

FULL BUSINESS CASE (FBC)

A. GENERAL INFORMATION

A1. General

Project Title	A34 Walsall to Birmingham Sprint		
Voyager Code	CA-03054		
Portfolio / Committee	Transport & Environment Finance & Resources	Directorate	Inclusive Growth
Approved by Project Sponsor	Phil Edwards - 06/12/19	Approved by Finance Business Partner	Simon Ansell – 06/12/19

A2. Outline Business Case approval

This scheme is being promoted and funded by the West Midlands Combined Authority (WMCA) with support from the City Council and other partnering local authorities, and will be delivered on the WMCA's behalf by Transport for the West Midlands (TfWM).

The key principles of Sprint and agreement to progress the priority routes for the Commonwealth Games were approved by the City Council's Cabinet on 24th January 2018. TfWM gained Outline Business Case approval from the West Midlands Combined Authority (WMCA) Investment Bboard on 18th February 2019. As an Options Appraisal was completed as part of WMCA's Outline Business Case, the City Council has progressed internal governance directly to FBC stage.

A3. Project Description

Summary

The Sprint offer focuses on delivering journey time reliability through highway interventions and signal priority, improving boarding times through multiple vehicle entrances and off board ticketing, and is a corridor focussed public transport solution.

This Full Business Case (FBC) seeks approval to the Walsall to Birmingham Sprint scheme on the A34 Corridor, including associated legal agreements for delivery.

The separate Birmingham to Airport Sprint scheme is also programmed for delivery by 2022. A third priority scheme – Sutton to Birmingham via Langley (SBL) – will now be completed in two phases, with the main launch as a Sprint corridor after the Commonwealth Games.

A separate Cabinet report has been developed to report on a proposed Enhanced Partnership (EP) between TfWM, the City Council, other local authorities, and the operator of Sprint and other key bus services in order to specify and maintain minimum quality standards for the operation of the corridors.

Background

The Sprint programme is promoted by WMCA through the HS2 Connectivity Package as part of the West Midlands Devolution Deal. The Sprint performance and service standards were endorsed by the Integrated Transport Authority in March 2016, and include minimum and target requirements for vehicles, shelters, fares, bus priority, intelligent transport systems, branding and environmental credentials.

The A34 Walsall to Birmingham Sprint scheme is proposed for accelerated delivery as part of the transport strategy for the Commonwealth Games in 2022. The key principles of Sprint and agreement to progress the priority routes for the Commonwealth Games were approved by the City Council's Cabinet on 24th January 2018.

The Strategic Outline Case was approved by the West Midlands Combined Authority in July 2017. This outlined the scheme and established the strategic case for change, as well as providing initial detail on key commercial, management, financial and economic considerations.

WMCA completed preliminary design and public consultation in autumn 2018 and obtained Outline Business Case approval from the WMCA Investment Board on 18th February 2019, allowing progression to detailed design. TfWM are now preparing a Full Business Case to the funding bodies, and a draft copy is provided in Appendix E. Consultation results were published in December 2018 and a consultation response was issued in March 2019 which informed the scope of detail design. A further consultation update was carried out in July 2019, focused on areas where concerns had been raised in previous consultations. Details of the main consultation outcomes are provided in Appendix F.

Delivery Strategy

Works will be delivered by WMCA using legal agreements with the City Council along with Sandwell and Walsall councils under Section 8 and Section 278 of the Highways Act, which will allow WMCA and their contractors to work on the public highway.

WMCA is responsible for the delivery of this scheme and will procure a main contractor using the Midland Highway Alliance (MHS) Framework Agreement. The City Council and the other local authorities are part of the quality evaluation panel.

WMCA will have sole responsibility for the procuring a Sprint network operator, vehicles, bus shelters, ticketing and passenger information systems. An Enhanced Partnership (EP) is being developed by TfWM to cover the operation of the network. The City Council will procure Bus Lane Enforcement (BLE) measures separately, using funding from WMCA.

Scheme Details

The A34 Walsall to Birmingham Sprint scheme follows the corridor from Walsall to Birmingham via Scott Arms and Perry Barr. The scheme is scheduled for delivery before the Commonwealth Games in 2022. Within Birmingham the route travels along Walsall Road, Birchfield Road, High Street Aston, Lancaster Street and James Watt Queensway to Moor Street Queensway (see Appendix G).

The total length of the route within the City Council's boundary is about 8.0km, with a further 6.5km within the boundaries of Sandwell and Walsall. The estimated cost of the project is £50.300m, with £47.200m from WMCA funding and £3.100m from other contributions. This does not include costs for vehicle purchase, which it is currently expected to be funded by the Sprint operator.

The proposals relevant to this FBC are outlined in Section B2 below and shown on the plans in Appendix H. Key deliverables on the highway include carriageway widening to provide new bus lanes, junction amendments including Sprint priority at traffic signals, parking and loading restrictions, and bus lane enforcement. Other deliverables being led by TfWM, and not part of the legal agreements with the local authorities, include new high-quality Sprint vehicles and improved bus stop shelters, off-board ticketing facilities and real-time information systems.

There are expected to be about twenty stops in each direction between Birmingham and Walsall. Some conventional bus stops, which will not be served by Sprint, will be moved into laybys to avoid Sprint being delayed by other bus services.

The design has been amended following public consultation to retain most of the parking between Perry Barr and Scott Arms while still providing bus priority where most desirable. Only 12% of parking (45 spaces) is now completely removed and this is spread evenly along this section of the route. 85% of existing unrestricted parking spaces are retained without restrictions. The remaining parking has restrictions for different parts of the day depending on location. These changes were subject to further engagement with residents in September 2019 (see also Section B5).

Camera enforcement is required to prevent general traffic from using the bus lanes, which disrupts services and reduces journey time reliability. Proposed camera locations are listed in Section B2, with cameras to be delivered in phases to suit the construction programme. Following completion of the scheme the City Council will be responsible for the ongoing operation of the enforcement activity and the operational income and expenditure including future maintenance obligations.

