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London Luton Airport Expansion

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7.02 Transport Assessment - Part 1 of 4 (Chapters 1-4)

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7.02 TRANSPORT ASSESSMENT – PART 1 OF 4 (CHAPTERS 1-4)

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EXECUTIVE SUMMARY

Introduction

This document is the Transport Assessment (TA), which has been prepared to support the proposed expansion of London Luton Airport ('the Proposed Development'). This application is made by Luton Rising (a trading name of London Luton Airport Limited), owners of London Luton Airport ('the Applicant'). Luton Rising is a business and social enterprise owned by a sole shareholder, Luton Borough Council, for community benefit. Luton Rising is at the heart of a movement for positive change in the Luton community. It provides a summary of the work carried out as part of the detailed traffic and transport work in relation to the Applicant's proposal to expand London Luton Airport (the airport). The Proposed Development builds on the current operational airport with the construction of a new passenger terminal and additional aircraft stands to the northeast of the runway. This will take the overall passenger capacity from 18 million passengers per annum (mppa) to 32 mppa.

This Executive Summary summarises the predicted transport impacts as a result of the Proposed Development and the proposed mitigation as described in the application for development consent.

Existing site

The Main Application Site includes the existing airport, the existing business park to the north and northwest of the airport, Wigmore Valley Park and arable land to the east.

The airport infrastructure consists of a single runway with associated taxiways, stands and aprons, passenger terminal, business aviation terminals, supporting hangars, maintenance facilities, a cargo facility and airport related offices. Surface access facilities include Short, Mid and Long stay car parks, drop off/pick up bays, a bus station, taxi bays and the Luton DART station.

New Century Park (NCP), now known as Green Horizons Park (GHP), is located to the east of the airport. GHP is a mixed-use business park which includes the construction of a new access road (referred to in the planning application as Century Park Access Road (CPAR)).

The existing airport has planning permission to handle 18 mppa.

Transport links

Highway

The airport has excellent highway links with access from the A1081 which connects to M1 Junction 10, approximately 4.5km to the west of the airport. The M1 links London directly with the East Midlands and the northeast, and via the M6, the West Midlands and northwest. There is also access to Luton town centre and the A505 which leads to Hitchin.

Public transport

The airport is well served by public transport, with bus and rail services connecting directly to the airport.

Luton Airport Parkway station is located approximately 2.1 km from the airport and is connected to the airport by a shuttle bus. The recently constructed Luton DART will provide

a new cable-hauled fast passenger transit between the station and airport - the announcement of an official opening date will be made in early 2023. Luton Airport Parkway station is served by trains operated by Thameslink and East Midlands Railway (EMR). The regional Thameslink service operates 24 hours a day between Bedford and Brighton/Bedford and Gatwick and provides c.78 daily services in each direction. The suburban service operates for 18 hours a day and provides 45-50 services per day in each direction. The EMR Connect service operates 18 hours a day between Luton Airport Parkway station and St Pancras International station providing a total of 34 daily services in each direction. In addition, there are two Intercity services per day that stop at Luton Airport Parkway station in each direction.

The airport is served by 12 coach routes providing 192 services per day in one direction. The routes serve destinations across the UK including major cities, airports, and London rail stations (Victoria and Paddington). There are three bus routes that serve the airport, and these routes connect with Luton, Dunstable, Stevenage and London. There are generally c.8 buses per hour to Dunstable in one direction, while the other routes provide 2 services per hour.

Walking and cycling

Dedicated cycle route connections to the airport are limited. There is an off-road shared pedestrian/cycle path on Airport Way, and this connects with off-road routes on Vauxhall Way and the A1081 which leads to Luton Airport Parkway station.

Pedestrian facilities are provided within the airport estate to meet operational needs. Footways and crossings are also provided on Airport Way, Percival Way, President Way and Frank Lester Way as well as other roads within the estate, which link into the wider pedestrian network in Luton. There are several Public Rights of Way (PRoW) located within the airport land.

Existing travel demands

Mode share

Civil Aviation Authority (CAA) mode share data (Ref ES.1) shows that there has been a gradual trend of increasing public transport use by passengers to 2019, bringing the public transport mode share up to at least 38% when the airport handled 18 mppa. The pandemic resulted in a marked decrease in the passenger public transport mode share in 2020 and an equivalent increase in car use.

The staff mode share in 2018, when the last pre-pandemic travel survey was undertaken, showed 67% (driver and passenger) travelled by car and 24% travelled by public transport. Following the pandemic, there was a substantial reduction in public transport use to 5% and a corresponding increase in car use.

Trip generation

In 2019, with 18 mppa the airport was estimated to have generated 726 landside arrivals (person trips) and 2,516 departures in the AM peak and 1,790 arrivals and 1,024 departures in the PM peak hour.

For staff, there were estimated to be 459 arrivals (person trips) in the AM peak and 344 departures in the PM peak.

The airport also generates Heavy Good Vehicle (HGV) and Light Goods Vehicle (LGV) movements, which together totalled 215 arrivals and 211 departures in the AM peak, and 171 arrivals and 149 departures in the PM peak.

Accidents

A review of accident data on highway links and junctions was undertaken. This showed there was no noticeable clusters indicating an underlying issue in the highway layout.

Proposed Development

Description

Delivery of the Proposed Development would take several years, during which time the airport will remain operational. Additional capacity to meet the forecast growth in demand would be delivered in undefined increments that appropriately respond to demand over time.

Assessment phasing

For the purposes of this Transport Assessment three Assessment Phases are considered, with each phase delivered to meet the forecast passenger demand at that stage.

- a. **Assessment Phase 1** – a core case of 21.5 mppa by 2027 is assumed to deliver works to facilitate the expansion of capacity in T1 in line with the demand forecasts contained in the application for development consent.
- b. **Assessment Phase 2a** – a core case of 27 mppa by 2039 when T2 opens is assumed to deliver works to build and operate T2, and any associated infrastructure.
- c. **Assessment Phase 2b** – a core case of 32 mppa by 2043 when T2 is fully built out.

As well as the development of the terminal buildings, the proposal covers the concurrent development of the airfield infrastructure, the associated surface access enhancement into the airport, the necessary enabling works and extension to the Luton DART. The Proposed Development aims to contain the airport as far as practical within the Applicant's current limits of ownership.

Access arrangements

In Assessment Phase 1, it is assumed that access would continue to be provided via Airport Way/Airport Approach Road. The A1081 New Airport Way/Airport Way/Percival Way junction would be upgraded and there would be some minor reconfiguration of President Way.

In Assessment Phase 2, it is assumed that the Airport Access Road (AAR), formerly known as CPAR, would be delivered to provide access to Terminal 2. The CPAR design has been modified in the AAR proposal to cater for the Proposed Development. For the purposes of this Transport Assessment, it is assumed that the AAR would be delivered in stages aligned to Assessment Phases 2a and 2b.

Off-site mitigation

As the Proposed Development will increase the demand for surface access trips, mitigation is proposed at several off-site locations to provide additional capacity. The off-site mitigation has been assumed to be delivered in Assessment Phases 1, 2a and 2b as set out below:

Assessment Phase 1

- a. M1 Junction 10 improvements and widening works;
- b. A505 Vauxhall Way/Eaton Green Road part signalisation;
- c. A1081 New Airport Way/B653/Gipsy Lane junction improvements and widening works;
- d. Windmill Road/Kimpton Road signalisation;
- e. A1081 New Airport Way/London Road (north);
- f. A1081 New Airport Way/Percival Way signalisation; and
- g. Eaton Green Road/Lalleford Road signalisation.

Assessment Phase 2a

- a. Western section of AAR between new signalised junction with A1081 New Airport Way and Provost Way/Percival Way;
- b. Eastern section of AAR between new signalised junctions with Frank Lester Way and Eaton Green Road;
- c. M1 Junction 10 improvements and widening works;
- d. A1081 New Airport Way/A1081 London Road (south) part-time signalisation;
- e. A1081 New Airport Way/A505 Kimpton Road/Vauxhall Way junction improvement;
- f. Wigmore Lane/Crawley Green Road and Wigmore Lane/Raynham Way signalisation;
- g. Eaton Green Road/Wigmore Lane signalisation;
- h. Eaton Green Road/Frank Lester Way signalisation including Frank Lester Way one-way restriction;
- i. Windmill Road/St. Mary's Road/Crawley Green Road signalisation;
- j. Crawley Green Road/Lalleford Road signalisation;
- k. A602 Park Way/A505 Upper Tilehouse Street junction improvements;
- l. A505 Moormead Hill/B655 Pirton Road/Upper Tilehouse Street junction improvements; and
- m. A602 Park Way/Stevenage Road junction improvements.

Assessment Phase 2b

- a. Completed AAR including upgraded junctions with Provost Way/Percival Way and Frank Lester Way; and
- b. M1 Junction 10 improvements and widening works.

The off-site mitigation is embedded into the design of the Proposed Development.

Forecourt arrangements

For Assessment Phase 1, a maximum of 9 additional bus/coach bays would be provided in the forecourt area at Terminal 1 giving a total of 27 bays. There would be no change to the

capacity of the existing drop off and taxi facilities which would be adequate for the increased passenger demand.

For Assessment Phase 2a, it is assumed that a new forecourt provided at Terminal 2 would include c.56 drop off spaces, c.16 taxi spaces, 7 bus bays and 16 coach bays. The forecourt capacity at Terminal 1 would be unchanged.

For Phase 2b, the forecourt at Terminal 2 would be reconfigured from the Phase 2a layout to include c.100 drop-off spaces, c.49 taxi drop-off spaces, 8 bus bays and 16 coach bays. The forecourt capacity at Terminal 1 would be unchanged.

Car parking

To cater for the increased passenger and staff demands, the car parking provision would be increased in each phase to the levels shown in **Table ES.1**.

Table ES.1: Proposed car parking

Parking type	Number of spaces		
	Phase 1 (21.5mppa)	Phase 2a (27mppa)	Phase 2b (32mppa)
Passenger Short stay	4,150	4,800	5,800
Passenger Mid stay	2,600	3,000	3,650
Passenger Long stay	4,675	5,400	6,550
Staff (airport related)	4,400	4,900	5,200
Car hire	500	600	700
Valet pick up/drop off	75	100	125
Total	16,400	18,800	22,025

The proposed car parking takes account of mode shift assumptions for staff and passengers and would include provision for disabled parking and electric vehicle parking.

Car parking locations would change to suit the phasing of the Proposed Development, but the short and mid stay car parks at Terminal 1 would be unaffected. Short stay car parking would be close to the airport terminals whilst Mid stay and Long stay car parks would be located further away. Shuttle buses would connect mid stay and long stay car parks to both terminals.

Staff car parking would be located to the north of the airport and from Phase 2 would include off-site parking at two sites adjacent to Luton Airport Parkway station where staff can access the airport via the Luton DART.

The AAR design impacts on several businesses, resulting in a loss of vehicular access and parking, however there are proposals to reinstate these as part of the design.

Public transport

Proposed public transport infrastructure at the airport comprises the changes to the forecourt at Terminal 1, the new forecourt at Terminal 2 and the extension of the Luton DART to Terminal 2.

Walking and cycling

The Proposed Development includes additional cycle parking for staff. Cycle parking will be located close to staff entrances and will be secure and weatherproofed. The Proposed Development would include supporting changing facilities, lockers and showers.

Pedestrian and cycle facilities would be provided along all new road links within the Proposed Development, including the AAR, Eaton Green Road Link and the retained section of President Way.

These improvements would help encourage walking and cycling commuter trips, particularly between the large residential area of Wigmore to the north of the airport, and the main employment areas at the airport terminals and businesses located along the AAR, Percival Way and President Way.

Public Rights of Way

A series of improvements and alterations are proposed to PRowS in the vicinity of the Proposed Development. These include new and improved routes within the planned replacement parkland and Wigmore Park and stopping up of existing PRowS.

Assessment methodology

Transport modelling

The assessment methodology has been developed through on-going discussions with the relevant highway authorities.

Two transport models have been used to appraise transport impacts as a result of the Proposed Development – the CBLTM-LTN and operational Vissim model. The CBLTM-LTN model has been used to assess the strategic impacts of the Proposed Development and where strategic impacts have been identified, the CBLTM-LTN model is supplemented by local junction modelling as appropriate. The Vissim model has been used to provide a detailed assessment of the road network operation and impact of the Proposed Development in the area local to the airport, including assessing highway interventions to mitigate impacts.

