Concept’ (Systra, 2020), show the driving time, in 5 minute bands, to the nearest of the seven existing Park & Ride sites around Cambridge (Figure 2.1) and how this changes when the four proposed sites at Waterbeach, Scotland Farm, Barton and A11 / Granta Park considered by Systra are taken into account (Figure 2.5). It can be seen that the effect of the proposed sites is to reduce journey times to the nearest Park & Ride site along the corridors towards Saffron Walden, Haverhill, Ely and St Neots.

This analysis provides some insight into:

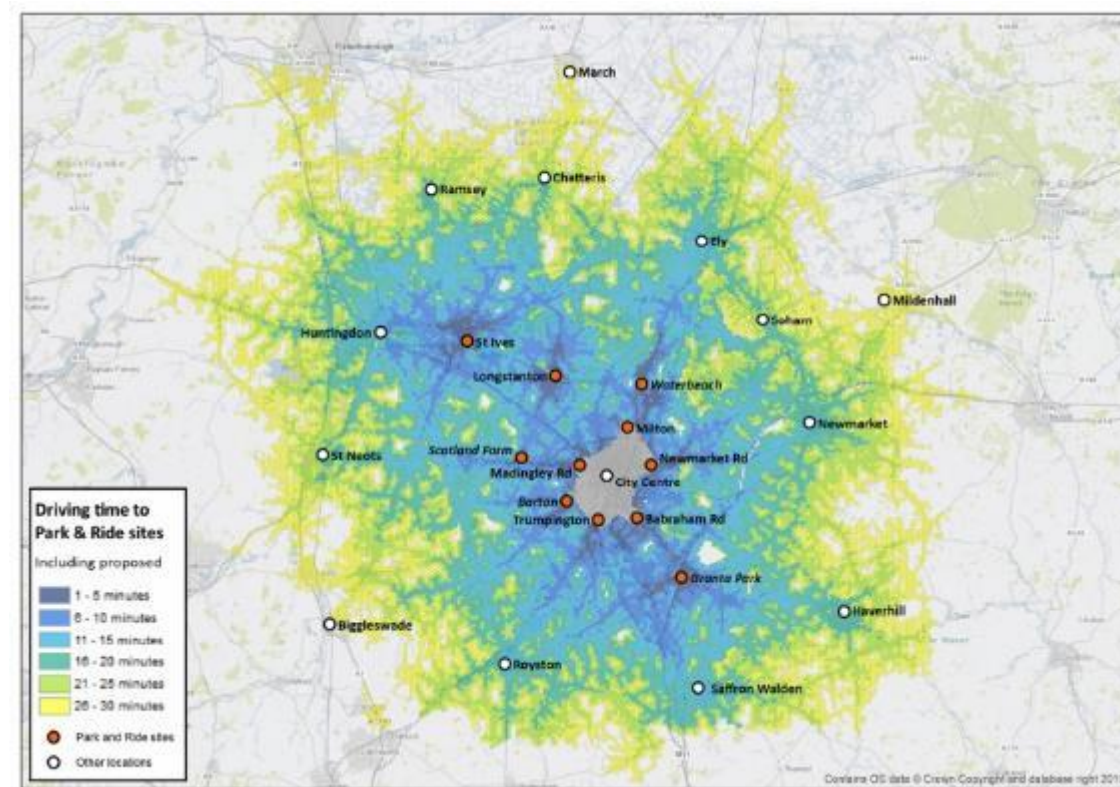
- How the development of Park & Ride / travel hub facilities at locations beyond the existing inner ring of five Cambridge Park & Ride sites can effectively extend catchments for Park & Ride; and
- The remaining areas not benefiting from good accessibility to Park & Ride / travel hub facilities assuming the proposed sites are delivered.

Figure 2.4: Driving Time to Closest Park & Ride Site (Existing Sites)



Source: GCP Cambridge Bus Network Planning, Future Bus Network Concept, Final Report, Systra, January 2020

Figure 2.5: Driving Time to Closest Park & Ride Site (Existing and Proposed Sites)



2.4 Interaction with the Wider Transport Network

2.4.1 Travel Hubs as a Network

A proven way in which travel hubs can act as a network is through common branding and marketing, for example the existing network of Cambridge Park & Ride sites. Network branding, supported by a consistent level and quality of services and facilities across the network, will encourage users familiar with one site within a network to use other sites.

The diverse nature of existing and planned travel hub sites within Greater Cambridge does impose some limitations to the wider adoption of common branding, notably at rail stations.

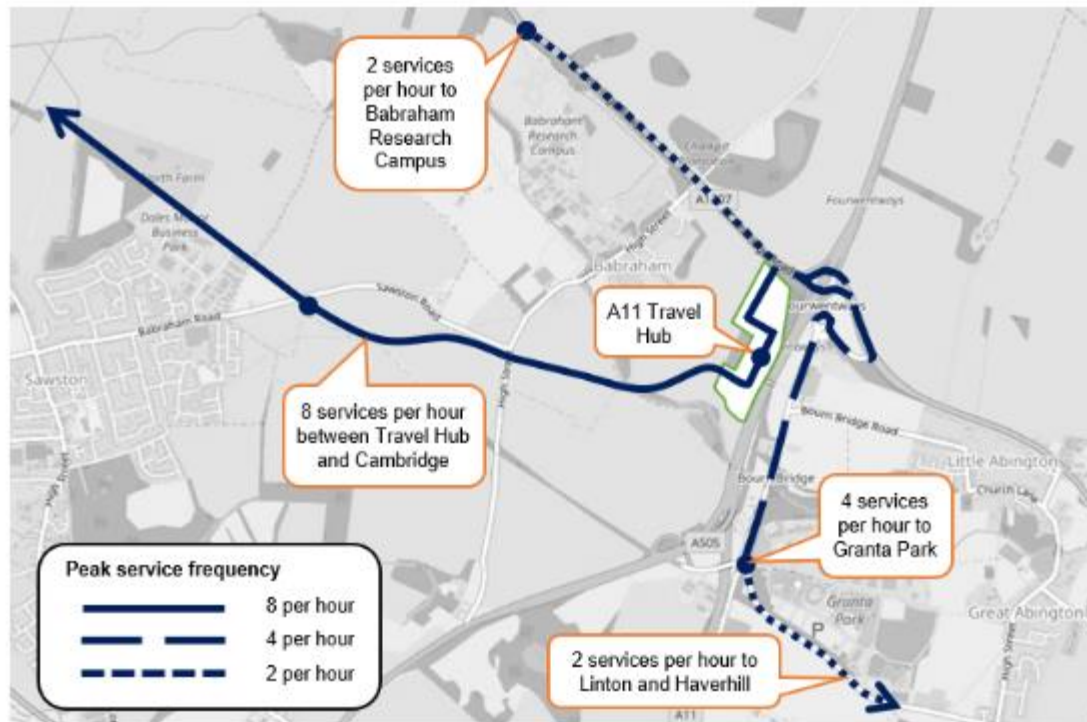
Multimodal integrated ticketing and journey planning would be required to support the use of travel hubs as a network by reducing barriers to transfer between modes and services.

The speed, frequency and quality of public transport links and choice of destinations available from the nearest travel hub and opportunities to avoid congestion and delays on the highway network are key to drawing people towards their nearest travel hub rather than the one closest to their destination. Opportunities should be sought to develop new public transport routes from existing travel hubs to nearby major employment sites to complement established links to central Cambridge. An existing example of this approach is the Trumpington Park & Ride site, from which buses operate to the Cambridge Biomedical Campus as well as the railway station and city centre.

The A11 Travel Hub being delivered as a key element of the Cambridge South East Transport project will further develop this approach by accommodating through public transport services

operating beyond the travel hub to Babraham Research Campus, Granta Park, Linton and Haverhill as shown in Figure 2.6.

Figure 2.6: Proposed Public Transport Links from A11 Travel Hub



The A11 Travel Hub is also located on the existing core bus route between Haverhill and Cambridge and in a location suitable to act as a terminus for rural feeder or demand responsive transport services, such as the rural connector service from Carlton, Brinkley, Weston Colville, West Wickham, West Wratting and Balsham proposed in the report 'GCP Cambridge Bus Network Planning: Future Bus Network Concept' (Systra, 2020).

The public transport network proposition for the Cambourne to Cambridge project includes services from the Scotland Farm Travel Hub to West Cambridge and the Cambridge Biomedical Campus. The Future Bus Network Concept includes a half hourly direct service from Haverhill to West Cambridge via the A11 Travel Hub and the Cambridge Biomedical Campus. This service would overlap with the proposed service from Scotland Farm Travel Hub to West Cambridge and the Cambridge Biomedical Campus.

Examples of cross-city bus services exist in Oxford and Norwich, where park and ride sites to the east/west and north/south of the city are linked via the city centre. However, such operations depend on appropriate bus priority measures within or on the approaches to the city centre to enable reliable operation and mitigate the impact of congestion at one end of the route leading to delays being imported to the other end of a cross-city route.

Any services developed to connect travel hubs directly would also need to serve other key trip attractors to avoid the need for journeys requiring multiple interchanges. However, as the commercial viability of orbital services is typically challenging, proposals for orbital connections between travel hubs should seek to minimise overlap between orbital services. Where there is a justification for overlapping services, timetables should be coordinated, and the combined level of service aligned with demand. The relative merits of enabling journeys to be made by a single

transfer between two high frequency services versus the provision of low frequency direct services should be considered in these circumstances.

Travel hubs on the network may be specialised in some ways by incorporating different elements within the travel hub components described in Figure 3.1 to allow them to take on specific functions. The functions will depend on the local conditions. For example, proximity to the motorway or trunk road networks may provide opportunities for an interchange with scheduled coach services, or a site closer to the city centre may provide greater opportunities for freight micro-consolidation and last mile deliveries by bike. Additional functions or local specialisms such as these will influence the elements required at the travel hub site.

Where travel hub sites are located in the Green Belt, planning policy and requirements are likely to restrict the choice of components to those which can be clearly identified as “local transport infrastructure”.

2.5 Other Relevant Studies

The **Future Bus Network Concept** study undertaken for GCP by Systra³ has developed proposals for new and enhanced bus services that seek to maximise the potential of current and proposed public transport infrastructure, such as the first phase of CAM, railway stations and Park & Ride / travel hub sites. The proposals for the core network reflect the existing proposals for new travel hub sites at A11/Granta Park, Scotland Farm and Waterbeach. The concept for the rural network is to improve connections from outlying areas to key interchange hubs on the core network, with proposals that most rural services feed into key hubs/corridors on the periphery of Cambridge. The Systra proposals for the Cambourne and St Neots corridor also considered a further new Park & Ride site at Barton, close to M11 junction 12.

Rural Travel Hubs Study – a 2017 feasibility study commissioned by GCP and South Cambridgeshire District Council considered the potential for Rural Travel Hubs to be developed within South Cambridgeshire. Through a consultation and engagement process the study developed the following local definition of a ‘Rural Travel Hub’:

A transport facility that serves as an interchange, close to existing transport corridors (that are served by a reliable and relatively frequent public transport service), where residents in rural areas can walk, cycle or drive to and continue their onward journey using a sustainable mode of travel.

This study concluded that the operation of Rural Travel Hubs in South Cambridgeshire is potentially viable and that they are likely to be supported by local communities, serving to encourage more use of sustainable travel for journeys into Cambridge from outlying parishes.

³ GCP Cambridge Bus Network Planning, Future Bus Network Concept, Final Report, Systra, January 2020

3 Design Considerations

3.1 Introduction

This section introduces the main design issues to be considered in the development of travel or mobility hubs⁴. The components considered here reflect the broad aims of a travel hub, but each site will have local design considerations depending on the location, proximity to home and work locations, planning requirements and availability of transport modes.

3.2 Travel Hub Features

The interpretation of what constitutes a travel hub varies significantly, emphasising the importance of identifying and responding to local requirements and avoiding a 'one size fits all' approach. However, the principles of what constitutes a travel hub can be applied across the board.

CoMoUK – the UK based organisation promoting shared mobility – defines a travel hub as:

...a recognisable place with an offer of different and connected transport modes supplemented with enhanced facilities and information features to both attract and benefit the traveller.

This definition places emphasis on the importance of 'place' in the design and function of a travel hub, but also outlines the importance of providing the connection between transport modes. Figure 3.1 shows the four broad components that might make up a travel hub. The components and individual elements that are included at each site will vary depending on local factors.

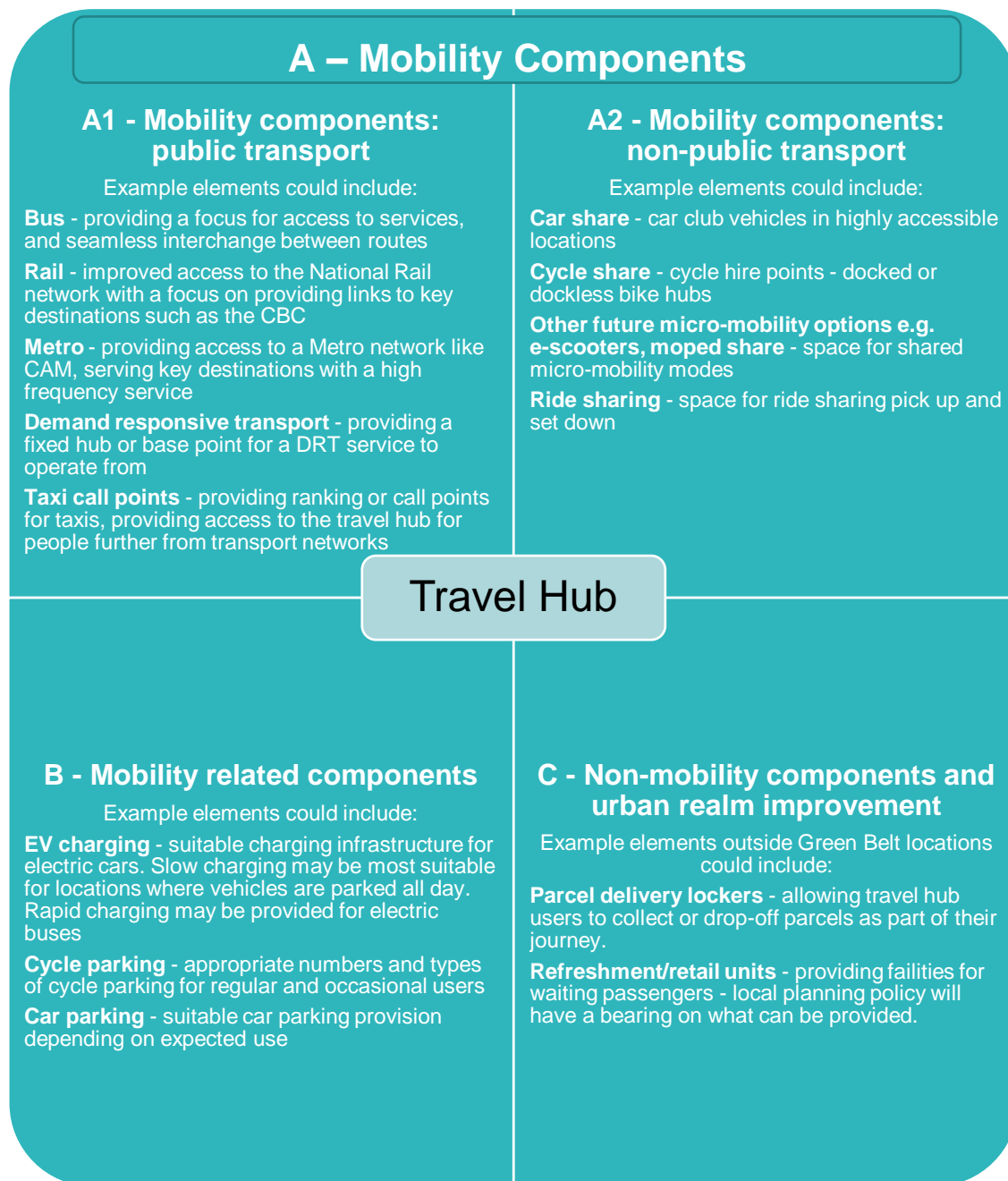
A – Mobility components: comprising two parts – public (A1) and non-public (A2) transport. These are the core functions of the travel hub, providing high quality interchange between modes. The individual elements of each mobility component will be defined on a case by case basis, depending on the local requirements, demand and environment.

B – Mobility related components: These components support the core mobility components described above and may be included to support the smooth running of the travel hub. The provision of these elements can elevate the travel hub from a simple interchange point to more of a true hub.

C – Non-mobility components and urban realm improvements: These components are outside the core requirements of a travel hub, but can – local conditions permitting – add significant value to the site and encourage use. The provision of any additional non-mobility components must be appropriate to the site and in accordance with national and local planning policy – for instance, under existing policy, sites in green belt particularly should not include uses that do not have a transport purpose.

⁴ Travel hubs and mobility hubs are both terms used to describe similar facilities. The term travel hub is used in this report for consistency.

Figure 3.1: Travel Hub Components



Identifying these broad components, rather than specific modal elements reflect the key principle that travel hubs should be designed with flexibility in mind. As transport modes and technologies evolve, and working and social habits change over time, the travel hub should be able to evolve to maintain its role as part of the transport network.

The design principles set out in Table 3.1 aim to cater for current technologies and known emerging travel demand, while providing high levels of flexibility to allow future technologies and components to be incorporated as they are developed.

3.3 Design Principles

Table 3.1 sets out the design principles for the various components of a travel hub site as outlined in Figure 3.1, i.e.:

- A. Mobility components – public and private
- B. Mobility related components
- C. Non-mobility components and urban realm improvements

The table sets out the design considerations for potential travel hub elements within these components, acknowledging that not all modes and elements will be relevant to all travel hub sites. The flexibility of space within the travel hub is key for maintaining the role of the travel hub in the future, so should be considered in the design for all transport modes, with particular consideration of the transition to future modes including CAM and other forms of autonomous transport.

The design considerations for different modes of transport are included along with links to further guidance and information on current design requirements.

Table 3.1: Design Principles for Travel Hub Components

A1 - Mobility Components: Public Transport

Mode	Design Considerations	Standards information/further guidance
Bus/CAM/Connected Autonomous Vehicles	<p>For many travel hubs in the Greater Cambridge Area, the greatest public transport capacity will be provided by the local bus network, so clear, comfortable interchange with the bus network is a fundamental requirement.</p> <p>At larger travel hub sites, such as Cambridge South West, bus services will usually enter the site itself, and should be accommodated reasonably centrally to minimise walk time from the local active travel networks and car parking within the site. Smaller travel hubs – such as rural travel hub sites or those like Foxton which have a limited bus service may accommodate interchange adjacent to the site on the public highway. In these cases, clear wayfinding is necessary to ensure that the location of bus stops is clear to users.</p> <p>Consideration should be given to the location of the travel hub in relation to the wider network, and whether the majority of services will be terminating at the travel hub, will be ‘through’ services or there will be a combination of terminating and through services with interchange between them.</p> <p>Layover facilities should be provided for terminating services, considering how requirements for layover space may evolve with the implementation of future concepts for the bus network, such as rural feeder services to travel hubs.</p> <p>Provision should be made for opportunity charging of electric buses at stops and during layover. This may be active provision where there are plans or commitments to introduce electric buses on routes serving a travel hub and the charging concept of operations and associated technology requirements have been defined, or passive provision as future proofing.</p> <p>While the requirement for charging at layover facilities will evolve as vehicle technology changes, the provision of space for this to take place should be included to provide a resilient facility for operators.</p> <p>Through services may require multiple bays or platforms, with clear wayfinding to and confirmatory signage at individual departure points.</p> <p>Turning facilities for buses should be included in travel hub design, allowing for network resilience.</p> <p>In the design development the principal interchange movements should be considered, and facilitated as much as possible, with walking times between relevant stops minimised.</p> <p>Future proofing for CAM</p> <p>Where a site is expected to form part of the CAM network in the future, design for buses should also accommodate the future CAM design requirements for infrastructure and vehicles. Based on collaborative working with the CAM project team through the GCP Technology Working Group to develop a draft List of Requirements and Assumptions for CAM, the current requirements for future proofing of travel hub sites for CAM are understood to be:</p> <ul style="list-style-type: none"> • Capacity at stops to accommodate a CAM service frequency of 12 vehicles per hour per direction 	

- Infrastructure designed to be adaptable to accommodate CAM articulated vehicles up to 18.75m in length – the current legal maximum for road passenger vehicles authorised for use on public roads
- Provision for future installation of infrastructure required to support future CPCA ticketing strategy, including ticket barriers and smartcard readers at stops
- Stop platforms to be on straight sections of infrastructure and capable of accommodating two CAM vehicles simultaneously
- Stop platforms designed for level boarding of CAM vehicles
- Facilities for rapid opportunity recharging of CAM electric vehicles at route termini
- Potential to accommodate stabling area for CAM vehicles
- Space for local feeder services and coaches

Facilities for rapid opportunity charging of CAM vehicles are likely to be in the form of high power charging stations employing either overhead pantograph charging, or physical or wireless inductive charging infrastructure installed within the road surface. Overhead pantograph charging may employ either:

- The 'pantograph up' method of charging, with a pantograph mounted on the roof of each vehicle that is raised to connect with a slot on the charging station, or
- The 'pantograph down' method, with the pantograph mounted on the charging station and lowered to connect with charging rails on the vehicle.