The route is partly at-grade and partly makes use of existing underpasses. It includes a proposal to make the existing underpass at Lancaster Circus into 'public transport only' with all other traffic having to use the roundabout. The City Council requires Sprint to serve Six Ways Aston rather than using the underpass, and priority measures are being developed which would allow this to be achieved without undue detriment to journey times. The final decision on Sprint's stopping pattern will be taken at a later date with the operator, and in consultation with the City Council.

It is expected that the project will require the removal of around 30 trees. These will be replaced within the wider area as part of the scheme, to the satisfaction of the City Council's Arboricultural Officer and following the principles of existing guidance including the 'Birmingham Tree Policy' report for Overview and Scrutiny Committee in February 2018. The mitigation measures will be designed to ensure a net gain of canopy cover within ten years and the final planting regime will be agreed with WMCA as part of the overall legal agreement for the project. The future maintenance cost estimates contained in this report make an assumption of a net gain of 26 trees overall.

An initial Environmental Screening has been produced by TfWM and forwarded to the City Council's Planning Officer for consideration. If this determines that a full Environmental Assessment is required then Planning Consent will also be needed. It would be the responsibility of WMCA to complete these processes if they are required.

The design is being developed in conjunction with other schemes along the route, particularly the proposals around Perry Barr for the Commonwealth Games, and in the city centre for HS2 and Birmingham Eastside Metro Extension.

The design takes into account the recently introduced cycling scheme on the A34 corridor from the city centre to Heathfield Road, and proposals to extend this to Perry Barr and the Athletes Village ahead of the Commonwealth Games. The Sprint scheme does not include specific measures for cyclists, although it does not prevent some measures for cyclists being delivered separately subject to funding and approvals being obtained. The Black Country Consortium is making a bid on behalf of Birmingham, Sandwell and Walsall councils for funds which have been provisionally allocated under the 'Transforming Cities Fund' for a regional cycle route scheme along the A34 corridor.

Works Co-ordination

The need to construct the works in a safe manner for both road users and construction workers will result in a period of traffic disruption. The City Council will work with TfWM and their contractors to minimise traffic disruption during construction by seeking to coordinate programmed activities, maximise available road space and minimise traffic demand along the whole corridor, but particularly for the Perry Barr area through the Perry Barr Infrastructure Co-ordination Group. This will include:

- Co-ordination of all construction projects along the corridor to ensure potential conflicts are managed and eliminated;
- A phased construction approach to optimise the available road space available at key times to help to keep traffic moving;
- The City Council's Traffic Management Protocol process will be in place to manage approvals for the contractor's temporary traffic management proposals; and
- Co-ordination with Travel Demand Management strategies for other schemes to manage the level of demand and promote alternative modes and times of travel.

A4. Scope

This FBC covers the A34 Walsall to Birmingham Sprint scheme along the A34 Corridor. It seeks approval to the scheme within the Birmingham boundary, and for the City Council to enter into legal agreements with WMCA for delivery of highway measures within that area.

A5. Scope Exclusions

Although this scheme covers the whole route to the Walsall, the specific works and legal agreements beyond the city boundary will be approved using separate governance between WMCA and Sandwell and Walsall Councils.

WMCA retain sole responsibility for appointment of the Sprint operator, vehicle acquisition, bus shelters, ticketing provision and real-time information systems, and these will not form part of the current approval or legal agreements.

A separate Cabinet report has been prepared to report on the proposed EP being developed by TfWM for the operation of the Sprint network.

The purchase of the BLE cameras and equipment will be through a City Council contract which is due to be awarded in accordance with a separate procurement strategy.

Options for Park and Ride are being developed by WMCA as a separate workstream and are not covered by this FBC. The locations are expected to be outside Birmingham.

B. STRATEGIC CASE

B1. Project Objectives and Outcomes

Sprint Objectives

Bus Rapid Transit – or Sprint – is a limited stop service with dedicated bus lanes which will provide priority for public transport through areas of congestion, making journey times more dependable. The A34 Walsall to Birmingham Sprint scheme forms a significant part of the Metropolitan Rail and Rapid Transit Network, as outlined in the West Midlands Strategic Transport Plan - Movement for Growth. This network is based on suburban rail, light rail, tram-train, very light rail and 'Sprint' bus rapid transit lines running on suitable routes to create one single network. Sprint will be integrated with local bus services and underpinned by passenger information, promotion and ticketing.

The vehicles operating on the Sprint routes will offer passengers a level of service and comfort similar to a tram, with off-board ticketing, multiple-door boarding, wheelchair and pushchair access, free wi-fi, air conditioning, as well as on-board audio-visual announcements and travel information.

Key objectives of Sprint are as follows:

- To facilitate the West Midlands growth agenda in the efficient and sustainable way, and to give commuters reliable and efficient modes of public transport.
- To facilitate a more equitable transport system, linking communities together and give additional opportunities to travel.
- To reduce travel times and congestion at peak times and improves journey time reliability.
- To increase in public transport patronage – the patronage forecast and modal shift for Sprint will help reduce highway congestion.
- Reducing general levels of traffic and modernising the bus fleet would lead to reductions in noise, air pollution and greenhouse gases.
- Other bus services will also benefit from the additional bus priority.

Route-Specific Objectives

The proposals align with a number of strategic policies at a local, regional and national level, in particular improving access to jobs in Birmingham and supporting the delivery of the Commonwealth Games. Sprint will provide vital bus priority to serve spectators and ensure the appropriate infrastructure is in place for a global event.

The main benefit of the scheme is improved journey times and reliability. The annualised patronage of the service is 4.4 million passengers, based on PRISM modelling outputs, and each journey is forecast to obtain an average time-saving of five minutes. Benefits identified by options appraisal are based on forecast average journey time savings of 20% compared with conventional buses.

