HS2

High Speed Rail (West Midlands - Crewe)

Supplementary Environmental Statement 2 and Additional Provision 2 Environmental Statement

Volume 5: Technical appendices

Transport assessment addendum Part 1 (TR-001-000)

February 2019

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Department for Transport

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1 Introduction

1.1 Structure of this report

1.1.1 This report is Part 1 of the Transport Assessment (TA) Addendum, which forms part of Volume 5 of the Supplementary Environmental Statement 2 (SES2) and Additional Provision 2 Environmental Statement (AP2 ES). This addendum is formed of two Parts.

1.1.2 This addendum provides an update to the TA presented in the High Speed Two (HS2) Phase 2a (West Midlands – Crewe) Environmental Statement (ES)[1] published in July 2017 (the main ES) and the HS2 Phase 2a (West Midlands – Crewe) Supplementary Environmental Statement (SES1) and Additional Provision Environmental Statement (AP1 ES)[2] published in March 2018, as a result of the supplementary environmental information, changes and corrections included within SES2 and the amendments included within the AP2 ES.

1.1.3 This update should be read in conjunction with the following:

- the Transport Assessment in the main ES Volume 5: Appendix TR-001-000 (the main TA);
- the revised Transport Assessment in the SES1 and AP1 ES Volume 5: Appendix TR-001-000 (the AP1 revised scheme TA); and
- the Transport Assessment baseline survey data which is set out in Background Information and Data (BID) which accompanies the SES2 and AP2 ES (see BID TR-001-000)[3].

1.1.4 In order to differentiate between the original proposals assessed as part of the main ES and subsequent changes, the following terms are used:

- 'the original scheme' – the Bill scheme submitted to Parliament in July 2017, which was assessed in the main ES;
- 'the SES1 scheme' – the original scheme with the changes described in the SES1 submitted in March 2018;
- 'the AP1 revised scheme' – the SES1 scheme as amended by the Additional Provision 1 (AP1) submitted in March 2018;
- 'the SES2 scheme' – the SES1 scheme with the changes described in the SES2; and

[1] HS2 Ltd (2017), *High Speed Two (HS2) Phase 2a (West Midlands – Crewe), Environmental Statement*, https://www.gov.uk/government/collections/hs2-phase-2a-environmental-statement

[2] HS2 Ltd (2018), *High Speed Two (HS2) Phase 2a (West Midlands – Crewe), Supplementary Environmental Statement (SES1) and Additional Provision Environmental Statement(AP1 ES)*, https://www.gov.uk/government/collections/hs2-phase-2a-supplementary-environmental-statement-and-additional-provision-environmental-statement

[3] HS2 Ltd (2019), *High Speed Two (HS2) Phase 2a (West Midlands – Crewe), Supplementary Environmental Statement 2 (SES2) and Additional Provision 2 Environmental Statement (AP2 ES), Background Information and Data,* https://www.gov.uk/government/organisations/high-speed-two-limited

- 'the AP2 revised scheme' – the SES2 scheme as amended by the Additional Provision 2 (AP2).

1.1.5 This updated TA covers the following community areas (CA) as well as route-wide and off route assessment:

- CA1: Fradley to Colton;
- CA2: Colwich to Yarlet;
- CA3: Stone and Swynnerton;
- CA4: Whitmore Heath to Madeley; and
- CA5: South Cheshire.

1.1.6 In each community area the construction description and construction assessment sections of the original scheme and SES1 and AP1 schemes is replaced by the respective sections in this document, unless otherwise stated.

1.1.7 Maps referred to in the report are contained in the main ES and the SES2 and AP2 ES Volume 5, Traffic and transport Map Books, Map Series TR-03, TR-04 and TR-08.

1.1.8 The table numbers in this report reflect the table numbers of the main TA for ease of reference.

1.2 Scope of the assessment

1.2.1 The assessment methodology is described in Section 3 of the main TA. It should be noted that where text, tables or figures are not discussed, they are unchanged from the main TA. Where not specifically stated otherwise, all paragraph, table and figure references are references to the main TA.

1.2.2 In some community areas additional traffic survey data has been obtained. These have either been surveyed on behalf of HS2 Ltd or provided by the local highway authority. All additional traffic data used as part of the AP2 assessment has been surveyed in 2017 or 2018. It has been necessary to collect additional traffic data to assess either SES2 changes or AP2 amendments or to take account of recent changes to the highway network and to enable assessment of changes and corrections reported in SES2 and amendments reported in AP2 ES.

1.2.3 Where further junction modelling has been undertaken using new traffic survey data, the baseline year is 2018 as opposed to 2016 in the main TA. Future baseline years remain the same as in the original scheme i.e. 2023 for the construction assessment and 2027 and 2041 for the operational assessment. Background traffic growth has been adjusted, compared to the original scheme, to reflect the different baseline year.

1.2.4 Where necessary, traffic flows on links have been adjusted to a 2016 baseline as this data is used to inform the air quality and sound, noise and vibration assessments using a 2016 baseline year.

1.2.5 Where relevant, traffic associated with more recent committed development has been included in the future year baseline traffic conditions, the details of which are provided in the community area sections of this report.

1.3 Methodology, data sources, assumptions and limitations

1.3.1 The assessment scope, key assumptions and limitations are as set out in the Scope and Methodology Report[4] (SMR) and the SMR Addendum[5] of the main ES, unless otherwise stated. Full descriptions of changes and amendments included in the AP2 revised scheme are included in the relevant sections of Volume 2.

1.3.2 All changes to traffic from the main ES and from the AP1 revised scheme are taken into account, where appropriate. The main relevant traffic and transport changes are highlighted for each community area.

[4] HS2 Ltd (2017), *High Speed Two (HS2) Phase 2a (West Midlands – Crewe), Environmental Impact Assessment Scope and Methodology Report, Volume 5: Appendix CT-001-001*, https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/627187/E23_EIA_SMR_CT-001-001_WEB.pdf

[5] HS2 Ltd (2017), *High Speed Two (HS2) Phase 2a (West Midlands – Crewe), Scope and Methodology Report Addendum, Volume 5: Appendix CT-001-002*, https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/627188/E24A_CT-001-002_Part_1_WEB.pdf and https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/627189/E24-B_CT-001-002_Part_B_WEB.pdf

2 Fradley to Colton (CA1)

2.1 SES2 changes and AP2 amendments

2.1.1 The assessment includes all changes to construction traffic, including the movement of excavated material and changes to the construction programme. It includes measures to reduce the need to move material by the road network and the use of site haul routes to limit construction traffic on the road network.

2.1.2 The original scheme is described in Section 6 of the main TA and Sections 2 to 5 of the Volume 2, community area reports provide details of all the proposed changes and amendments. The following design changes and amendments make the greatest contribution to the assessment of changes in traffic flows in the Fradley to Colton area:

- changes to the movement of excavated material and to the construction programme;
- A new construction traffic route along Wood End Lane (SES2-001-001);
- Additional land and a change to Bill powers required to make alterations to the Handsacre Junction connection into the West Coast Main Line (AP2-001-001);
- Additional land required for modifications to A515 Lichfield Road and Wood End Lane junction and widening of Wood End Lane (AP2-001-002); and
- Additional land required for the provision of a replacement facility for Mayfield Children's Home (AP2-002-001).

2.1.3 There are a number of other design changes and amendments in the area which impact on construction traffic flows and these include:

- Local placement of surplus excavated material to the south of Pipe Ridware embankment (SES2-001-004);
- Local placement of surplus excavated material to the south-east of Newlands Lane auto-transformer feeder station (SES2-001-007);
- Local placement of surplus excavated material to the south of Moreton South embankment (SES2-001-008);
- Lowering of Kings Bromley viaduct, Bourne embankment and River Trent viaduct (SES2-001-003);
- amendments to utilities and new utility compounds as set out in Table 141 below;
- Additional land and a change to Bill powers for the revised alignment of site haul route and removal of HS2 maintenance access at Pipe Lane (AP2-001-011); and
- Additional land and a change in Bill powers required for a grid supply point connection to National Grid Parkgate substation (AP2-001-015).

2.1.4 The construction assessment also includes consideration of any impacts in the Fradley to Colton area that arise from construction of the AP2 revised scheme in the adjoining community areas.

2.2 Existing baseline

2.2.1 Baseline conditions are described in Section 5.3 of the main TA.

2.2.2 Supplementary traffic surveys were undertaken in June 2018 and September 2018. In addition, Staffordshire County Council (SCC) has provided further traffic data from surveys undertaken between January 2017 and June 2017 and in January 2018. The supplementary transport assessment baseline survey data is included BID TR-001-000 SES2 and AP2 ES.

2.2.3 The June 2018 surveys and the data supplied by SCC were undertaken at locations not previously surveyed but potentially now affected by the AP2 revised scheme or at locations where the highway network has been amended since the original scheme.

2.2.4 Additional junction modelling has been undertaken to assess traffic impacts at locations potentially affected by the AP2 revised scheme including new construction traffic routes along Wood End Lane and the A51. Following consultation with the local highway authority, Staffordshire County Council, the modelling assessment of additional junctions and the re-calibration of a number of junctions modelled in the main TA has been undertaken. This is reported in this TA Addendum.

Local road network

2.2.5 As part of the AP2 revised scheme, new construction traffic routes will be introduced. These relate to alternative construction routes discussed with the local highway authorities and also to access the Parkgate utilities compound. The local roads affected are as follows:

- Wood End Lane between the A515 Lichfield Road and the A38 (T) Rykneld Street;
- the A5121 Parkway/Wellington Road between the A38 Lichfield Road and Shobnall Road;
- the B5017 Shobnall Road/Forest Road/Henshurst Hill/Burton Road between the A5121 Wellington Road and the B5234 Newborough Road; and
- the B5234 Newborough Road between the B5017 Burton Road and the access to the Parkgate utilities compound to the west of Newborough.

2.2.6 Table 3 of the main TA summarises the baseline traffic flows for local roads in the area that may have been affected by the original scheme in the Fradley to Colton area. The additional local roads potentially affected by AP2 revised scheme are indicated by Tables 3.1 and 3.2 for the 2017 and 2018 observed data respectively.

Table 3.1: Fradley to Colton local road network 2017 baseline flows (vehicles)

Location	Direction[6]	2017 baseline AM peak (08:00 – 09:00)		2017 baseline PM peak (17:00 – 18:00)		2017 AADT[7]	
		All vehicles	HGV	All vehicles	HGV	All vehicles	HGV
B5017 Forest Road/Henhurst Hill (at Henhurst Ridge)	EB	577	27	387	33	4496	247
	WB	322	31	409	24	4185	245
B5234 (between A515 and Brickhill Lane)	EB	143	5	78	4	916	43
	WB	77	6	118	6	929	40

Table 3.2: Fradley to Colton local road network 2018 baseline flows (vehicles)

Location	Direction	2018 baseline AM peak (08:00 – 09:00)		2018 baseline PM peak (17:00 – 18:00)		2018 AADT	
		All vehicles	HGV	All vehicles	HGV	All vehicles	HGV
A5121 Wellington Street (between B5017 Shobnall Road and Parkway)	NB	676	46	724	23	8810	434
	SB	723	35	681	9	9019	283
B5017 Shobnall Road (between A5121 Wellington Road and Grange Street/Parkway)	EB	763	34	811	21	9609	336
	WB	647	31	733	14	8733	285
B5017 Forest Road (between A38 Burton Bypass and Fred Brewer Way)	EB	576	27	329	28	4198	230
	WB	251	24	384	23	3691	216

Baseline junction operation

A5192 Eastern Avenue/A5127 Burton Road/A5192 Cappers Lane/A5127 Trent Valley Road

2.2.7 Table 15 of the main TA summarised the existing operation of the junction. This junction has been re-calibrated following consultation with the local highway authority. Table 15 below replaces Table 15 of the main TA.

[6] NB = north-bound; SB = south-bound; EB = east-bound; WB = west-bound
[7] AADT – Annual Average Daily Traffic represents the average daily traffic flow on the link

Table 15: 2016 baseline performance at A5192 Eastern Avenue/A5127 Burton Road/A5192 Cappers Lane/A5127 Trent Valley Road junction

Approach	Flow, PCU/hr	RFC[8]	Queue, PCU[9]
	2016 AM (08:00 – 09:00) baseline results		
A5192 Eastern Avenue (north)	725	0.63	2
A5127 Burton Road (east)	644	0.66	2
A5192 Cappers Lane (south)	712	0.79	4
A5127 Trent Valley Road (west)	567	0.86	6
Valley Lane	123	0.30	0
	2016 PM (17:00 – 18:00) baseline results		
A5192 Eastern Avenue (north)	672	0.52	1
A5127 Burton Road (east)	846	0.78	4
A5192 Cappers Lane (south)	757	0.94	12
A5127 Trent Valley Road (west)	562	0.99	15
Valley Lane	82	0.23	0

2.2.8 The conclusions drawn in paragraph 5.3.44 of the main TA are replaced by:

"The results show that this junction is close to capacity in the AM peak and at capacity in the PM peak. The A5127 Trent Valley Road (west) is shown to have an RFC value of 0.86 in the AM peak and 0.99 in the PM peak, with queue lengths of six and 15 PCUs respectively. The A5192 Cappers Lane is shown to have an RFC value of 0.79 in the AM peak and 0.94 in the PM peak, with queue lengths of four and 12 PCUs respectively. The PM peak demonstrates RFC value and queue lengths of 0.78 and four PCUs respectively on the A5127 Burton Road (east)".

A51 Birmingham Road/A5127 Birmingham Road/A461 Saint Foy Avenue/A51 The Friary

2.2.9 Table 16 of the main TA summarises the existing operation of the junction. This junction has been re-calibrated following consultation with the local highway authority. Table 16 in the main TA is replaced by Table 16 below.

Table 16: 2016 baseline performance at A51 Birmingham Road/A5127 Birmingham Road/A461 Saint Foy Avenue/A51 the Friary junction

Approach	Flow, PCU/hr	RFC	Queue, PCU
	2016 AM (08:00 – 09:00) baseline results		
A51 The Friary	808	0.59	2
A51 Birmingham Road	599	0.48	1
A5127 Birmingham Road	681	0.78	3
A461 Sainte Foy Avenue	604	0.95	11

[8] RFC = Ratio of Flow to Capacity, a measure of the level of service at non-signalised traffic junctions
[9] PCU = Passenger Car Unit, a measure used to represent mixed traffic in a standard format based on a car as the common unit

Approach	Flow, PCU/hr	RFC	Queue, PCU
	2016 PM (17:00 – 18:00) baseline results		
A51 The Friary	742	0.49	1
A51 Birmingham Road	842	0.67	2
A5127 Birmingham Road	643	0.94	11
A461 Sainte Foy Avenue	440	0.66	2

2.2.10 The conclusions drawn in paragraph 5.3.46 of the main TA are replaced by:

"The results show that this junction operates at capacity in the AM and PM peak hours. The A461 Sainte Foy Avenue approach is shown to have an RFC value of 0.95 in the AM peak with a queue length of 11 PCUs. The A5127 Birmingham Road approach demonstrates an RFC value of 0.78 in the AM peak and 0.94 in the PM peak and a queue length of three and 11 PCUs respectively."

A5192 Eastern Avenue/A51 Stafford Road/A51 Western Bypass

2.2.11 Table 30 of the main TA summarises the existing operation of the junction. The signal timings of the junction were reconsidered following consultation with the local highway authority. This exercise made no material difference to the operation of the junction as presented in Table 30 of the main TA, which remains unchanged.

B5014 Uttoxeter Road/Common Lane

2.2.12 This junction is included as it was assessed as a result of the AP1 revised scheme. The existing operation of the junction has been assessed for the AM and PM peaks as shown in Table 34.1.

Table 34.1: 2016 baseline performance at B5014 Uttoxeter Road/Common Lane junction

Approach	Flow, PCU/hr	RFC	Q, PCU
	2016 AM (08:00 – 09:00) baseline results		
Common Lane (left + right)	30	0.05	0
B5014 Uttoxeter Road (south) (ahead + right)	22	0.04	0
B5014 Uttoxeter Road (south) (ahead)	132	-	-
B5014 Uttoxeter Road (north) (left)	0	-	-
B5014 Uttoxeter Road (north) (ahead)	215	-	-
	2016 PM (17:00 – 18:00) baseline results		
Common Lane (left + right)	20	0.03	0
B5014 Uttoxeter Road (south) (ahead + right)	26	0.04	0
B5014 Uttoxeter Road (south) (ahead)	162	-	-
B5014 Uttoxeter Road (north) (left)	3	-	-
B5014 Uttoxeter Road (north) (ahead)	84	-	-

2.2.13 The results show that the junction operates within capacity in the AM and PM peak periods.

Common Lane/Pipe Lane

2.2.14 This junction is included as it was assessed as a result of the AP1 revised scheme. The existing operation of the junction has been assessed for the AM and PM peaks as shown in Table 34.2.

Table 34.2: 2016 baseline performance at Common Lane/Pipe Lane junction

Approach	Flow, PCU/hr	RFC	Q, PCU
	2016 AM (08:00 – 09:00) baseline results		
Pipe Lane (west) (ahead + right)	15	0.03	0
Pipe Lane (east) (left)	2	0	0
Pipe Lane (east) (left)	22	-	-
Common Lane (left)	5	-	-
Common Lane (ahead)	11	-	-
	2016 PM (17:00 – 18:00) baseline results		
Pipe Lane (west) (ahead + right)	5	0.01	0
Pipe Lane (east) (left)	5	0.01	0
Pipe Lane (east) (left)	16	-	-
Common Lane (left)	0	-	-
Common Lane (ahead)	22	-	-

2.2.15 The results show that the junction operates within capacity in the AM and PM peak periods.

Wood End Lane/Netherstowe Lane

2.2.16 This junction has been modelled in order to assess the performance with the AP2 revised scheme construction traffic being routed along Wood End Lane.

2.2.17 This junction is a three-arm priority controlled (give way) T-junction with no controlled pedestrian crossing facilities. The existing operation of the junction has been assessed for the AM and PM peaks as shown in Table 34.3.

Table 34.3: 2018 baseline performance at Wood End Lane/Netherstowe Lane junction

Approach	Flow, PCU/hr	RFC	Q, PCU
	2018 AM (08:00 – 09:00) baseline results		
Netherstowe Lane (left)	1	0	0
Netherstowe Lane (right)	7	0.02	0
Wood End Lane (west) (ahead + right)	11	0.02	0
Wood End Lane (west) (ahead)	391	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU
Wood End Lane (east) (left)	17	-	-
Wood End Lane (east) (ahead)	222	-	-
	2018 PM (17:00 – 18:00) baseline results		
Netherstowe Lane (left)	9	0.02	0
Netherstowe Lane (right)	12	0.04	0
Wood End Lane (west) (ahead + right)	4	0.01	0
Wood End Lane (west) (ahead)	205	-	-
Wood End Lane (east) (left)	18	-	-
Wood End Lane (east) (ahead)	464	-	-

2.2.18 The results show that the junction operates within capacity in the AM and PM peak hours.

Wood End Lane/Watery Lane

2.2.19 This junction has been modelled in order to assess the performance with the AP2 revised scheme construction traffic being routed along Wood End Lane.

2.2.20 This junction is a three-arm priority controlled (give way) T-junction with no controlled pedestrian crossing facilities. The existing operation of the junction has been assessed for the AM and PM peaks as shown in Table 34.4.

Table 34.4: 2018 baseline performance at Wood End Lane/Watery Lane junction

Approach	Flow, PCU/hr	RFC	Q, PCU
	2018 AM (08:00 – 09:00) baseline results		
Watery Lane (left)	41	0.07	0
Watery Lane (right)	84	0.20	0
Wood End Lane (west) (ahead + right)	147	0.21	0
Wood End Lane (west) (ahead)	256	-	-
Wood End Lane (east) (left)	83	-	-
Wood End Lane (east) (ahead)	140	-	-
	2018 PM (17:00 – 18:00) baseline results		
Watery Lane (left)	72	0.14	0
Watery Lane (right)	72	0.19	0
Wood End Lane (west) (ahead + right)	60	0.12	0
Wood End Lane (west) (ahead)	123	-	-
Wood End Lane (east) (left)	100	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU
Wood End Lane (east) (ahead)	371	-	-

2.2.21 The results show that the junction operates within capacity in the AM and PM peak hours.

A51/Brook End/High Street

2.2.22 This junction has been modelled at the request of the local highway authority. This junction is a four-arm priority controlled (give way) crossroads with physical 'ghost island' right turn facilities and no controlled pedestrian crossing facilities. The existing operation of the junction has been assessed for the AM and PM peak hours as shown in Table 34.5.

Table 34.5: 2018 baseline performance at A51/Brook End/High Street Junction

Approach	Flow, PCU/hr	RFC	Q, PCU
	2018 AM (08:00 – 09:00) baseline results		
Brook End Lane (ahead + left)	55	0.13	0
Brook End Lane (ahead + right)	34	0.11	0
A51 from Bardy Lane to Stafford Road (north) (left)	38	-	-
A51 from Bardy Lane to Stafford Road (north) (ahead)	1096	-	-
A51 from Bardy Lane to Stafford Road (north) (right)	4	0.01	0
High Street (ahead + left)	11	0.03	0
High Street (ahead + right)	22	0.07	0
A51 from Bardy Lane to Stafford Road (south) (left)	9	-	-
A51 from Bardy Lane to Stafford Road (south) (ahead)	749	-	-
A51 from Bardy Lane to Stafford Road (south) (right)	11	0.02	0
	2018 PM (17:00 – 18:00) baseline results		
Brook End Lane (ahead + left)	17	0.03	0
Brook End Lane (ahead + right)	20	0.06	0
A51 from Bardy Lane to Stafford Road (north) (left)	38	-	-
A51 from Bardy Lane to Stafford Road (north) (ahead)	782	-	-
A51 from Bardy Lane to Stafford Road (north) (right)	1	0	0
High Street (ahead + left)	6	0.01	0
High Street (ahead + right)	10	0.04	0
A51 from Bardy Lane to Stafford Road (south) (left)	21	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU
A51 from Bardy Lane to Stafford Road (south) (ahead)	1106	-	-
A51 from Bardy Lane to Stafford Road (south) (right)	10	0.02	0

2.2.23 The results show that the junction operates within capacity in the AM and PM peak hours.

2.3 Assessment methodology

2.3.1 The assessment methodology is described in Section 3 of the main TA with the future year baseline detailed in Section 7.2 of the main TA.

2.3.2 The main TA reports committed developments that were included within the original scheme assessment. As part of the AP2 revised scheme, two additional developments have been included within a revised future baseline. These are the Watery Lane residential development of 750 dwellings and the former Norgren Factory mixed use development that includes 70 dwellings and retail.

2.3.3 As appropriate and except where otherwise stated, this assessment includes changes in traffic flows or networks arising from the HS2 Phase One scheme in the future baseline on those roads and junctions affected by HS2 Phase One construction traffic.

2.3.4 The construction assessment considers the traffic and transport impacts in the peak month of construction activity at each location, based on the proposed phasing of construction works. The assessment also includes cumulative impacts arising from construction in the adjoining community areas as well as construction movements through the area.

2.4 CA1 AP2 revised scheme future baseline

2.4.1 Future baseline traffic and transport conditions are described in Section 7.2 of the main TA. This section of the main TA is unchanged unless stated otherwise.

2.4.2 Where a junction has been assessed in which the observed baseline is different to the 2016 baseline, the revised background traffic growth factors have been calculated to determine traffic growth in the construction and operational years, which have been extrapolated from the agreed Trip End Model Presentation Program (TEMPRO) growth factors applied locally within the main TA.

Highway network

Strategic road network and primary road traffic flows

2.4.3 Table 104 in the main TA summarises the 2016, 2023, 2027 and 2041 AM (08:00 – 09:00) and PM (17:00 – 18:00) peak forecast traffic flows. Table 104 below replaces Table 104 of the main TA.

2.4.4 The majority of the traffic flows are unchanged, except for the following existing links that include additional committed development traffic, which has resulted in very minor increases on the A51 Stafford Road, the A515 Lichfield Road, the A515 Tewnalls Road and the A38(T) Rykneld Street (between Burton Road and Rykneld Street/north-bound slip.

Local road network traffic flows

2.4.5 Table 105 in the main TA summarises the 2016, 2023, 2027 and 2041 AM (08:00 – 09:00) and PM (17:00 – 18:00) peak forecast traffic flows. Table 105 below replaces Table 105 of the main TA.

2.4.6 The majority of the traffic flows are unchanged, except for the following existing links that include additional committed development traffic, which has resulted in minor changes on A51 Stafford Road, A515 Featherbed Lane/Lichfield Road, Wood End Lane, Eastern Avenue, the A5192 Cappers Lane and the A5127 Trent Valley Road.

2.4.7 Additional links have been included in Table 105 to consider the AP2 revised scheme, including the A5121 Wellington Road, the B5017 Henhurst Hill/Forest Road/Shobnall Road, the B5234 Ashbrook Lane/Burton Road and Common Lane.

Table 104: Strategic and primary road network AM peak hour (08.00 – 09.00) and PM peak hour (17.00 – 18.00) future baseline traffic flows

Location	Direction*	AM (08:00 – 09:00)								PM (17:00 – 18:00)							
		2016		2023		2027		2041		2016		2023		2027		2041	
		Veh	HGV	Veh	HGV	Veh	HGV	Veh	HGV	Veh	HGV	Veh	HGV	Veh	HGV	Veh	HGV
A38(T) Rykneld Street (between Burton Road and Rykneld Street/north bound slip)	SB	417	7	470	7	487	8	540	8	512	7	573	7	595	7	654	8
	NB	443	9	497	10	515	10	571	11	506	6	566	6	587	7	646	7
A51 Stafford Road (between Eastern Avenue and Featherbed Lane)	NB	606	11	672	12	688	12	733	13	967	13	1056	14	1081	14	1046	14
	SB	1025	26	1118	27	1146	28	1221	30	677	13	745	14	762	15	738	14
A515 Lichfield Road (between Wood End Lane and Common Lane)	NB	209	11	232	12	241	13	268	14	291	2	321	2	333	3	371	3
	SB	322	8	356	9	370	9	412	10	224	6	247	7	257	7	286	8
A515 Tewnalls Lane (between Stafford Road and Wood End Lane)	NB	369	20	420	22	436	23	484	26	448	16	506	17	525	18	583	20
	SB	411	22	469	25	487	26	540	28	284	10	329	11	342	11	378	13

* NB = north-bound; NWB = north-west bound; SB = south-bound; SEB = south-east bound; EB = east-bound and WB = west-bound

Table 105: Local road network AM peak hour (08.00 – 09.00) and PM peak hour (17.00 – 18.00) future baseline traffic flows

Location	Direction	AM (08:00 – 09:00)								PM (17:00 – 18:00)							
		2016		2023		2027		2041		2016		2023		2027		2041	
		Veh	HGV	Veh	HGV	Veh	HGV	Veh	HGV	Veh	HGV	Veh	HGV	Veh	HGV	Veh	HGV
A51 Western Bypass (between Friary Island and Eastern Avenue)	NB	585	13	707	14	736	15	825	17	435	12	539	13	560	14	633	16
	SB	418	10	531	11	551	12	615	13	616	9	747	10	777	10	880	12
A5127 Trent Valley Road (between Eastern Avenue and Rykneld Street)	EB	474	7	535	7	555	8	618	8	523	5	589	5	612	5	744	7
	WB	614	12	690	13	717	14	798	15	595	8	669	9	696	10	846	12
A5192 Cappers Lane (between Austin Cote Lane and Rykneld Street)	EB	384	11	470	12	486	12	537	13	439	7	531	7	550	8	661	9
	WB	391	9	612	10	630	10	681	11	406	8	629	9	647	9	749	11
A5192 Cappers Lane (between Trent Valley Road and Austin Cote Lane)	NB	679	14	813	15	843	16	932	17	729	12	869	13	901	14	1085	17
	SB	714	15	981	17	1012	17	1106	19	636	14	895	15	923	16	1084	19
A5192 Eastern Avenue (between Grange Lane and Stafford Road)	NB	585	13	707	14	736	15	825	17	435	12	539	13	560	14	633	16
	SB	418	10	531	11	551	12	615	13	616	9	747	10	777	10	880	12
A5192 Eastern Avenue (between Netherstone Lane and Grange Lane)	WB	423	8	534	9	553	9	608	10	800	7	945	8	980	8	1084	9
	EB	729	14	861	15	893	16	988	18	476	12	582	13	603	14	664	16
A5192 Eastern Avenue (between Trent Valley Road and Netherstowe Lane)	NB	511	10	734	11	756	11	824	13	746	9	994	10	1027	10	1215	13
	SB	698	19	1065	21	1096	22	1188	24	650	13	1013	14	1042	15	1205	18
A5121 Wellington Road (between the B5017 Shobnall Road and Parkway)	NB	657	45	723	49	747	51	825	56	704	22	774	25	800	25	892	28
	SB	703	34	773	37	799	39	882	43	662	9	728	10	753	10	839	11
B5017 Henhurst Hill (between Hopley Ln and Aviation Rd)	EB	569	27	626	29	646	30	714	33	382	33	420	36	434	37	484	41
	WB	317	31	349	34	361	35	398	38	403	24	444	26	458	27	511	30

Location	Direction	AM (08:00 – 09:00)								PM (17:00 – 18:00)							
		2016		2023		2027		2041		2016		2023		2027		2041	
		Veh	HGV	Veh	HGV	Veh	HGV	Veh	HGV	Veh	HGV	Veh	HGV	Veh	HGV	Veh	HGV
B5017 Forest Road (between Aviation Ln and Parkway)	EB	568	27	624	29	645	30	713	33	324	28	357	30	369	31	411	35
	WB	247	24	272	26	281	27	311	30	379	22	416	24	430	25	480	28
B5017 Shobnall Road (between A5121 Wellington Rd and Parkway)	EB	742	33	816	36	843	38	931	41	788	20	867	22	896	23	999	26
	WB	629	30	692	33	715	34	789	38	712	14	784	15	810	15	903	17
B5234 Burton Road (between A515 Lichfield Road and Brickhill Lane)	EB	141	5	155	5	160	6	177	6	77	4	85	4	87	4	97	5
	WB	76	6	83	7	86	7	95	7	116	6	128	7	132	7	147	7
Wood End Lane (between Lichfield Road and Netherstowe Lane)	SB	370	4	467	5	483	5	531	5	131	5	205	5	210	5	227	6
	NB	154	6	222	7	229	7	249	8	409	4	500	5	518	5	571	5
Wood End Lane (between Gorse Lane and Nanscawen Road)	SB	365	6	522	6	538	7	586	7	161	6	298	7	305	7	326	8
	NB	194	8	355	9	364	10	389	11	414	6	595	6	613	7	667	7
Wood End Lane (between Rykneld Street and Wood End Lane/west-bound)	EB	382	13	497	15	514	15	563	17	168	8	261	9	269	9	290	10
	WB	202	15	288	16	297	17	323	18	459	27	567	30	588	31	647	35
Wood End Lane (between Brookhay Lane and Wood End Lane/west-bound)	EB	366	26	479	29	495	30	543	34	257	14	359	16	370	16	404	18
	WB	309	26	405	29	418	30	459	33	423	45	528	49	547	51	601	56
Common Lane (between Uttoxeter Road and Pipe Lane)	SB	30	1	33	1	34	1	38	1	18	1	20	1	21	1	24	1
	NB	15	1	17	1	18	1	20	1	21	1	24	1	25	1	28	1
B5014 Lichfield Road (between A515 Tewnalls Road and Shaw Lane)	SB	177	3	187	3	193	3	213	4	410	2	432	2	446	2	493	2
	NB	386	3	407	3	420	3	465	4	199	4	210	4	217	4	240	5

Location	Direction	AM (08:00 – 09:00)								PM (17:00 – 18:00)							
		2016		2023		2027		2041		2016		2023		2027		2041	
		Veh	HGV	Veh	HGV	Veh	HGV	Veh	HGV	Veh	HGV	Veh	HGV	Veh	HGV	Veh	HGV
Shaw Lane (between B5014 Lichfield Road and Pipe Lane)	SB	7	0	7	0	8	0	8	0	7	0	7	0	8	0	8	0
	NB	6	0	6	0	6	0	7	0	8	0	8	0	9	0	9	0

Junction operation – future baseline

2.4.8 The operation of the key junctions, which form the main access route for the Strategic Road Network (SRN) through the study area to the construction sites or affected by the operation of the AP2 revised scheme, have been assessed using the future baseline traffic flows. The results are summarised in the following tables where these differ from or are additional to the main TA.

2.4.9 Where a junction will be affected by the construction of the AP2 revised scheme, future baseline results are included for 2023 (both with and without associated construction traffic from HS2 Phase One and the committed development traffic as relevant).

2.4.10 Where a junction will be affected by the operation of the AP2 revised scheme as a result of permanent junction improvements, results are included for 2027 and 2041.

Lancaster Road/Wood End Lane/Wellington Crescent

2.4.11 Table 106 of the main TA summarises future baseline performance of the junction. Table 106 in the main TA is replaced by Table 106 below.

Table 106: Future baseline performance Lancaster Road/Wood End Lane/Wellington Crescent junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
Lancaster Road	83	0.05	0	146	0.09	0	146	0.10	0
Wood End Lane (east)	480	0.17	0	522	0.18	0	606	0.21	0
Wellington Crescent	27	0.02	0	53	0.03	0	53	0.03	0
Wood End Lane (west)	628	0.24	0	682	0.26	0	766	0.29	1
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
Lancaster Road	192	0.11	0	231	0.14	0	231	0.14	0
Wood End Lane (east)	391	0.13	0	423	0.14	0	507	0.17	0
Wellington Crescent	179	0.11	0	237	0.15	0	237	0.15	0
Wood End Lane (west)	343	0.13	0	372	0.15	0	456	0.18	0

2.4.12 The conclusions drawn in paragraph 7.2.15 of the main TA remain unchanged.

Common Lane/Wood End Lane

2.4.13 Table 107 of the main TA summarises future baseline performance of the junction. Table 107 in the main TA is replaced by Table 107 below.

Table 107: Future baseline performance at Common Lane/Wood End Lane junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
Wood End Lane (west)	518	0.29	1	619	0.34	1	703	0.39	1
Common Lane	434	0.12	0	472	0.14	0	472	0.15	0
Wood End Lane (east)	276	0.09	0	324	0.11	0	408	0.13	0
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
Wood End Lane (west)	359	0.2	0	412	0.23	0	496	0.28	0
Common Lane	391	0.13	0	424	0.15	0	424	0.15	0
Wood End Lane (east)	428	0.14	0	505	0.17	0	590	0.19	0

2.4.14 The conclusions drawn in paragraph 7.2.17 of the main TA are replaced by:

"The results show that this junction operates within capacity in the AM and PM peak hours. It should be noted that there is no substantial impact at this junction as a result of HS2 Phase One."

Wood End Lane/Gorse Lane/Tesco access

2.4.15 Table 108 of the main TA summarises future baseline performance of the junction. Table 108 in the main TA is replaced by Table 108 below.

Table 108: Future baseline performance at Wood End Lane/Gorse Lane/Tesco access junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
Gorse Lane	93	0.07	0	122	0.09	0	122	0.10	0
Tesco Access	0	0	0	0	0	0	0	0	0
Wood End Lane (east)	233	0.16	0	279	0.19	0	363	0.25	0
Wood End Lane (west)	365	0.26	0	503	0.36	1	587	0.42	1
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
Gorse Lane	71	0.05	0	113	0.08	0	113	0.08	0
Tesco Access	0	0	0	0	0	0	0	0	0
Wood End Lane (east)	495	0.33	1	583	0.40	1	668	0.46	1
Wood End Lane (west)	174	0.13	0	230	0.17	0	314	0.23	0

2.4.16 The conclusions drawn in paragraph 7.2.19 of the main TA are replaced by:

"The results show that this junction operates within capacity in the AM and PM peak hours with minimal queuing."

A515 Featherbed Lane/A51 Stafford Road

2.4.17 Table 109 of the main TA summarises the results of the junction capacity assessments. Table 109 in the main TA is replaced by Table 109 below.

Table 109: Future baseline performance at A515 Featherbed Lane/A51 Stafford Road junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU /hr	RFC	Q, PCU	Flow, PCU /hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
A51 Stafford Road (north)	1288	0.64	2	1382	0.69	2	1390	0.70	2
A515 Featherbed Lane	418	0.37	1	459	0.43	1	482	0.45	1
A51 Stafford Road (south)	878	0.43	1	948	0.47	1	979	0.49	1
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
A51 Stafford Road (north)	684	0.35	1	746	0.38	1	754	0.39	1
A515 Featherbed Lane	406	0.30	0	436	0.32	1	460	0.34	1
A51 Stafford Road (south)	1291	0.65	2	1375	0.70	2	1407	0.71	3

2.4.18 The conclusions drawn in paragraph 7.2.21 of the main TA are replaced by:

"The results show that this junction operates within capacity in the AM and PM peak hours with minimal queuing on all approaches."

A51 Western Bypass/The Friary/Friary Avenue/Friary Road

2.4.19 Table 110 of the main TA summarises the results of the junction capacity assessments. Table 110 in the main TA is replaced by Table 110 below.

Table 110: Future baseline performance at A51 Western Bypass/The Friary/Friary Avenue/ Friary Road junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
A51 Western Bypass	918	0.54	1	1013	0.62	2	1037	0.63	2
The Friary	476	0.19	0	525	0.21	0	525	0.22	0
Friary Avenue	35	0.03	0	39	0.04	0	39	0.04	0
A51 The Friary/Friary Road	823	0.38	1	908	0.43	1	933	0.44	1
Friary Road	772	0.41	1	852	0.47	1	852	0.48	1
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
A51 Western Bypass	958	0.59	1	1059	0.67	2	1083	0.68	2
The Friary	726	0.31	0	802	0.36	1	802	0.36	1

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
Friary Avenue	72	0.09	0	80	0.12	0	80	0.13	0
A51 The Friary/Friary Road	747	0.53	1	825	0.65	2	850	0.67	2
Friary Road	593	0.34	1	655	0.4	1	655	0.41	1

2.4.20 The conclusions drawn in paragraph 7.2.23 of the main TA are replaced by:

"The results show that this junction operates within capacity in the AM and PM peak hours with minimal queuing."

A51 Lea Hall Way/A51 Brereton Hill/A460 Brereton Hill

2.4.21 Table 111 of the main TA summarises the results of the junction capacity assessments. Table 111 in the main TA is replaced by Table 111 below.

Table 111: Future baseline performance at A51 Lea Hall Way/A51 Brereton Hill/A460 Brereton Hill junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
A51 Lea Hall Way	955	0.61	2	1048	0.68	2	1048	0.69	2
A51 Brereton Hill (south)	916	0.55	1	1006	0.61	2	1014	0.62	2
A460 Brereton Hill	680	0.4	1	746	0.45	1	754	0.45	1
	2016 PM			**2023 PM**			**2023 future baseline with Phase One -PM**		
A51 Lea Hall Way	751	0.49	1	825	0.55	1	825	0.55	1
A51 Brereton Hill	968	0.55	1	1063	0.61	2	1071	0.62	2
A460 Brereton Hill	984	0.63	2	1080	0.71	3	1080	0.72	3

2.4.22 The conclusions drawn in paragraph 7.2.25 of the main TA are replaced by:

"The results show that this junction operates within capacity in the 2023 future baseline (with and without HS2 Phase One) in the AM peak and approaching capacity (with and without the HS2 Phase One) in the PM peak.

It should be noted that there is no substantial impact at this junction as a result of HS2 Phase One with no substantial change in the RFC values or queuing."

A51 Lea Hall Way/A513 Armitage Road

2.4.23 Table 112 of the main TA summarises the results of the junction capacity assessments. Table 112 in the main TA is replaced by Table 112 below.

Table 112: Future baseline performance at A51 Lea Hall Way/A513 Armitage Road junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
A51 Lea Hall Way (north)	838	0.59	2	916	0.66	2	935	0.67	2
A513 Armitage Road (east)	656	0.51	1	717	0.58	1	736	0.59	2
A51 Lea Hall Way (south)	687	0.44	1	750	0.49	1	750	0.50	1
A513 Armitage Road (west)	300	0.3	0	328	0.35	1	328	0.35	1
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
A51 Lea Hall Way (north)	1018	0.73	3	1113	0.81	4	1131	0.83	5
A513 Armitage Road (east)	729	0.59	1	797	0.66	2	815	0.68	2
A51 Lea Hall Way (south)	821	0.56	1	898	0.64	2	898	0.64	2
A513 Armitage Road (west)	280	0.3	0	306	0.36	1	306	0.36	1

2.4.24 The conclusions drawn in paragraph 7.2.27 of the main TA are replaced by:

"The results show that the junction operates within capacity in the AM peak with minimal queuing on all approaches at 2023 (with and without HS2 Phase One). The junction is approaching capacity in the PM peak at 2023 (with and without HS2 Phase One).

The A51 Lea Hall Way (north) has an RFC of 0.83 and corresponding queue length of five PCUs in the PM peak at 2023 with HS2 Phase One. It should be noted that there is no substantial impact at this junction as a result of HS2 Phase One"

A51 Lea Hall Way/Wheelhouse Road

2.4.25 Table 113 of the main TA summarises the results of the junction capacity assessments. Table 113 in the main TA is replaced by Table 113 below.

Table 113: Future baseline performance at A51 Lea Hall Way/Wheelhouse Road junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
A51 Lea Hall Way (south)	885	0.52	1	936	0.56	1	954	0.57	1
Wheelhouse Road	107	0.1	0	113	0.11	0	113	0.11	0
A51 Lea Hall Way (north)	893	0.47	1	945	0.49	1	963	0.50	1
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
A51 Lea Hall Way (south)	956	0.53	1	1012	0.56	1	1029	0.57	1
Wheelhouse Road	332	0.36	1	351	0.39	1	351	0.40	1
A51 Lea Hall Way (north)	798	0.44	1	845	0.47	1	862	0.48	1

2.4.26 The conclusions drawn in paragraph 7.2.29 of the main TA are replaced by:

"The results show that this junction operates within capacity in the AM and PM peak hours with minimal queuing on all approaches."

A51 Rugeley Eastern Bypass/A51 Lea Hall Way/Power Station Road

2.4.27 Table 114 of the main TA summarises the results of the junction capacity assessments. Table 114 in the main TA is replaced by Table 114 below.

Table 114: Future baseline performance at A51 Rugeley Eastern Bypass/A51 Lea Hall Way/Power Station Road junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
A51 Rugeley Eastern Bypass	800	0.41	1	846	0.44	1	864	0.45	1
Power Station access	0	0	0	0	0	0	0	0	0
A51 Lea Hall Way	749	0.35	1	791	0.37	1	810	0.38	1
Power Station Road	199	0.11	0	210	0.12	0	210	0.12	0
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
A51 Rugeley Eastern Bypass	535	0.28	0	566	0.3	0	583	0.31	1
Power Station access	12	0.01	0	13	0.01	0	13	0.01	0
A51 Lea Hall Way	1056	0.5	1	1116	0.52	1	1134	0.53	1
Power Station Road	277	0.17	0	293	0.18	0	293	0.18	0

2.4.28 The conclusions drawn in paragraph 7.2.31 of the main TA are replaced by:

"The results show that this junction operates within capacity in the AM and PM peak hours with minimal queuing on all approaches."

A51 Rugeley Eastern Bypass/B5013 Station Road

2.4.29 Table 115 of the main TA summarises the results of the junction capacity assessments. Table 115 in the main TA is replaced by Table 115 below.

Table 115: Future baseline performance at A51 Rugeley Eastern Bypass/B5013 Station Road junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
A51 Rugeley Eastern Bypass (north)	779	0.45	1	846	0.5	1	864	0.51	1
B5013 Station Road (east)	411	0.3	1	446	0.34	1	446	0.34	1
A51 Rugeley Eastern Bypass (south)	533	0.3	1	579	0.33	1	597	0.35	1
B5013 Station Road (west)	410	0.32	1	445	0.36	1	445	0.36	1

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 PM			2023 PM			2023 future baseline with Phase One – PM		
A51 Rugeley Eastern Bypass (north)	597	0.36	1	647	0.39	1	665	0.41	1
B5013 Station Road (east)	472	0.32	1	511	0.36	1	511	0.36	1
A51 Rugeley Eastern Bypass (south)	745	0.44	1	807	0.49	1	825	0.50	1
B5013 Station Road (west)	451	0.38	1	489	0.43	1	489	0.43	1

2.4.30 The conclusions drawn in paragraph 7.2.33 of the main TA are replaced by:

"The results show that this junction operates within capacity in the AM and PM peak hours with minimal queuing on all approaches."

A5192 Cappers Lane/Austin Cote Lane/Europa Way

2.4.31 Table 116 of the main TA summarises the results of the junction capacity assessments. Table 116 in the main TA is replaced by Table 116 below.

Table 116: Future baseline performance at A5192 Cappers Lane/Austin Cote Lane/Europa Way junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			2023 AM			2023 future baseline with Phase One – AM		
Europa Way	227	0.22	0	231	0.24	0	231	0.25	0
A5192 Cappers Road (east)	548	0.45	1	568	0.47	1	584	0.48	1
Austin Cote Lane	531	0.52	1	548	0.55	1	548	0.55	1
A5192 Cappers Road (west)	839	0.66	2	974	0.77	3	990	0.78	4
	2016 PM			2023 PM			2023 future baseline with Phase One – PM		
Europa Way	415	0.43	1	421	0.46	1	421	0.46	1
A5192 Cappers Road (east)	520	0.48	1	554	0.52	1	570	0.53	1
Austin Cote Lane	393	0.38	1	418	0.41	1	418	0.41	1
A5192 Cappers Road (west)	778	0.55	1	862	0.61	2	878	0.62	2

2.4.32 The conclusions drawn in paragraph 7.2.35 of the main TA are replaced by:

"The results show that this junction is approaching capacity in the 2023 AM peak (with and without the HS2 Phase One) and operates within capacity in the PM peak hours with minimal queuing on all approaches.

The A5192 Cappers Road (west) arm RFC value increases from 0.77 to 0.78 and the queue length from three to four PCUs in 2023 without and with HS2 Phase One. There is no substantial impact at this junction as a result of HS2 Phase One."

A5192 Eastern Avenue/A5127 Burton Road/A5192 Cappers Lane/A5127 Trent Valley Road

2.4.33 Table 117 of the main TA summarises the results of the junction capacity assessments. Table 117 in the main TA is replaced by Table 117 below.

Table 117: Future baseline performance at A5192 Eastern Avenue/A5127 Burton Road/A5192 Cappers Lane/A5127 Trent Valley Road junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
A5192 Eastern Ave (north)	725	0.63	2	885	0.77	3	892	0.79	4
A5127 Burton Road (east)	644	0.66	2	658	0.75	3	693	0.79	4
A5192 Cappers Lane (south)	712	0.79	3	743	0.84	5	759	0.88	7
A5127 Trent Valley Road (west)	567	0.86	3	603	0.94	11	632	1.00	18
Valley Lane	123	0.30	0	125	0.33	1	125	0.34	1
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
A5192 Eastern Ave (north)	672	0.52	1	842	0.64	2	849	0.65	2
A5127 Burton Road (east)	846	0.78	4	870	0.88	7	883	0.89	7
A5192 Cappers Lane (south)	757	0.94	5	815	1.09	46	825	1.11	52
A5127 Trent Valley Road (west)	562	0.99	6	643	1.14	51	652	1.16	56
Valley Lane	82	0.23	0	84	0.25	0	84	0.25	0

2.4.34 The conclusions drawn in paragraph 7.2.37 of the main TA are replaced by:

"The results show that this junction operates at capacity in the 2023 future baseline (with and without HS2 Phase One) in the AM peak and operates above capacity (with and without HS2 Phase One) in the PM peak.

In the PM peak, the A5127 Trent Valley Road (west) RFC value increases from 1.14 to 1.16 and the queue increases from 51 to 56 PCUs with the inclusion of HS2 Phase One construction traffic.

The Cappers Lane (south) RFC increases from 1.09 to 1.11 with a corresponding increase in queue from 46 to 52 PCUs in the PM peak with the addition of the HS2 Phase One construction traffic.

It should be noted that there is no substantial impact at this junction as a result of HS2 Phase One."

Blithbury Lane/Hadley Gate

2.4.35 Table 119 of the main TA summarises the results of the junction capacity assessments. Table 119 in the main TA is replaced by Table 119 below.

Table 119: Future baseline performance at Blithbury Lane/Hadley Gate junction (2023)

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
Hadley Gt (left + right)	0	0.00	0	0	0	0	0	0	0
Blithbury Lane (east) (ahead)	37	-	-	42	-	-	42	-	-
Blithbury Lane (east) (right)	0	0.00	0	0	0	0	0	0	0
Blithbury Lane (west) (left)	0	-	-	0	-	-	0	-	-
Blithbury Lane (west) (ahead)	76	-	-	85	-	-	85	-	-
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
Hadley Gt (left + right)	0	0.00	0	0	0	0	0	0	0
Blithbury Lane (east) (ahead)	43	-	-	48	-	-	48	-	-
Blithbury Lane (east) (right)	1	0.00	0	1	0	0	1	0	0
Blithbury Lane (west) (left)	1	-	-	1	-	-	1	-	-
Blithbury Lane (west) (ahead)	38	-	-	43	-	-	43	-	-

2.4.36 The conclusions drawn in paragraph 7.2.41 of the main TA are replaced by:

"The results show that this junction operates within capacity in the AM and PM peak hours."

A515 Lichfield Road/Common Lane/Shaw Lane

2.4.37 Table 122 of the main TA summarises the results of the junction capacity assessments with the original scheme in 2023. Table 122 in the main TA is replaced by Table 122 which is affected by changes to Phase One traffic.

2.4.38 Table 123 of the main TA summarises the results of the 2027 and 2041 future year junction capacity assessment and remains unchanged.