Testing of Connected Autonomous Vehicles is at an early stage in Cambridge, with autonomous shuttles expected to be tested at the University's West Cambridge site in the near future. The design requirements for these vehicles are likely to evolve significantly, but are likely to include rapid charging facilities at travel hub sites if the technology is progressed.

Rail	<p>Interchange with the national rail network provides an excellent basis for the development of a travel hub as part of an existing transport network.</p> <p>Rail stations have stringent design requirements to ensure their safe and efficient operation, which will need to be considered in the development of the travel hub.</p> <p>The presence of a rail connection to the travel hub – such as at Foxton or Whittlesford – introduces a significant constraint to the design of the site, and element of severance to the site for people and vehicles. Sites should be designed to accommodate clear and accessible crossings of the railway, catering to the principal desire lines for travel hub users.</p> <p>Where interchange facilities are provided at smaller rural locations, consideration should be given, through the Transport Assessment, of the impact of traffic and parking on local communities.</p> <p>Where possible, the principles of accessible cross-platform interchange should be applied, allowing users to complete their interchange between rail and other modes with as little difficulty as possible. High-footfall interchanges, such as between rail and high frequency bus or CAM – should be prioritised.</p>	https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/918425/design-standards-accessible-stations.pdf
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Coach

Parking

Depending on the location, interchange with scheduled express coach services can be accommodated at a travel hub. National Express coaches already serve some Park & Ride sites, including the Trumpington site in Cambridge, while National Express services between Great Yarmouth, Norwich and London operate on the A11 corridor, passing close to the proposed site of the A11 Travel Hub near the Fourwentsways interchange. Coach stops at travel hubs easily accessed from the strategic road network have the potential to generate new business for operators and also provide existing customers with an alternative to travelling into congested urban areas to access the long-distance coach network.

The type of coach services to be accommodated should be considered at the design stage, as requirements will vary. The Local Transport Plan distinguishes between:

- **Regular services** – scheduled public coach services (e.g. National Express, Megabus) serving typically young adults and students.
- **Special regular services** – scheduled services for a specific group – e.g. workplace or school, not available to the general public.
- **Occasional services** – all other services, including tourist coaches, typically serving the leisure market.

Regular and special 'through' services will benefit from good integration with other modes at the travel hub, and should be treated largely in the same way as local bus services, although the longer dwell time associated with coaches should be considered – avoiding coaches sharing stops with high frequency buses.

Access to waiting facilities is particularly important for these types of coaches, with customers typically arriving earlier for longer distance and lower frequency services.

Occasional services are often coaches operating private charters, excursions and tours whose passengers would typically expect to be dropped off and picked up directly at the destination or attraction they are visiting, rather than having to transfer to local public transport.

Any policy decision to direct visitors to Cambridge by coach to travel hub sites from which they can access the city centre by clean public transport should be supported by a visitor management strategy to implement this model for visitor access, a key element of which should be enabling coach operators to purchase local public transport tickets in bulk at an attractive price and include this in their service. Without such measures there is a risk of Cambridge being perceived by the coach industry as a destination that is unfriendly to coaches, resulting in a negative impact on the local visitor economy.

Travel hub sites that are well located to intercept tourist coach movements and with excellent access from the motorway or trunk road networks will be best placed to fulfil this specific function and should be planned and designed accordingly. Sites not suitably located for transfer between tourist coaches and local public transport will not require provision for this.

In the absence of such policy interventions coach excursion and holiday customers will be unlikely to use the interchange facilities of a travel hub. Longer stay coach parking is likely to be a minimum requirement for these services – with coaches dropping passengers off at leisure sites and picking up later. For these services, the close proximity of the coach parking to the point of interchange is less of a consideration, however the security of the coach parking should be considered – with lighting and natural surveillance a requirement. Access to welfare facilities, including toilets and refreshments should be provided for drivers.

Coach Parking Dimensions

The British Parking Association recommends coach bays of 5m x 15m to allow for door opening and loading. Smaller bays could be considered if used only for layover. Coach parking bays should be designed to minimise the requirement to reverse.

A2 - Mobility components: Non-public transport

Cycle routes

The travel hub should be easily accessible from all directions for people arriving and leaving by bike. Consideration must be given to the different ways in which cyclists will use the travel hub – including arriving by bike and making an onward journey by public transport, arriving by car or public transport and making an onward journey by bike, or arriving on foot to collect a shared cycle.

This range of potential movements means that cycle movements in, out and around the travel hub should not be restricted to narrow corridors or specific routes.

Where cycle routes or bridleways pass through the site – the route should serve people making through journeys as well as those accessing the travel hub facilities – clear natural wayfinding should provide through cyclists with an obvious route through the site.

The NMU Policy Framework provides guidance on designing for cycling in the Greater Cambridge Area, and the Local Transport Note 1/20 outlines wider design considerations for cycle infrastructure.

More detail:
GCP NMU Policy Framework
[Local Transport Note 1/20](#)

Cycle Hire/Micro-mobility

Space should be provided at the travel hub for cycle hire facilities to be provided by commercial operators. A system could be either through a docked bike system with fixed hire points (such as London's Santander Cycle Hire scheme) or a dockless system which does not require fixed locations (such as the systems run in several UK towns and cities by Mobike, Jump/Lime and Beryl).

The parking requirements of hire schemes vary significantly, but docked hire schemes will usually require bespoke parking spaces for the hire bikes. No specific infrastructure is usually required for dockless systems, but local authorities have increasingly aimed to specify preferred parking spaces for dockless bikes to reduce clutter and aid redistribution of the bikes to match demand. Power supply should be provided to the cycle hire area – docked schemes are likely to require power to the cycle stands and to a hire terminal. Dockless schemes may benefit from charging infrastructure if e-bikes are included in the hire fleet.

Regardless of the type of hire scheme, the space should be allocated close to traditional cycle parking as far as possible, and clear signage and marking of the cycle hire parking should be provided.

E-scooter hire systems are currently being trialled around the UK and may increasingly play a role in individual mobility. The space and infrastructure requirements for these schemes are broadly similar to those for cycle hire systems, but consideration should be given to allowing additional space for two or more future systems to operate alongside each other.

Space for bike or scooter maintenance could be provided at suitable travel hubs – this may include a small amount of workshop or storage space with basic facilities allowing hire companies to make basic repairs to the hire fleet and quickly return bikes or scooters to the system, as well as aiding with redistribution.

Figure 3.2: Examples of Dockless (L) and docked (R) Cycle Hire Parking Areas



Source: Stock Image

Dockless parking space can be shared with other forms of emerging micro-mobility, including e-scooters which are currently on trial in some UK cities. The parking requirements of e-scooters are broadly similar to those for cycles, in that signage and markings are the main requirement. Docked cycle parking requires more infrastructure but provides more formal parking.

Drop off/Pick up, Taxi, Private Hire and DRT

Drop off/pick up space can be provided at an early stage of design, and can be allocated as appropriate during the design development, and easily reassigned as the transport requirements evolve.

Pick up/Drop off

Lay-by space close to the interchange can facilitate arrival and departure as a private car passenger.

The number of drop off bays will be agreed on a site by site basis to be informed by the forecast demand at the travel hub. Simple layby arrangements are most appropriate for drop-off, and should be located at a point with easy access to onward transport, accessible to people with restricted mobility.

Drop off bays can also be used by taxi and private hire vehicles dropping off passengers, although should not be designed to accommodate formal or informal ranking.

If space allows, it may be appropriate to provide short-stay parking to accommodate pick up by private car.

The provision of pick-up/drop-off spaces in convenient locations close to the interchange will minimise instances of ad-hoc drop-offs at potentially unsuitable locations within the travel hub.

In the future, it is possible that higher uptake of autonomous vehicles will significantly increase demand for pick-up and drop-off points and consideration should be given in design to how best to enable adaptation.

	<p>Taxi</p> <p>While taxi use at a commuter-focused travel hub may not be particularly high, the importance of this mode increases for longer-distance trips which may be served by coach or rail, and taxis can play an important role in providing transport for people with restricted mobility. The LTP includes taxi and private hire call points as elements suitable for inclusion in a travel hub, so it may be appropriate to allocate some lay-by space to taxi ranking, subject to the individual location.</p> <p>DRT</p> <p>Scheduled DRT or “flexible” services - i.e. those with fixed core routes with some limited deviations - operated by conventional public transport vehicles should be accommodated reasonably centrally within larger travel hub sites and can share space within an area designed to accommodate local bus services. Co-ordination of services with other transport timetables will encourage interchange.</p> <p>On-demand DRT services operated by small minibuses, people carriers or cars can use pick-up/drop-off spaces in convenient locations close to the interchange. The accessibility requirements of on-demand DRT vehicles should be considered in the design, with adequate space for loading via wheelchair ramps or lifts. If these areas are adequate in overall size it should not be necessary to provide dedicated space unless the scale of such services warrants this.</p> <p>Future DRT services which might one day be operated by autonomous shuttle vehicles may require the provision of dedicated and segregated space. Whilst such demands cannot be predicted, it is desirable that a space close to the centre of the travel hub should be capable of eventually being repurposed if such demand materialises.</p>
<p>Car clubs</p>	<p>A car club is a commercial pay-as-you-drive service offering club members access to a vehicle or range of vehicles without ownership.</p> <p>The CPCA definition of a travel hub includes the provision of car club vehicles at these sites.</p> <p>The provision of car club vehicles adds to the mobility options at a travel hub, and provides an onward journey option for destinations not served by other modes. Providing car club locations in areas with good accessibility from public transport and active travel modes increases the reach of the car club vehicles, and makes the sites more appealing to car club operators.</p> <p>Dedicated spaces should be provided for car club vehicles, clearly signed for this specific use. The number of spaces should be agreed with operators on a case by case basis, considering existing local car club provision and demand.</p> <p>The spaces should be easily identifiable, and easily accessible from the public transport and local active travel networks. Early engagement with car club providers is recommended to ensure that the location within the travel hub is suitable.</p> <p>Active or passive provision of EV charging at the dedicated car club spaces would expand the opportunities for car club vehicle types and increase the adaptability of the space.</p> <p>The provision of cycle parking close to the car club bays can encourage the use of active modes to access the car club.</p> <p>https://como.org.uk/wp-content/uploads/2018/06/Car-Clubs-Parking-Carplus-Best-Practice-Guidance-2014.pdf</p>
<p>Car</p>	<p>General Car Parking</p> <p>The number of general car parking spaces will be defined by the forecast demand and expected use of the site, and should be the subject of site-specific analysis. The full demand is unlikely to be realised in the first few years of the travel hub opening, so a phased delivery approach should be designed in. A ‘fan’ design facilitates the phased opening of the site according to</p>

demand, but may inhibit the effectiveness of solar car ports by requiring these to be oriented sub-optimally for energy generation. The car park layout could acknowledge local features, such as historic road layouts.

Dimensions

2.5m x 5m for standard vehicles, although provision may be necessary for wider and longer vehicles in the future if the recent trend towards larger vehicles continues⁵.

Flexible space

As public transport accessibility increases, and if the predicted trend towards shared mobility continues, demand for private car parking may grow more slowly or decrease over time. Consideration should be given to alternative use of later phases of car parking space if it is not ultimately required. The use of space further from the transport interchange for alternative uses such as freight consolidation (see component C) may be an appropriate use of the space.

Disabled and Priority car parking provision

The proportion of disabled/Blue Badge car parking at travel hub locations is not stipulated by the Local Plan, but a small proportion of parking bays should be dedicated to Blue Badge users. The availability of disabled parking closer to key destinations should be considered when calculating the space requirement for disabled parking. The level of provision should also be informed by existing demand at comparable sites, with passive provision made for future variations in demand.

Parent and child parking could be considered at travel hubs to provide priority spaces for people travelling with small children, and encourage use of non-car modes for part of the journey. Additional space should be provided around these bays if possible, although the 1.2m hatched zone as required for disabled parking bays is not a requirement.

Dimensions

2.5m x 5m + 1.2m hatched zone for blue badge spaces. The hatched zone can be shared with the adjacent space.

Location

Disabled parking provision should be as close as possible to the principal points of interchange – minimising the transfer distance for disabled users. Parent and child parking should be as close to the points of interchange as possible without impacting on disabled parking bays.

B - Mobility related components

Cycle Parking

The provision of high-quality cycle parking is fundamental to the accessibility of the travel hub by bike.

More detail:
GCP NMU Policy Framework

Location

Cycle parking should be prioritised and accommodated as close as possible to the points of interchange, with clear, safe routes in and out of the travel hub for people on bikes.

Strong consideration should be given to the local road network, acknowledging that cyclists will arrive and leave the travel hub in all directions, not just on designated cycle routes.

⁵ <https://www.theaa.com/breakdown-cover/advice/parking-space-size>

Cycle parking in an inconvenient place is likely to be ignored in favour of 'fly parking' on railings and street furniture. To avoid this, it may be necessary to disperse cycle parking around the travel hub, especially at larger sites. This can also minimise through cycle movements which may conflict with large pedestrian flows.

Numbers and types of cycle parking

The number of cycle parking spaces at a travel hub site should be agreed on a case by case basis, taking into consideration the forecast demand, but would as a minimum be at least 10% of the number of car parking spaces with this rising significantly for sites where the levels of interchange between cycling and other modes will require greater facilities. Current use of folding bikes at Park & Ride sites is high and this may also be a consideration in determining adequate parking.

Passive provision for an increase in cycle parking provision should be included, considering reallocation of space from car parking, if appropriate.

Consideration should be given to the way in which cycle parking will be used at the travel hub. In most cases, a combination of long and short-stay parking should be provided, with half the provision being secure long stay, and half easily accessible short stay parking.

Long-stay parking may consist of secure cycle boxes, providing covered, lockable spaces that are suitable for bikes to be kept overnight. In particularly high demand locations, a more substantial cycle parking 'hub' may be appropriate, which may include key fob entry and additional security measures – see Figure 3.3. As e-bikes increase in popularity, the ability to charge e-bikes at a secure cycle hub would be an advantage.

Short-stay parking should provide simple stands which allow users to lock both wheels and frame to the stand. The traditional Sheffield stand is a simple and low-cost solution, but other designs are available and may be more appropriate to the surroundings. Parking should be covered to provide basic protection from the elements.

Provision for non-standard cycles (e.g. cargo bikes, hand cycles etc) should be included at a proportion to be agreed, but typically 5% of the total number of cycle parking spaces.

Security of cycle parking is an important consideration, with natural surveillance providing the best deterrent to theft. CCTV coverage of cycle parking areas should be included at the travel hub.

Figure 3.3: Secure Cycle Hub at Selly Oak



Source: Broxap Ltd

Pedestrians

Pedestrian access to the Travel Hub is important for access to the local area, and for nearby residents and workers to benefit from the Travel Hub facilities.

Pedestrian routes from principal local trip attractors should be clear and direct, with paths catering to desire lines, and good natural wayfinding, allowing people accessing the travel hub on foot to easily navigate to all available onward modes.

Personal security for pedestrians is a major consideration, as large sites could be relatively isolated. Good lighting, natural surveillance and using Secured by Design principles to avoid secluded pedestrian areas will help provide good access for people on foot.

Severance should be considered in the travel hub design in order to avoid overly circuitous pedestrian routes to the site caused by the modes serving the travel hub - particularly rail lines, major roads or metro infrastructure.

Electric Vehicle Charging

The UK Government intends to halt the sale of conventional engine vehicles by 2030, with pressure from several groups to bring this forward, meaning that the provision for charging of electric vehicles is expected to become increasingly important in the next 15 years.

The proportion of parking spaces equipped with charging facilities must be decided on a case by case basis, but current travel hubs are being developed to include active provision for 5% of the spaces.

Given the relatively high cost of installation and maintenance of charging facilities, passive provision for installation of additional charging points in line with demand is an essential element of future-proofing the travel hub design. A 2019 survey⁶ showed that 64% of drivers cited a lack of charging infrastructure as a barrier to EV use, so reliable access to charging at facilities like travel hubs is likely to be fundamental to the local shift to EV in the medium term.

The LTP demonstrates support for the prioritisation of EV parking above general parking provision, so EV facilities for long-stay parking should be accommodated as close to the point of interchange as possible. As the car fleet turns over to include increasing numbers of EVs, the importance of prioritising EV bays is likely to diminish, but the clear designation of EV parking/charging points will remain an important element of the travel hub.

For long-stay parking a fast 7KW charging facility is likely to be most appropriate. These chargers can typically fully charge a vehicle battery in 4-6 hours – suitable for charging parked vehicles while their drivers are at work during the day. Note that separate, rapid charging technology is likely to be a requirement for commercial vehicles, taxis and buses that will only stop at the travel hub site for a short time.

The type and availability of EV charging facilities should be carefully considered in relation to the location of the travel hub and the typical distance travelled by EV users to reach it, considering that commuter users making relatively short trips between their home and a travel hub, and not using their vehicle during the working day, will not need to connect to a charger on every visit. Care should be taken to avoid attracting private car users in into the travel hub site solely to use the charging facilities, and as battery technology improves, vehicles will require less-frequent charging. It is unlikely that all spaces in the travel hub site would be fully equipped with EV charging infrastructure in the future.

Public EV charging is generally a commercially-run facility and the business model for provision should be considered in the development of Commercial Case of the travel hub business case.

Information

The clear provision of information at the travel hub is important for users to have confidence in the system. As travel hubs provide multi-modal travel opportunities, a clear and easily useable repository of information on modes, routes and travel information is important for their use by the whole population.

The provision of digital connectivity at the travel hub is also important to enable users to access travel information via personal mobile devices. Increasingly the latter will replace the majority of in-situ information.

Ticket sales are increasingly undertaken online, but automated ticket vending machines are still likely to be required in the short to medium term – particularly for travel hubs including rail, where ticketing needs are more complex. Integrated ticket vending machines have the potential to provide travel hub users with all required ticketing through a single point – see Figure 3.4:.

⁶ <https://www.smarttransport.org.uk/news/lack-of-ev-infrastructure-cited-as-the-biggest-barrier-to-adoption>

Figure 3.4: Integrated Ticket Vending Machine



Source: Cammax Ltd/SYPTE

Travel hub sites may have a staff presence on site, depending on local requirements, but where this is the case it is unlikely to be a 24 hour presence. Access to information and emergency help can be provided remotely through help points situated in prominent locations. These points can provide a video link, and if required, be linked to security, public address and lighting systems, giving a remote operator some control over facilities at the site.

Information services will increasingly be provided online, which will change the functional requirements of on-site information points, but increase the need for good internet connectivity and freely available internet access.

C - Non-mobility and urban realm improvement

Freight

Freight Consolidation

Freight consolidation can minimise the numbers of goods vehicles accessing urban centres, with goods dropped at a consolidation centre close to the strategic road network, and consolidated into a smaller number of vehicles for efficient delivery.

Policy 3.4.4 of the LTP supports the use of sites with high levels of parking for the use of freight consolidation or click and collect facilities. The development of a freight consolidation system would require additional research to identify an appropriate site with the required freight access – likely to be close to the motorway network. A single freight consolidation centre should be sufficient to serve Cambridge and concentration of consolidation activities for larger freight movements at a single site may be necessary to establish a viable service. Micro-consolidation – with the last mile completed using cargo bikes could be considered for travel hubs closer to the city centre, or high demand areas like the CBC.

Co-ordinated freight consolidation is relatively new to the UK, but can significantly reduce the numbers of freight vehicles travelling into urban centres, and can allow the use of smaller, often zero emission vehicles, or cargo bikes for local deliveries. A trial in Paris showed a reduction in goods vehicles into the city centre by 20%.⁷

Any investment in freight consolidation facilities should be supported by policy measures to generate and sustain local demand for freight consolidation. Early UK experiments with freight consolidation for city centre deliveries have demonstrated that freight consolidation centres are unlikely to succeed in the absence of restrictions on deliveries directly to the city centre and incentives for freight operators to use a consolidation centre that are sufficient to offset transshipment costs.

A feature of freight consolidation is a relatively large number of goods vehicles accessing the site. For a site close to the strategic road network this would need to accommodate heavy goods vehicles in order to be effective. Appropriate HGV access, parking, loading and turning facilities should be provided to ensure that the facility can operate without impacting on the travel hub's core operation.

Given the high pedestrian footfall around the travel hub, a high degree of separation between the passenger facilities and the freight consolidation operation should be considered in the design – avoiding pedestrians and NMUs sharing space with HGVs.

Additional Requirements

- Covered space for loading
- Secure area for temporary storage
- Charging facilities for zero emission vehicles
- Access to staff welfare facilities
- Appropriate lighting

Buildings and structures

Size and function

Buildings on travel hub sites should be appropriate to the size and function of the hub. Where significant numbers of people are likely to be waiting for services, an appropriately sized space should be provided to allow waiting in comfort. Lighting, shelter and shade should be provided – accessible even when the building may not be open.

Smaller sites, or where there is existing shelter elsewhere – for example at Foxton, where people are likely to wait on the station platform – may require only a small building or enclosed shelter for relatively small numbers of people to wait.

⁷ PBA and WYG (2018) Draft London Freight Consolidation Feasibility Study

Where longer passenger wait-times might be expected, more substantial waiting facilities should be provided - Thornhill Park and Ride in Oxford (Figure 3.5) is an example of a site providing more substantial waiting facilities due to its role as a long-distance coach hub as well as local park and ride site.