The scheme enhances the link between Walsall, Scott Arms, Perry Barr and Birmingham city centre, connecting to the HS2 station at Curzon Street. The scheme will also support the Birmingham 2022 Commonwealth Games, by improving access to Alexander Stadium and the Athletes Village in Perry Barr, as well as connecting to the A45 Sprint to provide improved access to Birmingham Airport and events at the NEC.

City Council Objectives

Sprint is an identified scheme in the Birmingham Connected Transport Strategy.

The scheme supports the policy objectives outlined in the City Council Plan's 2018-2022, as updated in 2019, including:

- *'an entrepreneurial city to learn, work and invest in', particularly 'develop our transport infrastructure, keeping the city moving through walking, cycling and improved public transport'.*
- *'a great, clean and green city to live in', particularly 'improve the environment and tackle air pollution'.*
- *'gain the maximum benefit from hosting the Commonwealth Games' particularly "deliver high quality ... transport infrastructure for the benefit of our citizens'.*
- *'takes a leading role in tackling climate change'.*

The proposals also support the objectives of Birmingham Development Plan (BDP) 2013 including:

- *'To provide high quality connections throughout the city and with other places including encouraging the increased use of public transport, walking and cycling'.*
- *'To create a more sustainable city that minimises its carbon footprint'.*

The scheme supports the Additional Climate Change Commitments agreed by Cabinet on 30th July 2019 following the motion on Climate Emergency passed at the full City Council meeting of 11th June 2019, including the aspiration for the City Council to be net zero-carbon by 2030.

Combined Authority Objectives

The measures will support policies within the West Midlands Strategic Transport Plan, in particular:

- Economic Growth and Economic Inclusion: *'To accommodate increased travel demand by ... new sustainable transport capacity' and 'to improve connections to areas of deprivation'.*
Population Growth and Housing Development: *'To improve connections to new housing ... primarily through sustainable transport connections'.*
- Environment: *'To help tackle climate change by ensuring a large decrease in greenhouse gases from the ... area's transport system'.*
- Public Health: *'To significantly increase the amount of active travel' and 'to assist with the reduction of health inequalities'.*
- Social Well-Being: *'to improve the accessibility of shops, services and other desired destinations for socially-excluded people'.*

B2. Project Deliverables

The proposed on-street measures cover approximately 14.5km in total, of which around 8km is within the City Council's boundary. Key deliverables on the highway include:

- 4,300m of new bus lanes (2,480m into city and 1,820m towards Walsall), including carriageway widening and resurfacing where required, in addition to existing bus lanes totalling about 4,700m – this will provide bus lanes on about 70% of the route in total;
- Junction changes at key locations to assist movement of Sprint, including measures to improve outbound right-turn at Scott Arms;
- Technical solutions to provide priority at signals;
- Parking and loading restrictions where necessary to improve journey speeds;
- Bus lane enforcement cameras and associated equipment at up to four locations listed below, subject to a separate procurement process.

Proposed enforcement camera locations are:

- Lancaster Street outbound near Princip Street (viewing Lancaster Circus underpass);
- Walsall Road inbound, near Barberry 46 Industrial Unit;
- Walsall Road outbound, after Dyas Avenue;
- Walsall Road outbound, approaching Old Walsall Road.

Other deliverables being led by TfWM, and not part of the legal agreements with the local authorities include:

- New high-quality Sprint vehicles, with new articulated vehicles specified as zero-emission at the tailpipe through the EP, with the aspiration to achieve zero-emission standards on other buses on the corridor in the longer term;
- Improved bus stop infrastructure including shelters, off-board ticketing facilities and real-time information systems (around 20 stops each way between Birmingham and Walsall).

B3. Project Benefits

Measure	Impact
Carriageway widening to provide bus lanes, including bus lane enforcement, including resurfacing.	Bus lanes will assist in giving priority to Sprint and other bus services, reducing delay and improving journey time reliability, and so building public confidence in public transport.
Junction alterations and priority at traffic signals including Scott Arms.	This will allow Sprint vehicles to pass through junctions with minimal delays.
Making existing Lancaster Circus underpass into 'public transport only'.	This will give sprint and regular bus services maximum priority at a key location into and out of the city centre.
Modern, high-capacity low-emission vehicle fleet including easy boarding.	Reducing vehicle emissions will support Clean Air Zone objectives.
New parking and loading restrictions.	Ensures that bus lanes are kept clear, particularly at peak times, to minimise delays and ensure that easy entry and exit at bus stops.
New and improved bus stops including modern shelters with lighting, ticketing facilities and real-time information.	This will increase the perception of safety, security and convenience, particularly benefiting elderly and disabled people, and parents with pushchairs.

A detailed Benefits Register is attached in Section G5 below.

B4. Benefits Realisation Plan

The Sprint programme will be managed at a senior level by a Project Board consisting of the members outlined in Section F5.

The Project Board members will meet monthly and will be responsible for project control. They will make decisions within the scope of scheme approvals and make appropriate decision on any minor scope alterations. Any exceptional decisions, including decisions outside of the approved scope, will be escalated to the appropriate level within WMCA and the City Council for consideration.

B5. Stakeholders

WMCA led a public consultation exercise with support from the City Council, Walsall MBC and Sandwell MBC, between 22nd August and 5th October 2018. This was advertised via social media channels, letter-drops on the route, local authority websites, bus stop posters, and in local media articles. Consultation information was communicated to older / disabled people and other equality groups, as well as through the Talking News. There were also exhibitions at key locations on the route – these were attended by over 600 people.

APPENDIX A

569 responses were received on the A34 scheme during the consultation, with 73% fully supporting or partially supporting the scheme and 24% not in support of the proposal. The consultation showed that 81% of responders agreed with the need to provide reliable bus journey times on the route. Details of the outcomes are provided in WMCA's Sprint Route Public Consultation output report published in December 2018, which is appended in Appendix F.