Table 122: Future baseline performance at existing A515 Lichfield Road/Common Lane/Shaw Lane junction (2023)

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
Common Lane (ahead + left + right)	0	0	0	0	0	0	7	0.02	0
A515 Lichfield Road (north) (ahead + left + right)	3	0	0	4	0.01	0	4	0.01	0
A515 Lichfield Road (north) (left)	2	-	-	2	-	-	2	-	-
A515 Lichfield Road (north) (ahead)	333	-	-	373	-	-	401	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
Shaw Lane (ahead + left + right)	7	0.02	0	8	0.02	0	8	0.02	0
A515 Lichfield Road (south) (ahead + left + right)	3	0.00	0	3	0.01	0	8	0.01	0
A515 Lichfield Road (south) (left)	2	-	-	2	-	-	2	-	-
A515 Lichfield Road (south) (ahead)	212	-	-	237	-	-	264	-	-
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
Common Lane (ahead + left + right)	0	0	0	0	0	0	8	0.02	0
A515 Lichfield Road (north) (ahead + left + right)	0	0	0	0	0	0	0	0	0
A515 Lichfield Road (north) (left)	2	-	-	2	-	-	2	-	-
A515 Lichfield Road (north) (ahead)	191	-	-	213	-	-	241	-	-
Shaw Lane (ahead + left + right)	8	0.02	0	9	0.02	0	9	0.02	0
A515 Lichfield Road (south) (ahead + left + right)	0	0	0	0	0	0	11	0.02	0
A515 Lichfield Road (south) (left)	4	-	-	4	-	-	4	-	-
A515 Lichfield Road (south) (ahead)	246	-	-	275	-	-	299	-	-

2.4.39 The conclusions drawn in paragraph 7.2.45 of the main TA are replaced by:

"The results show that the junction operates within capacity in the AM and PM peak hours."

A51 Birmingham Road/A5127 Birmingham Road/A461 Sainte Foy Avenue/A51 The Friary

2.4.40 Table 124 of the main TA summarises the results of the junction capacity assessments. Table 124 in the main TA is replaced by Table 124 below.

Table 124: Future baseline performance at A51 Birmingham Road/A5127 Birmingham Road/A461 Sainte Foy Avenue/A51 The Friary junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
A51 The Friary Road	808	0.59	2	892	0.65	2	916	0.66	2
A51 Birmingham Road	599	0.48	1	661	0.55	1	688	0.58	1

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
A5127 Birmingham Road	681	0.78	3	751	0.89	7	779	0.94	11
A461 Sainte Foy Ave	604	0.95	11	667	1.15	54	668	1.21	66
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
A51 The Friary Road	742	0.49	1	820	0.55	1	844	0.57	1
A51 Birmingham Road	842	0.67	2	930	0.77	3	935	0.78	4
A5127 Birmingham Road	643	0.94	11	710	1.14	55	731	1.18	67
A461 Sainte Foy Ave	440	0.66	2	486	0.74	3	486	0.74	3

2.4.41 The conclusions drawn in paragraph 7.2.47 of the main TA are replaced by:

"The result shows that this junction operates above capacity in the AM and the PM peak in the 2023 future baseline (with and without HS2 Phase One).

In the AM peak, the A461 Sainte Foy Avenue RFC value increases from 1.15 to 1.21 with a corresponding increase in queue from 54 to 66 PCUs as a result of the HS2 Phase One construction traffic . In the PM peak, the A5127 Birmingham Road RFC value increases from 1.14 to 1.18 with a corresponding increase in queue from 55 to 67 PCUs."

A515 Lichfield Road/Wood End Lane

2.4.42 A515 Lichfield Road/Wood End LaneTable 125 of the main TA summarises the results of the junction capacity assessments with the original scheme in 2023. Table 125 in the main TA is replaced by Table 125 below.

2.4.43 As the junction is affected by both construction and operation of the AP2 revised scheme, future baseline results are also presented for 2023 (with and without HS2 Phase One construction traffic), 2027 and 2041 in Table 125.1.

Table 125: Future baseline performance at A515 Lichfield Road/Wood End Lane junction (2023)

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
Wood End Lane (left)	100	0.17	0	112	0.21	0	112	0.22	0
Wood End Lane (right)	46	0.16	0	69	0.25	0	81	0.30	1
A515 Lichfield Road (south) (ahead + right)	356	0.58	2	418	0.68	3	434	0.71	3
A515 Lichfield Road (south) (ahead)	81	-	-	72	-	-	76	-	-
A515 Lichfield Road (north) (left)	112	-	-	168	-	-	180	-	-
A515 Lichfield Road (north) (ahead)	237	-	-	267	-	-	287	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
Wood End Lane (left)	339	0.57	1	379	0.68	2	379	0.70	2
Wood End Lane (right)	97	0.27	0	140	0.43	1	152	0.48	1
A515 Lichfield Road (south) (ahead + right)	136	0.21	0	157	0.24	0	164	0.25	1
A515 Lichfield Road (south) (ahead)	131	-	-	143	-	-	159	-	-
A515 Lichfield Road (north) (left)	39	-	-	60	-	-	71	-	-
A515 Lichfield Road (north) (ahead)	162	-	-	182	-	-	204	-	-

Table 125.1: Future baseline performance at A515 Lichfield Road/Wood End Lane junction (2027 and 2041)

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2027 AM			**2041 AM**		
Wood End Lane (left)	116	0.22	0	130	0.25	0
Wood End Lane (right)	71	0.27	0	78	0.32	1
A515 Lichfield Road (south) (ahead + right)	441	0.72	3	516	0.84	6
A515 Lichfield Road (south) (ahead)	68	-	-	52	-	-
A515 Lichfield Road (north) (left)	173	-	-	188	-	-
A515 Lichfield Road (north) (ahead)	278	-	-	310	-	-
	2027 PM			**2041 PM**		
Wood End Lane (left)	394	0.71	2	439	0.82	4
Wood End Lane (right)	145	0.46	1	158	0.60	2
A515 Lichfield Road (south) (ahead + right)	166	0.25	1	192	0.29	1
A515 Lichfield Road (south) (ahead)	146	-	-	156	-	-
A515 Lichfield Road (north) (left)	61	-	-	66	-	-
A515 Lichfield Road (north) (ahead)	189	-	-	211	-	-

2.4.44 The conclusions drawn in paragraph 7.2.49 of the main TA are replaced by:

"The results show that this junction operates within capacity in the 2023 future baseline in the AM and PM peak periods and that the inclusion of the HS2 Phase One

construction traffic results in the junction approaching capacity. It should be noted that there is no substantial impact at this junction as a result of HS2 Phase One."

2.4.45 The conclusions drawn in paragraph 7.2.49 of the main TA are also supplemented by:

"The results show that the junction is approaching capacity in the 2027 and 2041 future year baseline in the AM and PM peak periods. By 2041 the A515 Lichfield Road (south) has an RFC value of 0.84 and queue of six PCUs in the AM peak and the Wood End Lane has an RFC of 0.82 and a queue of four PCUs in the PM peak."

A513 Rugeley Road/A515 Lichfield Road/A515 Tewnalls Lane

2.4.46 Table 126 of the main TA summarises the results of the junction capacity assessments. Table 126 in the main TA is replaced by Table 126 below.

Table 126: Future baseline performance at A513 Rugeley Road/A515 Lichfield Road/A515 Tewnalls Lane junction

Approach	**Flow, PCU/hr**	**RFC**	**Q, PCU**	**Flow, PCU/hr**	**RFC**	**Q, PCU**	**Flow, PCU/hr**	**RFC**	**Q, PCU**
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
A513 Rugeley Road (left + right)	408	0.64	2	457	0.73	3	475	0.79	4
A515 Lichfield Road (north) (ahead + right)	425	0.59	2	504	0.68	3	508	0.69	3
A515 Lichfield Road (north) (ahead)	136	-	-	124	-	-	123	-	-
A515 Tewnalls Lane (left)	14	-	-	16	-	-	34	-	-
A515 Tewnalls Lane (ahead)	205	-	-	229	-	-	237	-	-
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
A513 Rugeley Road (left + right)	243	0.37	1	272	0.42	1	298	0.48	1
A515 Lichfield Road (north) (ahead + right)	526	0.8	4	612	0.92	10	612	0.93	11
A515 Lichfield Road (north) (ahead)	49	-	-	30	-	-	30	-	-
A515 Tewnalls Lane (left)	45	-	-	50	-	-	50	-	-
A515 Tewnalls Lane (ahead)	206	-	-	230	-	-	230	-	-

2.4.47 The conclusions drawn in paragraph 7.2.51 of the main TA are replaced by:

"The results show that this junction is approaching capacity in the AM peak and at capacity in the PM peak in the 2023 baseline (with and without HS2 Phase One). The A515 (north) Lichfield Road arm has an RFC value of 0.92 and 0.93 and a corresponding queue length of 10 and 11 PCUs in the PM peak baseline and with the inclusion of HS2 Phase One respectively.

It should be noted that there is no substantial impact at this junction as a result of HS2 Phase One."

B5014 Lichfield Road/A515 Tewnalls Lane

2.4.48 Table 127 of the main TA summarises the results of the junction capacity assessments. Table 127 in the main TA is replaced by Table 127 below.

Table 127: Future baseline performance at B5014 Lichfield Road/A515 Tewnalls Lane junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
B5014 Lichfield Road (left)	178	0.96	6	208	1.19	22	208	1.23	24
B5014 Lichfield Road (right)	329	0.94	9	388	1.18	39	388	1.21	40
A515 Tewnalls Lane (north) (ahead + right)	92	0.13	0	118	0.17	0	123	0.18	0
A515 Tewnalls Lane (north) (ahead)	303	-	-	318	-	-	336	-	-
A515 Tewnalls Lane (south) (left)	145	-	-	170	-	-	170	-	-
A515 Tewnalls Lane (south) (ahead)	316	-	-	344	-	-	368	-	-
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
B5014 Lichfield Road (left)	56	0.13	0	66	0.16	0	66	0.17	0
B5014 Lichfield Road (right)	149	0.47	1	173	0.59	1	173	0.61	2
A515 Tewnalls Lane (north) (ahead + right)	294	0.46	1	359	0.56	2	376	0.57	2
A515 Tewnalls Lane (north) (ahead)	180	-	-	167	-	-	173	-	-
A515 Tewnalls Lane (south) (left)	303	-	-	353	-	-	353	-	-
A515 Tewnalls Lane (south) (ahead)	254	-	-	276	-	-	300	-	-

2.4.49 The conclusions drawn in paragraph 7.2.53 of the main TA are replaced by:

"The results show that this junction is operating above capacity in the AM peak, with an RFC value of 1.19 and a corresponding queue length of 61 PCUs on the B5014 Lichfield Road arm, across two lanes, in 2023. With the addition of HS2 Phase One construction traffic, the maximum RFC value increases to 1.23 and the queue to 64 PCUs over two lanes. It should be noted that there is no substantial impact at this junction as a result of HS2 Phase One.

In the PM peak, the junction operates within capacity and with minimal queuing in the 2023 baseline (with and without HS2 Phase One)."

B5014 Uttoxeter Road/A513 Kings Bromley Lane/A513 Uttoxeter Road

2.4.50 Table 128 of the main TA summarises the results of the junction capacity assessments. Table 128 in the main TA is replaced by Table 128 below.

Table 128: Future baseline performance at B5014 Uttoxeter Road/A513 Kings Bromley Lane/A513 Uttoxeter Road junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
A513 Kings Bromley Lane (left)	232	0.36	1	261	0.42	1	279	0.45	1
A513 Kings Bromley Lane (right)	47	0.14	0	53	0.17	0	53	0.18	0
A513 Uttoxeter Road (ahead + right)	380	0.65	2	439	0.76	3	462	0.80	4
A513 Uttoxeter Road (ahead)	42	-	-	35	-	-	31	-	-
B5014 Uttoxeter Road (left)	95	-	-	114	-	-	114	-	-
B5014 Uttoxeter Road (ahead)	149	-	-	179	-	-	178	-	-
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
A513 Kings Bromley Lane (left)	344	0.52	1	387	0.6	2	404	0.63	2
A513 Kings Bromley Lane (right)	77	0.2	0	94	0.26	0	94	0.28	0
A513 Uttoxeter Road (ahead + right)	249	0.4	1	291	0.46	1	313	0.50	1
A513 Uttoxeter Road (ahead)	67	-	-	75	-	-	71	-	-
B5014 Uttoxeter Road (left)	31	-	-	35	-	-	35	-	-
B5014 Uttoxeter Road (ahead)	71	-	-	80	-	-	80	-	-

2.4.51 The conclusions drawn in paragraph 7.2.55 of the main TA are replaced by:

> "The results show that this junction is approaching capacity in the AM peak and within capacity in the PM peak with minimal queuing on all approaches. The A513 Uttoxeter Road arm is approaching capacity in the AM peak at 2023 both with and without HS2 Phase One construction traffic with an RFC of 0.76 and 0.80 and corresponding queues of three and four PCUs respectively. It should be noted that there is no substantial impact at this junction as a result of HS2 Phase One."

B5014 Uttoxeter Road/Blithbury Road

2.4.52 Table 129 of the main TA summarises the results of the junction capacity assessmentsin 2023. Table 129 in the main TA is replaced by Table 129 below.

2.4.53 As the junction is affected by both construction and operation of the AP2 revised scheme, future baseline results are also presented for 2027 and 2041 in Table 129.1 below.

Table 129: Future baseline performance at B5014 Uttoxeter Lichfield Road/Blithbury Road junction (2023)

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
Blithbury Road (east) (ahead + left + right)	34	0.06	0	46	0.09	0	46	0.09	0
B5014 Uttoxeter Road (north) (left)	4	-	-	16	-	-	16	-	-
B5014 Uttoxeter Road (north) (ahead)	75	-	-	84	-	-	84	-	-
B5014 Uttoxeter Road (north) (right)	18	-	-	20	-	-	20	-	-
B5014 Uttoxeter Road (north) (ahead + right)	39	0.06	0	45	0.07	0	45	0.07	0
B5014 Uttoxeter Road (north) (ahead)	78	-	-	91	-	-	91	-	-
Blithbury Road (west) (ahead + left + right)	75	0.12	0	85	0.14	0	85	0.14	0
B5014 Uttoxeter Road (south) (left)	2	-	-	2	-	-	2	-	-
B5014 Uttoxeter Road (south) (ahead)	59	-	-	66	-	-	66	-	-
B5014 Uttoxeter Road (south) (right)	15	-	-	29	-	-	29	-	-
B5014 Uttoxeter Road (south) (ahead + right)	65	0.11	0	90	0.15	0	90	0.15	0
B5014 Uttoxeter Road (south) (ahead)	77	-	-	82	-	-	82	-	-
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
Blithbury Road (east) (ahead + left + right)	29	0.05	0	47	0.08	0	47	0.08	0
B5014 Uttoxeter Road (north) (left)	7	-	-	9	-	-	9	-	-
B5014 Uttoxeter Road (north) (ahead)	43	-	-	48	-	-	48	-	-
B5014 Uttoxeter Road (north) (right)	28	-	-	31	-	-	31	-	-
B5014 Uttoxeter Road (north) (ahead + right)	51	0.09	0	59	0.10	0	59	0.10	0
B5014 Uttoxeter Road (north) (ahead)	45	-	-	55	-	-	55	-	-
Blithbury Road (west) (ahead + left + right)	45	0.07	0	50	0.08	0	50	0.08	0
B5014 Uttoxeter Road (south) (left)	6	-	-	7	-	-	7	-	-
B5014 Uttoxeter Road (south) (ahead)	60	-	-	67	-	-	67	-	-
B5014 Uttoxeter Road (south) (right)	2	-	-	3	-	-	3	-	-
B5014 Uttoxeter Road (south) (ahead + right)	21	0.03	0	25	0.04	0	25	0.04	0
B5014 Uttoxeter Road (south) (ahead)	81	-	-	91	-	-	91	-	-

Table 129.1: Future baseline performance at B5014 Uttoxeter Lichfield Road/Blithbury Road junction (2027 and 2041)

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2027 AM			**2041 AM**		
Blithbury Road (east) (ahead + left + right)	48	0.09	0	53	0.10	0
B5014 Uttoxeter Road (north) (left)	17	-	-	17	-	-
B5014 Uttoxeter Road (north) (ahead)	88	-	-	99	-	-
B5014 Uttoxeter Road (north) (right)	21	-	-	24	-	-
B5014 Uttoxeter Road (north) (ahead + right)	47	0.07	0	54	0.09	0
	2027 AM			**2041 AM**		
B5014 Uttoxeter Road (north) (ahead)	94	-	-	104	-	-
Blithbury Road (west) (ahead + left + right)	89	0.15	0	100	0.17	0
B5014 Uttoxeter Road (south) (left)	2	-	-	3	-	-
B5014 Uttoxeter Road (south) (ahead)	69	-	-	78	-	-
B5014 Uttoxeter Road (south) (right)	30	-	-	32	-	-
B5014 Uttoxeter Road (south) (ahead + right)	94	0.15	0	106	0.17	0
B5014 Uttoxeter Road (south) (ahead)	85	-	-	94	-	-
	2027 AM			**2041 PM**		
Blithbury Road (east) (ahead + left + right)	48	0.08	0	53	0.09	0
B5014 Uttoxeter Road (north) (left)	9	-	-	10	-	-
B5014 Uttoxeter Road (north) (ahead)	50	-	-	58	-	-
B5014 Uttoxeter Road (north) (right)	33	-	-	38	-	-
B5014 Uttoxeter Road (north) (ahead + right)	62	0.11	0	73	0.12	0
B5014 Uttoxeter Road (north) (ahead)	57	-	-	64	-	-
Blithbury Road (west) (ahead + left + right)	53	0.09	0	61	0.10	0
B5014 Uttoxeter Road (south) (left)	7	-	-	8	-	-
B5014 Uttoxeter Road (south) (ahead)	70	-	-	81	-	-
B5014 Uttoxeter Road (south) (right)	3	-	-	4	-	-
B5014 Uttoxeter Road (south) (ahead + right)	26	0.04	0	30	0.05	0

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2027 AM			**2041 PM**		
B5014 Uttoxeter Road (south) (ahead)	95	-	-	109	-	-

2.4.54 The conclusions drawn in paragraph 7.2.57 of the main TA are replaced by:

"The results show that this junction operates within capacity in 2023 baseline (with and without HS2 Phase One) in the AM and PM peak hours."

2.4.55 The conclusions drawn in paragraph 7.2.57 of the main TA are also supplemented by:

"The results show that this junction operates within capacity in 2027 and 2041 baseline in the AM and PM peak hours."

A51 (from Bardy Lane to Stafford Road)/Borough Lane

2.4.56 Table 130 of the main TA summarises the results of the junction capacity assessments. Table 130 in the main TA is replaced by Table 130 below.

Table 130: Future baseline performance at A51 from Bardy Lane to Stafford Road/Borough Lane junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
Borough Lane (left + right)	181	0.79	3	178	0.76	3	178	0.78	3
A51 from Bardy Lane To Stafford Road (north) (ahead)	1132	-	-	1117	-	-	1125	-	-
A51 from Bardy Lane To Stafford Road (north) (right)	54	0.11	0	53	0.11	0	53	0.11	0
A51 from Bardy Lane To Stafford Road (south) (left)	27	-	-	27	-	-	27	-	-
A51 from Bardy Lane To Stafford Road (south) (ahead)	624	-	-	616	-	-	624	-	-
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
Borough Lane (left + right)	69	0.39	1	68	0.36	1	68	0.37	1
A51 from Bardy Lane To Stafford Road (north) (ahead)	700	-	-	693	-	-	701	-	-
A51 from Bardy Lane To Stafford Road (north) (right)	64	0.18	0	63	0.17	0	63	0.17	0
A51 from Bardy Lane To Stafford Road (south) (left)	84	-	-	83	-	-	83	-	-
A51 from Bardy Lane To Stafford Road (south) (ahead)	1048	-	-	1025	-	-	1033	-	-

2.4.57 The conclusions drawn in paragraph 7.2.59 of the main TA are replaced by:

"The results show that this junction is approaching capacity in 2023 baseline (with and without HS2 Phase One) in the AM peak and within capacity (with and without Phase One) in the PM peak.

The Borough Lane arm RFC value increases from 0.76 to 0.78 with the same queue of three PCUs with the addition of the HS2 Phase One construction traffic in the AM peak. It should be noted that there is no substantial impact at this junction as a result of HS2 Phase One."

A51 Breretonhill/Breretonhill Lane

2.4.58 Table 131 of the main TA summarises the results of the junction capacity assessments. Table 131 in the main TA is replaced by Table 131 below.

Table 131: Future baseline performance at A51 Breretonhill/Breretonhill Lane junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
Breretonhill Lane (left + right)	114	0.54	1	125	0.69	2	125	0.71	2
A51 Breretonhill (west) (ahead)	926	-	-	1013	-	-	1021	-	-
A51 Breretonhill (west) (right)	16	0.03	0	17	0.04	0	17	0.04	0
A51 Breretonhill (east) (left)	41	-	-	45	-	-	45	-	-
A51 Breretonhill (east) (ahead)	638	-	-	697	-	-	705	-	-
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
Breretonhill Lane (left + right)	43	0.23	0	47	0.35	1	47	0.36	1
A51 Breretonhill (west) (ahead)	647	-	-	708	-	-	716	-	-
A51 Breretonhill (west) (right)	0	0	0	28	0.09	0	18	0.09	0
A51 Breretonhill (east) (left)	113	-	-	124	-	-	124	-	-
A51 Breretonhill (east) (ahead)	988	-	-	1081	-	-	1089	-	-

2.4.59 The conclusions drawn in paragraph 7.2.61 of the main TA are replaced by:

"The results show that this junction operates within capacity in the AM and PM peak hours with minimal queuing."

B5013 Colton Road/Blithbury Road

2.4.60 Table 132 of the main TA summarises the results of the junction capacity assessments. Table 132 in the main TA is replaced by Table 132 below.

Table 132: Future baseline performance at B5013 Colton Road/Blithbury Road junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
Blithbury Road (left + right)	94	0.16	0	99	0.17	0	99	0.17	0
B5013 Colton Road (south) (ahead + right)	179	0.27	1	195	0.29	1	195	0.29	1
B5013 Colton Road (south) (ahead)	201	-	-	207	-	-	207	-	-
B5013 Colton Road (north-west) (left)	10	-	-	11	-	-	11	-	-
B5013Colton Road (north-west) (ahead)	353	-	-	373	-	-	373	-	-
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
Blithbury Road (left + right)	112	0.19	0	119	0.20	0	119	0.20	0
B5013 Colton Road (south) (ahead + right)	92	0.14	0	100	0.15	0	100	0.15	0
B5013 Colton Road (south) (ahead)	217	-	-	228	-	-	228	-	-
B5013 Colton Road (north-west) (left)	3	-	-	3	-	-	3	-	-
B5013Colton Road (north-west) (ahead)	361	-	-	382	-	-	382	-	-

2.4.61 The conclusions drawn in paragraph 7.2.63 of the main TA are replaced by:

"The results show that this junction operates within capacity in the AM and PM peak hours."

B5013 Colton Road/Bellamour Way

2.4.62 Table 133 of the main TA summarises the results of the junction capacity assessments. Table 133 in the main TA is replaced by Table 133 below.

Table 133: Future baseline performance at B5013 Colton Road/Bellamour Way junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
Bellamour Way (left)	87	0.14	0	95	0.16	0	95	0.16	0
Bellamour Way (right)	39	0.1	0	43	0.11	0	43	0.11	0
B5013 Colton Road (south) (ahead + right)	87	0.14	0	99	0.16	0	99	0.16	0
B5013 Colton Road (south) (ahead)	167	-	-	179	-	-	179	-	-
B5013 Colton Road (north-	28	-	-	31	-	-	31	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
west) (left)									
B5013 Colton Road (north-west) (ahead)	268	-	-	293	-	-	293	-	-
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
Bellamour Way (left)	39	0.06	0	43	0.07	0	43	0.07	0
Bellamour Way (right)	11	0.03	0	12	0.03	0	12	0.03	0
B5013 Colton Road (south) (ahead + right)	67	0.11	0	76	0.12	0	76	0.12	0
B5013 Colton Road (south) (ahead)	180	-	-	194	-	-	194	-	-
B5013 Colton Road (north-west) (left)	24	-	-	26	-	-	26	-	-
B5013 Colton Road (north-west) (ahead)	301	-	-	330	-	-	330	-	-

2.4.63 The conclusions drawn in paragraph 7.2.65 of the main TA are replaced by:

"The results show that this junction operates within capacity in the AM and PM peak hours."

A5192 Cappers Lane/A38 (T) Rykneld Street slip road (south-bound)

2.4.64 Table 134 of the main TA summarises the results of the junction capacity assessments. Table 134 in the main TA is replaced by Table 134 below.

Table 134: Future baseline performance at A5192 Cappers Lane/A38 (T) Rykneld Street slip road (south-bound) junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
A38 slip road (south-bound) (left + right)	0	0	0	0	0	0	12	0.02	0
A5192 Cappers Lane (west) (ahead + right)	507	0.81	5	518	0.82	5	572	0.89	8
A5192 Cappers Lane (west) (ahead)	35	-	-	34	-	-	33	-	-
A5192 Cappers Lane (east) (left)	52	-	-	53	-	-	59	-	-
A5192 Cappers Lane (east) (ahead)	135	-	-	137	-	-	185	-	-
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
A38 slip road (south-bound) (left + right)	0	0	0	0	0	0	12	0.02	0
A5192 Cappers Lane (west)	556	0.84	6	568	0.86	6	628	0.93	11

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
(ahead + right)									
A5192 Cappers Lane (west) (ahead)	41	-	-	39	-	-	33	-	-
A5192 Cappers Lane (east) (left)	26	-	-	26	-	-	32	-	-
A5192 Cappers Lane (east) (ahead)	130	-	-	132	-	-	180	-	-

2.4.65 The conclusions drawn in paragraph 7.2.67 of the main TA are replaced by:

"The results show that this junction is close to capacity in the 2023 baseline (with and without HS2 Phase One) in the AM peak and close to capacity in the PM peak without HS2 Phase One. The addition of the HS2 Phase One construction traffic results in the junction operating at capacity in the PM peak.

The A5192 Cappers Lane arm RFC value increases from 0.86 to 0.93 and a corresponding increase in queue from six to 11 PCUs with the addition of the HS2 Phase One construction traffic in the PM peak."

A5192 Cappers Lane/A38 (T) Rykneld Street slip road (north bound)

2.4.66 Table 135 of the main TA summarises the results of the junction capacity assessments. Table 135 in the main TA is replaced by Table 135 below.

Table 135: Future baseline performance at A5192 Cappers Lane/A38 (T) Rykneld Street slip road (north bound) junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
A38 slip road (north bound) (left)	426	0.64	2	433	0.65	2	433	0.67	2
A38 slip road (north bound) (right)	32	0.07	0	33	0.07	0	62	0.14	0
A5192 Cappers Lane (west) (ahead)	509	-	-	517	-	-	533	-	-
A5192 Cappers Lane (west) (right)	0	0	0	0	0	0	0	0	0
A5192 Cappers Lane (east) (left)	0	-	-	0	-	-	29	-	-
A5192 Cappers Lane (east) (ahead)	133	-	-	135	-	-	151	-	-
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
A38 slip road (north bound) (left)	373	0.57	1	379	0.58	1	379	0.59	2
A38 slip road (north bound) (right)	51	0.11	0	52	0.12	0	63	0.14	0
A5192 Cappers Lane (west) (ahead)	543	-	-	552	-	-	566	-	-
A5192 Cappers Lane (west) (right)	0	0	0	0	0	0	0	0	0

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
A5192 Cappers Lane (east) (left)	0	-	-	0	-	-	11	-	-
A5192 Cappers Lane (east) (ahead)	129	-	-	131	-	-	146	-	-

2.4.67 The conclusions drawn in paragraph 7.2.69 of the main TA are replaced by:

"The results show that this junction operates within capacity in the AM and PM peak hours with minimal queuing."

A5192 Eastern Avenue/Stafford Road

2.4.68 Table 136 of the main TA summarises the results of the junction capacity assessments. Table 136 in the main TA is replaced by Table 136 below.

Table 136: Future baseline performance at A5192 Eastern Avenue/Stafford Road junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
Stafford Road (left + right)	172	0.38	1	197	0.44	1	197	0.44	1
Stafford Road (ahead)	657	-	-	672	-	-	679	-	-
A5192 Eastern Ave (west) (right)	227	0.35	1	278	0.43	1	278	0.43	1
A5192 Eastern Ave (west) (left)	105	-	-	107	-	-	107	-	-
A5192 Eastern Ave (east) (ahead)	349	-	-	357	-	-	364	-	-
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
Stafford Road (left + right)	237	0.51	1	279	0.60	2	279	0.60	2
Stafford Road (ahead)	370	-	-	377	-	-	384	-	-
A5192 Eastern Ave (west) (right)	112	0.18	0	135	0.22	0	135	0.22	0
A5192 Eastern Ave (west) (left)	115	-	-	117	-	-	117	-	-
A5192 Eastern Ave (east) (ahead)	501	-	-	510	-	-	517	-	-

2.4.69 The conclusions drawn in paragraph 7.2.71 of the main TA are replaced by:

"The results show that this junction operates within capacity in the AM and PM peak hours with minimal queuing."

Wood End Lane/A38(T) Rykneld Street slip road (south-bound) (Hilliards Cross junction)

2.4.70 Table 137 in the main TA summarised the future year baseline operation of the priority junction that existed at the time of publication for the original scheme. Since the publication of the main TA, the following capacity improvements have been implemented:

- Wood End Lane east-bound movement flared to two lanes at the junction with junction with a dedicated right turning lane and a separate straight-ahead lane; and
- left turn filter lane from the A38(T) Rykneld Street slip road feeding two west-bound lanes on Wood End Lane.

2.4.71 Table 137 in the main TA is replaced by Table 137 below, which summarises the future year baseline performance of the current junction arrangement.

Table 137: Future baseline performance at Wood End Lane/A38(T) Rykneld Street slip road (Hilliards Cross junction existing 2018 layout)

Approach	**Flow, PCU/hr**	**RFC**	**Q, PCU**	**Flow, PCU/hr**	**RFC**	**Q, PCU**	**Flow, PCU/hr**	**RFC**	**Q, PCU**
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
A38(T) Rykneld Street slip road (south-bound) (left)	-	-	-	290	-	-	322	0.68	2
A38(T) Rykneld Street slip road (south-bound) (right)	-	-	-	41	0.15	0	70	0.29	1
Wood End Lane (west) (ahead)	-	-	-	208	-	-	243		
Wood End Lane (west) (right)	-	-	-	491	1.06	27	523	1.15	48
Wood End Lane (east) (left)	-	-	-	26	-	-	55	-	-
Wood End Lane (east) (ahead)	-	-	-	706	-	-	741	-	-
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
A38(T) Rykneld Street slip road (south-bound) (left)	-	-	-	222	-	-	257	0.51	1
A38(T) Rykneld Street slip road (south-bound) (right)	-	-	-	23	0.09	0	58	0.28	1
Wood End Lane (west) (ahead)	-	-	-	240	-	-	272		
Wood End Lane (west) (right)	-	-	-	620	1.26	84	655	1.36	125
Wood End Lane (east) (left)	-	-	-	23	-	-	58	-	-
Wood End Lane (east) (ahead)	-	-	-	523	-	-	555	-	-

2.4.72 The conclusions drawn in paragraphs 7.2.73 and 7.2.75 of the main TA are replaced by:

"The results show that this junction operates over capacity in 2023 baseline in the AM and PM peak periods (with and without HS2 Phase One), with the Wood End Lane (west) arm right turn showing an RFC of 1.06 and a queue length of 27 PCUs (without HS2 Phase One) which increases to 1.15 and 48 PCUs (with HS2 Phase One) in the AM Peak. In the PM peak, the RFC value increases from 1.26 to 1.36 and the queue increases from 84 to 125 PCUs with HS2 Phase One.

A mitigation scheme to signalise this junction is proposed and identified in the HS2 Phase One Supplementary Environmental Statement 3 and AP4 Environmental Statement[10] and referred to as the BR2 layout and incorporates the following additional features to those already implemented:

- implementation of signal control;
- Wood End Lane west-bound to be flared to two lanes at the junction with the kerbside lane reserved for left turn and straight-ahead movements and the offside lane reserved for straight ahead movements only; and
- left turn only from the A38(T) Rykneld Street slip road (right turn movement allowed in the existing layout)."

2.4.73 Table 138 of the main TA summarises the results of the junction capacity assessments. Table 138 in the main TA is replaced by Table 138 below that includes the BR2 layout.

Table 138: Future baseline performance at Wood End Lane/A38(T) Rykneld Street slip road (Hilliards Cross junction) BR2 layout

Approach	Flow, PCU/hr	DoS	Q, PCU	Flow, PCU/hr	DoS	Q, PCU
	2023 AM			**2023 with Prologis and Phase One**		
Wood End Lane (east) (left + ahead)	732	52%	5	796	56%	6
slip road (left)	331	47%	5	334	48%	5
Wood End Lane (west) (ahead + right)	394	52%	6	433	56%	7
Wood End Lane (west) (right)	346	50%	6	374	54%	6
	2023 PM			**2023 with Prologis and Phase One**		
Wood End Lane (east) (left + ahead)	546	47%	4	613	52%	5
slip road (left)	245	26%	3	256	28%	3
Wood End Lane (west) (ahead + right)	467	47%	6	509	52%	7
Wood End Lane (west) (right)	416	45%	6	446	49%	6

2.4.74 The conclusions drawn in paragraph 7.2.77 of the main TA are replaced by:

"The results show that the proposed BR2 junction layout operates within capacity in the 2023 baseline in the AM and PM peak periods, with minimal queuing on all approaches with HS2 Phase One construction traffic and the additional Prologis development traffic. The results indicate that the proposed BR2 layout mitigates both HS2 Phase One construction and Prologis development traffic."

A5192 Eastern Avenue/A51 Stafford Road/A51 Western Bypass

2.4.75 Table 139 of the main TA summarises the results of the junction capacity assessments. Table 139 in the main TA is replaced by Table 139 below.

[10] HS2 Ltd (2015), *High Speed Two (London – West Midlands) Supplementary Environmental Statement 3 and Additional Provision 4 Environmental Statement: Volume 5: Appendix TR-001-000,* https://www.gov.uk/government/collections/supplementary-environmental-statement-3-and-additional-provision-4-supplementary-environmental-information

Table 139: Future baseline performance at A5192 Eastern Avenue/A51 Stafford Road/A51 Western Bypass junction

Approach	Flow, PCU/hr	DoS	MMQ, PCU	Flow, PCU/hr	DoS	MMQ, PCU	Flow, PCU/hr	DoS	MMQ, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
Exit Road from Innkeeper's Lodge Lichfield hotel	4	2%	0	12	7%	0	12	7%	0
A51 Western Bypass (south) ahead, right turn	911	87%	12	1017	97%	19	1042	97%	19
A5192 Eastern Ave (east) right turn	272	80%	8	298	94%	12	305	96%	14
A5192 Eastern Ave (east) left turn	153	19%	2	181	23%	3	181	23%	3
A51 Stafford Road (north) ahead	830	94%	17	902	98%	22	927	101%	29
A51 Stafford Road (north) left turn	580	83%	9	634	93%	13	641	94%	14
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
Exit Road from Innkeeper's Lodge Lichfield hotel	7	4%	0	21	13%	1	21	13%	1
A51 Western Bypass (south) ahead, right turn	1054	83%	21	1142	90%	26	1167	92%	28
A5192 Eastern Ave (east) right turn	406	83%	12	436	89%	14	443	91%	15
A5192 Eastern Ave (east) left turn	240	26%	3	281	35%	5	281	35%	5
A51 Stafford Road (north) ahead	583	102%	15	630	72%	8	655	74%	9
A51 Stafford Road (north) left turn	302	40%	3	325	41%	3	332	42%	3

2.4.76 The conclusions drawn in paragraphs 7.2.79 and 7.2.80 of the main TA are replaced by:

"The results show that this junction operates at capacity in the 2023 baseline in the AM and PM peak periods without the HS2 Phase One construction traffic. The junction continues to operate at capacity in the PM peak and above capacity in the AM peak with the addition of the HS2 Phase One construction traffic.

The A51 Stafford Road (north) arm degree of saturation (DoS) value increases from 98% to 101% and a corresponding increase in queue from 22 to 29 PCUs with the addition of the HS2 Phase One construction traffic in the AM peak.

Given that the junction already operates at capacity and the limited increases in RFC and queueing, there is no substantial impact at this junction as a result of HS2 Phase One."

B5014 Uttoxeter Road/Common Lane

2.4.77 This junction is included as it was assessed as a result of the AP1 revised scheme. The future year baseline junction performance results for the AM and PM peak hours are shown in Table 139.1.

Table 139.1: Future baseline performance at B5014 Uttoxeter Road/Common Lane junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
Common Lane (left + right)	30	0.05	0	34	0.06	0	34	0.06	0
B5014 Uttoxeter Road (south) (ahead + right)	22	0.04	0	25	0.04	0	25	0.04	0
B5014 Uttoxeter Road (south) (ahead)	132	-	-	148	-	-	148	-	-
B5014 Uttoxeter Road (north) (left)	0	-	-	0	-	-	0	-	-
B5014 Uttoxeter Road (north) (ahead)	215	-	-	242	-	-	242	-	-
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
Common Lane (left + right)	20	0.03	0	22	0.04	0	22	0.04	0
B5014 Uttoxeter Road (south) (ahead + right)	26	0.04	0	31	0.05	0	31	0.05	0
B5014 Uttoxeter Road (south) (ahead)	162	-	-	181	-	-	181	-	-
B5014 Uttoxeter Road (north) (left)	3	-	-	3	-	-	3	-	-
B5014 Uttoxeter Road (north) (ahead)	84	-	-	94	-	-	94	-	-

2.4.78 The results show that the junction operates within capacity in the 2023 baseline (with and without HS2 Phase One) in the AM and PM peak hours.

Common Lane/Pipe Lane

2.4.79 This junction is included as it was assessed as a result of the AP1 revised scheme. The future year baseline junction performance results for the AM and PM peak hours are shown in Table 139.2.

Table 139.2: Future baseline performance at Common Lane/Pipe Lane junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
Pipe Lane (west) (ahead + right)	15	0.03	0	17	0.03	0	17	0.03	0
Pipe Lane (east) (left)	2	0	0	2	0	0	2	0	0
Pipe Lane (east) (left)	22	-	-	25	-	-	25	-	-
Common Lane (left)	5	-	-	6	-	-	6	-	-
Common Lane (ahead)	11	-	-	12	-	-	12	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
Pipe Lane (west) (ahead + right)	5	0.01	0	6	0.01	0	6	0.01	0
Pipe Lane (east) (left)	5	0.01	0	6	0.01	0	6	0.01	0
Pipe Lane (east) (left)	16	-	-	18	-	-	18	-	-
Common Lane (left)	0	-	-	0	-	-	0	-	-
Common Lane (ahead)	22	-	-	25	-	-	25	-	-

2.4.80 The results show that the junction operates within capacity in the 2023 baseline (with and without HS2 Phase One) in the AM and PM peak hours.

Wood End Lane/Netherstowe Lane

2.4.81 The future year baseline junction performance results for the AM and PM peak hours are shown in Table 139.3 below.

Table 139.3: Future baseline performance at Wood End Lane/Netherstowe Lane junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2018 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
Netherstowe Lane (left)	1	0	0	1	0	0	1	0	0
Netherstowe Lane (right)	7	0.02	0	7	0.02	0	7	0.02	0
Wood End Lane (west) (ahead + right)	11	0.02	0	13	0.02	0	15	0.02	0
Wood End Lane (west) (ahead)	391	-	-	417	-	-	491	-	-
Wood End Lane (east) (left)	17	-	-	18	-	-	18	-	-
Wood End Lane (east) (ahead)	222	-	-	237	-	-	313	-	-
	2018 AM			**2023 PM**			**2023 future baseline with Phase One – PM**		
Netherstowe Lane (left)	9	0.02	0	10	0.02	0	10	0.02	0
Netherstowe Lane (right)	12	0.04	0	13	0.04	0	13	0.04	0
Wood End Lane (west) (ahead + right)	4	0.01	0	5	0.01	0	5	0.01	0
Wood End Lane (west) (ahead)	205	-	-	218	-	-	289	-	-
Wood End Lane (east) (left)	18	-	-	19	-	-	19	-	-
Wood End Lane (east) (ahead)	464	-	-	495	-	-	566	-	-

2.4.82 The results show that this junction operates within capacity in the AM and PM peak hours.

Wood End Lane/Watery Lane

2.4.83 The future year baseline junction performance results for the AM and PM peak hours are shown in Table 139.4 below.

Table 139.4: Future baseline performance at Wood End Lane/Netherstowe Lane junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2018 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
Watery Lane (left)	41	0.07	0	44	0.08	0	44	0.08	0
Watery Lane (right)	84	0.20	0	90	0.22	0	90	0.24	0
Wood End Lane (west) (ahead + right)	147	0.21	0	163	0.24	1	187	0.26	1
Wood End Lane (west) (ahead)	256	-	-	268	-	-	320	-	-
Wood End Lane (east) (left)	83	-	-	89	-	-	89	-	-
Wood End Lane (east) (ahead)	140	-	-	150	-	-	226	-	-
	2018 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
Watery Lane (left)	72	0.14	0	77	0.15	0	77	0.15	0
Watery Lane (right)	72	0.19	0	77	0.20	0	77	0.22	0
Wood End Lane (west) (ahead + right)	60	0.12	0	66	0.13	0	76	0.14	0
Wood End Lane (west) (ahead)	123	-	-	129	-	-	190	-	-
Wood End Lane (east) (left)	100	-	-	107	-	-	107	-	-
Wood End Lane (east) (ahead)	371	-	-	396	-	-	467	-	-

2.4.84 The results show that this junction operates within capacity in the AM and PM peak hours and minimal queuing.

A51 from Bardy Lane to Stafford Road/Brook End Lane/High Street

2.4.85 The future year baseline junction performance results for the AM and PM peak hours are shown in Table 139.5 below.

Table 139.5: Future baseline performance at A51 from Bardy Lane to Stafford Road/Brook End Lane/High Street junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2018 AM			**2023 AM**			**2023 future baseline with Phase One – AM**		
Brook End Lane (ahead + left)	55	0.13	0	58	0.14	0	58	0.14	0
Brook End Lane (ahead + right)	34	0.11	0	35	0.13	0	35	0.13	0
A51 from Bardy Lane to Stafford Road (north) (left)	38	-	-	40	-	-	40	-	-
A51 from Bardy Lane to Stafford Road (north) (ahead)	1096	-	-	1150	-	-	1158	-	-
A51 from Bardy Lane to Stafford Road (north) (right)	4	0.01	0	4	0.01	0	4	0.01	0
High Street (ahead + left)	11	0.03	0	12	0.03	0	12	0.03	0
High Street (ahead + right)	22	0.07	0	23	0.08	0	23	0.08	0
A51 from Bardy Lane to Stafford Road (south) (left)	9	-	-	9	-	-	9	-	-
A51 from Bardy Lane to Stafford Road (south) (ahead)	749	-	-	786	-	-	794	-	-
A51 from Bardy Lane to Stafford Road (south) (right)	11	0.02	0	12	0.03	0	12	0.03	0
	2018 PM			**2023 PM**			**2023 future baseline with Phase One – PM**		
Brook End Lane (ahead + left)	17	0.03	0	17	0.04	0	17	0.04	0
Brook End Lane (ahead + right)	20	0.06	0	21	0.07	0	21	0.07	0
A51 from Bardy Lane to Stafford Road (north) (left)	38	-	-	40	-	-	40	-	-
A51 from Bardy Lane to Stafford Road (north) (ahead)	782	-	-	819	-	-	827	-	-
A51 from Bardy Lane to Stafford Road (north) (right)	1	0	0	1	0	0	1	0	0
High Street (ahead + left)	6	0.01	0	6	0.02	0	6	0.02	0
High Street (ahead + right)	10	0.04	0	11	0.04	0	11	0.04	0
A51 from Bardy Lane to Stafford Road (south) (left)	21	-	-	22	-	-	22	-	-
A51 from Bardy Lane to Stafford Road (south) (ahead)	1106	-	-	1159	-	-	1167	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2018 AM			2023 AM			2023 future baseline with Phase One – AM		
A51 from Bardy Lane to Stafford Road (south) (right)	10	0.02	0	10	0.02	0	10	0.02	0

2.4.86 The results show that this junction operates within capacity in 2023 baseline (with and without HS2 Phase One) in the AM and PM peak hours.

Accidents and safety

2.4.87 Accidents and safety are reported in Section 7.2 of the main TA. This section of the main TA is unchanged.

Parking and loading

2.4.88 Parking and safety are reported in Section 7.2 of the main TA. This section of the main TA is unchanged.

Public transport

Rail

2.4.89 Rail is reported in Section 7.2 of the main TA. This section of the main TA is unchanged.

Local bus services

2.4.90 Local buses are reported in Section 7.2 of the main TA. This section of the main TA is unchanged.

Public transport interchanges

2.4.91 Public transport interchanges are reported in Section 7.2 of the main TA. This section of the main TA is unchanged.

Pedestrians, cyclists and equestrians

2.4.92 Pedestrians, cyclists and equestrians are reported in Section 7.2 of the main TA. This section of the main TA is unchanged.

Waterways and Canals

2.4.93 Waterways and canals are reported in Section 7.2 of the main TA. This section of the main TA is unchanged.

2.5 CA1 AP2 revised scheme construction description

2.5.1 A number of changes to the original scheme reported in Section 2.1 of this report mean that Section 7.3 of the main TA and Section 2.5 of the SES1 and AP1 TA Addendum are replaced in full, unless stated otherwise, by Section 2.5 in this document.

2.5.2 This section provides an overview of the construction traffic and transport impacts for the section of the AP2 revised scheme that will pass through the Fradley to Colton area.

2.5.3 The construction period for the whole route is programmed for 2020 to 2027, although activity in 2027 is limited to testing and commissioning. Construction activities have been assessed against 2023 baseline traffic flows, irrespective of when they occur during the construction period. The year 2023 has been adopted as a common base year and the impact of individual or overlapping activities are considered against this single year. The year 2023 also broadly represents the likely typical peak periods during construction of the AP2 revised scheme and therefore it is considered to be reasonably representative.

Construction activities

2.5.4 Construction activities are reported in Section 7.3 of the main TA. This section of the main TA is unchanged.

Compounds and construction sites

2.5.5 Details of the construction works and the main construction works and the time periods when each compound is operational are summarised in the indicative construction programme found in Volume 2, Fradley to Colton community area (CA1 report), Section 2.3.

2.5.6 The location of the compounds and the associated access routes are shown on the SES2 and AP2 ES Volume 5 Map Books, Map Series TR-08 that reflect the transport activity at each site during the busy period as summarised in Table 141.

2.5.7 Table 140 in the main TA summarises the anticipated average and peak workforce to be required at each construction compound for the original scheme. Table 140 in the main TA is replaced by Table 140 below for the AP2 revised scheme. This includes the anticipated average and peak workforce at each of the civils, utility and rail systems compounds. Generally, the utility compound activities will occur in advance of the main civils and the rail systems compound activities will occur following the main civils activities.

Table 140: Assumed workforce at compounds

Compound type	Location	Total Number of Workers		Number of Staff
		Average	Peak	
Satellite	Pyford Brook Viaduct satellite compound	8	12	2
Utility	Pyford Brook utility compound	15	17	3
Utility	Common Lane utility compound	15	20	3
Satellite	Pyford North Embankment satellite compound	20	30	5
Rail systems		35	53	7
Utility	Lichfield Road utility compound	30	45	8
Satellite	Bourne Embankment satellite compound	32	48	8
Satellite	River Trent Viaduct satellite compound	44	66	11

Compound type	Location	Total Number of Workers		Number of Staff
		Average	Peak	
Satellite	Pipe Ridware Embankment satellite compound	24	36	6
Rail systems		44	69	10
Utility	Pipe Lane utility compound	15	20	3
Satellite	Blithbury Central Cutting satellite compound	24	36	6
Satellite	Blithbury North Cutting satellite compound	56	84	14
Rail systems	Blithbury crossovers satellite compound	8	13	1
Utility	Parkgate GSP utility compound	30	45	8
Satellite	Stockwell Heath Cutting satellite compound	20	30	5
Rail systems		24	40	6
Satellite	Moreton Brook Viaduct satellite compound	4	6	1
Rail systems	Newlands Lane ATFS satellite compound	39	73	16
Utility	Jonghams Lane utility compound	15	20	3

2.5.8 Table 141 of the main TA summarises the typical vehicle trip generation for construction site compounds in this area for the original scheme. Table 141 in the main TA is replaced by Table 141 below, which summarises the typical vehicle trip generation for construction site compounds for the AP2 revised scheme.

2.5.9 For each compound in Table 141, the peak month of activity is the month within which HGV traffic is at its highest for that compound. The busy period is the period during which HGV traffic serving that compound will be greater than 50% of the HGV traffic in the peak month. The average daily combined two-way vehicle trips shown for the busy period is the lower end of the range. The upper end of the range is the average daily combined two-way vehicle trips for the peak month.

2.5.10 There are also amendments to a small number of Phase One compounds as a consequence of the amendments to Handsacre Junction. Table 141.1 summarises the additional traffic changes associated with the amendments.