Both the CBLTM-LTN and Vissim models were calibrated and validated to the latest available data and in accordance with modelling guidance. The base year for the CBLTM-LTN is 2016 and the base year for the Vissim model is 2017.

Assessment scenarios

The impacts of the development have been appraised against a without development scenario. In the without development scenarios, the airport is assumed to reach its existing permitted 18 mppa with no growth beyond this level of passenger demand.

The impact of the Proposed Development has been assessed for three future years when it is assumed that a maximum level of passenger throughput would be achieved. The proposed assessment years/phases are:

- a. Assessment Phase 1 - 2027, year of Assessment Phase 1 (21.5mppa);
- b. Assessment Phase 2a - 2039, year of Assessment Phase 2a (27mppa); and
- c. Assessment Phase 2b -2043, year of Assessment Phase 2b (32mppa)

Future Baseline (without Proposed Development)

The Future Baseline represents the transport conditions in the future without the Proposed Development. The Future Baseline in the CBLTM-LTN and Vissim model includes growth associated with planned and committed developments and planned and committed transport (highway and public transport) infrastructure improvements.

In the Luton area, this includes a package of highway improvement schemes identified in the East Luton Study, carried out on behalf of Luton Borough Council (LBC). These schemes were designed to address traffic pressures arising from planned growth in housing and employment and it was agreed with LBC that these improvements would be in place by 2027.

Also, National Highways would likely need to consider measures to address the existing constraints on the M1 corridor. Whilst there is no committed scheme, through discussion with National Highways, a capacity upgrade has been included in the 2043 Future Baseline between M1 Junctions 9 and 10. A sensitivity test has also been undertaken without the M1 capacity improvement.

The future baseline allows for the airport handling the permitted maximum capacity of 18 mppa.

Forecast trip generation and distribution

Vehicular trip generation has been developed from an analysis of existing travel patterns, future year passenger and staff forecasts and flight schedules.

Passenger trip generation

The passenger trip generation has been based on forecast passenger growth associated with each phase of the development. This data was provided by York Aviation (YA) and was accompanied by indicative flight schedules for each assessment year.

This information has been used to develop the surface access passenger arrival and departure profiles at the airport, which make allowance for the time required for check-in prior to flight departure, customs checks and baggage claim following flight arrival.

Mode share assumptions were applied to the passenger arrivals and departures to establish the number of trips made by each surface access mode. For the purposes of this Transport Assessment and the testing of impacts, a conservative public transport mode share

assumption, based on CAA data, was used for each assessment year. The public transport mode share assumptions are summarised in **Table ES.2**.

Table ES.2: Public transport mode share assumptions

Category	Future Baseline (without Proposed Development)	With Proposed Development		
	2027, 2039, 2043	2027	2039	2043
Staff*	27%	30%	35%	40%
Passengers	40%	40%	45%	45%

The vehicular trips generated by passengers, based on the flight schedules, passenger forecasts, detailed mode share assumptions and landside arrival/departure patterns are summarised in **Table ES.3**. The vehicular trip generation includes private vehicle trips parking on-site and off-site, drop off, taxi, car hire and buses/coaches.

Table ES.3: Passenger vehicular trip generation - AM and PM peak hour

Time period	Future Baseline (Without Proposed Development)	With Proposed Development		
	2027, 2039, 2043 (18 mppa)	Assessment Phase 1 2027	Assessment Phase 2a 2039	Assessment Phase 2b 2043
AM peak - total vehicles	1800	1972	2269	2709
PM peak - total vehicles	1579	1929	2041	2386

The distribution and assignment of passenger trips with the Proposed Development operational is based on CAA origin and destination data.

Staff trip generation

An assumption of 350 additional on-site staff for every additional 1 mppa was adopted as the basis for estimating future year staff trip generation from the Proposed Development.

Using the increase in the number of staff for each future year (relative to the baseline), detailed mode split assumptions, and the baseline peak hour staff vehicular trip generation, the future year trip generations were estimated as shown in **Table ES.4**.

Table ES.4: Forecast staff vehicular trip generation - AM and PM peak hour

Time period	Future Baseline (Without Proposed Development)	With Proposed Development		
	2027, 2039, 2043	Assessment Phase 1 2027	Assessment Phase 2a 2039	Assessment Phase 2b 2043
AM peak - total vehicles	1348	1464	1600	1679
PM peak - total vehicles	1240	1347	1472	1545

The distribution and assignment of staff trips is based on the movement patterns established from the 2016 (CBLTM-LTN) and 2017 (Vissim) base models.

HGV and LGV trip generation

The HGV and LGV trips generated by the Proposed Development are calculated by applying the percentage growth in passengers to the baseline HGV and LGV movements to/from the airport. The resulting HGV and LGV trip generation is shown in **Table ES.5**.

Table ES.5: Forecast HGV and LGV trip generation – AM and PM peak hour

Time period	HGV/LGV	Future Baseline (Without Proposed Development)	With Proposed Development		
		2027, 2039, 2043	Assessment Phase 1 2027	Assessment Phase 2a 2039	Assessment Phase 2b 2043
AM peak	Total HGVs	202	241	302	358
	Total LGVs	225	269	338	400
PM peak	Total HGVs	169	202	253	300
	Total LGVs	151	180	226	268

The distribution and assignment of HGV and LGV trips is based on the movement patterns established from the 2016 (CBLTM-LTN) and 2017 (Vissim) base models.

Road traffic forecasts

Future year road traffic forecasts were derived by incorporating the additional ‘with Proposed Development’ demand into the CBLTM-LTN and Vissim model matrices.

Proposed highway improvement schemes were also added depending on the incremental impacts of the additional traffic in any given forecast year with the resultant final package of mitigations consistent with the junction mitigation strategy set out for the Proposed Development.

Highway capacity assessments

Baseline

CBLTM-LTN

The model outputs show that the road network links would generally be operating within their capacity in the 2016 Baseline in the AM and PM peak. There are some links that are approaching their capacity including the A1(M) southbound between Stevenage and Welwyn (AM peak), sections of the A505 in Luton town centre (AM and PM peak) and the A602 between Hitchin and Stevenage (AM and PM peak).

Vissim

In the 2017 Baseline, the junctions within the study area would generally be operating with a Level of Service (LoS) C (stable flow/acceptable delays) or better in the AM peak. The operation of the junctions in the PM peak is generally worse with a maximum LoS E (unstable flow) at the A505 Vauxhall Way/Crawley Green Road junction. The A1081 New Airport Way/B653/Gipsy Lane network of junctions, A505 Vauxhall Way/Eaton Green Road roundabout and Windmill Road/St Mary’s Road/Crawley Green Road roundabout would all operate with LoS D (approaching unstable flow) in the PM peak.

Future Baseline

CBLTM-LTN

The growth in background traffic leads to a progressive worsening of the operation of the highway links. By 2043, highway links would generally continue to operate within their capacity in the AM and PM peak. The growth in traffic would however push some sections of the M1 closer to their capacities, particularly between junctions 10 and 11. In addition, the A602 between Hitchin and the A1(M) would be approaching its capacity in the PM peak, and the A1081 between the M1 and the Kimpton Road/Vauxhall Way junction would be approaching its capacity in the AM and PM peak.

Vissim

The growth in background traffic leads to significant congestion in the network particularly in the PM peak hour, despite the committed East Luton highway improvements. Average speeds are low and there are many unreleased vehicles. These queues and delays are largely attributed to congestion on the M1 and M1 Junction 10 which causes ‘locking up’ of the network, which then impacts on the performance of the local road network. In 2043, the network performs with significantly improved operation in both the AM and PM peak hours due to the M1 and M1 Junction 10 improvement which would ‘unlock’ both the M1 mainline and Junction 10 and consequently reduce knock-on impacts on the local network.

With Proposed Development

CBLTM-LTN

2027

The Proposed Development has a minimal impact on traffic flows and the operation of the highway network outside the local area around the airport including M1 Junction 10.

The percentage impacts on the M1 traffic volumes between Junctions 9 and 11 are generally small and the M1 mainline would operate within its capacity with the Proposed Development in place. There would also be small impacts on the slip roads at Junction 10.

Impacts on the local highway network are quite variable, with a reduction in traffic on the A505 Kimpton Road and the A505 Beech Hill. Generally, there are increases in traffic on the A1081 New Airport Way, A505 Vauxhall Way, Eaton Green Road, the B653 Lower Harpenden Road (PM peak) and the A1081 London Road (PM peak).

2039

The Proposed Development has a minimal impact on traffic flows and the operation of highway network outside the local area around the airport including M1 Junction 10.

The percentage impacts on the M1 traffic volumes between Junctions 9 and 11 are generally small except on the southbound carriageway between Junctions 9 and 10, where the increase is 10%. However, the M1 mainline would still operate within its capacity with the Proposed Development in place. There would be a more substantial increase in traffic on the slip roads as a result of the Proposed Development.

Impacts on the local highway network are quite variable, with a reduction in traffic on the A505 Kimpton Road and the A1081 London Road. Generally, there are increases in traffic on the A1081 New Airport Way, A505 Vauxhall Way, A505 Beech Hill, Eaton Green Road and the B653 Lower Harpenden Road. The AAR would reduce traffic on Eaton Green Road between Frank Lester Way and Wigmore Lane, improving its operation relative to the future baseline.

2043

The Proposed Development has a minimal impact on traffic flows and the operation of highway network outside the local area around the airport including M1 Junction 10.

The percentage impacts on the M1 traffic volumes between Junctions 9 and 11 are generally small and the M1 mainline would operate within its capacity with the Proposed Development in place. There would be a more substantial increase in traffic on the slip roads as a result of the Proposed Development.

Impacts on the local highway network are quite variable, with a reduction in traffic on the A505 Kimpton Road. Generally, there are increases in traffic on the A1081 New Airport Way, A505 Vauxhall Way, A505 Beech Hill, Eaton Green Road, the B653 Lower Harpenden Road (PM peak) and the A1081 London Road (AM peak). The AAR would reduce traffic on Eaton Green Road between Frank Lester Way and Wigmore Lane, improving its operation relative to the future baseline.

The performance of the M1 Junction 10 and local road network with the Proposed Development in place is considered in detail in the Vissim modelling.

Vissim

2027

In the AM peak, the network would generally operate with free flow or stable conditions and is broadly similar in Assessment Phase 1 when compared with the future baseline. In the PM peak, the network would generally operate with improved conditions in Assessment Phase 1 when compared with the future baseline. The Proposed Development in Assessment Phase 1 and associated junction mitigations are not considered to have a significant adverse impact on the operation of the highway network.

2039

In the AM peak, the network would generally operate with free flow or stable conditions and is broadly similar in Assessment Phase 2a when compared with the future baseline. Where there are longer queues and delays, these are broadly similar in Assessment Phase 2a and the future baseline. In the PM peak, the network would generally operate comparatively in the Assessment Phase 2a and future baseline scenarios. Where there is a worsening in the LoS, conditions are still considered to be in the acceptable or tolerable range. The Proposed Development in Assessment Phase 2a and associated junction mitigations are not considered to have a significant adverse impact on the operation of the highway network.

2043

In the AM and PM peak hours, the network would generally operate with free flow or stable conditions and would be broadly similar in Assessment Phase 2b and the future baseline. The Proposed Development in Assessment Phase 2b and associated junction mitigations are not considered to have a significant adverse impact on the operation of the highway network.

Junction impacts – outside Vissim study area

The strategic modelling and the operational Vissim modelling have shown that the Proposed Development and associated off-site mitigation would have limited impact in either the LBC area or beyond. As part of the on-going discussions with affected highway authorities, Hertfordshire County Council (HCC) and Central Bedfordshire Council (CBC) have requested further consideration regarding impacts at three junctions in Hitchin and five junctions in Caddington.

Hitchin

Off-site mitigation is proposed as part of the Proposed Development at the A602 Park Way/Stevenage Road junction, the A602 Park Way/A505 Upper Tilehouse Street junction, and the A505 Moormead Hill/B655 Pirton Road/Upper Tilehouse Street junction for implementation in 2039.