In addition, a petition containing 116 signatures was presented to the City Council by Councillor Morriam Jan on 6th November 2018, from residents of Perry Barr objecting to the proposed removal of the Perry Barr flyover ahead of the Commonwealth Games and the introduction of Sprint services on the X51 bus route, and calling for proposals to improve the existing bus service instead.

A further update was provided by WMCA in March 2019 to public and stakeholders, informing them of design changes made as a result of feedback from consultation. This involved further engagement with the public, MPs, local councilors and other key stakeholders along the route who asked to be kept informed. In addition to leaflet drops and on-line publication, further public meetings were also carried out where required. Further details can be found in Appendix F.

Following feedback from the consultation, significant design changes were made in the section from Scott Arms to Perry Barr, which retains the majority of on-street parking (see below). These changes were subject to further engagement with residents in September 2019.

The main consultation themes are listed below, with TfWM responses:

Consultation Theme	TfWM Response
<p>Parking. There were several concerns raised by residents regarding the loss of parking laybys between Perry Barr and Scott Arms.</p>	<p>The scheme design has been amended to retain most of the parking between Perry Barr and Scott Arms while still providing bus priority where most desirable. This has been achieved through highway widening into verges and central reserve.</p> <p>There are 281 existing unrestricted parking spaces identified in this section of road. Only 12% of this parking (45 spaces) is now completely removed, and this is spread evenly along this section of the route. 85% of existing unrestricted parking spaces are retained without restrictions. The remaining parking has restrictions for different parts of the day depending on location, eg off-peak only.</p> <p>There is no impact on existing private driveway parking for residents or businesses.</p>
<p>Loading. There were concerns regarding changes to loading restrictions, particularly between Perry Barr and Scott Arms.</p>	<p>TfWM have reviewed loading arrangements for businesses and provided off-peak provision.</p>
<p>Safety. Some residents questioned the safety of the scheme as their driveways are on the Sprint route.</p>	<p>A stage 1 Road Safety Audit considered various aspects of the proposals, including junction layouts, visibility, pedestrians, cyclists, emergency vehicles, signage, road markings, access, and lighting. This did not highlight any significant issues.</p> <p>There are similar schemes where a bus lane already exists in front of properties, such as sections of the A34 near Perry Avenue and Beeches Road. Additional examples within the Birmingham include Bordesley Green East and the A38 Bristol Road in Selly Oak.</p>
<p>Environment. Environmental impact of changes to the use of highway space as a result of creating a dedicated bus lane alongside properties:</p>	<p>The Environmental Impact Assessment was undertaken during the detailed design process and considered the impact of the project across various assessment areas, including noise, greenhouse gases, landscape, townscape, historic environment, bio-diversity and water environment. The work also included an assessment of the impact on air quality.</p>
<p>Scott Arms. The existing congestion at Scott Arms was highlighted as a concern.</p>	<p>An extended right turn has now been included at Scott Arms to address capacity and congestion issues. This improves northbound traffic flow through the junction.</p>
<p>Park and Ride. The need for Park</p>	<p>Park and Ride facilities will encourage more people to choose</p>

APPENDIX A

<p>and Ride facilities for Sprint users was raised by some respondents.</p>	<p>Sprint over car and may also support the reduction of traffic on routes. TfWM have made significant progress with plans to deliver a strategic park and ride site on the route. A concept design proposal has been produced and they are now in positive dialogue with landowners in a preferred location. The preferred location is not within Birmingham.</p>
<p>Tower Hill. There were a number of comments regarding the proposals at Tower Hill, with some suggestions for improvements.</p>	<p>The changes to Tower Hill have been removed, and an extended right-turn has now been included.</p>
<p>Cycling. There were a number of requests for cycling improvements alongside Sprint, notably for an extension to the Birmingham Cycle Revolution scheme.</p>	<p>The A34 has been identified as a priority cycling corridor within the West Midlands Local Cycling and Walking Infrastructure Plan and TfWM are actively seeking funding to deliver cycling aspirations on this route. The Sprint scheme has been designed to allow future provision for segregated cycling for large sections of the route.</p>
<p>Aston Six Ways. The consultation proposed a stop at Six Ways Aston. Most respondents were not in favour.</p>	<p>The City Council still supports Sprint serving Six Ways and bus priority measures are being developed which will allow this to happen without undue detriment to journey times. The final decision on Sprint's stopping pattern will be taken at a later date with the operator, and in consultation with the City Council.</p>
<p>Commonwealth Games. There were a number of comments during the consultation which questioned the relationship between Sprint and the Commonwealth Games.</p>	<p>The Sprint programme is not being delivered solely for the Commonwealth Games (CWG). It was identified in WMCA's Strategic Transport Plan, Movement for Growth (2016), which in turn supports the Strategic Economic Plan for the region. The Sprint programme was also included in the City Council's transport vision, Birmingham Connected (2014).</p> <p>The A34 scheme, as a constituent part of the Sprint programme, is described in the HS2 Connectivity Package, approved by the WMCA Board in February 2017.</p> <p>Following the region's successful bid for the Commonwealth Games, the A34 scheme was prioritised in December 2017 so that it is in place to meet increased transport requirements in the area.</p>
<p>Perry Barr flyover. There were a number of comments related to potential changes to the Perry Barr flyover.</p>	<p>Any changes associated with the flyover in Perry Barr are part of a separate highway scheme and are not being delivered as part of Sprint. However, complementary bus priority forms part of the proposed flyover scheme which will give further benefits to Sprint.</p>
<p>Existing services. There were a number of comments regarding the impact of the proposals on the existing X51 and 51 bus services, with some enquiring as to why Sprint's proposed changes are needed. This included the petition containing signatures of 116 residents from Perry Barr, presented to the City Council by Councillor Morriam Jan on 6th November 2018</p>	<p>The A34 provides an important connection between the city centre and Walsall, serving residents and businesses in Great Barr, Perry Barr and Newtown that currently do not have access to reliable forms of public transport. In addition, existing bus services on the route, including the X51 and 51, suffer from journey time variability, while expected population growth in the region is expected to exacerbate the issue. Sprint aims to address this journey time variability while reducing the overall length of time it takes to travel between key areas. Connectivity will thereby be improved along this route, supporting the expected growth in Birmingham city centre and Perry Barr, while linking local people to new jobs, homes, facilities, and onward connections.</p>
<p>Existing service improvements. There were a number of comments requesting improvements to existing services and other locations. This included the petition referred to above.</p>	<p>The proposed highway changes will improve the reliability and speed of other bus services that use the route, including those that serve Perry Beeches, Streetly, Kingstanding, Aldridge, and Pheasey.</p>