Consideration must be given to the location of the travel hub site – where the site is in a sensitive location or green belt, the size and materials used must be appropriate to the surroundings.

Figure 3.5: Larger Waiting Facilities at Oxford Thornhill Park and Ride



Type

To ensure the adaptability of the travel hub to future use, buildings of lightweight or modular construction should be preferred, allowing future removal or redesign at relatively low cost.

A modular facilities building would offer a significant cost saving relative to a traditional building of similar size constructed in-situ. It would also be possible to remove this for reuse elsewhere if no longer required or to move this within the site if required to reconfigure the travel hub layout.

Modular buildings can be provided as a full turnkey package by the supplier. These can be of bespoke design, as at Temple Green Park & Ride in Leeds (Figure 3.6:). In this example the building is 132 m² in size with a feature clock tower and wood cladding in Western Red Cedar. Facilities provided are a fully heated passenger waiting area with ticket machines and seating, staff office and welfare facilities with secure ticket window, toilet and baby change facilities. The building was manufactured off-site and installed by crane in a single day, demonstrating the practicality of moving such buildings within the site or elsewhere if required.

Figure 3.6: Temple Green Park & Ride Modular Building



Facilities

Where people are expected to be waiting for any length of time, toilet facilities should be provided for the public, ensuring equal access to the facilities for all users. The scale of provision should be greater at sites planned to accommodate transfer between tourist coaches and local public transport

A café or kiosk may be appropriate at hubs with high footfall.

In some locations co-working and meeting space has the potential to generate a revenue stream to help fund facilities management and building maintenance costs and would also generate footfall to support a café or kiosk. However, where the site is in the green belt, there will be policy barriers to the development of facilities that do not fall within the definition of 'local transport infrastructure'

At public transport termini, and where taxi ranks or coach parking are provided, toilet and refreshment facilities for drivers are likely to be required, even if public facilities are not.

Photovoltaic (PV or Solar) Panels	The power demand for a travel hub site will primarily come from the lighting and building requirements, plus the EV charging points. Forecasts for the CSWTH site suggest that the EV charging will represent the greatest power demand – with demand peaking in the morning as cars arrive and are actively charging simultaneously.
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The provision of PV panels at the site can provide additional, clean power generation for the travel hub site, providing a proportion of the site's power demand, and in some circumstances, feed excess power back to the national grid. Batteries may be housed on site to store excess power for local use when solar yields are low.

Power yield from PV panels varies depending on site conditions and the technology employed, so a detailed assessment of the site is necessary to establish whether the installation is viable. An assessment of the potential for PV panels at Foxton suggests that up to 50% of the site's power needs could be met by PV panels.

If there are commercial opportunities to generate power in excess of that required for the site, and to directly distribute this locally, these should be explored in collaboration with appropriate partners.

The preferred style of PV panels proposed for GCP travel hub sites is a solar car port arrangement, which makes use of the space above car parking bays to provide shade and shelter for vehicles, as well as generating power.

The optimal site arrangement will vary, and it is likely that a balance will need to be struck between the optimal arrangements from a transport and functional perspective, and for a power yield perspective. Planning restrictions should be considered, especially in green belt locations.

The potential for glint and glare from the solar panels should be assessed, particularly in relation to the impact on air traffic.

If the site falls within the Lord's Bridge Telescope Restricted Area, the potential impact of solar panel installation on the observatory should be assessed prior to development of the design.

Figure 3.7: Indicative Solar Car Port Installation at Travel Hub Site



Source: GCP

Sustainable materials

Previous work for GCP has considered the potential for the use of permeable surfacing materials for travel hub sites. Stone-filled ground reinforcement grid units were identified as a solution suitable for the construction of temporary parking areas with an operational life of ten years or less. They may also be suitable for peripheral parking areas within travel hubs that are used less intensively than those located closer to the point of interchange.

The key advantages of permeable ground reinforcement systems as a design solution for temporary parking areas are:

- They are normally laid on a free-draining stone base, eliminating the requirement for drainage pipework and returning storm water to the water table.

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- They are compliant with sustainable drainage best practice.
 - Products manufactured from 100% recycled Low Density Polyethylene (LDPE) are available. These can be further recycled after being taken up and removed from a temporary site, offering a sustainable solution and avoiding the cost of disposal to landfill.

The main disadvantages of such systems are:

- They require more regular inspection and maintenance than a permanent bound surface.
- They may not be suitable for the construction of disabled parking areas.

Permeable surfacing solutions are also available for permanent parking areas.

Security

To ensure a safe environment for travel hub users, the travel hub should follow the principles of security by design, avoiding isolated sections of the site, and promoting natural surveillance. CCTV should be included as a standard design feature. Active monitoring of CCTV may be required to allow safe 24 hour operation of the travel hub - particularly for those using the cycle facilities – and deter overnight stays.

Lighting will be a key element of ensuring security to ensure that the travel hub is safe, and feels safe to use all year round. An assessment of the required lighting will be required to ensure that the proposals meet the requirements for security, without significantly impacting wildlife or local population.

Community facilities

With the development of travel hubs at highly accessible sites there is the opportunity for the provision of additional facilities to benefit the local community, add value to the site, and in some cases, provide a revenue stream to support the site.

Facilities considered will be subject to local conditions and demand, but could include flexible community spaces such as village halls and exhibition spaces, or recreation areas such as sports pitches or playgrounds. Where the site is in a sensitive location or green belt, there will be policy barriers to the development of facilities that do not fall within the definition of 'local transport infrastructure' and it is likely that there will be other more appropriate locations in urban areas or village centres. Otherwise, there is no limitation in principle on the facilities that could be included on a travel hub site, but the operation of the facilities should not impede the core function of the travel hub.

4 Summary

The development of multi-modal travel hubs is a major focus for the Greater Cambridge Partnership (GCP) as part of the efforts to support the creation of 44,000 new jobs and 33,500 new homes in the region.

New travel hubs will support GCP's work to improve access to transport networks, ease congestion, keep the Greater Cambridge area well connected to the regional and national transport network, make it easier to travel by greener modes and improve journey times.

The Cambridgeshire & Peterborough Local Transport Plan supports the development of travel hubs and advocates that these should act as gateways to the public transport network.

A travel or mobility hub typically includes elements sitting within three component areas:

- A. Mobility components – public and private (e.g. bus, rail, cycle hire facilities)
- B. Mobility related components (e.g. cycle and car parking, electric vehicle charging)
- C. Non-mobility components and urban realm improvements (e.g. community facilities)

The combination of elements included at individual travel hubs will vary from site to site, and take account of local conditions, including the size of the site, access provision and transport modes serving the location.

National and European examples of travel hubs show this variation in facilities depending on the location – with hubs located more centrally with urban areas typically providing more future and shared mobility options – with smaller hubs acting as a network, whereas urban fringe sites tend to provide more private car parking and can exist in isolation, or as part of a network. Several elements – including good security and passenger information provision tend to be common across all types of travel hub.

The travel hubs developed by GCP will incorporate a range of multimodal elements within the components outlined in Figure 3.1. The individual elements will be driven by the local conditions, planning considerations and role of the site as part of the network, but will seek to provide increased access to the transport network in the Greater Cambridge area, promoting ease of interchange between modes at the site. Travel hubs on the urban fringe and in rural areas can increase access to bus routes and high quality walking and cycling networks for the local areas they serve. The increased access to active and sustainable transport networks will help generate mode shift, and through supporting sustainable modes will contribute to the decarbonisation of transport.

Within the GCP area, travel hubs should aim to operate as a network, encouraging users to travel to their local travel hub rather than driving to the hub nearest their destination. This can be encouraged through the co-ordination of services as well supporting factors including the development of integrated ticketing and branding.

The design of travel hubs should aim to accommodate changing demands for transport and mobility – particularly with a possible increase in the uptake of new transport options and demand for flexible working patterns. The design principles outlined in Section 3 provide guidance on how to effectively accommodate the current demands on travel hubs – and how space can be designed flexibly to pivot quickly to changing requirements. The development of the Cambridgeshire Autonomous Metro (CAM) system, which is proposed to serve several of

the travel hubs currently in development is a good example of the requirement to design for future technologies and networks.

Some design principles will remain consistent – particularly those with regard to security and pedestrian access – these should be embedded in the design of all travel hubs.

A. Future Travel Hub Development

A.1 Changing Role in the Future

A key requirement of a travel hub is flexibility in access to the transport network – providing access to multiple modes, and easy interchange between them. To maintain their important position within a strategic framework, travel hubs must also adapt to a changing transport landscape.

Even before the COVID-19 pandemic disrupted the way people travel for work and for leisure, the way in which transport is used was changing rapidly, driven largely by the increased capability of transport technologies, and increased access to these technologies.

This has led to a changing system of mobility, with a trend away from fixed systems, where assets are owned, and services are provided on fixed routes, towards a more flexible system where users are increasingly using shared services, as and when required.⁸ Increased access to real time information on transport services allows transport users to choose what might be the 'best' mode of transport for their journey, rather than just the modes and routes they know already. Access to the various modes of transport through interchange facilities such as travel hubs is likely to become increasingly important to the travelling public.

The COVID-19 pandemic has disrupted working patterns in 2020/2021, with increases in home and flexible working. The longer term impacts of the disruption will require further research post pandemic - specifically the implications for Cambridge with a significant proportion of the population either in industries such as health, education, hospitality, and leisure where flexible working is difficult, or the hi-tech industries where flexible working may have already been well established.

A.1.1 New Modes of Transport

The changing access to technology has allowed new modes of transport to develop. Ride-hailing services such as Uber have disrupted the traditional taxi and private hire markets and new forms of micro-mobility, including e-bikes and e-scooters have emerged as potential disruptors to the transport industry. Locally, the CAM system is intended to use new technology to provide a clean and efficient mass-transit system.

A clear national government policy direction means that in the future, it appears highly likely that the use of electric vehicles will increase. The trajectory of take-up of autonomy and vehicle-sharing is less predictable, with the market for these technologies at an earlier stage of development.

A.1.2 The Impact on Travel Hubs

This desire for flexibility in working, and these emerging and evolving modes of transport demonstrate the importance of designing adaptable spaces in travel hubs. As demand for transport evolves, the travel hub space should be able to evolve to continue to meet the needs of users.

To do this the travel hub should be designed to evolve, catering to the current technologies – bus, rail, car and active travel, but also able to accommodate new modes – such as CAM and

⁸ Mobility as a Service (MaaS) in the UK: change and its implications, Foresight, Government Office for Science (2018)

demand responsive autonomous shuttles – with relative ease as they come online. This will require consideration of:

- **Designing in flexible space** – for example ensuring that spaces and stops that will be used by buses in the short to medium term can be adapted to the CAM vehicle specification without wholesale redesign. For example, features such as mature trees and balancing ponds should be situated in a way which does not prevent eventual reconfiguration.
- **Identifying current and future modes that can share space** – such as different forms of bus service – and those requiring dedicated and segregated provision.
- **Identifying areas for change** – such as earmarking private car drop-off bays for future use as Demand Responsive Transport bays. If planning conditions and local circumstances allow, interim uses of space could be considered before long term uses are developed. For example, space for future public transport vehicle charging could be allocated as a freight micro-consolidation space for electric vans or cargo bikes. Space for micro-mobility – such as e-scooter hire – which may not yet be fully defined could be designed into the travel hub by allocating space accessible to pedestrians and with access to active travel routes and facilities so that micro-mobility facilities can be retro-fitted as required. Cabling, or at least ducting, to enable provision of basic charging facilities to this space should be considered. Similarly, car club spaces can be provided with little or no additional infrastructure above that needed for a typical parking space, although dedicated EV charging and space for expansion should be considered, and the allocated spaces should be highly visible from the centre of the travel hub.
- **Digital connectivity** – The requirement and desire to work more flexibly has raised expectations of connectivity at locations like travel hubs for both travel and work needs. Travel hubs should provide suitable facilities for users to locate, book and pay for onward travel through their own device. This is particularly relevant for locations where shared mobility is provided, to allow new and occasional users with the confidence to use these modes without prior planning. Robust digital connectivity for flexible working will require suitable spaces for casual work. Provision will be informed by the local conditions – including planning policy (facilities at Green Belt sites will be more limited), service frequencies and alternative local facilities – but may include appropriate seating, work surfaces and power supplies for mobile working. Power requirements for flexible working facilities, electric bike charging and other non-mobility components such as freight consolidation hubs should be considered at an early stage of design, even if not required in the opening year.
- **Futureproofing power supplies** – Provision for appropriate power supply to the right areas of the travel hub will be an important element of managing an uncertain future demand. Flexibility in the supply – including the ability to provide rapid charging for electric mass transit services and slower EV charging for long stay car parking are likely to be the main near-future requirements. The ability to adapt the travel hub for public transport vehicles using different fuel technologies – such as hydrogen – should be considered in the design, and care should be taken to avoid investment in significant charging facilities which may be rendered redundant by the rapidly evolving battery sector.
- **Using modular or semi-permanent materials** – Use of modular or lightweight construction techniques to allow the easy and relatively low-cost reconfiguration of buildings as demand changes.

B. Examples

B.1 Travel Hub Examples

This section provides examples of travel and mobility hubs of various scale around the UK and Europe. The examples do not necessarily represent best practice for GCP travel hub projects, but demonstrate a range of examples with varying facilities appropriate to the location.

B.1.1 Plymouth Mobility Hubs

Scheme name: Plymouth Mobility Hubs

Promoter: Plymouth City Council (PCC)

Summary: PCC aim to provide up to 50 mobility hubs across Plymouth. The aim of the scheme is to strategically connect existing public transport networks across Plymouth. The Mobility Hubs will provide low carbon mobility for last mile journeys, intercity travel or to areas not covered by public transport.

Funding: Transforming Cities Fund (TCF) grant



Source: Plymouth.gov.uk

Characteristics

The proposed multi-modal mobility hubs will be designed to be flexible in order to meet the requirements of local communities and may include the following components shown in Table B.1.

Table B.1: Plymouth Mobility Hub Features

Mobility components (A1 and A2)	Mobility related components (B)	Non-mobility and urban realm improvements (C)
Access to existing public transport services	Electric vehicle (EV) charging points	Security (lighting, CCTV)
Car club hubs	Solar carports	Lockers for delivery and storage
Shared e-bikes and cargo bikes	Cycle parking	Live travel information boards
	Cycle repair stations	Smart booking systems for shared bikes and cars

Relevance to Greater Cambridge

A UK example showing how travel hubs can provide appropriate facilities on smaller sites. Elements here could inform any future proposals for smaller travel hubs in the Greater Cambridge area.

B.1.2 Bremen Mobility Hubs, Germany (mobil.punkt)

Scheme name: Bremen Mobility Hubs

Promoter: Municipality of Bremen

Summary: The Municipality of Bremen has created a network of 40 mobility hubs across the city. This is formed of 10 centralised hubs, and 30 smaller hubs designed to connect less 'switched-on' areas. The Municipality aim to expand the network by 8-10 local hubs per year, with each hub being developed to meet the social and business needs of the community.



Characteristics

The Bremen mobility hubs are designed to reduce the reliance on the private vehicle, by making sustainable transport options widely available and convenient. The hubs also have a clear urban realm focus, aiming to reduce the space taken up by private cars and improve conditions for pedestrians and cyclists. The hubs typically include the components described in Table B.2: Bremen Mobility Hub Features .

Table B.2: Bremen Mobility Hub Features

Mobility components (A1 and A2)	Mobility related components (B)	Non-mobility and urban realm improvements (C)
Access to existing public transport services	Electric vehicle (EV) charging points	Wayfinding information
Car club (with a focus on compact and low emission vehicles)	Solar carports (at larger sites)	Live travel information boards
Shared bikes	Car club hubs (across all sites)	Cafes
E-bikes (at certain locations)	Cycle parking	Children's play areas
	Cycle repair stations	App-based booking systems for bikes and cars

Achievements

- Bremen has achieved a 64% sustainable mode share, including 25% cycle mode share.
- Bremen has dramatically reduced its congestion level (time lost in transport) to 25 hours per citizen per year; the German average is approximately 39 hours (2014).
- Bremen now has 60,000 car-share users (>10% of the city's population) across 60 car share stations (of which 40 based at mobility hubs).
- 66% of car share users who previously owned a car, no longer do.

Relevance to Greater Cambridge

A European best practice example that has demonstrated positive impacts on congestion and mode share by operating as a network.

B.1.3 Oxford Parkway Railway Station and Park & Ride

Scheme name: Oxford Parkway

Promoter: Chiltern Railways

Summary: A new railway station delivered in 2015 located adjacent to the existing Water Eaton Park & Ride site. Water Eaton Park & Ride already provided 757 car parking spaces and a dedicated bus service, route 500, serving Oxford Railway Station and the City Centre in one direction and Blenheim Palace and Woodstock in the other direction. The site was renamed Oxford Parkway Park & Ride and the combined car parking capacity totals 1,558 spaces.

Funding: Project Evergreen 3 – funding from DfT and Network Rail to upgrade the Chiltern Main Line

Figure B.1: Oxford Parkway Station and Cycle Parking



Source: Google Maps

Figure B.2: Oxford Parkway Park & Ride Bus Stops and Facilities Building



Source: Google Maps

Characteristics

Once built, the original Park & Ride site was renamed Oxford Parkway Park & Ride and now Oxford Parkway and Oxford Parkway Park & Ride coexist on the same site with two adjacent car parks controlled by different operators (although users can use either). Facilities at the site are shown in Table B.3: Oxford Parkway Features .

Table B.3: Oxford Parkway Features

Mobility components (A1 and A2)	Mobility related components (B)	Non-mobility components and urban realm improvements (C)
Access to dedicated express bus services to Oxford City Centre and Blenheim Palace	Free designated Blue Badge parking	Security (lighting, CCTV)
Access to rail services towards Oxford, Bicester and London Marylebone	Cycle parking (190 covered spaces across two locations)	Facilities building with enclosed waiting area
Coach parking	Taxi rank	Coffee shop
	Pay-and-display car parking (1,558 spaces)	Public toilets and baby changing
		ATM machine
		Industrial recycling bins for household recycling and an adjacent unloading area for vehicles to park
		Live travel information boards

Relevance to Greater Cambridge

A larger site comparable to some Greater Cambridge travel hub examples, providing for interchange between bus and rail, as well as catering for park and ride trips by both modes.

B.1.4 Liverpool South Parkway Station

Scheme name: Liverpool South Parkway

Promoter: Merseyrail

Summary: A flagship Merseyrail station with local and regional rail services providing interchange with the Northern Line, and integrated transport links to Liverpool John Lennon Airport. The site includes an award-winning building (see Figure B.3: Liverpool South Parkway Station Building) that includes several sustainable features including solar panels and rainwater harvesting.

Funding: Merseytravel

Figure B.3: Liverpool South Parkway Station Building



Source: Network Rail Media Centre

Characteristics

Liverpool South Parkway incorporates car parking and true multi-modal interchange in a well-designed site. Bus services access the site directly to provide public transport links to the airport, and the Merseytravel GO scheme provides regular commuters with access to secure cycle storage on site.

Table B.4: Liverpool South Parkway Features

Mobility components (A1 and A2)	Mobility related components (B)	Non-mobility components and urban realm improvements (C)
Merseyrail Metro services	GO Cycle secure cycle parking – 40 secure spaces	Staffing
Regional rail services	24 standard cycle racks	Security (CCTV, lighting)

Mobility components (A1 and A2)	Mobility related components (B)	Non-mobility components and urban realm improvements (C)
Local bus services including to the airport	311 car parking spaces	Customer help points
	14 designated Blue Badge parking spaces	Integrated travel card sales
		Public toilets
		Live travel information
		Catering

Relevance to Greater Cambridge

A well-established travel hub site which caters for significant interchange between bus and metro rail services. The award-winning building incorporates sustainable design features and provides more services for passengers than most sites.

B.1.5 Edinburgh Trams – Ingliston Park & Ride

Scheme name: Edinburgh Trams

Promoter: Transport for Edinburgh

Summary: The Edinburgh Trams network links the centre of Edinburgh with the airport, and includes several interchange stops along its route, providing access to the National Rail network and local bus networks.

Funding: Transport for Edinburgh

Figure B.4: Ingliston Park & Ride, Edinburgh



Source: Google Maps

Characteristics

Ingliston Park & Ride is located off the A8, close to the airport. The site includes 1,085 free car parking spaces, a staffed terminal building and waiting area. Cycle hire and interchange with local bus services are available on site.

Table B.5: Ingliston Park & Ride Features

Mobility components (A1 and A2)	Mobility related components (B)	Non-mobility and urban realm improvements (C)
Regular tram services – including to the airport	16 Cycle hire stands	Staffed terminal building
Bus interchange with Lothian Buses	7 EV charging points	Security (CCTV, lighting)
	1,085 free car parking spaces	Customer help points
	46 designated Blue Badge parking spaces	Public toilets
	Secure cycle parking lockers	

Relevance to Greater Cambridge

Providing interchange with bus and light rail on the edge of the city, this site also features more typically urban components, such as cycle hire docks – providing high levels of connectivity even outside the city itself.