The proposed improvement to the A602 Park Way/Stevenage Road junction would reduce the queue lengths and average junction delay with the Proposed Development in place, to a level lower than that predicted for the Future Baseline. The Proposed Development and

associated junction mitigation are not considered to have an adverse impact on the operation of the junction.

The operation of the improved A602 Park Way/A505 Upper Tilehouse Street junction would be better than in the Future Baseline. In the PM peak, the junction operation would be worse than in the Future Baseline with the Upper Tilehouse Street approach operating above its capacity. The queue length would not however block back to any other junctions and the average junction delay remains relatively small and overall average delays are not materially worse than those experienced in the future baseline AM peak hour.

The improved A505 Moormead Hill/B655 Pirton Road/Upper Tilehouse Street junction would operate above its theoretical capacity threshold in the 2043 AM and PM peak hour, like in the future baseline. The operation of the junction would be improved in the AM peak hour despite the increase in total traffic, as rerouting results in less traffic on the A505 Offley Road. In the PM peak hour, the junction operation would be worsened. When the increased impact in the PM peak hour is balanced against the improvement in the AM peak hour, the overall impact is not considered to materially worsen the performance of the junction in Assessment Phase 2b.

Caddington

The five Caddington junctions considered are the A1081 London Road/Newlands Road junction, B4540 Church Road/Newlands Road junction, Newlands Road/Luton Road/Farley Hill junction, Luton Road/Chaul End Road junction; and Chaul End Road/Hatters Way junction.

The Proposed Development would have an insignificant impact on three of the five Caddington junctions. Detailed junction analysis has shown that the Newlands Road/Luton Road/Farley Hill junction and Luton Road/Chaul End Road junction would have significant capacity issues in the 2043 Future Baseline. The changes in traffic flows as a result of the Proposed Development would potentially add to the baseline problems. Nevertheless, providing additional capacity at the junctions could attract more traffic to pass through the village of Caddington rather than using more appropriate roads. CBC has suggested that works to discourage trips routing through Slip End and/ or Caddington may need consideration, with the increase at the Luton Road/Chaul End Road junction in being substantial enough to merit further attention. The Applicant and operator would work with CBC to find appropriate solutions if issues were to arise as a result of the Proposed Development. As the junction is predicted to experience future baseline issues in the absence of the Proposed Development, the Applicant and operator would consider providing a proportionate contribution towards any measures.

Overall summary

A comprehensive approach to modelling the impact of the Proposed Development has been carried out, including strategic modelling, Vissim modelling and local junction capacity assessments. This modelling approach includes consideration of growth including committed developments and planned transport schemes. The modelling demonstrates that the impacts from the Proposed Development and mitigations included in the scheme at Assessment Phase 1, 2a and 2b (full development) would not have a significant adverse impact on the operation of the highway network in the local or wider area.

Sustainable transport

Impact on public transport

To get a broad view of the impact on rail and bus/coach services, the increase in passengers and staff resulting from the Proposed Development have been compared to the current provision of peak hour rail and bus/coach services.

The analysis showed there would be an average increase of between 9 (Assessment Phase 1) and 41 (Assessment Phase 2b) rail users per service in the AM peak and between 11 (Assessment Phase 1) and 36 (Assessment Phase 2b) additional rail users per service in the PM peak hour.

For buses and coaches, there would be an average increase of between 3 (Assessment Phase 1) and 19 (Assessment Phase 2b) bus/coach users per service in the AM peak and between 6 (Assessment Phase 1) and 20 (Assessment Phase 2b) additional bus/coach users per service in the PM peak hour.

The Proposed Development makes provision for larger bus station facilities at the airport, with the intention that additional services would be provided. This would lessen the average impact on each bus/coach service. When demand on existing commercial services increases, it would be expected that the bus operators would increase the frequency of services to support the demand.

Rail capacity assessment

In addition to the public transport impact analysis, a rail capacity assessment has been carried out. The rail capacity analysis has been based on the use of train loading data collected by Govia Thameslink Railway (GTR) in 2018 (pre-pandemic), in combination with the airport's passenger forecasts. From this analysis, it is estimated that the airport related rail passenger demand (excluding staff) would represent 8-17% of the overall rail demand on board of the rail services calling at Luton Airport Parkway by 2043.

Analysis of the seating capacity on GTR and EMR services in 2043, with the Proposed Development, shows that southbound services in the morning peak would have seating capacity available when trains call at Luton Airport Parkway. However, in a northbound direction (during the evening peak period 16:00-19:00), the demand would outstrip the available seating capacity at London St Pancras. The overall capacity (i.e. including standing) would however be sufficient to meet the forecast demand.

Because of the changed travel patterns due to the pandemic, there is a reduction in season ticket sales and traditional peak hour commuting. The DfT Rail Factsheet for 2021 (Ref ES.2) shows that travel is more evenly spread throughout the day in 2020-21 than it was in the previous year, with AM peak travel in being at a lower level. This observed fall in rail demand for regular commuters represents a significant rail capacity release for passengers travelling to and from the airport. It is likely that this trend represents a new normal for the short term, whilst it remains to be seen whether it will continue in the longer term. In the situation when travel is more evenly distributed over the day, the peak hour available capacities are likely to increase for passengers travelling to/from Luton Airport Parkway.

Future public transport offer

Rail

Along with the recent improvements to rail services including Thameslink 20/20 and the introduction of the EMR half hourly services between Corby and London, there are further opportunities to attract more rail mode share to the airport. Schemes expected to attract more airport-related rail users, include:

- a. higher train frequencies on the GTR network at all stations, resulting in a further capacity relief effect on the line;
- b. use of transferrable train ticket to/from 'London terminals' giving passengers the option to choose freely between GTR and EMR services;
- c. Luton DART – the announcement of an official opening date will be made in early 2023. The new integrated Luton DART terminal, supported by integrated ticketing options and more predictable journey times, should result in a transfer solution which is likely to be perceived as 'seamless' and more akin to transfer services seen throughout many other airports; and
- d. Crossrail having a positive impact on the airport's rail mode share due to the noticeable reduction in journey times into Central London, and the ability to interchange to GTR services at Farringdon.

The East West Rail scheme has been assumed (in order to ensure a conservative assessment) not to make a significant contribution to the public transport mode share at the airport, although a frequency of 4 trains per hour per direction (instead of 2) may offer benefits.

The airport operator will work with the train operators to discuss opportunities for improving the services further and infilling any gaps in the timetable when there is substantial demand for travel to the airport. The airport operator would also explore other opportunities, which could include consideration of a direct bus connection between the airport and other stations e.g., Hitchin for access to the East Coast Mainline.

Bus and coach

As part of the application for development consent, the bus stations at the airport's terminals will approximately triple the number of operating bus/coach bays from the current 18. This would bring the capacity in line with that of Stansted Airport, allowing the expansion of bus service frequencies and routes which would be the likely response from bus operators to an increase in passenger levels.

The strategy adopted at Stansted Airport has been to work in close cooperation with the local authorities, bus/coach service providers and airlines to promote the introduction of:

- a. increased frequencies on historic routes;
- b. expansion of bus and coach routes (including terminals within London);
- c. integrated ticketing and ticket purchasing facilities;
- d. better vehicles (e.g., Wi-Fi provision);
- e. promoting route planning facilities for smart technology; and

- f. real time timetable information at bus stops.

The airport operator would work with the bus and coach operators and local authorities to explore the opportunities for increasing the frequencies of existing services and expanding routes where there is substantial airport demand. This could include initial funding of new services to get them established before they can operate on a commercial basis, along with the provision of infrastructure at the airport to enhance the bus travel experience.

General

Sustainable travel will be promoted through measures in the **Framework Travel Plan (FTP) [TR020001/APP/7.13]** submitted as part of the application for development consent. As part of the FTP, progress against rail and bus mode share targets would be monitored and if targets are not being met, measures to overcome barriers to their use would be considered. These measures could comprise infrastructure improvements or promotional measures.

Framework Travel Plan

An **FTP [TR020001/APP/7.13]** has been prepared in support of the application for development consent. The FTP sets out the structure and approach for Travel Plans (TPs) that will be produced in accordance with the requirements of the **Draft Development Consent Order (DCO) [TR020001/APP/2.01]**, to deliver upon the vision and objectives for surface access as the airport expands.

Whilst the **Surface Access Strategy (SAS) [TR020001/APP/7.12]** covers a 20-year period and guides the long-term growth of the airport, the TPs are the 'implementation' of this strategy. TPs will be produced every five years, with specific time-bound Targets for surface access during that shorter time period, supported by a package of interventions and measures to achieve them.

TPs will contain the results of ongoing monitoring and consider comments and views from stakeholders including the Airport Transport Forum (ATF) and the London Luton Airport Consultative Committee (LLACC) on their content and level of ambition. Each TP will set Targets for the next five-year period. They will also identify the interventions and measures to be implemented as part of the TP, including details on their delivery and how each will contribute towards achieving specific Targets.

The FTP provides the framework for the required content of future TPs including relevant policies, surface access context and travel patterns, the vision and objectives for the SAS which the TP strives to deliver upon, the surface access Targets for the TP, interventions and measures, surveys and monitoring against Targets and monitoring, management and governance of the TP.

Construction

Programme

The Proposed Development will be delivered in undefined increments that appropriately respond to demand over time, which may differ from the Assessment Phases providing delivery does not give rise to effects which are materially new or materially different to those reported in the **ES [TR020001/APP/5.01]** and Transport Assessment.

For the purposes of the assessment of the impacts of the construction of the Proposed Development, the construction programme has been assumed to align with the Assessment Phases set out previously.

Hours of operation

The hours of operation on the construction site would in general be Monday to Friday 08:00 to 18:00 and Saturday 08:00 to 13:00. This allows most of the workforce to arrive and depart outside the highway peak hours.

Construction HGV routing

Access routes for construction traffic would be limited, as far as reasonably practicable, to the trunk road network and main roads on the local road network.

It is anticipated that the primary access route to the site would be via M1 Junction 10, along the A1081 (New Airport Way), then via Percival Way/President Way or the AAR.

Number of workers

The average number of workers on site each day ranges between 93 and 325 for Assessment Phase 1 construction; 490 and 1,410 for Assessment Phase 2a construction, 155 and 710 for Assessment Phase 2b construction.

Construction vehicles

It is anticipated that at the peak of construction traffic activity, there would be just over 230 vehicles per day arriving at, and departing from, the airport which would result in just over 460 two-way movements. For analysis purposes, it is assumed that up to three quarters of these vehicles would be HGVs which is a worst case. This is likely to result in a maximum hourly flow in the order of 70 HGV movements. The movement of construction vehicles will be discouraged during the normal peak traffic periods and the greatest volumes of construction traffic will occur between 10:00 and 16:00.

The peak construction traffic would generally have a small impact on the road network. Impacts during construction of Assessment Phases 1 and 2b are low on President Way, Percival Way, the A1081 and M1. In Assessment Phase 2a, the busiest construction period, impacts remain low on the A1081 and the M1, but are higher on Percival Way and President Way. These roads are however suitable for construction traffic and the impacts are temporary.

Scenario testing

In order to provide some assessment of the uncertainties in forecasting methodologies, several sensitivity scenario tests have been undertaken. The tests undertaken which are of relevance to the transport network are:

Slower and Faster airport growth

Consideration has been given to the potential that passenger growth occurs at a slower rate than assumed in the core assessments. The analysis has shown that the mitigation measures included as part of the Proposed Development continue to provide benefits even where the rate of growth of the airport traffic is slower than forecast. The benefits offered by

the mitigation measures are in line with those set out for the core case. The Proposed Development and associated junction mitigations are not considered to have a significant adverse impact on the operation of the highway network even in the scenario where airport growth occurs later.

Whilst there is the potential for passenger growth to occur at a faster rate (passenger forecasts for 21.5mppa, 27mppa and 32mppa achieved earlier), background traffic will be lower and mitigation measures associated with those milestones delivered earlier, if required. As a result, no further traffic modelling was necessary for this scenario.