C. ECONOMIC CASE AND OPTIONS APPRAISAL

C1. Summary of options reviewed at Outline Business Case

TfWM gained Outline Business Case approval from the West Midlands Combined Authority (WMCA) Investment Board on 18th February 2019. A summary of the options considered by TfWM as part of the Outline Business Case is given below.

Reference Case: Business As Usual or Do Minimum:

Existing proposals in the corridor, including Perry Barr Infrastructure Package, will be delivered without any additional bus priority measures or new, high quality bus vehicles. This would not require capital funding and would avoid disruption to existing road users and residents. However, it would not address existing congestion or poor journey times, and would provide a poor public transport service to the Commonwealth Games. There would not be any resilience against expected future traffic growth.

Proposed option: Sprint (£35-£45m inc vehicle costs):

The scheme as outlined in this FBC, including modern high-quality sprint vehicles, carriageway widening for bus lanes, junction changes, and restriction on parking and loading. High quality of public transport, improvements in journey times, and better connectivity and accessibility. PRISM modelling shows a good business case with growth in public transport demand.

Alternative Option 1: Enhanced Bus (£20-£30m):

The scheme would provide quality improvements to the existing 51 and X51 bus service, linking Birmingham city centre with Walsall town centre and both of the proposed HS2 stations. Enhanced bus priority facilities would create resilience and quicker journey times, without the additional costs of vehicles and operator procurement. However, there would be no change to perception of public transport and no benefit from multi-door boarding and off board ticketing.

Alternative Option 2: Midland Metro Tram (circa £400-700m):

An extension of the tram route through Birmingham city centre along the A34 via Perry Barr, Scott Arms and Walsall town centre. This would provide high-quality public transport, improvements in journey times, and wider economic benefits. However, it significantly exceeds the available budget and is unlikely to provide a strong business case. It could not be delivered in time for the Commonwealth Games.

Reasons for the preferred option:

The proposed option is preferred as it is the only option that will deliver the objectives of the project, support inclusive economic growth, provide additional resilience during the Commonwealth Games, and enhance public transport within the A34 corridor. The cost of the scheme is also affordable within the WMCA Investment Fund allocation.

The image of the West Midlands will be further enhanced by the promotion of a high-quality rapid transit network. The scheme will provide bus lanes on 70% of the route, focusing on the most congested locations, and protect against future traffic growth. The nature of the interventions limits the impact on general traffic and will also allow the scheme to be delivered by early 2022.

C2. Evaluation of key risks and issues

A scheme-level Risk Register has been established through a workshop held by WMCA with its key stakeholders including the City Council, Walsall and Sandwell. The risk register is managed by WMCA and accessible to partnering local authorities, a summary can be found in Appendix C. The key identified risks include:

- Reputational damage if the scheme is not delivered for the Commonwealth Games;
- Coordination of works with other key developments on the route including Commonwealth Games and Perry Barr;
- Opposition to scheme including objections and legal challenge to Traffic Regulation Orders;
- Utility diversions take longer than planned;
- Test events for Commonwealth Games disrupt construction works;
- Construction costs increase after works have commenced on site;

- Disruption to road users during the construction stage;
- Materials or resources are not available when they are required;
- Insufficient income from BLE to cover on-going maintenance costs.

C3. Other impacts of the preferred option

- The introduction of similar service in Belfast has led to a 17% increase in demand. This provides evidence of a similar kind of service popular in another UK city.
- Sprint service will increase overall perception of comfort, safety and ease of use for commuters.
- Other bus services would also benefit from the bus priority along the corridor.

D. COMMERCIAL CASE

D1. Partnership, joint venture and accountable body working

The scheme is being led and funded by WMCA and will be delivered on WMCA's behalf by TfWM.

The City Council will support WMCA by making the necessary Traffic Regulation Order (TRO) changes along this route, as well as retaining its Network Management Duty role, and implementing and operating the bus lane camera enforcement.

WMCA will be working in partnership with the operator of Sprint, who is yet to be secured, on wider elements such as procurement of the vehicles. It is also hoped that the operator will contribute to the cost of the scheme, for example through providing the new vehicles.

WMCA are developing an Enhanced Partnership agreement with the City Council and the operator, in order to specify and maintain minimum quality standards for the operation of the corridors.

D2. Procurement implications and Contract Strategy

Main Works

WMCA will lead the procurement process for appointing a contractor for the works using the Midland Highways Alliance (MHA) Framework Agreement. A mini competition is underway which is due to be concluded at the beginning of 2020, and the City Council and other local authorities have been invited to be a part of the quality assessment panel.

The City Council's specifications are to be incorporated into the tender agreement and subsequent contract to ensure compliance with the PFI contract.

The contract for the works includes commitments for Social Value, including boosting the local economy and creation of local job opportunities.

Other Elements

A contractor has already been appointed to undertake Early Contractor Involvement (ECI).

WMCA will be responsible procuring an operator for the Sprint service and the high-quality vehicles, and will award contracts for bus shelters, real-time information and off-board ticketing systems using existing framework agreements. There are no procurement implications for the City Council from these elements.