B.1.6 Nottingham Express Transit – Hucknall Park & Ride

Scheme name: Nottingham Express Transit (NET)

Promoter: Nottingham City Council

Summary: NET consists of two tram lines that cross Nottingham; the Toton branch which runs east-west to the west of the city centre and the Clifton branch which runs north-south through the city centre into suburbs and satellite suburbs. In total there are seven Park & Ride sites associated with the NET network.

Funding: Nottingham City Council (via Private Finance Initiative and partly the Workplace Parking Levy)

Figure B.5: Hucknall Park & Ride



Source: Google Maps

Characteristics

Hucknall Park & Ride is located approximately 10km to the north of Nottingham City Centre, at the same site as Hucknall railway station and a bus interchange.

Table B.6: Hucknall Park & Ride Features

Mobility components (A1 and A2)	Mobility related components (B)	Non-mobility and urban realm improvements (C)
Regular tram services	Citycard Cycle Parking – a network of secure, covered, lit cycle parking hubs charged at £5-7 a year	Security (CCTV, lighting)
Regular train services	EV charging points	Customer help points
Bus interchange	439 free car parking spaces	Integrated travel card sales
	24 designated Blue Badge parking spaces	Public toilets
		Live travel information

Relevance to Greater Cambridge

Interchange with bus, rail and tram at the tram terminus – this site has fewer facilities than other examples with similar levels of transport connectivity, and has more limited bus services, but the high frequency of the tram service means that waiting times for the dominant mode of onward travel are likely to be low.

B.2 Summary

The examples in this section demonstrate the differing range of facilities provided at travel and mobility hubs in areas around the UK and Europe. The examples show the range of interpretation of the required components, responding to local needs. The provision varies from the relatively basic facilities at urban fringe sites providing park and ride facilities for the Nottingham Express Transit, to the more central, less car-centric hubs in Bremen and Plymouth which incorporate more future mobility elements.

The more central examples must be more space-efficient, and the number of these hubs is significant (50 in Plymouth, 40 in Bremen) as they act effectively as a network, rather than major interchange hubs. These urban examples cannot provide car parking for most users but rely much more on the use of shared mobility to access the sites.

The Liverpool South Parkway example shows the potential for travel hubs as major points of interchange between public transport modes, while incorporating good access for private transport. The inclusion of Ingliston Park & Ride in the Edinburgh cycle hire scheme shows that some more typically urban travel hub elements can be successfully incorporated into sites on the edge of the city.

These urban fringe sites are more able to accommodate private car parking, with larger areas available. Electric vehicle charging provision is not provided at many of the sites reviewed – neither Oxford Parkway nor Liverpool South Parkway provide charging points currently, despite their capacities and – in Oxford Parkway's case – relatively recent development.

Solar panels are not a major feature of the larger – out of town travel hub sites reviewed here, but are included in the smaller, more urban travel hub sites. This is likely to be a function of the relatively small cost of installation for a smaller site compared to a large travel hub rather than an indication of electricity generation performance. The falling cost of solar generation technology and policy drivers to deliver sustainable and low carbon solutions are leading to its adoption for larger travel hub projects currently at the planning stage. The inclusion of solar panels in more isolated locations may present challenges if proposed in green belt locations, but could be beneficial in terms of power self-sufficiency for the site.

While sites vary in their facilities, a common theme across all examples is the provision of at least basic security and help features to ensure a safe and pleasant environment for users. These features are of particular importance at urban fringe sites which may have little or no natural surveillance or passing traffic.

Quarterly Progress Report

Report to: Greater Cambridge Partnership Joint Assembly

Date: 24th February 2021

Lead Officer: Niamh Matthews – Head of Strategy and Programme, GCP

1. Background

- 1.1 The Quarterly Progress Report updates the Joint Assembly on progress across the Greater Cambridge Partnership (GCP) programme.
- 1.2 The Joint Assembly is invited to consider the progress to be presented to the Executive Board and in particular:
 - (a) Note an update on the progress of the procurement process for the new package of Skills interventions, to commence delivery from April 2021, and endorse the preferred bidder (see section 7); and
 - (b) Endorse the multi-year budget strategy as outlined in section 15 and Appendix 3, including the detailed GCP budgets for 2021/22. The budget strategy will continue to be updated annually.

2. 2020/21 Programme Finance Overview

- 2.1 The table below gives an overview of the 2020/21 budget and spend as of 31st January 2021:

Funding Type	**2020/21 Budget (£000)	Expenditure to Jan 21 (£000)	Forecast Outturn (£000)	Forecast Variance (£000)	Status*		
					Previous	Current	Change
Infrastructure Programme	41,297	22,885	29,826	-11,472	A	A	↔
Operations Budget							

* Please note: RAG explanations are at the end of this report.

** 2020/21 Budget includes unspent budget allocations from the 2019/20 financial year, in addition to the allocations agreed at the February 2020 Executive Board.

Key: R = Red, A = Amber, G = Green – see end of paper for RAG explanations.

3. Impact of Covid-19 on the GCP Programme

3.1 As discussed by the Joint Assembly and Executive Board throughout 2020, it is difficult to predict the full impact that Covid-19 will have on the delivery of the GCP programme, as significant uncertainties remain e.g. around the impact that any further social distancing measures may have on scheme delivery.

3.2 However, the table below identifies new emerging impacts (e.g. delays, and anticipated changes) on the programme and provides references to further discussion throughout this paper, where applicable.

Workstream	Project	Impacts	Paragraph Reference
Housing	N/A	N/A	N/A
Skills	Greater Cambridge Apprenticeship Service	Risks around job market stability, student disengagement in career planning activities, collecting destination information for 2020 school leavers.	6.7
		Limited apprenticeship opportunities in some sectors.	6.7
Smart	T-CABS (C-CAV3 Autonomous Vehicle Project)	Ongoing restrictions have delayed progress; project extension to July 2021 requested.	9.1
	Digital Wayfinding	Wayfinding options updated in light of user needs related to the pandemic.	9.2
	Mill Road Bridge Closure: Ongoing Data Analysis	Analysis of data made more difficult by the impacts of the pandemic.	9.4
Transport	Waterbeach to Cambridge	Consultations completed in line with Government restrictions.	12.5
	Eastern Access		12.6
	Experimental Traffic Regulation Orders		12.10
	Histon Road	Work continues. Potential delays if measures tightened; additional cost implications.	12.9, 15.10
	Chisholm Trail	Work temporarily paused due to Covid-19.	n/a
Economy and Environment	Greater Cambridge implementation of the Local Economic Recovery Strategy (LERS)	Officers working with local partners to align delivery of local action to the pillars of the LERS.	13

Housing and Strategic Planning

“Accelerating housing delivery and homes for all”

Indicator	Target	Timing	Progress/ Forecast	Status		
				Previous	Current	Change
Housing Development Agency (HDA) – new homes completed	250	2016 - 2018	301	Scheme Complete		
Delivering 1,000 additional affordable homes**	1,000	2011- 2031	854 (approx.)	A	A	↔

** Based on housing commitments as included in the Greater Cambridge Housing Trajectory (April 2020) and new sites permitted or with a resolution to grant planning permission at 31 December 2020 on rural exception sites, on sites not allocated for development in the Local Plans and outside of a defined settlement boundary.

Key: R = Red, A = Amber, G = Green – see end of paper for RAG explanations.

4. Housing Development Agency (HDA) Completions

- 4.1 The indicator for “Housing Development Agency (HDA) – new homes completed” is marked as complete. This reflects that the new homes directly funded by the Greater Cambridge Partnership have all been completed. 301 homes were completed across 14 schemes throughout Greater Cambridge.
- 4.2 Both Cambridge City Council and South Cambridgeshire District Council are continuing to deliver more new homes in Greater Cambridge over the next five years. This delivery is funded by various sources, including £70m funding via the Cambridgeshire and Peterborough Devolution Deal for the City Council programme. The GCP will continue to work with partners to explore additional opportunities to unlock further affordable housing.

5. Delivering 1,000 Additional Affordable Homes

- 5.1 The methodology, agreed by the Executive Board for monitoring the 1,000 additional homes, means that only once housing delivery exceeds the level needed to meet the Cambridge and South Cambridgeshire Local Plan requirements (33,500 homes between 2011 and 2031) can any affordable homes on eligible sites be counted towards the 1,000 additional new homes.
- 5.2 The Greater Cambridge housing trajectory published in April 2020 shows that it is anticipated that there will be a surplus, in terms of delivery over and above that required to meet the housing requirements in the Local Plans, in 2021-2022. Until 2021-2022, affordable homes that are being completed on eligible sites are

contributing towards delivering the Greater Cambridge housing requirement of 33,500 dwellings.

- 5.3 Eligible homes are “*all affordable homes constructed on rural exception sites and on sites not allocated for development in the Local Plans and outside of a defined settlement boundary*”.
- 5.4 The table above shows that on the basis of known rural exception schemes and other sites of 10 or more dwellings with planning permission or planning applications with a resolution to grant planning permission by South Cambridgeshire District Council's Planning Committee, approximately 854 eligible affordable homes are anticipated to be delivered between 2021 and 2031 towards the target of 1,000 by 2031. In practice this means that we already expect to be able to deliver 85% of the target on the basis of currently known sites.
- 5.5 Anticipated delivery from the known sites has been calculated based on the affordable dwellings being delivered proportionally throughout the build out of each site, with the anticipated build out for each site being taken from the Greater Cambridge Housing Trajectory (April 2020) or from the Councils' typical assumptions for build out of sites (if not a site included in the housing trajectory). When actual delivery on these known sites is recorded, more or less affordable dwellings could be delivered depending on the actual build out timetable of the affordable dwellings within the overall build out for the site and also depending on the actual delivery of the known sites compared to when a surplus against the housing requirements in the Local Plans is achieved.
- 5.6 Although anticipated delivery is below the target of 1,000 affordable dwellings by 2031, the latest housing trajectory shows that 37,970 dwellings are anticipated in Greater Cambridge between 2011 and 2031, which is 4,470 dwellings more than the housing requirement of 33,500 dwellings. There are still a further 10 years until 2031 during which affordable homes on other eligible sites will continue to come forward as part of the additional supply, providing additional affordable homes that will count towards this target. Historically there is good evidence of rural exception sites being delivered and therefore we can be confident that the target will be achieved.

Skills

“Inspiring and developing our future workforce, so that businesses can grow”

Indicator	Target (to March 2021)	Progress (31/12/20)	Status		
			Previous	Current	Change
Number of people starting an apprenticeship as a result of an Apprenticeship Service intervention.	420	425	G - Met		↔
Number of new employers agreeing to support an apprenticeship scheme.	320	411	G - Met		↔
Number of schools supporting new, enhanced apprenticeship activity.	18	25	G - Met		↔
Number of students connected with employers.	7,500	10,781	G - Met		↔

Progress data from the start of the contract in March 2019, up to 31st December 2020

Key: R = Red, A = Amber, G = Green – see end of paper for RAG explanations.

6. Update on the GCP Apprenticeship Service

- 6.1 The GCP Apprenticeship Service, delivered over two years, has now been operating for eight quarters.
- 6.2 Monitoring data for the four service KPIs is outlined in the table above. Data is reported as of December 2020. Service data shows that:
- Form the Future (FtF) have exceeded the four targets for the whole contract with two months of activity still to report on;
 - Despite current challenges in relation to lockdown restrictions and an unstable job market, the service has exceeded its target for 420 people starting an apprenticeship as a result of its interventions; and
 - The amount of people starting apprenticeships in Q7 and Q8 (July-December 2020) is down in comparison to the same period in 2019, but is broadly in line with the national reduction in apprentice starts recorded due to the pandemic. Data across the East of England shows there was a 55% drop in new starts in Q4 2020 regionally.
- 6.3 FtF's careers advice team has been actively monitoring the availability of apprenticeship jobs in order to accurately inform young people and their parents about the labour market in light of Covid-19. This quarter, FtF have held nine events with 703 students, bringing the total number of student-employer engagements to 10,781. The service continues to offer one to one services to candidates. Moreover, FtF have adapted the Greater Cambridge Apprenticeship Service website as part of their new website development, using new tools to offer a more effective search function and improve the presentation of results. This went live in December.

- 6.4 FtF continue to adapt service delivery in light of the pandemic. This includes operating virtual meetings with employers; 114 meetings were held with potential apprentice employers over October, November and December 2020. Moreover, they currently have 29 telephone/video employer meetings booked for January 2021. In addition to these meetings, FtF has been providing support to small employers with registering to claim additional incentive payments for apprenticeships (in light of the Government response to Covid-19). FtF plan to offer an Apprenticeship Service Webinar to update employers with the changing funding and incentive payments available during National Apprenticeship week in February.
- 6.5 The Service is currently working with 25 schools who have agreed to support enhanced apprenticeship activity. Schools have welcomed the blended approach taken by the Service, including online live delivery, resources to be used in lesson planning and other independent working resources. FtF has also recently created a website to provide post-16 options for students and parents and an apprenticeships event held in November was very successful, with participation from 12 apprenticeship employers - including Amazon, Aveva, the NHS and WSP - and about 150 participants. Moreover, FtF ran two NHS careers events focused on apprenticeships, attended by about 200 people. FtF will consult schools in January 2021 to understand their requirements and constraints, and how FtF could adapt delivery again to continue to reach and support their students.
- 6.6 FtF's annual conference in December 2020 provided an opportunity to engage school and business leaders on the topic of how can we prepare young people for opportunities in a post-Covid-19 labour market. The engagement and feedback from this event will help FtF to continue to strengthen its engagement with schools and businesses for the remainder of this programme.
- 6.7 FtF has observed that the profile of opportunities available has been affected by Covid-19, citing that some industries (e.g. catering and hospitality and Early Years) appear to be reluctant to take on the usual number of apprentices for this time of year. In addition to this specific insight, previous risks around re-engaging students who are at risk of disengaging in careers guidance activities and the general instability in the labour market remain significant.
- 6.8. Looking forwards, one of the virtual events planned for 2021 is a multi-school sixth-form/college virtual careers fair before Easter. This will be a virtual version of the popular Opportunities Ahead event, with employers exhibiting from 'stalls', a seminar/workshop series, and access to careers advisors and other support. This will offer a great opportunity to profile apprenticeships and will engage many of the leading local employers.

7. Update on Future Skills Contract

- 7.1 In October 2020, the Executive Board agreed to procure a new skills contract, to begin in April 2021. The value of the contract is c£2.2m and will run over four years to 2025. The tender for the new contract was launched on 11th November 2020 and closed on 14th December 2020.
- 7.2 Three bids were received for the tender and they have all now been moderated. The quality of the bids was generally high and officers have been able to identify a preferred bidder. The successful bid scored a c.95% combined quality and price

score and came from the incumbents, Form the Future. As part of their successful bid, Form the Future will continue to work with Cambridge Regional College (CRC) to deliver the new Service. The Service will also work to collaborate with the Cambridgeshire and Peterborough Combined Authority as part of the delivery of their Business Growth Service.

- 7.3 As agreed by the Executive Board, the GCP's new Skills Service will work across schools, adults and businesses to support local communities to recover from the impacts of Covid-19. The Service will need to be flexible in order to target the right issues at the right time as we learn more about the impact of Covid-19 on our economy. In summary, the initial programme of work will target the following areas:

Working With Schools

It will:

- Work with local education establishments to establish a Cambridge Curriculum and ensure that this prepares students for work opportunities within the sectors important to the Greater Cambridge economy;
- Provide careers advice and a mentoring service in schools, with special support for promoting technical education; and
- Provide support for Science, Technology, Engineering and Math (STEM) outreach activities.

Working With Businesses

It will:

- Provide support to employers to ensure they are able to navigate national and local funding opportunities. This includes mentoring support;
- Work with employers to provide a significant uplift in the provision of work experience and industry placements;
- Provide business with direct support to enable them to access apprenticeship and training services. This support will incentivise and encourage businesses to engage in apprenticeship and training activity and ease their pathway through the process of recruiting trainees and apprentices; and
- Engage and stimulate demand with businesses where apprenticeship and training take up is low.

Working With Adults

This Service will be required to provide careers advice and guidance in the community for those looking to retrain and provide intensive support to those with skills and retraining needs. It will:

- Provide focused and intensive support for adults with skills and retraining needs; and
- Provide Careers advice in the community to reach adult jobseekers or career changers.

7.4 The new Service will deliver a bespoke web presence that will enable businesses, potential apprentices/trainees and people looking to retrain to access information and make connections that will support them further. The platform will provide a function to collect feedback to enable follow up, recording of successful connections and tangible outcomes.

7.5 Officers are now working intensively with Form the Future and CRC to initiate the contract so the new Service can be operative by 1st April this year.

8. Update on City Deal Delivery of 420 Additional Apprenticeships

8.1 A key commitment in the Greater Cambridge City Deal is for partners to deliver 1,556 apprenticeship starts aligned to local growth sectors over five years (which is assumed to be five academic years, starting in August 2015). Particularly, this includes “an additional 420 Level 2 and Level 3 Apprenticeships over five years in areas aligned to Greater Cambridge’s growth sectors”. In summary, recently released data shows that there were 743 additional apprenticeships in growth sectors in the first five years of the City Deal.

8.2 Given the commitment to deliver 1,556 apprenticeships starts (of which 420 are additional), the City Deal commitments includes 1,136 “expected” starts and 420 “additional” starts for apprenticeships in local growth sectors, from August 2015 to July 2020.

8.3 The Joint Assembly and Executive Board received an update on progress towards the delivery of this target in early 2020. The update covered apprenticeship starts from August 2015 to July 2019 (i.e. four of the five academic years). In order to be on track to achieve the 420 “additional” apprenticeships target, based on evenly distributing the 1,556 total apprenticeship starts identified by the City Deal over the five years, we expected to see a total of 1245 starts by July 2019, of which 909 were “expected” and 336 were “additional”.

8.4 Analysis in February 2020 identified that, over the four academic years with available data, 481 “additional” apprenticeships were started in Greater Cambridge growth sectors, based on a total of 1,390 recorded Level 2 and Level 3 apprenticeship starts in growth sectors in the period. Based on this, officers expressed confidence that more than 420 additional apprenticeships would be achieved by the end of the five year period, in July 2020.

8.5 Apprenticeships data for the 2019/20 academic year (i.e. to July 2020) was released at the end of 2020. This data shows that, in the 2019/20 academic year, a further 489 Level 2 and Level 3 apprenticeships were started in growth sectors.

8.6 In total, 1,879 Level 2 and Level 3 apprenticeship starts were recorded in local growth sectors in Greater Cambridge over the five years from August 2015 to July 2020. This figure far exceeds the commitment to generate 1,556 apprenticeship starts. Given that only 1,136 starts were “expected” over the period (based on the City Deal commitment), this means that during the course of the first five years of the City Deal, local interventions supported the delivery of 743 “additional” apprenticeships in local growth sectors in the city-region.

Smart Places

“Harnessing and developing smart technology, to support transport, housing and skills”

9. Smart Programme Overview

Project	Target Completion Date	Forecast Completion Date	Status		
			Previous	Current	Change
T-CABS (CCAV3 Autonomous Vehicle Project)	Dec 2020	Mar 2021	A	A	↔
Digital Wayfinding – Procurement and Installation	Jun 2021	Jun 2021	G	G	↔
ICP Development – Building on the Benefits	Mar 2021	Mar 2021	G	G	↔
Mill Road Bridge Closure: Ongoing Data Analysis	Oct 2020	Feb 2021	A	A	↔
Data Visualisation – Phase 2	Mar 2021	Mar 2021	A	A	↔
Digital Twins Phase One	Complete				
New Communities Phase One (<i>Extended</i>)	Jun 2020	Mar 2021	G	G	↔
Smart Signals – Phase One	Mar 2021	Mar 2021	G	G	↔
Strategic Sensing Network – Phase One	Mar 2021	Mar 2021	G	G	↔

Progress reported up to 15th January 2021

Key: R = Red, A = Amber, G = Green – see end of paper for RAG explanations.

9.1 T-CABS (C-CAV3 Autonomous Vehicle Project)

The November lockdown and subsequent move of Coventry (where the supplier team is based) into Tier 3 meant that the team have been unable to return to site. This means that we have not been able to carry out any further mapping of the West Cambridge route and no trial journeys have taken place. With this in mind, we have submitted a project change request (PCR) to InnovateUK, requesting an extension of the project by a further three months. If approved, this will give a new end date of 30th June 2021 and give us the best possible opportunity to return to West Cambridge and carry out our trial.

Work on the next two shuttles has been able to continue in Coventry and we expect to have those ready on schedule. This will give us a three vehicle fleet onsite in March (lockdown dependent). We will begin mapping and testing the route as soon as possible, with the aim of moving to passenger trials as soon as it is safe to do so.

Furthermore, the team are looking at the business case for the use of Autonomous Vehicles to connect Eddington and West Cambridge in the future. The first draft of this document has been received this month (January) and a final draft is expected in March 2021. The document is likely to contain some confidential information and

may not be published in its entirety, but a summary of the document will be made available on the Smart Cambridge website.

The Smart team continue to work closely with stakeholders including the University of Cambridge and DfT to plan trial activities in detail ahead of a return to site as soon as possible.