No capacity upgrade to the M1 corridor

Consideration has been given to the impact on the highway network operation in the core assessment if there was no M1 corridor capacity upgrade. The analysis has shown that in the case when the M1 improvement is removed, the future baseline modelling shows that traffic conditions on the local network worsen as traffic looks for alternative routes. This is particularly the case in the PM peak hour. The test has also shown that when the Proposed Development is added to the no M1 improvement models, the scheme continues to provide benefits and mitigate its own impacts. The sensitivity test shows that the mitigation measures included as part of the Proposed Development not only address airport related traffic but also enable other traffic to be drawn back from the local network onto the main road network.

This test shows that the scale of impact of the Proposed Development remains very similar on the motorway whether additional capacity is provided, but that if additional capacity is not provided there will be significant impacts for surrounding roads even in the absence of the Proposed Development. The test confirms the need for additional capacity on the M1 motorway corridor irrespective of the Proposed Development.

In summary, the Proposed Development could be accommodated even in the absence of an M1 improvement scheme. As such, whether the M1 gains additional capacity should not be a constraint on the ability of the airport to grow.

Strategic model growth in operational model

At the request of the host authorities (Central Bedfordshire Council, Dacorum Borough Council, Hertfordshire County Council, LBC, and North Hertfordshire District Council), a test which takes the growth from the CBLTM-LTN model and applies this to the operational Vissim model has been undertaken to confirm that the proposed highway mitigation strategy remains valid. The analysis showed that even with the strategic model growth applied to the baseline Vissim model flows, the operational performance of the network is not materially affected. The Proposed Development and associated junction mitigations are not considered to have a significant adverse impact on the operation of the highway network.

Residual impacts and further mitigation

This Transport Assessment has set out the highway mitigation strategy to support the Proposed Development. It has been shown that the mitigation strategy addresses the main impacts of the Proposed Development, which have been based on both the forecast changes to background transport use and the expected growth of the airport. As has been shown in the scenario testing, even if there are differences in the traffic forecasts, the

package of mitigation measures is likely to continue to mitigate the impacts of the Proposed Development.

These improvements will be delivered over the duration of this strategy, informed by the rate of passenger growth, mode share and local monitoring. The **FTP [TR020001/APP/7.13]** and **SAS [TR020001/APP/7.12]** will be the basis for prioritising the delivery of these improvements alongside sustainable transport improvements and identifying when they need to be implemented.

Whilst this Transport Assessment has shown how the mitigation strategy would address the impact of the Proposed Development on the road network, the Applicant is also proposing mechanisms to monitor the highway network and manage any unforeseen consequences of the Proposed Development. Through the on-going discussions with stakeholders, the Applicant is committed to investigating, and if necessary, providing assistance towards measures such as parking controls, traffic management and calming measures.

The Applicant will work proactively with the authorities to continue to monitor airport related impacts in these and other areas of concern as the airport grows. Where it is reasonably demonstrated that local issues are associated with airport related trips, the Applicant will seek to reduce car borne trips by implementing further measures as set out in the **FTP [TR020001/APP/7.13]** to address such impacts. Alternatively, the Applicant may contribute towards the local authorities' costs in implementing measures to address the impacts.

If the monitoring identifies any residual impact, a few tools and controls to enable the impact of the airport to be controlled or mitigated have been proposed:

Green Controlled Growth Framework

Through the GCG Framework proposals, the Applicant is committed to a series of clearly specified 'Limits' for the lifetime operation of the airport. By enshrining these Limits within the DCO, the GCG Framework proposals ensure that the actual effects of the airport as they manifest over time are monitored and timely measures are taken to ensure that those Limits are not exceeded. Surface access monitoring and controls form one of the key components of the GCG Framework proposals and breaches of these Limits could result in the airport's ability to grow being limited if appropriate and reasonable actions are not implemented.

Surface Access Strategy

The **SAS [TR020001/APP/7.12]** sets the 20-year framework by which increased travel demand to and from the airport will be carefully managed in order to reduce the impact on surrounding communities and the environment. The SAS recognises the need for changes in travel behaviour and investment in sustainable transport solutions. The Applicant is committed to the strategic vision, objectives and priorities of the SAS.

Framework Travel Plan

An **FTP [TR020001/APP/7.13]** has been prepared to support the application for development consent. The FTP adopts the principles and vision of the **SAS [TR020001/APP/7.12]** and sets out the approach for developing future TP which will act as an implementation plan for surface access for the first 5-years of the Proposed Development and the forthcoming 5-year periods that comprise the 20-year period of the SAS. It also establishes the commitment to produce new Travel Plans every 5-years into the future. As

such the new 5-yearly Travel Plans will take the place of the existing Airport Surface Access Strategy (ASAS), act as the ASAS in the future and will meet the guidance of the Airports National Policy Statement (ANPS) (Ref ES.3) which recommends the production of a new ASAS every 5 years.

The FTP shows how the operator intends to deal with the increased demand in travel associated with a growing airport without leading to unacceptable impacts on the transport network or on the environment through the production of 5-yearly Travel Plans, the aim of which are to achieve the SAS objectives.

The FTP consists of a toolbox of interventions and measures that can be drawn upon and scaled up or down as and when required, in response to meeting the vision and objectives, changing circumstances, and through the results of ongoing monitoring and stakeholder feedback.

The success of the FTP, and consequently the management of travel demand, will require a strong commitment from the operator. This will be achieved through ensuring appropriate governance of the FTP. The FTP therefore includes commitments to reengage with stakeholders through a reinvigoration of the ATF and the appointment of a Framework Travel Plan Co-ordinator, both of which will play a key role in the success of future Travel Plans.

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1 INTRODUCTION

1.1 The Proposed Development

- 1.1.1 This document has been prepared to support the proposed expansion of London Luton Airport ('the Proposed Development'). This application for development consent is made by Luton Rising (a trading name of London Luton Airport Limited), owners of London Luton Airport (hereon referred to as 'the Applicant').
- 1.1.2 Luton Rising is a business and social enterprise owned by a sole shareholder, Luton Borough Council, for community benefit. Luton Rising is at the heart of a movement for positive change in the Luton community.
- 1.1.3 The Proposed Development builds on the current operational airport with the construction of a new passenger terminal and additional aircraft stands to the northeast of the runway. This will take the overall passenger capacity from 18 million passengers per annum (mppa) to 32 mppa.
- 1.1.4 Key elements of the Proposed Development include:
- a. extension and remodelling of the existing passenger terminal (Terminal 1) to increase the capacity;
 - b. new passenger terminal building and boarding piers (Terminal 2);
 - c. earthworks to create an extension to the current airfield platform; most material for these earthworks would be generated on site;
 - d. airside facilities including new taxiways and aprons, together with relocated engine run-up bay and fire training facility;
 - e. landside facilities, including buildings which support the operational, energy and servicing needs of the airport;
 - f. enhancement of the existing surface access network, including a new dual carriageway road accessed via a new junction on the existing New Airport Way (A1081) to the new passenger terminal along with the provision of forecourt and car parking facilities;
 - g. extension of the Luton Direct Air to Rail Transit (Luton DART) with a station serving the new passenger terminal;
 - h. landscape and ecological improvements, including the replacement of existing open space; and
 - i. further infrastructure enhancements and initiatives to support the target of achieving zero emission ground operations by 2040, with interventions to support carbon neutrality being delivered sooner including facilities for greater public transport usage, improved thermal efficiency, electric vehicle charging, on-site energy generation and storage, new aircraft fuel pipeline connection and storage facilities and sustainable surface and foul water management installations.
- 1.1.5 A full project description is provided in **Chapter 4** of the Environmental Statement (the **ES**) [TR020001/APP/5.01].

1.1.6 The Proposed Development is described in three phases for the purposes of assessment: Assessment Phase 1, Assessment Phase 2a and Assessment Phase 2b. These are ‘assessment phases’. In practice, the Proposed Development would be delivered in undefined increments that appropriately respond to demand over time, which may differ from the assessment phases providing delivery does not give rise to effects which are materially new or materially different to those reported in the **ES [TR020001/APP/5.01]** and this Transport Assessment.

1.1.7 For the purposes of this Transport Assessment three assessment phases are considered, with each phase delivered to meet the forecast passenger demand at that stage.

- a. Assessment Phase 1 – a core case of 21.5 mppa by 2027 is assumed to deliver works to facilitate the expansion of capacity in Terminal 1 (T1), in line with the demand forecasts contained in the application for development consent.
- b. Assessment Phase 2a – a core case of 27 mppa by 2039, when Terminal 2 (T2) opens and is assumed to deliver works to build and operate T2, and any associated infrastructure.
- c. Assessment Phase 2b – a core case of 32 mppa by 2043 when T2 is fully built out.

1.1.8 The Proposed Development is to be delivered under a Development Consent Order (DCO). The **Draft DCO [TR020001/APP/2.01]** is supported by several technical documents including various documents which address the surface access issues associated with the application for development consent. These include:

- a. **Transport Assessment [TR020001/APP/7.02]** (this document) which sets out the assessment of the impacts of the Proposed Development on all transport modes, proposes measures to mitigate the impacts and assesses the operation of the mitigated transport network.
- b. **Surface Access Strategy (SAS) [TR020001/APP/7.13]** which sets out the longer-term vision for growth at the airport in a sustainable manner.
- c. **Framework Travel Plan (FTP) [TR020001/APP/7.14]** which sets out the minimum mode share targets for staff and passengers and a plan for achieving these targets with a particular emphasis on sustainable transport and reducing single vehicle occupancy trips.
- d. **Green Controlled Growth Framework [TR020001/APP/7.08]** which sets out processes for monitoring and mitigating environmental effects in four environmental topics including surface access.

1.2 Transport Assessment

1.2.1 A Transport Assessment is a way of assessing the potential transport impacts of a development. The assessment considers the existing transport network and capacity in the vicinity of the development, the potential travel demands from the Proposed Development and the impact of the development travel demand on the

transport network. Depending on the magnitude of the impact, this may lead to mitigation measures being proposed to address the impact of the development. Mitigation measures are aimed at improving access to a site by all relevant modes and minimising the impact on other transport users. Where that mitigation relates to matters that can be addressed by management measures, the mitigation may inform the preparation of an FTP.

- 1.2.2 The purpose of this report is to outline the study area, the current and future impacts on the transport network without the Proposed Development and present the transport impacts associated with the assessment phases. To support this, the methodology discussed with the local highway and planning authorities through the transport scoping process has helped to define the approach to assessment and resulting mitigation measures required to support the application for development consent.

1.3 Report structure

- 1.3.1 This report follows the structure below:

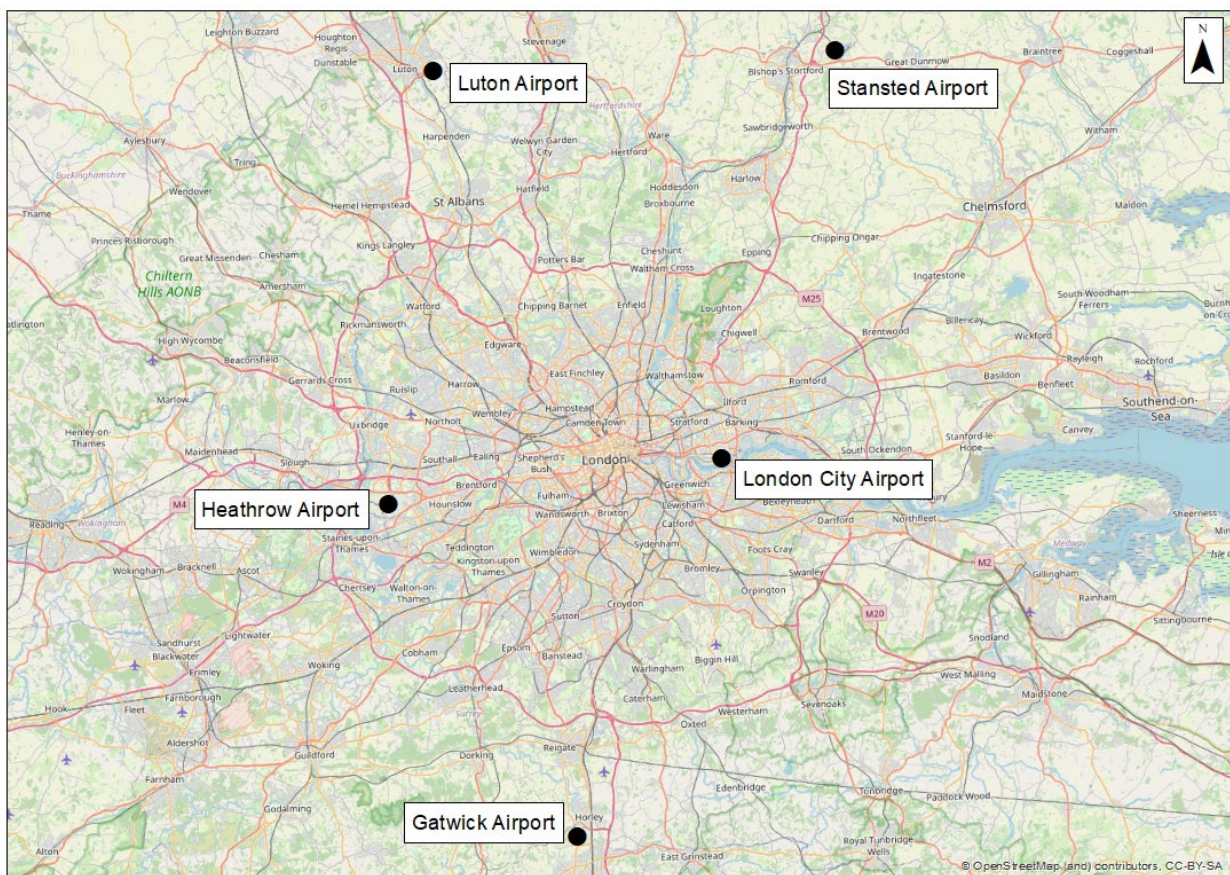
- a. **Chapter 2** describes the existing airport site and on-site transport facilities.
- b. **Chapter 3** provides the planning context.
- c. **Chapter 4** sets out the transport policy background.
- d. **Chapter 5** describes the existing transport network.
- e. **Chapter 6** sets out the existing passenger and staff travel demands associated with the airport.
- f. **Chapter 7** contains the accident analysis.
- g. **Chapter 8** details the development proposals and proposed highway mitigation.
- h. **Chapter 9** sets out the transport modelling methodology and the trip generation.
- i. **Chapter 10** contains the highway capacity assessments.
- j. **Chapter 11** considers the impacts on, and measures to improve sustainable transport access to the airport.
- k. **Chapter 12** outlines the Framework Travel Plan.
- l. **Chapter 13** provides details of construction and associated traffic.
- m. **Chapter 14** sets out the results of the scenario testing.
- n. **Chapter 15** covers residual impacts, further mitigation and monitoring.
- o. **Chapter 16** provides the summary and conclusions.

2 THE SITE

2.1 Site location

2.1.1 London Luton Airport, the Application Site (the airport), is one of five main airports which serve the Greater London and southeast region. The airport is located approximately 45 kilometres (km) northwest of London, to the east of Luton town centre and encompasses approximately 427 hectares (ha). The airport is approximately 42 km from Stansted Airport; 45 km from Heathrow Airport; 50 km from London City Airport and 82 km from Gatwick Airport as can be seen in **Figure 2.1**.

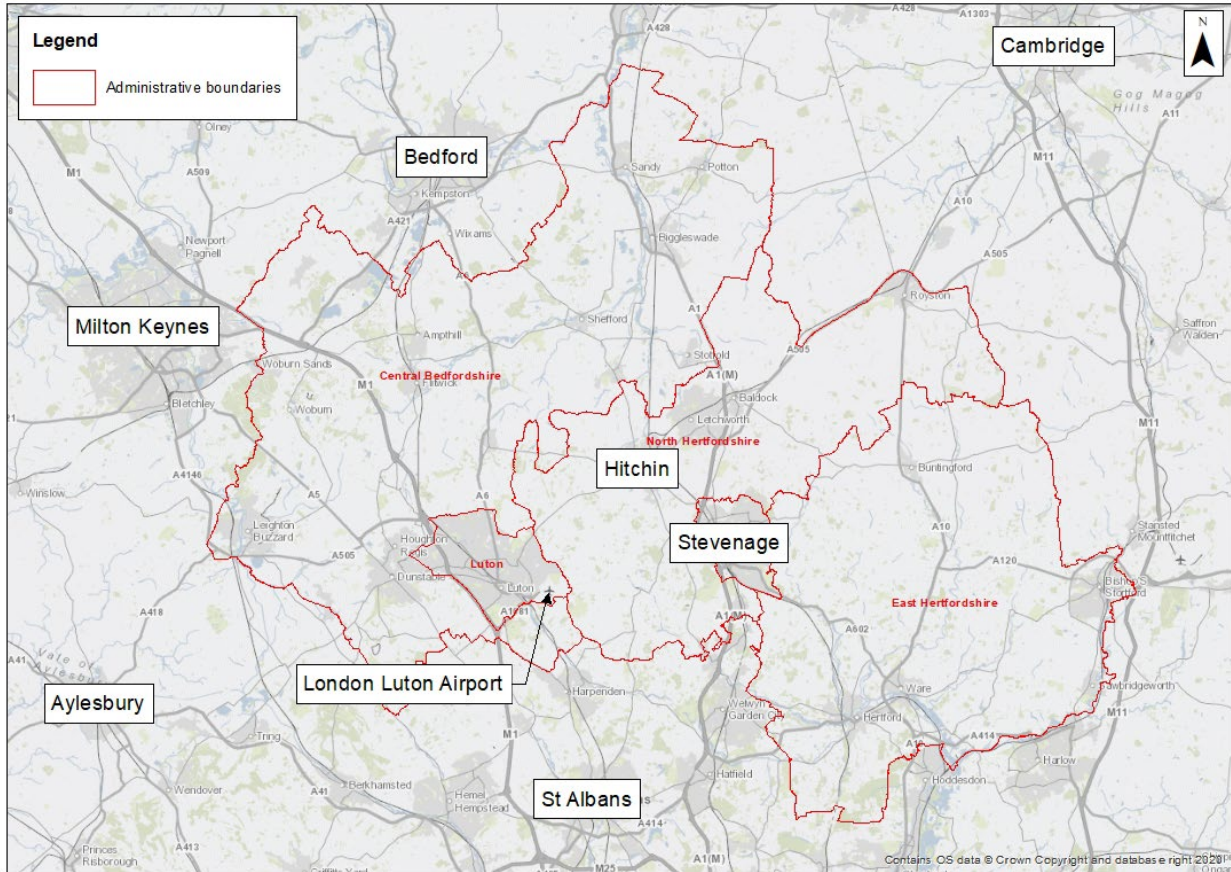
Figure 2.1: Airport locations



2.1.2 The airport is located on a raised platform at the northeastern end of the Chiltern Hills. The airport is located less than 2 km to the southeast of Luton town centre and within easy reach of several urban settlements including Bedford, Milton Keynes, Aylesbury, Hitchin, Stevenage and St Albans. The airport is situated at the heart of an internationally focussed region, as has clearly been recognised by the establishment of the Oxford-Cambridge Arc. The Arc is recognised as a globally significant area encompassing Oxford, Milton Keynes and Cambridge, with a few very significant international businesses. Further details are provided in **Chapter 3** of the **Need Case [TR020001/APP/7.04]**. The site in the context of the surrounding areas is shown in **Figure 2.2**. Immediately to the south of the

existing airport is Central Bedfordshire. The administrative boundaries of North Hertfordshire and Central Bedfordshire also mark the boundary of the Green Belt.

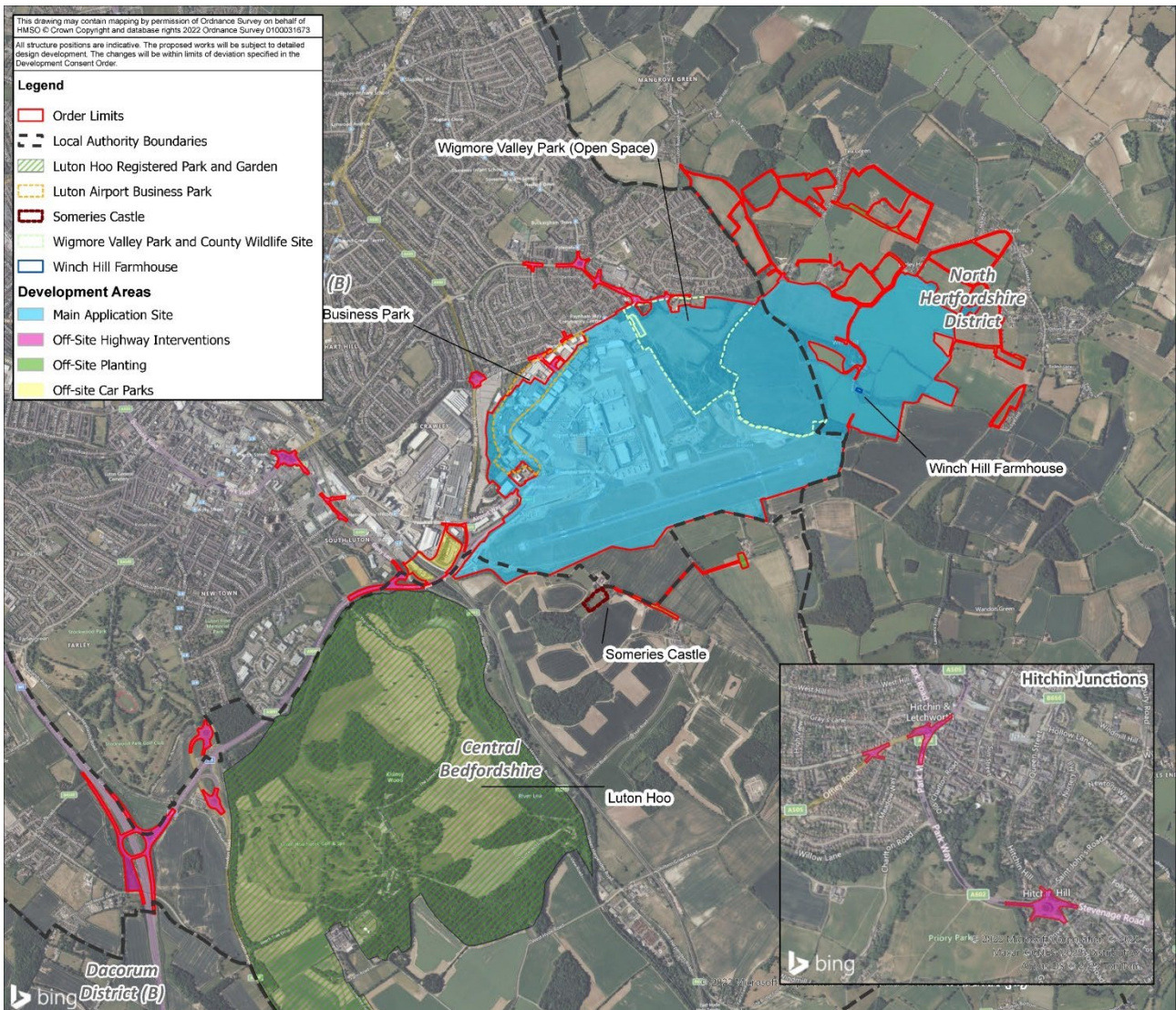
Figure 2.2: Airport surroundings



2.2 The Application Site

2.2.1 The Main Application Site includes the existing airport, the existing business park to the north and northwest of the airport, Wigmore Valley Park and arable land to the east. The Main Application Site boundary extends across LBC and North Hertfordshire District Council administrative boundaries, as can be seen in **Figure 2.3**.

Figure 2.3: Airport application site



2.2.2 Wigmore Valley Park, located to the east of the existing airport, provides an area of public open space and recreational facilities. It comprises an area of former landfill which was operational between 1937 and 1978. The park is also designated as an Area of Local Landscape Value, an Asset of Community Value and parts of the park are designated as a County Wildlife Site (CWS).