The City Council will only be responsible for procuring the supply and installation of enforcement cameras and associated back-office infrastructure, using the City Council's contract which is due to be awarded in April 2020. The procurement process for ANPR cameras was reported to Cabinet in the Planned Procurement Activities Report of 26th November 2019.

D3. Staffing and TUPE implications

The scheme is being managed by WMCA, and the City Council's input will be undertaken using existing internal resources, with support from external consultants (particularly for design checks) when required. There are no staffing and TUPE implications related to the City Council.

E. FINANCIAL CASE

E1. Financial implications and funding

	Financial Year: Prior Years £000	2019/20 £000	2020/21 £000	Later Years £000	Total £000
CAPITAL EXPENDITURE (TfWM for overall scheme):					
Overall Project Cost	500.0	2,000.0	28,100.0	19,700.0	50,300.0
Total capital expenditure	500.0	2,000.0	28,100.0	19,700.0	50,300.0
CAPITAL FUNDING (TfWM for overall scheme):					
Overall Cost funded by:					
WMCA (HS2 Connectivity Package)	500.0	2,000.0	25,000.0	19,700.0	47,200.0
DHCLG Housing Infrastructure Fund	-	-	3,100.0	-	3,100.0
Total capital funding	500.0	2,000.0	28,100.0	19,700.0	50,300.0
CAPITAL EXPENDITURE (City Council expenditure only, as part of overall scheme costs above):					
Capital code: CA-03054					
Design Stage (inc design checks)	14.9	85.1	100.0	100.0	300.0
Traffic Regulation Orders	-	25.0	25.0	-	50.0
Construction Stage (inc inspections)	-	-	150.0	150.0	300.0
BLE Equipment Procurement and Installation	-	-	-	100.0	100.0
Total capital expenditure	14.9	110.1	275.0	350.0	750.0
CAPITAL FUNDING (City Council expenditure only, as part of overall scheme costs above):					
City Council Costs funded by:					
Overall Capital Funding (see above)	14.9	110.1	275.0	350.0	750.0
Total capital funding	14.9	110.1	275.0	350.0	750.0

Capital Costs

Funding of the A34 Walsall to Birmingham Sprint scheme is the responsibility of WMCA. The figures reported in Section E1 are taken from TfWM's draft Full Business Case and may be subject to change.

The estimated cost is £50.300m, and the proposed funding is £47.200m from WMCA and £3.100m from the Department for Housing, Communities and Local Government (DHCLG) 'Housing Infrastructure Fund' (HIF). A more detailed breakdown is included in WMCA's draft Full Business Case document, which is appended as Appendix E.

A contribution will also be sought from the operator of Sprint once they are appointed, possibly covering the cost of the new vehicles. The third-party contributions will be the responsibility of WMCA to secure, and there will be no call on City Council resources for this element.

The above figures include for the on-street measures within the Sandwell and Walsall boundaries, and for purchase of vehicles and other elements which will be led by WMCA, as well as the on-road measures to be delivered in Birmingham. The estimated cost of the highway works within the City Council's boundary is £16.000m and these works will form the basis of the legal agreement between the City Council and WMCA. The agreement will be made without a bond being required from WMCA.

This legal agreement will not be subject to a bond from WMCA, as they are a public-sector body and the scheme is predominantly public-funded. In the unlikely event of non-performance by WMCA then the legal agreement would give the City Council power to step in and complete works. The City Council would have to underwrite the resulting costs initially but would be able to recover these costs from WMCA under the terms of the legal agreement.

The figures include for the bus lane enforcement element, at an estimated cost of £0.100m. These costs will be funded by WMCA via a grant-funding contribution.

The estimated cost to the City Council for fees and other expenditure is £0.650m. These costs include staff time in contributing to the design, consultation and approval processes; site inspections, time spent in relation to the preparation of legal agreements, and all costs in relation to the temporary and permanent traffic regulation orders. These costs will be reimbursed by WMCA under the terms of the legal agreement, with quarterly invoices submitted retrospectively by the City Council. As the majority of work will be under Section 8 rather than Section 278 terms, and the input required is different to that for private developer schemes, the City Council will be reimbursed based on actual costs incurred rather than a fixed fee percentage. This will be subject to an agreed cap on overhead rates, although the current estimate allows for a standard overhead recovery rate.

Revenue Consequences

This project will create assets that will form part of the highway upon completion of the project; as such they will be maintained within the overall highway maintenance programme. The estimated net cost of including these newly created assets within the highway maintenance regime is estimated to be £0.024m per year, including both standard and enhanced assets. This will be funded from the provision for Highways Maintenance held within Corporate Policy contingency. The element for tree maintenance within this figure assumes a net gain of 26 trees along the corridor.

As part of the City Council's obligations under the Highway Maintenance and Management Private Finance Initiative (HMMPFI) contract, Highways have been formally notified of the proposed changes to the highway inventory arising from this scheme. The works relate to SSD No.5926. Consultation with Birmingham Highways Limited as PFI service provider is also being carried out to coordinate the proposed works with other programmed activities on the highway network.

Bus Line Enforcements (BLE)

The City Council will be responsible for ongoing camera enforcement operations, and income will

be generated from Penalty Charge Notices (PCNs) issued as part of the enforcement regime. This income will be used in the first instance to cover the operational cost of enforcement. These costs will include employing staff specifically for BLE enforcement, including:

- Employing staff specifically for camera enforcement;
- on-going running costs for the cameras including maintenance, servicing, energy and licences;
- maintenance costs in ensuring that the sites remain compliant with the standards for signing and road markings under the latest version of Traffic Signs Regulations and General Direction (TSRGD), which are required for offence capturing;
- operational costs (processing and administration) of the PCNs;
- replacement of the cameras and associated equipment in future years;
- cost of decommissioning the cameras.