9.2 Digital Wayfinding – Procurement and Installation

The digital screen at the station has now been updated with new signage reading 'Travel Information' making it clearer for visitors. A new map of walking routes has also been designed and installed. This is a static map (removing the need for travellers to use a touchscreen) and also features a QR code which can be scanned to your smart device allowing you to take a copy of the map with you as you follow the route. Our ambition has been to supplement these walking routes with coloured markers, reassuring travellers that they are headed in the correct direction. Unfortunately, we have experienced a number of issues relating to the installation approvals process which will cause a delay to implementation. However, discussions are on-going and a revised plan will be issued as soon as possible. On completion we will evaluate the applicability and success of this approach to determine whether it could also be useful elsewhere.

The team have also been supporting the Cambridge Biomedical Campus (CBC) to develop a procurement specification to secure external support to deliver better wayfinding on campus. Smart will continue to support the CBC team as the project develops.

9.3 ICP Development – Building on the Benefits

An issue with the bus arrival time data being fed into our Smart Cambridge platform from the Traveline National Data Set (TNDS) was identified on 20th October. An unannounced change had been made to code pushed out by the operators' data feed providers, which affected both our feed and others, including Stagecoach. This caused failures in a number of system components, which meant that the cause of the issue was not immediately clear.

The Smart team at the University of Cambridge computer labs were able to work with Traveline Information Ltd and DfT to get the issue resolved for both ourselves and others using the same data feed nationwide. The team's involvement helped all parties, including DfT, to understand the impact of the change. As there is a strategic review of UK open bus data currently being sponsored by DfT, this incident allowed Smart to have significant input to the process ensuring that the next generation of infrastructure will have fewer design flaws.

Resolving the issue quickly ensured that our applications such as the Smart Panels and Pocket Smart Panels continued to provide accurate information for travellers and supports our reputation in collaborating closely with large organisations to get the best outcomes from our data.

The team regularly review a range of activities to build on the benefits of the ICP Development, including improving the quality of bus data and journey time

predictions, supporting our existing applications and determining ways in which additional data sources can be displayed via the Smart Cambridge platform.

9.4 Mill Road Bridge Closure: Ongoing Data Analysis

The final draft of the Mill Road report has been sent out for final review. As soon as comments have been collated and any changes made, it will be published on the Smart Cambridge website. As mentioned last quarter, the changes in circumstance between this summer and last were too great to make any meaningful comparison. Instead, the report focuses on what we learnt from the deployment of the sensors and capture of data during the closure of the Mill Road bridge to facilitate works by network rail in Summer 2019. This information, particularly in relation to the deployment of sensors and methods of capturing data, have been incorporated into new sensor deployments and also contribute to the development of the new Strategic Sensing Network highlighted in paragraph 8.8.

9.5 Data Visualisation – Phase 2

Data from our Vivacity sensors (monitoring traffic flow across the city) and other key data streams have now been ingested into the latest version of the Geospock platform. The Business Intelligence team has access to the platform and following their training last quarter, are beginning to integrate data feeds into Power BI, the tool used by Cambridgeshire County Council which supports the production of dashboards and visualisations.

The goal of this work is to support getting the maximum value from the rich data sources collected by the local authority. By combining them in easily understandable visualisations, more detailed analysis of scenarios can be communicated to officers, members and where appropriate, the wider public.

9.6 New Communities – Phase 1 (Extended)

Smart Infrastructure topic papers prepared by the programme have informed the emerging NE Cambridge Area Action Plan and work is on-going to embed 'Smart' principles and opportunities for data and digital in place-making within the new local plan.

Engagements with other cities and organisations such as Oxford and the Centre for Digital Built Britain also continue to ensure that Cambridge benefits from the knowledge of similar activities being undertaken for new communities across the Arc.

9.7 Smart Signals – Phase 1: Procurement and Installation

As reported last quarter, Smart officers are leading a project to trial an innovative traffic signal control method utilising the latest sensor technology, to optimise traffic signal timings. The intelligent sensors are capable of classifying and counting multiple types of road users, using an algorithm to process this information and feed it in to the traffic signal controller to improve responses to changing traffic flows.

Amongst other objectives, the trial will look to understand the ability of such a solution to prioritise and reduce delays for various sustainable modes of transport at

individual or multiple junctions, and how traffic flow through junctions can be improved.

Phase one of the work is progressing to schedule. The hardware to be used on the three Hills Road junctions will be installed by the end of March with the new configuration of controllers also in place. Phase Two, starting in April 2021, will see data gathered, analysed and tested for up to three months prior to any control being passed to the systems.

In mid-January, the Signals and Systems team started a 16-week refurbishment of the Robin Hood junction on Cherry Hinton Road. As the new signals are installed the relevant infrastructure for the smart signals will also be deployed and configured. This is expected to be completed by mid-May, after which testing of the signals systems will take place using the same methods used on Hills Road.

9.8 Strategic Sensing Network – Phase 1: Scoping and Procurement

As mentioned last quarter, Smart are leading on the procurement of a strategic sensing network that would provide classified vehicle counts, cycle counts and pedestrian counts to support the wider GCP programme. To ensure maximum value from the network, we are engaged with Cambridgeshire County Council and the Cambridgeshire and Peterborough Combined Authority (CPCA) to ensure the network meets their data requirements and to develop a co-funding model.

Over the last month draft data principles have been developed and we are currently working with partners to map data needs. This will inform the financial and operating models of the network, as well as the procurement.

Transport

“Creating better and greener transport networks, connecting people to homes, jobs, study and opportunity”

10. Transport Delivery Overview

10.1 The table below gives an overview of progress for ongoing projects. For an overview of completed projects, including their relation to ongoing projects, please refer to Appendix 1.

Project		Current Delivery Stage	Target Completion Date	Forecast Completion Date	Status		
					Previous	Current	Change
Cambridge Southeast Transport Study (formerly A1307)		Construction / Design	2024	2024	G	G	↔
Cambourne to Cambridge / A428 Corridor		Paused	2024	2024	R	R	↔
Waterbeach to Cambridge		Early Design	2027	2027	G	G	↔
Eastern Access		Early Design	2027	2027	G	G	↔
Milton Road		Design (Reprofiled)	2023	2023	G	G	↔
City Centre Access Project		Design	2020	2021	A	A	↔
Chisholm Trail Cycle Links	Phase 1	Construction	2020	2021	A	A	↔
	Phase 2	Construction	2022	2022	G	G	↔
Cross-City Cycle Improvements	Fulbourn / Cherry Hinton Eastern Access	Construction / Complete	2019	2020	A	R	↓
	Links to East Cambridge and NCN11/ Fen Ditton	Complete					
Histon Road Bus Priority		Construction	2022	2021	G	G	↔
West of Cambridge Package		Design	2021	2022	A	A	↔
Residents Parking Implementation		Implementation / Paused	2021	2021	R	A	↑
Waterbeach Greenway		Project Initiation	2024	2024	G	G	↔
Fulbourn Greenway		Project Initiation	2024	2024	G	G	↔
Comberton Greenway		Project Initiation	2025	2025	G	G	↔
Melbourn Greenway		Project Initiation	2025	2025	G	G	↔
St Ives Greenway		Project Initiation	2023	2023	G	G	↔
Continued Overleaf							

Barton Greenway	Project Initiation	2025	2025	G	G	↔
Bottisham Greenway	Project Initiation	2025	2025	G	G	↔
Horningsea Greenway	Project Initiation	2025	2025	G	G	↔
Sawston Greenway	Project Initiation	2025	2025	G	G	↔
Swaffhams Greenway	Project Initiation	2025	2025	G	G	↔
Madingley Road (Cycling)	Design	2022	2022	G	G	↔

Key: R = Red, A = Amber, G = Green – see end of paper for RAG explanations.

- 10.2 Whilst the forecast completion dates captured above include the likely impacts of Covid-19 to the extent which they are currently known, it should be noted that considerable uncertainty remains e.g. over the length and extent of social distancing measures and the impact of those on construction works.

11. CBC Update

- 11.1 The Cambridge Biomedical Campus (CBC) is continuing to strengthen its delivery capability including budget provision and associated governance arrangements to respond to the transport challenges for staff and visitors accessing the campus. The campus has established a delivery focused project group, in which GCP is actively participating.
- 11.2 Since the GCP-commissioned transport study in 2018, there has been good progress on the main strategic interventions which will make the biggest difference. These include: Cambridge South Station; Cambridge South-East Transport Scheme for rapid mass transit; the Sawston, Melbourn and several other Greenways, providing high quality segregated cycle routes; significant additional park and ride capacity at Junction 11 of the M11. Together these will increase the number of people able to access the campus via sustainable transport by many thousands a day and all should be delivered over the next four years.
- 11.3 In the meantime, the project group has agreed to focus on two key interim priorities: wayfinding and cycle parking.
- 11.4 On wayfinding, work is intended to address stakeholder concerns about ease of navigation for those travelling to, from and around the site. It will also help to address barriers to the use of sustainable transport. Procurement of a company to develop an implementation plan for wayfinding commenced in Jan 2021, and the supplier is expected to be in place by early March 2021. The campus has engaged with local stakeholders including residents' groups and has committed to continued engagement as the project develops.
- 11.5 Some additional cycle parking has been delivered, but the project group will now focus on determining cycle parking capacity requirements to meet forecast employment growth as well as developing plans to meet this need and ensure timely delivery.

- 11.6 In addition to contributing expertise to support these projects, the GCP is providing a coordinating role with respect to initiatives being delivered across a range of bodies including Cambridgeshire County Council, Cambridge City Council, the CPCA and GCP itself.
- 11.7 GCP is also exploring the use of existing traffic data in the vicinity of CBC to understand the impact of traffic volumes on the surrounding area. Work is at an early stage, but if successful the insight could help to evaluate the effectiveness of the package of interventions.
- 11.8 Of the 47 initiatives identified by the CBC Transport Needs Study, around a third have already been delivered or are active GCP projects. A further 20% have been considered by CBC and have been either superseded or rejected as they are unlikely to proceed at this time. The status of the 47 potential initiatives and GCP's role in supporting their delivery is shown in table 1 below.

Table 1: summary of potential interventions identified in the CBC Transport Needs Study.

Category description	Total initiatives in this category	Comments on GCP's Role
Rejected by CBC as being impractical or unlikely to proceed at this time	7	Of the initiatives unlikely to proceed at this time, two relate to ameliorating the impact of non-urgent delivery. GCP is keeping in close touch with CBC as these could be reconsidered in the context of a City Access-led deliveries pilot.
Superseded by external changes - no longer required.	2	N/A
Now part of campus day to day operations. Many relate to behaviour change	13	No specific role but GCP takes a keen interest in the campus annual monitoring and is available to provide support as required.
Initiatives that are part of existing major funded GCP schemes.	5	GCP is the lead on these schemes and is ensuring frequent engagement with the campus.
Items potentially in scope for GCP cycle schemes subject to prioritisation and funding.	2	GCP will continue to engage with the campus during prioritisation. If these schemes cannot be funded by GCP, they will not progress unless alternative funding sources are found
Items where the County Council and/or CPCA is the key delivery body e.g. bus services, ticketing and highways operations. The campus is seeking help from these bodies.	9	GCP is providing support and facilitation as required
Items which depend on transport master planning being commissioned by the campus in early 2021	6	GCP is providing support and facilitation as required
Other items where the campus is the delivery body	4	GCP is actively collaborating and facilitating work to increase cycle parking provision and improvements to wayfinding on the campus.
TOTAL	48	

Please note that one initiative had two distinct parts (one relating to buses and one to cycles) and has therefore been split into two, making a total of 48.

12. 2020/21 Transport Finance Overview

12.1 The table below contains a summary of the expenditure to January 2021 against the budget for the year.

Project	Total Budget (£000)	2020-21 Budget (£000)	2020-21 Forecast Outturn Jan 21 (£000)	2020-21 Forecast Variance Jan 21 (£000)	2020-21 Budget Status		
					Previous	Current	Change
Cambridge Southeast Transport (formerly A1307)	147,935	12,945	6,260	-6,685	G	G	↔
Cambourne to Cambridge / A428 corridor	157,000	4,500	1,200	-3,300	G	G	↔
Waterbeach to Cambridge	52,600	236	236	0	G	G	↔
Eastern Access	50,500	532	282	-250	G	G	↔
West of Cambridge Package	42,000	1,817	5,465	+3,648	A	A	↔
Milton Road Bus, Cycle and Pedestrian Priority	23,040	116	340	+224	A	A	↔
Histon Road Bus, Cycle and Pedestrian Priority	10,000	7,209	5,200	-2,009	G	G	↔
City Centre Access Project	9,888	2,290	1,600	-690	G	G	↔
Travel Hubs	700	100	75	-25	G	G	↔
Residents Parking Implementation	1,191	350	150	-200	G	G	↔
Chisholm Trail	20,851	3,710	3,710	0	G	G	↔
Greenways Quick Wins	3,079	0	0	0	G	G	↔
Greenways Programme	76,000	3,208	950	-2,258	G	G	↔
Cross-City Cycle Improvements	11,266	306	306	0	G	G	↔
Maddingley Road (Cycling)	170	170	243	+73	A	A	↔
Cambridge South Station	1,750	749	749	0	G	G	↔
Programme Management and Scheme Development	3,350	343	343	0	G	G	↔
Total	611,320	38,581	£27,109	-£11,472	A	G	↑

Key: R = Red, A = Amber, G = Green – see end of paper for RAG explanations.

12.2 The explanation for any variances is set out in the following paragraphs.

12.3 Cambridge South East Transport Study (A1307)

The current overall planned spend for 2020/21 for Cambridge South East is forecast under budget at £6.3m. The forecast underspend is a result of land acquisition and

other issues for Phase 1, which are currently being resolved. Construction works for Phase 1 are now planned to start in April 2021.

12.4 Cambourne to Cambridge (A428)

Cambourne to Cambridge has been paused for much of 2020/21. Based on this, an underspend on £3.3m is forecast this year.

12.5 Waterbeach to Cambridge

The Strategic Outline Business Case for Waterbeach to Cambridge will be considered by the GCP Executive Board in July 2021. Current work involves identifying and evaluating options. The first public consultation has been completed and technical work resumed. The spend profile is currently on target.

12.6 Eastern Access

The Strategic Outline Business Case for Eastern Access is currently due to be completed by the end of March 2021, with a view to consideration by the GCP Executive Board in July 2021. Current work involves identifying and evaluating options, with the first public consultation now completed. Further planning work is ongoing and once this has been completed, the spend profile will be updated.

12.7 West of Cambridge Package

Reported forecast variance for the West of Cambridge Package relates to spend on the Cambridge South West Travel Hub (CSWTH). As previously reported, this spend, relating to land purchase, was expected to occur in 2019/20; however, the exchange of funds was in fact completed in June 2020. The scheme submitted a planning application in June 2020. A decision is expected in May 2021. Workload associated with the project will increase as it progresses towards procurement of detailed design and construction.

Foxton Travel Hub is aiming to submit for planning permission in October 2021 and related works are currently on programme and forecast to come in on budget.

As noted in 15.8, it is expected that after July 2021, CSWTH and Foxton Travel Hub will be separated and monitored based on individual budgets.

12.8 Milton Road Bus, Cycle and Pedestrian Priority

To manage network capacity, construction of Milton Road has been delayed to coincide with the completion of the Histon Road works. The scheme remains in Detailed Design stage. As certain preparatory works (coring surveys and Ground Penetrating Radar surveys) have been brought forward, the outturn spend for this financial year is expected to be higher than originally forecast.

12.9 Histon Road Bus, Cycle and Pedestrian Priority

The scheme on Histon Road is under construction and is due to be completed in Summer 2021. The project remains on schedule to meet this timeline. However, the budget profile has changed with approximately 2 month's costs moved into

2021/22, amounting to a reduction in this year's spend profile by approximately £2m.

12.10 City Centre Access Project

This year's City Centre Access budget is being revised to take account of the experimental traffic management measures that are to be delivered by GCP in response to the Covid-19 pandemic. These will be funded from within this year's budget allocation.

12.11 Travel Hubs

Initial work on designing better bus access to Whittlesford Station has been paused until the initial findings from the strategic review of the A505 (Royston to Granta Park) study are available later in the year. Consequently, expenditure this year is expected to be concentrated in the second half of the financial year.

12.12 Residents' Parking Implementation

As the implementation of further Residents' Parking Schemes has been suspended, the focus this year is on the implementation of schemes approved prior to this suspension and reviewing previously installed schemes.

As a result of the suspension, an underspend of £200k is forecast this year. As outlined in 15.11, residents' parking will be considered within the development of an integrated parking strategy, which is described in more detail in the report on City Access (item 6).

12.13 Chisholm Trail

Works on Chisholm Trail Phase 1 are progressing but the forecast outturn has exceeded the original budget. A report on overall project overspend was submitted to the Executive Board in December 2020 where an additional budget of £6.582m was agreed for Phase 1 of the Chisholm Trail, bringing the overall budget for both Phases 1 and 2 to £20.851m. The annual budget and forecast for the current year remains unchanged for now.

GCP officers are working with County Council officers to finalise apportionment costs associated with both Phase One of the project and the Abbey Chesterton Bridge.

12.14 Greenways Quick Wins

The programme of works for Greenways Quick Wins is substantially complete, with some minor works (at Rampton and Stourbridge Common/Riverside) due for completion as soon as possible within the current financial year (subject to government guidelines permitting).

12.15 Greenways Programme

The development work for the 12 Cycling Greenways is substantially complete. All consultations have been completed and no further spend is expected in the development phase.

The status of the 12 Cycling Greenways that have been developed through this work is as follows:

Status	Greenway	Agreed Budget (Overall)
Agreed February 2020	Waterbeach	£8m
	Fulbourn	£6m
Agreed June 2020	Comberton	£9m
	Melbourn	£6.5m
	St Ives	£7.5m
Agreed October 2020	Sawston	£9m
	Barton	£10m
	Swaffhams	£4.5m
	Bottisham	£5m
	Horningsea	£2.5m
Agreed December 2020	Haslingfield	£8m
Progressed Through CSETS	Linton	

Due to the delay to the Professional Services Framework procurement process, an anticipated underspend of £2.26m is forecasted for this financial year across the Greenways programme.

12.16 Cross-City Cycle Improvements

The 2020/21 budget for this project is £306k, for completion of works in Fen Ditton and on Fulbourn Road. The Fen Ditton works were completed in November 2020. The expenditure is anticipated to be on target.

12.17 Madingley Road (Cycling)

The 2020/21 budget for this project is £170k. Due to pre-design work on this scheme progressing quicker than originally expected, the outturn spend for this financial year is expected to be higher than originally forecast.

12.18 Cambridge South Station

The 2020/21 budget for Cambridge South Station is £749k. The Department for Transport will draw down this contribution to the development phase within their project timescales.

12.19 Programme Management and Scheme Development

The 2020/21 budget for this project is £343k and the expenditure is anticipated to be on target.

Economy and Environment

13. Greater Cambridge Implementation of the Local Economic Recovery Strategy (LERS) and Local Industrial Strategy (LIS)

- 13.1 As outlined in December 2020, the GCP has engaged extensively with the CPCA and other local partners to support the development and delivery of the LERS. In outline, GCP actions include:
- Supporting the LERS ambition to “accelerate upskilling and retraining”, in particular through the procurement of the new package of Skills interventions as outlined in section 7;
 - Supporting the LERS ambition to “accelerate a greener and more sustainable economy”, through the delivery of the GCP programme for sustainable travel and the realisation of mode shift and environmental objectives;
 - Strengthening the GCP’s contribution to the above objective by updating the Future Investment Strategy in December 2020, prioritising additional future investment in zero emission buses, active travel measures and public transport services and supporting local partners’ commitments to environmental aims;
 - In partnership with Cambridge Ahead, funding in-depth, tailored research through the Centre for Business Research, to understand in more detail the impact of Covid-19 on local sectors in Greater Cambridge.
- 13.2 In December 2020, it was noted that officers will continue to engage with colleagues across Cambridgeshire and Peterborough to support the development and delivery of the LERS in Greater Cambridge. The CPCA intends to conduct a refresh of the LERS over the coming weeks and currently plans to bring an update to the Business Board in March 2021. GCP officers will continue to engage in and support this process.
- 13.3 Additionally, the LIS remains the central document outlining the regional economic growth strategy, supported by the LERS, which seeks to address those impacts of Covid-19 which risk the delivery of the LIS. Local action to deliver the LIS therefore remains paramount to achieve growth objectives.
- 13.4 In January 2020, the GCP and the local authorities in Greater Cambridge (with engagement with the CPCA) collaborated to produce an Action Plan, designed to align ongoing local action with the five ‘foundations of productivity’ outlined in the LIS. The Action Plan identified 82 local actions, grouped under a series of objectives which blend local and regional priorities for growth.
- 13.5 In late 2020, officers undertook an exercise to identify progress against the actions outlined in the Action Plan. The exercise identified that:
- 67 of the 82 actions are either completed, or underway and on track;

- A number of actions have been disrupted by the pandemic, including those relating to business and community engagement, the visitor economy and longer-term skills and business support needs; and
- The local approach to some actions (particularly in relation to inward investment) may need to adapt dependent on the final scope and delivery of the CPCA Business Growth Service, when launched in 2021.

13.6 Officers are set to meet with local colleagues early in February 2021 to review how local action is set to deliver the LERS and the LIS, and how we can bring the different elements of the local approach together throughout 2021.