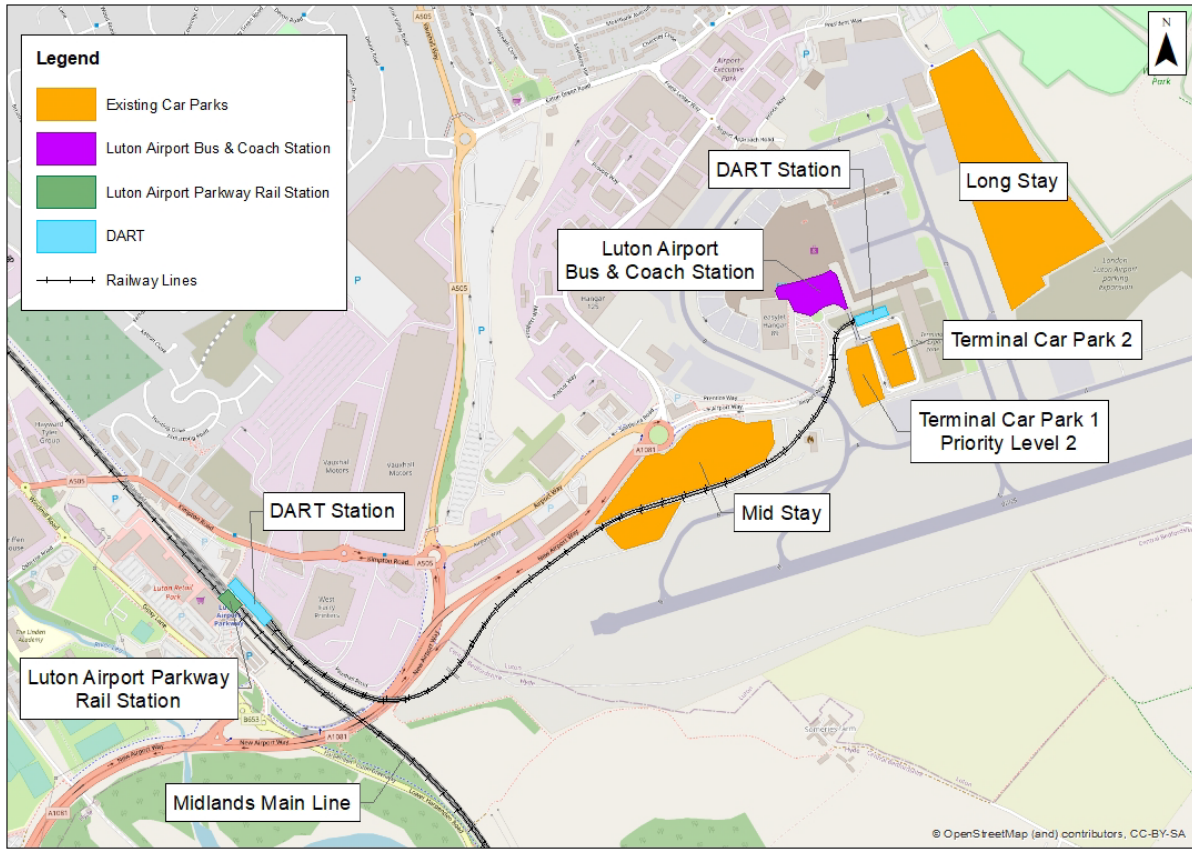
2.2.3 New Century Park (NCP) (now known as Green Horizons Park (GHP) is also located to the east of the airport. GHP is a planned high quality mixed-use business park which includes the construction of a new access road (referred to in the GHP planning application (LBC ref: 17/02300/EIA) as Century Park Access Road (CPAR)) connected to Airport Way to the west of the airport. The planning permission also included improvements to Wigmore Valley Park which would have refurbished and extended the Wigmore Valley Park Pavilion building.

- 2.2.4 It should be noted that the Proposed Development supersedes much of the development consented for GHP and this is described in the full project description, as provided in **Chapter 4** of the **ES [TR020001/APP/5.01]**.
- 2.2.5 The Application Site is bordered by Darley Road to the north and intersected by Winch Hill Lane, a rural road running through the area of Winch Hill in the east of the airport. There is a network of Public Rights of Way (PRoW) in this area including the Chiltern Way which follows approximately the alignment of Darley Road.
- 2.2.6 Land outside the airport boundary to the north and west is predominantly residential and mixed industrial, and rural with arable fields to the east and south.

2.3 Existing airport infrastructure

- 2.3.1 The existing airport infrastructure consists of a single runway with associated taxiways, stands and aprons. It has a single commercial passenger terminal and three business aviation terminals, with supporting hangars, maintenance facilities, a cargo facility and airport related offices. The airport and its associated business park also accommodate a range of aircraft and airport production and maintenance businesses. There are also several car parks for short, mid and long stay.
- 2.3.2 Local buses connect the existing airport with Luton town centre. Conventional bus and coach services also operate, connecting the airport with local towns and cities. Luton Airport Parkway station is serviced by both the East Midlands service as well as the extensive Thameslink service, connecting Luton Airport Parkway station with London and other major towns and cities. A shuttle bus currently operates between Luton Airport Parkway station and the existing passenger terminal. The recently constructed Luton DART, a new cable-hauled fast passenger transit will provide a direct rail connection between Luton Airport Parkway station and the airport - the announcement of an official opening date will be made in early 2023. The site infrastructure is shown in **Figure 2.4**.

Figure 2.4: Existing central terminal area and parking locations



3 PLANNING CONTEXT

3.1.1 The airport opened in 1938 and has undergone significant growth and development since that time. The following sections summarise the latest planning permission which permitted growth to 18 mppa and the airport operator's planning application to vary this permission to grow to 19 mppa. A detailed planning history can be found in the **Planning Statement [TR020001/APP/7.01]**.

3.2 Project Curium

3.2.1 Project Curium involves extensions to the passenger terminal, construction of additional aircraft stands and new taxiways, improvements to transport links (including new car parking facilities and remodelling of the bus and coach interchange) to increase the capacity of the airport from 12 mppa to 18 mppa.

3.2.2 Planning permission was granted in 2014 for works to accommodate passenger capacity up to 18 mppa, by as early as 2021 (subject to demand) (LBC ref: 12/01400/FUL).

3.2.3 Works already completed include:

- a. extension of the Southern Apron for additional aircraft stands (to deliver additional commercial remote stands);
- b. reconfiguration of external areas for surface access improvements including works to the Drop Off Zone (DOZ);
- c. Taxiway Foxtrot and new aircraft de-icing facilities; and
- d. extension and reconfiguration of the passenger terminal.

3.2.4 Works underway or remaining include:

- a. additional apron and taxiway works.

3.2.5 When Project Curium is complete, the Proposed Development would tie into the final apron and taxiway works.

3.2.6 As a result of this development, there would be an expected increase in the passenger carrying capacity of the airport over a period up to 2028 to 18 mppa, requiring 156,840 annual aircraft movements (in 2011 the airport handled 9.5 mppa with annual aircraft movements amounting to 99,299). Therefore, on 25 June 2015, LLAOL, the current operator of the airport, submitted an application (LBC ref. 15/00950/VARCON) to vary section (i) of Condition 11 (Noise violation limits) of permission LBC ref. 12/01400/FUL. This was subsequently permitted on 13 October 2017.

3.2.7 The Covid-19 pandemic has had a severe impact on the UK economy, and this was also reflected in a significant reduction in global air travel during 2020 and through 2021. Passenger numbers at the airport fell substantially as a result of the pandemic to 5.6 mppa in 2020 and 4.7 mppa in 2021. Despite the impact of the Covid-19 pandemic and the temporary travel restrictions imposed by the government, it is anticipated that the airport will recover, with passenger numbers rising back to the limit of the 2012 planning approval (18 mppa) by 2024.

3.3 Application to accommodate 19 mppa

- 3.3.1 LLAOL, the current operator of the airport, has submitted an application (LBC ref: 21/00031/VARCON) to Luton Borough Council (LBC), the Local Planning Authority (LPA), for a variation of Conditions 8 (passenger throughput cap), 10 (noise contours), 22 (car parking management), 24 (travel plan) and 28 (approved plans and documents) to Planning Permission 15/00950/VARCON (dated 13th October 2017) to accommodate 19 mppa and to amend the day and night noise contours currently consented.
- 3.3.2 There are no physical or infrastructure changes associated with these proposed variations that would seek to change the external appearance, height, scale, mass, or layout of elements associated with the 2014 Planning Permission.
- 3.3.3 On 1 December 2021, LBC resolved to grant permission for the current airport operator (LLAOL) to grow the airport up to 19 mppa, from its previous permitted cap of 18 mppa. The application was subsequently called-in and referred to the SoS for determination instead of being dealt with by the LPA. The inquiry to consider the called-in application opened on Tuesday 27 September 2022 and ran until Friday 18 November 2022. At the time of submission of the application for development consent, the outcome of the inquiry is still unknown.

4 TRANSPORT POLICY BACKGROUND

4.1.1 The following section represents the national transport policies and the regional transport policies relevant to the airport and the Proposed Development.

4.2 National Planning Policy Framework 2021 (Ref 4.4)

4.2.1 The National Planning Policy Framework (NPPF) sets out the government's planning policies for England and how these should be applied.

4.2.2 Transport issues should be considered from the earliest stages of plan-making and development proposals, so that (NPPF, para 104):

(a) the potential impacts of development on transport networks can be addressed;

(b) opportunities from existing or proposed transport infrastructure, and changing transport technology and usage, are realised – for example in relation to the scale, location or density of development that can be accommodated;

(c) opportunities to promote walking, cycling and public transport use are identified and pursued; and

(d) the environmental impacts of traffic and transport infrastructure can be identified, assessed and considered – including appropriate opportunities for avoiding and mitigating any adverse effects, and for net environmental gains; and

(e) patterns of movement, streets, parking and other transport considerations are integral to the design of schemes and contribute to making high quality places.

4.2.3 Surface transport considerations have been a fundamental consideration in the planning for the potential growth of the airport. The **SAS [TR020001/APP/7.12]** accompanying this application for development consent aims to deliver a significantly greater proportion of air passengers travelling to and from the airport by public transport. The investment in the Luton DART link between Luton Airport Parkway station and the existing Central Terminal Area will result in a much more convenient connection between the station and the terminal building, which in turn will encourage a greater proportion of air passengers to take advantage of the rail services. The Luton DART would also be extended to serve the second terminal.

4.2.4 Highway interventions have been identified in conjunction with the local highway authorities in order to provide mitigation for the increased volumes of traffic on roads in the locality of the airport and the corridor to the M1.

4.3 Planning Practice Guidance (Ref 4.5)

4.3.1 The Planning Practice Guidance (PPG) is an on-line guidance resource to use alongside the NPPF. It includes a section on 'Travel plans, transport assessments and statements in decision making' and provides advice on when transport assessments and transport statements are required, and what they should contain. The PPG includes the following descriptions on what Transport Assessments and Transport Statements are and why they are important.

“Transport Assessments and Statements are used to assess the potential transport impacts of developments (and they may propose mitigation measures to promote sustainable development. Where that mitigation relates to matters that can be addressed by management measures, the mitigation may inform the preparation of Travel Plans).

Transport Assessments are thorough assessments of the transport implications of development, and Transport Statements are a ‘lighter touch’ evaluation to be used where this would be more proportionate to the potential impact of the development (i.e., in the case of developments with anticipated limited transport impacts).

Where the transport impacts of development are not significant, it may be that no Transport Assessment or Statement or Travel Plan is required. Local planning authorities, developers, relevant transport authorities, and neighbourhood planning organisations should agree what evaluation is needed in each instance.”

- 4.3.2 This Transport Assessment will address the transport implications of the Proposed Development and promote relevant mitigation measures and sustainable opportunities.

4.4 Transport Decarbonisation Plan (Ref 4.6)

- 4.4.1 The Government’s Transport Decarbonisation Plan builds on the “Decarbonising Transport: Setting the Challenge (Ref 4.7)” report, published in March 2020, which brought together existing work to reduce emissions across all forms of transport, and for the first time laid out the scale of the additional reductions needed to deliver transport’s contribution to legally binding carbon budgets and delivering net zero by 2050.
- 4.4.2 The Transport Decarbonisation Plan sets out how those emission reductions will be delivered and the associated benefits that will be realised from it across the UK.
- 4.4.3 The plan considers Green House Gas (GHG) emissions produced from use of the UK’s transport system – which are aligned with statistics on transport GHG emissions by source category. Modelling of future emissions is on this basis (excluding military aviation and shipping). Low carbon fuel emissions are generally reported as zero emission (except where there are fossil elements) in line with carbon budget accounting rules.
- 4.4.4 GHG emissions from associated infrastructure, such as stations, ports and airports are not included in modelling, but are covered in the relevant sections of the document. Emissions associated with transport construction are out of scope of this document but are considered in **Chapter 12** of the ES **[TR020001/APP/5.01]**. GHG emissions associated with power generation and distribution for transport are considered in the Energy White Paper (Ref 4.8).
- 4.4.5 The Government’s detailed plans to enhance resilience to climate change risks across road, rail, ports, and aviation are contained in the UK’s National Adaptation Programme (Ref 4.9). The transport sector is well represented in the organisations reporting under the Adaptation Reporting Power, established under

the Climate Change Act 2008. Under this power, key organisations report on the steps they are taking to prepare for climate change, and the current list includes strategic airport operators, harbour authorities and road and rail organisations.