The City Council will manage the cameras as part of the wider enforcement camera network. To ensure that the income is sufficient to fund the costs of enforcement the level of penalty notices issued will be monitored closely and operational resources reviewed/adjusted accordingly.

The table in Section E1 shows a summary of the estimated income and expenditure based upon the proposed enforcement regime, which assumes the maximum of four cameras, and experience from bus lane enforcement schemes already in operation within the city. This shows that over the first six years of operation of the cameras, income from PCNs is estimated at £0.996m with operational and other costs estimated at £0.770m, leaving a retained surplus of £0.226m. Any surpluses generated will be used in accordance with applicable regulations, which is in line with the strategy for utilising the sums generated from bus lane enforcement as outlined in the Cabinet Report, Updated Transportation And Highways Capital Programme 2019/20 to 2024/25 Option Appraisal, approved on 26 March 2019

E3. Approach to optimism bias and provision of contingency

Construction costs include an assumed 2.8% inflation rate. Estimates of other costs do not allow for inflation. Benefit and cost data for the scheme is deflated to a common price base, and costs have been converted from factor prices to market prices, discounted for the 60-year appraisal period.

Contingency has been included at 20% for works and 10% for other costs, which is appropriate for the current stage of development and level of risk. Cost estimates do not include Optimism Bias, but this has been included in the economic appraisal to account for the historic tendency to underestimate scheme costs.

E4. Taxation

There should be no adverse VAT implications for the City Council in this scheme as the maintenance of highways is a statutory function of the City Council such that any VAT paid to contractors or on the acquisition of land is reclaimable.

F. PROJECT MANAGEMENT CASE

F1. Key Project Milestones

Planned Delivery Dates

Detailed Design commences

February 2019

Detailed Design complete

December 2019

WMCA Full Business Case submission

January 2020

WMCA Full Business Case approval

April 2020

Contractor appointed

March 2020

Contractor mobilisation

May 2020

APPENDIX A

Works commence	June 2020
Works complete	March 2022
Launch of Sprint	April 2022
Commonwealth Games	July-August 2022

F2. Achievability

The A34 Walsall to Birmingham route is one of the Sprint schemes which have been proposed for accelerated delivery as part of the transport strategy for the Commonwealth Games in 2022. WMCA have established a specialist design team including architectural and place designers, traffic modelling expertise, engineering designers and lighting experts to carry out the development and detailed design work on the project. This team is co-located within the Sprint team at WMCA's offices to provide greater support and a more streamlined approach to design.

The traffic management changes and TROs needed for the scheme are quite complex, particularly as they also inter-relate with other projects related to the Commonwealth Games and HS2. Strategic management is in place to ensure coordinated delivery including appropriate phasing of the TRO advertisements, and this was the subject of a presentation to Sustainability and Transport Overview and Scrutiny Committee on 24th July 2019. The detail of the traffic management changes is being addressed as part of the detailed design work.

WMCA has begun the process to appoint a main contractor through the MHA Framework and has already appointed a contractor to carry out the second part of Early Contractor involvement.

F3. Dependencies on other projects or activities

In order to carry out works on the highway, WMCA are required to enter into a legal agreement with the City Council. This will take the form of a combined Section 278 and Section 8 Agreement and is subject to agreement between the two parties. Works outside of the city boundary will require similar agreements with Sandwell and Walsall councils.

WMCA will carry out the procurement process for appointing a contractor for the works. They will also be responsible procuring an operator for the Sprint service and the high-quality vehicles, along with bus shelters, real-time information and off-board ticketing systems. The Bus Lane Enforcement element will depend on the City Council procuring the equipment and installation through a separate procurement process.

TfWM are developing an Enhanced Partnership for the operation of the Sprint network and other key bus routes.

The City Council will retain the Network Management Duty, including the processing and making of permanent and temporary TROs.

There are no Compulsory Purchase Order (CPO) requirements the works proposed in Birmingham, but a short section to the north of the M6 Motorway requires private land and negotiation for this land is underway. If a CPO is required it would be the responsibility of WMCA and Walsall Council.

The timescale for delivery of the Sprint scheme by 2022 is intended to provide part of the package of public transport improvements for the Commonwealth Games. There would be a risk of reputational damage to the City Council if the works are not completed before the Games.

The measures will also be coordinated with other schemes along the route, particularly in the city centre for HS2 and Birmingham Eastside Metro Extension. Other than in Perry Barr, the Sprint proposals are not dependent on completion of works for the Games.

The proposed outbound Sprint stop at Perry Barr / One Stop requires changes to the layout of the existing Bus Interchange, which is a separate scheme ahead of the Commonwealth Games.

F4. Officer support

Project Management:

The scheme is led by WMCA officers with support off the City Council and other partnering local authorities:

- WMCA Scheme Lead: Duncan Fry – Sprint Scheme Delivery Manager
Tel: 0121 214 7384 Email: duncan.fry@tfwm.org.uk
- BCC Representative: Andy Chidgey – Transport Delivery Manager
Tel: 0121 675 6519 Email: andy.chidgey@birmingham.gov.uk
- BCC Representative: Rob Bird – Principal Transport Delivery Officer
Tel: 0121 303 3532 Email: robert.bird@birmingham.gov.uk
- Walsall Representative: Matt Crowton – Transportation Major Projects & Strategy Manager
Tel: 01922 654358 E-mail: matt.crowton@walsall.gov.uk
- Sandwell Representative: Andy Miller – Strategic Planning & Transportation Manager
Tel: 0121 569 4249 E-mail: andy_miller@sandwell.gov.uk

Project Accountants:

- WMCA Accountant: Miranda Joseph – Sprint Project Accountant
Tel: 0121 214 7239 Email: miranda.joseph@wmca.org.uk
- BCC Accountant: Andy Price – Finance Manager,
Tel: 0121 303 7107 E-mail: andy.r.price@birmingham.gov.uk

F5. Project Management

The scheme is led by WMCA officers on behalf of WMCA, with support from the City Council and other partnering local authorities. The project is managed by a joint Sprint Programme Board, the membership of which is as follows:

- Sandeep Shingadia (Chair) – Director of Development and Delivery, WMCA
- Steve McAleavy – Director of Customer Experience, WMCA
- Angela Hosford – Head of Sprint, WMCA
- Phil Edwards – Assistant Director Transport and Connectivity, Birmingham City Council
- Stuart Everton – Director of Black Country Transport, City of Wolverhampton Council
- Miranda Joseph – Sprint Project Accountant

Sprint is also reported as part of Commonwealth Games activities through the B2022 Capital Board.