Table 141: Typical vehicle trip generation for construction site compounds in the Fradley to Colton area

Compound type	Location	Access to/from compound to main road network	Indicative start/set up date	Estimated duration of use (years)	Estimated duration of busy period (months)	Average daily combined two-way vehicle trips during busy period and within peak month of activity	
						Cars/LGV	HGV
Satellite	Pyford Brook viaduct satellite compound	A515 Lichfield Road	Civil engineering – January 2021	Three years and six months	7	22-22	51-62
			Site reinstatement – January 2026	Three months	3		59-59
Satellite	Pyford Brook utility compound	A515 Lichfield Road	September 2021	One year and six months	1	26-26	16-16
Satellite	Common Lane utility compound	A515 Lichfield Road	March 2023	Six months	1	30-30	51-51
Satellite	Pyford North embankment satellite compound	A515 Lichfield Road	Civil engineering – July 2020	Four years and three months	4	55-55	71-103
			Site reinstatement – January 2026	Three months	2		94-94
			Railway systems – December 2024	One year and three months	4	46-65	160-162
Satellite	Lichfield Road utility compound	Crawley Lane to A515 Lichfield Road for site set up and servicing, followed by site haul route to A515 Lichfield Road	June 2021	Nine months	1	67-67	19-19
Transfer node	Transfer node associated with Pyford North embankment satellite compound	A515 Lichfield Road	January 2022	Two years and six months	6	N/A	249-499

Compound type	Location	Access to/from compound to main road network	Indicative start/set up date	Estimated duration of use (years)	Estimated duration of busy period (months)	Average daily combined two-way vehicle trips during busy period and within peak month of activity	
						Cars/LGV	HGV
Satellite	Bourne embankment satellite compound	A513 Rugeley Road and on to the A515 Lichfield Road	Civil engineering – January 2021	Four years and six months	14	88-88	59-82
			Site reinstatement – January 2026	Three months	1		74-74
Transfer node	Transfer node associated with Bourne embankment satellite compound	A513 Rugeley Road and on to the A515 Lichfield Road	January 2022	Two years	4	N/A	439-498
Satellite	River Trent viaduct satellite compound	A513 Rugeley Road and on to the A515 Lichfield Road	Civil engineering – January 2021	Four years six months	50	121-121	45-68
			Site reinstatement – January 2026	Three months	2		45-45
Satellite	Pipe Ridware embankment satellite compound	Site haul route to Common Lane, B5014 Uttoxeter Road, A513 Rugeley Road and onto A515 Lichfield Road	Civil engineering – July 2020	Three years and nine months	2	65-66	80-105
			Site reinstatement – January 2026	Three months	2		51-54
			Railway systems – December 2024	One year and three months	4	69-86	159-162
Satellite	Pipe Lane utility compound	Site haul route to Common Lane, B5014 Uttoxeter Road, A513 Rugeley Road and onto A515 Lichfield Road	March 2022	Six months	1	29-30	36-36
Satellite	Blithbury crossovers satellite compound	Site haul route to Common Lane, B5014 Uttoxeter Road, A513 Rugeley Road and onto A515 Lichfield Road	January 2026	Three months	2	up to 10	up to 10

Compound type	Location	Access to/from compound to main road network	Indicative start/set up date	Estimated duration of use (years)	Estimated duration of busy period (months)	Average daily combined two-way vehicle trips during busy period and within peak month of activity	
						Cars/LGV	HGV
Satellite	Parkgate grid supply point utility compound	B5234 Duffield Lane, B5017 Henhurst Hill, B5017 Forest Road and onto A5121 Wellington Road	January 2021	Four years	3	29-30	35-38
Satellite	Blithbury Central cutting satellite compound	Blithbury Road, B5013 Colton Road and onto A51 Rugeley Eastern Bypass for set up and servicing and then site haul from site haul route to Common Lane, B5014 Uttoxeter Road, A513 Rugeley Road and onto A515 Lichfield Road	Civil engineering – October 2020 Site reinstatement – February 2026	Four years and six months Three months	30 1	84-119	41-115 111-111
Satellite	Blithbury North cutting satellite compound	Hollow Lane maintenance access, Hollow Lane, Blithbury Road, B5013 Colton Road and onto A51 Rugeley Eastern Bypass for set up and servicing, then site haul route to Common Lane, B5014 Uttoxeter Road, A513 Rugeley Road and onto A515 Lichfield Road	Civil engineering – January 2021 Site reinstatement – January 2026	Four years and three months Six months	23 1	154-154	45-58 48-48

Compound type	Location	Access to/from compound to main road network	Indicative start/set up date	Estimated duration of use (years)	Estimated duration of busy period (months)	Average daily combined two-way vehicle trips during busy period and within peak month of activity	
						Cars/LGV	HGV
Satellite	Newlands Lane auto-transformer feeder station satellite compound	Newlands Lane, Hollow Lane maintenance access, Hollow Lane, Blithbury Road, B5013 Colton Road and onto A51 Rugeley Eastern Bypass	December 2024	One year and three months	8	50-74	up to 10
Satellite	Stockwell Heath cutting satellite compound	B5013 Uttoxeter Road and on to the A51 Rugeley Eastern Bypass	Civil engineering – January 2021	Four years and three months	1	55-55	100-100
			Site reinstatement – January 2026	Six months	1		37-37
			Railway systems – April 2025	Nine months	4	38-52	158-160
Satellite	Jonghams Lane utility compound	Jonghams Lane, B5013 Uttoxeter Road and on to the A51 Rugeley Eastern Bypass	April 2021	Six months	5	30-30	11-11
Satellite	Moreton Brook viaduct satellite compound	Site haul route, B5013 Uttoxeter Road, Colton Road and onto A51 Rugeley Eastern Bypass	Civil engineering – February 2021	Three years and six months	7	11-11	27-37
			Site reinstatement – July 2026	Three months	1		Up to 10

Table 141.1: Typical additional vehicle trip generation for construction sites associated with the Handsacre amendment

Compound type	Location	Access to/from compound to main road network	Indicative start/set up date	Estimated duration of use (years)	Estimated duration of busy period (months)	Average daily combined two-way vehicle trips during busy period and within peak month of activity	
						Cars/LGV	HGV
Main	A515 Lichfield Road underbridge main compound	A515 Lichfield Road	Civil engineering – April 2020	Three years and nine months	3	81-81	42-59
			Site reinstatement – July 2025	Six months	2		73-73
Satellite	A515 Lichfield Road underbridge satellite compound	A515 Lichfield Road	Civil engineering January 2021	Two years	16	A515 main compound	Up to 10
			Site reinstatement – January 2023	Three months	3		12-12
Satellite	Harvey's Rough viaduct satellite compound and Shaw Lane satellite compound	Shaw Lane n to B5014 Lichfield Road and onto A515 Lichfield Road	Civil engineering – April 2020	Three years and nine months	11	A515 main compound	18-22
			Site reinstatement – November 2023	Six months	2		40-50
			Rail Systems – November 2021	Three years and three months	8	62-62	Up to 10
Main	Spode Avenue main compound	Site haul route to Shaw Lane, B5014 Lichfield Road and onto A515 Lichfield Road	Rail Systems – November 2021	Three years and three months	8	62-62	Up to 10

Compound type	Location	Access to/from compound to main road network	Indicative start/set up date	Estimated duration of use (years)	Estimated duration of busy period (months)	Average daily combined two-way vehicle trips during busy period and within peak month of activity	
						Cars/LGV	HGV
Transfer Node	Wood End Lane east-bound road head[11]	Wood End Lane and onto A38 Rykneld Street	April 2022	One year and six months	6	N/A	144-154

[11] Road heads are sites where excavated materials from the HS2 Phase One scheme leave or enter the construction worksites from the public roads and are the equivalent to HS2 Phase 2a transfer nodes.

Construction HGV routes

2.5.11 Construction vehicle movements required to construct the AP2 revised scheme will include the delivery of plant and materials, movement of excavated materials and site worker trips. Works will include utilities diversions, earthworks, underpass, viaduct, bridge and highway construction.

2.5.12 The AP2 revised scheme will introduce new construction routes in CA1. These are Wood End Lane, the A5121 Parkway/Wellington Road, the B5017, the B5234 Newborough Road, the B5014 Lichfield Road between the A515 Tewnalls Lane and Shaw Lane and Shaw Lane between the B5014 Lichfield Road and the WCML. Use of Wood End Lane will reduce the need to use the A5192 Eastern Avenue as a construction traffic route. The A5121 Parkway/Wellington Road, the B5017 and the B5234 Newborough Road will be used to provide access to the Parkgate utilities compound west of Newborough. The B5014 Lichfield Road and Shaw Lane will be used to access works associated with the Handsacre Link.

2.5.13 In addition, roads may have some low level (less than 10 HGV movements per day) construction traffic associated with highway works including utilities works. However, in Table 142 below, this traffic is assigned to the construction compound from which the works will be managed.

2.5.14 HGVs have been routed, where reasonably practicable, along the strategic or primary road network, although some access locations will be via secondary roads. In the Fradley to Colton area, primary construction traffic routes from the SRN are as follows: the A38(T) Rykneld Street, the A51 Stafford Road, the A515 Lichfield Road and the A513 Rugeley Road. Since submission of the Bill, consultation with Staffordshire County Council regarding the route for construction traffic around Lichfield has resulted in a new construction traffic route along Wood End Lane, from the A515 Lichfield Road to A38 Rykneld Street, substantially reducing the use of the A5192 Eastern Avenue/Cappers Lane in Lichfield.

2.5.15 Where reasonably practicable, the use of the local road network has been limited to site set up, access for environmental surveys and on-going servicing (including refuse collection and general deliveries).

2.5.16 Table 142 of the main TA summarises the peak daily construction traffic flow, both in HGVs and total vehicles, on each link within the Fradley to Colton area (CA1) that is on a construction route for the original scheme. Table 142 in the main TA is replaced by Table 142 below.

2.5.17 The introduction of the construction route along Wood End Lane and the Parkgate utility compound as part of the AP2 revised scheme and changes to the movement and use of surplus excavated material, will remove or reduce the construction traffic from a number of routes.

2.5.18 Table 142 indicates an increase in construction traffic, when comparing the AP2 revised scheme against the original scheme, at locations such as Wood End Lane, the A5121 Wellington Road, Common Lane (between Crawley Lane and Lichfield Road and between Uttoxeter Road and Pipe Lane), the B5017 Henhurst Hill/Forest Road/Shobnall Road and the B5234 Ashbrook Lane/Burton Lane.

2.5.19 Table 142 also indicates a reduction in construction traffic, when compared to the original scheme, at locations such as the A38(T) Rykneld Street (between Burton Road and Rykneld Street/north-bound slip), the A51 Birmingham Road/Brereton Hill, the A51 Lea Hall Way/Rugeley Eastern Bypass/Stafford Road/Upper St John Street/Western Bypass, the A515 Lichfield Road (between Wood End Lane and Common Lane), the A5127 Trent Valley Road, the A513 Alrewas Bypass/Kings Bromley Lane/Lichfield Road, the A5192 Cappers Lane/Eastern Avenue, the B5013 Uttoxeter Road, the B5014 Lichfield Road/Uttoxeter Road, Bellamour Lane, Blithbury Road, Dawson Lane, Newlands Lane and Pipe Lane.

2.5.20 Where zero 'all vehicle' and/or 'HGV' construction traffic flows are indicated, these represent links that are no longer a main construction route for the AP2 revised scheme. These links may, however, be subject to occasional or infrequent use by AP2 revised scheme construction traffic.

Table 142: CA1 peak daily construction traffic flow

Location	Direction	Daily peak HGV, vehicles	Daily peak all vehicles
A38(T) Rykneld Street (between Burton Road and Rykneld Street/north bound slip)	SB	0	8
	NB	0	14
A51 Birmingham Road (between Friary Road and St John Street)	NB	0	0
	SB	0	0
A51 Brereton Hill (between Brereton Hill Lane and Lea Hall Way)	NB	509	519
	SB	509	519
A51 Friary Avenue (between Friary Island and Birmingham Road)	SB	0	80
	NB	0	80
A51 Lea Hall Way (between Armitage Road and Brereton Hill)	NB	509	518
	SB	509	518
A51 Lea Hall Way (between Armitage Road and Wheelhouse Road)	NB	509	620
	SB	509	620
A51 Lea Hall Way (between Wheelhouse Road and Power Station Road)	NB	509	620
	SB	509	620
A51 Rugeley Eastern Bypass (between Colton Road and Lichfield Road)	WB	498	652
	EB	498	652
A51 Stafford Road (between Constitution Island and Brereton Hill Lane)	NB	509	519
	SB	509	519
A51 Stafford Road (between Eastern Avenue and Featherbed Lane)	NB	0	103

Location	Direction	Daily peak	Daily peak all
	SB	0	103
A51 Upper St John Street (between Birmingham Road and Tamworth Road)	SB	0	0
	NB	0	0
A515 Lichfield Road (between Common Lane and AP2 revised scheme)	NB	605	716
	SB	605	716
A515 Lichfield Road (between Crawley Lane and Manor Road)	NB	0	72
	SB	0	72
A515 Lichfield Road (between Wood End Lane and Common Lane)	NB	605	716
	SB	605	716
A515 Lichfield Road (between Crawley Lane and Rugeley Road)	NB	0	72
	SB	0	72
A515 Main Street (between Town Hill and Lodge Lane)	NB	0	1
	SB	0	1
A515 Tewnalls Lane (between Stafford Road and Wood End Lane)	NB	509	581
	SB	509	581
A515 Yoxal Road (between Manor Road and Lichfield Road)	EB	0	1
	WB	0	1
A51 Western Bypass (between Friary Island and Eastern Avenue)	NB	0	80
	SB	0	80
A5127 Trent Valley Road (between Eastern Avenue and Rykneld Street)	EB	0	7
	WB	0	7
A513 Alrewas Bypass from Kings Bromley Road to A38 at Croxall Road	EB	0	72
	WB	0	72
A513 Alrewas Road (between Yoxall Road and Ogreave Hall Lane)	EB	0	72
	WB	0	72
A513 Kings Bromley Lane (between AP2 revised scheme and Uttoxeter Road)	WB	65	282
	EB	65	282
A515 Lichfield Road (between Rugeley Road and AP2 revised scheme)	NB	352	458
	SB	352	458
A513 Rugeley Road (between Shaw Lane and AP2 revised scheme)	WB	352	491
	EB	352	491

Location	Direction	Daily peak	Daily peak all
A5192 Cappers Ln (between Austin Cote Ln and Rykneld Street)	EB	0	16
	WB	0	16
A5192 Cappers Lane (between Austin Cote Lane and Rykneld Street)	NB	0	16
	SB	0	16
A5192 Eastern Avenue (between Grange Lane and Stafford Road)	NB	0	23
	SB	0	23
A5192 Eastern Avenue (between Netherstowe Lane and Grange Lane)	WB	0	23
	EB	0	23
A5192 Eastern Avenue (between Trent Valley Road and Netherstowe Lane)	NB	0	23
	SB	0	23
A5206 London Road (between Tamworth Road and A38)	SB	0	0
	NB	0	0
A5121 Wellington Road (between the B5017 Shobnall Road and Parkway)	NB	19	19
	SB	19	19
B5013 Colton Road (between Blithbury Road and Bellamour Way)	NB	80	103
	SB	80	103
B5013 Colton Road (between Rugeley Eastern Bypass and Blithbury Road)	EB	81	209
	WB	81	209
B5013 Uttoxeter Road (between Bellamour Lane and Colton Road)	WB	80	103
	EB	80	103
B5013 Uttoxeter Road (between AP2 revised scheme and Moor Lane)	NB	80	102
	SB	80	102
B5013 Uttoxeter Road (between Moor Lane and Bellamour Lane)	NB	80	103
	SB	80	103
B5013 Uttoxeter Road (between Sherracop Lane and AP2 revised scheme)	NB	28	59
	SB	28	59
B5013 Uttoxeter Road (between Sherracop Lane and Uttoxeter Road)	NB	0	7
	SB	0	7
B5014 Lichfield Road (between Ashbrook Lane and Seedcroft Lane)	SB	0	5
	NB	0	5

Location	Direction	Daily peak	Daily peak all
B5014 Rake End Lane (between School Lane and Stoneyford Lane)	NB	0	22
	SB	0	22
B5014 Uttoxeter Road (between Blithbury Road and AP2 revised scheme)	NB	0	22
	SB	0	22
B5014 Uttoxeter Road (between Blithbury Road and Seedcfroft Lane)	NB	0	0
	SB	0	0
B5014 Uttoxeter Road (between Common Lane and School Lane)	WB	0	22
	EB	0	22
B5014 Uttoxeter Road (between Kings Bromley Lane and Common Lane)	NB	77	142
	SB	77	142
B5014 Uttoxeter Road (between Stoneyford Lane and AP2 revised scheme)	NB	0	22
	SB	0	22
B5017 Henhurst Hill (between Hopley Lane and Aviation Lane)	EB	19	19
	WB	19	19
B5017 Forest Road (between Aviation Lane and Parkway)	EB	19	19
	WB	19	19
B5017 Shobnall Road (between A5121 Wellington Road and Parkway)	EB	19	19
	WB	19	19
B5234 Ashbrook Lane (between A515 Lichfield Road and Brickhill Lane)	EB	0	7
	WB	0	7
B5234 Burton Road (between A515 Lichfield Road and Brickhill Lane)	EB	19	26
	WB	19	26
Shaw Lane (between Rugeley Road and AP2 revised scheme)	SB	0	27
	NB	0	27
Bellamour Lane (between Uttoxeter Road and Main Road)	WB	0	0
	EB	0	0
Bellamour Way (between High Street and Uttoxeter Road)	WB	0	0
	EB	0	0
Hollow Lane (between High Street and Blithbury Road)	EB	0	0
	WB	0	0

Location	Direction	Daily peak	Daily peak all
Blithbury Road (between Hadley Gate and AP2 revised scheme)	WB	18	39
	EB	18	39
Blithbury Road (between Hollow Lane and Colton Road)	WB	45	143
	EB	45	143
Blithbury Road (between Stoneyford Lane and Blithbury Road)	WB	26	66
	EB	26	66
Blithbury Road (between Pipe Lane and Rugeley School)	EB	18	18
	WB	18	18
Blithbury Road (between Rugeley School and Dawson Lane)	EB	0	0
	WB	0	0
Blithbury Road (between Uttoxeter Road and Pipe Lane)	EB	18	61
	WB	18	61
Blithbury Road (between Uttoxeter Road and AP2 revised scheme)	WB	18	39
	EB	18	39
Wood End Lane (between Lichfield Road and Netherstowe Lane)	SB	281	281
	NB	281	281
Wood End Lane (between Gorse Lane and Netherstowe Lane)	SB	379	380
	NB	379	380
Wood End Lane (between Gorse Lane and Nanscawen Road)	EB	379	380
	WB	379	380
Wood End Lane (between Nanscawen Road and A38 Rykneld Street)	EB	379	380
	WB	379	380
Wood End Lane (between Rykneld Street and Wood End Lane/west-bound)	EB	185	185
	WB	185	185
Wood End Lane (between Brookhay Lane and Wood End Lane/west-bound)	WB	185	185
	EB	185	185
Dawson Lane (between Blithbury Road and Mavesyn Ridware 33 footpath)	SB	0	0
	NB	0	0
Dawson Lane (between Pipe Lane and Mavesyn Ridware 33 footpath)	NB	1	43
	SB	1	43

Location	Direction	Daily peak	Daily peak all
Pipe Lane (between Blithbury Road and Mavesyn Ridware 37 footpath)	SB	1	1
	NB	1	1
Pipe Lane (between Mavesyn Ridware 37 footpath and AP2 revised scheme)	SB	0	17
	NB	0	17
Pipe Lane (between AP2 revised scheme and Quintons Orchard)	SB	0	17
	NB	0	17
Common Lane (between Crawley Lane and AP2 revised scheme)	WB	8	119
	EB	8	119
Common Lane (between Lichfield Road and AP2 revised scheme)	EB	8	119
	WB	8	119
Newlands Lane (between High Street and AP2 revised scheme/east-bound)	EB	1	33
	WB	1	33
Pipe Lane (north of Common Lane)	WB	0	0
	EB	0	0
Common Lane (between Uttoxeter Road and Pipe Lane)	SB	77	120
	NB	77	120
B5014 Lichfield Road (between A515 Tewnals Road and Shaw Lane)	NB	50	50
	SB	50	50
Shaw Lane (between B5014 Lichfiled Road and and Pipe Lane)	NB	25	25
	SB	25	25

Traffic management, road closures and diversions

2.5.21 The approach to traffic management, road closures and diversions is reported in Section 7.3 of the main TA. This section of the main TA is unchanged.

PRoW closures and diversions

2.5.22 The approach to Public Right of Way (PRoW) closures and diversions is reported in Section 7.3 of the main TA. This section of the main TA is unchanged.

2.6 CA1 AP2 revised scheme assessment of construction impacts

2.6.1 A number of changes to the original scheme reported in Section 2.1 of this report mean that Section 7.4 of the main TA and Section 2.6 of the SES1 and AP1 ES TA Addendum are generally replaced by Section 2.6 in this document unless stated otherwise.

Key construction transport issues

2.6.2 The temporary traffic and transport impacts in this area will include:

- road closures and associated diversions;
- diversions and alternative routes for PRoW; and
- construction vehicle movements to and from the various worksites.

2.6.3 The construction assessment has also considered any impacts in this area that arise from construction of the AP2 revised scheme in the adjoining community areas. The cumulative assessment considers any impacts associated with HS2 Phase One.

2.6.4 There will be temporary alternative routes for nine roads and 19 PRoW, which include a temporary closure for two years and 6 months of Shaw Lane to facilitate the amended Handsacre Spur.

2.6.5 The AP2 revised scheme includes greater usage of haul roads by construction traffic which generally results in reduced usage of the local road network. Local placement, greater utilisation of borrow pit material as well as refinements to the construction process and programme will result in further reductions to traffic on the local road network.

Highway network

Highway closures and diversions

2.6.6 A temporary section of road is to be diverted away from the new Mavesyn Ridware Footpath 38 Accommodation overbridge to allow the pier and deck construction for 6 months. Tie-ins will be requiring with overnight partial lane closures. The temporary diversion and partial lane closures will not have a substantial impact on traffic flows and delays for vehicle occupants.

2.6.7 In order to facilitate the localised widening along Wood End Lane and the A515 Lichfield Road/Wood End Lane junction improvements, overnight, weekend and intermittent lane closures under traffic control will be required for up to 6 months. These will not have a substantial impact on traffic flows and delays for vehicle occupants.

2.6.8 The amendment to Handsacre Spur will require the temporary closure of Shaw Lane, between the B5014 Lichfield Road and Tuppenhurst Lane, for a period of up to two years and six months with an alternative diversion route available via the existing A515 Lichfield Road and the B5014 Lichfield Road, adding up to 2.4km to journeys. Access to properties along and off this section of Shaw Lane will be maintained.

2.6.9 The amendment to Handsacre Spur will also also require local worker access and occasional HGV movements on the B5014 Uttoxeter Road, Tuppenhurst Lane, Proctors Road, Spode Avenue and Alendale Avenue. These will not affect a large number of vehicle users and consequent delays to vehicles is not likely to be substantial.

2.6.10 Temporary road or lane closures and associated diversions will be required in a number of locations for the AP2 revised scheme in addition to the A515 Lichfield Road, A513 Rugeley Road, Shaw Lane, Pipe Lane, B5014 Uttoxeter Road, Blithbury

Lane, Newlands Lane, B5013 Uttoxeter Road and Jonghams Lane reported in the main TA, including:

- Moor Lane;
- Wood End Lane; and
- Common Lane.

2.6.11 These may involve lane closures and partial lane closures under traffic control for the tie-in of the new alignments, intermittent lane restrictions and temporary road closures. Closures and diversions will be restricted to short-term overnight and/or weekend closures, where reasonably practicable. Therefore, the impact of these off-peak closures on traffic flows and consequent delays to vehicles as a result of congestion is not likely to be substantial.

PRoW closures and diversions

2.6.12 PRoW closures and diversions are reported in Section 7.3 of the main TA.

2.6.13 Table 143 in the main TA summarises the temporary PRoW diversions and realignments required to accommodate the construction of the original scheme. Table 143.1 below summarises any new or changes to the temporary amendments to the PRoWs to support the construction of the AP2 revised scheme and supersede the associated data in Table 143 of the main TA. Those not listed in Table 143.1 remain unchanged from those identified by Table 143 of the main TA.

Table 143.1: CA1 AP2 revised scheme temporary amended PRoW diversions

PRoW name	Description	Change in travel distance (compared to baseline)
Kings Bromley Footpath 6	Temporary closure of Kings Bromley FP 6 with temporary diversion via Handsacre.	Temporary diversion of 1.2km
Colton Footpath 79	Temporary localised diversion for the utility works for the grid supply to the National Grid Parkgate substation.	Temporary diversion is less than 50m
Abbots Bromley Footpath 26	Temporary localised diversion for the utility works for the grid supply to the National Grid Parkgate substation.	Temporary diversion is less than 50m
Abbots Bromley Footpath 29	Temporary localised diversion or realignment for the utility works for the grid supply to the National Grid Parkgate substation.	Temporary diversion is less than 50m
Abbots Bromley Footpath 30	Temporary localised diversion or realignment for the utility works for the grid supply to the National Grid Parkgate substation.	Temporary diversion is less than 50m
Abbots Bromley Footpath 30	Temporary localised diversion or realignment for the utility works for the grid supply to the National Grid Parkgate substation.	Temporary diversion is less than 50m
Abbots Bromley Footpath 38	Temporary localised diversion or realignment for the utility works for the grid supply to the National Grid Parkgate substation.	Temporary diversion is less than 50m
Abbots Bromley Footpath 39	Temporary localised diversion or realignment for the utility works for the grid supply to the National Grid Parkgate substation.	Temporary diversion of 350m
Abbots Bromley Footpath 49	Temporary localised diversion or realignment for the utility works for the grid supply to the National Grid Parkgate substation.	Temporary diversion is less than 50m

Strategic and local road network traffic flows

2.6.14 During the construction period, there will be a number of highway links that will be affected by the construction of the AP2 revised scheme. An assessment of the impact of construction related vehicle movements and temporary diversions has been undertaken and is detailed below. This assessment considers the peak month of activity in each location. However, the flows outlined in the following sections will not necessarily occur concurrently as impacts on different parts of the network will occur at different times.

2.6.15 Table 144 and 145 of the main TA summarise the 2023 traffic flows on highway links affected by construction traffic associated with the original scheme for the AM and PM peak hour respectively.

2.6.16 Table 144 and 145 of the main TA are replaced by Tables 144 and 145 below, which summarise the 2023 traffic flows on highway links affected by construction traffic associated with the AP2 revised scheme for the AM and PM peak hour respectively. For completeness, all links identified in the main TA are included even where they are no longer proposed as construction routes.

2.6.17 To show the impact of the construction of the AP2 revised scheme in these locations, traffic flows on affected links are presented for the 2023 future baseline, 2023 plus HS2 Phase One and 2023 HS2 Phase One plus the AP2 revised scheme. Percentage increases are presented for the AP2 revised scheme, considered alone (i.e. against 2023 plus HS2 Phase One) and considered cumulatively (i.e. combined with HS2 Phase One against the 2023 future baseline).

2.6.18 Where there is a 'zero percentage' change in construction 'Vehicles' and/or 'HGV' traffic in the table, this represents a link that is not identified as a main construction route for the AP2 revised scheme. Such links may, however, be subject to occasional or infrequent use by AP2 revised scheme construction traffic.

2.6.19 Where a link indicates a change annotated by 'N/A', this represents a link with zero HGVs in the baseline. Such links either indicate no change or a small change in the number of HGVs as a result of the AP2 revised scheme. Such changes are not generally substantial.

Table 144: 2023 future baseline and with the SES2 and AP2 revised scheme construction traffic (vehicles) – AM peak hour (08:00 – 09:00)

Location	Direction	2023 baseline		2023 with HS2 Phase One		2023 with HS2 Phase One plus 2a		Phase 2a % change		With HS2 Phase One & 2a % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
A38(T) Rykneld Street (between Burton Road and Rykneld Street/north bound slip)	SB	470	7	490	11	490	11	0.0%	0.0%	4.3%	49.4%
	NB	497	10	550	10	550	10	0.0%	0.0%	10.7%	0.0%
A51 Birmingham Road (between Friary Road and St John Street)	NB	573	29	600	29	600	29	0.0%	0.0%	4.8%	0.0%
	SB	755	38	783	38	783	38	0.0%	0.0%	3.6%	0.0%
A51 Brereton Hill (between Brereton Hill Lane and Lea Hall Way)	NB	716	22	724	22	770	73	6.3%	235.9%	7.4%	235.9%
	SB	908	23	915	23	961	74	5.0%	218.1%	5.9%	218.1%
A51 Friary Avenue (between Friary Island and Birmingham Road)	SB	904	40	922	46	934	46	1.3%	0.0%	3.3%	16.1%
	NB	873	38	891	45	903	45	1.3%	0.0%	3.4%	16.7%
A51 Lea Hall Way (between Armitage Road and Brereton Hill)	NB	733	18	733	18	786	69	7.2%	282.2%	7.2%	282.2%
	SB	737	23	737	23	790	74	7.2%	218.3%	7.2%	218.3%
A51 Lea Hall Way (between Armitage Road and Wheelhouse Road)	NB	932	17	951	17	1013	68	6.6%	292.7%	8.6%	292.7%
	SB	854	26	873	26	935	77	7.1%	192.7%	9.4%	192.7%
A51 Lea Hall Way (between Wheelhouse Road and Power Station Road)	NB	832	16	850	16	913	66	7.3%	328.3%	9.7%	328.3%
	SB	928	22	947	22	1009	73	6.6%	233.8%	8.7%	233.8%
A51 Rugeley Eastern Bypass (between Colton Road and Lichfield Road)	WB	573	18	591	18	663	67	12.2%	283.2%	15.8%	283.2%
	EB	719	20	738	20	810	70	9.8%	251.9%	12.6%	251.9%
A51 Stafford Road (between Constitution Island and Brereton Hill Lane)	NB	628	21	635	21	681	72	7.1%	245.3%	8.5%	245.3%
	SB	1070	29	1078	29	1124	80	4.2%	176.4%	5.0%	176.4%

Location	Direction	2023 baseline		2023 with HS2 Phase One		2023 with HS2 Phase One plus 2a		Phase 2a % change		With HS2 Phase One & 2a % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
A51 Stafford Road (between Eastern Avenue and Featherbed Lane)	NB	672	12	697	18	707	18	1.4%	0.0%	5.2%	54.7%
	SB	1118	27	1144	34	1153	34	0.9%	0.0%	3.1%	23.3%
A51 Upper St John Street (between Birmingham Road and Tamworth Road)	SB	721	44	723	44	723	44	0.0%	0.0%	0.3%	0.0%
	NB	721	44	723	44	723	44	0.0%	0.0%	0.3%	0.0%
A515 Lichfield Road (between Common Lane and AP2 revised scheme)	NB	205	18	233	21	304	79	30.7%	267.2%	48.6%	331.0%
	SB	354	11	382	14	454	71	18.7%	417.1%	28.1%	572.6%
A515 Lichfield Road (between Common Lane and AP2 revised scheme)	NB	559	23	562	23	578	23	2.8%	0.0%	3.5%	0.0%
	SB	573	21	577	21	593	21	2.7%	0.0%	3.4%	0.0%
A515 Lichfield Road (between Wood End Lane and Common Lane)	NB	232	12	260	15	332	73	27.5%	370.9%	42.9%	492.7%
	SB	356	9	384	12	455	69	18.6%	488.7%	28.0%	707.5%
A515 Lichfield Road (between Crawley Lane and Rugeley Road)	NB	559	23	562	23	578	23	2.8%	0.0%	3.5%	0.0%
	SB	573	21	577	21	593	21	2.7%	0.0%	3.4%	0.0%
A515 Main Street (between Town Hill and Lodge Lane)	NB	250	25	250	25	250	25	0.0%	0.0%	0.0%	0.0%
	SB	251	19	251	19	251	19	0.0%	0.0%	0.0%	0.0%
A515 Tewnalls Lane (between Stafford Road and Wood End Lane)	NB	420	22	437	28	497	73	13.7%	157.6%	18.3%	232.0%
	SB	469	25	486	31	546	76	12.3%	144.8%	16.4%	208.3%
A515 Yoxal Road (between Manor Road and Lichfield Road)	EB	312	28	312	28	312	28	0.0%	0.0%	0.0%	0.0%
	WB	394	19	394	19	394	19	0.0%	0.0%	0.0%	0.0%
A51 Western Bypass (between Friary	NB	975	10	993	16	1005	16	1.2%	0.0%	3.1%	64.4%

Location	Direction	2023 baseline		2023 with HS2 Phase One		2023 with HS2 Phase One plus 2a		Phase 2a % change		With HS2 Phase One & 2a % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
Island and Eastern Avenue)	SB	1125	17	1143	23	1155	23	1.0%	0.0%	2.7%	37.2%
A5127 Trent Valley Road (between Eastern Avenue and Rykneld Street)	EB	535	7	568	9	568	9	0.0%	0.0%	6.2%	25.1%
	WB	690	13	723	15	723	15	0.0%	0.0%	4.8%	13.7%
A513 Alrewas Bypass from Kings Bromley Road to A38 at Croxall Road	EB	444	26	448	26	463	26	3.5%	0.0%	4.4%	0.0%
	WB	292	17	295	17	311	17	5.3%	0.0%	6.7%	0.0%
A513 Alrewas Road (between Yoxall Road and Ogreave Hall Lane)	EB	457	23	461	23	476	23	3.4%	0.0%	4.3%	0.0%
	WB	297	22	300	22	316	22	5.2%	0.0%	6.6%	0.0%
A513 Kings Bromley Lane (between AP2 revised scheme and Uttoxeter Road)	WB	302	11	320	11	368	19	15.0%	69.8%	21.9%	69.8%
	EB	418	12	437	12	485	20	11.0%	63.2%	15.8%	63.2%
A515 Lichfield Road (between Rugeley Road and AP2 revised scheme)	NB	205	18	210	18	267	54	27.2%	192.6%	30.4%	192.6%
	SB	354	11	359	11	416	46	15.9%	333.1%	17.6%	333.1%
A513 Rugeley Road (between Shaw Lane and AP2 revised scheme)	WB	296	11	314	11	365	46	16.3%	322.2%	23.5%	322.2%
	EB	403	8	421	8	472	44	12.2%	417.8%	17.3%	417.8%
A5192 Cappers Ln (between Austin Cote Ln and Rykneld Street)	EB	470	12	485	13	485	13	0.0%	0.0%	3.2%	15.6%
	WB	612	10	628	12	628	12	0.0%	0.0%	2.5%	18.3%
A5192 Cappers Lane (between Austin Cote Lane and Rykneld Street)	NB	813	15	828	17	828	17	0.0%	0.0%	1.9%	12.0%
	SB	981	17	996	18	996	18	0.0%	0.0%	1.5%	11.0%
A5192 Eastern Avenue (between Grange Lane and Stafford Road)	NB	707	14	714	14	716	14	0.2%	0.0%	1.2%	0.0%
	SB	531	11	537	11	539	11	0.2%	0.0%	1.5%	0.0%

Location	Direction	2023 baseline		2023 with HS2 Phase One		2023 with HS2 Phase One plus 2a		Phase 2a % change		With HS2 Phase One & 2a % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
A5192 Eastern Avenue (between Netherstone Lane and Grange Lane)	WB	534	9	541	9	543	9	0.2%	0.0%	1.5%	0.0%
	EB	861	15	868	15	869	15	0.1%	0.0%	1.0%	0.0%
A5192 Eastern Avenue (between Trent Valley Road and Netherstowe Lane)	NB	734	11	741	11	742	11	0.2%	0.0%	1.1%	0.0%
	SB	1065	21	1072	21	1074	21	0.1%	0.0%	0.8%	0.0%
A5206 London Road (between Tamworth Road and A38)	SB	703	22	706	22	706	22	0.0%	0.0%	0.5%	0.0%
	NB	785	24	788	24	788	24	0.0%	0.0%	0.4%	0.0%
A5121 Wellington Road (between the B5017 Shobnall Road and Parkway)	NB	723	49	723	49	724	51	0.3%	3.8%	0.3%	3.8%
	SB	773	37	773	37	775	39	0.2%	5.0%	0.2%	5.0%
B5013 Abbots Bromley Road (between Newton Hurst Lane and Quee Lane)	NB	242	17	242	17	242	17	0.0%	0.0%	0.0%	0.0%
	SB	223	11	223	11	223	11	0.0%	0.0%	0.0%	0.0%
B5013 Colton Road (between Blithbury Road and Bellamour Way)	NB	361	6	361	6	378	14	4.9%	125.2%	4.9%	125.2%
	SB	289	10	289	10	307	18	6.1%	80.7%	6.1%	80.7%
B5013 Colton Road (between Rugeley Eastern Bypass and Blithbury Road)	EB	433	12	433	12	475	20	9.6%	67.5%	9.6%	67.5%
	WB	446	6	446	6	488	14	9.3%	133.7%	9.3%	133.7%
B5013 Uttoxeter Road (between Uttoxeter Road and Dunstall Lane)	NB	281	11	281	11	281	11	0.0%	0.0%	0.0%	0.0%
	SB	280	13	280	13	280	13	0.0%	0.0%	0.0%	0.0%
B5013 Uttoxeter Road (between Bellamour Lane and Colton Road)	WB	280	21	280	21	298	29	6.3%	37.4%	6.3%	37.4%
	EB	256	20	256	20	274	28	6.8%	40.8%	6.8%	40.8%

Location	Direction	2023 baseline		2023 with HS2 Phase One		2023 with HS2 Phase One plus 2a		Phase 2a % change		With HS2 Phase One & 2a % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
B5013 Uttoxeter Road (between AP2 revised scheme and Moor Lane)	NB	268	12	268	12	283	20	5.3%	64.7%	5.3%	64.7%
	SB	277	11	277	11	291	19	5.1%	75.2%	5.1%	75.2%
B5013 Uttoxeter Road (between Moor Lane and Bellamour Lane)	NB	267	15	267	15	285	23	6.6%	53.4%	6.6%	53.4%
	SB	285	9	285	9	303	17	6.1%	87.3%	6.1%	87.3%
B5013 Uttoxeter Road (between Sherracop Lane and AP2 revised scheme)	NB	268	12	268	12	279	15	3.9%	22.7%	3.9%	22.7%
	SB	277	11	277	11	287	13	3.8%	26.4%	3.8%	26.4%
B5013 Uttoxeter Road (between Sherracop Lane and Uttoxeter Road)	NB	248	13	248	13	249	13	0.7%	0.0%	0.7%	0.0%
	SB	236	8	236	8	238	8	0.7%	0.0%	0.7%	0.0%
B5014 Lichfield Road (between Ashbrook Lane and Seedcroft Lane)	SB	111	4	111	4	113	4	1.1%	0.0%	1.1%	0.0%
	NB	101	4	101	4	103	4	1.3%	0.0%	1.3%	0.0%
B5014 Rake End Lane (between School Lane and Stoneyford Lane)	NB	117	6	117	6	123	6	4.6%	0.0%	4.6%	0.0%
	SB	123	6	123	6	128	6	4.4%	0.0%	4.4%	0.0%
B5014 Uttoxeter Road (between Blithbury Road and AP2 revised scheme)	NB	79	4	79	4	84	4	6.9%	0.0%	6.9%	0.0%
	SB	99	3	99	3	104	3	5.5%	0.0%	5.5%	0.0%
B5014 Uttoxeter Road (between Blithbury Road and Seedcfroft Lane)	NB	95	4	95	4	95	4	0.0%	0.0%	0.0%	0.0%
	SB	136	6	136	6	136	6	0.0%	0.0%	0.0%	0.0%
B5014 Uttoxeter Road (between Common Lane and School Lane)	WB	128	6	128	6	133	6	4.2%	0.0%	4.2%	0.0%
	EB	212	5	212	5	217	5	2.6%	0.0%	2.6%	0.0%

Location	Direction	2023 baseline		2023 with HS2 Phase One		2023 with HS2 Phase One plus 2a		Phase 2a % change		With HS2 Phase One & 2a % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
B5014 Uttoxeter Road (between Kings Bromley Lane and Common Lane)	NB	152	2	152	2	179	10	18.0%	366.7%	18.0%	366.7%
	SB	240	2	240	2	268	10	11.4%	331.8%	11.4%	331.8%
B5014 Uttoxeter Road (between Stoneyford Lane and AP2 revised scheme)	NB	79	4	79	4	84	4	6.9%	0.0%	6.9%	0.0%
	SB	99	3	99	3	104	3	5.5%	0.0%	5.5%	0.0%
B5017 Henhurst Hill (between Hopley Ln and Aviation Rd)	EB	626	29	626	29	627	31	0.3%	6.5%	0.3%	6.5%
	WB	349	34	349	34	351	35	0.5%	5.6%	0.5%	5.6%
B5017 Forest Road (between Aviation Ln and Parkway)	EB	624	29	624	29	626	31	0.3%	6.5%	0.3%	6.5%
	WB	272	26	272	26	274	28	0.7%	7.2%	0.7%	7.2%
B5017 Shobnall Road (between A5121 Wellington Rd and Parkway)	EB	816	36	816	36	817	38	0.2%	5.2%	0.2%	5.2%
	WB	692	33	692	33	693	35	0.3%	5.7%	0.3%	5.7%
B5234 Ashbrook Lane (between A515 Lichfield Road and Brickhill Lane)	EB	190	6	190	6	192	6	0.9%	0.0%	0.9%	0.0%
	WB	114	6	114	6	116	6	1.5%	0.0%	1.5%	0.0%
B5234 Burton Road (between A515 Lichfield Road and Brickhill Lane)	EB	155	5	155	5	159	7	2.3%	34.8%	2.3%	34.8%
	WB	83	7	83	7	87	8	4.3%	29.0%	4.3%	29.0%
Shaw Lane (between Rugeley Road and AP2 revised scheme)	SB	13	1	13	1	15	3	13.5%	203.6%	13.5%	203.6%
	NB	7	0	7	0	21	2	8.9%	814.5%	8.9%	814.5%
Bellamour Lane (between Uttoxeter Road and Main Road)	WB	78	1	78	1	78	1	0.0%	0.0%	0.0%	0.0%
	EB	71	2	71	2	71	2	0.0%	0.0%	0.0%	0.0%

Location	Direction	2023 baseline		2023 with HS2 Phase One		2023 with HS2 Phase One plus 2a		Phase 2a % change		With HS2 Phase One & 2a % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
Bellamour Way (between High Street and Uttoxeter Road)	WB	85	1	85	1	85	1	0.0%	0.0%	0.0%	0.0%
	EB	52	2	52	2	52	2	0.0%	0.0%	0.0%	0.0%
Hollow Lane (between High Street and Blithbury Road)	EB	23	1	23	1	23	1	0.0%	0.0%	0.0%	0.0%
	WB	17	1	17	1	17	1	0.0%	0.0%	0.0%	0.0%
Blithbury Road (between Hadley Gate and AP2 revised scheme)	WB	45	2	45	2	52	4	16.3%	94.0%	16.3%	94.0%
	EB	75	2	75	2	82	4	9.8%	94.9%	9.8%	94.9%
Blithbury Road (between Hollow Lane and Colton Road)	WB	82	5	82	5	111	9	35.1%	91.0%	35.1%	91.0%
	EB	87	3	87	3	116	8	32.8%	149.0%	32.8%	149.0%
Blithbury Road (between Stoneyford Lane and Blithbury Road)	WB	88	3	88	3	100	5	14.6%	103.1%	14.6%	103.1%
	EB	111	2	111	2	124	5	11.6%	109.2%	11.6%	109.2%
Blithbury Road (between Pipe Lane and Rugeley School)	EB	13	1	13	1	15	3	13.5%	203.6%	13.5%	203.6%
	WB	20	0	20	0	21	2	8.9%	814.5%	8.9%	814.5%
Blithbury Road (between Rugeley School and Dawson Lane)	EB	13	1	13	1	13	1	0.0%	0.0%	0.0%	0.0%
	WB	20	0	20	0	20	0	0.0%	0.0%	0.0%	0.0%
Blithbury Road (between Uttoxeter Road and Pipe Lane)	EB	44	0	44	0	57	2	28.8%	428.6%	28.8%	428.6%
	WB	29	1	29	1	41	3	44.6%	159.8%	44.6%	159.8%
Blithbury Road (between Uttoxeter Road and AP2 revised scheme)	WB	45	2	45	2	52	4	16.3%	94.0%	16.3%	94.0%
	EB	75	2	75	2	82	4	9.8%	94.9%	9.8%	94.9%

Location	Direction	2023 baseline		2023 with HS2 Phase One		2023 with HS2 Phase One plus 2a		Phase 2a % change		With HS2 Phase One & 2a % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
Wood End Lane (between Lichfield Road and Netherstowe Lane)	SB	467	5	479	5	495	33	3.5%	594.4%	6.1%	594.4%
	NB	222	7	234	7	251	35	7.2%	419.0%	12.8%	419.0%
Wood End Lane (between Gorse Lane and Netherstowe Lane)	SB	522	6	566	38	586	60	3.4%	58.6%	12.2%	861.4%
	NB	355	9	399	41	419	63	4.9%	54.4%	18.0%	587.8%
Wood End Lane (between Gorse Lane and Nanscawen Road)	EB	497	15	547	49	558	69	2.0%	42.5%	12.4%	373.4%
	WB	288	16	338	50	349	71	3.2%	41.4%	21.3%	343.0%
Wood End Lane (between Nanscawen Road and A38 Rykneld Street)	EB	479	29	530	63	540	84	2.0%	32.9%	12.8%	188.8%
	WB	405	29	455	63	466	83	2.4%	32.9%	15.2%	189.5%
Wood End Lane (between Rykneld Street and Wood End Lane/west-bound)	EB	592	74	626	103	637	114	1.6%	10.3%	7.6%	54.5%
	WB	214	23	249	53	259	63	4.1%	20.2%	21.1%	174.3%
Wood End Lane (between Brookhay Lane and Wood End Lane/west-bound)	WB	214	23	249	53	259	63	4.1%	20.2%	21.1%	174.3%
	EB	592	74	626	103	637	114	1.6%	10.3%	7.6%	54.5%
The Friary (between Friary Island and Upper St John Street)	EB	506	27	506	27	506	27	0.0%	0.0%	0.0%	0.0%
	WB	765	41	765	41	765	41	0.0%	0.0%	0.0%	0.0%
Dawson Lane (between Blithbury Road and Mavesyn Ridware 33 footpath)	SB	1	0	1	0	1	0	0.0%	N/A	0.0%	N/A
	NB	3	0	3	0	3	0	0.0%	N/A	0.0%	N/A
Dawson Lane (between Pipe Lane and Mavesyn Ridware 33 footpath)	NB	3	0	3	0	13	0	401.8%	N/A	401.8%	N/A
	SB	1	0	1	0	11	0	2143.1%	N/A	2143.1%	N/A

Location	Direction	2023 baseline		2023 with HS2 Phase One		2023 with HS2 Phase One plus 2a		Phase 2a % change		With HS2 Phase One & 2a % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
Pipe Lane (between Blithbury Road and Mavesyn Ridware 37 footpath)	SB	3	0	3	0	3	0	10.6%	69.6%	10.6%	69.6%
	NB	2	0	2	0	3	0	11.7%	N/A	11.7%	N/A
Pipe Lane (between Mavesyn Ridware 37 footpath and AP2 revised scheme)	SB	2	0	2	0	7	0	178.4%	0.0%	178.4%	0.0%
	NB	2	0	2	0	7	0	204.6%	0.0%	204.6%	0.0%
Pipe Lane (between AP2 revised scheme and Quintons Orchard)	SB	2	0	2	0	7	0	178.4%	0.0%	178.4%	0.0%
	NB	2	0	2	0	7	0	204.6%	0.0%	204.6%	0.0%
Crawley Lane (between Lichfield Road and Common Lane)	SB	5	1	5	1	5	1	0.0%	0.0%	0.0%	0.0%
	NB	4	0	4	0	4	0	0.0%	0.0%	0.0%	0.0%
Common Lane (between Crawley Lane and AP2 revised scheme)	WB	5	0	5	0	34	1	636.2%	367.6%	636.2%	367.6%
	EB	4	1	4	1	34	1	728.7%	137.9%	728.7%	137.9%
Common Lane (between Lichfield Road and AP2 revised scheme)	EB	4	1	4	1	34	1	728.7%	137.9%	728.7%	137.9%
	WB	5	0	5	0	34	1	636.2%	367.6%	636.2%	367.6%
Sherracop Lane (between Uttoxeter Road and Park Lane)	SEB	0	0	0	0	0	0	0.0%	N/A	0.0%	N/A
	NWB	1	0	1	0	1	0	0.0%	0.0%	0.0%	0.0%
High Street (between Newlands Lane and Heathway)	SB	9	0	9	0	9	0	0.0%	0.0%	0.0%	0.0%
	NB	8	0	8	0	8	0	0.0%	0.0%	0.0%	0.0%
Hadley Gate Lane (between Blithbury Road and AP2 revised scheme)	NB	0	0	0	0	0	0	0.0%	N/A	0.0%	N/A
	SB	1	0	1	0	1	0	0.0%	N/A	0.0%	N/A

Location	Direction	2023 baseline		2023 with HS2 Phase One		2023 with HS2 Phase One plus 2a		Phase 2a % change		With HS2 Phase One & 2a % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
Moor Lane (between AP2 revised scheme and Uttoxeter Road)	WB	10	1	10	1	10	1	0.0%	0.0%	0.0%	0.0%
	EB	5	0	5	0	5	0	0.0%	N/A	0.0%	N/A
Moor Lane (between Newlands Lane and AP2 revised scheme)	WB	10	1	10	1	10	1	0.0%	0.0%	0.0%	0.0%
	EB	5	0	5	0	5	0	0.0%	N/A	0.0%	N/A
Newlands Lane (between Moor Lane and close to Narrow Lane)	SB	4	0	4	0	4	0	0.0%	0.0%	0.0%	0.0%
	NB	3	0	3	0	3	0	0.0%	0.0%	0.0%	0.0%
Newlands Lane (between High Street and AP2 revised scheme)	SB	4	0	4	0	4	0	0.0%	0.0%	0.0%	0.0%
	NB	3	0	3	0	3	0	0.0%	0.0%	0.0%	0.0%
Newlands Lane (between High Street and AP2 revised scheme/east-bound)	EB	2	0	2	0	10	0	359.2%	139.1%	359.2%	139.1%
	WB	2	0	2	0	10	0	431.1%	N/A	431.1%	N/A
Pipe Lane (between Common Lane and Chadwick Crescent)	WB	7	1	7	1	7	1	0.0%	0.0%	0.0%	0.0%
	EB	14	0	14	0	14	0	0.0%	0.0%	0.0%	0.0%
Pipe Lane (north of Common Lane)	WB	28	1	28	1	28	1	0.0%	0.0%	0.0%	0.0%
	EB	16	1	16	1	16	1	0.0%	0.0%	0.0%	0.0%
Pipe Lane (between Dawson Lane and AP2 revised scheme)	EB	14	1	14	1	14	1	0.0%	0.0%	0.0%	0.0%
	WB	23	1	23	1	23	1	0.0%	0.0%	0.0%	0.0%
Stonyford Lane (between Uttoxeter Road and Blithbury Road)	NB	45	0	45	0	45	0	0.0%	0.0%	0.0%	0.0%
	SB	27	1	27	1	27	1	0.0%	0.0%	0.0%	0.0%