- 4.4.6 Whilst aviation decarbonisation is a global challenge, the Applicant would look to reduce carbon emissions through the promotion of public transport and strengthening these services to the airport to reduce reliance on the private car. This will apply to both passengers and workforce.

4.5 Aviation Policy Framework 2013 (Ref 4.10)

- 4.5.1 The Aviation Policy Framework 2013 (APF) sets out the requirement that all proposals for airport development should demonstrate how an airport will:

- a. “ensure easy and reliable access for passengers;
- b. increase the use of public transport by passengers to access the airport; and
- c. minimise congestion and other local impacts.”

- 4.5.2 Two of the key references within the Aviation Policy Framework relate to Airport Transport Forums and Airport Surface Access Strategies. These outline the following.

- 4.5.3 Airport Transport Forums:

“All airports in England and Wales with more than 1,000 passenger air transport movements a year are currently advised to set up air transport forums (ATFs). This concept was introduced in the previous administration’s white paper A New Deal for Transport: Better for Everyone 101 and reiterated in the 2003 Air Transport White Paper. The primary role of the forums is to serve local communities through:

- a. Identifying short- and long-term targets for increasing the proportion of journeys made to airports by public transport;*
- b. Devising a strategy for meeting these targets; and*
- c. Overseeing implementation of the strategy.*

The Government recognises the value of a continued partnership approach on surface access between airport operators, LEPs, local authorities, businesses, transport stakeholders and local communities. Airports may wish to retain the functions of ATFs but should take the opportunity to review their membership and any opportunities for streamlining the work of ATFs with ACCs (notwithstanding the statutory obligations of ACCs) to ensure that forums are fully able to represent the needs of passengers, local employees and residents and freight.”

- 4.5.4 Airport Surface Access Strategies:

“Government attaches a high priority to effective public involvement in local transport policy. Local people, town and parish councils which have qualifying airports within their boundaries, business representatives, health and education providers, environmental and community groups should be involved in the

development of airport surface access strategies. We recommend that ATFs produce airport surface access strategies (ASASs) to set out:

- a. targets for increasing the proportion of journeys made to the airport by public transport for both airport workers and passengers;*
- b. the strategy to achieve those targets; and*
- c. a system whereby the forum can oversee implementation of the strategy.”*

4.5.5 The document also states that the general position for existing airports is that developers should pay the costs of upgrading or enhancing road, rail or other transport networks or services where there is a need to cope with additional passengers travelling to and from expanded or growing airports.

4.5.6 The highway and public transport networks, both existing and future with committed improvements are described in Chapters 5 and 9. This demonstrates the quality of the access from the airport to the motorway network and the recent improvements to rail services that have been introduced alongside the recently constructed Luton DART which will provide a very convenient service for air passengers and staff working at the airport and associated offices.

4.5.7 The targets for the increase in use of public transport are set out in Chapter 9. An **FTP [TR020001/APP/7.13]** (which sets out how five-yearly Travel Plans will be developed, and which will in future take the form the Airport Surface Access Strategy), has been prepared and tested through a series of workshops attended by representatives of National Highways, LBC, Central Bedfordshire Council (CBC), and Hertfordshire County Council (HCC) and will support the achievement of those targets. The FTP provides an outline of the comprehensive monitoring process, and the expansion of the airport will be subject to the **Green Controlled Growth Framework [TR020001/APP/7.09]**.

4.5.8 The traffic models described in Chapter 9 demonstrate that the Highway Interventions that have been proposed minimise congestion and other local impacts.

4.5.9 The Highway Interventions referred to above form part of the Proposed Development and as such will be funded by the Applicant.

4.6 Airports National Policy Statement (Ref 4.11)

4.6.1 The Airports National Policy Statement: new runway capacity and infrastructure at airports in the Southeast of England (June 2018) sets out the Government’s policy on the need for new airport capacity in the Southeast of England along with the preferred location and scheme to deliver new capacity and the particular considerations relevant to a development consent application to which the statement relates. The policy statement outlines Heathrow Airport as the preferred location for a new runway. However, Paragraph 1.6 outlines:

“The Airports Commission’s remit also required it to look at how to make best use of existing airport infrastructure, before new capacity becomes operational. The Commission noted in its final report that a new runway will not open for at least 10 years. It therefore considered it imperative that the UK continues to grow its

domestic and international connectivity in this period, which it considered would require the more intensive use of existing airports other than Heathrow and Gatwick.”

4.6.2 Paragraph 1.39 sets out the following:

“On 21 July 2017, the Government issued a call for evidence on a new Aviation Strategy. Having analysed the responses, the Government has confirmed that it is supportive of airports beyond Heathrow making best use of their existing runways. However, we recognise that the development of airports can have positive and negative impacts, including on noise levels. We consider that any proposals should be judged on their individual merits by the relevant planning authority, taking careful account of all relevant considerations, particularly economic and environmental impacts.”

4.6.3 This is further supported by Paragraph 1.42 as follows:

“As indicated in paragraph 1.39 above, airports wishing to make more intensive use of existing runways will still need to apply for planning permission or development consent to the relevant authority, which should be judged on the application’s individual merits. However, in light of the findings of the Airports Commission on the need for more intensive use of existing infrastructure as described at paragraph 1.6 above, the Government accepts that it may well be possible for existing airports to demonstrate sufficient need for their proposals, additional to (or different from) the need which is met by the provision of a Northwest Runway at Heathrow. As indicated in paragraph 1.39 above, the Government’s policy on this issue will continue to be considered in the context of developing a new Aviation Strategy.”

4.6.4 The Proposed Development supports the best use of existing infrastructure to allow the UK to continue its growth before new capacity becomes operational.

4.7 Beyond the horizon – The future of UK aviation: Making best use of existing runways (Ref 4.12)

4.7.1 The Making best use of existing runways (June 2018) policy statement outlines that the:

“Government is supportive of airports beyond Heathrow making best use of their runways providing the proposals are judged by the relevant planning authority, take careful account of all relevant considerations, particularly economic and environmental impacts and proposed mitigations”.

4.7.2 However, for increases greater than 10 mppa, the policy states that:

“Applications to increase caps by 10mppa or more or deemed nationally significant would be considered as Nationally Significant Infrastructure Projects (NSIPs) under the Planning Act 2008 and as such would be considered on a case-by-case basis by the Secretary of State.”

4.7.3 The Proposed Development will look to make the best use of the existing runway.

4.8 Aviation 2050 – the future of UK aviation (Ref 4.13)

4.8.1 Aviation 2050 – the future of UK aviation was a consultation which ran from December 2018 to June 2019 with the aim to seek views on the Government’s long-term vision for aviation to 2050. The strategy sets out the challenges and opportunities for aviation to 2050 and beyond and emphasises the significance of aviation to the UK economy and regional growth.

4.8.2 The Aviation 2050 strategy focuses on:

- a. Build a global and connected Britain;
- b. Ensure aviation can grow sustainably;
- c. Support regional growth and connectivity;
- d. Enhance the passenger experience;
- e. Ensure a safe and secure way to travel;
- f. Support general aviation; and
- g. Encourage innovation and new technology.

4.8.3 Given the unprecedented challenges that the aviation sector has faced as a result of the Covid-19 pandemic, the Government decided not to publish a further formal response to the remaining parts of the consultation. However, the Proposed Development supports several the focus points of the strategy.

4.9 Flightpath to the Future (Ref 4.14)

4.9.1 In May 2022, the Government published “*Flightpath to the future*”, which is a strategic framework that establishes the ambitions and commitments for aviation over the next 10 years. It outlines a ten-point plan for the future of UK aviation which covers:

“Enhancing global impact for a sustainable recovery

Recover, learn lessons from the pandemic and sustainably grow the sector;

Enhance the UK’s global aviation impact and leadership; and

Support growth in airport capacity where it is justified, ensuring that capacity is used in a way that delivers for the UK.

Embracing innovation for a sustainable future

Put the sector on course to achieve Jet Zero by 2050; and

Capture the potential of new technology and its uses.

Realising benefits for the UK

Unlock local benefits and level up;

Unleash the potential of the next generation of aviation professionals; and

Make the UK the best place in the world for General Aviation.

Delivering for users

Improve the consumer experience; and

Retain our world-leading record on security and safety with a world-leading regulator.”

4.9.2 The Proposed Development would support a number of the aims outlined above including realising the benefits for the UK and delivering for users.

4.10 Jet Zero Strategy – Delivering net zero aviation by 2050 (Ref 4.15)

4.10.1 The Jet Zero Strategy sets out how the Government propose the aviation industry will reach net zero emissions by 2050 with domestic flights by 2040. The strategy indicates that this can be reached without the Government needing to intervene directly to limit aviation growth, with the associated knock-on economic and social benefits. Sections 3.60 to 3.63 outlines how surface access should be improved through the development of master plans and surface access strategies which encourage travel to and from the airport via sustainable modes to minimise congestion, emissions and other local impacts. The Proposed Development looks to improve sustainable modes to the airport in the quest to reach net zero.

4.11 National Highways – RIS2 (Ref 4.16)

4.11.1 The Road Investment Strategy 2 (RIS2) sets out the five-year strategy for investment and management of the Strategic Road Network (SRN) from April 2020 to March 2025. The paper sets out:

- a. “the strategic vision, a long-term vision for what the strategic road network should look like in 2050, and the steps to help realise this;
- b. the performance specification setting out the expectations for National Highways and the SRN, including metrics and indicators measuring the performance of both National Highways and the network against outcomes;
- c. the investment plan of how money will be invested in operations, maintenance, renewals and enhancements of the road areas affected; and
- d. a statement of funds confirming that £27.4 billion will be provided over the period to National Highways to do this work.”

4.11.2 The airport lies within the east region where several schemes are identified, however, none of these directly impacts on the airport.

4.12 National Policy Statement for National Networks 2014 (Ref 4.17)

4.12.1 This document sets out the need for, and Government’s policies to deliver, development of nationally significant infrastructure projects (NSIPs) on the national road and rail networks in England. It provides planning guidance for promoters of nationally significant infrastructure projects on the road and rail networks.

- 4.12.2 Paragraphs 5.203 to 5.205 of the document outline the general approach that should be taken when undertaking an assessment. The Applicant should have regard to the policies set out in local plans and also consult the relevant highway authority, and local planning authority, as appropriate, on the assessment of transport impacts.
- 4.12.3 Furthermore, applicants should consider reasonable opportunities to support other transport modes in developing infrastructure.
- 4.12.4 There are no elements of the Proposed Development that would be classified as a NSIP on the national road or rail network. However, the National Policy Statement for National Networks remains a relevant consideration as works are proposed on the SRN at Junction 10 as part of the Proposed Development.
- 4.12.5 Measures are to be introduced to increase the attractiveness of public transport as a means of travel to and from the airport and to increase the modal share of public transport as described in Chapter 11.