14. Cambridge&

14.1 In June 2020, the GCP Executive Board agreed to invest £50k into Cambridge&, a private, not-for-profit company set up to develop and deliver an inward investment service for Greater Cambridge, as outlined in the business case included with that report. The expectation was that funding would enable Cambridge& to deliver inward investment activities including identifying and engaging with potential investors, developing a broad virtual offer and raising awareness of the new offer provided by Cambridge& across key stakeholders. This section provides an update on Cambridge& activity since June 2020.

14.2 Cambridge& has identified that resource since June has concentrated on:

- (a) Identifying target investors across its priority sectors (life sciences and healthcare, advanced manufacturing, tech) and developing propositions and strategies to approach them, by engaging a range of expert stakeholders across local sectors;
- (b) Briefing potential investors who are introduced to Cambridge& by the eco-system, national government or otherwise. Examples of successful Cambridge& engagement to date include supporting Medical Incubator Japan (MIJ) to access the Cambridge life science eco-system.
- (c) Developing its virtual offer, including creating a platform for potential 'VIP' investors to access the Greater Cambridge eco-system virtually with a managed programme of activity (in light of the impacts of the pandemic) and building further content to be available to all from launch; and
- (d) Actively participating on various groups relating to inward investment and strategy, including the EELGA Inward Investment Group.

14.3 Specifically, GCP funds were intended to be used to catalyse the digital strategy (including the development of virtual platforms) and to fund additional Cambridge& staff resources, to accelerate the delivery of the organisation's activities. To date, funds have been used for the digital strategy as discussed above and it is expected that remaining funds will be used for further digital realisation to ensure the virtual offer is as compelling as possible.

14.4 Looking forward, GCP officers will continue to work closely with Cambridge& to monitor and support the delivery of benefits for Greater Cambridge. Officers will provide a further update to the Joint Assembly and Executive Board in due course, including more details on the extent of Cambridge& alignment with the CPCA's Business Growth Service, which is due to launch in early 2021.

15. GCP Budget Strategy and Allocations for 2021/22

- 15.1 The attached spreadsheet (Appendix 3) sets out the proposed GCP budget for 2021/22.
- 15.2 Explanations for individual project budget profiles, including any changes to previously agreed budgets and new allocations, are set out below. Proposals assume that any over- or underspend against a given 2020/21 budget line will be rolled over into the 2021/22 budget for that line, unless otherwise specified.

Infrastructure Programme

15.3 Cambridge South East (A1307) – Phase 1

Cambridge South East (CSET) has been separated into two lines, accounting for Phase 1 and Phase 2. For CSET Phase 1, £11.55m has been allocated for 2021/22, reflecting the delivery stage of the project.

The proposed budget assumes that the Executive Board approve the recommendations contained in the City Access paper (item 6), in particular approving £1.3m investment to extend Babraham Road Park & Ride. The budget for 2021/22 assumes spend of all of this investment in the next year.

15.4 Cambridge South East (A107) – Phase 2

£2.7m has been allocated for CSET Phase 2 for 2021/22. This assumes a Transport and Works Act (TWA) application will be submitted in 2021, with procurement activity occurring (following a possible public enquiry) in the 2022/23 financial year. The GCP Executive Board is due to receive a report on this project in July 2021.

15.5 Cambourne to Cambridge (A428)

£2.5m has been allocated for Cambourne to Cambridge for 2021/22. Assuming a new PSF supplier is on-board in 2021 and subject to the outcome of the independent audit, this will enable development of the Environmental Impact Assessment (EIA) including all necessary surveys and consultation, in order to prepare to submit a TWA application in mid-2022. The budget estimate will be refined when a decision is made by the Executive Board to approve a preferred route. The GCP Executive Board is due to receive a report on this project in July 2021.

15.6 Science Park to Waterbeach

£500k has been allocated for the Science Park to Waterbeach scheme in 2021/22. This assumes that the Executive Board will approve the Strategic Outline Business Case (SOBC) in July 2021 and relates to the commissioning of the Outline Business Case (OBC) for the scheme. The overall profile anticipates that the main construction cost will occur between 2025 and 2028. As noted, the GCP Executive Board is due to receive a report on this project in July 2021.

15.7 Eastern Access

£1.5m has been allocated for Eastern Access in 2021/22. Assuming a new PSF supplier is on-board in 2021, this will enable development of the OBC for 'Phase 1' quick wins on Newmarket Road (some of which may be delivered early within the highway boundary as permitted development) and design work for 'Phase 2

packages. The overall spend profile reflects this distinction, with spend anticipated to peak between 2024 and 2027, when the most significant interventions will be delivered. The GCP Executive Board is due to receive a report on this project in July 2021.

15.8 West of Cambridge Package

£2.75m has been allocated for the West of Cambridge package for 2021/22, which includes work on Cambridge South West Travel Hub (CSWTH) and Foxton Travel Hub.

The spend forecast is subject to an ongoing independent budget review with respect to the Full Business Case (FBC) for CSWTH and includes costs for Foxton Travel Hub up to the point of submitting for planning approval. The GCP Executive Board is due to receive reports on both CSWTH and Foxton Travel Hub in 2021, which will contain more cost detail on these two elements of the West of Cambridge Package. Following these reports, it is intended that CSWTH and Foxton Travel Hub will be separated into individual budget lines, to allow better management and monitoring against these individual projects during the more advanced stage of delivery.

15.9 Milton Road Bus and Cycling Priority

£50k has been allocated for the Milton Road scheme for 2021/22. The proposed profile assumes that construction on Milton Road will not begin until April 2022; therefore, budget for the next financial year relates to the cost of finalising the Traffic Regulation Orders (TROs) and Stage 2 Road Safety Audit (RSA2) and any procurement costs ahead of construction in 2022/23. The main construction costs are profiled accordingly.

15.10 Histon Road Bus and Cycling Priority

The Executive Board is recommended to approve an increase to the overall budget allocated to Histon Road of £600k, increasing the overall budget to £10.6m, to cover the final construction costs for the project. The increase is a result of additional unanticipated costs associated with the Covid-19 pandemic, disposal of contaminated materials and unanticipated utility diversion works.

Including anticipated under-spend in the 2020/21 financial year, a total of £2.44m has been allocated for the Histon Road scheme for 2021/22. The profile anticipates that all remaining budget will be spent in 2021/22 (with the exception of a small amount set aside for maintenance of landscaping in future years), with the project due to be completed in summer 2021.

15.11 City Centre Access Project

The budget profile for City Access includes £3.5m allocated to 2021/22 and £8m allocated to 2022/23. As noted in the City Access paper discussed by the Executive Board in December 2020, given current uncertainties, it is not possible at this stage to confirm a detailed long-term budget (beyond 2023).

The proposed budget will progress the work that has been identified to date, including enhancements to sustainable transport, further road space reallocation, additional secure cycle parking, a freight pilot and, depending on the model, an expansion of the electric bus pilot.

Previously the Residents Parking Implementation budget was separated out from the City Centre Access budget, and the unspent element of it will now be returned to the City Centre Access budget in order to consider residents' parking alongside other parking priorities as part of an integrated parking strategy.

In December 2020, the Executive Board agreed that the budget for City Access activities over the next two financial years would be supported by the use of £7.5m of funding identified in the Future Investment Strategy (FIS) for public transport improvements; this has been reflected in the allocation against that budget line, as referenced in 15.14.

15.12 Whittlesford Station Transport Infrastructure Strategy (WSTIS) (formerly Travel Hubs)

£250k has been allocated for WSTIS in 2021/22, to progress scheme development work ahead of scheme implementation starting as early as 2022/23.

15.13 Residents Parking Implementation

See 15.11 above. This funding will be used to consider residents' parking within the development of an integrated parking strategy for review by the Joint Assembly and Executive Board in 2021 (referenced in the City Access paper discussed by the Executive Board in December 2020).

15.14 FIS Allocation – Public Transport Improvements and Sustainable Travel

£2.5m has been allocated to support the delivery of City Access activities in 2021/22, with a further £5m allocated for 2022/23. This reflects the Executive Board decision in December 2020, to allocate £7.5m of the funding identified in the FIS for public transport improvements to support the delivery of City Access activities over the next two years (as described in 15.11).

Cycling

15.15 Chisholm Trail Cycle Links – Phase 1 and Phase 2

£3.33m has been allocated for the Chisholm Trail Phase 1 in 2021/22, with £750k allocated for Phase 2. The profile assumes spend on Phase 2 will peak across 2022/23 and 2023/24. However, as agreed in December 2020, officers are required to develop more detailed proposals for the delivery of Phase 2 of the Chisholm Trail, including revising and updating the programme for scheme delivery, reporting back to the Executive Board in due course.

In previous years, a single budget line has captured spend for both Phase 1 and Phase 2. For 2021/22 onwards, the two phases will be split into separate budget lines, to allow for more effective management and oversight of the budget allocations.

15.16 Madingley Road

The Executive Board is recommended to approve an increase to the overall budget allocated to Madingley Road of £823k, increasing the overall budget to £993k. The proposed budget profile allocates £580k for 2021/22 and £170k to Q2 2022/23. This profile will enable the project to complete options development, preliminary design and partial detailed design work. On completion of this work (i.e. by October 2022) the project will be in a position to undertake a robust overall scheme costing, prior to seeking Executive Board approval to commence construction. During this process, the business case will be progressed accordingly.

15.17 Greenways Programme

The Greenways Programme includes the 12 Greenways approved by the Executive Board to December 2020 (as detailed in section 12.15); officers consider that the budget is most effectively managed as a single programme at the current time. £3m has been allocated for the Greenways Programme for 2021/22, assuming a PSF supplier is on-board in 2021, to deliver design and development work required to progress individual Greenways, along with a number of separate interventions within the adopted highway that can be delivered within this financial year.

Other Transport Allocations

15.18 Cambridge South Station

£635k has been allocated for Cambridge South Station in 2021/22; this represents the carry forward of expected underspend in previous years. The Department for Transport will draw down this contribution within their project timescales.

15.19 Programme Management and Scheme Development

The Executive Board is recommended to approve a budget of £350k per year for 2021/22 and future years, to cover the anticipated additional costs of early work to manage scheme development. This is in line with the 2020/21 budget. This annual budget will be reviewed regularly to ensure it is in line with the requirements of the programme.

Operational Budgets

15.20 In the previous budget setting process, pending the outcome of the Gateway Review in 2020, operational budgets were only allocated for 2020/21 (rather than on an ongoing basis). Given the successful Gateway Review outcome in 2020, it is now proposed to allocate operational budgets across future years.

15.21 Where applicable, operational budget allocations for years beyond 2021/22 have had a 2% uplift each year applied, on top of the allocations described below, to account for inflation. This will be reviewed annually.

15.22 Central Programme Co-Ordination

In order to meet the needs of a post Gateway Review ramped up delivery programme, the Executive Board is recommended to approve a budget of £750k (up from £550k last year) for 2021/22 and future years, towards the central programme co-ordination function of the GCP.

15.23 Engagement and Communications

The Executive Board is recommended to approve the continuation of an £88k budget for 2021/22 and future years. This annual budget will be reviewed regularly to ensure it is in line with the requirements of the engagement and communications programme. This annual allocation is in line with last year's budget.

15.24 Skills

In October 2020, the Executive Board approved a proposal to procure a new Skills contract, over four years, from April 2021. More information on the progress of the procurement process can be found in section 7. £600k is allocated for Skills provision for 2021/22 (and for every financial year to 2024/25), to deliver the new Skills contract, which will cost c£2.2m over four years.

15.25 Evidence, Economic Assessment and Modelling

The Executive Board is recommended to approve an increase to the overall budget allocated to evidence building, economic assessment and modelling activities of £600k, increasing the overall budget to £1.27m. This includes £150k per year for 2021/22 and future years to 2025, in line with last year's budget, to support the design and implementation of the GCP programme's assessment criteria to 2025.

15.26 Affordable Housing

£58k has been allocated for Affordable Housing in 2021/22; this represents the carry forward of expected underspend in 2020/21.

15.27 Cambridgeshire County Council costs

The Executive Board is recommended to approve £33k per year for 2021/22 and future years, in line with last year's budget.

15.28 Planning Capacity and Support (formerly Towards 2050)

In line with last year's budget, the Executive Board is recommended to allocate £100k for 2021/22 for the continued dedicated support from the Greater Cambridge Shared Planning Service.

15.29 Smart

In December 2020, the Executive Board approved the FIS, which included a £2.8m allocation to Smart Cambridge to 2024/25. £1.01m has been allocated for Smart projects in 2021/22. These funds will be used to deliver a number of projects, including the Smart Signals project and e-scooter/bike trials, as well as progressing improvements to the provision of travel information and the procurement and development of an operational sensor network and data platform.

15.30 Energy

£200k has been allocated to support the energy grid capacity reinforcement work in 2021/22, subject to Executive Board approval in March 2021. More information with respect to this allocation is detailed in item 8.

15.31 GCP Formal Meeting Support Costs

The Executive Board is recommended to approve an increase to the overall budget allocated to GCP formal meeting support costs of £72k, increasing the overall budget to £93k. This includes £12k per year for the next 6 financial years, including 2021/22, broadly in line with last year's budget.

16. GCP Budget 2021/22 – Funding Assumptions

16.1 s106 Position

In line with due process, every financial year S106 estimates are reviewed. The s106 estimated profile assumes s106 receipts of c£75m which has not changed from 2020/21. As further s106 negotiations are progressed, this figure will continue to be refined.

16.2 New Homes Bonus (NHB) Position

NHB was introduced in 2011 to provide an incentive for local authorities to encourage housing growth in their areas. Following discussions with Partner authorities, in 2021/22, Cambridgeshire County council will allocate 0% of their NHB to GCP projects, whilst Cambridge City Council and South Cambridgeshire District Council will each allocate 10% of their NHB towards GCP projects. This is reflected in the budget included with this report.

The Government has not yet made a new round of NHB allocations for 2021/22. The Government had indicated it would consult on the future of the housing incentive in the Spring of 2020 but no such review was forthcoming. There is currently no planned date for any future consultation.

- 16.3 The funding estimates have been updated to reflect recovery of the £25m energy grid investment.

17. Citizens' Assembly

- 17.1 The contributions of individual projects to the GCP's response to the Citizens' Assembly are contained in reports relating specifically to those items.
- 17.2 The proposed GCP budget strategy outlined in this report is designed to continue delivery of the GCP's sustainable travel programme, including making significant investments in public transport and active travel networks in Greater Cambridge. While more detail at the project level will determine the level of alignment with the Citizens' Assembly's vision for local transport, the commitments made in the budget overall are in alignment with the Citizens' Assembly's highest priority outcomes, including those in relation to public transport, environmental aims and "people centred" active travel.
- 17.3 No new proposals are contained in this Quarterly Progress Report. However, the GCP continues to actively contribute to the Greater Cambridge approach to implementing the Covid-19 Local Economic Recovery Strategy (LERS) for Cambridgeshire and Peterborough. The LERS contains five 'pillars of delivery', including pillars which relate to a "greener and more sustainable economy". As identified in 13.1, the delivery of the GCP transport programme and its objectives around sustainable transport will support the delivery of this pillar, which in turn aligns with environmental aspects of the Citizens' Assembly's vision for transport in the area.

18. Financial Implications

- 18.1 This report includes an overview of the in-year financial forecasts against budgets as well as an updated multi-year financial strategy and detailed 2021/22 budgets.
- 18.2 At a strategic level the GCP has agreed to over-programme. Planned over-programming in this way is in place to provide future flexibility in programme delivery. Based on the budget presented in Appendix 3, the proposed over-commitment is £123m. This assumes that GCP will be successful in passing the second Gateway Review and will receive the third tranche of funding (£200m).

Have the resource implications been cleared by Finance? YES

Name of Financial Officer: Sarah Heywood

List of Appendices

Appendix 1	GCP Completed Transport Projects
Appendix 2	Executive Board Forward Plan
Appendix 3	Proposed GCP Budget 2021/22

Background Papers

Source Documents	Location
None	-

Note to reader – RAG Explanations

Finance Tables

- **Green:** Projected to come in on or under budget
- **Amber:** Projected to come in over budget, but with measures proposed/in place to bring it in under budget
- **Red:** Projected to come in over budget, without clear measures currently proposed/in place

Indicator Tables

- **Green:** Forecasting or realising achieving/exceeding target
- **Amber:** Forecasting or realising a slight underachievement of target
- **Red:** Forecasting or realising a significant underachievement of target

Project Delivery Tables

- **Green:** Delivery projected on or before target date
- **Amber:** Delivery projected after target date, but with measures in place to meet the target date (this may include redefining the target date to respond to emerging issues/information)
- **Red:** Delivery projected after target date, without clear measures proposed/in place to meet the target date

Appendix 1: GCP Completed Transport Projects

Project		Completed	Output	Related Ongoing Projects	Outcomes, Monitoring & Evaluation
Ely to Cambridge Transport Study		2018	Report, discussed and endorsed by GCP Executive Board in February 2018.	Waterbeach to Cambridge	
A10 Cycle Route (Shepreth to Melbourn)		2017	New cycle path, providing a complete Cambridge to Melbourn cycle route.	Melbourn Greenway	
Cross-City Cycle Improvements	Hills Road / Addenbrookes Corridor	2017	Range of improvements to cycle environment including new cycle lanes.	Cross-City Cycling	
	Arbury Road Corridor	2019	Range of improvements to cycle environment including new cycleway.	Cross-City Cycling	Impact evaluated by SQW in 2019 as part of GCP Gateway Review.
	Links to Cambridge North Station & Science Park	2019	Range of improvements to cycle environment including new cycle lanes.	Cross-City Cycling	Impact evaluated by SQW in 2019 as part of GCP Gateway Review.
	Links to East Cambridge and NCN11/ Fen Ditton	2020	Range of improvements to cycle environment including new cycle lanes.	Cross-City Cycling	
Greenways Quick Wins		2020	Range of cycle improvements across Greater Cambridge e.g. resurfacing work, e.g. path widening etc.		

Greenways Development	2020	Development work for 12 individual Greenway cycle routes across South Cambridgeshire.	All Greenways routes	
Cambridge South Station Baseline Study (Cambridgeshire Rail Corridor Study)	2019	Report forecasting growth across local rail network and identifying required improvements to support growth.	Cambridge South Station	
Travel Audit – South Station and Biomedical Campus	2019	Two reports: Part 1 focused on evidencing transport supply and demand; Part 2 considering interventions to address challenges.	Cambourne to Cambridge; CSETS; Chisholm Trail; City Access; Greenways (Linton, Sawston, Melbourn)	

APPENDIX 2: Executive Board Forward Plan of Key Decisions

Notice is hereby given of:

- Decisions that that will be taken by the GCP Executive Board, including key decisions as identified in the table below.
- Confidential or exempt executive decisions that will be taken in a meeting from which the public will be excluded (for whole or part).

A 'key decision' is one that is likely to:

- a) Result in the incurring of expenditure which is, or the making of savings which are, significant having regard to the budget for the service or function to which the decision relates; and/or
- b) Be significant in terms of its effects on communities living or working in the Greater Cambridge area.