Location	Direction	2023 baseline		2023 with HS2 Phase One		2023 with HS2 Phase One plus 2a		Phase 2a % change		With HS2 Phase One & 2a % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
Nanscawen Road (south of Wood End Lane)	SB	32	2	32	2	32	2	0.0%	0.0%	0.0%	0.0%
	NB	15	3	15	3	15	3	0.0%	0.0%	0.0%	0.0%
Common Lane (between Uttoxeter Road and Pipe Lane)	SB	33	1	33	1	55	9	67.3%	696.8%	67.3%	696.8%
	NB	17	1	17	1	39	9	130.2%	696.8%	130.2%	696.8%
B5014 Lichfield Road (between A515 Tewnals Road and Shaw Lane)	SB	187	3	187	3	182	8	2.7%	160.1%	2.7%	160.1%
	NB	407	3	407	3	412	8	1.2%	160.1%	1.2%	160.1%
Shaw Lane (between B5014 Lichfield Road and Pipe Lane)	SB	7	0	7	0	10	2	34.3%	N/A	34.3%	N/A
	NB	6	0	6	0	9	2	40.0%	N/A	40.0%	N/A

Table 145: 2023 future baseline and with the SES2 and AP2 revised scheme construction traffic (vehicles) – PM peak hour (17:00 – 18:00)

Location	Direction	2023 baseline		2023 with HS2 Phase One		2023 with HS2 Phase One plus 2a		Phase 2a % change		With HS2 Phase One & 2a % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
A38(T) Rykneld Street (between Burton Road and Rykneld Street/north bound slip)	SB	573	7	583	11	583	11	0.0%	0.0%	1.8%	50.8%
	NB	566	6	583	6	583	6	0.0%	0.0%	3.0%	0.0%
A51 Birmingham Road (between Friary Road and St John Street)	NB	938	20	942	20	942	20	0.0%	0.0%	0.5%	0.0%
	SB	528	11	533	11	533	11	0.0%	0.0%	0.8%	0.0%
A51 Brereton Hill (between Brereton Hill Lane and Lea Hall Way)	NB	1030	22	1038	22	1084	73	4.4%	231.2%	5.2%	231.2%
	SB	664	17	672	17	718	67	6.9%	308.2%	8.1%	308.2%
A51 Friary Avenue (between Friary Island and Birmingham Road)	SB	874	15	892	22	900	22	0.8%	0.0%	3.0%	41.5%
	NB	818	14	837	21	844	21	0.9%	0.0%	3.2%	44.4%

Location	Direction	2023 baseline		2023 with HS2 Phase One		2023 with HS2 Phase One plus 2a		Phase 2a % change		With HS2 Phase One & 2a % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
A51 Lea Hall Way (between Armitage Road and Brereton Hill)	NB	850	20	850	20	903	71	6.3%	250.3%	6.3%	250.3%
	SB	795	16	795	16	848	67	6.7%	310.7%	6.7%	310.7%
A51 Lea Hall Way (between Armitage Road and Wheelhouse Road)	NB	894	15	911	15	974	66	6.9%	335.0%	9.0%	335.0%
	SB	1106	31	1123	31	1186	82	5.6%	165.7%	7.3%	165.7%
A51 Lea Hall Way (between Wheelhouse Road and Power Station Road)	NB	1080	14	1097	14	1160	65	5.7%	361.7%	7.5%	361.7%
	SB	895	14	913	14	975	65	6.9%	356.1%	9.0%	356.1%
A51 Rugeley Eastern Bypass (between Colton Road and Lichfield Road)	WB	937	11	954	11	1027	61	7.6%	434.1%	9.6%	434.1%
	EB	584	15	602	15	674	65	12.0%	326.3%	15.4%	326.3%
A51 Stafford Road (between Constitution Island and Brereton Hill Lane)	NB	1026	21	1034	21	1080	72	4.5%	240.1%	5.3%	240.1%
	SB	671	13	679	13	725	64	6.8%	384.2%	8.0%	384.2%
A51 Stafford Road (between Eastern Avenue and Featherbed Lane)	NB	1056	14	1082	20	1092	20	0.9%	0.0%	3.4%	46.4%
	SB	745	14	770	21	780	21	1.3%	0.0%	4.8%	44.3%
A51 Upper St John Street (between Birmingham Road and Tamworth Road)	SB	824	17	826	17	826	17	0.0%	0.0%	0.2%	0.0%
	NB	686	14	688	14	688	14	0.0%	0.0%	0.2%	0.0%
A515 Lichfield Road (between Common Lane and AP2 revised scheme)	NB	273	6	304	9	363	66	19.4%	656.3%	32.9%	1088.8%
	SB	189	7	220	10	279	67	26.9%	576.4%	47.5%	892.4%
A515 Lichfield Road (between Common Lane and AP2 revised scheme)	NB	490	9	494	9	509	9	2.9%	0.0%	3.7%	0.0%
	SB	551	15	555	15	570	15	2.6%	0.0%	3.3%	0.0%

Location	Direction	2023 baseline		2023 with HS2 Phase One		2023 with HS2 Phase One plus 2a		Phase 2a % change		With HS2 Phase One & 2a % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
A515 Lichfield Road (between Wood End Lane and Common Lane)	NB	321	2	351	6	411	63	16.8%	1026.6%	28.0%	2514.9%
	SB	247	7	278	10	337	67	21.3%	575.7%	36.3%	892.4%
A515 Lichfield Road (between Crawley Lane and Rugeley Road)	NB	490	9	494	9	509	9	2.9%	0.0%	3.7%	0.0%
	SB	551	15	555	15	570	15	2.6%	0.0%	3.3%	0.0%
A515 Main Street (between Town Hill and Lodge Lane)	NB	205	10	206	10	206	10	0.0%	0.0%	0.3%	0.0%
	SB	250	11	250	11	250	11	0.0%	0.0%	0.3%	0.0%
A515 Tewnalls Lane (between Stafford Road and Wood End Lane)	NB	506	17	523	23	574	68	9.7%	191.1%	13.5%	299.8%
	SB	329	11	347	17	397	62	14.6%	260.7%	20.8%	473.1%
A515 Yoxal Road (between Manor Road and Lichfield Road)	EB	316	11	316	11	316	11	0.0%	0.0%	0.2%	0.0%
	WB	290	11	291	11	291	11	0.0%	0.0%	0.2%	0.0%
A51 Western Bypass (between Friary Island and Eastern Avenue)	NB	1205	14	1224	20	1231	20	0.6%	0.0%	2.1%	46.0%
	SB	958	21	976	27	983	27	0.8%	0.0%	2.7%	30.5%
A5127 Trent Valley Road (between Eastern Avenue and Rykneld Street)	EB	589	5	601	7	601	7	0.0%	0.0%	2.0%	34.9%
	WB	669	9	681	11	681	11	0.0%	0.0%	1.8%	19.6%
A513 Alrewas Bypass from Kings Bromley Road to A38 at Croxall Road	EB	313	14	317	14	331	14	4.5%	0.0%	5.6%	0.0%
	WB	446	14	450	14	464	14	3.2%	0.0%	4.0%	0.0%
A513 Alrewas Road (between Yoxall Road and Ogreave Hall Lane)	EB	323	12	326	12	341	12	4.3%	0.0%	5.5%	0.0%
	WB	447	18	451	18	465	18	3.1%	0.0%	4.0%	0.0%

Location	Direction	2023 baseline		2023 with HS2 Phase One		2023 with HS2 Phase One plus 2a		Phase 2a % change		With HS2 Phase One & 2a % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
A513 Kings Bromley Lane (between AP2 revised scheme and Uttoxeter Road)	WB	433	8	451	8	499	16	10.5%	97.0%	15.0%	97.0%
	EB	266	5	284	5	332	12	16.7%	166.8%	24.4%	166.8%
A515 Lichfield Road (between Rugeley Road and AP2 revised scheme)	NB	273	6	278	6	343	41	23.8%	633.4%	25.6%	633.4%
	SB	189	7	194	7	259	42	34.1%	520.0%	37.0%	520.0%
A513 Rugeley Road (between Shaw Lane and AP2 revised scheme)	WB	429	10	446	10	506	45	13.3%	368.7%	18.0%	368.7%
	EB	264	4	282	4	342	39	21.1%	988.1%	29.2%	988.1%
A5192 Cappers Ln (between Austin Cote Ln and Rykneld Street)	EB	531	7	546	9	546	9	0.0%	0.0%	2.8%	24.4%
	WB	629	9	644	11	644	11	0.0%	0.0%	2.4%	20.7%
A5192 Cappers Lane (between Austin Cote Lane and Rykneld Street)	NB	869	13	884	15	884	15	0.0%	0.0%	1.7%	13.9%
	SB	895	15	910	17	910	17	0.0%	0.0%	1.7%	11.9%
A5192 Eastern Avenue (between Grange Lane and Stafford Road)	NB	539	13	546	13	549	13	0.5%	0.0%	1.8%	0.0%
	SB	747	10	754	10	757	10	0.4%	0.0%	1.3%	0.0%
A5192 Eastern Avenue (between Netherstone Lane and Grange Lane)	WB	945	8	952	8	955	8	0.3%	0.0%	1.0%	0.0%
	EB	582	13	589	13	592	13	0.5%	0.0%	1.7%	0.0%
A5192 Eastern Avenue (between Trent Valley Road and Netherstowe Lane)	NB	994	10	1001	10	1004	10	0.3%	0.0%	1.0%	0.0%
	SB	1013	14	1020	14	1023	14	0.3%	0.0%	1.0%	0.0%
A5206 London Road (between Tamworth Road and A38)	SB	709	5	714	5	714	5	0.0%	0.0%	0.6%	0.0%
	NB	842	6	846	6	846	6	0.0%	0.0%	0.5%	0.0%

Location	Direction	2023 baseline		2023 with HS2 Phase One		2023 with HS2 Phase One plus 2a		Phase 2a % change		With HS2 Phase One & 2a % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
A5121 Wellington Road (between the B5017 Shobnall Road and Parkway)	NB	774	25	774	25	776	26	0.2%	7.7%	0.2%	7.7%
	SB	728	10	728	10	730	12	0.3%	19.6%	0.3%	19.6%
B5013 Abbots Bromley Road (between Newton Hurst Lane and Quee Lane)	NB	203	5	203	5	203	5	0.0%	0.0%	0.0%	0.0%
	SB	246	4	246	4	246	4	0.0%	0.0%	0.0%	0.0%
B5013 Colton Road (between Blithbury Road and Bellamour Way)	NB	311	2	311	2	328	10	5.6%	382.2%	5.6%	382.2%
	SB	295	2	295	2	312	10	5.9%	518.7%	5.9%	518.7%
B5013 Colton Road (between Rugeley Eastern Bypass and Blithbury Road)	EB	371	4	371	4	413	12	11.3%	193.5%	11.3%	193.5%
	WB	482	2	482	2	524	10	8.7%	367.6%	8.7%	367.6%
B5013 Uttoxeter Road (between Uttoxeter Road and Dunstall Lane)	NB	243	4	243	4	243	4	0.0%	0.0%	0.0%	0.0%
	SB	273	5	273	5	273	5	0.0%	0.0%	0.0%	0.0%
B5013 Uttoxeter Road (between Bellamour Lane and Colton Road)	WB	307	4	307	4	325	12	5.7%	213.6%	5.7%	213.6%
	EB	256	3	256	3	274	11	6.8%	255.8%	6.8%	255.8%
B5013 Uttoxeter Road (between AP2 revised scheme and Moor Lane)	NB	253	4	253	4	264	6	4.1%	78.2%	4.1%	78.2%
	SB	284	6	284	6	294	9	3.7%	44.9%	3.7%	44.9%
B5013 Uttoxeter Road (between Moor Lane and Bellamour Lane)	NB	256	2	256	2	274	10	6.8%	436.3%	6.8%	436.3%
	SB	290	6	290	6	307	14	6.0%	127.9%	6.0%	127.9%
B5013 Uttoxeter Road (between Sherracop Lane and AP2 revised scheme)	NB	253	4	253	4	264	6	4.1%	78.2%	4.1%	78.2%
	SB	284	6	284	6	294	9	3.7%	44.9%	3.7%	44.9%

Location	Direction	2023 baseline		2023 with HS2 Phase One		2023 with HS2 Phase One plus 2a		Phase 2a % change		With HS2 Phase One & 2a % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
B5013 Uttoxeter Road (between Sherracop Lane and Uttoxeter Road)	NB	227	4	227	4	229	4	0.7%	0.0%	0.7%	0.0%
	SB	266	4	266	4	268	4	0.6%	0.0%	0.6%	0.0%
B5014 Lichfield Road (between Ashbrook Lane and Seedcroft Lane)	SB	88	1	88	1	89	1	1.5%	0.0%	1.5%	0.0%
	NB	80	3	80	3	82	3	1.6%	0.0%	1.6%	0.0%
B5014 Rake End Lane (between School Lane and Stoneyford Lane)	NB	105	2	105	2	110	2	5.2%	0.0%	5.2%	0.0%
	SB	102	2	102	2	107	2	5.3%	0.0%	5.3%	0.0%
B5014 Uttoxeter Road (between Blithbury Road and AP2 revised scheme)	NB	73	1	73	1	79	1	7.4%	0.0%	7.4%	0.0%
	SB	64	1	64	1	69	1	8.5%	0.0%	8.5%	0.0%
B5014 Uttoxeter Road (between Blithbury Road and Seedcfroft Lane)	NB	88	2	88	2	88	2	0.0%	0.0%	0.0%	0.0%
	SB	95	7	95	7	95	7	0.0%	0.0%	0.0%	0.0%
B5014 Uttoxeter Road (between Common Lane and School Lane)	WB	176	2	176	2	181	2	3.1%	0.0%	3.1%	0.0%
	EB	103	2	103	2	109	2	5.2%	0.0%	5.2%	0.0%
B5014 Uttoxeter Road (between Kings Bromley Lane and Common Lane)	NB	210	1	210	1	237	8	12.8%	995.3%	12.8%	995.3%
	SB	147	1	147	1	174	9	18.3%	580.6%	18.3%	580.6%
B5014 Uttoxeter Road (between Stoneyford Lane and AP2 revised scheme)	NB	73	1	73	1	79	1	7.4%	0.0%	7.4%	0.0%
	SB	64	1	64	1	69	1	8.5%	0.0%	8.5%	0.0%
B5017 Henhurst Hill (between Hopley Ln and Aviation Rd)	EB	420	36	420	36	422	38	0.4%	5.3%	0.4%	5.3%
	WB	444	26	444	26	445	28	0.4%	7.3%	0.4%	7.3%

Location	Direction	2023 baseline		2023 with HS2 Phase One		2023 with HS2 Phase One plus 2a		Phase 2a % change		With HS2 Phase One & 2a % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
B5017 Forest Road (between Aviation Ln and Parkway)	EB	357	30	357	30	359	32	0.5%	6.2%	0.5%	6.2%
	WB	416	24	416	24	418	26	0.5%	7.7%	0.5%	7.7%
B5017 Shobnall Road (between A5121 Wellington Rd and Parkway)	EB	867	22	867	22	869	24	0.2%	8.4%	0.2%	8.4%
	WB	784	15	784	15	786	17	0.2%	12.6%	0.2%	12.6%
B5234 Ashbrook Lane (between A515 Lichfield Road and Brickhill Lane)	EB	104	2	104	2	106	2	1.6%	0.0%	1.6%	0.0%
	WB	166	2	166	2	168	2	1.0%	0.0%	1.0%	0.0%
B5234 Burton Road (between A515 Lichfield Road and Brickhill Lane)	EB	85	4	85	4	88	6	4.2%	43.5%	4.2%	43.5%
	WB	128	7	128	7	132	8	2.8%	29.0%	2.8%	29.0%
Shaw Lane (between Rugeley Road and AP2 revised scheme)	SB	6	0	24	0	21	0	-9.0%	N/A	263.2%	N/A
	NB	7	0	24	0	22	0	-8.8%	0.0%	236.6%	0.0%
Bellamour Lane (between Uttoxeter Road and Main Road)	WB	62	1	62	1	62	1	0.0%	0.0%	0.0%	0.0%
	EB	53	1	53	1	53	1	0.0%	0.0%	0.0%	0.0%
Bellamour Way (between High Street and Uttoxeter Road)	WB	49	1	49	1	49	1	0.0%	0.0%	0.0%	0.0%
	EB	81	1	81	1	81	1	0.0%	0.0%	0.0%	0.0%
Hollow Lane (between High Street and Blithbury Road)	EB	21	0	21	0	21	0	0.0%	0.0%	0.0%	0.0%
	WB	25	0	25	0	25	0	0.0%	0.0%	0.0%	0.0%
Blithbury Road (between Hadley Gate and AP2 revised scheme)	WB	52	1	52	1	59	2	13.3%	238.3%	13.3%	238.3%
	EB	43	1	43	1	50	3	16.1%	222.1%	16.1%	222.1%

Location	Direction	2023 baseline		2023 with HS2 Phase One		2023 with HS2 Phase One plus 2a		Phase 2a % change		With HS2 Phase One & 2a % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
Blithbury Road (between Hollow Lane and Colton Road)	WB	84	3	84	3	113	7	34.9%	161.4%	34.9%	161.4%
	EB	69	1	69	1	98	6	42.5%	362.6%	42.5%	362.6%
Blithbury Road (between Stoneyford Lane and Blithbury Road)	WB	82	1	82	1	94	4	15.2%	268.0%	15.2%	268.0%
	EB	88	1	88	1	100	4	14.1%	254.1%	14.1%	254.1%
Blithbury Road (between Pipe Lane and Rugeley School)	EB	15	0	15	0	17	2	11.5%	1628.5%	11.5%	1628.5%
	WB	14	1	14	1	16	2	12.6%	271.4%	12.6%	271.4%
Blithbury Road (between Rugeley School and Dawson Lane)	EB	15	0	15	0	15	0	0.0%	0.0%	0.0%	0.0%
	WB	14	1	14	1	14	1	0.0%	0.0%	0.0%	0.0%
Blithbury Road (between Uttoxeter Road and Pipe Lane)	EB	26	0	26	0	38	2	47.1%	857.1%	47.1%	857.1%
	WB	34	0	34	0	46	2	36.2%	N/A	36.2%	N/A
Blithbury Road (between Uttoxeter Road and AP2 revised scheme)	WB	52	1	52	1	59	2	13.3%	238.3%	13.3%	238.3%
	EB	43	1	43	1	50	3	16.1%	222.1%	16.1%	222.1%
Wood End Lane (between Lichfield Road and Netherstowe Lane)	SB	205	5	216	5	233	33	7.8%	545.2%	13.9%	545.2%
	NB	500	5	511	5	528	33	3.3%	610.1%	5.7%	610.1%
Wood End Lane (between Gorse Lane and Netherstowe Lane)	SB	298	7	338	38	352	61	4.4%	58.1%	18.2%	821.1%
	NB	595	6	634	38	649	60	2.3%	58.6%	9.1%	863.6%
Wood End Lane (between Gorse Lane and Nanscawen Road)	EB	261	9	312	43	323	63	3.5%	48.5%	23.5%	631.8%
	WB	567	30	618	64	629	85	1.7%	32.3%	10.8%	181.8%

Location	Direction	2023 baseline		2023 with HS2 Phase One		2023 with HS2 Phase One plus 2a		Phase 2a % change		With HS2 Phase One & 2a % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
Wood End Lane (between Nanscawen Road and A38 Rykneld Street)	EB	359	16	410	50	420	70	2.6%	41.6%	17.1%	348.6%
	WB	528	49	578	83	589	103	1.9%	25.0%	11.6%	112.1%
Wood End Lane (between Rykneld Street and Wood End Lane/west-bound)	EB	502	45	540	74	550	85	2.0%	14.3%	9.6%	89.7%
	WB	276	23	314	52	324	63	3.4%	20.3%	17.5%	177.5%
Wood End Lane (between Brookhay Lane and Wood End Lane/west-bound)	WB	276	23	314	52	324	63	3.4%	20.3%	17.5%	177.5%
	EB	502	45	540	74	550	85	2.0%	14.3%	9.6%	89.7%
The Friary (between Friary Island and Upper St John Street)	EB	719	17	719	17	719	17	0.0%	0.0%	0.0%	0.0%
	WB	646	15	646	15	646	15	0.0%	0.0%	0.0%	0.0%
Dawson Lane (between Blithbury Road and Mavesyn Ridware 33 footpath)	SB	1	0	1	0	1	0	0.0%	N/A	0.0%	N/A
	NB	1	0	1	0	1	0	0.0%	N/A	0.0%	N/A
Dawson Lane (between Pipe Lane and Mavesyn Ridware 33 footpath)	NB	1	0	1	0	11	0	1652.8%	N/A	1652.8%	N/A
	SB	1	0	1	0	12	0	741.6%	N/A	741.6%	N/A
Pipe Lane (between Blithbury Road and Mavesyn Ridware 37 footpath)	SB	1	0	1	0	1	0	23.1%	N/A	23.1%	N/A
	NB	2	0	2	0	2	0	16.2%	69.5%	16.2%	69.5%
Pipe Lane (between Mavesyn Ridware 37 footpath and AP2 revised scheme)	SB	3	0	3	0	7	0	122.1%	N/A	122.1%	N/A
	NB	1	0	1	0	5	0	346.6%	0.0%	346.6%	0.0%
Pipe Lane (between AP2 revised scheme and Quintons Orchard)	SB	3	0	3	0	7	0	122.1%	N/A	122.1%	N/A
	NB	1	0	1	0	5	0	346.6%	0.0%	346.6%	0.0%

Location	Direction	2023 baseline		2023 with HS2 Phase One		2023 with HS2 Phase One plus 2a		Phase 2a % change		With HS2 Phase One & 2a % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
Crawley Lane (between Lichfield Road and Common Lane)	SB	5	1	5	1	5	1	0.0%	0.0%	0.0%	0.0%
	NB	4	0	4	0	4	0	0.0%	0.0%	0.0%	0.0%
Common Lane (between Crawley Lane and AP2 revised scheme)	WB	3	0	3	0	33	1	854.6%	368.4%	854.6%	368.4%
	EB	2	0	2	0	31	1	1746.4%	552.6%	1746.4%	552.6%
Common Lane (between Lichfield Road and AP2 revised scheme)	EB	2	0	2	0	31	1	1746.4%	552.6%	1746.4%	552.6%
	WB	3	0	3	0	33	1	854.6%	368.4%	854.6%	368.4%
Sherracop Lane (between Uttoxeter Road and Park Lane)	SEB	1	0	1	0	1	0	0.0%	0.0%	0.0%	0.0%
	NWB	4	0	4	0	4	0	0.0%	0.0%	0.0%	0.0%
High Street (between Newlands Lane and Heathway)	SB	13	0	13	0	13	0	0.0%	0.0%	0.0%	0.0%
	NB	6	0	6	0	6	0	0.0%	0.0%	0.0%	0.0%
Hadley Gate Lane (between Blithbury Road and AP2 revised scheme)	NB	1	0	1	0	1	0	0.0%	N/A	0.0%	N/A
	SB	1	0	1	0	1	0	0.0%	N/A	0.0%	N/A
Moor Lane (between AP2 revised scheme and Uttoxeter Road)	WB	6	0	6	0	6	0	0.0%	0.0%	0.0%	0.0%
	EB	4	0	4	0	4	0	0.0%	0.0%	0.0%	0.0%
Moor Lane (between Newlands Lane and AP2 revised scheme)	WB	6	0	6	0	6	0	0.0%	0.0%	0.0%	0.0%
	EB	4	0	4	0	4	0	0.0%	0.0%	0.0%	0.0%
Newlands Lane (between Moor Lane and close to Narrow Lane)	SB	10	0	10	0	10	0	0.0%	0.0%	0.0%	0.0%
	NB	3	0	3	0	3	0	0.0%	0.0%	0.0%	0.0%

Location	Direction	2023 baseline		2023 with HS2 Phase One		2023 with HS2 Phase One plus 2a		Phase 2a % change		With HS2 Phase One & 2a % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
Newlands Lane (between High Street and AP2 revised scheme)	SB	10	0	10	0	10	0	0.0%	0.0%	0.0%	0.0%
	NB	3	0	3	0	3	0	0.0%	0.0%	0.0%	0.0%
Newlands Lane (between High Street and AP2 revised scheme/east-bound)	EB	1	0	1	0	1	0	0.0%	N/A	0.0%	N/A
	WB	1	0	1	0	1	0	0.0%	0.0%	0.0%	0.0%
Pipe Lane (between Common Lane and Chadwick Crescent)	WB	8	0	8	0	8	0	0.0%	N/A	0.0%	N/A
	EB	12	0	12	0	12	0	0.0%	N/A	0.0%	N/A
Pipe Lane (north of Common Lane)	WB	20	0	20	0	20	0	0.0%	0.0%	0.0%	0.0%
	EB	24	1	24	1	24	1	0.0%	0.0%	0.0%	0.0%
Pipe Lane (between Dawson Lane and AP2 revised scheme)	EB	20	1	20	1	20	1	0.0%	0.0%	0.0%	0.0%
	WB	15	0	15	0	15	0	0.0%	0.0%	0.0%	0.0%
Stonyford Lane (between Uttoxeter Road and Blithbury Road)	NB	42	1	42	1	42	1	0.0%	0.0%	0.0%	0.0%
	SB	39	0	39	0	39	0	0.0%	N/A	0.0%	N/A
Nanscawen Road (south of Wood End Lane)	SB	15	2	15	2	15	2	0.0%	0.0%	0.0%	0.0%
	NB	26	2	26	2	26	2	0.0%	0.0%	0.0%	0.0%
Common Lane (between Uttoxeter Road and Pipe Lane)	SB	20	1	20	1	42	9	106.4%	696.7%	106.4%	696.7%
	NB	24	1	24	1	45	9	91.2%	696.7%	91.2%	696.7%
A5014 Lichfield Road (between A515 Tewnals Road and Shaw Lane)	SB	432	2	432	2	437	7	1.2%	240.1%	1.2%	240.1%
	NB	210	4	210	4	215	9	2.4%	120.1%	2.4%	120.1%

Location	Direction	2023 baseline		2023 with HS2 Phase One		2023 with HS2 Phase One plus 2a		Phase 2a % change		With HS2 Phase One & 2a % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
Shaw Lane (between B5015 Lichfield Road and Pipe Lane)	SB	7	0	7	0	10	2	34.3%	N/A	34.3%	N/A
	NB	8	0	8	0	11	2	30.0%	N/A	30.0%	N/A

Summary of link flows

2.6.20 The AP2 revised scheme includes changes to construction traffic flows as a consequence of new construction traffic routes such as Wood End Lane and changes to the movement and use of surplus excavated material. This has resulted in reductions in construction vehicles on a number of routes including the A51, A515, A513, A5192, B5013 and B5014 corridors but also on local roads such as Bellamour Lane, Blithbury Road and Dawson Lane.

2.6.21 The results show that in the AM and PM peak hours strategic and primary routes such as the A38(T) Rykneld Street and A51 corridor will generally see increases in total vehicle traffic of less than 12% as a result of the AP2 revised scheme construction traffic. Increases in HGV traffic are generally higher.

2.6.22 Other roads identified as construction routes show a similar pattern, with higher percentage increases in HGVs but with generally minor increases in total vehicular flow.

2.6.23 A summary of routes/corridors with percentage increases of over 30% in either total vehicle movements or HGVs is set out below:

- A51 Brereton Hill between Brereton Hill and Lea Hall Way – (HGVs);
- A51 Lea Hall Way between Brereton Hill and Power Station – (HGVs);
- A51 Rugeley Eastern Bypass between Colton Road and Lichfield Road – (HGVs);
- A51 Stafford Road between Constitution Island and Brereton Hill Lane – (HGVs);
- A515 Lichfield Road between Common Lane and Wood End Lane – (All Vehicles and HGVs);
- A515 Tewnalls Lane between Stafford Road and Wood End Lane – (HGVs);
- A513 Kings Bromley Lane between AP2 revised Scheme and Uttoxeter Road – (HGVs);
- A515 Lichfield Road between Rugeley Road and AP2 revised scheme – (All Vehicles and HGVs);
- A513 Rugeley Road between Shaw Lane and AP2 revised scheme – (HGVs);
- B5013 Colton Road Rugeley Eastern Bypass and Bellamour Way – (HGVs);
- B5013 Uttoxeter Road between the Sherracop Lane and Bellamour Lane – (HGVs);
- B5104 Uttoxeter Road between Kings Bromley Lane and Common Lane – (HGVs);
- B5234 Burton Road between A515 Lichfield Road and Brickhill Lane – (HGVs);
- Shaw Lane between Rugeley Road and AP2 revised scheme – (All Vehicles);

- Blithbury Road between Rugeley School and Hollow Lane – (HGVs);
- Wood End Lane between A38 Rynkeld Street and A515 Lichfield Road – (HGVs);
- B5014 Lichfield Road berween A515 Tewnals Road and Shaw Lane – (HGVs);
- Shaw Lane between B5014 Lichfield Road and PipeLane – (HGVs);
- Dawson Lane between Pipe Lane and Mavesyn Ridware 33 footpath – (All Vehicles);
- Pipe Lane between Blithbury Road and Quintons Orchard – (HGVs); and
- Common Lane between the A515 Lichfield Road and Crawley Lane and between Uttoxeter Road and Pipe Lane – (All Vehicles and HGVs).

2.6.24 Consideration of both the AP2 revised scheme and construction traffic associated with HS2 Phase One cumulatively has also been assessed and identifies that there would be increases in traffic for the AP2 revised scheme and HS2 Phase One in combination of more than 30% in either total vehicle movements or HGVs at the following locations:

- A38(T) Rykneld Street (between Burton Road and Rykneld Street/north bound slip) – (HGVs);
- A51 Stafford Road (between A5192 Eastern Avenue and Featherbed Lane) – (HGVs);
- A51 Western Bypass (between Friary Island and A5192 Eastern Avenue) – (HGVs); and
- A5127 Trent Valley Road (between A5192 Eastern Avenue and Rykneld Street) – (HGVs).

2.6.25 It should be noted that, unless identified in the next section of this report that considers junction impacts, these increases in traffic will not result in increased congestion or delay.

Junction performance 2023

2.6.26 The following tables and commentary set out the performance at junctions where there is the potential for the AP2 revised scheme in isolation with HS2 Phase One in the baseline or in combination with HS2 Phase One to have substantial impacts. The impact in isolation can be assessed by comparing the results with the AP2 revised scheme and HS2 Phase One against the future baseline including HS2 Phase One. The combined impact can be assessed by comparing the combined results against the future baseline without HS2 Phase One.

2.6.27 The results are presented in the same order as presented in the main TA. Junctions that were not modelled in the main TA are provided at the end of the junction performance section. The results for the AM and PM peak hours are presented and the 2023 future baseline results are included for comparison. The models developed to assess the existing and future baseline have been used, except where otherwise stated.

Lancaster Road/Wood End Lane/Wellington Crescent

2.6.28 Table 146 of the main TA summarises the results of the changes in performance of the junction as a result of the original scheme. Table 146 in the main TA is replaced by Table 146 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme construction traffic.

Table 146: Lancaster Road/Wood End Lane/Wellington Crescent junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment results

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Lancaster Road	146	0.09	0	146	0.10	0	146	0.10	0
Wood End Lane (east)	522	0.18	0	606	0.21	0	631	0.22	0
Wellington Crescent	53	0.03	0	53	0.03	0	53	0.04	0
Wood End Lane (west)	682	0.26	0	766	0.29	1	791	0.30	1
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Lancaster Road	231	0.14	0	231	0.14	0	231	0.14	0
Wood End Lane (east)	423	0.14	0	507	0.17	0	532	0.18	0
Wellington Crescent	237	0.15	0	237	0.15	0	237	0.16	0
Wood End Lane (west)	372	0.15	0	456	0.18	0	481	0.19	0

2.6.29 The conclusions drawn in paragraph 7.4.20 of the main TA are replaced by:

"The results show that the junction operates within capacity in the 2023 baseline (with and without HS2 Phase One) and with the addition of the AP2 revised scheme construction traffic, without any substantial increases in queuing or RFC."

Common Lane/Wood End Lane

2.6.30 Table 147 of the main TA summarises the results of the changes in performance of the junction as a result of the original scheme. Table 147 in the main TA is replaced by Table 147 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme construction traffic.

Table 147: Common Lane/Wood End Lane junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Wood End Lane (west)	619	0.34	1	703	0.39	1	728	0.40	1
Common Lane	472	0.14	0	472	0.15	0	472	0.15	0
Wood End Lane	324	0.11	0	408	0.13	0	433	0.14	0

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
(east)									
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Wood End Lane (west)	412	0.23	0	496	0.28	0	521	0.29	1
Common Lane	424	0.15	0	424	0.15	0	424	0.15	0
Wood End Lane (east)	505	0.17	0	590	0.19	0	615	0.19	0

2.6.31 The conclusions drawn in paragraph 7.4.22 of the main TA are replaced by:

"The results show that the junction operates within capacity in the 2023 baseline (with and without HS2 Phase One) and with the addition of the AP2 revised scheme construction traffic, without any substantial increases in queuing or RFC."

Wood End Lane/Gorse Lane/Tesco access

2.6.32 Table 148 of the main TA summarises the results of the changes in performance of the junction as a result of the original scheme. Table 148 in the main TA is replaced by Table 148 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme construction traffic.

Table 148: Wood End Lane/Gorse Lane/Tesco access junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Gorse Lane	122	0.09	0	122	0.10	0	122	0.10	0
Tesco Access	0	0	0	0	0	0	0	0	0
Wood End Lane (east)	279	0.19	0	363	0.25	0	393	0.27	1
Wood End Lane (west)	503	0.36	1	587	0.42	1	617	0.44	1
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Gorse Lane	113	0.08	0	113	0.08	0	113	0.08	0
Tesco Access	0	0	0	0	0	0	0	0	0
Wood End Lane (east)	583	0.40	1	668	0.46	1	697	0.48	1
Wood End Lane (west)	230	0.17	0	314	0.23	0	344	0.25	0

2.6.33 The conclusions drawn in paragraph 7.4.24 of the main TA are replaced by:

"The results show that the junction operates within capacity in the 2023 baseline (with and without HS2 Phase One) and the AP2 revised scheme construction traffic, without any substantial increases in queuing or RFC."

A515 Featherbed Lane/A51 Stafford Road

2.6.34 Table 149 of the main TA summarises the results of the changes in performance of the junction as a result of the original scheme. Table 149 in the main TA is replaced by Table 149 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme construction traffic.

Table 149: A515 Featherbed Lane/A51 Stafford Road junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A51 Stafford Road (north)	1382	0.69	2	1390	0.70	2	1486	0.75	3
A515 Featherbed Lane	459	0.43	1	482	0.45	1	586	0.55	1
A51 Stafford Road (south)	948	0.47	1	979	0.49	1	976	0.5	1
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A51 Stafford Road (north)	746	0.38	1	754	0.39	1	851	0.44	1
A515 Featherbed Lane	436	0.32	1	460	0.34	1	555	0.41	1
A51 Stafford Road (south)	1375	0.70	2	1407	0.71	3	1395	0.74	3

2.6.35 The conclusions drawn in paragraphs 7.4.26 to 7.4.28 of the main TA are replaced by:

"The results show that the junction is approaching capacity in the 2023 baseline (with and without HS2 Phase One) and with the addition of the AP2 revised scheme construction traffic in the AM peak. In the PM peak, the junction is also approaching capacity in the 2023 baseline (with and without HS2 Phase One) and with the AP2 revised scheme construction traffic.

In comparison with the 2023 future baseline (including HS2 Phase One), the addition of the AP2 revised scheme construction traffic results in the A51 Stafford Road (north) arm showing an increase in RFC from 0.70 to 0.75 with a corresponding increase in queue length from two to three PCUs in the AM peak. The A51 Stafford Road (south) arm shows an RFC value increase from 0.71 to 0.74 with no increase in queue length of three PCUs in the PM peak.

The addition of the AP2 revised scheme construction traffic therefore does not result in any substantial increases in queuing or RFC from the future baseline (including HS2 Phase One)."

A51 Western Bypass/The Friary/Friary Avenue/Friary Road

2.6.36 Table 150 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023. Table 150 in the main TA is replaced by Table 150 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 150: A515 Western Bypass/The Friary/Friary Avenue/Friary Road junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	**Flow, PCU/hr**	**RFC**	**Q, PCU**	**Flow, PCU/hr**	**RFC**	**Q, PCU**	**Flow, PCU/hr**	**RFC**	**Q, PCU**
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A51 Western Bypass	1013	0.62	2	1037	0.63	2	1043	0.64	2
The Friary	525	0.21	0	525	0.22	0	525	0.22	0
Friary Avenue	39	0.04	0	39	0.04	0	39	0.04	0
A51 The Friary/Friary Road	908	0.43	1	933	0.44	1	938	0.44	1
Friary Road	852	0.47	1	852	0.48	1	852	0.48	1
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A51 Western Bypass	1059	0.67	2	1083	0.68	2	1088	0.69	2
The Friary	802	0.36	1	802	0.36	1	802	0.36	1
Friary Avenue	80	0.12	0	80	0.13	0	80	0.13	0
A51 The Friary/Friary Road	825	0.65	2	850	0.67	2	855	0.67	2
Friary Road	655	0.40	1	655	0.41	1	655	0.41	1

2.6.37 The conclusions drawn in paragraph 7.4.30 of the main TA are replaced by:

> "The results show that the junction operates within capacity in the 2023 baseline (with and without HS2 Phase One) and with the minimal AP2 revised scheme construction traffic, without any substantial increases in queuing or RFC."

A51 Lea Hall Way/A51 Brereton Hill/A460 Brereton Hill

2.6.38 Table 151 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023. Table 151 in the main TA is replaced by Table 151 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 151: A51 Lea Hall Way/A51 Brereton Hill/A460 Brereton Hill junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A51 Lea Hall Way	1048	0.68	2	1048	0.69	2	1152	0.75	3
A51 Brereton Hill (south)	1006	0.61	2	1014	0.62	2	1110	0.68	2
A460 Brereton Hill	746	0.45	1	754	0.45	1	747	0.47	1
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A51 Lea Hall Way	825	0.55	1	825	0.55	1	929	0.62	2
A51 Brereton Hill (south)	1063	0.61	2	1071	0.62	2	1168	0.67	2
A460 Brereton Hill	1080	0.71	3	1088	0.72	3	1081	0.76	3

2.6.39 The conclusions drawn in paragraphs 7.4.32 to 7.4.34 of the main TA are replaced by:

"The results show that the junction operates within capacity in the 2023 baseline (with and without HS2 Phase One) and the AP2 revised scheme construction traffic in the AM peak. In the PM peak, the junction approaches capacity in the 2023 baseline (with and without HS2 Phase One) and with the addition of the AP2 revised scheme construction traffic.

In comparison with the 2023 future baseline (including HS2 Phase One), the addition of the AP2 revised scheme construction traffic results in the A51 Lea Hall Way arm showing an increase in RFC from 0.69 to 0.75 with a corresponding increase in queue length from two to three PCUs in the AM peak. The A460 Brereton Hill arm shows an increase in RFC from 0.72 to 0.76 with queue lengths maintained at three PCUs in the PM peak.

The addition of the AP2 revised scheme construction traffic does not result in any substantial increases in queuing or RFC from the future baseline (including HS2 Phase One)."

A51 Lea Hall Way/A513 Armitage Road

2.6.40 Table 152 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023. Table 152 in the main TA is replaced by Table 152 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 152: A51 Lea Hall Way/A513 Armitage Road junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A51 Lea Hall Way (north)	916	0.66	2	935	0.67	2	1048	0.75	3
A513 Armitage Road (east)	717	0.58	1	736	0.59	2	749	0.64	2
A51 Lea Hall Way (south)	750	0.49	1	750	0.50	1	854	0.57	2
A513 Armitage Road (west)	328	0.35	1	328	0.35	1	332	0.39	1
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A51 Lea Hall Way (north)	1113	0.81	4	1131	0.83	5	1245	0.91	9
A513 Armitage Road (east)	797	0.66	2	815	0.68	2	831	0.73	3
A51 Lea Hall Way (south)	898	0.64	2	898	0.64	2	1002	0.72	3
A513 Armitage Road (west)	306	0.36	1	306	0.36	1	314	0.41	1

2.6.41 The conclusions drawn in paragraphs 7.4.36 to 7.4.38 of the main TA are replaced by:

"The results show the junction will operate within capacity in the 2023 baseline (with and without HS2 Phase One) and approach capacity with the addition of the AP2 revised scheme construction traffic in the AM peak. In the PM peak, the junction is approaching capacity in the 2023 baseline (with and without HS2 Phase One) and at capacity with the addition of the AP2 revised scheme construction traffic.

In comparison with the 2023 baseline (including HS2 Phase One), the addition of the AP2 revised scheme construction traffic results in the A51 Lea Hall Way (north) arm showing an increase in RFC from 0.83 to 0.91 with a corresponding increase in queue length from five to nine PCUs in the PM peak.

Although the junction moves closer to capacity, the addition of the AP2 revised scheme construction traffic does not result in any substantial increases in queuing or RFC from the future baseline (including HS2 Phase One)."

A51 Lea Hall Way/Wheelhouse Road

2.6.42 Table 153 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023. Table 153 in the main TA is replaced by Table 153 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 153: A51 Lea Hall Way/Wheelhouse Road junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A51 Lea Hall Way (south)	936	0.56	1	954	0.57	1	1068	0.63	2
Wheelhouse Road	113	0.11	0	113	0.11	0	113	0.12	0
A51 Lea Hall Way (north)	945	0.49	1	963	0.50	1	1076	0.56	2
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A51 Lea Hall Way (south)	1012	0.56	1	1029	0.57	1	1143	0.64	2
Wheelhouse Road	351	0.39	1	351	0.40	1	351	0.43	1
A51 Lea Hall Way (north)	845	0.47	1	862	0.48	1	976	0.54	1

2.6.43 The conclusions drawn in paragraph 7.4.40 of the main TA are replaced by:

"The results show that the junction operates within capacity in the 2023 baseline (with and without HS2 Phase One) and with the AP2 revised scheme construction traffic, without any substantial increases in queuing or RFC from the future baseline including HS2 Phase One or the future baseline excluding HS2 Phase One."

A51 Rugeley Eastern Bypass/A51 Lea Hall Way/Power Station Road

2.6.44 Table 154 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023. Table 154 in the main TA is replaced by Table 154 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 154: A51 Rugeley Eastern Bypass/A51 Lea Hall Way/Power Station Road junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A51 Rugeley Eastern Bypass	846	0.44	1	864	0.45	1	977	0.51	1
Power Station access	0	0	0	0	0	0	0	0	0
A51 Lea Hall Way	791	0.37	1	810	0.38	1	923	0.44	1
Power Station Road	210	0.12	0	210	0.12	0	210	0.12	0
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A51 Rugeley Eastern Bypass	566	0.3	0	583	0.31	1	697	0.37	1
Power Station access	13	0.01	0	13	0.01	0	13	0.01	0

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
A51 Lea Hall Way	1116	0.52	1	1134	0.53	1	1248	0.59	2
Power Station Road	293	0.18	0	293	0.18	0	293	0.19	0

2.6.45 The conclusions drawn in paragraph 7.4.42 of the main TA are replaced by:

"The results show that the junction operates within capacity in the 2023 baseline (with and without HS2 Phase One) and the AP2 revised scheme construction traffic, without any substantial increases in queuing or RFC from the future baseline including HS2 Phase One or the future baseline excluding HS2 Phase One."

A51 Rugeley Eastern Bypass/B5013 Station Road

2.6.46 Table 155 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023. Table 155 in the main TA is replaced by Table 155 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 155: A51 Rugeley Eastern Bypass/B5013 Station Road junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A51 (north) Rugeley Eastern Bypass	846	0.5	1	864	0.51	1	987	0.57	2
B5013 Station Road (east)	446	0.34	1	446	0.34	1	481	0.39	1
A51 (south) Rugeley Eastern Bypass	579	0.33	1	597	0.35	1	684	0.40	1
B5013 Station Road (west)	445	0.36	1	445	0.36	1	450	0.38	1
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A51 (north) Rugeley Eastern Bypass	647	0.39	1	665	0.41	1	787	0.46	1
B5013 Station Road (east)	511	0.36	1	511	0.36	1	547	0.40	1
A51 (south) Rugeley Eastern Bypass	807	0.49	1	825	0.50	1	911	0.56	2
B5013 Station Road (west)	489	0.43	1	489	0.43	1	493	0.47	1

2.6.47 The conclusions drawn in paragraph 7.4.44 of the main TA are replaced by:

"The results show that the junction operates within capacity in the 2023 baseline (with and without HS2 Phase One) and with the AP2 revised scheme construction traffic, without any substantial increases in queuing or RFC from the future baseline including HS2 Phase One or the future baseline excluding HS2 Phase One."

A5192 Cappers Lane/Austin Cote Lane/Europa Way

2.6.48 Table 156 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023. Table 156 in the main TA is replaced by Table 156 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 156: A5192 Cappers Lane/Austin Cote Lane/Europa Way junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	**Flow, PCU/hr**	**RFC**	**Q, PCU**	**Flow, PCU/hr**	**RFC**	**Q, PCU**	**Flow, PCU/hr**	**RFC**	**Q, PCU**
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Europa Way	231	0.24	0	231	0.25	0	231	0.25	0
A5192 Cappers Road (east)	568	0.47	1	584	0.48	1	584	0.48	1
Austin Cote Lane	548	0.55	1	548	0.55	1	548	0.55	2
A5192 Cappers Road (west)	974	0.77	3	990	0.78	4	990	0.78	4
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Europa Way	421	0.46	1	421	0.46	1	421	0.46	1
A5192 Cappers Road (east)	554	0.52	1	570	0.53	1	570	0.53	1
Austin Cote Lane	418	0.41	1	418	0.41	1	418	0.41	1
A5192 Cappers Road (west)	862	0.61	2	878	0.62	2	878	0.62	2

2.6.49 The conclusions drawn in paragraph 7.4.46 of the main TA are replaced by:

> "The results show that the junction is approaching capacity in the 2023 baseline (with and without HS2 Phase One) and with the addition of the AP2 revised scheme construction traffic in the AM peak. The junction operates within capacity in 2023 baseline (with and without HS2 Phase One) and with the addition of the AP2 revised scheme construction traffic in the PM peak. There is no impact at this junction as a result of the AP2 revised scheme, which does not route HGV construction traffic through the junction."

A5192 Eastern Avenue/A5127 Burton Road/A5192 Cappers Lane/A5127 Trent Valley Road

2.6.50 Table 157 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023. Table 157 in the main TA is replaced by Table 157 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 157: A5192 Eastern Avenue/A5127 Burton Road/A5192 Cappers Lane/A5127 Trent Valley Road junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A5192 Eastern Ave (north)	885	0.77	3	892	0.79	4	892	0.79	4
A5127 Burton Road (east)	658	0.75	3	693	0.79	4	693	0.79	4
A5192 Cappers Road (south)	743	0.84	5	759	0.88	7	759	0.88	7
A5127 Trent Valley Road (west)	603	0.94	11	632	1.00	18	632	1.00	18
Valley Lane	125	0.33	1	125	0.34	1	125	0.34	1
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A5192 Eastern Ave (north)	842	0.64	2	849	0.65	2	849	0.65	2
A5127 Burton Road (east)	870	0.88	7	883	0.89	7	883	0.89	7
A5192 Cappers Road (south)	815	1.09	46	825	1.11	52	825	1.11	52
A5127 Trent Valley Road (west)	643	1.14	51	652	1.16	56	652	1.16	56
Valley Lane	84	0.25	0	84	0.25	0	84	0.25	0

2.6.51 The conclusions drawn in paragraphs 7.4.48 to 7.4.50 of the main TA are replaced by:

"The results show that the junction operates at capacity in the 2023 baseline (with and without HS2 Phase One) and with the AP2 revised scheme construction traffic in the AM peak and that the junction operates above capacity in 2023 baseline (with and without HS2 Phase One) and with the AP2 revised scheme construction traffic in the PM peak. There is no impact at this junction as a result of the AP2 revised scheme, which does not route HGV construction traffic through the junction."

Blithbury Lane/Hadley Gate

2.6.52 Table 158 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023. Table 158 in the main TA is replaced by Table 158 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 158: Blithbury Lane/Hadley Gate junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and the AP2 revised scheme**		
Hadley Gt (left + right)	0	0	0	0	0	0	0	0	0
Blithbury Road (east) (ahead)	42	-	-	42	-	-	55	-	-
Blithbury Road (east) (right)	0	0	0	0	0	0	0	0	0
Blithbury Road (west) (left)	0	-	-	0	-	-	0	-	-
Blithbury Road (west) (ahead)	85	-	-	85	-	-	98	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Hadley Gt (left + right)	0	0	0	0	0	0	0	0	0
Blithbury Road (east) (ahead)	48	-	-	48	-	-	61	-	-
Blithbury Road (east) (right)	1	0	0	1	0	0	1	0	0
Blithbury Road (west) (left)	1	-	-	1	-	-	1	-	-
Blithbury Road (west) (ahead)	43	-	-	43	-	-	55	-	-

2.6.53 The conclusions drawn in paragraph 7.4.52 of the main TA are replaced by:

"The results show that the junction operates within capacity in the 2023 baseline (with and without HS2 Phase One) and with the addition of the AP2 revised scheme construction traffic in the AM and PM peak periods, without any substantial increases in RFC from the future baseline including HS2 Phase One or the future baseline excluding HS2 Phase One."