G. SUPPORTING INFORMATION

G1. Project Plan

See keydates in Section F1 and a project programme in Appendix D.

G2. Summary of Risks and Issues Register

A scheme-level Risk Register has been established through a workshop held by WMCA with its key stakeholders including the City Council and other local authorities. The risk register is managed by WMCA and accessible to partnering local authorities, a summary copy can be found in Appendix C.

G3. External funding and other financial details

Refer to Section E2.

G4. Stakeholder analysis

APPENDIX A

Stakeholder	Role and Significance	How stakeholder relationships will be managed
WMCA	Scheme promotor/ lead.	Meetings including Project Boards and Programme Board. WMCA will lead on engagement with other stakeholders.
Birmingham City Council	Delivery Partner/ Signatory	Attendance at Project Boards and Programme Boards. To assist WMCA in providing necessary agreements to facilitate delivery works on the highway.
Other Local Authorities (ie Walsall MBC and Sandwell MBC)	Delivery Partner/ Signatory	Attendance at Project Boards and Programme Boards. To assist WMCA in providing necessary agreements to facilitate delivery works on the highway.
Transport Delivery Committee (TDC) (WMCA)	Strategic links	City Council councillors in attendance. Quarterly updates during the project – appropriate method including emails, telephone or meetings.
MP & Local Councillors	Local Impact to ensure they are aware of the scheme should they be approached by their constituents	Meeting before full council / Councillor drop in sessions Monthly updates during the project – appropriate method including emails, telephone or meetings. 1-2-1 Meeting with MPs
Other scheme around Perry Barr for the Commonwealth Games including Alexander Stadium Redevelopment, Athletes Village, Perry Barr Highways scheme and Perry Barr Interchange	Co-ordination of dependant schemes along the Sprint Route, including meetings with other project teams as required.	Ad-hoc co-ordination meetings when required. Sprint is also reported as part of Commonwealth Games activities through the B2022 Capital Board.
Resident Groups	To inform them about the scheme, promote the benefits of Sprint, obtain views and encourage use	Email with link to newsletters and website (Website will have details about the routes, benefits, maps, events, questionnaire) Ongoing depending on groups' requirements
Bus Operators (including National Express)		Regular updates through WMCA's Bus Alliance group and ad-hoc meetings.
General groups along the corridor eg Cycling & Walking, Bus Users or Residents Groups	To inform them about the scheme, promote the benefits of Sprint, and get their views	Email with link to website detailing public engagement events
Emergency Services	To inform them of our proposals and get their views.	Email/telephone/meetings as required
General Public (Including local businesses)	Benefits and timing inform them about the engagement, obtain views, sell the benefits of Sprint and encourage use	Leaflet, email, posters, postcards, letter-drop, Facebook advertising, social media, media releases/interviews, presentations, at-stop interviews, events etc

G5. Benefits Register

APPENDIX A

In order to assess the impact of the Sprint scheme on bus patronage, the West Midlands Public Transport model has been run in years 2026 and 2036. Benefits identified by the assessment are based on forecast passenger journey time savings and assume a 7.5-minute (equivalent to 8 services per hour) frequency service.

The annualised patronage is around 4.4 million for this scheme, and each user is forecast to obtain around an average 5-minute travel time benefit per journey. This gives an average user benefit of £1.650m per annum at 2010 prices. Over a 60-year appraisal period the present value of benefits (PVB) is around £101.600m following the subtraction of highway disbenefits. Based on this high-level cost the Benefit to Cost Ratio for this scheme is circa 2.42, which represents 'high' value for money – further details are given in the TfWM FBC document in Appendix E.

Measure	Annual value	Start date	Impact
(a) Monetised benefits:			
	£1.65m	2021	Over a 60-year appraisal period from the opening year of 2021, the present value of benefits (PVB) is £101.600m following the subtraction of highway disbenefit. Based on this high-level cost the Benefit to Cost Ratio for this scheme is circa 2.42
(b) Other quantified benefits:			
(c) Non-quantified benefits:			
	n/a	2021	
Agglomeration			Increase in labour productivity, product input, access to labour markets, knowledge and technology spill overs from improved connectivity (largest benefit)
Competitive markets			Output change in imperfectly competitive markets – reduces transport costs allowing output and profitability to increase
Tax revenues			Tax revenues arising from labour market impacts
Labour supply impacts			Transport cost benefits to an individual from working (small benefit)
Move to more or less productive jobs			Benefits to an individual and businesses from changing work location due to improved access to employment opportunities (not assessed due to lack of land-use / employment model but potential significant benefit).
Land value uplift			Not calculated as the benefit-cost ratio of the scheme is already sufficient.

Wider impacts will be calculated based on the standard DfT 'Wider Impacts in Transport Appraisal' software following detailed design. The scheme has been tested across three different development scenarios: committed development, planned development, and additional developments.

Other Attachments	
<ul style="list-style-type: none">• Appendix B – WMCA Equality Impact Assessment• Appendix C – WMCA Risk Assessment• Appendix D – WMCA Programme• Appendix E – WMCA A34 Walsall to Birmingham Sprint Full Business Case (draft)• Appendix F – WMCA Sprint Route Public Consultation output report• Appendix G – WMCA Route Plan• Appendix H – WMCA Scheme Plans (Birmingham section only)	