Executive Board: 19th March 2021	Reports for each item to be published 8th March 2021	Report Author	Key Decision	Alignment with Combined Authority
City Access	To receive an update and consider further proposals for measures aiming to improve public transport and reduce congestion, air pollution and carbon emissions.	Isobel Wade	No	CA LTP Passenger Transport / Interchange Strategy
GCP Quarterly Progress Report	To monitor progress across the GCP work streams, including financial monitoring information and a recommendation to appoint a new provider to deliver additional work on skills and training in Greater Cambridge.	Niamh Matthews	No	N/A

Electricity Grid Reinforcement: Update and Next Steps	To provide an update on progress and set out proposals for the programme of works including a commitment to deliver an Outline Business Case (OBC) in Autumn 2021; an outline of the key delivery options and a request for further funding to support the OBC work.	Rachel Stopard	No	N/A
Chisholm Trail Scheme	To provide a detailed analysis of the circumstances that led to the overspend on this scheme; setting out the implications of this for the wider GCP programme; and how project management for this and other projects will change in future in response to this experience.	Peter Blake	No	N/A
Executive Board: 1st July 2021	Reports for each item to be published 21st June 2021	Report Author	Key Decision	Alignment with Combined Authority
GCP Quarterly Progress Report	To monitor progress across the GCP work streams, including financial monitoring information.	Niamh Matthews	No	N/A
Cambourne to Cambridge Better Public Transport Project	To receive an update on the Cambourne to Cambridge scheme, including the findings of the Independent Audit Review, and agree next steps.	Peter Blake	Yes	CA Local Transport Plan
Cambridge South East Transport Scheme	To endorse the Environmental Impact Assessment and proposed planning and consents process for the scheme and agree to submit the relevant applications.	Peter Blake	Yes	CA LTP Passenger Transport / Interchange Strategy

Better Public Transport: Waterbeach to North East Cambridge Project	To note consultation feedback, consider and approve a Strategic Outline Business Case and agree to commence the Outline Business Case process.	Peter Blake	Yes	CA LTP Passenger Transport / Interchange Strategy
Better Public Transport: Eastern Access Project	To note consultation feedback, consider and approve a Strategic Outline Business Case and agree to commence the Outline Business Case process.	Peter Blake	Yes	CA LTP Passenger Transport / Interchange Strategy
Executive Board: 30th September 2021	Reports for each item to be published 20th September 2021	Report Author	Key Decision	Alignment with Combined Authority
Greenways Programme	To approve final scheme proposals and the implementation programme.	Peter Blake	Yes	CA LTP Passenger Transport / Interchange Strategy
Cambridge South West Travel Hub	To consider the full business case and request permission to progress to the construction phase.	Peter Blake	Yes	CA LTP Passenger Transport / Interchange Strategy
Foxton Travel Hub	To endorse the design and budget prior to submitting for planning approval.	Peter Blake	Yes	CA LTP Passenger Transport / Interchange Strategy

Whittlesford Station Transport Infrastructure Strategy	To receive an update on further stakeholder engagement, early outcomes from the A505 multi-modal study and discussions on future bus services, and consider initial design work and costings for improved bus access infrastructure.	Peter Blake	Yes	CA LTP Passenger Transport / Interchange Strategy
Experimental Traffic Regulation Orders – Emergency Active Travel Schemes	<p>To consider the responses to the public consultations along with the objections and representations received during the trial period for the Tranche 1 measures before deciding on a recommendation on the future of the each of the experimental measures.</p> <p>The Tranche 1 measures include schemes at Silver Street; Luard Road; Storey's Way; Newtown Area (phase 1); Nightingale Avenue and Carlyle Road.</p>	Peter Blake	Yes	CA LTP Passenger Transport / Interchange Strategy
GCP Quarterly Progress Report	To monitor progress across the GCP work streams, including financial monitoring information.	Niamh Matthews	No	N/A
Executive Board: 9th December 2021	Reports for each item to be published 29th November 2021	Report Author	Key Decision	Alignment with Combined Authority
GCP Quarterly Progress Report	To monitor progress across the GCP work streams, including financial monitoring information.	Niamh Matthews	No	N/A
Greater Cambridge Citizens' Assembly: Two-Year On Report	To consider a report on the GCP's response, two years on from receiving the Citizens' Assembly report.	Isobel Wade	No	CA LTP Passenger Transport / Interchange Strategy

Executive Board meeting	Reports for each item published	Joint Assembly meeting	Reports for each item published
18 th March 2021	8 th March 2021	24 th February 2021	12 th February 2021
1 st July 2021	21 st June 2021	3 rd June 2021	21 st May 2021
30 th September 2021	20 th September 2021	9 th September 2021	27 th August 2021
9 th December 2021	29 th November 2021	18 th November 2021	8 th November 2021

APPENDIX 3 - GCP BUDGET
Based on budget sheet produced Jan 2021

EXPENDITURE	Agreed Budget £000	Proposed Budget £000	Actual Spend 2015/16 £000	Actual Spend 2016/17 £000	Actual Spend 2017/18 £000	Actual spend 2018/19 £000	Actual Spend 2019/20	Forecast Spend 2020/21 £000	Budget 2021/22 £000	Budget 2022/23 £000	Budget 2023/24 £000	Budget 2024/25 £000	Budget 2025/26 £000	Budget 2026/27 £000	Future Years Budget £000
Infrastructure Programme Investment Budget															
Cambridge South East (A1307) - Phase 1	15,650	16,950	18	20	41	206	756	2,360	11,550	2,000					0
Cambridge South East (A1307) - Phase 2	132,285	132,285	139	155	312	1,582	4,163	3,732	2,700	14,800	54,600	46,000	4,101		0
Cambourne to Cambridge (A428)	157,000	157,000	268	1,485	1,871	1,588	1,820	1,200	2,500	4,000	10,000	26,000	66,100	36,000	4,168
Science Park to Waterbeach (formerly A10 North study)	52,600	52,600	67	72	391	3	125	236	500	1,000	2,000	2,000	12,000	25,000	9,206
Eastern Access	50,500	50,500					115	532	1,500	3,000	7,500	10,000	10,000	12,500	5,353
West of Cambridge Package	42,000	42,000	240	416	717	2,337	6,680	8,607	2,750	11,000	8,600	653			0
Milton Road bus and cycling priority	23,040	23,040	188	238	339	287	576	340	50	9,000	12,022				0
Histon Road bus and cycling priority	10,000	10,600	199	181	46	509	1,388	5,800	2,437	20					0
City Centre Access Project	19,788	20,320	255	566	1,438	1,672	2,563	1,600	3,500	8,726					0
Whittlesford Station Transport Infrastructure Strategy (formerly Travel Hubs)	700	700			84	57	28	75	250	206					0
FIS Allocation - Public Transport Improvements and Sustainable Travel	75,000	75,000							2,500	5,000					67,500
FIS - Housing Investment	20,000	20,000													20,000
Cycling															
Chisholm Trail cycle links - Phase 1 and Abbey-Chesterton Bridge (previously combined with Phase 2)	17,914	17,914	235	679	849	1,493	4,952	5,773	3,333	600					0
Chisholm Trail cycle links - Phase 2	5,000	5,000					0	0	750	2,000	2,000	250			0
Madingley Road	170	993						243	580	170					0
Greenways Programme	76,000	76,000						950	3,000	34,500	22,500	15,050			0
Other Transport															
Cambridge South Station	1,750	1,750			0		366	749	635						0
Programme management and scheme development	3,350	5,450	355	781	802	559	510	343	350	350	350	350	350	350	0
Closed Infrastructure Budgets															
COMPLETE - Residents Parking implementation (to progress through City Centre Access Project)	1,191	659			114	175	220	150							0
COMPLETE - Greenways Quick wins	3,079	3,079			0	2,079	1,000	0							0
COMPLETE - Developing 12 cycling greenways	611	568			256	250	62	0							0
COMPLETE - Cross-city cycle improvements	11,266	11,266	257	864	2,966	4,979	1,894	306							0
COMPLETE - A10 Cycle route - Frog End Melbourn	553	553		511	42										
COMPLETE - Travel Audit - South Station and biomedical campus	200	200			88	112									
Operational budgets	0														
Central Programme Co-ordination	2,809	7540	111	391	728	517	512	550	750	765	780	796	812	828	0
Engagement & Communications	516	1071			251	89	88	88	88	90	92	93	95	97	0
Skills	4,663	4,423	47	188	205	84	343	1,156	600	600	600	600			0
Evidence, economic assessment and modelling	666	1266			31	246	239	150	150	150	150	150			0
Affordable Housing	200	200		10	0	44	65	23	58						0
Cambridgeshire County Council costs	126	334			31	31	31	33	33	34	34	35	36	36	0
Planning Capacity & Support (formerly Towards 2050)	360	960			52	148	60	100	100	100	100	100	100	100	0
Smart Cambridge	5,070	5070		271	391	596	589	423	1,010	745	545	500			0
Energy	25,140	25,140					15	125	200						24,800
GCP Formal Meeting Support costs	21	93					11	10	12	12	12	12	12	12	0
Closed operational budgets	0														
South Cambridgeshire District Council costs	80	80			40	40	0								0
COMPLETE - Cambridge Promotions Agency	150	150	60	90	0										
COMPLETE - Housing Delivery Agency	400	400		200	200										
COMPLETE - Cambridge Promotions	40	40			40										
Total Expenditure	759,888	771,194	2,439	7,118	12,325	19,683	29,171	35,654	41,886	98,867	121,905	102,589	93,606	74,924	131,027
FUNDING															
City Deal grant	500,000	500,000	20,000	20,000	20,000	20,000	20,000	40,000	40,000	40,000	40,000	40,000	40,000	40,000	120,000
S106 contributions	74,500	74,500			7,874	2,000	2,000	2,000							60,626
Energy income		25,000													25,000
NHB - Cambridge City	12,921	12,921	1,986	3,166	2,385	2,238	1,651	967	528						0
NHB - South Cams	8,560	8,560	1,683	2,633	1,570	1,204	742	471	257						0
NHB - CCC	5,153	5,153	917	1,485	1,023	860	599	269							0
Housing income	20,000	20,000													20,000
Interest accrued on grant funding	2,042	2,042	0	80	149	291	253	309							960
Total income	623,177	648,177	24,586	27,364	33,001	26,593	25,245	44,017	40,785	40,000	40,000	40,000	40,000	40,000	226,586
NET OVERALL GCP BUDGET	-136,711	-123,017													
Forecast Cashflow Balance			22,147	42,393	63,069	69,979	66,053	74,416	73,315	14,447	-67,458	-130,047	-183,653	-218,577	-123,017

Electricity Grid Reinforcement: Update and Next Steps

Report to: Greater Cambridge Partnership Joint Assembly

Date: 24th February 2021

Lead Officer: Rachel Stopard, Chief Executive, GCP

1. Purpose of Report

- 1.1 As previously reported to the Joint Assembly and Executive Board, electricity grid capacity constraints in the Greater Cambridge area represent a significant barrier to growth and to current schemes including clean energy projects. Utility providers are constrained to operate reactively to confirmed demand and this can create significant delays in housing and commercial developments and can make unviable projects that help to achieve net zero objectives such as the electrification of transport and renewables projects.
- 1.2 GCP has recognised that the way the electricity market operates is extremely problematic for areas such as Greater Cambridge with high growth forecasts and ambitious plans for addressing climate change. The Greater Cambridge Partnership (GCP) understands that the Climate Commission, set up by the Cambridgeshire and Peterborough Combined Authority (CPCA), shares this concern regarding the energy operating environment and is likely to address this challenge directly in one of its recommendations when the Commission reports shortly. GCP has the opportunity to join this call for market change.
- 1.3 Whilst there is an argument for systematic change at a national level, likely timescales for any changes to market operation are unlikely to meet the identified need and it is recommended that work on the project continues as described in this update.
- 1.4 Early work on this project identified a number of potential initiatives to address grid capacity constraints, but only one fully aligned with the GCP's role and geography. This initiative - which comprises three grid substations to the South and West of the city - defines the scope of this project.
- 1.5 The GCP Executive Board has already agreed the principle of investing in grid reinforcement, and the Future Investment Strategy agreed in March 2019 and updated in December 2020 allocated funding for the project. In October 2020, GCP Executive Board gave approval to start the scoping stage, to develop proposals for these specific electricity grid reinforcements. Specialist external consultants have

been engaged and have provided a clear programme framework, decision points and options for progressing this work.

1.6 The Joint Assembly is invited to consider the proposals to be presented to the Executive Board and in particular to:

- Note and comment on progress made in developing the proposals for electricity grid reinforcement;
- Note the problematic operation of the electricity market, and support action to lobby for change whilst continuing to work on the project due to the likely timescales for any change in the operating environment;
- Support an application to UK Power Networks as the local electricity Distribution Network Operator, as outlined in Section 4;
- Support initial market testing to explore the interest in and capabilities of market operators as outlined in paragraph 4.3; and
- Endorse using £200K of the allocated budget to support this work.

2. Background

2.1 The project has identified that development to the West and South of Cambridge is currently limited by the absence of 132kV and 33kV network infrastructure. The strategic view to support growth in these areas is centred on the extension of this infrastructure.

2.2 An Eastern extension will allow further growth to the East and South of Cambridge by bringing capacity closer to emerging developments. The Western extension will provide capacity to West Cambridge (including future developments in Bourn/Cambourne) and relieve existing grid substations so further growth can be accommodated in North and Central areas of Cambridge. The Western and Eastern extensions will interconnect to form a loop, thereby establishing the necessary resilience to sustain the expected demand growth.

2.3 Demand analysis has included consideration of three different scenarios with varying levels of demand growth. The infrastructure described is required in all three scenarios.

2.4 Analysis indicates that the new infrastructure will provide capacity to support:

- Around 17,000 new homes;
- Thousands of new jobs including those at Babraham Research Campus, Granta Park, the Wellcome Genome Campus and Cambridge Biomedical Campus. Some organisations on these sites will have very high energy demands; and
- The electrification of transport and renewables projects.

3. Issues for Discussion

3.1 Working with specialist technical and legal consultants, three distinct options have been identified to deliver the required infrastructure. Each option involves one or more of the following market operators:

- Distribution Network Operator (DNO): DNOs are companies licensed to distribute electricity in a specific area of Great Britain by the Office of Gas and Electricity Markets (Ofgem). The DNO for this area is UK Power Networks, known as UKPN.
- Independent Distribution Network Operator (IDNO): in order to increase competition in the electricity distribution market, IDNOs are licensed to develop, operate and maintain local electricity distribution networks anywhere in Great Britain.
- Independent Connection Provider (ICP): ICPs are accredited companies that carry out works on the electricity network on behalf of clients. Networks that are built or operated by ICPs will be adopted by either a DNO or by an IDNO.

Option 1: DNO Only

- 3.2 This option involves working solely with UKPN who would design, build and operate the electricity infrastructure.
- 3.3 When compared with options 2 and 3, management of delivery is likely to be simpler because GCP would contract only with UKPN and no procurement would be required. DNOs are also highly experienced in delivering large, complex projects of this type. These factors result in a lower risk of infrastructure delivery than for the other options.
- 3.4 However, lack of competition means that costs can be higher, and DNOs have standardised ways of working meaning that they offer minimal flexibility and innovation in design. For example, this would mean that GCP would be less able to refine the design to suit its budget. Importantly there is a single mechanism of cost recovery which is time-limited to 10 years from energisation of the infrastructure, and this might present a risk should anticipated developments be delayed.

Option 2: - DNO + ICP

- 3.5 In this option, UKPN would deliver the non-contestable works, namely those that only the DNO is permitted to undertake. GCP would separately procure contestable works from an ICP to a UKPN approved design. Once built, UKPN would adopt the contestable works and operate the infrastructure and the ICP would not have an ongoing role. The main advantage of this approach is that the competitive procurement process may result in lower infrastructure costs and shorter timescales.
- 3.6 Commercial arrangements are more complex as there are now two parties to manage (UKPN and an ICP), and GCP would shoulder more of the cost and design risk. Mitigations include additional investment in experienced project/contract management and other professional services. Since UKPN would operate the infrastructure, constraints on design flexibility and cost recovery remain the same as for option 1.

Option 3: DNO + ICP + IDNO

- 3.7 In this option, UKPN would again deliver only the non-contestable works and contestable works would be procured from an ICP. However, an IDNO would adopt and operate the infrastructure. IDNOs/ICPs are typically less experienced at complex projects of this type and GCP would take more of the design and cost risk.

The contracting structure is the most complex of the options and this would require a greater focus on project/contract management and other professional services. For these reasons, the delivery and cost risks are highest for this option.

- 3.8 There are potential upside benefits to this option: IDNOs/ICPs are able to offer more design flexibility and opportunities to reduce costs. For example, it would be possible to set a budget and run a competitive procurement to deliver the best infrastructure for that investment. This option may also provide significantly more flexibility over customer charging arrangements and mechanisms of cost recovery which could provide opportunities for future investment in the area.
- 3.9 As described in the next section, there is no immediate need to choose between these options. Further detailed work is required to understand the pros and cons of each approach in the Greater Cambridge context as part of the due diligence process. The final choice will depend upon a number of factors including risk mitigations; GCP's appetite for risk; balance of contestable and non-contestable works; the importance placed on cost recovery/reward; and market interest from the IDNO/ICP sectors.

4. Options and Emerging Recommendations

- 4.1 Whichever option is ultimately progressed, the next step is to make a formal application to UKPN. Their offer in response to this application will lay out how much of the works is contestable and how much is non-contestable.
- 4.2 Submitting the application requires preparatory technical work and it is anticipated that submission could occur in April or early May 2021. UKPN then have up to 90 days in which to respond with a formal offer. Following receipt of the formal offer, GCP and its consultants will have a further 90 days to evaluate, discuss/challenge it with UKPN and formally accept it. A decision is required about which of the options to select prior to acceptance. Failure to respond within the 90 day window would cause UKPN's offer to be invalidated and the process would need to recommence. Acceptance of UKPN's offer must be accompanied by a payment for the first phase of their design work. A summary of the process is shown in Figure 1.

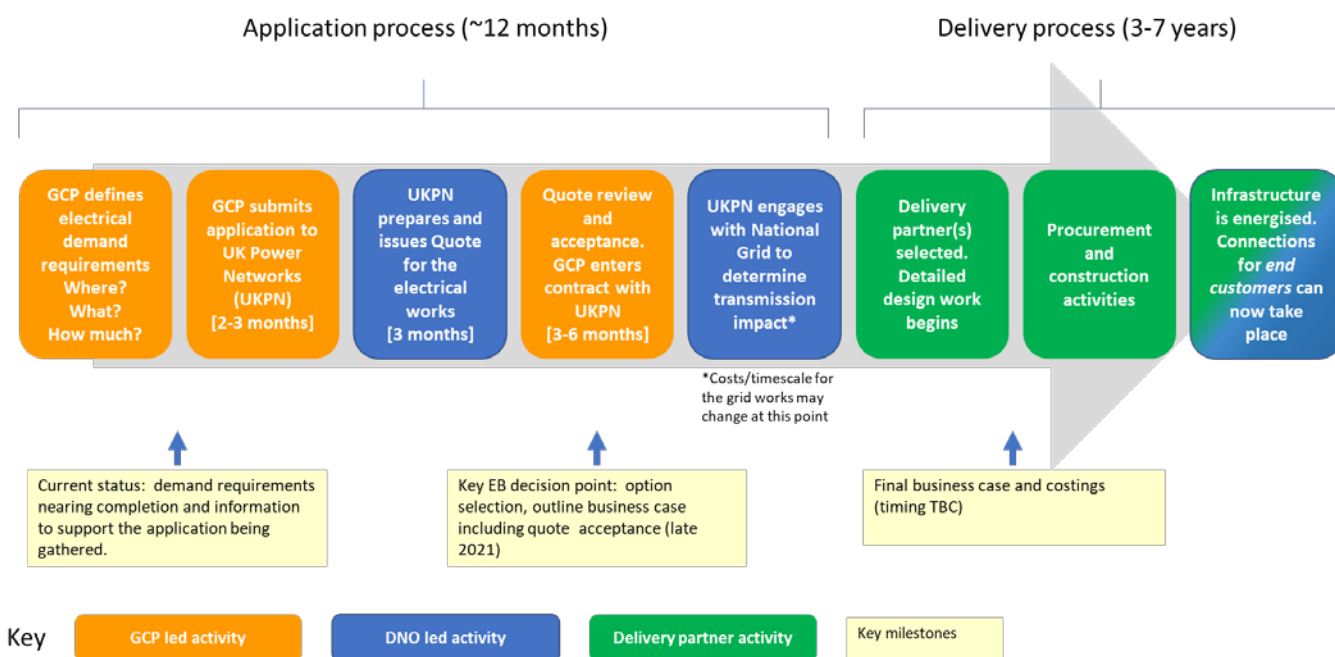


Figure 1: Grid connection process

- 4.3 In order to inform the decision between the three options, it is proposed to initiate some early market testing of IDNOs to understand in principle what the market has to offer.
- 4.4 Work to support this UKPN process, market testing and the development of an Outline Business Case (OBC) requires highly specialist resources at an anticipated further cost of £200k. This includes the search for suitable sites which is ongoing. Further professional services will be required for subsequent stages of the project after OBC.
- ## 5. Consultation and Engagement
- 5.1 The GCP Economy and Environment Working Group received a presentation on this project in January 2021 and debated the relative merits of the three options. The general consensus was that less risk and surety of delivery are the priorities for them in deciding the future approach. In particular, the additional risk of options 2 and 3 would only be worth accepting if specific benefits could be demonstrated and there was a high chance of these benefits being realised in practice. As described above, further work is planned to explore the options in a Greater Cambridge context as part of the due diligence process.
- 5.2 Energy infrastructure is of critical importance to the current Local Plan and the development of the new Local Plan, so close engagement with the Greater Cambridge Planning Service is ongoing and will need to continue throughout the development of this initiative.
- 5.3 The CPCA's Independent Economic Review (CPIER 2018) identified that utilities underpin all economic activity, and that electricity capacity is of particular concern. It recommended (#8, subsidiary (vi)) that 'Ofgem should produce a road map for how to get from the current centralised energy distribution system to a more decentralised one, noting in particular the high costs of establishing new grids,

possible disincentives for DNOs to facilitate this, and the levels of expertise required.'

- 5.4 The Cambridgeshire and Peterborough Independent Climate Commission in its current review, has also picked up the issue of network constraints as a barrier to clean growth which needs particular attention and regulatory change. Addressing the regulatory challenges is critical for future growth. In dealing with the here and now, this project is looking to address current electricity network constraints and their impact on the pace and scale of clean growth locally in Greater Cambridge by increasing local network capacity, and is clearly in line with the policy framework set out above.

6. Alignment with City Deal Objectives

- 6.1 The proposed investment is consistent with the deal agreed between Government and Greater Cambridge which allows Greater Cambridge to maintain and grow its status as a prosperous economic area. Specifically, this initiative removes a barrier to new homes and jobs and enables the provision of better greener transport and improved air quality. This project supports electricity infrastructure requirements to bring forward the electrification of transport in Greater Cambridge, laid out in the Cambridgeshire and Peterborough Local Transport Plan including the Cambridgeshire Autonomous Metro and electric vehicle charging infrastructure.

7. Citizen's Assembly

- 7.1 This work will remove a potential barrier to the electrification of transport by ensuring adequate electricity supply for Greater Cambridge. This supports the Citizen's Assembly vision for transport, in particular 'be environmental and zero carbon' and 'restrict the city centre to only clean and electric vehicles'.