A515 Lichfield Road/Common Lane/Shaw Lane

2.6.54 Table 159 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023. Table 159 in the main TA is replaced by Table 159 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 159: A515 Lichfield Road/Common Lane/Shaw Lane existing junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Common Lane (ahead + left + right)	0	0	0	7	0.02	0	34	0.10	0
A515 Lichfield Road (north) (ahead + left + right)	4	0.01	0	4	0.01	0	5	0.01	0
A515 Lichfield Road (north)	2	-	-	2	-	-	7	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
(left)									
A515 Lichfield Road (north) (ahead)	373	-	-	401	-	-	508	-	-
Shaw Lane (ahead + left + right)	8	0.02	0	8	0.02	0	8	0.02	0
A515 Lichfield Road (south) (ahead + left + right)	3	0.01	0	8	0.01	0	52	0.08	0
A515 Lichfield Road (south) (left)	2	-	-	2	-	-	2	-	-
A515 Lichfield (south) (ahead)	237	-	-	264	-	-	348	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Common Lane (ahead + left + right)	0	0	0	8	0.02	0	31	0.08	0
A515 Lichfield Road (north) (ahead + left + right)	0	0	0	0	0	0	0	0	0
A515 Lichfield Road (north) (left)	2	-	-	2	-	-	11	-	-
A515 Lichfield Road (north) (ahead)	213	-	-	241	-	-	343	-	-
Shaw Lane (ahead + left + right)	9	0.02	0	9	0.02	0	9	0.02	0
A515 Lichfield Road (south) (ahead + left + right)	0	0	0	11	0.02	0	42	0.06	0
A515 Lichfield Road (south) (left)	4	-	-	4	-	-	4	-	-
A515 Lichfield (south) (ahead)	275	-	-	299	-	-	383	-	-

2.6.55 The conclusions drawn in paragraph 7.4.54 of the main TA are replaced by:

"The results show that the junction operates within capacity in the 2023 (with and without HS2 Phase One) and with the addition of AP2 revised scheme construction traffic in the AM and PM peak periods, without any substantial increases in RFC from the future baseline including HS2 Phase One or the future baseline excluding HS2 Phase One."

A51 Birmingham Road/A5127 Birmingham Road/A461 Sainte Foy Avenue/A51 The Friary

2.6.56 Table 160 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023. Table 160 in the main TA is replaced by Table 160 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 160: A51 Birmingham Road/A5127 Birmingham Road/A461 Sainte Foy Avenue/A51 The Friary junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2023 future baseline			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A51 The Friary Road	892	0.65	2	916	0.66	2	916	0.66	2
A51 Birmingham Road	661	0.55	1	688	0.58	1	688	0.58	1
A5127 Birmingham Road	751	0.89	7	779	0.94	11	779	0.94	11
A461 Sainte Foy Ave	667	1.15	54	668	1.21	66	668	1.21	66
	2023 future baseline			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A51 The Friary Road	820	0.55	1	844	0.57	1	844	0.57	1
A51 Birmingham Road	930	0.77	3	935	0.78	4	935	0.78	4
A5127 Birmingham Road	710	1.14	55	731	1.18	67	731	1.18	69
A461 Sainte Foy Ave	486	0.74	3	486	0.74	3	486	0.74	3

2.6.57 The conclusions drawn in paragraphs 7.4.56 to 7.4.58 of the main TA are replaced by:

> "The results show that the junction operates above capacity in the 2023 baseline (with and without HS2 Phase One) and with the addition of AP2 revised scheme construction traffic in the AM and PM peak periods. There is no impact at this junction as a result of the AP2 revised scheme, which does not route construction traffic through the junction."

A51 Lichfield Road/Wood End Lane

2.6.58 The AP2 revised scheme includes the permanent upgrade to the A515 Lichfield Road/Wood End Lane junction that includes localised carriageway widening and the signalisation of the junction. The fourth arm will provide maintenance access only and the use of this approach is expected to be limited. Both the A515 Lichfield Road and the Wood End Lane approaches will be widened to accommodate two lanes.

2.6.59 Table 161 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023. Table 161 in the main TA is replaced by Table 161, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme construction traffic.

2.6.60 Table 161.1 summarises the performance of the junction as a result of the AP2 revised scheme with the permanent upgrade.

Table 161: A515 Lichfield Road/Wood End Lane junction 2023 future baseline and with the AP2 revised scheme (existing junction) junction capacity assessment

Approach	**Flow, PCU/hr**	**RFC**	**Q, PCU**	**Flow, PCU/hr**	**RFC**	**Q, PCU**	**Flow, PCU/hr**	**RFC**	**Q, PCU**
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme (existing junction)**		
Wood End Lane (left)	112	0.21	0	112	0.22	0	116	0.26	0
Wood End Lane (right)	69	0.25	0	81	0.30	1	104	0.46	1
A515 Lichfield Road (south) (ahead + right)	418	0.68	3	434	0.71	3	540	0.83	7
A515 Lichfield Road (south) (ahead)	72	-	-	76	-	-	79	-	-
A515 Lichfield Road (north) (left)	168	-	-	180	-	-	203	-	-
A515 Lichfield Road (north) (ahead)	267	-	-	287	-	-	392	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme (existing junction)**		
Wood End Lane (left)	379	0.68	2	379	0.70	2	382	0.80	4
Wood End Lane (right)	140	0.43	1	152	0.48	1	175	0.67	2
A515 Lichfield Road (south) (ahead + right)	157	0.24	0	164	0.25	1	199	0.29	1
A515 Lichfield Road (south) (ahead)	143	-	-	159	-	-	221	-	-
A515 Lichfield Road (north) (left)	60	-	-	71	-	-	94	-	-
A515 Lichfield Road (north) (ahead)	182	-	-	204	-	-	298	-	-

Table 161.1: A515 Lichfield Road/Wood End Lane Highway 2023 AP2 revised scheme (revised junction) junction capacity assessment

Approach	Flow, PCU/hr	DoS	Q, PCU
08:00 – 09:00	**2023 future baseline with Phase One and AP2 revised scheme (revised junction)**		
A515 Lichfield Road (north)	595	40%	3
Wood End Lane	220	40%	2
A515 Lichfield Road (south)	619	51%	2
Compound access	0	0%	0
17:00 – 18:00	**2023 future baseline with Phase One and AP2 revised scheme (revised junction)**		
A515 Lichfield Road (north)	392	52%	4
Wood End Lane	557	52%	4
A515 Lichfield Road (south)	420	47%	4
Compound access	0	0%	0

2.6.61 The conclusions drawn in paragraphs 7.4.60 to 7.4.62 of the main TA are replaced by:

"The results show that the junction is approaching capacity in the 2023 baseline (with HS2 Phase One) and with the addition of the AP2 revised scheme construction traffic in the AM and PM peak periods.

In the PM peak, the Wood End Lane arm RFC value increases from 0.70 to 0.80 with an increase in queue length from two to four PCUs and the A5192 Lichfield Road (south) arm RFC value increases from 0.71 to 0.83 and an increase in queue length from three to seven PCUs with the addition of the AP2 revised scheme construction traffic.

Although the junction moves closer to capacity, the addition of the AP2 revised scheme construction traffic does not result in any substantial increases in queuing or RFC from the future baseline (including HS2 Phase One).

The AP2 revised scheme includes the upgrade of the junction that will introduce signal control. This will create safer conditions for turning traffic through the junction.

The results show that with this upgrade at the junction the AP2 revised scheme will operate within capacity in 2023, with minimal queuing."

A513 Rugeley Road/A515 Lichfield Road/A515 Tewnalls Lane

2.6.62 Table 162 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023. Table 162 in the main TA is replaced by Table 162 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 162: A513 Rugeley Road/A515 Lichfield Road/A515 Tewnalls Lane junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A513 Rugeley Road (left + right)	457	0.73	3	475	0.79	4	516	0.89	7
A515 (north) Lichfield Road (ahead + right)	504	0.68	3	508	0.69	3	536	0.73	4
A515 (north) Lichfield Road (ahead)	124	-	-	123	-	-	112	-	-
A515 (south) Tewnalls Lane (left)	16	-	-	34	-	-	63	-	-
A515 (south) Tewnalls Lane (ahead)	229	-	-	237	-	-	237	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A513 Rugeley Road (left + right)	272	0.42	1	298	0.48	1	329	0.59	2
A515 (north) Lichfield Road (ahead + right)	612	0.92	10	612	0.93	11	640	0.97	15
A515 (north) Lichfield Road (ahead)	30	-	-	30	-	-	21	-	-
A515 (south) Tewnalls Lane (left)	50	-	-	50	-	-	98	-	-
A515 (south) Tewnalls Lane (ahead)	230	-	-	230	-	-	238	-	-

2.6.63 The conclusions drawn in paragraphs 7.4.64 to 7.4.66 of the main TA are replaced by:

"The results show that the junction is approaching capacity in the 2023 baseline (with and without HS2 Phase One) and is at capacity with the addition of the AP2 revised scheme construction traffic in the AM peak. In the PM peak, the junction operates at capacity in 2023 baseline (with and without HS2 Phase One) and with the addition of the AP2 revised scheme construction traffic.

In comparison with the 2023 future baseline (including HS2 Phase One), the addition of the AP2 revised scheme construction traffic results in the A515 (north) arm showing an increase in RFC from 0.93 to 0.97 in the PM peak with a corresponding increase in queue length from 11 to 15 PCUs. The A513 Rugeley Road arm shows an increase in RFC from 0.79 to 0.89 with an increase in queue from four to seven PCUs in the AM peak.

Although the junction moves closer to capacity, the addition of the AP2 revised scheme construction traffic does not result in any substantial increases in queuing or RFC from the future baseline (including HS2 Phase One).

There are no substantial differences in the impact of the AP2 revised scheme when considered cumulatively alongside the HS2 Phase One construction traffic to those described above."

B5014 Lichfield Road/A515 Tewnalls Lane

2.6.64 Table 163 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023. Table 163 in the main TA is replaced by Table 163 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 163: B5014 Lichfield Road/A515 Tewnalls Lane junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
B5014 Lichfield Road (left)	208	1.19	22	208	1.23	24	208	1.39	39
B5014 Lichfield Road (right)	388	1.18	39	388	1.21	40	388	1.40	71
A515 (north) Tewnalls Lane (ahead + right)	118	0.17	0	123	0.18	0	151	0.20	1
A515 (north) Tewnalls Lane (ahead)	318	-	-	336	-	-	413	-	-
A515 (south) Tewnalls Lane (left)	170	-	-	170	-	-	170	-	-
A515 (south) Tewnalls Lane (ahead)	344	-	-	368	-	-	472	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
B5014 Lichfield Road (left)	56	0.13	0	66	0.16	0	66	0.21	0
B5014 Lichfield Road (right)	149	0.47	1	173	0.59	1	173	0.72	2
A515 (north) Tewnalls Lane (ahead + right)	294	0.46	1	359	0.56	2	456	0.57	4
A515 (north) Tewnalls Lane (ahead)	180	-	-	167	-	-	189	-	-
A515 (south) Tewnalls Lane (left)	303	-	-	353	-	-	353	-	-
A515 (south) Tewnalls Lane (ahead)	254	-	-	276	-	-	395	-	-

2.6.65 The conclusions drawn in paragraphs 7.4.68 to 7.4.70 of the main TA are replaced by:

"The results show that the junction operates above capacity in 2023 baseline (with and without HS2 Phase One) and with the addition of the AP2 revised scheme construction traffic in the AM peak. In the PM peak, the junction operates within capacity in 2023 future baseline (with and without HS2 Phase One) and approaching capacity with the inclusion of the AP2 revised scheme construction traffic.

The B5014 Lichfield Road arm RFC values increase from 1.21 to 1.40 with a corresponding queue length increase from 68 to 110 PCUs (across both lanes), when considered against the 2023 future baseline plus HS2 Phase One construction traffic in the AM peak."

B5014 Uttoxeter Road/A513 Kings Bromley Lane/A513 Uttoxeter Road

2.6.66 Table 164 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023. Table 164 in the main TA is replaced by Table 164 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 164: B5014 Uttoxeter Road/A513 Kings Bromley Lane/A513 Uttoxeter Road junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	**Flow, PCU/hr**	**RFC**	**Q, PCU**	**Flow, PCU/hr**	**RFC**	**Q, PCU**	**Flow, PCU/hr**	**RFC**	**Q, PCU**
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Kings Bromley Lane (left)	261	0.42	1	279	0.45	1	302	0.50	1
Kings Bromley Lane (right)	53	0.17	0	53	0.18	0	78	0.28	0
A513 Uttoxeter Road (ahead + right)	439	0.76	3	462	0.80	4	494	0.86	6
A513 Uttoxeter Road (ahead)	35	-	-	31	-	-	24	-	-
B5014 Uttoxeter Road (left)	114	-	-	114	-	-	139	-	-
B5014 Uttoxeter Road (ahead)	178	-	-	178	-	-	181	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Kings Bromley Lane (left)	387	0.60	2	404	0.63	2	428	0.69	3
Kings Bromley Lane (right)	94	0.26	0	94	0.28	0	118	0.38	2
A513 Uttoxeter Road (ahead + right)	291	0.46	1	313	0.50	1	344	0.55	1
A513 Uttoxeter Road (ahead)	75	-	-	71	-	-	66	-	-
B5014 Uttoxeter Road (left)	35	-	-	35	-	-	59	-	-
B5014 Uttoxeter Road (ahead)	80	-	-	80	-	-	83	-	-

2.6.67 The conclusions drawn in paragraphs 7.4.72 to 7.4.74 of the main TA are replaced by:

"The results show that the junction is approaching capacity in the 2023 baseline (with and without HS2 Phase One) and with the addition of the AP2 revised scheme construction traffic in the AM peak. In the PM peak, the junction operates within capacity in the 2023 future baseline (with and without HS2 Phase One) and approaches capacity with the inclusion of the AP2 revised scheme construction traffic.

The addition of the AP2 revised scheme construction traffic results in the A513 Uttoxeter Road arm RFC value increasing from 0.80 to 0.86 and an increase in queue length from four to six PCUs in the AM peak.

There are no substantial differences in the impact of the AP2 revised scheme when considered cumulatively alongside the HS2 Phase One construction traffic to those described above."

B5014 Uttoxeter Road/Blithbury Road

2.6.68 Table 165 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023. Table 165 in the main TA is replaced by Table 165 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 165: B5014 Uttoxeter Road/Blithbury Road junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Blithbury Road (east) (ahead + left + right)	44	0.08	0	44	0.08	0	49	0.09	0
B5014 Uttoxeter Road (north) (left)	4	-	-	4	-	-	4	-	-
B5014 Uttoxeter Road (north) (ahead)	84	-	-	84	-	-	84	-	-
B5014 Uttoxeter Road (north) (right)	20	-	-	20	-	-	20	-	-
B5014 Uttoxeter Road (north) (ahead + right)	51	0.08	0	51	0.08	0	57	0.09	0
B5014 (north) Uttoxeter Road (ahead)	86	-	-	86	-	-	85	-	-
Blithbury Road (west) (ahead + left + right)	90	0.15	0	90	0.15	0	95	0.15	0
B5014 Uttoxeter Road (south) (left)	2	-	-	2	-	-	2	-	-
B5014 Uttoxeter Road (south) (ahead)	66	-	-	66	-	-	66	-	-
B5014 Uttoxeter Road (south) (right)	17	-	-	17	-	-	17	-	-
B5014 Uttoxeter Road (south) (ahead + right)	82	0.13	0	82	0.13	0	87	0.14	0
B5014 Uttoxeter Road (south) (ahead)	84	-	-	84	-	-	83	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Blithbury Road (east) (ahead + left + right)	39	0.06	0	39	0.06	0	43	0.07	0

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
B5014 Uttoxeter Road (north) (left)	8	-	-	8	-	-	8	-	-
B5014 Uttoxeter Road (north) (ahead)	48	-	-	48	-	-	48	-	-
B5014 Uttoxeter Road (north) (right)	31	-	-	31	-	-	31	-	-
B5014 Uttoxeter Road (north) (ahead + right)	64	0.11	0	64	0.11	0	69	0.12	0
B5014 (north) Uttoxeter Road (ahead)	50	-	-	50	-	-	49	-	-
Blithbury Road (west) (ahead + left + right)	56	0.09	0	56	0.09	0	60	0.10	0
B5014 Uttoxeter Road (south) (left)	7	-	-	7	-	-	7	-	-
B5014 Uttoxeter Road (south) (ahead)	67	-	-	67	-	-	67	-	-
B5014 Uttoxeter Road (south) (right)	2	-	-	2	-	-	2	-	-
B5014 Uttoxeter Road (south) (ahead + right)	30	0.05	0	30	0.05	0	35	0.06	0
B5014 Uttoxeter Road (south) (ahead)	90	-	-	90	-	-	89	-	-

2.6.69 The conclusions drawn in paragraph 7.4.77 of the main TA are replaced by:

"The results show that the junction operates within capacity in the 2023 future baseline (with and without HS2 Phase One) and with the addition of the AP2 revised scheme construction traffic in the AM and PM peak periods, without any substantial increases in RFC from the future baseline including HS2 Phase One or the future baseline excluding HS2 Phase One."

A51 from Brady Lane to Stafford Road/Borough Lane

2.6.70 Table 166 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023. Table 166 in the main TA is replaced by Table 166 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 166: A51 from Brady Lane to Stafford Road/Borough Lane junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Borough Lane (left + right)	178	0.76	3	178	0.78	3	178	1.00	10
A51 From Bardy Lane To Stafford Road (north) (ahead)	1117	-	-	1125	-	-	1221	-	-
A51 From Bardy Lane To Stafford Road (north) (right)	53	0.11	0	53	0.11	0	53	0.11	0
A51 From Bardy Lane To Stafford Road (south) (left)	27	-	-	27	-	-	27	-	-
A51 Main Road (south) (ahead)	616	-	-	624	-	-	720	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Borough Lane (left + right)	68	0.36	1	68	0.37	1	68	0.53	1
A51 From Bardy Lane To Stafford Road (north) (ahead)	693	-	-	701	-	-	798	-	-
A51 From Bardy Lane To Stafford Road (north) (right)	63	0.17	0	63	0.17	0	63	0.19	0
A51 From Bardy Lane To Stafford Road (south) (left)	83	-	-	83	-	-	83	-	-
A51 From Bardy Lane To Stafford Road (south) (ahead)	1025	-	-	1033	-	-	1130	-	-

2.6.71 The conclusions drawn in paragraphs 7.4.79 to 7.4.82 of the main TA are replaced by:

"The results show that the junction is approaching capacity in the 2023 baseline (with and without HS2 Phase One) and operates at capacity with the addition of the AP2 revised scheme construction traffic in the AM peak. In the PM peak, the junction operates within capacity in the 2023 baseline with and without HS2 Phase One) and with the addition of the AP2 revised scheme construction traffic with minimal queuing.

The Borough Lane arm RFC increases from 0.78 to 1.00 and there is a corresponding increase in queue from three to 10 PCUs with the addition of the AP2 revised scheme construction traffic in the AM peak.

There are no substantial differences in the impact of the AP2 revised scheme when considered cumulatively alongside the HS2 Phase One construction traffic to those described above"

A51 Breretonhill/Breretonhill Lane

2.6.72 Table 167 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023. Table 167 in the main TA is replaced by Table 167 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 167: A51 Breretonhill/Breretonhill Lane junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	**Flow, PCU/hr**	**RFC**	**Q, PCU**	**Flow, PCU/hr**	**RFC**	**Q, PCU**	**Flow, PCU/hr**	**RFC**	**Q, PCU**
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Breretonhill Lane (left + right)	125	0.69	2	125	0.71	2	125	0.93	6
A51 Breretonhill (west) (ahead)	1013	-	-	1021	-	-	1117	-	-
A51 Breretonhill (west) (right)	17	0.04	0	17	0.04	0	17	0.04	0
A51 Breretonhill (east) (left)	45	-	-	45	-	-	45	-	-
A51 Breretonhill (east) (ahead)	697	-	-	705	-	-	802	-	-
	2023 future baseline			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Breretonhill Lane (left + right)	47	0.35	1	47	0.36	1	47	0.58	1
A51 Breretonhill (west) (ahead)	708	-	-	716	-	-	813	-	-
A51 Breretonhill (west) (right)	28	0.09	0	18	0.09	0	28	0.09	0
A51 Breretonhill (east) (left)	124	-	-	124	-	-	124	-	-
A51 Breretonhill (east) (ahead)	1081	-	-	1089	-	-	1186	-	-

2.6.73 The conclusions drawn in paragraphs 7.4.83 to 7.4.85 of the main TA are replaced by:

"The results show that the junction is approaching capacity in the 2023 baseline (with and without HS2 Phase One) and operates at capacity with the addition of the AP2 revised scheme construction traffic in the AM peak. In the PM peak, the junction operates within capacity in the 2023 baseline with and without HS2 Phase One) and with the addition of the AP2 revised scheme construction traffic.

The Breretonhill Lane arm RFC value increases from 0.71 to 0.93 with a corresponding queue length increase from two to six PCUs, when considered against the 2023 future baseline plus HS2 Phase One construction traffic in the AM peak.

There are no substantial differences in the impact of the AP2 revised scheme when considered cumulatively alongside the HS2 Phase One construction traffic to those described above."

B5013 Colton Road/Blithbury Road

2.6.74 Table 168 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023. Table 168 in the main TA is replaced by Table 168 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 168: B5013 Colton Road/Blithbury Road junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	**Flow, PCU/hr**	**RFC**	**Q, PCU**	**Flow, PCU/hr**	**RFC**	**Q, PCU**	**Flow, PCU/hr**	**RFC**	**Q, PCU**
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Blithbury Road (left + right)	99	0.17	0	99	0.17	0	123	0.21	0
B5013 Colton Road (south) (ahead + right)	195	0.29	1	195	0.29	1	242	0.36	1
B5013 Colton Road (south) (ahead)	207	-	-	207	-	-	206	-	-
B5013 Colton Road (north-west) (left)	11	-	-	11	-	-	11	-	-
B5013Colton Road (north-west) (ahead)	373	-	-	373	-	-	396	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Blithbury Road (left + right)	119	0.2	0	119	0.2	0	142	0.24	0
B5013 Colton Road (south) (ahead + right)	100	0.15	0	100	0.15	0	142	0.22	0
B5013 Colton Road (south) (ahead)	228	-	-	228	-	-	231	-	-
B5013 Colton Road (north-west) (left)	3	-	-	3	-	-	3	-	-
B5013Colton Road (north-west) (ahead)	382	-	-	382	-	-	405	-	-

2.6.75 The conclusions drawn in paragraph 7.4.87 of the main TA are replaced by:

"The results show that the junction operates within capacity in the 2023 baseline (with and without HS2 Phase One) and with the addition of the AP2 revised scheme construction traffic, without any substantial increases in queuing or RFC from the future baseline including HS2 Phase One or the future baseline excluding HS2 Phase One."

B5013 Colton Road/Bellamour Way

2.6.76 Table 169 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023. Table 169 in the main TA is replaced by Table 169 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 169: B5013 Colton Road/Bellamour Way junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Bellamour Way (left)	95	0.16	0	95	0.16	0	95	0.16	0
Bellamour Way (right)	43	0.11	0	43	0.11	0	43	0.11	0
B5013 Colton Road (south) (ahead + right)	99	0.16	0	99	0.16	0	103	0.17	0
B5013 Colton Road (south) (ahead)	179	-	-	179	-	-	198	-	-
B5013 Colton Road (north-west) (left)	31	-	-	31	-	-	31	-	-
B5013 Colton Road (north-west) (ahead)	293	-	-	293	-	-	316	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Bellamour Way (left)	43	0.07	0	43	0.07	0	43	0.07	0
Bellamour Way (right)	12	0.03	0	12	0.03	0	12	0.03	0
B5013 Colton Road (south) (ahead + right)	76	0.12	0	76	0.12	0	80	0.13	0
B5013 Colton Road (south) (ahead)	194	-	-	194	-	-	214	-	-
B5013 Colton Road (north-west) (left)	26	-	-	26	-	-	26	-	-
B5013 Colton Road (north-west) (ahead)	330	-	-	330	-	-	353	-	-

2.6.77 The conclusions drawn in paragraph 7.4.89 of the main TA are replaced by:

"The results show that the junction operates within capacity in the 2023 baseline (with and without HS2 Phase One) and with the AP2 revised scheme construction traffic in the AM and PM peak periods, without any substantial increases in RFC from the future baseline including HS2 Phase One or the future baseline excluding HS2 Phase One."

A5192 Cappers Lane/A38(T) Rykneld Street slip road (south-bound)

2.6.78 Table 170 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023. Table 170 in the main TA is replaced by Table 170 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 170: A5192 Cappers Lane/A38(T) Rykneld Street slip road (south-bound) junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	**Flow, PCU/hr**	**RFC**	**Q, PCU**	**Flow, PCU/hr**	**RFC**	**Q, PCU**	**Flow, PCU/hr**	**RFC**	**Q, PCU**
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A38 slip road (south-bound) (left + right)	0	0	0	12	0.02	0	12	0.02	0
A5192 Cappers Lane (west) (ahead + right)	518	0.82	5	572	0.89	8	572	0.89	8
A5192 Cappers Lane (west) (ahead)	34	-	-	33	-	-	33	-	-
A5192 Cappers Lane (east) (left)	53	-	-	59	-	-	59	-	-
A5192 Cappers Lane (east) (ahead)	137	-	-	185	-	-	185	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A38 slip road (north bound) (left + right)	0	0	0	12	0.02	0	12	0.02	0
A5192 Cappers Lane (west) (ahead + right)	568	0.86	6	628	0.93	11	628	0.93	11
A5192 Cappers Lane (west) (ahead)	39	-	-	33	-	-	33	-	-
A5192 Cappers Lane (east) (left)	26	-	-	32	-	-	32	-	-
A5192 Cappers Lane (east) (ahead)	132	-	-	180	-	-	180	-	-

2.6.79 The conclusions drawn in paragraphs 7.4.91 and 7.4.92 of the main TA remain unchanged. The increases in RFC and queuing are the result of the HS2 Phase One construction traffic rather than the AP2 revised scheme construction traffic, which has no material additional impact on the junction.

A5192 Cappers Lane/A38(T) Rykneld Street slip road (north-bound)

2.6.80 Table 171 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023. Table 171 in the main TA is replaced by Table 171 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 171: A5192 Cappers Lane/A38(T) Rykneld Street slip road (north-bound) junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A38 slip road (north bound) (left)	433	0.65	2	433	0.67	2	433	0.67	2
A38 slip road (north bound) (right)	33	0.07	0	62	0.14	0	62	0.14	0
A5192 Cappers Lane (west) (ahead)	517	-	-	533	-	-	533	-	-
A5192 Cappers Lane (west) (right)	0	0	0	0	0	0	0	0	0
A5192 Cappers Lane (east) (left)	0	-	-	29	-	-	29	-	-
A5192 Cappers Lane (east) (ahead)	135	-	-	151	-	-	151	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A38 slip road (north bound) (left)	379	0.58	1	379	0.59	2	379	0.59	2
A38 slip road (north bound) (right)	52	0.12	0	63	0.14	0	63	0.14	0
A5192 Cappers Lane (west) (ahead)	552	-	-	566	-	-	566	-	-
A5192 Cappers Lane (west) (right)	0	0	0	0	0	0	0	0	0
A5192 Cappers Lane (east) (left)	0	-	-	11	-	-	11	-	-
A5192 Cappers Lane (east) (ahead)	131	-	-	146	-	-	146	-	-

2.6.81 The conclusions drawn in paragraphs 7.4.94 and 7.4.95 of the main TA are replaced by:

"The results show that the junction operates within capacity in the 2023 baseline (with and without HS2 Phase One) and with the addition of AP2 revised scheme construction traffic in the AM and PM peak periods, without any substantial increases in queuing or RFC from the future baseline including HS2 Phase One or the future baseline excluding HS2 Phase One. There is no impact at this junction as a result of the AP2 revised scheme, which does not route construction traffic through the junction."

A5192 Eastern Avenue/Stafford Road

2.6.82 Table 172 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023. Table 172 in the main TA is replaced by Table 172 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 172: A5192 Eastern Avenue/Stafford Road junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Stafford Road (left + right)	197	0.44	1	197	0.44	1	197	0.44	1
Stafford Road (ahead)	672	-	-	679	-	-	679	-	-
A5192 Eastern Ave (west) (right)	278	0.43	1	278	0.43	1	278	0.43	1
A5192 Eastern Ave (west) (left)	107	-	-	107	-	-	107	-	-
A5192 Eastern Ave (east) (ahead)	357	-	-	364	-	-	364	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Stafford Road (left + right)	279	0.60	2	279	0.60	2	279	0.60	2
Stafford Road (ahead)	377	-	-	384	-	-	384	-	-
A5192 Eastern Ave (west) (right)	135	0.22	0	135	0.22	0	135	0.22	0
A5192 Eastern Ave (west) (left)	117	-	-	117	-	-	117	-	-
A5192 Eastern Ave (east) (ahead)	510	-	-	517	-	-	517	-	-

2.6.83 The conclusions drawn in paragraph 7.4.97 of the main TA are replaced by:

> "The results show that the junction operates within capacity in 2023 baseline (with and without HS2 Phase One) and the addition of AP2 revised scheme construction traffic in the AM and PM peak periods, without any substantial increases in queuing or RFC from the future baseline including HS2 Phase One or the future baseline excluding HS2 Phase One. There is no impact at this junction as a result of the AP2 revised scheme, which does not route construction traffic through the junction."

Wood End Lane/A38(T) Rykneld Street slip road (south-bound) (Hilliards Cross junction)

2.6.84 Table 173 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023 with the current junction layout. Table 173 in the main TA is replaced by Table 173 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme on the basis of the current (2018) junction layout.

Table 173: Wood End Lane/A38(T) Rykneld Street slip road (south-bound) (Hilliards Cross junction) current layout 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A38(T) Rykneld Street slip road (south-bound) (left)	290	-	-	322	0.68	2	343	0.73	3
A38(T) Rykneld Street slip road (south-bound) (right)	41	0.15	0	70	0.29	1	70	0.31	1
Wood End Lane (west) (ahead)	208	-	-	243			264	-	-
Wood End Lane (west) (right)	491	1.06	27	523	1.15	48	544	1.20	62
Wood End Lane (east) (left)	26	-	-	55	-	-	55	-	-
Wood End Lane (east) (ahead)	706	-	-	741	-	-	762	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
A38(T) Rykneld Street slip road (south-bound) (left)	222	-	-	257	0.51	1	278	0.56	2
A38(T) Rykneld Street slip road (south-bound) (right)	23	0.09	0	58	0.28	1	58	0.32	1
Wood End Lane (west) (ahead)	240	-	-	272			293		
Wood End Lane (west) (right)	620	1.26	84	655	1.36	125	676	1.41	149
Wood End Lane (east) (left)	23	-	-	58	-	-	58	-	-
Wood End Lane (east) (ahead)	523	-	-	555	-	-	576	-	-

2.6.85 The conclusions drawn in paragraphs 7.4.99 to 7.4.102 of the main TA are replaced by:

"The results show that the junction operates above capacity in the 2023 baseline (with and without HS2 Phase One) and with the AP2 revised scheme construction traffic in the AM and PM peak periods. Increases in queue lengths are shown on Wood End Lane (west), although it should be noted that the worst case in terms of overall HS2 construction traffic (i.e. peak HS2 Phase One traffic plus the peak from the AP2 revised scheme) has been assessed in the scenarios above, although these are unlikely to overlap to this extent.

The results show that the Wood End Lane (west) arm operates above capacity in the 2023 future baseline and with the addition of the HS2 Phase One and the AP2 revised scheme construction traffic. In the AM peak, queue lengths increase from 48

to 62 PCUs with the PM Peak showing increases from 125 to 149 PCUs in the same location."

2.6.86 The HS2 Phase One scheme includes changes to the Wood End Lane/A38(T) Rykneld Street slip road (south-bound) (Hilliards Cross) junction to mitigate the impact of HS2 Phase One construction traffic. This is identified as the BR2 layout. Table 174 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023 with the BR2 changes to the junction layout that are to be introduced as part of HS2 Phase One to address the impacts at this junction. Table 174 in the main TA is replaced by Table 174 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 174: Wood End Lane/A38(T) Rykneld Street slip road (south-bound) (Hilliards Cross junction) BR2 layout 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	**Flow, PCU/hr**	**DoS**	**Q, PCU**	**Flow, PCU/hr**	**DoS**	**Q, PCU**	**Flow, PCU/hr**	**DoS**	**Q, PCU**
08:00 – 09:00	**2023 future baseline AM**			**2023 future baseline with Prologis and Phase One**			**2023 with Prologis, Phase One and AP2 revised scheme**		
Wood End Lane (east) (left + ahead)	732	52%	5	796	57%	6	817	59%	6
slip road (left)	331	47%	5	392	54%	6	410	57%	7
Wood End Lane (west) (ahead + right)	394	52%	6	447	56%	7	470	59%	8
Wood End Lane (west) (right)	346	50%	6	389	54%	6	408	56%	7
17:00 – 18:00	**2023 future baseline AM**			**2023 future baseline with Prologis and Phase One**			**2023 with Prologis, Phase One and AP2 revised scheme**		
Wood End Lane (east) (left + ahead)	546	47%	4	614	53%	5	635	55%	5
slip road (left)	245	26%	3	316	34%	4	337	36%	4
Wood End Lane (west) (ahead + right)	467	47%	6	524	52%	7	546	54%	8
Wood End Lane (west) (right)	416	45%	6	462	50%	6	482	52%	7

2.6.87 The conclusions drawn in paragraphs 8.4.52 and 8.4.53 of the main TA are replaced by:

"The results show that the BR2 layout operates within capacity in the 2023 baseline (with and without HS2 Phase One) and with the addition of AP2 revised scheme construction traffic in the AM and PM peak periods, without any substantial increases in queuing or DoS from the future baseline, including HS2 Phase One or the future baseline excluding HS2 Phase One."

A5192 Eastern Avenue/A51 Stafford Road/A51 Western Bypass

2.6.88 Table 175 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023. Table 175 in the main TA is replaced by Table 175 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 175: A5192 Eastern Avenue/A51 Stafford Road/A51 Western Bypass junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	DoS	Q, PCU	Flow, PCU/hr	DoS	Q, PCU	Flow, PCU/hr	DoS	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Exit Road from Innkeeper's Lodge Lichfield hotel	12	7%	0	12	7%	0	12	7%	0
A51 Western Bypass (south) ahead + right turn	1017	97%	19	1042	97%	19	1052	97%	20
A5192 Eastern Ave (east) – right turn	298	94%	12	305	96%	14	301	95%	13
A5192 Eastern Ave (east) – left turn	181	23%	3	181	23%	3	181	23%	3
A51 Stafford Road (north) ahead	902	98%	22	927	101%	29	937	102%	32
A51 Stafford Road (north) left turn	634	93%	13	641	94%	14	637	94%	14
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Exit Road from Innkeeper's Lodge Lichfield hotel	21	13%	1	21	13%	1	21	13%	1
A51 Western Bypass (south) ahead + right turn	1142	90%	26	1167	92%	28	1177	93%	29
A5192 Eastern Ave (east) – right turn	436	89%	14	443	91%	15	440	90%	15
A5192 Eastern Ave (east) – left turn	281	35%	5	281	35%	5	281	35%	5
A51 Stafford Road (north) ahead	630	72%	8	655	74%	9	665	76%	9
A51 Stafford Road (north) left turn	325	41%	3	332	42%	3	329	41%	3

2.6.89 The conclusions drawn in paragraphs 7.4.107 to 7.4.110 of the main TA are replaced by:

"The results show that the junction operates at capacity in the 2023 baseline (without HS2 Phase One) and above capacity with the addition of the HS2 Phase One and the AP2 revised scheme construction traffic in the AM peak. In the PM peak the junction operates at capacity in the 2023 baseline (with and without HS2 Phase One) and with the addition of the AP2 revised scheme construction traffic.

The addition of the AP2 revised scheme construction traffic does not result in any substantial changes in queuing or DoS from the future baseline (including HS2 Phase One), when the junction is already shown to operate at or abovecapacity."

B5014 Uttoxeter Road/Common Lane

2.6.90 Table 175.1 summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme construction traffic. This junction is included as it was assessed as a result of the AP1 revised scheme.

Table 175.1: B5014 Uttoxeter Road/Common Lane junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Common Lane (left + right)	34	0.06	0	34	0.06	0	54	0.10	0
B5014 Uttoxeter Road (south) (ahead + right)	25	0.04	0	25	0.04	0	51	0.09	0
B5014 Uttoxeter Road (south) (ahead)	148	-	-	148	-	-	146	-	-
B5014 Uttoxeter Road (north) (left)	0	-	-	0	-	-	0	-	-
B5014 Uttoxeter Road (north) (ahead)	242	-	-	242	-	-	246	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Common Lane (left + right)	22	0.04	0	22	0.04	0	42	0.07	0
B5014 Uttoxeter Road (south) (ahead + right)	31	0.05	0	31	0.05	0	58	0.09	0
B5014 Uttoxeter Road (south) (ahead)	181	-	-	181	-	-	177	-	-
B5014 Uttoxeter Road (north) (left)	3	-	-	3	-	-	3	-	-
B5014 Uttoxeter Road (north) (ahead)	94	-	-	94	-	-	98	-	-

2.6.91 The results show that the junction operates within capacity in the 2023 baseline (with and without HS2 Phase One) and with the addition of AP2 revised scheme construction traffic in the AM and PM peak periods.

Common Lane/Pipe Lane

2.6.92 This junction is included as it was assessed as a result of the AP1 revised scheme.

2.6.93 Table 139.2 represents the AP2 construction traffic and is reported in Section 2.4 of the AP2 TA. Table 175.2 below summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme construction traffic and the inclusion of the temporary road access.

Table 175.2: Common Lane/Pipe Lane junction 2023 future baseline and with AP2 revised scheme (with temporary road) junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline with Phase One and AP2 revised scheme (with temporary road)**		
Pipe Lane (west)	17	0.04	0
Common Lane (ahead + left + right)	12	0.02	0
Common Lane (left)	5	-	-
Common Lane (right)	19	-	-
Pipe Lane (east)	27	0.05	0
Temporary Road (ahead + left + right)	0	0	0
Temporary Road (left)	0	-	-
Temporary Road (right)	20	-	-
17:00 – 18:00	**2023 future baseline with Phase One and AP2 revised scheme (with temporary road)**		
Pipe Lane (west)	5	0.01	0
Common Lane (ahead + left + right)	26	0.04	0
Common Lane (left)	0	-	-
Common Lane (right)	19	-	-
Pipe Lane (east)	23	0.04	0
Temporary Road (ahead + left + right)	0	0	0
Temporary Road (left)	0	-	-
Temporary Road (right)	20	-	-

2.6.94 The results in Tables 139.2 and 175.2 show that the junction operates within capacity in the 2023 baseline (with and without HS2 Phase One) and with the addition of AP2 revised scheme construction traffic in the AM and PM peak periods.

Wood End Lane/Netherstowe Lane

2.6.95 Table 175.3 summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 175.3: Wood End Lane/Netherstowe Lane junction 2023 future baseline and with the SES2 and AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Netherstowe Lane (left)	1	0	0	1	0	0	1	0	0
Netherstowe Lane (right)	7	0.02	0	7	0.02	0	7	0.03	0
Wood End Lane (west)	13	0.02	0	15	0.02	0	16	0.02	0

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
(ahead + right)									
Wood End Lane (west) (ahead)	417	-	-	491	-	-	530	-	-
Wood End Lane (east) (left)	18	-	-	18	-	-	18	-	-
Wood End Lane (east) (ahead)	237	-	-	313	-	-	353	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Netherstowe Lane (left)	10	0.02	0	10	0.02	0	10	0.02	0
Netherstowe Lane (right)	13	0.04	0	13	0.04	0	13	0.05	0
Wood End Lane (west) (ahead + right)	5	0.01	0	5	0.01	0	6	0.01	0
Wood End Lane (west) (ahead)	218	-	-	289	-	-	324	-	-
Wood End Lane (east) (left)	19	-	-	19	-	-	19	-	-
Wood End Lane (east) (ahead)	495			566			602		

2.6.96 The results show that the junction operates within capacity in the 2023 baseline (with and without HS2 Phase One) and with the AP2 revised scheme construction traffic in the AM and PM peak periods. There are no substantial increases in RFC from the future baseline including HS2 Phase One or the future baseline excluding HS2 Phase One.

Wood End Lane/Watery Lane

2.6.97 Table 175.4 summarises the results of the changes to the performance of the junction as a result of the AP2 revised Scheme.

Table 175.4: Wood End Lane/Netherstowe Lane junction 2023 future baseline and with the SES2 and AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Watery Lane (left)	44	0.08	0	44	0.08	0	44	0.08	0
Watery Lane (right)	90	0.22	0	90	0.24	0	90	0.25	0
Wood End Lane (west) (ahead + right)	163	0.24	1	187	0.26	1	202	0.27	1
Wood End Lane (west) (ahead)	268	-	-	320	-	-	345	-	-
Wood End Lane (east) (left)	89	-	-	89	-	-	89	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
Wood End Lane (east) (ahead)	150	-	-	226	-	-	266	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Watery Lane (left)	77	0.15	0	77	0.15	0	77	0.16	0
Watery Lane (right)	77	0.20	0	77	0.22	0	77	0.23	0
Wood End Lane (west) (ahead + right)	66	0.13	0	76	0.14	0	82	0.14	0
Wood End Lane (west) (ahead)	129	-	-	190	-	-	220	-	-
Wood End Lane (east) (left)	107	-	-	107	-	-	107	-	-
Wood End Lane (east) (ahead)	396			467			502		

2.6.98 The results show that the junction operates within capacity in the 2023 baseline (with and without HS2 Phase One) and with the addition of the AP2 revised scheme construction traffic in the AM and PM peak periods. There are nosubstantial increases in queuing or RFC from the future baseline including HS2 Phase One or the future baseline excluding HS2 Phase One.

A51 from Bardy Lane to Stafford Road/Brook End Lane/High Street

2.6.99 Table 175.5 summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 175.5: A51 from Bardy Lane to Stafford Road/Brook End Lane/High Street junction 2023 future baseline and with the SES2 and AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Brook End Lane (ahead + left)	58	0.14	0	58	0.14	0	58	0.15	0
Brook End Lane (ahead + right)	35	0.13	0	35	0.13	0	35	0.14	0
A51 from Bard Lane to Stafford Road (north) (left)	40	-	-	40	-	-	40	-	-
A51 from Bardy Lane to Stafford Road (north) (ahead)	1150	-	-	1158	-	-	1254	-	-
A51 from Bardy Lane to Stafford Road (north) (right)	4	0.01	-0	4	0.01	0	4	0.01	0
High Street (ahead + left)	12	0.03	0	12	0.03	0	12	0.03	0
High Street (ahead + right)	23	0.08	0	23	0.08	0	23	0.09	0

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
A51 from Bardy Lane to Stafford Road (south) (left)	9	-	-	9	-	-	9	-	-
A51 from Bardy Lane to Stafford Road (south) (ahead)	786	-	-	794	-	-	890	-	-
A51 from Bardy Lane to Stafford Road (south) (right)	12	0.03	0	12	0.03	0	12	0.03	0
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with Phase One**			**2023 future baseline with Phase One and AP2 revised scheme**		
Brook End Lane (ahead + left)	17	0.04	0	17	0.04	0	17	0.04	0
Brook End Lane (ahead + right)	21	0.07	0	21	0.07	0	21	0.08	0
A51 from Bardy Lane to Stafford Road (north) (left)	40	-	-	40	-	-	40	-	-
A51 from Bardy Lane to Stafford Road (north) (ahead)	819	-	-	827	-	-	924	-	-
A51 from Bardy Lane to Stafford Road (north) (right)	1	0	-0	1	0	-0	1	0	-0
High Street (ahead + left)	6	0.02	0	6	0.02	0	6	0.02	0
High Street (ahead + right)	11	0.04	0	11	0.04	0	11	0.05	0
A51 from Bardy Lane to Stafford Road (south) (left)	22	-	-	22	-	-	22	-	-
A51 from Bardy Lane to Stafford Road (south) (ahead)	1159	-	-	1167	-	-	1264	-	-
A51 from Bardy Lane to Stafford Road (south) (right)	10	0.02	0	10	0.02	0	10	0.02	0

2.6.100 The results show that the junction operates within capacity in the 2023 baseline (with and without HS2 Phase One) and with the addition of the AP2 revised scheme construction traffic in the AM and PM peak periods. There are no substantial increases in RFC from the future baseline including HS2 Phase One or the future baseline excluding HS2 Phase One.

Summary of junction impacts

2.6.101 The AP2 revised scheme includes changes to construction traffic flows as a consequence of scheme changes and amendments, the new construction traffic routes such as Wood End Lane and changes to the movement and use of surplus excavated material. As noted in the link flow summary, this has resulted in reductions in construction vehicles on a number of routes including the A51, A515, A513, A5192, B5013 and B5014 corridors but also on local roads such as Bellamour Lane, Blithbury Road and Dawson Lane.

2.6.102 The assessment considers a peak level of construction traffic and these conditions would not be present across the whole construction period. It should also be noted that the AP2 revised scheme includes junction mitigation at the A515 Lichfield Road/Wood End Lane junction.

2.6.103 As a result of the AP2 revised scheme, the number of junctions that will experience substantial increases in the capacity indicators will be reduced when compared to the original scheme. However, there are increases in congestion at the following junctions as a result of the AP2 revised scheme:

- B5014 Lichfield Road/A515 Tewnalls Lane;
- A51 Stafford Road/Borough Lane; and
- A51 Stafford Road/Breretonhill Lane.

Accidents and safety

2.6.104 The impacts on accident and safety risks during construction is reported in Section 7.4 of the main TA. This section of the main TA is unchanged.

Parking and loading

2.6.105 The impacts on parking on parking during construction is reported in Section 7.4 of the main TA. This section of the main TA is unchanged.

Public transport

Rail

2.6.106 The impacts on the rail network and service provision during construction is reported in Section 7.4 of the main TA. This section of the main TA is unchanged. The changes to the Handsacre Spur will not result in further disruption to existing services over and above those already reported in the Phase One TA[12].

Local bus services

2.6.107 The impacts on bus services during construction are reported in Section 7.4 of the main TA. In addition to that reported in the main TA, there is one further addition regarding any disruption associated with the construction of the A515 Lichfield Road/Wood End Lane junction. During the construction works there will be some traffic management and speed reductions in operation and there may be some restrictions such as lane closures but these will be timed to not substantially affect bus services.

Public transport interchanges

2.6.108 The impacts on public transport interchanges during construction is reported in Section 7.4 of the main TA. This section of the main TA is unchanged.

[12] HS2 Ltd (2013) *High Speed Two (HS2) Phase One (London-West Midlands) Environmental Statement (ES), Volume 5: Transport assessment* https://www.gov.uk/government/publications/hs2-phase-one-environmental-statement-volume-5-traffic-and-transport/hs2-phase-one-environmental-statement-volume-5-traffic-and-transport

Pedestrian, cyclists and equestrians

2.6.109 Table 176 in the main TA summarises the changes on public rights of way for non-motorised users required to accommodate the construction of the original scheme. Table 176.1 summarises the amendments associated with the AP2 revised scheme and replaces the changes noted in Table 176 in the main TA. Those not listed in Table 176.1 remain unchanged to those identified by Table 176 of the main TA.

Table 176.1: CA1 construction changes on public rights of way for non-motorised users

PRoW name	Change in travel distance (compared to baseline)	Duration
Kings Bromley Footpath 6	Temporary diversion via Handsacre to accommodate amended Handsacre Spur is 1.2km longer.	6 months
Mavesyn Ridware Footpath 33	Temporary diversion east is 450m longer	39 months
Colton Footpath 79	Temporary parallel diversion is less than 50m longer	12 months
Abbots Bromley Footpath 26	Temporary parallel diversion is less than 50m longer	12 months
Abbots Bromley Footpath 29	Temporary diversion or realignment is less than 50m longer	3 months
Abbots Bromley Footpath 30	Temporary diversion or realignment is less than 50m longer	3 months
Abbots Bromley Footpath 30	Temporary diversion or realignment is less than 50m longer	3 months
Abbots Bromley Footpath 38	Temporary diversion or realignment is less than 50m longer	3 months
Abbots Bromley Footpath 39	Temporary diversion or realignment is less than 50m longer	3 months
Abbots Bromley Footpath 49	Temporary diversion or realignment is less than 50m longer	3 months

2.6.110 The conclusions in Section 7.4.134 in the main TA are replaced with:

> "Within the 26 temporary diversions, 13 of the PRoW routes affected experience very little change in length, or the PRoW routes become shorter (e.g. on Colton Bridleway 31/33 and Stonyford Lane). A further six changes result in diversions which increase PRoW route length over 250m."

Waterways and canals

2.6.111 The impact on waterways and canals during construction are reported in Section 7.4 of the main TA. This section of the main TA is unchanged.

2.7 CA1 AP2 revised scheme operational description and assessment of operation impacts

Highway diversions, realignments and closures

2.7.1 Table 177 in the main TA summarises the permanent highway diversions, realignments and closures required to accommodate the original scheme. In the original scheme, Common Lane is closed where it intersects the HS2 route with a diversion for farm access only; Shaw Lane is realigned to the west to accommodate the Kings Bromley viaduct.