4.13 Department for Transport Circular 02/2013 (Ref 4.18)

- 4.13.1 This document sets out the way in which National Highways (formerly the Highways Agency when the document was published) engages with communities and the development industry to deliver sustainable development, whilst safeguarding the primary function and purpose of the SRN.
- 4.13.2 The overall forecast demand should be compared with the ability of the existing network to accommodate traffic over a period up to ten years after the date of registration of a planning application or the end of the relevant Local Plan whichever is the greater.
- 4.13.3 National Highways expects the promoters of development to put forward initiatives that manage down the traffic impact of proposals to support the promotion of sustainable transport and the development of accessible sites.
- 4.13.4 The preparation and implementation of a robust TP that promotes use of sustainable transport modes such as walking, cycling and public transport is an effective means of managing the impact of development on the road network, and reducing the need for major transport infrastructure.
- 4.13.5 Developers must ensure all environmental implications associated with their proposals, are adequately assessed and reported so as to ensure that the mitigation of any impact is compliant with prevailing policies and standards.
- 4.13.6 The CBLTM-LTN and Vissim model (see Chapter 10) compares the forecast demand with the ability of the road network to accommodate traffic over a period of 20 years from the submission of the application for the development consent. This is considerably more than is required in the Department for Transport Circular. Highway interventions that are included in the modelled highway network for the assessment phases of 2027, 2039 and 2043 are summarised in Chapter 10.
- 4.13.7 Physical measures such as the extension of the Luton DART to serve T2, additional coach and bus bays, and restricted growth in the provision of car

parking spaces will be supported by a Travel Plan, the process for preparing which is described in the **FTP [TR020001/APP/7.13]**.

4.13.8 The application for development consent is supported by an **ES [TR020001/APP/5.01]**.

4.14 Luton Borough Council Local Plan 2011-2031 (adopted November 2017) (Ref 4.19)

4.14.1 The current Local Plan includes two policies related to the airport. Policy LLP6 - London Luton Airport Strategic Allocation states in Clause D (in relation to access to Century Park):

“Details of the proposed access, which shall be via the extension of New Airport Way (which connects the airport to M1 J10A) and shall link Percival Way through to Century, such access shall be designed so as to ensure that no use is made of Eaton Green Road to provide access to Century Park or the Airport, except for public transport, cyclists, pedestrians and in case of emergency.”

4.14.2 ‘Policy LLP31 – Sustainable Transport Strategy’. This policy includes as section D an element that relates directly to transport issues associated with the airport. The relevant text is:

“D. Support for the continued economic success of London Luton Airport as a transport hub (policy LLP6) will be delivered through:

- *measures to ensure there is capacity at strategically important junctions; and*
- *continued enhancement of sustainable modes of transport via the Airport Surface Access Strategy.”*

4.14.3 The transport modelling that has been undertaken together with intensive liaison with the relevant highway authorities has identified those junctions that require improvements.

4.14.4 The ASAS referred to in this policy is a document produced by LLAOL, the operator of the airport. The version of the document that was current at the time of the adoption of the Local Plan was “Airport Surface Access Strategy 2012-2017 (Ref 4.20)”. This has since been superseded by “Airport Surface Access Strategy 2018-2022 (Ref 4.21)” and most recently “Airport Surface Access Strategy 2018-2022, 2019 reissue”.

4.14.5 The first ASAS referred to above had an Objective 1- *“to increase the proportion of their passengers travelling to and from London Luton airport by public transport to more than 40% by 2017”*. The 2018 ASAS set out several targets, one of which was to increase passenger travel by bus and coach from 16% to 17% and another was to increase passenger travel by rail from 16 to 24%. The base levels referred to in the targets were the mode shares identified in the 2016 CAA passenger survey.

4.14.6 The application for development consent promotes a target of 45% of air passengers travelling to and from the airport by public transport by 2043 which is consistent with this policy.

4.15 Luton Borough Council Local Transport Plan 2011 – 2026 (Ref 4.22)

4.15.1 The Local Transport Plan (LTP3) was published in March 2011 with the following transport vision for 2026:

“To make Luton a safer and healthier place in which to live, work, learn and have fun, we will provide an integrated, safe, accessible and more sustainable transport system which supports the economic regeneration and prosperity of the conurbation and the planned growth of the area whilst reducing unnecessary car use and CO2 emissions, enhances the environment and generally improves the health and quality of life of the community.”

4.15.2 The main basis of the LTP3 has been influenced by wider local priorities, which show how transport will play a role in their achievement. In particular, it outlines that transport can:

- a. *“Support economic growth by improving transport connections and journey reliability, making Luton more attractive for businesses;*
- b. *Protect the environment by promoting less environmentally damaging ways of travelling;*
- c. *Help make communities safer by reducing the number and severity of road traffic casualties;*
- d. *Promote health by enabling people to walk or cycle more, and by reducing air pollution; and*
- e. *Support vulnerable people and reduce inequalities by improving and ensuring equitable access to key services.”*

4.15.3 The plan also references the 2008 Interim Airport Surface Access Strategy which encourages travel to the airport via public transport along with the aim to:

“Support Luton’s growth as an international gateway in the context of both the growth of London Luton Airport and ease of access to the new Channel Tunnel Rail Link terminus at St Pancras.”

4.15.4 The Proposed Development supports the plan through the growth of the airport and through the modal shift targets for public transport.

4.16 Hertfordshire Local Transport Plan (2018-2031) (Ref 4.23)

4.16.1 Hertfordshire’s Local Transport Plan 2018-2031 (HLTP) was adopted in May 2018.

- 4.16.2 There is recognition that the airport generates traffic movements on the County's roads and also that HCC will work with others to seek to improve public transport connections to the airport.
- 4.16.3 The HLTP considers areas around Hertfordshire that have their own growth strategies which will provide employment and business opportunities for Hertfordshire and drive travel demand; one of these is the airport.
- 4.16.4 The HLTP notes that passenger flows for the airport are particularly heavy on the M1 and Midland Mainline railway. Other key routes that lie within the county are identified as the A1081, A505, A602, and B653.
- 4.16.5 By reference to data published by the CAA, HCC observes that Stansted Airport is already successful in attracting trips by sustainable modes with 51% using alternatives to the car, in contrast London Luton Airport has around 30% using non-car modes and increasing this level is a key priority for them. The HLTP includes Policy 11: Airports, where the relevant text states:
- “The county council, working in partnership with neighbouring local authorities and airport operators, will seek improvements to surface access to Luton and Stansted Airports, and promote and where possible facilitate a modal shift of both airport passengers and staff towards sustainable modes of transport. The county council is opposed to new runway development at Luton and Stansted Airports.”*
- 4.16.6 The airport lies within two identified strategic transport corridors, London – Watford – Luton – Milton Keynes and Luton – Stevenage. Regarding the first corridor HLTP notes that the airport generates significant travel demand and that it will work with LBC and airport operators on improving surface access to the airport, and National Highways to ensure effective operation of the M1. For the second corridor the HLTP notes that the primary connections within this strategic movement corridor are the A505 and A602. These routes provide the strategic link between Luton, the airport, the A1(M) and Stevenage, as well as serving the towns of Hitchin, Letchworth and Baldock. In addition to traffic associated with these towns, the airport generates a significant amount of traffic on the corridor. It is noted that there are a number of lower category routes parallel to the A505/A602 that some traffic uses to avoid congestion at Luton or Hitchin. To review the potential use of the lower category routes, these roads were included in the CBLTM-LTN.
- 4.16.7 HCC has been one of the main stakeholders engaged during the preparation of the surface access documentation supporting the application for development consent.
- 4.17 Central Bedfordshire Council Local Transport Plan 3 2011-2026 (Ref 4.24)**
- 4.17.1 The Central Bedfordshire Council (CBC) Local Transport Plan 3 was adopted in April 2011 and covers from then until March 2026.
- 4.17.2 The vision of the plan focusses on:

“Globally connected, delivering sustainable growth to ensure a green, prosperous and ambitious place for the benefit of all by creating an integrated transport system that is safe, sustainable and accessible.”

4.17.3 LBC are a partner in the LTP and look to:

“Work together to improve access to our employment areas and improve safety and standards of living for our residents.”

4.18 Buckinghamshire Council Local Transport Plan 2016-2036 (Ref 4.25)

4.18.1 The Buckinghamshire Council LTP 4 was adopted in 2016 and covers from then until 2036.

4.18.2 The vision of the plan focusses on:

“Making Buckinghamshire a great place to live and work, maintaining and enhancing its special environment, helping its people and businesses thrive and grow to give us one of the strongest and most productive economies in the country.”

4.18.3 Policy 2 and Policy 6 of the plan are relevant with Policy 2 stating:

“We will work to improve the connectivity and reliability of Buckinghamshire’s transport network, stimulate economic growth and promote safer more sustainable travel.”

and Policy 6 stating:

“We will work with partners to improve connections with key airports, to maximise the potential for growth whilst protecting the county’s unique environment. We will work with partners to ensure the views of Buckinghamshire’s residents are represented: so aviation works for Buckinghamshire.”

4.18.4 Themes are identified in LTP4 to ensure Buckinghamshire is well connected with the airport through:

“Working with neighbouring local authorities and infrastructure providers to develop reliable and efficient connections to these major national and international gateways;

Working with train and coach operators to provide efficient access to these major destinations; and

Working with partners to help to manage congestion on key roads, such as A413, A4010, A355, M25 and M40.”

4.19 South East Midlands Local Enterprise Partnership (SEMLEP) Strategic Economic Plan (Ref 4.26)

4.19.1 The South East Midlands’ Strategic Economic Plan (November 2017) sets out strategic investments and future actions needed to grow the local economy to its full potential for the future prosperity of all of the communities within the SEMLEP

area. It details seven priorities to create the right conditions for growth, set out across three core themes: growing business, growing people and growing places. The priorities are as follows:

- a. “Growing business:
 - i. To use our strengths in High Performance Technology, including Next Generation Transport, to deliver commercialisation of innovation, driving growth within the Cambridge-Milton Keynes-Oxford Growth Corridor.
 - ii. To deliver increased levels of private sector investment, including Foreign Direct Investment into the area, and grow jobs by 10% by 2025.
 - iii. To deliver greater trading activity between companies in our area and elsewhere, with a special emphasis on emerging global markets, but also working to retain good European links.
- b. Growing people:
 - i. To deliver an integrated and employer-led approach to skills attainment to ensure that our population is aware of, and has the attributes and competencies required for, a modern, competitive economy. This will comprise all pathways including delivery of 170,000 apprenticeships in the decade to 2025/26 and opportunities for up-skilling, re-skilling and re-engagement.
- c. Growing places:
 - i. To deliver sufficient new homes – with 130,000 planned in the decade to 2025/26 – to meet the needs of our growing population, with an emphasis on accelerating the completion of units with planning consent.
 - ii. To deliver the infrastructure needed to achieve our full growth potential, including East-West Rail and the Expressway, and much-improved Broadband and wireless connections.
- d. Cross – cutting:
 - i. To ensure that this growth is undertaken in a manner that promotes social inclusion, equality and environmental sustainability.”

4.19.2 The Proposed Development supports the aspirations of the economic plan through growing business, through strengthening links to Europe and global markets and growing people through employment opportunities.

4.20 England’s Economic Heartland Transport Strategy (Ref 4.27)

4.20.1 England’s Economic Heartlands Transport Strategy (February 2021) sets out a five-point action plan with a policy framework designed to harness the region’s inherent strengths in order to deliver a vision for the transport system. These are as follows:

- a. *“Focus on decarbonising our transport system by harnessing innovation and supporting solutions which in themselves create green economic opportunities.*

- b. *Promote investment in digital infrastructure as a means of improving connectivity.*
- c. *Use the delivery of strategic public transport schemes – such as East-West Rail, the Cambridgeshire Autonomous Metro and Milton Keynes Mass Rapid Transit – as the catalyst for a shift towards lower carbon modes of travel.*
- d. *Champion increased investment in active travel and shared transport to improve local connectivity to ensure that everyone can realise their potential.*
- e. *Continue to ensure the needs of the freight and logistics sector are met whilst lowering its environmental impact.”*

4.20.2 Policy 30 of the plan sets out how the airport will connect to global markets through working with infrastructure owners/operators, Network Rail, National Highways and Government to improve surface access by public transport to international airports in order to reduce the environmental footprint of their operations, with priority given to London Luton Airport with a focus on improving travel opportunities via services on the Midland Main Line, and ensuring the right level of service and capacity on the Luton DART.

4.20.3 The strategy actively encourages investment in improved, decarbonised surface access connectivity that addresses and reduces the environmental impact of international gateways, in particular: *“Luton Airport – located within the region, a focus for European services and a key hub for private business aviation services in Europe.”* Luton DART (the announcement of an official opening date will be made in early 2023) will improve connectivity between Luton Airport Parkway Station and the airport. Improving travel opportunities via national rail services stopping at Luton Airport Parkway is key to reducing the need to travel to the airport by private car.

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