8. Financial Implications

- 8.1 £25m was allocated towards energy grid reinforcement in the GCP Future Investment Strategy (agreed in March 2019 and updated in December 2020). Expenditure and financial commitments to date amount to £110k so the expenditure proposed in this report is within budget. The basis of the project is that the £25m upfront investment will be recoverable over subsequent years through the repayment of second comer charges from UKPN or an IDNO. These second comer charges are something Developers in areas without electricity capacity issues will not have to pay and could affect development viability and put pressure on S106 negotiations as would be the case for other abnormal costs.

Have the resource implications been cleared by Finance? Yes

Name of Financial Officer: Sarah Heywood

9. Next Steps and Milestones

- 9.1 Depending upon the precise timing of the submission of the application to UKPN and the receipt of their offer, a recommended approach and OBC will be presented to the Joint Assembly and Executive Board in Autumn 2021.

Background Papers

Source Documents	Location
Citizen's Assembly recommendations	https://www.involve.org.uk/our-work/our-projects/practice/how-can-congestion-be-reduced-greater-cambridge
Cambridgeshire and Peterborough Local Transport Plan	https://cambridgeshirepeterborough-ca.gov.uk/assets/Transport/LTP.pdf
Cambridgeshire and Peterborough Independent Economic Review	https://www.cpier.org.uk/media/1671/cpier-report-151118-download.pdf

Chisholm Trail Project: Implication for Future GCP Project Management Arrangements

Report to: Greater Cambridge Partnership Joint Assembly

Date: 24th February 2021

Lead Officer: Peter Blake – Transport Director, GCP

1. Background

- 1.1. The Chisholm Trail is a strategic, predominantly off-road, walking and cycle route providing a 3.5km link between the central Cambridge railway station/CB1 development/Southern Busway spur and Cambridge North Station. Once completed, this 'spine' will link into a network of existing cycle routes, creating a direct high quality north-south route across the city. The trail is an integral part of the GCP's plan for future cycling provision in Greater Cambridge.
- 1.2. The County Council is responsible for delivering the Chisholm Trail and the Abbey-Chesterton Bridge. It is essentially one project, consisting of a number of elements – the Abbey Chesterton Bridge is funded by the County Council and the remainder of the trail is funded by the GCP. Delivery of the trail was split into two phases, Phase 1 Cambridge North Station to Coldham's Lane. Phase 2 continues from Coldham's Lane to the central railway station.
- 1.3. County Council officers informed GCP of a number of financial and programme issues relating to the delivery of the Chisholm Trail project. These issues were reported to the County Council's Highway and Transport Committee on 1st December and the Executive Board then considered this as an urgent item at its December meeting. Timescales meant it was not reported to the November meeting of the Joint Assembly, although the Chairperson was briefed and Joint Assembly Members informed.
- 1.4. At its December meeting, the GCP Executive Board agreed to provide an additional £6.6m to secure delivery of the Chisholm Trail and Abbey-Chesterton Bridge project plus £2m developer funding. However, the Board expressed concerns regarding the County Council's project management arrangements and requested that a further report considering the implications of the delivery problems faced by the Chisholm Trail scheme on the GCP's future project management arrangements be brought to the next Board meeting in March.

1.5 The Joint Assembly is invited to consider the proposals to be presented to the Executive Board and in particular:

(a) Note the causes of the Chisholm Trail difficulties; and

(b) Note the proposed changes to future GCP project management arrangements.

2. Issues for Consideration

2.1 County Council officers informed the GCP of a number of financial and programme issues relating to the delivery of the Chisholm Trail project. These issues were reported to the County Council's Highway and Transport Committee on 1st December 2020.

2.2 The County Council's Highways and Transport Committee paper is appended to this report. County officers confirmed in the report that the project went quickly to site, risks were significantly underestimated in terms of complexity of the project and that there had been insufficient development and design of the project before it was tendered. The consequence of the limited preparatory work, has been a significant number of additional design elements and compensation events for changes to the scope of work once the project was on site, resulting in significant cost increases and programme delays. This position was compounded by land acquisition, access and land approval issues.

2.3 The impact of the issues raised by the County Council has been a significant increase in both cost and time required to deliver the project.

2.4 The agreement covering the delivery of the Chisholm Trail and Abbey-Chesterton Bridge was reached back in 2016/7. The County Council took on the role of project manager and delivery agent, whilst the GCP funded the Chisholm Trail elements of the project. Problems with delivery were not envisaged when the agreement was made and thus provisions were not sufficient for such eventualities.

3. Emerging Considerations and Recommendations

3.1 In the Highways and Transport Committee paper, County Council officers recognised the shortcomings in project management during the early stages of the project. The County Council has undertaken a management review of working practices and processes, resulting in new processes and procedures being developed to improve the management and delivery of future projects.

3.2 Hitherto the GCP has had no strongly held position on scheme delivery. Instead it has been willing to explore options, primarily with the County Council, to secure improvements on the ground. The challenges posed by the Chisholm Trail project and associated financial consequences require a review of that position. There are essentially two real choices going forward:

- Continue to be open to explore scheme delivery options but with stringent performance and financial requirements; or
- Adopt a position of GCP self-delivery as the preferred position.

- 3.3 As part of the Executive Board's December decision, the GCP assumed responsibility for Phase 2 of the Chisholm Trail project. The consequence of that decision for self-delivery has required GCP to scale up for delivery. Adopting self-delivery as the de-facto position will require further resource both internal, and external via consultants, to support that position.
- 3.4 There are significant benefits in developing internal delivery capacity, including greater direct control over project delivery, direct interface with contractors and providing greater accountability to decision-makers.

4. Financial Implications

- 4.1 The financial position arising from the problems of the Chisholm Trail scheme were addressed in the December Executive Board paper.
- 4.2 There are no financial implications as a result of the revised project management arrangements. Costs currently reimbursed to third parties will instead be borne directly by GCP. However, the implementation of more effective project management process can significantly reduce the risk of overspends like those experienced on the Chisholm Trail.

Have the resource implications been cleared by Finance? Yes
Name of Financial Officer: Sarah Heywood

5. Alignment with City Deal Objectives

- 5.1 The Chisholm Trail project is an important piece of the jigsaw that will enable the Greater Cambridge Partnership to deliver against the objectives that were set out in the City Deal. Greenways will be an extensive network that directly connect people to homes, jobs, study and opportunity, across the city.
- 5.2 The Trail will ease congestion and prioritise greener and active travel, improving quality of life and making it easier for people to travel across Cambridge.

6. Citizen's Assembly

- 6.1 Citizens' Assembly members developed and prioritised their vision for transport in Greater Cambridge. The Chisholm Trail project supports a number of those priorities, namely:
- Be environmental and zero carbon (28).
 - Be people centred – prioritising pedestrians and cyclists (26).
 - Enable interconnection (e.g. north/south/east/west/urban/rural) (25).
 - Have interconnected cycle infrastructure.
 - Provide safe layouts for different users.
 - Educate people about different options.
 - Provide transport equally accessible to all.
- 6.2 The Citizens' Assembly voted on a series of measures to reduce congestion, improve air quality and public transport. These will be considered further as packages develop.

7. Next Steps and Milestones

- 7.1 The GCP will proceed with developing its own internal capacity for scheme delivery. This will be reviewed on a project by project basis in accordance with scheme requirements.
- 7.2 The GCP will conclude the commissioning of a Professional Services Framework to provide consultancy support for scheme development and delivery. This is planned to be in place by April this year.
- 7.3 Scheme delivery targets and milestones will continue to be reported to the Joint Assembly and Executive Board in the Quarterly Progress Report.

List of Appendices

Appendix 1	Cambridgeshire County Council Highways and Transport Committee paper – Chisholm Trail 1 st December 2020
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Background Papers

Source Documents	Location
None	-

CHISHOLM TRAIL AND ABBEY CHESTERTON BRIDGE PROJECT STATUS UPDATE

To: Highways and Transport Committee

Meeting Date: 1st December 2020

From: Steve Cox, Executive Director, Place and Economy

Electoral division(s): All Cambridge Divisions

Forward Plan ref: N/A

Key decision: No

Outcome: To update the committee on the programme and cost for the Chisholm Trail project including Abbey Chesterton Bridge, and seek agreement for additional project funding from the Greater Cambridge Partnership

Recommendation: Committee is recommended to:
a) note the project update;
b) to seek additional s106 funding of £2.063m for the Abbey Chesterton Bridge through the Greater Cambridge Partnership Executive Board.

Officer contact:

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Post: MID Group Manager
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Tel: 07936 903111

Member contacts:

Names: Cllr Ian Bates
Post: Chair
Email: ian.bates@cambridgeshire.gov.uk
Tel: 01223 706398

Names: Cllr Mark Howell
Post: Vice Chair
Email: mark.howell@cambridgeshire.gov.uk
Tel: 01223 706398

1. Background

- 1.1 The Chisholm Trail is a strategic, predominantly off-road, walking and cycle link between the central Cambridge railway station/CB1 development/Southern Busway spur and Cambridge North Station. Once completed, the route will link into a network of existing cycle routes, creating a direct high quality north-south route across the city. It is a long-time aspiration and a flagship investment for the County Council (CCC) and subsequently the Greater Cambridge Partnership (GCP), making a significant contribution towards strategic objectives including modal shift for the City.
- 1.2 It is essentially one project, consisting of a number of elements – the Abbey Chesterton Bridge is a key element funded by CCC, and the remainder of the trail is funded by GCP. Delivery of the trail was split into two phases, Phase 1 from Cambridge North Station to Coldham's Lane. There is also a section across Coldham's Common which is being delivered using Department for Transport (DfT) grant funding. The remainder is in a future Phase 2. The current phases are being led and managed by a single project team based at the County Council.
- 1.3 Following feasibility work and public consultation, a route closely following the railway line was selected and developed. Outline and detailed design of the bridge and Phase 1 was undertaken by CCC's term-service consultant SKANSKA, with a specialist bridge architect working with the consultant on the Abbey Chesterton Bridge. Planning applications were submitted, with consent for the bridge and trail given in February and July 2017 respectively.
- 1.4 The project was considered by Economy and Environment Committee in December 2016. A tender process was undertaken and the tender was awarded on the 28th June 2017 to construct Phase 1 of the trail (excluding the link on Coldham's Common which is linked to Department for Transport (DfT) grant funding) and bridge, using the Eastern Highways Alliance Framework contract. The contract was initially awarded to a joint venture between Carillion and Tarmac Construction. Tarmac Construction continued with the contract following the collapse of Carillion early in 2018.
- 1.5 The contract was awarded under a New Engineering Contract 3, Option C, Target Price contract. Such contracts are used commonly in construction and are based on an agreed target cost for a defined scope of work, with a cost-reimbursable mechanism in which the contractor is paid for their actual costs. Compensation Events may adjust the target cost, for example if the scope of work changes or if there have been unforeseen circumstances. At the end of the contract, any variance between the final target cost and contractor's actual cost is apportioned between the contractor and the employer, allowing the contractor to share any savings made or to contribute towards any overspend. This mechanism incentivises all parties to work collaboratively to deliver the project as economically as possible, as underspends (gain) or overspends (pain) are shared in an agreed proportion.
- 1.6 Included in the planning consent for Phase 1, but not part of the current contract under construction, are connections and improvements to the existing path on Coldham's Common. A DfT funding contribution of £500,000 is available for this section. Work on Common Land has required additional consent, though the Planning Inspectorate, which is

in place and requires work to commence before 15th January 2021. This element is being led by CCC although construction work has not yet started.

- 1.7 Phase 2 continues the route from Coldham's Lane to the central railway station. This is partly on existing streets and on land adjacent to the railway. It will also use new roads that will be constructed as part of new developments. As this part of the scheme is contingent on those developments, the delivery programme is uncertain, although some work has been undertaken by Network Rail to improve access using arches under Mill Road Bridge.

2. Main Issues

Cost and Programme

- 2.1 As noted above, there has been a long standing aspiration to deliver the Chisholm Trail, with a range of s106 contributions being secured specifically for the scheme over a number of years. Once the planning permissions were secured, work started on site quickly, getting the project underway. As part of the estimated cost at the time, risk allowances were made, including areas where there was considered to be uncertainty. It has now become clear to officers, however, that these risks were significantly underestimated in terms of the complexity of the project and that there had been insufficient development and design of the project before it was tendered. In hindsight, therefore, a later start date would have resulted in a better understanding of the full outturn cost for the project and a more accurate tender. This would have meant that at the time the project was presented to Members for approval, the cost would have been significantly higher, but that in itself, would have allowed Members of the Committee and the GCP Executive Board to judge the value for money of the scheme more effectively.
- 2.2 The consequence of the limited preparatory work, has been a significant number of additional design elements and compensation events for changes to the scope of work once the project was on site, resulting in cost increases and programme delays.
- 2.3 Similarly, the early start on site and incomplete design work has had impacts on land acquisition, access costs and gaining third party approvals. These issues have resulted in additional resource costs and programme delays.
- 2.4 Combining the bridge and the trail into one construction contract has provided some economies of scale in material costs, although reporting separately for both parts of the project has complicated contract and financial control and forecasting.
- 2.5 It is recognised by officers that shortcomings in project management during the early stages of this project have contributed to the current situation. Although most of the items that have come to light since the project has been on site would have occurred anyway, that does not change the fact that this information should have been available for Members and the GCP Executive Board at the time the decision was taken to proceed with the project to give a full view on the likely costs. Given this, the Executive Director has undertaken a management review of working practices and processes within the delivery teams and new processes and procedures are being developed and embedded to ensure projects operate differently and more effectively in future. A completely new team is also now running the

project and additional external resource is being secured to ensure contractual firm push back on contractual issues.

- 2.6 There remain significant risks within the overall project, although at this stage, with the works on the bridge largely complete, these sit predominately with the trail element and in particular, the Newmarket Road underpass programmed for Spring 2021. These are issues that will be considered by the GCP as they are funding the Trail element of the scheme.
- 2.7 The table below provides a summary update on the various phases and sections of the project.

Section	Status	Estimated completion date
PHASE 1: Abbey Chesterton Bridge	Under construction	July 2021
PHASE 1- Trail-Fen Road to Barnwell Lakes	Under construction	November 2021
PHASE 1- Trail-Coldhams	Design underway, works not instructed yet.	TBC

Budget and expenditure

- 2.8 The table below summarises the current and forecast financial position for the Abbey Chesterton Bridge:

Phase/Section	Approved Budget (£)	Forecast contract Out-turn (£)	Additional Budget Requested (£)
PHASE 1- Abbey Chesterton Bridge	4,886,500	6,949,909	2,063,409

- 2.9 Given the stage that the bridge element of the scheme has reached, being substantially complete, no further contingency over the quantified risks are included in the forecast outturn figure.
- 2.10 Whilst these figures are forecasts of the outturn position, measures are in place across both the bridge and trail elements, through contractual mechanisms, to minimise where possible any additional funding that is required. However, until those processes have concluded, it would not be prudent to assume any lower final costs than those provided in the table above.
- 2.11 Appendix 1 provides a breakdown of where the additional costs on the bridge project have arisen.

Funding requirement – Abbey Chesterton Bridge/ Coldhams Common

- 2.12 Phase 1 bridge funding of £4,886,500 was approved by CCC and comprised of £2.7M from the Department for Transport's Cycle City Ambition grant with the remaining funds to come from Section 106 contributions and residual capital funding. The latest forecasts show that the budget shortfall for the bridge is £2,063,409 and it is proposed that this should be made up from CCC secured s106 contributions in the Cambridge area. These funds are currently administered by the GCP and so approval to use these contributions will be sought from the GCP Executive Board on 10 December 2020.

Phase 1 - Trail

- 2.13 Phase 1 and 2 of the Trail are funded by the GCP. The currently approved budget for phase 1 of the Trail is £9,269,000 and the current forecast outturn is £15,850,625, meaning a projected additional budget that is required of £6,581,625. These figures include a contingency over and above quantified risks given the nature of the project and the substantial elements remaining for completion. There remain significant risks within the project, especially the Newmarket Road underpass where deep excavations could result in unforeseen issues/delays and cost with statutory undertakers plant, and risks around archaeology which could also lead to cost and programme delays. Archaeological investigations at the underpass site have been undertaken so far as reasonably practicable. However, closing Newmarket Road for the time required for investigations under its embankment was not possible, so there remains a risk of archaeological finds, particularly at the site is in close proximity to the historic Leper Chapel.
- 2.14 Appendix 2 provides a breakdown of where the additional costs on the trail part of the project have arisen.
- 2.15 As the Trail element of the overall project is funded by the GCP, it will be for the GCP Executive Board to consider any changes to the scheme or additional funding to be provided.

3. Alignment with corporate priorities

3.1 A good quality of life for everyone

The following bullet points set out details of implications identified by officers:

- Promoting pollution-free journeys on foot and by cycle, thus reducing harmful effects of travel on the people of Cambridgeshire
- An associated benefit to health and wellbeing from improved fitness

3.2 Thriving places for people to live

The following bullet points set out details of implications identified by officers:

- The route improves connectivity for different sustainable modes of transport and an attractive, free-to-use, facility
- It provides links between residential, leisure and employment areas with the city centre and central station

3.3 The best start for Cambridgeshire's children

Providing a high-quality pedestrian/cycle route, segregated from motor vehicles can create a culture of walking and cycling at an early age, can lead to healthier lifestyles which is likely to carry on into adult life, thus reducing the need for access to healthcare services.

3.4 Net zero carbon emissions for Cambridgeshire by 2050

The following bullet points set out details of implications identified by officers:

- The route provides a dedicated safe route for zero carbon journeys by reducing reliance on car journeys

4. SIGNIFICANT IMPLICATIONS

4.1 Resource Implications

This report sets out significant implications in para 2.1-2.11.

4.2 Procurement/Contractual/Council Contract Procedure Rules Implications

This report sets out the procurement route and form of contract in para 1.4-1.5

4.3 Statutory, Legal and Risk Implications

The following bullet points set out significant implications identified by Officers:

- The scheme is being delivered in compliance with all statutory requirements and third party consents required
- There are reputational impacts in not completing or delaying parts of the scheme
- There are risks consents may lapse and may not be granted upon re-application
- Health and Safety requirements are being upheld in the design and construction process
- Although the forecast captures risk allowances, there is still potential for unforeseen risks to emerge

4.4 Equality and Diversity Implications

There are no significant implications within this category

4.5 Engagement and Communications Implications

The following bullet points set out details of significant implications identified by officers:

- Full engagement with members and the community has been undertaken throughout the development of the scheme
- The scheme has generally received a high level of public and member support

4.6 Localism and Local Member Involvement

There are no significant implications within this category

4.7 Public Health Implications

The following bullet points set out details of significant implications identified by officers:

- The scheme offers a potential for improved public health through promoting use of non-motorised transport and its associated exercise benefits, along a route less-affected by pollutants

Implications

Officer Clearance

Have the resource implications been cleared by Finance?

Yes
Name of Financial Officer: Sarah Heywood

Have the procurement/contractual/ Council Contract Procedure Rules implications been cleared by the LGSS Head of Procurement?

Yes
Name of Officer: Gus de Silva

Has the impact on statutory, legal and risk implications been cleared by the Council's Monitoring Officer or LGSS Law?

Yes
Name of Legal Officer: Fiona McMillan

Have the equality and diversity implications been cleared by your Service Contact?

Yes
Name of Officer: Elsa Evans

Have any engagement and communication implications been cleared by Communications?

Yes
Name of Officer: Sarah Silk

Have any localism and Local Member involvement issues been cleared by your Service Contact?

Yes
Name of Officer: Graham Hughes

Have any Public Health implications been cleared by Public Health

Yes
Name of Officer: Iain Green

5. Source documents guidance

5.1 None

APPENDIX 1: Areas of cost increase – Abbey Chesterton Bridge

Item	Cost Increase
Design changes and supervision Includes items omitted from tendered design, amended designs arising from changes to land and third party requirements, design issues payable under the Highways Services Contract.	205,400
Construction costs Additional work/materials and time arising from changes to design and third party requirements	761,050
Land and Access costs Changes to land required and accommodation works, increasing costs of land leases for construction access. Additional land agent and legal costs.	380,150
Third party consents and approvals Costs arising from third party requirements, e.g. Network Rail	70,250
Professional advice, Management and staff Costs Additional commercial advice and cost consultants given the complexity of the project and design/construction issues on site. Additional contract administration	365,400
Miscellaneous Additional communications, direct planning costs, restrictions resulting from Covid-19 pandemic and other minor changes that are part of a complex contract.	281,059
TOTAL	2,063,409

APPENDIX 2: Areas of cost increase – The Trail

Item	Cost Increase
Design changes and supervision Includes items omitted from tendered design, amended designs arising from changes to land and third party requirements, design issues payable under the Highways Services Contract.	129,030
Construction costs Additional work/materials and time arising from changes to design and third party requirements	3,515,794
Land and Access costs Changes to land required and accommodation works, increasing costs of land leases for construction access. Additional land agent and legal costs.	207,868
Statutory Undertakers' costs Additional cost associated with moving statutory undertakers plant and equipment	139,416
Professional advice, Management and staff Costs Additional commercial advice and cost consultants given the complexity of the project and design/construction issues on site. Additional contract administration	694,460
Miscellaneous Additional communications, direct planning costs, restrictions resulting from Covid-19 pandemic and other minor changes that are part of a complex contract.	111,948
Contingency	1,783,109
TOTAL	6,581,625