2.7.2 The AP2 revised scheme includes a new diversion north of the HS2 route, to connect east Common Lane with A515 Lichfield Road. The amendment will provide for

vehicular access to Common Lane from the A515 Lichfield Road removing the need for vehicles to be diverted via Crawley Lane. Connectivity across the HS2 route is provided for non-motorised users and farm traffic by the Kings Bromley new bridleway, which extends from the Common Lane (south) Closure, south of the HS2 route, to the junction with the Common Lane diversion. Public vehicular traffic, south of the HS2 route, remains diverted to the A515 Lichfield Road. The AP2 revised scheme will reduce the diversion distance from up to 4.5km to up to 1.2km.

2.7.3 The AP2 revised scheme amends the Phase One connections between the HS2 route and the West Coast Main Line (WCML). This enables Shaw Lane (in the vicinity of Tuppenhurst Lane) to be retained on its existing alignment and the Tuppenhurst Lane diversion, which provided connection to the A515 Lichfield Road as a consequence of Shaw Lane, to be removed.

2.7.4 Table 177.1 summarises the closures and stopping-up amendments and additions associated with the AP2 revised scheme and replaces the respected entries in Table 177 in the main TA. Those not listed in Table 177.1 remain unchanged from those identified by Table 177 of the main TA.

Table 177.1: CA1 permanent highway diversion/stopping-up

Highway name	Description	Change in length (compared to base)
Common Lane (south)	Common Lane is diverted via A515 for vehicle users.	Longest diversion via A515 is up to 1.2km.
Shaw Lane (in the vicinity of Tuppenhurst Lane)	Remains on existing alignment.	No change in length

PRoW diversions, realignments and closures

2.7.5 Table 178 in the main TA summarises the permanent PRoW diversions and realignments required to accommodate the original scheme. Table 178.1 summarises the amendments associated with the AP2 revised scheme and replaces the changes noted in Table 178 in the main TA. Those not listed in Table 178.1 remain unchanged to those identified by Table 178 of the main TA.

Table 178.1: CA1 permanent highway diversion/stopping-up

Highway name	Description	Change in length
Kings Bromley Footpath 6	Local diversion to accommodate amended Handsacre Spur.	80m longer

Strategic and local road network and traffic flows 2027

2.7.6 Paragraph 7.6.6 first bullet point in the main TA is replaced by:

"A515 Lichfield Road/Common Lane/Shaw Lane – Common Lane will be diverted via the A515 Lichfield Road (north) arm."

Junction performance 2027 and 2041

2.7.7 The AP2 revised scheme includes the permanent upgrade of the A515 Lichfield Road/Wood End Lane junction.

A515 Lichfield Road/Common Lane (new)

2.7.8 Tables 179 and 185 of the main TA summarises the results of the changes to the junction as a result of the original scheme in 2027 and 2041 respectively. Table 179 and 185 in the main TA are replaced by Table 179 and 185 below, which summarise the results of the revised junction as a result of the AP2 revised scheme at 2027 and 2041 respectively.

Table 179: A515 Lichfield Road/Common Lane/Shaw Lane new junction 2027 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2027 future baseline**			**2027 future baseline with Phase One and AP2 revised scheme**		
Common Lane (left + right)	0	0	0	0	0	0
A515 Lichfield Road (south) (ahead + right)	5	0.01	0	5	0.01	0
A515 Lichfield Road (south) (ahead)	246	-	-	246	-	-
A515 Lichfield Road (north) (left)	2	-	-	2	-	-
A515 Lichfield Road (north) (ahead)	392	-	-	392	-	-
17:00 – 18:00	**2027 future baseline**			**2027 future baseline with Phase One and AP2 revised scheme**		
Common Lane (left + right)	0	0	0	0	0	0
A515 Lichfield Road (south) (ahead + right)	0	0	0	0	0	0
A515 Lichfield Road (south) (ahead)	286	-	-	286	-	-
A515 Lichfield Road (north) (left)	2	-	-	2	-	-
A515 Lichfield Road (north) (ahead)	222	-	-	222	-	-

Table 185: A515 Lichfield Road/Common Lane/Shaw Lane new junction 2041 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2041 future baseline**			**2041 future baseline with AP2 revised scheme**		
Common Lane (left + right)	5	0.02	0	5	0.02	0
A515 Lichfield Road (south) (ahead + right)	6	0.01	0	6	0.01	0
A515 Lichfield Road (south) (ahead)	274	-	-	274	-	-
A515 Lichfield Road (north) (left)	3	-	-	3	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
A515 Lichfield Road (north) (ahead)	437	-	-	437	-	-
17:00 – 18:00	**2041 future baseline**			**2041 future baseline and AP2 revised scheme**		
Common Lane (left + right)	0	0	0	0	0	0
A515 Lichfield Road (south) (ahead + right)	0	0	0	0	0	0
A515 Lichfield Road (south) (ahead)	318	-	-	318	-	-
A515 Lichfield Road (north) (left)	3	-	-	3	-	-
A515 Lichfield Road (north) (ahead)	247	-	-	247	-	-

2.7.9 The conclusions drawn in paragraphs 7.6.8 and 7.6.22 of the main TA are unchanged with the junction operating within capacity in the 2027 and 2041 baseline and with the addition of the AP2 revised scheme. The AP2 revised scheme does not increase the 2027 or 2041 baseline traffic conditions and will have no impact on the performance of the junction.

B5014 Uttoxeter Road/Blithbury Road

2.7.10 The AP2 revised scheme includes the permanent relocation of the Mayfield Children's Home. Table 189.1 and 189.2 summarise the results of the changes to the performance of the junction as a result of the AP2 revised scheme traffic in 2027 and 2041 respectively.

Table 189.1: B5014 Uttoxeter Road/Blithbury Road junction 2027 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2027 future baseline**			**2027 future baseline with AP2 revised scheme**		
Blithbury Road (east) (ahead + left + right)	40	0.09	0	48	0.09	0
B5014 Uttoxeter Road (north) (left)	5	-	-	17	-	-
B5014 Uttoxeter Road (north) (ahead)	88	-	-	88	-	-
B5014 Uttoxeter Road (north) (right)	21	-	-	21	-	-
B5014 Uttoxeter Road (north) (ahead + right)	47	0.08	0	47	0.08	0
B5014 (north) Uttoxeter Road (ahead)	90	-	-	94	-	-
Blithbury Road (west) (ahead + left + right)	88	0.14	0	89	0.15	0
B5014 Uttoxeter Road (south)	2	-	-	2	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
(left)						
B5014 Uttoxeter Road (south) (ahead)	69	-	-	69	-	-
B5014 Uttoxeter Road (south) (right)	18	-	-	30	-	-
B5014 Uttoxeter Road (south) (ahead + right)	78	0.13	0	94	0.15	0
B5014 Uttoxeter Road (south) (ahead)	88	-	-	85	-	-
17:00 – 18:00	**2027 future baseline**			**2027 future baseline with AP2 revised scheme**		
Blithbury Road (east) (ahead + left + right)	34	0.06	0	48	0.08	0
B5014 Uttoxeter Road (north) (left)	8	-	-	9	-	-
B5014 Uttoxeter Road (north) (ahead)	50	-	-	50	-	-
B5014 Uttoxeter Road (north) (right)	33	-	-	33	-	-
B5014 Uttoxeter Road (north) (ahead + right)	60	0.11	0	62	0.11	0
B5014 (north) Uttoxeter Road (ahead)	52	-	-	57	-	-
Blithbury Road (west) (ahead + left + right)	53	0.09	0	53	0.09	0
B5014 Uttoxeter Road (south) (left)	7	-	-	7	-	-
B5014 Uttoxeter Road (south) (ahead)	70	-	-	70	-	-
B5014 Uttoxeter Road (south) (right)	2	-	-	3	-	-
B5014 Uttoxeter Road (south) (ahead + right)	25	0.04	0	26	0.04	0
B5014 Uttoxeter Road (south) (ahead)	95	-	-	95	-	-

Table 189.2: B5014 Uttoxeter Road/Blithbury Road junction 2041 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2041 future baseline**			**2041 future baseline with AP2 revised scheme**		
Blithbury Road (east) (ahead + left + right)	45	0.08	0	53	0.10	0
B5014 Uttoxeter Road (north) (left)	5	-	-	17	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
B5014 Uttoxeter Road (north) (ahead)	99	-	-	99	-	-
B5014 Uttoxeter Road (north) (right)	24	-	-	24	-	-
B5014 Uttoxeter Road (north) (ahead + right)	54	0.09	0	54	0.09	0
B5014 (north) Uttoxeter Road (ahead)	101	-	-	104	-	-
Blithbury Road (west) (ahead + left + right)	99	0.16	0	100	0.17	0
B5014 Uttoxeter Road (south) (left)	3	-	-	3	-	-
B5014 Uttoxeter Road (south) (ahead)	78	-	-	78	-	-
B5014 Uttoxeter Road (south) (right)	20	-	-	32	-	-
B5014 Uttoxeter Road (south) (ahead + right)	90	0.15	0	106	0.17	0
B5014 Uttoxeter Road (south) (ahead)	97	-	-	94	-	-
17:00 – 18:00	**2041 future baseline**			**2041 future baseline with AP2 revised scheme**		
Blithbury Road (east) (ahead + left + right)	39	0.07	0	53	0.09	0
B5014 Uttoxeter Road (north) (left)	9	-	-	10	-	-
B5014 Uttoxeter Road (north) (ahead)	58	-	-	58	-	-
B5014 Uttoxeter Road (north) (right)	38	-	-	38	-	-
B5014 Uttoxeter Road (north) (ahead + right)	71	0.12	0	73	0.12	0
B5014 (north) Uttoxeter Road (ahead)	59	-	-	64	-	-
Blithbury Road (west) (ahead + left + right)	61	0.10	0	61	0.10	0
B5014 Uttoxeter Road (south) (left)	8	-	-	8	-	-
B5014 Uttoxeter Road (south) (ahead)	81	-	-	81	-	-
B5014 Uttoxeter Road (south) (right)	3	-	-	4	-	-
B5014 Uttoxeter Road (south) (ahead + right)	29	0.05	0	30	0.05	0

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
B5014 Uttoxeter Road (south) (ahead)	109	-	-	109	-	-

2.7.11 The results show that the junction operates within capacity in the 2027 and 2041 baseline and with the addition of the AP2 revised scheme traffic in the AM and PM peak periods.

A515 Lichfield Road/Wood End Lane

2.7.12 The AP2 revised scheme includes the permanent upgrade to the A515 Lichfield Road/Wood End Lane junction that includes localised carriageway widening and the signalisation of the junction. The fourth arm will provide maintenance access purposes only and the use of this approach is expected to be limited. Both the A515 Lichfield Road and the Wood End Lane approaches will be widened to accommodate two lanes.

2.7.13 Tables 189.3 and 189.4 summarise the results of the changes to the performance of the existing junction with the inclusion of the AP2 revised scheme in 2027 and 2041 respectively.

2.7.14 Tables 189.5 and 189.6 summarise the performance of the AP2 revised scheme upgrade to the junction in 2027 and 2041 respectively.

Table 189.3: A515 Lichfield Road/Wood End Lane junction 2027 future baseline and with the AP2 revised scheme (existing junction) junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2027 future baseline**			**2027 future baseline with AP2 revised scheme (existing junction)**		
Wood End Lane (left)	116	0.22	0	116	0.22	0
Wood End Lane (right)	71	0.27	0	71	0.27	0
A515 Lichfield Road (south) (ahead + right)	441	0.72	3	441	0.72	3
A515 Lichfield Road (south) (ahead)	68	-	-	68	-	-
A515 Lichfield Road (north) (left)	173	-	-	173	-	-
A515 Lichfield Road (north) (ahead)	278	-	-	278	-	-
17:00 – 18:00	**2027 future baseline**			**2027 future baseline with AP2 revised scheme (existing junction)**		
Wood End Lane (left)	394	0.71	2	394	0.71	2
Wood End Lane (right)	145	0.46	1	145	0.46	1
A515 Lichfield Road (south) (ahead + right)	166	0.25	1	166	0.25	1
A515 Lichfield Road (south) (ahead)	146	-	-	146	-	-
A515 Lichfield Road (north) (left)	61	-	-	61	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
A515 Lichfield Road (north) (ahead)	189	-	-	189	-	-

Table 189.4: A515 Lichfield Road/Wood End Lane junction 2041 future baseline and with the AP2 revised scheme (existing junction) junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2041 future baseline**			**2041 future baseline with AP2 revised scheme (existing junction)**		
Wood End Lane (left)	130	0.25	0	130	0.25	0
Wood End Lane (right)	78	0.32	1	78	0.32	1
A515 Lichfield Road (south) (ahead + right)	516	0.84	6	516	0.84	6
A515 Lichfield Road (south) (ahead)	52	-	-	52	-	-
A515 Lichfield Road (north) (left)	188	-	-	188	-	-
A515 Lichfield Road (north) (ahead)	310	-	-	310	-	-
17:00 – 18:00	**2041 future baseline**			**2041 future baseline with AP2 revised scheme (existing junction)**		
Wood End Lane (left)	439	0.82	4	439	0.82	4
Wood End Lane (right)	158	0.60	2	158	0.60	2
A515 Lichfield Road (south) (ahead + right)	192	0.29	1	192	0.29	1
A515 Lichfield Road (south) (ahead)	156	-	-	156	-	
A515 Lichfield Road (north) (left)	66	-	-	66	-	
A515 Lichfield Road (north) (ahead)	211	-	-	211	-	

Table 189.5: A515 Lichfield Road/Wood End Lane Highway 2027 future baseline and with the AP2 revised scheme (revised junction) junction capacity assessment

Approach	Flow, PCU/hr	DoS	Q, PCU
08:00 – 09:00	**2027 future baseline with AP2 revised scheme AM (revised junction)**		
A515 Lichfield Road (north)	448	30%	2
Wood End Lane	186	40%	2
A515 Lichfield Road (south)	503	44%	2
Compound access	0	0%	0
17:00 – 18:00	**2027 future baseline with AP2 revised scheme PM (revised junction)**		
A515 Lichfield Road (north)	250	44%	3

Approach	Flow, PCU/hr	DoS	Q, PCU
Wood End Lane	539	44%	3
A515 Lichfield Road (south)	312	44%	3
Compound access	0	0%	0

Table 189.6: A515 Lichfield Road/Wood End Lane Highway 2041 future baseline and with the AP2 revised scheme (revised junction) junction capacity assessment

Approach	Flow, PCU/hr	DoS	Q, PCU
08:00 – 09:00	**2041 future baseline with AP2 revised scheme AM (revised junction)**		
A515 Lichfield Road (north)	498	33%	2
Wood End Lane	208	45%	2
A515 Lichfield Road (south)	568	51%	3
Compound access	0	0%	0
17:00 – 18:00	**2041 future baseline with AP2 revised scheme PM (revised junction)**		
A515 Lichfield Road (north)	277	46%	3
Wood End Lane	597	50%	4
A515 Lichfield Road (south)	348	45%	3
Compound access	0	0%	0

2.7.15 The results show that the junction is approaching capacity in the 2027 and 2041 baseline and with the addition of the AP2 revised scheme (existing junction) in the AM and PM peak periods but with minimal queuing on all approaches. The AP2 revised scheme does not increase the 2027 or 2041 baseline traffic conditions and will have no impact on the performance of the junction. The AP2 revised scheme upgraded junction will continue to operate within capacity in 2027 and 2041 in the AM and PM peak periods with minimal queuing, while providing safer conditions for right turning traffic through the junction.

Accidents and safety

2.7.16 The impacts on accidents and safety during operation are reported in Section 7.6 of the main TA. This section of the main TA is unchanged.

Parking and loading

2.7.17 The impacts on parking and loading during operation are reported in Section 7.6 of the main TA. This section of the main TA is unchanged.

Public Transport

2.7.18 The impacts on public transport during operation are reported in Section 7.6 of the main TA. This section of the main TA is unchanged.

Pedestrians, cyclists and equestrian

2.7.19 Tables 191 and 192 in the main TA summarise the PRoW and roads used by non-motorised users that are permanently diverted, realigned or reinstated to accommodate the original scheme.

2.7.20 Table 191 in the main TA summarises the PRoW that are permanently diverted, realigned or reinstated to accommodate the original scheme. Table 191.1 summarises the amendments associated with the AP2 revised scheme and replaces the changes noted in Table 191 in the main TA. Those not listed in Table 191.1 remain unchanged from those identified in Table 191 of the main TA.

Table 191.1: CA1 permanent changes to public rights of way for non-motorised users (AP2 revised scheme amendments)

PRoW name	Change in length	New over-or under bridge
Kings Bromley Footpath 6	Local diversion to accommodate amended Handsacre Spur is less than 100m longer with minimal change in travel length	None

2.7.21 There is one amendment to Table 192, on Common Lane, where the AP2 revised scheme provides connectivity across the HS2 route for non-motorised users and farm traffic by the Kings Bromley new bridleway, which extends from Common Lane (South) closure, south of the HS2 route, to the junction with the Common Lane diversion.

2.7.22 Table 192.1 summarises the amendments associated with the AP2 revised scheme and replaces the changes noted in Table 192 in the main TA. Those not listed in Table 192.1 remain unchanged from those identified in Table 192 of the main TA.

Table 192.1: CA1 permanent changes to roads for non-motorised users (AP2 revised scheme amendments)

Road name	Change in length	New over/under bridge
Common Lane (south)	Diversion via A515 Lichfield Road is up to 700m	None

2.7.23 The Phase One SES and AP ES included the closure of Shaw Lane and the extension of Tuppenhurst Lane in an easterly direction, from Shaw Lane, to a new junction with the A515 Lichfield Road. This would increase the journey distance for users of Shaw Lane. The AP2 revised scheme amends the Phase One connections between the HS2 route and the West Coast Main Line (WCML). This will remove the need for Shaw Lane to be closed and not require the Tuppenhurst Lane diversion, resulting in the removal of the increase in journey distance for users of Shaw Lane.

3 Colwich to Yarlet (CA2)

3.1 SES2 changes and AP2 amendments

3.1.1 The assessment includes all changes to construction traffic, including the movement of excavated material and changes to the construction programme. It includes measures to reduce the need to move material by the road network and the use of site haul routes to limit construction traffic on the road network.

3.1.2 The original scheme is described in Section 6 of the main TA and Sections 2 to 5 of the Volume 2, community area reports provide details of all the proposed changes and amendments. The following design changes and amendments have the greatest contribution to the assessment of changes in traffic flows in the Colwich to Yarlet area:

- changes to the movement of excavated material and to the construction programme;
- New construction traffic route from along the A51 from Stone to Weston via Sandon (SES2-002-010);
- Additional land required for modifications to the A513 Beaconside/A518 Weston Road/Hydrant Way junction (AP2-002-016);
- Additional land required for modifications to A513 Beaconside and B5066 Sandon Road junction (AP2-002-021);
- Additional land required for modifications to A513 Beaconside and Marston Lane junction (AP2-002-024); and
- Additional land required to relocate a temporary material stockpile and for a new transfer node, east of the Yarlet South cutting (AP2-002-025).

3.1.3 There are a number of other design changes and amendments in the area which impact on construction traffic flows and these include:

- Local placement of surplus excavated material to the south of Moreton cutting (SES2-002-002);
- Local placement of surplus excavated material to the north of Moreton cutting (SES2-002-003);
- Local placement of surplus excavated material to the south of Brancote North cutting (SES2-002-007);
- Local placement of surplus excavated material to the north of Marston North embankment (SES2-002-008);
- amendments to utilities and new utility compounds as set out in Table 213 below;
- Extension of a noise fence barrier from Moreton North embankment to Moreton South embankment (SES2-002-001);

- Three new working areas and a new utility compound for the British Pipeline Agency diversion works at the Trent North embankment and Brancote South cutting (SES2-002-005);
- Additional land required for the provision of a replacement facility for Mayfield Children's Home (AP2-002-001);
- Additional land required during construction for the movement of surplus excavated material at Moreton, Ingestre, Hopton and Marston (AP2-002-003);
- Additional land required for the diversion of a Cadent gas pipeline, east of Colwich Bridleway 58 accommodation overbridge (AP2-002-005);
- Additional land and a change to Bill powers required for construction activities at Great Haywood (AP2-002-008); and
- Additional land required for construction activities around B5066 Sandon Road, Hopton (AP2-002-020).

3.1.4 The construction assessment also includes consideration of any impacts in the Colwich to Yarlet area that arise from construction of the AP2 revised scheme in the adjoining community areas.

3.2 Existing baseline

3.2.1 Baseline conditions are described in Section 5.4 of the main TA.

3.2.2 Supplementary traffic surveys were undertaken in June 2018 and in October 2018. One PRoW survey was undertaken in August 2018. The supplementary transport assessment baseline survey data is included BID TR-001-000 SES2 and AP2 ES.

3.2.3 The June and October 2018 surveys were undertaken at locations not previously surveyed but potentially now affected by the AP2 revised scheme or at locations where the highway network has been amended since the original scheme.

3.2.4 Additional junction modelling has been undertaken to assess traffic impacts at locations potentially affected by the AP2 revised scheme, including the new construction route along the A51 corridor between A34 Stone Road and Weston.

3.2.5 The PRoW survey was undertaken to identify the possible impact on non-motorised users at Mount Edge off Sandon Road and Hopton Lane.

Baseline junction operation

3.2.6 The junction operation and modelling criteria applied is summarised in Section 5.4 of the main TA.

A51 London Road/A518 Stafford Road/A518 Weston

3.2.7 Table 50 in the main TA summarises baseline junction modelling of the A518 Stafford Road/A51 as a standalone three-arm signalised junction. This junction has been re-calibrated with new survey data to include the northern set of signals at this junction at the request of local highway authority. This enables the assessment of the operation of the junction with the AP2 revised scheme construction traffic being routed along the A51. The northern A518 signalised junction has been linked with the

southern junction and modelled within a single assessment calibrated to 2016 conditions as reported in Table 50 of the main TA.

3.2.8 Table 50 below replaces Table 50 of the main TA and summarises the performance at the southern A51 London Road/A518 Stafford Road junction (south). Table 50.1 reports the results at the northern A51 London Road/A518 Weston junction (north).

Table 50: 2016 baseline performance at A51 London Road/A518 Stafford Road junction (south)

Approach	Flow, PCU/hr	DoS	Q, PCU
	2016 AM (08:00 – 09:00) baseline results		
A518 Stafford Road	442	71%	6
A51 London Road (south) – left turn	305	70%	8
A51 London Road (south) – ahead	510	73%	10
A51 London Road (north) – ahead	462	36%	1
A51 London Road (north) – right turn	515	71%	13
	2016 PM (17:00 – 18:00) baseline results		
A518 Stafford Road	687	74%	10
A51 London Road (south) – left turn	202	49%	5
A51 London Road (south) – ahead	519	72%	9
A51 London Road (north) – ahead	446	44%	3
A51 London Road (north) – right turn	318	71%	9

Table 50.1 2016 baseline performance at A51 London Road/A518 Weston junction (north)

Approach	Flow, PCU/hr	DoS	Q, PCU
	2016 AM (08:00 – 09:00) baseline results		
A518 Weston	496	67%	8
A51 London Road (north) (left)	172	25%	3
A51 London Road (north) (ahead)	650	42%	7
A51 London Road (south) (ahead)	514	41%	4
A51 London Road (south) (right)	216	66%	6
	2016 PM (17:00 – 18:00) baseline results		
A518 Weston	436	57%	6
A51 London Road (north) (left)	178	31%	4
A51 London Road (north) (ahead)	509	43%	6
A51 London Road (south) (ahead)	596	46%	6
A51 London Road (south) (right)	323	63%	9

3.2.9 The conclusions drawn in paragraph 5.4.50 of the main TA is replaced by:

"The results in Table 50 show that the junction operates within capacity in the AM and PM peak periods. The A51 London Road (south) ahead approach arm is shown to have a DoS of 73% with a corresponding queue of 10 PCUs in the AM peak and a DoS of 72% and a corresponding queue of nine PCUs in the PM peak.

The A518 Stafford Road approach is shown to have a DoS of 71% with a corresponding queue of six PCUs in the AM peak and a DoS of 74% and a corresponding queue of 10 PCUs in the PM peak."

3.2.10 The results in Table 50.1 show that the A51 London Road/A518 Weston (north) junction operates within capacity in the AM and PM peak hours. The A51 London Road (south) right turn approach arm is shown to have a DoS of 66% with a corresponding queue of six PCUs in the AM peak and a DoS of 63% and a corresponding queue of nine PCUs in the PM peak.

A51 Main Road/Bellamour Lane

3.2.11 This junction has been modelled following discussions with the local highway authority in order to assess the operation of the junction with the AP2 revised scheme construction traffic being routed along the A51.

3.2.12 This junction is a combination of two closely located three-arm priority controlled (give way) T-junctions. The junction has a 'ghost island' right-turn lane on the A51 (south) approach at the southern junction and there are no controlled pedestrian facilities.

3.2.13 For the purposes of the assessment, this is assessed as a single junction, with the existing operation for the AM and PM peaks as shown in Table 53.1.

Table 53.1: 2018 baseline performance at A51 Main Road/Bellamour Lane junction

Approach	Flow, PCU/hr	RFC	Q, PCU
	2018 AM (08:00 – 09:00) baseline results		
Bellamour Lane (left)	4	0.01	0
Bellamour Lane (right)	54	0.22	0
A51 Main Road (north) (ahead + right)	1	0.00	0
A51 Main Road (north) (ahead)	618	-	-
A51 Main Road (south) (left)	59	-	-
A51 Main Road (south) (ahead)	709	-	-
	2018 PM (17:00 – 18:00) baseline results		
Bellamour Lane (left)	3	0.01	0
Bellamour Lane (right)	42	0.21	0
A51 Main Road (north) (ahead + right)	1	0.00	0

Approach	Flow, PCU/hr	RFC	Q, PCU
A51 Main Road (north) (ahead)	780	-	-
A51 Main Road (south) (left)	37	-	-
A51 Main Road (south) (ahead)	764	-	-

3.2.14 The results show that the junction operates within capacity in the AM and PM peak periods.

A51/Main Road (Colwich)

3.2.15 This junction has been modelled following discussions with the local highway authority in order to assess the operation of the junction with the AP2 revised scheme construction traffic being routed along the A51.

3.2.16 This junction is a three-arm priority controlled (give way) T-junction with a physical island on the Main Road approach and a right-turn 'ghost island' on the A51. There are no controlled pedestrian crossing facilities, where the existing operation of the junction has been assessed for the AM and PM peaks as shown in Table 53.2.

Table 53.2: 2018 baseline performance at A51/Main Road (Colwich) junction

Approach	Flow, PCU/hr	RFC	Q, PCU
	2018 AM (08:00 – 09:00) baseline results		
Main Road (left)	35	0.07	0
Main Road (right)	173	0.53	1
A51 Lichfield Road (north) (ahead + right)	32	0.06	0
A51 Lichfield Road (north) (ahead)	594	-	-
A51 Main Road (south) (left)	100	-	-
A51 Main Road (south) (ahead)	584	-	-
	2018 PM (17:00 – 18:00) baseline results		
Bellamour Lane (left)	21	0.04	0
Bellamour Lane (right)	106	0.36	1
A51 Main Road (north) (ahead + right)	32	0.06	0
A51 Main Road (north) (ahead)	695	-	-
A51 Main Road (south) (left)	171	-	-
A51 Main Road (south) (ahead)	641	-	-

3.2.17 The results show that the junction operates within capacity in the AM and PM peak periods with minimal queuing.

A51 London Road/New Road

3.2.18 This junction has been modelled following discussions with the local highway authority in order to assess the operation of the junction with the AP2 revised scheme construction traffic being routed along the A51.

3.2.19 This junction is a four-arm priority controlled (give way) crossroads with no controlled pedestrian crossing facilities. The existing operation of the junction has been assessed for the AM and PM peaks as shown in Table 53.3 as a three-arm T-junction as the observed traffic associated with Trent Lane is very low and has no effect on the operation of the junction.

Table 53.3: 2018 baseline performance at A51 London Road/New Road junction

Approach	Flow, PCU/hr	RFC	Q, PCU
	2018 AM (08:00 – 09:00) baseline results		
New Road (left)	17	0.06	0
New Road (right)	165	0.62	2
A51 London Road (north) (ahead + right)	27	0.06	0
A51 London Road (north) (ahead)	565	-	-
A51 London Road (south) (left)	191	-	-
A51 London Road (south) (ahead)	539	-	-
	2018 PM (17:00 – 18:00) baseline results		
New Road (left)	17	0.10	0
New Road (right)	217	0.80	4
A51 London Road (north) (ahead + right)	7	0.02	0
A51 London Road (north) (ahead)	540	-	-
A51 London Road (south) (left)	161	-	-
A51 London Road (south) (ahead)	566	-	-

3.2.20 The results show that the junction operates within capacity in the AM peak hour with minimal queuing. The junction is approaching capacity in the PM peak with the New Road arm RFC of 0.80 and a corresponding queue length of four PCUs.

A51 Lichfield Road/B5066 Sandon Road/School Lane

3.2.21 This junction has been modelled following discussions with the local highway authority in order to assess the operation of the junction with the AP2 revised scheme construction traffic being routed along the A51.

3.2.22 This junction is a four-arm staggered priority controlled (give way) junction with no controlled pedestrian crossing facilities, a right-turn ghost island on the A51 Lichfield Road and a physical island at the B5066 Sandon Road approach. The existing operation of the junction has been assessed for the AM and PM peaks as shown in Table 53.4.

Table 53.4: 2018 baseline performance at A51 Lichfield Road/B5066 Sandon Road/School Lane junction

Approach	Flow, PCU/hr	RFC	Q, PCU
	2018 AM (08:00 – 09:00) baseline results		
School Lane (left + ahead)	0	0	0
School Lane (ahead + right)	0	0	0
A51 Lichfield Road (north) (Left + ahead + right)	430	0.84	5
A51 Lichfield Road (north) (Left)	2	-	-
A51 Lichfield Road (north) (right)	618	-	-
B5066 Sandon Road (left + ahead)	159	0.33	1
B5066 Sandon Road (ahead + right)	77	0.45	1
A51 Lichfield Road (south) (left + ahead+ right)	0	0	0
A51 Lichfield Road (south) (left)	124	-	-
A51 Lichfield Road (south) (ahead)	596	-	-
	2018 PM (17:00 – 18:00) baseline results		
School Lane (left + ahead)	0	0	0
School Lane (ahead + right)	0	0	0
A51 Lichfield Road (north) (Left + ahead + right)	150	0.33	1
A51 Lichfield Road (north) (Left)	1	-	-
A51 Lichfield Road (north) (right)	600	-	-
B5066 Sandon Road (left + ahead)	400	0.85	5
B5066 Sandon Road (ahead + right)	64	0.26	1
A51 Lichfield Road (south) (left + ahead+ right)	1	0	0
A51 Lichfield Road (south) (left)	108	-	-
A51 Lichfield Road (south) (ahead)	750	-	-

3.2.23 The results show that the junction is approaching capacity in the AM peak and close to capacity in the PM peak at 2018. The A51 Lichfield Road (north) arm is shown to have an RFC value of 0.84 and a queue length of five PCUs in the AM peak. The B5066 Sandon Road arm is shown to have an RFC value of 0.85 and a queue length of five PCUs in the PM peak. All other approach arms operate within capacity with minimal queuing.

A51 Lichfield Road/Milwich Road

3.2.24 This junction has been modelled following discussions with the local highway authority in order to assess the operation of the junction with the AP2 revised scheme construction traffic being routed along the A51.

3.2.25 This junction is a three-arm priority controlled (give way) T-junction, with a right-turn 'ghost island' on the A51 Lichfield Road and no controlled pedestrian crossing facilities. The existing operation of the junction has been assessed for the AM and PM peaks as shown in Table 53.5.

Table 53.5: 2018 baseline performance at A51 Lichfield Road/Milwich Road junction

Approach	Flow, PCU/hr	RFC	Q, PCU
	2018 AM (08:00 – 09:00) baseline results		
Milwich Road (left)	34	0.09	0
Milwich Road (right)	5	0.03	0
A51 Lichfield Road (north) (ahead + right)	24	0.06	0
A51 Lichfield Road (north) (ahead)	729	-	-
A51 Lichfield Road (south) (left)	4	-	-
A51 Lichfield Road (south) (ahead)	1016	-	-
	2018 PM (17:00 – 18:00) baseline results		
Milwich Road (left)	24	0.05	0
Milwich Road (right)	5	0.02	0
A51 Lichfield Road (north) (ahead + right)	49	0.10	0
A51 Lichfield Road (north) (ahead)	1104	-	-
A51 Lichfield Road (south) (left)	25	-	-
A51 Lichfield Road (south) (ahead)	723	-	-

3.2.26 The results show that the junction operates within capacity in the AM and PM peak periods.

A51 Lichfield Road/B5066 Hilderstone Road

3.2.27 This junction has been modelled following discussions with the local highway authority in order to assess the operation of the junction with the AP2 revised scheme construction traffic being routed along the A51.

3.2.28 This junction is a three-arm priority controlled (give way) T-junction with a right-turn ghost island on the A51 Lichfield Road no controlled pedestrian crossing facilities. The existing operation of the junction has been assessed for the AM and PM peaks as shown in Table 53.6.

Table 53.6: 2018 baseline performance at A51 Lichfield Road/B5066 Hilderstone Road junction

Approach	Flow, PCU/hr	RFC	Q, PCU
	2018 AM (08:00 – 09:00) baseline results		
B5066 Hilderstone Road (left)	439	0.88	6
B5066 Hilderstone Road (right)	9	0.16	0
A51 Lichfield Road (north) (ahead + right)	174	0.34	1
A51 Lichfield Road (north) (ahead)	568	-	-
A51 Lichfield Road (south) (left)	8	-	-
A51 Lichfield Road (south) (ahead)	578	-	-
	2018 PM (17:00 – 18:00) baseline results		
B5066 Hilderstone Road (left)	166	0.33	1
B5066 Hilderstone Road (right)	6	0.05	0
A51 Lichfield Road (north) (ahead + right)	546	0.89	8
A51 Lichfield Road (north) (ahead)	567	-	-
A51 Lichfield Road (south) (left)	14	-	-
A51 Lichfield Road (south) (ahead)	580	-	-

3.2.29 The results show that the junction operates close to its capacity in the AM and PM peak periods. The B5066 Hilderstone Road arm has an RFC value of 0.88 and a queue length of six PCUs in the AM peak. The A51 Lichfield Road (north) arm has an RFC value of 0.89 and a queue length of eight PCUs in the PM peak.

A51 Lichfield Road/Old Lichfield Road (south)

3.2.30 This junction has been modelled following discussions with the local highway authority in order to assess the operation of the junction with the AP2 revised scheme construction traffic being routed along the A51.

3.2.31 This junction is a three-arm priority-controlled junction (give way) T-junction with no controlled pedestrian crossing facilities. The existing operation of the junction has been assessed for the AM and PM peaks as shown in Table 53.7.

Table 53.7: 2018 baseline performance at A51 Lichfield Road/Old Lichfield Road (south) junction

Approach	Flow, PCU/hr	RFC	Q, PCU
	2018 AM (08:00 – 09:00) baseline results		
Old Lichfield Road (left)	0	0	0
Old Lichfield Road (right)	7	0.02	0
A51 Lichfield Road (north) (ahead + right)	0	0	0
A51 Lichfield Road (north) (ahead)	577	-	-
A51 Lichfield Road (south) (left)	8	-	-
A51 Lichfield Road (south) (ahead)	568	-	-
	2018 PM (17:00 – 18:00) baseline results		
Old Lichfield Road (left)	2	0	0
Old Lichfield Road (right)	3	0.01	0
A51 Lichfield Road (north) (ahead + right)	0	0	0
A51 Lichfield Road (north) (ahead)	587	-	-
A51 Lichfield Road (south) (left)	4	-	-
A51 Lichfield Road (south) (ahead)	658	-	-

3.2.32 The results show that the southern junction operates within capacity in the AM and PM peak periods.

A51 Butterhill Bank/A51 Lichfield Road/Old Lichfield Road (north)

3.2.33 This junction has been modelled following discussions with the local highway authority in order to assess the operation of the junction with the AP2 revised scheme construction traffic being routed along the A51.

3.2.34 This junction is a three-arm priority controlled (give way) T-junction with no controlled pedestrian crossing facilities. The existing operation of the junction has been assessed for the AM and PM peaks as shown in Table 53.8.

Table 53.8: 2018 baseline performance at A51 Butterhill Bank/Burston Lane (north) junction

Approach	Flow, PCU/hr	RFC	Q, PCU
	2018 AM (08:00 – 09:00) baseline results		
Old Lichfield Road (left)	3	0.01	0
Old Lichfield Road (right)	4	0.01	0
A51 Butterhill Bank (north) (ahead + right)	5	0.01	0
A51 Butterhill Bank (north) (ahead)	578	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU
A51 Lichfield Road (south) (left)	2	-	-
A51 Lichfield Road (south) (ahead)	564	-	-
	2018 PM (17:00 – 18:00) baseline results		
Old Lichfield Road (left)	5	0.01	0
Old Lichfield Road (right)	2	0.01	0
A51 Butterhill Bank (north) (ahead + right)	6	0.01	0
A51 Butterhill Bank (north) (ahead)	587	-	-
A51 Lichfield Road (south) (left)	0	-	-
A51 Lichfield Road (south) (ahead)	660	-	-

3.2.35 The results show that the junction operates within capacity in the AM and PM peak periods.

A34 Stone Road/Yarlet School

3.2.36 The AP2 revised scheme includes the permanent upgrade of the Yarlet Trust School access arrangements to relocate the junction to the north, create an all-movement priority (give way) T-junction with carriageway widening and a kerbed right turn lane.

3.2.37 The school access is currently a three-arm left-in/left-out priority-controlled junction (give way) T-junction on the A34 Stone Road dual carriageway with no controlled pedestrian crossing facilities. The current performance of the junction has been assessed for the AM and PM peak.

3.2.38 The AM peak for the school has been observed during the general network peak between 08:00 and 09:00. The PM peak for the school traffic has been observed during the earlier period of 15:00 and 16:00, ahead of the general network peak of 17:00 to 18:00. The PM peak assessment considers the school peak demand between 15:00 and 16:00 and is summarised in Table 53.9.

Table 53.9: 2018 baseline performance at A34 Stone Road/Yarlet School junction

Approach	Flow, PCU/hr	RFC	Q, PCU
	2018 AM (08:00 – 09:00) baseline results		
Yarlet School (left)	93	0.41	1
A34 Stone Road (south) (ahead)	737	-	-
A34 Stone Road (north) (left)	109	-	-
A34 Stone Road (north) (ahead)	1242	-	-
	2018 PM (15:00 – 16:00) baseline results		
Yarlet School (left)	38	0.13	0
A34 Stone Road (south) (ahead)	912	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU
A34 Stone Road (north) (left)	37	-	-
A34 Stone Road (north) (ahead)	737	-	-

3.2.39 The results show that the junction operates within capacity in the AM and PM peak periods.

3.3 Assessment methodology

3.3.1 The assessment methodology is described in Section 3 of the main TA with the future year baseline detailed in Section 8.2 of the main TA. The construction assessment considers the traffic and transport impacts in the peak month of construction activity at each location, based on the proposed phasing of construction works. The assessment also includes cumulative impacts arising from construction in the adjoining community areas as well as construction movements through the area.

3.4 CA2 AP2 revised scheme future baseline

3.4.1 Future baseline traffic and transport conditions are described in Section 8.2 of the main TA. This section of the main TA is unchanged unless stated otherwise.

3.4.2 Where a junction has been assessed in which the observed baseline is different to the 2016 baseline, the revised background traffic growth factors have been calculated to determine traffic growth in the construction and operational years, which have been extrapolated from the agreed TEMPRO growth factors applied locally within the main TA.

3.4.3 Three junctions in Stafford have been reassessed using outputs extracted from the Staffordshire County Council Stafford SATURN model. These are:

- A518 Weston Road/Beacon Way/Blackheath Lane;
- A518 Weston Road/A513 Beaconside/Hydrant Way; and
- Tixall Road/Blackheath Lane/Baswich Lane.

3.4.4 The opening of the Hydrant Way Link between the A518 Weston Road and Tixall Road prior to HS2 construction commencing will result in re-routing of future baseline traffic. This change is captured using outputs extracted from the Stafford SATURN model. This revised methodology has been discussed with the local highway authority.

Highway network

3.4.5 Future baseline traffic and transport conditions are described in Section 8.2 of the main TA.

Strategic road network and primary 'A' road traffic flows

3.4.6 Table 194 in the main TA summarises the 2016, 2023, 2027 and 2041 AM (08:00 – 09:00) and PM (17:00 – 18:00) peak forecast traffic flows.

3.4.7 The majority of the traffic flows are unchanged, except for the inclusion of a new link on the A51 Stone Bypass/Butterhill Bank/Lichfield Road (between A34 Stone Road and Church Lane). Table 194 below supplements the contents of Table 194 of the main TA to include the new route.

Local road network traffic flows

3.4.8 Table 195 in the main TA summarises the 2016, 2023, 2027 and 2041 AM (08:00 – 09:00) and PM (17:00 – 18:00) peak forecast traffic flows. Table 195 in the main TA remains unchanged.

Table 194: Strategic and primary road network AM peak hour (8.00 – 09.00) and PM peak hour (17:00 – 18:00) future baseline traffic flows

Location	Direction	AM (08:00 – 09:00)								PM (17:00 – 18:00)							
		2016		2023		2027		2041		2016		2023		2027		2041	
		Veh	HGV	Veh	HGV	Veh	HGV	Veh	HGV	Veh	HGV	Veh	HGV	Veh	HGV	Veh	HGV
A51 Stone Bypass/Butterhill Bank/Lichfield Road (between A34 Stone Road and Church Lane)	NB	553	51	596	55	613	56	661	60	681	33	735	36	756	37	788	38
	SB	587	52	632	56	651	57	701	62	609	23	657	25	676	25	705	26

Junction operation – future baseline

3.4.9 The performance of the key junctions, including those surveyed in 2018, which form the main access route for the SRN through the study area to the construction sites or would be affected by the operation of the AP2 revised scheme, have been assessed using the future baseline traffic flows. Where these differ from or are additional to the main TA, the results are summarised in the following tables.

3.4.10 Where a junction will be affected by the AP2 revised scheme construction traffic, future baseline results are included for 2023.

3.4.11 Where a junction is affected by the operation of the AP2 revised scheme, all of which are a result of permanent junction improvements, results are included for 2027 and 2041.

3.4.12 The AP2 revised scheme includes a new construction route along the A51 between Stone and Weston. Consequently, a number of additional junctions along this corridor have been assessed and the performance of these junction reported in this section.

A518 Weston Road/Beacon Way/Blackheath Lane

3.4.13 Table 198 of the main TA summarises future baseline performance of the junction. In discussion with the local highway authority, the future baseline traffic has been extracted from the Staffordshire County Council SATURN model that includes the new section of Hydrant Way that connects Tixall Road with the A518 Weston Road and Beaconside. Table 198 in the main TA is replaced by Table 198 below. The 2016 results remain unchanged from those summarised in the main TA.

Table 198: Future year baseline performance at A518 Weston Road/Beacon Way/Blackheath Lane junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**		
A518 Weston Road (north)	665	0.62	2	972	0.80	4
Blackheath Lane	763	0.15	0	516	0.48	1
A518 Weston Road (south)	462	0.27	0	524	0.36	1
Beacon Way	53	0.04	0	182	0.17	0
	2016 PM			**2023 PM**		
A518 Weston Road (north)	538	0.57	1	895	0.75	3
Blackheath Lane	419	0.13	0	324	0.27	0
A518 Weston Road (south)	1224	0.7	2	701	0.44	1
Beacon Way	122	0.18	0	328	0.33	1

3.4.14 The conclusions drawn in paragraph 8.2.24 of the main TA are replaced by:

> "The results show that this junction is approaching capacity in the 2023 baseline in the AM and PM peak periods, with the A518 Weston Road (north) showing an RFC value of 0.80 and 0.75 in the AM and PM Peak periods, with a corresponding queue length of four and three PCUs respectively."

A518 Weston Road/A513 Beaconside/Hydrant Way

3.4.15 In discussion with the local highway authority, the future baseline traffic has been extracted from the Staffordshire County Council SATURN model that includes the new section of Hydrant Way that connects Tixall Road with the A518 Weston Road and Beaconside.

3.4.16 As the junction is affected by the construction and the operation of the AP2 revised scheme through the delivery of a permanent upgrade, future baseline results are presented for 2023, 2027 and 2041. Table 199 in the main TA is replaced by Table 199 below, which summarises the 2023 future baseline performance and by Table 199.1 that summarises the 2027 and 2041 future baseline performance. The 2016 results remain unchanged from those summarised in the main TA.

Table 199: Future year baseline performance at A518 Weston Road/A513 Beaconside/Hydrant Way (2023)

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2016 AM			**2023 AM**		
A513 Beaconside	698	0.48	1	829	0.67	2
A518 Weston Bank (east)	1127	0.68	2	626	0.46	1
Hydrant Way	23	0.03	0	1225	1.21	126
A518 Weston Road (west)	665	0.47	1	876	0.74	3
	2016 PM			**2023 PM**		
A513 Beaconside	987	0.71	2	1106	0.98	20
A518 Weston Bank (east)	800	0.49	1	534	0.52	1
Hydrant Way	13	0.01	0	788	0.70	3
A518 Weston Road (west)	732	0.49	1	1048	0.81	5

Table 199.1: Future year baseline performance at A518 Weston Road/A513 Beaconside/Hydrant Way (2027 and 2041)

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2027 AM			**2041 AM**		
A513 Beaconside	829	0.68	3	860	0.71	3
A518 Weston Bank (east)	672	0.50	1	695	0.52	1
Hydrant Way	1326	1.35	205	1376	1.41	252
A518 Weston Road (west)	880	0.78	4	908	0.80	4
	2027 PM			**2041 PM**		
A513 Beaconside	1110	0.97	18	1147	1.02	33
A518 Weston Bank (east)	609	0.58	2	630	0.61	2
Hydrant Way	795	0.73	3	822	0.76	3
A518 Weston Road (west)	1063	0.85	6	1099	0.89	6

3.4.17 The conclusions drawn in paragraph 8.2.26 of the main TA are replaced by:

"The results show that the inclusion of the eastern distributor road (referred to in the transport supply assumptions of the main TA) and additional nearby housing development is predicted to result in a substantial increase in traffic flows at this junction in the future baseline, particularly on the Hydrant Way arm. The results show that the junction operates over capacity in the 2023 baseline in the AM and PM peak periods. Hydrant Way has an RFC value of 1.21 in the AM peak with queue length of 126 PCUs in 2023. In the PM peak, the A513 Beaconside RFC value increases from 0.71 to 0.98 with a corresponding increase from two to 20 PCUs."

3.4.18 The junction will continue to operate above capacity in the 2027 and 2041 future baseline, with the RFC values and queue lengths increasing, with the Hydrant Way RFC value increasing to 1.41 in 2041 and a corresponding queue length of 252 PCUs in the AM peak. In the PM peak, the A513 Beaconside RFC value increases to 1.02 in 2041 with a corresponding queue length of 33 PCUs.

A513 Beaconside/Marston Lane

3.4.19 Table 205 of the main TA summarises the results of the junction capacity assessments at 2016 and 2023. Table 205 in the main TA remains unchanged.

3.4.20 As the junction is affected by the construction and the operation of the AP2 revised scheme through the delivery of permanent junction mitigation, future baseline results are presented for 2027 and 2041. Table 205.1 below summarises the 2027 and 2041 future baseline performance.

Table 205.1: Future year baseline performance at A513 Beaconside/Marston Lane junction (2027 and 2041)

Approach	**Flow, PCU/hr**	**RFC**	**Q, PCU**	**Flow, PCU/hr**	**RFC**	**Q, PCU**
	2027 AM			**2041 AM**		
Marston Lane (left + right)	48	0.56	1	52	N/A	27
A513 Beaconside (west) (left)	10	-	-	11	-	-
A513 Beaconside (west) (ahead)	976	-	-	1064	-	-
A513 Beaconside (west) (ahead)	290	-	-	316	-	-
A513 Beaconside (west) + Marston Lane (ahead)	986	-	-	1073	-	-
A513 Beaconside (west) + Marston Lane (right)	307	0.66	2	332	0.72	2
Common Road (left)	211	0.47	1	230	2.62	54
Common Road (right)	16	0.30	1	17	2.21	5
A513 Beaconside (east) (left)	79	-	-	86	-	-
A513 Beaconside (east) (ahead)	727	-	-	792	-	-
A513 Beaconside (east) (ahead)	8	-	-	9	-	-
Common Road + A513 Beaconside (east) (ahead)	933	-	-	1017	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
Common Road + A513 Beaconside (east) (right)	12	0.04	0	13	0.04	13
	2027 PM			**2041 PM**		
Marston Lane (left + right)	18	0.15	0	20	0.71	1
A513 Beaconside (west) (left)	13	-	-	15	-	-
A513 Beaconside (west) (ahead)	771	-	-	838	-	-
A513 Beaconside (west) (ahead)	117	-	-	127	-	-
A513 Beaconside (west) + Marston Lane (ahead)	775	-	-	842	-	-
A513 Beaconside (west) + Marston Lane (right)	123	0.33	1	133	0.38	1
Common Road (left)	300	0.98	10	325	1.54	64
Common Road (right)	38	0.88	3	41	1.47	9
A513 Beaconside (east) (left)	49	-	-	53	-	-
A513 Beaconside (east) (ahead)	1069	-	-	1162	-	-
A513 Beaconside (east) (ahead)	7	-	-	8	-	-
Common Road + A513 Beaconside (east) (ahead)	1356	-	-	1438	-	-
Common Road + A513 Beaconside (east) (right)	20	0.04	0	20	0.05	0

3.4.21 The results show that the junction operates within capacity in the 2027 baseline in the AM peak and at capacity in the PM peak with Common Road, showing an RFC value of 0.98 and a queue length of 10 PCUs.

3.4.22 The results show that the junction operates above capacity in the 2041 baseline in the AM and PM peak periods. Common Road in the AM and PM peak has an RFC value in excess of 2.0 and 1.5 and a queue length of 54 and 64 PCUs. In the AM peak, the Marston Lane arm RFC value is unrealistically high and therefore not reported. The predicted queue length of 27 PCUs is a more accurate reflection of the predicted traffic impacts at this junction.

A51 London Road/A518 Stafford Road/A518 Uttoxeter Road

3.4.23 Table 208 of the main TA summarises the results of the stand-alone junction capacity assessments. Table 208 in the main TA is replaced by Table 208 below, which summarises the performance of the A51 London Road/A518 Stafford Road junction (south) junction.

3.4.24 The A51 London Road/A518 Stafford Road junction (south) junction has been modelled in combination with the A51 London Road/A518 Uttoxeter Road junction located approximately 250m to the north of A518 Stafford Road in order to assess the

AP2 revised scheme that includes the new construction route on the A51 between Stone Road and Weston.

3.4.25 Table 208.1 summarises the performance of the A51 London Road/A518 Uttoxeter Road junction (north) junction. As the junctions are not affected by the operation of the AP2 revised scheme, future baseline results are presented for 2023 only.

Table 208: Future year baseline performance at A51 London Road/A518 Stafford Lane junction (south)

Approach	Flow, PCU/hr	DoS	Q, PCU	Flow, PCU/hr	DoS	Q, PCU
	2016 AM			**2023 AM**		
A518 Stafford Road	442	74%	6	476	77%	7
A51 London Road (south) (left turn)	305	74%	8	329	76%	9
A51 London Road (south) (ahead)	510	73%	10	550	79%	11
A51 London Road (north) (ahead)	462	36%	1	497	38%	3
A51 London Road (north) (right turn)	516	71%	13	555	77%	15
	2016 PM			**2023 PM**		
A518 Stafford Road	687	74%	10	740	80%	12
A51 London Road (south) (left turn)	202	49%	5	218	53%	5
A51 London Road (south) (ahead)	519	72%	9	559	77%	10
A51 London Road (north) (ahead)	446	44%	3	480	47%	10
A51 London Road (north) (right turn)	318	71%	9	342	77%	10

Table 208.1: Future year baseline performance at A51 London Road/A518 Uttoxeter Road junction (north)

Approach	Flow, PCU/hr	DoS	Q, PCU	Flow, PCU/hr	DoS	Q, PCU
	2016 AM			**2023 AM**		
A518 Uttoxeter Road	496	67%	8	534	69%	9
A51 London Road (north) (left)	172	25%	3	185	29%	3
A51 London Road (north) (ahead)	650	42%	7	701	48%	8
A51 London Road (south) (ahead)	514	41%	4	552	45%	13
A51 London Road (south) (right)	216	66%	6	235	66%	7

Approach	Flow, PCU/hr	DoS	Q, PCU	Flow, PCU/hr	DoS	Q, PCU
	2016 PM			**2023 PM**		
A518 Uttoxeter Road	436	57%	6	469	61%	7
A51 London Road (north) (left)	178	31%	4	192	33%	4
A51 London Road (north) (ahead)	509	43%	6	548	46%	7
A51 London Road (south) (ahead)	596	46%	6	621	47%	5
A51 London Road (south) (right)	323	63%	9	369	68%	17

3.4.26 The conclusions drawn in paragraph 8.2.45 of the main TA are replaced by:

"The results show that both junctions approach capacity in the 2023 baseline in the AM peak. In the PM peak, the A518 Uttoxeter Road junction (north) operates within capacity in the 2023 baseline."

Tixall Road/Blackheath Lane/Baswich Lane

3.4.27 In discussion with the local highway authority, the future baseline traffic has been extracted from the Staffordshire County Council SATURN model that includes the new section of Hydrant Way that connects Tixall Road with the A518 Weston Road and Beaconside.

3.4.28 Table 210 of the main TA summarises the results of the junction capacity assessments. Table 210 in the main TA is replaced by the Table 210 below. The 2016 results remain unchanged from those summarised in the main TA.

Table 210: Future year baseline p*erformance* at Tixall Road/Blackheath Lane/Baswich Lane junction

Approach	Flow, PCU/hr	DoS	MMQ, PCU	Flow, PCU/hr	DoS	Q, PCU
	2016 AM			**2023 AM**		
Blackheath Lane (north)	374	92%	14	430	95%	17
Tixall Road (east)	534	74%	13	738	95%	25
Baswich Lane (south)	586	95%	21	469	94%	17
Tixall Road (west)	198	78%	6	247	34%	5
	2016 PM			**2023 PM**		
Blackheath Lane (north)	750	83%	19	720	91%	22
Tixall Road (east)	249	83%	8	368	63%	9
Baswich Lane (south)	336	82%	10	353	91%	13
Tixall Road (west)	370	101%	20	481	91%	16

3.4.29 The conclusions drawn in paragraph 8.2.49 of the main TA are replaced by:

"The results show that the junction operates at capacity in the 2023 baseline in the AM and PM peak periods, with Baswich Lane (south) showing a DoS value 94% of greatest queue length of 17 PCUs and Tixall Road (east) with a DoS value of 95% and a queue length of 25 in the AM peak in 2023."

A51 Main Road/Bellamour Lane

3.4.30 The future baseline performance of this junction is shown in Table 212.1. As the junction is not affected by the operation of the AP2 revised scheme, future baseline results are presented for 2023 only.

Table 212.1: Future year baseline performance at A51 Main Road/Bellamour Lane junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2018 AM			**2023 AM**		
Bellamour Lane (left)	4	0.01	0	4	0.01	0
Bellamour Lane (right)	54	0.22	0	57	0.25	0
A51 Main Road (north) (ahead + right)	1	0.00	0	1	0.00	0
A51 Main Road (north) (ahead)	618	-	-	652	-	-
A51 Main Road (south) (left)	59	-	-	62	-	-
A51 Main Road (south) (ahead)	709	-	-	748	-	-
	2018 PM			**2023 PM**		
Bellamour Lane (left)	3	0.01	0	3	0.01	0
Bellamour Lane (right)	42	0.21	0	44	0.24	0
A51 Main Road (north) (ahead + right)	1	0.00	0	1	0.00	0
A51 Main Road (north) (ahead)	780	-	-	823	-	-
A51 Main Road (south) (left)	37	-	-	39	-	-
A51 Main Road (south) (ahead)	764	-	-	806	-	-

3.4.31 The results show that this junction operates within capacity in the 2023 baseline in the AM and PM peak periods.

A51 Lichfield Road/A51 Main Road/Main Road (Colwich)

3.4.32 The future baseline performance of this junction is shown in Table 212.2. As the junction is not affected by the operation of the AP2 revised scheme, future baseline results are presented for 2023 only.

Table 212.2: Future year baseline performance at A51 Lichfield Road/A51 Main Road/Main Road (Colwich) junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2018 AM			**2023 AM**		
Main Road (left)	35	0.07	0	37	0.08	0
Main Road (right)	173	0.53	1	183	0.58	1
A51 Lichfield Road (north) (ahead + right)	32	0.06	0	34	0.07	0
A51 Lichfield Road (north) (ahead)	594	-	-	627	-	-
A51 Main Road (south) (left)	100	-	-	106	-	-
A51 Main Road (south) (ahead)	584	-	-	616	-	-
	2018 PM			**2023 PM**		
Bellamour Lane (left)	21	0.04	0	22	0.05	0
Bellamour Lane (right)	106	0.36	1	112	0.40	1
A51 Main Road (north) (ahead + right)	32	0.06	0	34	0.07	0
A51 Main Road (north) (ahead)	695	-	-	733	-	-
A51 Main Road (south) (left)	171	-	-	180	-	-
A51 Main Road (south) (ahead)	641	-	-	676	-	-

3.4.33 The results show that this junction operates within capacity in the 2023 baseline in the AM and PM peak hours with minimal queuing.

A51 London Road/New Road

3.4.34 The future baseline performance of this junction is shown in Table 212.3. As the junction is not affected by the operation of the AP2 revised scheme, future baseline results are presented for 2023 only.

Table 212.3: Future year baseline performance at A51 London Road/New Road junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2018 AM			**2023 AM**		
New Road (left)	17	0.06	0	18	0.08	0
New Road (right)	165	0.62	2	174	0.69	2
A51 London Road (north) (ahead + right)	27	0.06	0	29	0.06	0
A51 London Road (north) (ahead)	565	-	-	596	-	-
A51 London Road (south) (left)	191	-	-	202	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2018 AM			**2023 AM**		
A51 London Road (south) (ahead)	539	-	-	569	-	-
	2018 PM			**2023 PM**		
New Road (left)	17	0.10	0	18	0.25	0
New Road (right)	217	0.80	4	229	0.88	6
A51 London Road (north) (ahead + right)	7	0.02	0	8	0.02	0
A51 London Road (north) (ahead)	540	-	-	569	-	-
A51 London Road (south) (left)	161	-	-	170	-	-
A51 London Road (south) (ahead)	566	-	-	597	-	-

3.4.35 The results show that this junction operates within capacity in the 2023 baseline in the AM peak and operates close to capacity in the PM peak.

3.4.36 The New Road arm has an RFC value of 0.88 with a corresponding queue length of six PCUs in the PM peak.

A51 Lichfield Road/B5066 Sandon Bank/School Lane

3.4.37 The future baseline performance of this junction is shown in Table 212.4. As the junction is not affected by the operation of the AP2 revised scheme, future baseline results are presented for 2023 only.

Table 212.4: Future year baseline performance at A51 Lichfield Road/B5066 Sandon Bank/School Lane junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2018 AM			2023 AM		
School Lane (left + ahead)	0	0	0	0	0	0
School Lane (ahead + right)	0	0	0	0	0	0
A51 Lichfield Road (north) (Left + ahead + right)	430	0.84	5	501	0.90	8
A51 Lichfield Road (north) (Left)	2	-	-	2	-	-
A51 Lichfield Road (north) (right)	618	-	-	605	-	-
B5066 Sandon Bank (left + ahead)	159	0.33	1	168	0.37	1
B5066 Sandon Bank (ahead + right)	77	0.45	1	81	0.56	1
A51 Lichfield Road (south) (left + ahead+ right)	0	0	0	0	0	0

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2018 AM			2023 AM		
A51 Lichfield Road (south) (left)	124	-	-	131	-	-
A51 Lichfield Road (south) (ahead)	596	-	-	629	-	-
	2018 PM			**2023 PM**		
School Lane (left + ahead)	0	0	0	0	0	0
School Lane (ahead + right)	0	0	0	0	0	0
A51 Lichfield Road (north) (Left + ahead + right)	150	0.33	1	159	0.36	1
A51 Lichfield Road (north) (Left)	1	-	-	1	-	-
A51 Lichfield Road (north) (right)	600	-	-	634	-	-
B5066 Sandon Bank (left + ahead)	400	0.85	5	423	0.93	9
B5066 Sandon Bank (ahead + right)	64	0.26	1	67	0.31	1
A51 Lichfield Road (south) (left + ahead+ right)	1	0	0	1	0	0
A51 Lichfield Road (south) (left)	108	-	-	114	-	-
A51 Lichfield Road (south) (ahead)	750	-	-	793	-	-

3.4.38 The results show that the junction operates close to capacity in the 2023 baseline in the AM and PM peak periods. The A51 Lichfield Road (north) arm has an RFC value of 0.90 and a queue length of eight PCUs in the AM peak. The B5066 Sandon Bank has an RFC value of 0.93 and a queue length of nine PCUs in the PM peak.

A51 Lichfield Road/Milwich Road

3.4.39 The future baseline performance of this junction is shown in Table 212.5. As the junction is not affected by the operation of the AP2 revised scheme, future baseline results are presented for 2023 only.

Table 212.5: Future year baseline performance at A51 Lichfield Road/Milwich Road junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2018 AM			**2023 AM**		
Milwich Road (left)	34	0.09	0	36	0.09	0
Milwich Road (right)	5	0.03	0	5	0.03	0
A51 Lichfield Road (north) (ahead + right)	24	0.06	0	25	0.06	0
A51 Lichfield Road (north)	729	-	-	769	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
(ahead)						
A51 Lichfield Road (south) (left)	4	-	-	4	-	-
A51 Lichfield Road (south) (ahead)	1016	-	-	1072	-	-
	2018 PM			**2023 PM**		
Milwich Road (left)	24	0.05	0	25	0.06	0
Milwich Road (right)	5	0.02	0	5	0.03	0
A51 Lichfield Road (north) (ahead + right)	49	0.10	0	52	0.11	0
A51 Lichfield Road (north) (ahead)	1104	-	-	1167	-	-
A51 Lichfield Road (south) (left)	25	-	-	26	-	-
A51 Lichfield Road (south) (ahead)	723	-	-	764	-	-

3.4.40 The results show that this junction operates within capacity in the 2023 baseline in the AM and PM peak periods.

A51 Lichfield Road/B5066 Hilderstone Road

3.4.41 The future baseline performance of this junction is shown in Table 212.6. As the junction is not affected by the operation of the AP2 revised scheme, future baseline results are presented for 2023 only.

Table 212.6: Future year baseline performance at A51 Lichfield Road/B5066 Hilderstone Road junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2018 AM			**2023 AM**		
B5066 Hilderstone Road (left)	439	0.88	6	463	0.94	10
B5066 Hilderstone Road (right)	9	0.16	0	9	0.87	1
A51 Lichfield Road (north) (ahead + right)	174	0.34	1	184	0.36	1
A51 Lichfield Road (north) (ahead)	568	-	-	599	-	-
A51 Lichfield Road (south) (left)	8	-	-	8	-	-
A51 Lichfield Road (south) (ahead)	578	-	-	610	-	-
	2018 PM			**2023 PM**		
B5066 Hilderstone Road (left)	166	0.33	1	175	0.36	1

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2018 AM			**2023 AM**		
B5066 Hilderstone Road (right)	6	0.05	0	6	0.07	0
A51 Lichfield Road (north) (ahead + right)	546	0.89	8	704	0.96	15
A51 Lichfield Road (north) (ahead)	567	-	-	473	-	-
A51 Lichfield Road (south) (left)	14	-	-	15	-	-
A51 Lichfield Road (south) (ahead)	580	-	-	613	-	-

3.4.42 The results show that the junction operates at capacity in the 2023 baseline in the AM and PM peak periods. The Hilderstone Road arm has an RFC value of 0.94 and a queue length of 10 PCUs in the AM peak. In the PM peak, the A51 Lichfield Road (north) arm has an RFC value of 0.96 and a queue length of 15 PCUs.

A51 Lichfield Road/Old Lichfield Road (south)

3.4.43 The future baseline performance of this junction is shown in Table 212.7. As the junction is not affected by the operation of the AP2 revised scheme, future baseline results are presented for 2023 only.

Table 212.7: Future year baseline performance at A51 Lichfield Road/Old Lichfield Road (south) junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2018 AM			**2023 AM**		
Old Lichfield Road (left)	0	0	0	0	0	0
Old Lichfield Road (right)	7	0.02	0	7	0.02	0
A51 Lichfield Road (north) (ahead + right)	0	0	0	0	0	0
A51 Lichfield Road (north) (ahead)	577	-	-	609	-	-
A51 Lichfield Road (south) (left)	8	-	-	8	-	-
A51 Lichfield Road (south) (ahead)	568	-	-	599	-	-
	2018 PM			**2023 PM**		
Old Lichfield Road (left)	2	0	0	2	0	0
Old Lichfield Road (right)	3	0.01	0	3	0.01	0
A51 Lichfield Road (north) (ahead + right)	0	0	0	0	0	0
A51 Lichfield Road (north) (ahead)	587	-	-	620	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
A51 Lichfield Road (south) (left)	4	-	-	4	-	-
A51 Lichfield Road (south) (ahead)	658	-	-	695	-	-

3.4.44 The results show that this junction operates within capacity in the 2023 baseline in the AM and PM peak periods.

A51 Butterhill Bank/A51 Lichfield Road/Old Lichfield Road (north)

3.4.45 The future baseline performance of this junction is shown in Table 212.8. As the junction is not affected by the operation of the AP2 revised scheme, future baseline results are presented for 2023 only.

Table 212.8: Future year baseline performance at A51 Butterhill Bank/A51 Lichfield Road/Old Lichfield Road (north) junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2018 AM			**2023 AM**		
Old Lichfield Road (left)	3	0.01	0	3	0.01	0
Old Lichfield Road (right)	4	0.01	0	4	0.01	0
A51 Butterhill Bank (north) (ahead + right)	5	0.01	0	5	0.01	0
A51 Butterhill Bank (north) (ahead)	578	-	-	610	-	-
A51 Lichfield Road (south) (left)	2	-	-	2	-	-
A51 Lichfield Road (south) (ahead)	564	-	-	595	-	-
	2018 PM			**2023 PM**		
Old Lichfield Road (left)	5	0.01	0	5	0.01	0
Old Lichfield Road (right)	2	0.01	0	2	0.01	0
A51 Butterhill Bank (north) (ahead + right)	6	0.01	0	6	0.01	0
A51 Butterhill Bank (north) (ahead)	587	-	-	620	-	-
A51 Lichfield Road (south) (left)	0	-	-	0	-	-
A51 Lichfield Road (south) (ahead)	660	-	-	697	-	-

3.4.46 The results show that this junction operates within capacity in the 2023 baseline in the AM and PM peak periods.

A34 Stone Road/Yarlet School

3.4.47 The future baseline performance of this junction is shown in Table 212.9. As the junction is affected by the construction and the operation of the AP2 revised scheme,

future baseline results are presented for 2023, 2027 and 2041. As discussed in Section 3.2, the school PM peak period of 15:00 to 16:00 has been assessed to consider the peak demand at the junction.

Table 212.9: Future year baseline performance at A34 Stone Road/Yarlet/A51 Lichfield Road/B5066 Sandon Road junction

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
	2018 AM			**2023 AM**			**2027 AM**			**2041 AM**		
Yarlet School (left)	93	0.41	1	99	0.46	1	102	0.48	1	111	0.56	1
A34 Stone Road (south) (ahead)	737	-	-	800	-	-	828	-	-	902	-	-
A34 Stone Road (north) (left)	109	-	-	116	-	-	120	-	-	131	-	-
A34 Stone Road (north) (ahead)	1242	-	-	1348	-	-	1395	-	-	1519	-	-
	2018 PM			**2023 PM**			**2027 PM**			**2041 PM**		
Yarlet School (left)	38	0.13	0	40	0.14	0	42	0.15	0	46	0.17	0
A34 Stone Road (south) (ahead)	912	-	-	990	-	-	1023	-	-	1129	-	-
A34 Stone Road (north) (left)	37	-	-	39	-	-	40	-	-	44	-	-
A34 Stone Road (north) (ahead)	737	-	-	800	-	-	827	-	-	913	-	-

3.4.48 The results show that the junction operates within capacity in the 2023, 2027 and 2041 baseline in the AM and PM peak periods.

Accidents and safety

3.4.49 Accidents and safety are reported in Section 7.2 of the main TA. This section of the main TA is unchanged.

Parking and loading

3.4.50 Parking and safety are reported in Section 7.2 of the main TA. This section of the main TA is unchanged.

Public transport

Rail

3.4.51 Rail is reported in Section 8.2 of the main TA. This section of the main TA is unchanged.

Local bus services

3.4.52 Local buses are reported in Section 8.2 of the main TA. This section of the main TA is unchanged.

Public transport interchanges

3.4.53 Public transport interchanges are reported in Section 8.2 of the main TA. This section of the main TA is unchanged.

Pedestrians, cyclists and equestrians

3.4.54 Pedestrians, cyclists and equestrians are reported in Section 8.2 of the main TA. This section of the main TA is unchanged.

Waterways and Canals

3.4.55 Waterways and canals are reported in Section 8.2 of the main TA. This section of the main TA is unchanged.

3.5 CA2 AP2 revised scheme construction description

3.5.1 A number of changes to the original scheme reported in Section 3.1 of this report mean that Section 8.3 of the main TA and Section 3.5 of the SES1 and AP1 ES TA Addendum are replaced by Section 3.5 in this document unless otherwise specified.

3.5.2 This section provides an overview of the construction traffic and transport impacts for the section of the AP2 revised scheme that will pass through the Colwich to Yarlet area.

3.5.3 The construction period for the whole route is programmed for 2020 to 2027, although activity in 2027 is limited to testing and commissioning. Construction activities have been assessed against 2023 baseline traffic flows, irrespective of when they occur during the construction period. The year 2023 has been adopted as a common base year and the impact of individual or overlapping activities are considered against this single year. The year 2023 also broadly represents the likely typical peak periods during construction of the AP2 revised scheme and therefore it is considered to be reasonably representative.

Construction activities

3.5.4 Construction activities are reported in Section 8.3 of the main TA. This section of the main TA is unchanged.

Compounds and construction sites

3.5.5 Details of the construction works and the main construction works and the time periods when each compound is operational are summarised in the indicative construction programme found in Volume 2, Colwich to Yarlet community area (CA Report 2), Section 2.3.

3.5.6 The location of the construction compounds and the associated access routes are shown in the SES2 and AP2 ES Volume 5 Map Books, Map Series TR-08 that reflect the transport activity at each site during the busy period as summarised in Table 214.

3.5.7 Table 213 in the main TA summarises the anticipated average and peak workforce to be required at each construction compound for the original scheme. Table 213 in the Main TA is replaced by Table 213 below for the AP2 revised scheme, which includes the anticipated average and peak workforce at each of the civils, utility and rail systems compounds. Generally, the utility compound activities will occur in advance

of the main civils and the rail systems compound activities will occur following the main civils activities.

Table 213: Assumed workforce at compounds

Compound type	Location	Total Number of Workers		Number of Staff
		Average	Peak	
Utility	Trent South utility compound	15	20	3
Main	Trent South Embankment Main Compound	200	300	50
Rail systems		24	40	6
Utility	Main Road utility compound	15	17	3
Satellite	Trent North Embankment satellite compound	20	30	5
Utility	Trent North utility compound	15	20	3
Utility	Hanyards lane utility compound	15	17	3
Utility	Ingestre Park Road utility compound	15	20	3
Satellite	Brancote South Cutting satellite compound	20	30	5
Rail systems		24	40	6
Satellite	Hopton South Cutting satellite compound	28	42	7
Satellite	Hopton North Cutting satellite compound	24	36	6
Utility	Sandon Road utility compound	15	17	3
Utility	Marston Lane utility compound	15	20	3
Satellite	Marston South Embankment satellite compound	16	24	4
Satellite	Marston North Embankment satellite compound	8	12	2
Rail systems		24	40	6
Satellite	Yarlet South Cutting satellite compound	16	24	4
Rails systems	Moreton ATS satellite compound	26	38	4
Rails systems	Mill Lane ATS satellite compound	26	38	4
Rails systems	Sandon Road ATS satellite compound	43	69	10
Rails systems	Yarlet EFATS satellite compound	26	38	4

3.5.8 Table 214 of the main TA summarises the typical vehicle trip generation for construction site compounds for the original scheme. Table 214 in the main TA is replaced by Table 214 below, which summarises the typical vehicle trip generation for construction site compounds for the AP2 revised scheme.

3.5.9 For each compound in Table 214, the peak month of activity is the month within which HGV traffic is at its highest for that compound. The busy period is the period during which HGV traffic serving that compound will be greater than 50% of the HGV traffic in the peak month. The average daily combined two-way vehicle trips shown for the busy period is the lower end of the range. The upper end is the average daily combined two-way vehicle trips for the peak month.

Table 214: Typical vehicle trip generation for construction site compounds in the Fradley to Colton area

Compound type	Location	Access to/from compound to main road network	Indicative start/set up date	Estimated duration of use (years and months)	Estimated duration of busy period (months)	Average daily combined two-way vehicle trips during busy period and within peak month of activity	
						Cars/LGV	HGV
Satellite	Moreton auto-transformer station satellite compound	Bishton Lane and on to the A51 Wolseley Bridge	December 2024	One year and three months	7	32-44	up to 10
Satellite	Trent South utility compound	A51 Lichfield Road	March 2021	One year and nine months	1	23-30	93-93
Main	Trent South embankment main compound	A51 Lichfield Road, approximately 400m from where the A51 Lichfield Road crosses the HS2 route	Civil engineering – July 2020	Five years	14	400-550	122-160
			Site reinstatement – July 2026	Six months	3		102-135
			Rail systems – March 2025	nine months	4	37-51	158-160
Transfer node	Transfer node associated with Trent South embankment main compound	A51 Lichfield Road	October 2021	Three years and six months	11	N/A	513-787
Satellite	Main Road utility compound	A51 Lichfield Road	September 2021	Six months	3	23-23	15-23
Satellite	Trent North embankment satellite compound (includes Mill Lane ATS)	Ingestre Park Road to Great Haywood Road Tixall Road, Blackheath Lane and on to the A518 Weston Road	Civil engineering – January 2021	Four years and six months	1	40-55	104-104
			Site reinstatement – January 2026	Three months	1		54-54
			Rail systems – December 2024	Auto transformer station (ATS) – One year and three months	7	32-44	up to 10

Table 214: Typical vehicle trip generation for construction site compounds in the Fradley to Colton area

Compound type	Location	Access to/from compound to main road network	Indicative start/set up date	Estimated duration of use (years and months)	Estimated duration of busy period (months)	Average daily combined two-way vehicle trips during busy period and within peak month of activity	
						Cars/LGV	HGV
Satellite	Trent North utility compound	Ingestre Park Road to Great Haywood Road, Tixall Road, Blackheath Lane and on to the A518 Weston Road	March 2021	Nine months	1	23-30	78-78
Satellite	Hanyards Lane utility compound	Ingestre Park Road to Great Haywood Road, Tixall Road, Blackheath Lane and on to the A518 Weston Road	September 2021	Six months	3	23-26	23-28
Satellite	Ingestre Park Road utility compound	Ingestre Park Road to Great Haywood Road, Tixall Road, Blackheath Lane and on to the A518 Weston Road	March 2022	Six months	1	23-30	36-36
Satellite	Brancote South cutting satellite compound	Hanyards Lane to Tixall Road, Blackheath Lane and on to the A518 Weston Road for site set-up and servicing, followed by site haul route to the A518 Weston Road	Civil engineering – January 2021	Four years and six months	16	40-55	29-40
			Site reinstatement – January 2026	Three months	3		30-35
			Rail systems – March 2025	Nine months	7	37-51	158-160
Satellite	Hopton South cutting satellite compound	A518 Weston Road	Civil engineering – January 2021	Four years and three months	2	56-77	78-112
			Site reinstatement – February 2026	Six months	3		51-59

Table 214: Typical vehicle trip generation for construction site compounds in the Fradley to Colton area

Compound type	Location	Access to/from compound to main road network	Indicative start/set up date	Estimated duration of use (years and months)	Estimated duration of busy period (months)	Average daily combined two-way vehicle trips during busy period and within peak month of activity	
						Cars/LGV	HGV
Transfer node	Transfer node associated with Hopton South cutting satellite compound	A518 Weston Road	October 2021	Three years and six months	9	N/A	420-497
Satellite	Hopton North cutting satellite compound	B5066 Sandon Road and on to A513 Beaconside	January 2021	Civil engineering – Four years and three months	13	48-66	41-66
			May 2026	Site clearance – Three months	2		57-57
Satellite	Sandon Road auto-transformer station satellite compound	Permanent maintenance access to B5066 Sandon Road and on to A513 Beaconside	December 2024	One year and three months	4	43-86	160-162
Satellite	Sandon Road utility compound	B5066 Sandon Road and on to A513 Beaconside	September 2021	Six months	1	23-26	21-21
Satellite	Marston Lane utility compound	Site haul route to A34 Stone Road	March 2021	Six months	1	23-30	68-68
Satellite	Marston South embankment satellite compound	Marston Lane to A513 Beaconside for site set up and servicing, followed by site haul route to A34 Stone Road	Civil engineering – January 2021	Four years and three months	6	32-44	29-58
			Site reinstatement – June 2026	Three months	1		45-45
Satellite	Marston North embankment satellite compound	Site haul route to A34 Stone Road	Civil engineering – January 2021	Four years and three months	3	16-22	43-86

Table 214: Typical vehicle trip generation for construction site compounds in the Fradley to Colton area

Compound type	Location	Access to/from compound to main road network	Indicative start/set up date	Estimated duration of use (years and months)	Estimated duration of busy period (months)	Average daily combined two-way vehicle trips during busy period and within peak month of activity	
						Cars/LGV	HGV
			Site reinstatement – July 2026	Three months	1		34-34
			Rail systems – March 2025	Nine months	4	37-51	158-160
Satellite	Yarlet South cutting satellite compound	A34 Stone Road	Civil engineering – January 2021	Four years	6	32-44	68-78
			Site reinstatement – August 2026	Three months	2		54-64
Transfer node	Transfer node associated with Yarlet South cutting satellite compound (south)	A34 Stone Road (south-bound)	December 2021	Three years and three months	6	N/A	698-920
Transfer node	Transfer node associated with Yarlet South cutting satellite compound (north)	A34 Stone Road (north-bound)	October 2021	Three years and six months	4	N/A	488-607
Satellite	Yarlet express feeder auto-transformer station satellite compound	A34 Stone Road	December 2024	One year and three months	7	32-44	up to 10

Construction HGV routes

3.5.10 Construction vehicle movements required to construct the AP2 revised scheme will include the delivery of plant and materials, movement of excavated materials and site worker trips. Works will include utilities diversions, earthworks, underpass, viaduct, bridge and highway construction.

3.5.11 HGVs have been routed where reasonably practicable along the strategic or primary road network, although some access locations will be via secondary roads. In the Colwich to Yarlet area, primary construction traffic routes from the SRN are as follows: the M6, the A51 Stone Bypass/Lichfield Road/London Road, the A34 Stone Road/Stafford Road, the A513 Beaconside and A518 Weston Road. Where reasonably practicable the use of the local road network has been limited to site set up, access for environmental surveys and on-going servicing (including refuse collection and general deliveries).

3.5.12 In addition, roads may have some low level (less than 10 HGV movements per day) construction traffic associated with highway works including utilities works. However, in Table 215 below, this is traffic assigned to the construction compound from which the works will be managed.

3.5.13 Since the submission of the Bill, discussions with Staffordshire County Council resulted in the agreement that the AP2 revised scheme should include a new construction traffic route on the A51 Stone Bypass/London Road between the A34 Stone Road and the A518 Stafford Road/Weston Road. Use of the A51 between Stone and Weston will reduce construction traffic on the A513 Beaconside.

3.5.14 Table 215 of the main TA summarises the peak daily construction traffic flow, both in HGVs and total vehicles, on each link within the Colwich to Yarlet area (CA2), that is on a construction route for the original scheme. Table 215 in the main TA is replaced by Table 215 below.

3.5.15 The introduction of the construction traffic route along the A51 between A34 Stone Road and Weston as part of the AP2 revised scheme and changes to the movement and use of surplus excavated material will remove or reduce the construction traffic from a number of routes.

3.5.16 Table 215 indicates an increase in construction traffic, when comparing the AP2 revised scheme against the original scheme, at locations such as the A34 Stone Road, the A51 London Road (between A518 Stafford Road and A34 Stone Road) and the B5066 Sandon Road.

3.5.17 Table 215 also indicates a reduction in construction traffic, when compared to the original scheme, at locations such as the A51 Lichfield Road, the A51 London Road between A518 Stafford Road and Church Lane, the A51 Main Road, the A518 Stafford Road/Weston Bank/Weston Road, the A5013 Eccleshall Road, the A513 Beaconside and Great Haywood Road (between Ingestre Park Road and Holiford Road).

3.5.18 Where zero 'all vehicle' and/or 'HGV' construction flows are indicated, these represent links that are no longer a main construction route when considering the AP2 revised scheme. These links may, however, be subject to occasional or infrequent use by AP2 revised scheme construction traffic.

Table 215: CA2 peak daily construction traffic flow

Location	Direction	Peak HGV	Peak all vehicles
M6 (between M6 Junction 14 and Junction 13)	SB	1071	1585
	NB	1071	1585
A34 From M6 Roundabout at Creswell	SB	778	1071
	NB	778	1071
A34 Stone Road (between Redhill Roundabout and Whitgreave Lane)	NB	657	917
	SB	657	917
A34 Stone Road (between Whitgreave Lane and Yarlet Lane)	NB	657	917
	SB	657	917
A34 Stone Road (between Yarlet Lane and Stone Road/north bound)	NB	657	897
	SB	657	897
A51 Lichfield Road (between Lichfield Road and Rugeley Eastern Bypass)	WB	498	1062
	EB	498	1062
A51 Lichfield Road (between Hoo Mill Lane and the AP2 revised scheme)	NB	539	1026
	SB	539	1026
A51 Lichfield Road (between Little Tixall Lane and Tolldish Lane)	NB	498	749
	SB	498	749
A51 Lichfield Road (between Main Road and Little Tixall Lane)	NB	498	749
	SB	498	749
A51 Lichfield Road (between Tolldish Lane and the AP2 revised scheme)	NB	539	1026
	SB	539	1026
A51 London Road (between Hoo Mill Lane and New Road)	NB	397	649
	SB	397	649
A51 London Road (between New Road and Stafford Road)	NB	397	649
	SB	397	649
A51 London Road (between Stafford Road and Uttoxeter Road)	NB	287	579
	SB	287	579
A51 London Road (between Uttoxeter Road and Church Lane)	WB	253	451
	EB	253	451
A51 Stone bypass/Butterhill Bank/Lechfield road (between A34 Stone road and Church lane)	NB	253	443
	SB	253	443

Location	Direction	Peak HGV	Peak all vehicles
A51 Main Road (between Bellamour Lane and Main Road)	WB	498	755
	EB	498	755
A51 Main Road (between Bishton Lane and Lichfield Road)	NB	498	755
	SB	498	755
A518 Stafford Bank (between London Road and Willowmore Banks)	SB	249	311
	NB	249	311
A518 Weston Bank (between Within Lane and Willowmore Banks)	SB	249	311
	NB	249	311
A518 Weston Road (between Blackheath Lane and Hydrant Way)	WB	183	292
	EB	183	292
A518 Weston Road (between the AP2 revised scheme and Blackheath Lane)	SB	177	266
	NB	177	266
A518 Weston Road (between Within Lane and the AP2 revised scheme)	SB	249	311
	NB	249	311
A5013 Eccleshall Road (between Whitgreave Lane and M6 Junction 14)	NB	0	73
	SB	0	73
A513 Beaconside (between Dyson Way and Sandon Road)	NB	183	254
	SB	183	254
A513 Beaconside (between Marston Lane and Redhill Roundabout)	WB	201	394
	EB	201	394
A513 Beaconside (between Sandon Road and Marston Lane)	WB	201	288
	EB	201	288
A513 Beaconside (between Sandon Road and Sandon Road/south-bound)	NB	183	255
	SB	183	255
A513 Beaconside (between Weston Road and Dyson Way)	NB	183	255
	SB	183	255
A513 Lichfield Road (between Tixall Road and Lichfield Road/eastern Roundabout)	WB	0	25
	EB	0	25
B5066 Sandon Bank (between Lichfield Road and Salt Bank)	NB	0	4
	SB	0	4
B5066 Sandon Road (between Beaconside and Hopton Lane)	NB	81	88

Location	Direction	Peak HGV	Peak all vehicles
	SB	81	88
B5066 Sandon Road (between Hopton Lane and the AP2 revised scheme)	NB	81	88
	SB	81	88
B5066 Sandon Road (between the AP2 revised scheme and Within Lane)	NB	81	88
	SB	81	88
B5066 Sandon Road (between Salt Bank and Within Lane)	NB	0	4
	SB	0	4
Great Haywood Road (between Ingestre Park Road and Holdiford Road)	WB	52	74
	EB	52	74
Mill Lane (between Hoo Mill Lane and Mill Lane/west-bound of Main Road)	NB	0	21
	SB	0	21
Mill Lane (between Mill Lane/west-bound of Main Road and Main Road)	WB	0	21
	EB	0	21
Tixall Road (between Holdiford Road and Hanyards Lane)	EB	52	76
	WB	52	76
Whitgreave Lane (between Stone Road and Green Lane)	NB	0	7
	SB	0	7
Blackhealth Lane (north of Tixall Road)	SB	53	80
	NB	53	80
Blackheath Lane (south of Weston Road)	SB	53	80
	NB	53	80
Main Road (between Lichfield Road and Mill Lane)	SB	0	0
	NB	0	0
Main Road (between Lichfield Road and Meadow Lane)	NB	0	0
	SB	0	0
Main Road (between Meadow Lane and A51 Lichfield Road)	NB	0	0
	SB	0	0
Yarlet Lane (close to A34 Stone Road)	SEB	0	0
	NWB	0	0
Yarlet Lane (close to Marston Lane)	SEB	0	0
	NWB	0	0

Location	Direction	Peak HGV	Peak all vehicles
Salt Road (between B5066 Sandon Road and A518 Weston Bank)	EB	0	0
	WB	0	0
Hopton Lane (between Wilmore Hill Lane and AP2 revised scheme)	WB	0	0
	EB	0	0
Hopton Lane (between Sandon Road and AP2 revised scheme)	WB	0	0
	EB	0	0
Hanyards Lane (east of Tixall Road)	NB	18	48
	SB	18	48
Ingestre Park Road (between Hoo Mill Lane (private access road) and Trent Walk)	NB	52	91
	SB	52	91
Marston Lane (between Yarlet Lane and A513 Beaconside)	SB	13	31
	NB	13	31
Marston Lane (east of between Yarlet Lane)	EB	13	31
	WB	13	31
Within Lane (between B5066 Sandon Road and Wilmore Hill Lane)	EB	0	0
	WB	0	0
Tolldish Lane (east of A51 Lichfield Road)	EB	0	0
	WB	0	0
Hoo Mill Lane (private access road) (between Ingestre Park Road and Hoo Mill Lane/east-bound)	EB	0	0
	WB	0	0
Hoo Mill Lane (private road) (between Lichfield Road and Hoo Mill Lane/east-bound)	EB	0	0
	WB	0	0

Traffic management, road closures and diversions

3.5.19 The approach to traffic management, road closures and diversions are reported in Section 8.3 of the main TA. This section of the main TA is unchanged.

PRoW closures and diversions

3.5.20 The approach to PRoW closures and diversions are reported in Section 8.3 of the main TA. This section of the main TA is unchanged.

3.6 CA2 AP2 revised scheme assessment of construction impacts

3.6.1 A number of changes to the original scheme reported in Section 3.1 of this report mean that Section 8.4 of the main TA and Section 3.6 of the SES1 and AP1 ES TA

Addendum are generally replaced by Section 3.6 in this document, unless stated otherwise.

Key construction transport issues

3.6.2 The temporary traffic and transport impacts in this area will include:

- road closures and associated diversions;
- diversions and alternative routes for PRoW; and
- construction vehicle movements to and from the various worksites.

3.6.3 The construction assessment has also considered any impacts in the Colwich to Yarlet area that arise from construction of the AP2 revised scheme in the adjoining community areas.

3.6.4 There will be temporary alternative routes for six roads and 20 PRoW, which includes the A34 Stone Road that will be temporarily diverted.

3.6.5 The AP2 revised scheme includes greater usage of haul roads by construction traffic which generally results in reduced usage on the local road network. Local placement, greater utilisation of borrow pit material as well as refinements to the construction process and programme will result in further reductions to traffic on the local road network.

Highway network

Highway closures and diversions

3.6.6 In order to facilitate the realignment of existing major utilities and for construction of the A34 Stone Road overbridge, the A34 Stone Road will be diverted temporarily off-line and a speed restriction of 40mph applied through this section with access to existing properties maintained. This temporary diversion is expected to be required for 12 months and will maintain dual-carriageway capacity on the A34 Stone Road. The A34 Stone Road overbridge diversion will include the upgraded access junction to Yarlet School. The temporary diversion will not have a substantial impact on traffic flows and delays for vehicle occupants.

3.6.7 The A34 Stone Road overbridge diversion will require the closure of the central reserve on the A34 and the removal of the right turn movements at the A34 Stone Road/Yarlet Lane junction for a period of 12 months. A temporary diversion is required during this time via the A34 Stone Road and A34 Stone Road diversion and the junctions at A51 Stone Bypass and A513 Beaconside. On completion, the A34 Stone Road will be reinstated on its existing alignment over the A34 Stone Road overbridge.

3.6.8 In order to undertake the Trent South embankment works, Tolldish Lane will be temporarily diverted to the north of the transfer node associated with the Trent South Embankment main compound for a period of approximately three years. Tolldish Lane will then be diverted to its new permanent alignment on the Tolldish Lane diversion that runs parallel to the Trent South embankment before forming a junction with the A51 Lichfield Road. The temporary diversion will not have a substantial impact on traffic flows and delays for vehicle occupants.

3.6.9 The permanent upgrade of the A34 Stone Road/Yarlet School access will include temporary construction works that will be undertaken as part of the overall temporary works on the A34 Stone Road.

3.6.10 There are a number of minor utility diversions associated with temporary utility compounds in the Colwich to Yarlet area. In the AP2 revised scheme, these include crossings of Tolldish Lane and Hoo Mill Lane. However, it is expected that these works would be undertaken with local traffic management with a short duration and will not result in a substantial impact on the users of Tolldish Lane or Hoo Mill Lane.

3.6.11 The AP2 revised scheme includes permanent and temporary junction upgrades at the A513 Beaconside/A518/Weston Road/Hydrant Way, A513 Beaconside/Marston Lane and the B513 Beaconside/B5066 Sandon Road junctions. The temporary construction works at the junctions are expected to take three months to implement under associated traffic management measures that are likely to result in a temporary reduction in capacity and increased delays. HS2 Ltd will work with the local highway authorities to ensure that any traffic management works will be well planned and communicated and will not have a substantial impact on traffic flows and delays for vehicles.

3.6.12 Temporary road or lane closures and associated diversions will be required in a number of locations for the AP2 revised scheme in addition to the A34 Stone Road, A51 Lichfield Road, Mill Lane, Ingestre Park Road, Great Haywood Road, A518 Weston Road, Hopton Lane and B5066 Sandon Road reported in the main TA, including:

- A513 Beaconside;
- Marston Lane;
- Bishton Lane; and
- Hoo Mill Lane.

3.6.13 These may involve lane closures and partial lane closures under traffic control for the tie in of the new alignments, intermittent lane restrictions and temporary road closures. Closures and diversions will be restricted to short-term overnight and/or weekend closures, where reasonably practicable. Therefore, the impact of these off-peak closures on traffic flows and consequent delays to vehicles as a result of congestion is not likely to be substantial.

PRoW closures and diversions

3.6.14 PRoW closures and diversions are reported in Section 8.4 of the main TA.

3.6.15 Table 216 in the main TA summarises the temporary PRoW diversions and realignments required to accommodate the construction of the original scheme. Table 216.1 summarises changes to the temporary amendments to the PRoWs to support the construction of the AP2 revised scheme and supersede the associated data in Table 216 of the main TA. Those not listed in Table 216.1 remain unchanged to those identified by Table 216 of the main TA.

Table 216.1: CA2 temporary amended PRoW diversions

PRoW name	Description	Change in length (compared to baseline)
Colwich Bridleway 58	Temporary diversion along with Footpath 54, moved east of the existing route for construction of overbridge and Bridleway. Diversion on to new overbridge once complete.	Temporary diversion 60m longer; sections diverted are all on Footpath 54

Strategic and local road network traffic flows

3.6.16 During the construction period, there will be a number of highway links that will be affected by the construction of the AP2 revised scheme. An assessment of the impact of construction related vehicle movements and temporary diversions has been undertaken and is detailed below. This assessment considers the peak month of activity in each particular location. However, the flows outlined in the following sections will not necessarily occur concurrently as impacts on different parts of the network will occur at different times.

3.6.17 Table 217 and 218 of the main TA summarise the 2023 traffic flows on highway links affected by construction traffic associated with the original scheme for the AM and PM peak hour respectively.

3.6.18 Tables 217 and 218 in the main TA are replaced by Tables 217 and Table 218 below, which set out the 2023 traffic flows on highway links affected by AP2 revised scheme construction traffic for the AM and PM peak hour respectively. For completeness, all links identified in the main TA are included, even where they are no longer proposed as construction routes.

3.6.19 To show the impact of the construction of the AP2 revised scheme in these locations, traffic flows on affected links are presented for the 2023 future baseline and the 2023 future baseline with the AP2 revised scheme, alongside the percentage increase from the future baseline.

3.6.20 Where there is a 'zero percentage' change in construction 'Vehicles' and/or 'HGV' traffic in the table, this represents a link that is not identified as a main construction route for the AP2 revised scheme. Such links may, however, be subject to occasional or infrequent use by AP2 revised scheme construction traffic.

3.6.21 Where a link indicates a change annotated by 'N/A', this represents a link with zero HGVs in the baseline. Such links either indicate no change or a small change in the number of HGVs as a result of the AP2 revised scheme. Such changes are not generally substantial.

Table 217: 2023 future baseline and with the AP2 revised scheme construction traffic (vehicles) – AM peak hour (08:00 – 09:00)

Location	Direction	2023 baseline		2023 with HS2		With HS2 % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
M6 (between M6 Junction 14 and Junction 13)	NB	4751	736	4990	843	5.0%	14.5%
	SB	4136	776	4375	883	5.8%	13.8%
A34 From M6 Roundabout at Creswell	SB	843	87	996	165	18.2%	89.6%
	NB	1063	99	1216	177	14.4%	78.3%
A34 Stone Road (between Redhill Roundabout and Whitgreave Lane)	NB	742	58	873	124	17.6%	113.6%
	SB	1282	66	1413	132	10.2%	99.3%
A34 Stone Road (between Whitgreave Lane and Yarlet Lane)	NB	742	58	873	124	17.6%	113.6%
	SB	1282	66	1413	132	10.2%	99.3%
A34 Stone Road (between Yarlet Lane and Stone Road/north bound)	NB	871	58	996	123	14.4%	113.8%
	SB	1365	71	1491	136	9.2%	92.9%
A51 Lichfield Road (between Lichfield Road and Rugeley Eastern Bypass)	WB	1033	35	1227	85	18.8%	141.7%
	EB	1042	45	1237	95	18.6%	110.8%
A51 Lichfield Road (between Hoo Mill Lane and the AP2 revised scheme)	NB	751	36	926	90	23.4%	148.7%
	SB	722	46	898	100	24.3%	117.4%
A51 Lichfield Road (between Little Tixall Lane and Tolldish Lane)	NB	739	33	852	83	15.2%	149.1%
	SB	680	44	792	93	16.6%	114.2%
A51 Lichfield Road (between Main Road and Little Tixall Lane)	NB	759	41	872	91	14.8%	120.9%
	SB	683	45	795	95	16.5%	111.3%

Location	Direction	2023 baseline		2023 with HS2		With HS2 % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
A51 Lichfield Road (between Tolldish Lane and the AP2 revised scheme)	NB	751	36	926	90	23.4%	148.7%
	SB	722	46	898	100	24.3%	117.4%
A51 London Road (between Hoo Mill Lane and New Road)	NB	594	41	697	81	17.3%	97.2%
	SB	573	48	676	87	17.9%	83.6%
A51 London Road (between New Road and Stafford Road)	NB	807	58	910	98	12.7%	67.9%
	SB	681	49	784	89	15.1%	80.4%
A51 London Road (between Stafford Road and Uttoxeter Road)	NB	934	68	1021	96	9.4%	42.3%
	SB	789	57	877	86	11.1%	50.1%
A51 London Road (between Uttoxeter Road and Church Lane)	WB	677	48	751	74	11.1%	52.2%
	EB	712	52	787	77	10.5%	48.9%
A51 Stone bypass/Butterhill Bank/Lechfield road (between A34 Stone road and Church lane)	NB	596	55	668	80	12.2%	46.3%
	SB	632	56	705	81	11.5%	45.4%
A51 Main Road (between Bellamour Lane and Main Road)	WB	698	16	814	66	16.6%	308.2%
	EB	704	18	819	68	16.4%	272.5%
A51 Main Road (between Bishton Lane and Lichfield Road)	NB	687	40	802	90	16.8%	124.1%
	SB	869	51	984	101	13.3%	98.2%
A518 Stafford Bank (between London Road and Willowmore Banks)	SB	836	33	876	58	4.8%	74.4%
	NB	434	41	474	66	9.2%	60.7%
A518 Weston Bank (between Within Lane and Willowmore Banks)	SB	836	33	876	58	4.8%	74.4%

Location	Direction	2023 baseline		2023 with HS2		With HS2 % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
	NB	434	41	474	66	9.2%	60.7%
A518 Weston Road (between Blackheath Lane and Hydrant Way)	WB	1179	30	1226	49	3.9%	60.8%
	EB	760	18	806	36	6.1%	101.5%
A518 Weston Road (between the AP2 revised scheme and Blackheath Lane)	SB	865	46	904	63	4.6%	38.9%
	NB	514	47	553	64	7.7%	38.1%
A518 Weston Road (between Within Lane and the AP2 revised scheme)	SB	871	34	911	59	4.6%	72.3%
	NB	382	38	422	63	10.4%	65.4%
A5013 Eccleshall Road (between Whitgreave Lane and M6 Junction 14)	NB	481	20	499	20	3.6%	0.0%
	SB	550	19	567	19	3.2%	0.0%
A513 Beaconside (between Dyson Way and Sandon Road)	NB	913	72	952	91	4.3%	25.4%
	SB	739	44	778	62	5.3%	41.7%
A513 Beaconside (between Marston Lane and Redhill Roundabout)	WB	788	53	863	73	9.5%	37.8%
	EB	1078	55	1153	75	6.9%	36.9%
A513 Beaconside (between Sandon Road and Marston Lane)	WB	1011	69	1056	89	4.4%	29.0%
	EB	869	40	914	60	5.1%	50.9%
A513 Beaconside (between Sandon Road and Sandon Road/south-bound)	NB	1085	53	1124	71	3.6%	34.9%
	SB	724	35	763	53	5.4%	52.4%
A513 Beaconside (between Weston Road and Dyson Way)	NB	1247	72	1286	90	3.1%	25.4%
	SB	677	63	716	81	5.8%	29.1%

Location	Direction	2023 baseline		2023 with HS2		With HS2 % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
A513 Lichfield Road (between Tixall Road and Lichfield Road/eastern Roundabout)	WB	395	2	401	2	1.6%	0.0%
	EB	521	5	527	5	1.2%	0.0%
B5066 Sandon Bank (between Lichfield Road and Salt Bank)	NB	202	17	203	17	0.5%	0.0%
	SB	562	18	563	18	0.2%	0.0%
B5066 Sandon Road (between Beaconside and Hopton Lane)	NB	235	14	247	22	4.9%	59.8%
	SB	531	14	543	22	2.2%	57.2%
B5066 Sandon Road (between Hopton Lane and the AP2 revised scheme)	NB	220	13	231	21	5.3%	63.7%
	SB	510	13	522	21	2.3%	61.2%
B5066 Sandon Road (between the AP2 revised scheme and Within Lane)	NB	220	13	231	21	5.3%	63.7%
	SB	510	13	522	21	2.3%	61.2%
B5066 Sandon Road (between Salt Bank and Within Lane)	NB	202	17	203	17	0.5%	0.0%
	SB	562	18	563	18	0.2%	0.0%
Great Haywood Road (between Ingestre Park Road and Holdiford Road)	WB	260	3	270	8	3.5%	179.1%
	EB	108	3	117	9	8.5%	156.7%
Mill Lane (between Hoo Mill Lane and Mill Lane/west-bound of Main Road)	NB	274	2	281	2	2.9%	0.0%
	SB	124	3	132	3	6.3%	0.0%
Mill Lane (between Mill Lane/west-bound of Main Road and Main Road)	WB	253	0	261	0	3.1%	0.0%
	EB	156	0	164	0	5.0%	0.0%
Tixall Road (between Holdiford Road and Hanyards Lane)	EB	163	30	172	35	5.8%	17.6%

Location	Direction	2023 baseline		2023 with HS2		With HS2 % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
	WB	588	29	598	34	1.6%	18.1%
Whitgreave Lane (between Stone Road and Green Lane)	NB	28	1	31	1	13.6%	0.0%
	SB	62	2	66	2	6.0%	0.0%
Blackhealth Lane (north of Tixall Road)	SB	371	7	385	12	3.7%	79.5%
	NB	780	5	794	10	1.8%	108.9%
Blackheath Lane (south of Weston Road)	SB	358	6	371	11	3.8%	94.5%
	NB	786	3	800	9	1.7%	161.6%
Main Road (between Lichfield Road and Mill Lane)	SB	200	3	200	3	0.0%	0.0%
	NB	221	6	221	6	0.0%	0.0%
Main Road (between Lichfield Road and Meadow Lane)	NB	127	1	127	1	0.0%	0.0%
	SB	112	1	112	1	0.0%	0.0%
Main Road (between Meadow Lane and A51 Lichfield Road)	NB	127	1	127	1	0.0%	0.0%
	SB	112	1	112	1	0.0%	0.0%
Yarlet Lane (close to A34 Stone Road)	SEB	24	1	24	1	0.0%	0.0%
	NWB	7	0	7	0	0.0%	0.0%
Yarlet Lane (close to Marston Lane)	SEB	20	1	20	1	0.0%	0.0%
	NWB	3	0	3	0	0.0%	0.0%
Salt Road (between B5066 Sandon Road and A518 Weston Bank)	EB	31	0	31	0	0.0%	N/A
	WB	38	1	38	1	0.0%	0.0%

Location	Direction	2023 baseline		2023 with HS2		With HS2 % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
Hopton Lane (between Wilmore Hill Lane and AP2 revised scheme)	WB	20	0	20	0	0.0%	N/A
	EB	9	0	9	0	0.0%	0.0%
Hopton Lane (between Sandon Road and AP2 revised scheme)	WB	27	1	27	1	0.0%	0.0%
	EB	16	1	16	1	0.0%	0.0%
Hanyards Lane (east of Tixall Road)	NB	4	0	16	2	295.8%	646.4%
	SB	4	1	16	3	268.3%	198.9%
Ingestre Park Road (between Hoo Mill Lane (private access road) and Trent Walk)	NB	40	1	55	7	38.5%	358.1%
	SB	44	2	60	7	35.0%	313.3%
Marston Lane (between Yarlet Lane and A513 Beaconside)	SB	34	2	40	3	17.6%	67.3%
	NB	7	0	13	2	84.4%	259.7%
Marston Lane (east of between Yarlet Lane)	EB	5	1	11	2	108.7%	138.1%
	WB	14	1	20	2	41.6%	128.2%
Within Lane (between B5066 Sandon Road and Wilmore Hill Lane)	EB	174	5	174	5	0.0%	0.0%
	WB	127	8	127	8	0.0%	0.0%
Tolldish Lane (east of A51 Lichfield Road)	EB	7	0	7	0	0.0%	0.0%
	WB	7	0	7	0	0.0%	0.0%
Hoo Mill Lane (private access road) (between Ingestre Park Road and Hoo Mill Lane/east-bound)	EB	1	0	1	0	0.0%	0.0%
	WB	1	1	1	1	0.0%	0.0%
Hoo Mill Lane (private road) (between Lichfield Road and Hoo Mill	EB	1	0	1	0	0.0%	0.0%

Location	Direction	2023 baseline		2023 with HS2		With HS2 % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
Lane/east-bound)	WB	1	1	1	1	0.0%	0.0%

Table 218: 2023 future baseline and with the AP2 revised scheme construction traffic (vehicles) – PM peak hour (17:00 – 18:00)

Location	Direction	2023 baseline		2023 with HS2		With HS2 % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
M6 (between M6 Junction 14 and Junction 13)	SB	4631	577	4863	685	5.0%	18.5%
	NB	4767	750	5000	857	4.9%	14.3%
A34 From M6 Roundabout at Creswell	SB	875	42	1023	120	17.0%	183.6%
	NB	819	56	968	133	18.2%	140.2%
A34 Stone Road (between Redhill Roundabout and Whitgreave Lane)	NB	1110	26	1241	92	11.8%	253.7%
	SB	799	28	930	94	16.4%	233.9%
A34 Stone Road (between Whitgreave Lane and Yarlet Lane)	NB	1110	26	1241	92	11.8%	253.7%
	SB	799	28	930	94	16.4%	233.9%
A34 Stone Road (between Yarlet Lane and Stone Road/north bound)	NB	1174	27	1300	93	10.7%	242.7%
	SB	876	27	1002	93	14.4%	242.7%
A51 Lichfield Road (between Lichfield Road and Rugeley Eastern Bypass)	WB	1015	20	1203	70	18.5%	243.9%
	EB	1147	30	1334	80	16.4%	165.5%
A51 Lichfield Road (between Hoo Mill Lane and the AP2 revised scheme)	NB	640	17	815	71	27.4%	319.3%
	SB	898	28	1073	82	19.5%	191.1%
A51 Lichfield Road (between Little Tixall Lane and Tolldish Lane)	NB	608	22	720	72	18.5%	224.0%

Location	Direction	2023 baseline		2023 with HS2		With HS2 % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
	SB	807	24	919	74	13.9%	203.8%
A51 Lichfield Road (between Main Road and Little Tixall Lane)	NB	617	22	729	72	18.2%	228.3%
	SB	832	27	945	77	13.5%	182.6%
A51 Lichfield Road (between Tolldish Lane and the AP2 revised scheme)	NB	640	17	815	71	27.4%	319.3%
	SB	898	28	1073	82	19.5%	191.1%
A51 London Road (between Hoo Mill Lane and New Road)	NB	525	24	628	63	19.5%	168.5%
	SB	651	40	754	80	15.8%	99.5%
A51 London Road (between New Road and Stafford Road)	NB	765	30	867	70	13.4%	132.8%
	SB	749	29	852	69	13.7%	135.5%
A51 London Road (between Stafford Road and Uttoxeter Road)	NB	783	31	899	59	14.8%	93.5%
	SB	958	37	1074	66	12.1%	76.4%
A51 London Road (between Uttoxeter Road and Church Lane)	WB	706	24	781	49	10.6%	106.0%
	EB	649	18	724	43	11.5%	139.1%
A51 Stone bypass/Butterhill Bank/Lichfield Road (between A34 Stone road and Church lane)	NB	735	36	807	61	9.9%	70.7%
	SB	657	25	730	50	11.1%	102.9%
A51 Main Road (between Bellamour Lane and Main Road)	WB	753	13	865	63	14.9%	387.8%
	EB	794	14	907	64	14.2%	357.1%
A51 Main Road (between Bishton Lane and Lichfield Road)	NB	868	24	981	74	13.0%	206.0%
	SB	836	23	949	73	13.5%	213.9%

Location	Direction	2023 baseline		2023 with HS2		With HS2 % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
A518 Stafford Bank (between London Road and Willowmore Banks)	SB	487	14	528	39	8.4%	178.3%
	NB	775	15	816	40	5.3%	165.9%
A518 Weston Bank (between Within Lane and Willowmore Banks)	SB	487	14	528	39	8.4%	178.3%
	NB	775	15	816	40	5.3%	165.9%
A518 Weston Road (between Blackheath Lane and Hydrant Way)	WB	807	14	851	32	5.5%	131.9%
	EB	1107	16	1152	35	4.0%	113.0%
A518 Weston Road (between the AP2 revised scheme and Blackheath Lane)	SB	735	49	775	67	5.5%	36.3%
	NB	727	36	768	53	5.6%	49.7%
A518 Weston Road (between Within Lane and the AP2 revised scheme)	SB	495	14	536	39	8.3%	171.8%
	NB	714	13	755	38	5.8%	195.8%
A5013 Eccleshall Road (between Whitgreave Lane and M6 Junction 14)	NB	605	14	624	14	3.1%	0.0%
	SB	493	6	512	6	3.8%	0.0%
A513 Beaconside (between Dyson Way and Sandon Road)	NB	812	31	845	49	4.1%	59.1%
	SB	657	29	690	48	5.1%	62.4%
A513 Beaconside (between Marston Lane and Redhill Roundabout)	WB	996	30	1058	50	6.3%	66.5%
	EB	719	35	781	55	8.7%	57.6%
A513 Beaconside (between Sandon Road and Marston Lane)	WB	812	26	851	46	4.8%	77.7%
	EB	880	38	919	59	4.4%	52.4%
A513 Beaconside (between Sandon Road and Sandon Road/south-	NB	771	39	804	57	4.3%	47.0%

Location	Direction	2023 baseline		2023 with HS2		With HS2 % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
bound)	SB	1130	57	1164	75	3.0%	32.1%
A513 Beaconside (between Weston Road and Dyson Way)	NB	759	60	792	79	4.4%	30.5%
	SB	806	34	840	53	4.1%	53.3%
A513 Lichfield Road (between Tixall Road and Lichfield Road/eastern Roundabout)	WB	486	2	492	2	1.3%	0.0%
	EB	424	3	431	3	1.5%	0.0%
B5066 Sandon Bank (between Lichfield Road and Salt Bank)	NB	451	7	452	7	0.2%	0.0%
	SB	214	11	215	11	0.4%	0.0%
B5066 Sandon Road (between Beaconside and Hopton Lane)	NB	449	5	461	13	2.6%	165.5%
	SB	192	4	204	12	6.0%	204.8%
B5066 Sandon Road (between Hopton Lane and the AP2 revised scheme)	NB	434	5	445	13	2.7%	172.9%
	SB	187	4	198	12	6.2%	204.8%
B5066 Sandon Road (between the AP2 revised scheme and Within Lane)	NB	434	5	445	13	2.7%	172.9%
	SB	187	4	198	12	6.2%	204.8%
B5066 Sandon Road (between Salt Bank and Within Lane)	NB	451	7	452	7	0.2%	0.0%
	SB	214	11	215	11	0.4%	0.0%
Great Haywood Road (between Ingestre Park Road and Holdiford Road)	WB	130	1	144	6	10.3%	716.6%
	EB	210	1	224	6	6.4%	716.6%
Mill Lane (between Hoo Mill Lane and Mill Lane/west-bound of Main Road)	NB	127	1	129	1	2.0%	0.0%
	SB	212	1	215	1	1.2%	0.0%

Location	Direction	2023 baseline		2023 with HS2		With HS2 % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
Mill Lane (between Mill Lane/west-bound of Main Road and Main Road)	WB	183	1	185	1	1.4%	0.0%
	EB	259	1	261	1	1.0%	0.0%
Tixall Road (between Holdiford Road and Hanyards Lane)	EB	461	25	475	30	3.0%	20.7%
	WB	318	16	332	21	4.3%	33.4%
Whitgreave Lane (between Stone Road and Green Lane)	NB	44	0	44	0	0.0%	N/A
	SB	28	0	28	0	0.0%	0.0%
Blackhealth Lane (north of Tixall Road)	SB	832	4	842	9	1.2%	135.6%
	NB	387	2	398	7	2.6%	313.5%
Blackheath Lane (south of Weston Road)	SB	814	4	824	10	1.2%	125.4%
	NB	504	4	515	10	2.0%	122.4%
Main Road (between Lichfield Road and Mill Lane)	SB	286	1	286	1	0.0%	0.0%
	NB	183	5	183	5	0.0%	0.0%
Main Road (between Lichfield Road and Meadow Lane)	NB	129	0	129	0	0.0%	0.0%
	SB	148	0	148	0	0.0%	0.0%
Main Road (between Meadow Lane and A51 Lichfield Road)	NB	129	0	129	0	0.0%	0.0%
	SB	148	0	148	0	0.0%	0.0%
Yarlet Lane (close to A34 Stone Road)	SEB	6	0	6	0	0.0%	0.0%
	NWB	6	0	6	0	0.0%	0.0%
Yarlet Lane (close to Marston Lane)	SEB	2	0	2	0	0.0%	N/A

Location	Direction	2023 baseline		2023 with HS2		With HS2 % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
	NWB	6	0	6	0	0.0%	0.0%
Salt Road (between B5066 Sandon Road and A518 Weston Bank)	EB	47	0	47	0	0.0%	0.0%
	WB	40	0	40	0	0.0%	0.0%
Hopton Lane (between Wilmore Hill Lane and AP2 revised scheme)	WB	14	0	14	0	0.0%	N/A
	EB	14	0	14	0	0.0%	N/A
Hopton Lane (between Sandon Road and AP2 revised scheme)	WB	9	0	9	0	0.0%	N/A
	EB	20	0	20	0	0.0%	N/A
Hanyards Lane (east of Tixall Road)	NB	3	0	15	2	430.5%	2587.0%
	SB	2	0	13	2	789.3%	2587.0%
Ingestre Park Road (between Hoo Mill Lane (private access road) and Trent Walk)	NB	34	0	49	6	45.4%	1672.1%
	SB	28	0	44	6	54.2%	1672.1%
Marston Lane (between Yarlet Lane and A513 Beaconside)	SB	7	0	13	1	86.2%	1814.3%
	NB	15	0	21	2	38.5%	453.6%
Marston Lane (east of between Yarlet Lane)	EB	7	0	13	1	80.0%	N/A
	WB	5	0	11	1	122.4%	895.8%
Within Lane (between B5066 Sandon Road and Wilmore Hill Lane)	EB	137	6	137	6	0.0%	0.0%
	WB	93	2	93	2	0.0%	0.0%
Tolldish Lane (east of A51 Lichfield Road)	EB	6	0	6	0	0.0%	N/A
	WB	5	0	5	0	0.0%	N/A

Location	Direction	2023 baseline		2023 with HS2		With HS2 % change from 2023 baseline	
		Vehicles	HGV	Vehicles	HGV	Vehicles	HGV
Hoo Mill Lane (private access road) (between Ingestre Park Road and Hoo Mill Lane/east-bound)	EB	1	0	1	0	0.0%	N/A
	WB	1	0	1	0	0.0%	N/A
Hoo Mill Lane (private road) (between Lichfield Road and Hoo Mill Lane/east-bound)	EB	1	0	1	0	0.0%	N/A
	WB	1	0	1	0	0.0%	N/A

Summary of link flows

3.6.22 The AP2 revised scheme includes changes to construction traffic flows as a consequence of new construction traffic routes such as the A51 between A518 Weston and A34 Stone Road and changes to the movement and use of surplus excavated material. This has resulted in reductions in the number of all construction vehicles on routes including the A51, A518 and A513 corridors and on other roads such as Mill lane, Tixall Road and Blackheath Lane.

3.6.23 The results show that in the AM and PM peak periods the strategic and primary roads such as the A34 Stone Road, the A51 Lichfield Road, the A518 Weston Road and the A513 Beaconside generally have a percentage increase of less than 20% in total vehicles (often lower on the A34 and A513). Percentage increases in HGV traffic are generally higher.

3.6.24 Other roads identified as construction routes show a similar pattern, with high percentage increases in HGVs but with generally minor increases in total vehicular flow.

3.6.25 A summary of routes/corridors with percentage increases of over 30% in either total vehicle movements or HGVs is set out below:

- A34 from M6 Roundabout at Creswell between M6 and Redhill Roundabout – (HGVs);
- A34 Stone Road between Redhill Roundabout and A51 Stone Bypass – (HGVs);
- A51 Lichfield Road between Rugeley Eastern Bypass and Tolldish Lane – HGVs);
- A51 London Road between Tolldish Lane and Church Lane – (HGVs);
- A51 Stone Bypass between Church Lane and A34 Stone Road – (HGVs);
- A51 Main Road between Lichfield Road and Main Road (Colwich) – (HGVs);
- A518 Stafford Road and Weston Road between London Road and the AP2 revised scheme – (HGVs);
- A513 Beaconside between Weston Road and Sandon Road – (HGVs);
- B5066 Sandon Road between Beaconside and the AP2 revised scheme – (HGVs);
- Great Haywood Road between Ingestre Park Road and Holdiford Road – (HGVs);
- Blackheath Lane north of Tixall Road to south of Weston Road – (HGVs);
- Hanyards Lane east of Tixall Road – (All Vehicles and HGVs);
- Ingestre Park Road between Hoo Mill Lane (private access road) and Trent Walk – (All Vehicles and HGVs); and
- Marston Lane between Beaconside and Yarlet Lane and between Yarlet Lane and the AP2 revised scheme – (All Vehicles and HGVs).

3.6.26 It should be noted that, unless identified in the next section of this report that considers junction impacts, these increases in traffic will not result in increased congestion or delay.

Junction performance 2023

3.6.27 The following tables and commentary set out the performance at junctions where there is the potential for the AP2 revised scheme to have substantial impacts that are different from the main TA.

3.6.28 The results are presented in the same order as presented in the main TA. Junctions that were not modelled in the main TA are provided at the end of the junction performance section. The results for the AM and PM peak hours are presented and the 2023 future baseline results are included for comparison. The models developed to assess the existing and future baseline have been used, except where otherwise stated.

A51 Lichfield Road/A51 Rugeley Eastern Bypass/A460 Wolseley Bridge Road

3.6.29 Table 219 of the main TA summarises the results of the changes in performance of the junction as a result of the original scheme. Table 219 in the main TA is replaced by Table 219 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme construction traffic.

Table 219: A51 Lichfield Road/A51 Rugeley Eastern Bypass/A460 Wolseley Bridge Road junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	**Flow, PCU/hr**	**RFC**	**Q, PCU**	**Flow, PCU/hr**	**RFC**	**Q, PCU**
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
A51 Lichfield Road (west)	1107	0.57	1	1354	0.70	3
A51 Rugeley Eastern Bypass (east)	600	0.39	1	741	0.50	1
A460 Wolseley Bridge Road	746	0.49	1	853	0.59	2
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
A51 Lichfield Road (west)	1204	0.60	2	1445	0.72	3
A51 Rugeley Eastern Bypass (east)	948	0.67	2	1088	0.81	4
A460 Wolseley Bridge Road	507	0.36	1	608	0.46	1

3.6.30 The conclusions drawn in paragraph 8.4.19 of the main TA are replaced by:

"The results show that the junction operates within capacity in the 2023 baseline and with addition of the AP2 revised scheme construction traffic in the AM peak, with minimal queuing. The A51 Lichfield Road (west) arm shows an increase in RFC from 0.57 to 0.70 with a corresponding increase in queue length from one to three PCUs in the AM peak.

In the PM peak, the junction is operating within capacity in 2023 baseline and approaching capacity with the addition of the AP2 revised scheme construction

traffic. The A51 Rugeley Eastern Bypass (east) arm has an increase in RFC value from 0.67 to 0.81 with a corresponding increase in queue length from two to four PCUs."

A51 Lichfield Road/A513 Lichfield Road

3.6.31 Table 220 of the main TA summarises the results of the changes in performance of the junction as a result of the original scheme. Table 220 in the main TA is replaced by Table 220 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme construction traffic.

Table 220: A51 Lichfield Road/A513 Lichfield Road junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
A51 Lichfield Road (north)	824	0.06	0	990	0.07	0
A51 Lichfield Road (east)	1123	0.49	1	1371	0.60	2
A513 Lichfield Road	414	0.40	1	495	0.53	1
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
A51 Lichfield Road (north)	890	0.05	0	1053	0.06	0
A51 Lichfield Road (east)	1152	0.50	1	1392	0.61	2
A513 Lichfield Road	437	0.45	1	515	0.59	1

3.6.32 The conclusions drawn in paragraph 8.4.21 of the main TA are replaced by:

"The results show that the junction operates within capacity in the 2023 baseline and with the addition of the AP2 revised scheme construction traffic in the AM and PM peak periods, without any substantial increases in queuing or RFC."

A518 Weston Road/Beacon Way/Blackheath Lane

3.6.33 Table 221 of the main TA summarises the results of the changes in performance of the junction as a result of the original scheme. Table 221 in the main TA is replaced by Table 221 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme construction traffic.

Table 221: A518 Weston Road/Beacon Way/Blackheath Lane junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
A518 Weston Road (north)	972	0.80	4	1026	0.85	6
Blackheath Lane	516	0.48	1	524	0.49	1
A518 Weston Road (south)	524	0.36	1	588	0.41	1
Beacon Way	182	0.17	0	182	0.18	0

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
A518 Weston Road (north)	895	0.75	3	952	0.80	4
Blackheath Lane	324	0.27	0	329	0.27	1
A518 Weston Road (south)	701	0.44	1	765	0.47	1
Beacon Way	328	0.33	1	328	0.34	1

3.6.34 The conclusions drawn in paragraphs 8.4.23 and 8.4.24 of the main TA are replaced by:

"The results show that the junction approaches capacity in the 2023 baseline and operates close to capacity with the AP2 revised scheme construction traffic in the AM peak. In the PM peak, the junction approaches capacity in the 2023 baseline and with the AP2 revised scheme construction traffic.

The A518 Weston Road (north) with the addition of the AP2 revised scheme construction traffic has an increase in RFC from 0.80 to 0.85 with corresponding increase in queue length from four to six PCUs in the AM peak and an increase RFC value from 0.75 to 0.80 with a corresponding increase in queue length from three to four PCUs in the PM peak."

A518 Weston Road/A513 Beaconside/Hydrant Way

3.6.35 The AP2 revised scheme includes permanent upgrades to the junction including carriageway widening on the Hydrant Way approach.

3.6.36 Table 222 of the main TA summarises the results of the changes in performance of the junction as a result of the original scheme. Table 222 in the main TA is replaced by Table 222 below, which summarises the results of the changes to the performance of the existing junction as a result of the AP2 revised scheme construction traffic and the performance of the junction with the addition of the AP2 revised scheme junction upgrade.

Table 222: Future year baseline performance at A518 Weston Road/A513 Beaconside/Hydrant Way junction 2023 future baseline and with the AP2 revised scheme (existing junction) and the AP2 revised scheme (revised junction) junction capacity assessment

Approach	Flow, PCU /hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 with AP2 revised scheme (existing junction)**			**2023 with AP2 revised scheme (revised junction)**		
A513 Beaconside	829	0.67	2	887	0.72	3	887	0.74	3
A518 Weston Road (east)	626	0.46	1	690	0.51	1	690	0.51	1
Hydrant Way	1225	1.21	126	1225	1.26	151	1225	0.78	4
A518 Weston Road (west)	876	0.74	3	901	0.77	4	901	0.87	6

Approach	Flow, PCU /hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
17:00 – 18:00	**2023 future baseline**			**2023 with AP2 revised scheme (existing junction)**			**2023 with AP2 revised scheme (revised junction)**		
A513 Beaconside	1106	0.98	20	1158	1.04	40	1158	1.04	40
A518 Weston Road (east)	534	0.52	1	597	0.58	2	597	0.58	2
Hydrant Way	788	0.70	3	788	0.72	3	788	0.46	1
A518 Weston Road (west)	1048	0.81	5	1083	0.86	6	1083	0.86	6

3.6.37 The conclusions drawn in paragraphs 8.4.26 and 8.4.27 of the main TA are replaced by:

"The results show that the existing junction operates above capacity in 2023 baseline and with the addition of the AP2 revised scheme construction traffic in the AM peak and PM peak periods.

With the AP2 revised scheme construction traffic through the existing junction, the Hydrant Way arm has an increase in RFC value from 1.21 to 1.26 with a corresponding increase in queue length from 126 to 151 PCUs in the AM peak. The A513 Beaconside arm has an increase in RFC from 0.98 to 1.04 with a corresponding increase in queue length from 20 to 40 PCUs in the PM peak.

The AP2 revised scheme will reduce the overall volume of queuing traffic at this junction, particularly on Hydrant Way in the AM peak where the RFC value reduces from 1.21 in the future baseline to 0.78 with a corresponding reduction in queue from 126 to four PCUs. In the PM peak on the A513 Beaconside arm, there is a limited increase in queue length but this approach is already at capacity in the future baseline."

A34 from M6 Roundabout at Creswell/Mustang Drive

3.6.38 Table 223 of the main TA summarises the results of the changes in performance of the junction as a result of the original scheme. Table 223 in the main TA is replaced by Table 223 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme construction traffic.

Table 223: Summary of the results of the changes to the performance of the junction as a result of the AP2 revised scheme in 2023

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
A34 from M6 Roundabout at Creswell (west)	1512	0.73	3	1730	0.83	5
Mustang Drive	124	0.11	0	124	0.13	0
A34 from M6 Roundabout at Creswell (east)	1300	0.62	2	1519	0.72	3

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
A34 from M6 Roundabout at Creswell (west)	1263	0.59	2	1477	0.69	3
Mustang Drive	302	0.26	0	302	0.30	1
A34 from M6 Roundabout at Creswell (east)	1263	0.62	2	1478	0.72	3

3.6.39 The conclusions drawn in paragraph 8.4.29 of the main TA are replaced by:

"The results show that the junction is approaching capacity in the 2023 baseline and with the addition of the AP2 revised scheme construction traffic in the AM peak. In the PM peak the junction operates within capacity in the 2023 baseline and approaches capacity with the addition of the AP2 revised scheme construction traffic.

The A34 from M6 Roundabout at Creswell (west) arm RFC value increases from 0.73 to 0.83 with an increase in queue length from three to five PCUs in the AM peak. In the PM peak, the RFC value increases from 0.62 to 0.72 with an increase in queue length from two to three PCUs.

The addition of the AP2 revised scheme construction traffic does not result in any substantial increases in queuing of RFC from the 2023 future baseline."

A51 London Road/Church Lane/A51 Lichfield Road

3.6.40 Table 224 of the main TA summarises the results of the changes in performance of the junction as a result of the original scheme. Table 224 in the main TA is replaced by Table 224 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme construction traffic.

Table 224: A51 London Road/Church Lane/A51 Lichfield Road/Hoo Mill Lane junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
Church Lane (left + right)	202	0.45	1	202	0.50	1
A51 Lichfield Road (south east) (ahead)	504	-	-	628	-	-
A51 Lichfield Road (south east) (right)	168	0.33	1	168	0.35	1
A51 London Road (north-west) (left)	44	-	-	44	-	-
A51 London Road (north-west) (ahead)	504	-	-	629	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
Church Lane (left + right)	286	0.72	2	286	0.83	4

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
A51 Lichfield Road (south east) (ahead)	494	-	-	618	-	-
A51 Lichfield Road (south east) (right)	153	0.32	1	153	0.34	1
A51 London Road (north-west) (left)	9	-	-	9	-	-
A51 London Road (north-west) (ahead)	658	-	-	782	-	-

3.6.41 The conclusions drawn in paragraphs 8.4.31 and 8.4.32 of the main TA are replaced by:

"The results show that the junction operates within capacity in the 2023 baseline and with the addition of the AP2 revised scheme construction traffic in the AM peak, approaching capacity in the PM peak in the 2023 baseline and with the addition of the AP2 revised scheme construction traffic. The Church Lane arm shows a marginal increase in RFC from 0.72 to 0.83 with a corresponding increase in queue length from two to four PCUs in the PM peak."

A513 Beaconside/Dyson Way

3.6.42 Table 225 of the main TA summarises the results of the changes in performance of the junction as a result of the original scheme. Table 225 in the main TA is replaced by Table 225 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme construction traffic.

Table 225: A513 Beaconside/Dyson Way junction 2023 future baseline and with the AP2 revised scheme junction flow increase results

Approach	Flow, PCU/hr	Flow, PCU/hr
08:00 – 09:00	**2023 future baseline**	**2023 future baseline with AP2 revised scheme**
A513 Beaconside Road (north)	1121	1170
Dyson Way	95	95
A513 Beaconside Road (south)	1533	1591
17:00 – 18:00	**2023 future baseline**	**2023 future baseline with AP2 revised scheme**
A513 Beaconside Road (north)	854	906
Dyson Way	479	479
A513 Beaconside Road (south)	1080	1132

3.6.43 The conclusions drawn in paragraph 8.4.34 of the main TA are replaced by:

"The AP2 revised scheme will increase two-way traffic flows on the A513 Beaconside by 4.4% in the AM peak and by 5.4% in the PM peak, compared to an increase of 12% and 15.5% respectively for the original scheme.

The AP2 revised scheme will reduce the construction traffic through the junction by approximately 65% when compared to the original scheme resulting, in part, from the routing of construction traffic onto the AP2 revised scheme construction route on the A51 between the A34 Stone Road and Weston."

A513 Beaconside/B5066 Sandon Road (east)

3.6.44 The AP2 revised scheme includes the temporary upgrade of the junction that will include the signalisation of the junction.

3.6.45 Table 226 of the main TA summarises the results of the changes in performance of the junction as a result of the original scheme. Table 226 in the main TA is replaced by Table 226 below, which summarises the results of the changes to the performance of the existing junction as a result of the AP2 revised scheme construction traffic.

3.6.46 Table 226.1 summarises the performance of the revised junction with the AP2 revised scheme upgrade.

Table 226: A513 Beaconside/B5066 Sandon Road (east) junction 2023 future baseline and with the AP2 revised scheme (existing junction) junction capacity assessment results

Approach	**Flow, PCU/hr**	**RFC**	**Q, PCU**	**Flow, PCU/hr**	**RFC**	**Q, PCU**
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme (existing junction)**		
B5066 Sandon Road (left)	345	2.70	156	345	3.65	188
B5066 Sandon Road (right)	330	2.70	149	330	3.64	179
A513 Beaconside (south) (ahead)	762	-	-	827	-	-
A513 Beaconside (south) (right)	292	0.68	2	292	0.71	3
A513 Beaconside (north) (left)	268	-	-	268	-	-
A513 Beaconside (north) (ahead)	734	-	-	799	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme (existing junction)**		
B5066 Sandon Road (left)	152	21.96	85	152	N/A	109
B5066 Sandon Road (right)	167	21.30	96	167	N/A	119
A513 Beaconside (south) (ahead)	850	-	-	909	-	-
A513 Beaconside (south) (right)	440	1.11	33	440	1.16	40
A513 Beaconside (north) (left)	406	-	-	406	-	-
A513 Beaconside (north) (ahead)	710	-	-	769	-	-

Table 226.1 A513 Beaconside/B5066 Sandon Road (east) AP2 revised scheme (revised junction) junction capacity assessment

Approach	Flow, PCU/hr	DoS	Q, PCU
08:00 – 09:00	**2023 with AP2 revised scheme (revised junction)**		
A513 Beaconside (north)	1067	107%	71
B5066 Sandon Road	675	106%	42
A513 Beaconside (south)	1119	95%	21
17:00 – 18:00	**2023 with AP2 revised scheme (revised junction)**		
A513 Beaconside (north)	1175	95%	34
B5066 Sandon Road	319	96%	13
A513 Beaconside (south)	1349	97%	22

3.6.47 The conclusions drawn in paragraphs 8.4.36 to 8.4.39 of the main TA are replaced by:

"The results show that the junction operates above capacity in the 2023 baseline and with the addition of the AP2 revised scheme construction traffic in the AM and PM peak periods. The AP2 revised scheme construction traffic will increase queuing and delay, specifically on the B5066 Sandon Road arm.

It is understood that a separate highway improvement scheme at this junction, associated with substantial housing growth, is currently being considered by SCC in order to mitigate the impact of other proposed development in Stafford. This is being pursued independently of the AP2 revised scheme."

3.6.48 The AP2 revised scheme with upgrades to the junction will substantially reduce the queuing on Sandon Road compared to the 2023 future baseline. Signalising the junction will also improve the safe passage of vehicles to and from Sandon Road and right turn manoeuvres through the junction.

Tixall Road/Hanyards Lane

3.6.49 Table 227 of the main TA summarises the results of the changes in performance of the junction as a result of the original scheme. Table 227 in the main TA is replaced by Table 227 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme construction traffic.

Table 227: Future year baseline performance at Tixall Road/Hanyards Lane junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment results

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
Hanyards Lane (left + right)	9	0.02	0	14	0.04	0
Tixall Road (west) (ahead + right)	11	0.01	0	12	0.01	0
Tixall Road (west) (ahead)	590	-	-	605	-	-
Tixall Road (east) (left)	3	-	-	8	-	-
Tixall Road (east) (ahead)	220	-	-	235	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
Hanyards Lane (left + right)	0	0	0	13	0.04	0
Tixall Road (west) (ahead + right)	0	0	0	0	0	0
Tixall Road (west) (ahead)	293	-	-	303		
Tixall Road (east) (left)	0	-	-	9		
Tixall Road (east) (ahead)	501	-	-	510		

3.6.50 The conclusions drawn in paragraph 8.4.41 of the main TA are replaced by:

"The results show that the junction operates within capacity in 2023 baseline and with the addition of the AP2 revised scheme construction traffic in the AM and PM peak periods."

A513 Beaconside/Marston Lane

3.6.51 The AP2 revised scheme includes permanent junction upgrades including the signalisation of the junction.

3.6.52 Table 228 of the main TA summarises the changes to the performance of the junction as a result of the original scheme in 2023. Table 228 in the main TA is replaced by Table 228 below, which summarises the results of the changes to the performance of the existing junction as a result of the AP2 revised scheme.

3.6.53 Table 228.1 summarises the performance of the revised junction with the AP2 revised scheme junction upgrade.

Table 228: A513 Beaconside/Marston Lane junction 2023 future baseline and with the AP2 revised scheme (existing junction) junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme (existing junction)**		
Marston Lane (left + right)	46	0.42	1	51	1.14	7
A513 Beaconside (west) (left)	10	-	-	14	-	-
A513 Beaconside (west) (ahead)	944	-	-	1034	-	-
A513 Beaconside (west) (ahead)	281	-	-	281	-	-
A513 Beaconside (west)+Marston Lane (ahead)	954	-	-	1044	-	-
A513 Beaconside (west)+Marston Lane (right)	297	0.63	2	297	0.66	2
Common Road (left)	204	0.43	1	204	0.53	1
Common Road (right)	15	0.23	0	15	0.51	1
A513 Beaconside (east) (left)	77	-	-	77	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
A513 Beaconside (east) (ahead)	703	-	-	793	-	-
A513 Beaconside (east) (ahead)	8	-	-	8	-	-
Common Road+A513 Beaconside (east) (ahead)	902	-	-	992	-	-
Common Road+A513 Beaconside (east) (right)	12	0.03	0	12	0.04	0
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme (existing junction)**		
Marston Lane (left + right)	18	0.12	0	22	0.30	0
A513 Beaconside (west) (left)	13	-	-	18	-	-
A513 Beaconside (west) (ahead)	746	-	-	824	-	-
A513 Beaconside (west) (ahead)	113	-	-	113	-	-
A513 Beaconside (west)+Marston Lane (ahead)	750	-	-	827	-	-
A513 Beaconside (west)+Marston Lane (right)	119	0.31	1	119	0.33	1
Common Road (left)	290	0.83	4	290	1.11	19
Common Road (right)	37	0.6	1	37	1.01	4
A513 Beaconside (east) (left)	48	-	-	48	-	-
A513 Beaconside (east) (ahead)	1035	-	-	1112	-	-
A513 Beaconside (east) (ahead)	7	-	-	7	-	-
Common Road+A513 Beaconside (east) (ahead)	1312	-	-	1390	-	-
Common Road+A513 Beaconside (east) (right)	19	0.04	0	19	0.04	0

Table 228.1: A513 Beaconside/Marston Lane AP2 revised scheme (revised junction) junction capacity assessment

Approach	Flow, PCU/hr	DoS	Q, PCU
08:00 – 09:00	**2023 with AP2 revised scheme (revised junction)**		
Marston Lane	52	34%	2
A513 Beaconside (west)	1330	83%	24
A513 Beaconside (west)+Marston Lane	1341	87%	9
Common Road	219	85%	8
A513 Beaconside (east)	878	59%	10
Common Road+A513 Beaconside (east)	1005	60%	6

Approach	Flow, PCU/hr	DoS	Q, PCU
17:00 – 18:00	**2023 with AP2 revised scheme (revised junction)**		
Marston Lane	23	15%	1
A513 Beaconside (west)	955	61%	11
A513 Beaconside (west)+Marston Lane	947	107%	10
Common Road	327	108%	25
A513 Beaconside (east)	1168	81%	21
Common Road+A513 Beaconside (east)	1410	83%	15

3.6.54 The conclusions drawn in paragraphs 8.4.43 and 8.4.44 of the main TA are replaced by:

"The results show that the junction operates within capacity in the 2023 baseline and above capacity with the addition of the AP2 revised scheme construction traffic in the AM peak. In the PM peak, the junction approaches capacity in the 2023 baseline and operates above capacity with the addition of the AP2 revised scheme construction traffic.

Marston Lane arm has an increase in RFC value from 0.42 to 1.14 with a corresponding increase in queue length of one to seven PCUs in the AM peak. In the PM peak, the Common Road arm RFC value increases from 0.83 to 1.11 with an increase in queue length from four to 19 PCUs."

3.6.55 The results show that with the AP2 revised scheme upgrade the junction will operate close to capacity in the AM peak. In the PM peak, the junction continues to operate above capacity. However, the AP2 revised scheme upgrade to signalise the junction will create safer conditions for turning traffic through the junction.

A51 London Road/A518 Stafford Road/A518 Uttoxeter Road

3.6.56 Table 229 of the main TA summarises the changes to the performance of the A51 London Road/A518 Stafford Road (south) junction as a result of the original scheme in 2023. Table 229 in the main TA is replaced by the Table 229 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

3.6.57 The assessment has been extended to include Table 229.1, which summarises the results of the changes to the performance of the A518 London Road/A518 Uttoxeter Road junction (north) as a result of the AP2 revised scheme.

Table 229: A51 London Road/A518 Stafford Road junction 2023 future baseline and with the AP2 revised scheme junction (south) capacity assessment results

Approach	Flow, PCU/hr	DoS	Q, PCU	Flow, PCU/hr	DoS	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
A518 Stafford Road	476	77%	7	540	87%	10

Approach	Flow, PCU/hr	DoS	Q, PCU	Flow, PCU/hr	DoS	Q, PCU
A51 London Road (south) (left turn)	329	76%	9	393	86%	12
A51 London Road (south) (ahead)	550	79%	11	630	90%	15
A51 London Road (north) (ahead)	497	38%	3	577	47%	5
A51 London Road (north) (right turn)	555	77%	15	555	88%	17
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
A518 Stafford Road	740	80%	12	806	85%	14
A51 London Road (south) (left turn)	218	53%	5	284	65%	7
A51 London Road (south) (ahead)	559	77%	10	637	84%	12
A51 London Road (north) (ahead)	480	47%	10	558	56%	12
A51 London Road (north) (right turn)	342	77%	10	342	86%	11

Table 229.1: A51 London Road/A518 Uttoxeter Road junction 2023 future baseline and with the AP2 revised scheme junction (north) capacity assessment results

Approach	Flow, PCU/hr	DoS	Q, PCU	Flow, PCU/hr	DoS	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
A518 Uttoxeter Road	534	69%	9	534	69%	9
A51 London Road (north) (left)	185	29%	3	185	28%	3
A51 London Road (north) (ahead)	701	48%	8	781	52%	8
A51 London Road (south) (ahead)	552	45%	13	621	51%	14
A51 London Road (south) (right)	235	66%	7	246	71%	7
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
A518 Uttoxeter Road	469	61%	7	469	65%	7
A51 London Road (north) (left)	192	33%	4	192	31%	4
A51 London Road (north) (ahead)	548	46%	7	626	53%	8
A51 London Road (south) (ahead)	621	47%	5	675	51%	6
A51 London Road (south) (right)	369	68%	17	393	71%	17

3.6.58 The conclusions drawn in paragraphs 8.4.46 and 8.4.47 of the main TA are replaced by:

"The results show that the A51 London Road/A518 Stafford Road (south) junction is approaching capacity in the 2023 baseline and close to capacity with the addition of the AP2 revised scheme construction traffic in the AM and PM peak periods.

In the AM peak, the A518 Stafford Road arm shows an increase in DoS from 77% to 87% with a corresponding increase in queue length from seven to 10 PCUs. The A51

London Road (north) arm shows an increase in DoS from 77% to 88% with a corresponding increase in queue length from 18 to 23 (combined) PCUs."

3.6.59 In the AM peak, the A51 London Road/A518 Uttoxeter Road (north) junction approaches capacity in the 2023 baseline and with the addition of the AP2 revised scheme construction traffic. In the PM peak, it remains within capacity in the 2023 baseline and with the addition of the AP2 revised scheme construction traffic.

A513 Beaconside/B5066 Sandon Road (west)

3.6.60 Table 230 of the main TA summarises the changes to the performance of the junction as a result of the original scheme. Table 230 in the main TA is replaced by Table 230 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 230: A513 Beaconside/B5066 Sandon Road (west) junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment results

Approach	**Flow, PCU/hr**	**DoS**	**Q, PCU**	**Flow, PCU/hr**	**DoS**	**Q, PCU**
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
A513 Beaconside Road (north)	1076	76%	15	1134	79%	17
B5066 Sandon Road (west)	547	74%	8	547	78%	8
A513 Beaconside (south) (left turn)	217	21%	3	217	21%	2
A513 Beaconside (south) Ahead	478	73%	12	536	74%	13
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
A513 Beaconside Road (north)	805	84%	9	857	89%	10
B5066 Sandon Road (west)	491	88%	9	491	88%	9
A513 Beaconside (south) (left turn)	392	33%	4	392	33%	4
A513 Beaconside (south) (ahead)	810	89%	22	862	92%	25

3.6.61 The conclusions drawn in paragraphs 8.4.49 and 8.4.50 of the main TA are replaced by:

"The results show that the junction is approaching capacity in the 2023 baseline and with the addition of the AP2 revised scheme construction traffic in the AM peak. In the PM peak, the junction operates close to capacity in the 2023 baseline and at capacity with the addition of the AP2 revised scheme construction traffic.

The maximum increase is shown at the A513 Beaconside Road (north) in the PM peak where the DoS value increases from 84% to 89% and the queue length from nine to 10 PCUs.

The addition of the AP2 revised scheme construction traffic does not result in any substantial increases in queuing or DoS from the future baseline, where the junction is already approaching or close to capacity in the 2023 baseline."

Tixall Road/Blackheath Lane/Baswich Lane

3.6.62 Table 231 of the main TA summarises the changes to the performance of the junction as a result of the original scheme. Table 231 in the main TA is replaced by Table 231 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 231: Tixall Road/Blackheath Lane/Baswich Lane junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment results

Approach	Flow, PCU/hr	DoS	Q, PCU	Flow, PCU/hr	DoS	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
Blackheath Lane (north)	430	95%	17	447	99%	20
Tixall Road (east)	738	95%	25	748	96%	26
Baswich Lane (south)	469	94%	17	476	95%	18
Tixall Road (west)	247	34%	5	247	34%	5
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
Blackheath Lane (north)	720	91%	22	735	93%	23
Tixall Road (east)	368	63%	9	378	65%	9
Baswich Lane (south)	353	91%	13	358	93%	13
Tixall Road (west)	481	91%	16	481	91%	16

3.6.63 The conclusions drawn in paragraphs 8.4.52 and 8.4.53 of the main TA are replaced by:

"The results show that the junction is at capacity in the 2023 baseline and with the addition of the AP2 revised scheme construction traffic in the AM and PM peak periods, without any substantial increases in queuing or DoS.

The AP2 revised scheme construction traffic will marginally increase queuing through this junction."

A513 Beaconside/A34 Stone Road/A34 from M6 Roundabout at Creswell

3.6.64 Table 232 of the main TA summarises the changes to the performance of the junction as a result of the original scheme. Table 232 in the main TA is replaced by Table 232 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 232: A513 Beaconside/A34 Stone Road/A34 from M6 Roundabout at Creswell junction 2023 future baseline and with the AP2 revised scheme junction capacity assessment results

Approach	Flow, PCU/hr	DoS	Q, PCU	Flow, PCU/hr	DoS	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
A513 Beaconside (east) (near-side)	570	71%	12	538	67%	11
A513 Beaconside (east) (mid)	267	33%	4	389	49%	7
A513 Beaconside (east) (far-side)	734	92%	21	739	92%	21

Approach	Flow, PCU/hr	DoS	Q, PCU	Flow, PCU/hr	DoS	Q, PCU
A34 Stone Road (south) (near-side)	368	89%	12	311	68%	8
A34 Stone Road (south) (mid)	206	50%	5	263	57%	6
A34 Stone Road (south) (far-side)	246	60%	6	246	54%	6
A34 from M6 Roundabout at Creswell (west) (near-side)	413	67%	9	521	60%	10
A34 from M6 Roundabout at Creswell (west) (mid)	515	83%	13	527	61%	10
A34 from M6 Roundabout at Creswell (west) (far-side)	316	51%	6	437	50%	8
A34 Stone Road (north) (near-side)	615	81%	15	448	44%	7
A34 Stone Road (north) (mid near-side)	594	79%	14	545	53%	9
A34 Stone Road (north) (mid far-side)	179	24%	3	400	39%	6
A34 Stone Road (north) (far-side)	673	89%	18	824	80%	17
17:00 – 18:00	**2023 future baseline**			**2023 future baseline AP2 revised scheme**		
A513 Beaconside (east) (near-side)	341	50%	7	416	61%	9
A513 Beaconside (east) (mid)	392	57%	8	396	58%	8
A513 Beaconside (east) (far-side)	559	81%	14	563	82%	14
A34 Stone Road (south) (near-side)	293	67%	7	326	59%	7
A34 Stone Road (south) (mid)	331	76%	9	298	54%	6
A34 Stone Road (south) (far-side)	284	65%	7	284	52%	6
A34 from M6 Roundabout at Creswell (west) (near-side)	392	57%	8	475	49%	8
A34 from M6 Roundabout at Creswell (west) (mid)	204	30%	4	478	50%	8
A34 from M6 Roundabout at Creswell (west) (far-side)	585	85%	15	460	48%	7
A34 Stone Road (north) (near-side)	458	51%	8	436	42%	6
A34 Stone Road (north) (mid near-side)	657	74%	14	557	54%	9
A34 Stone Road (north) (mid far-side)	252	28%	4	378	37%	5
A34 Stone ROAD (north) (far-side)	691	77%	15	844	82%	18

3.6.65 The conclusions drawn in paragraph 8.4.55 of the main TA are replaced by:

"The results show that the junction approaches capacity in the 2023 baseline and with the addition of the AP2 revised scheme construction traffic in the AM and PM peak periods, without any substantial increases in queuing or DoS as a result of the AP2 revised scheme."

3.6.66 The AP2 revised scheme reduces the volume of construction traffic through the junction when compared to the original scheme.

M6 junction 14

3.6.67 Table 233 of the main TA summarises the changes to the performance of the junction as a result of the original scheme. Table 233 in the main TA is replaced by the Table 233 below, which summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 233: M6 junction 14 2023 future baseline and with the AP2 revised scheme junction capacity assessment results

Approach	Flow, PCU/hr	V/C[13]	Q, PCU	Flow, PCU/hr	V/C	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 with the AP2 revised scheme**		
M6 south-bound off slip	652	52%	4	754	60%	5
M6 south-bound on slip	1170	49%	0	1256	52%	0
M6 north bound off slip	1152	58%	4	1282	64%	5
M6 north bound on slip	655	31%	0	716	30%	0
A34 east-bound	1270	38%	0	1453	43%	0
A34 west-bound	1119	51%	0	1286	59%	0
A5013 Eccleshall Road east-bound	757	42%	0	748	42%	0
A5013 Eccleshall Road west-bound	604	34%	0	601	37%	0
A5013 Creswell Grove east-bound	861	98%	6	811	105%	26
A5013 Creswell Grove west-bound	535	39%	0	526	38%	0
17:00 – 18:00	**2023 future baseline**			**2023 with the AP2 revised scheme**		
M6 south-bound off slip	446	54%	4	545	66%	5
M6 south-bound on slip	1100	48%	0	1176	50%	0
M6 north bound off slip	986	50%	3	1025	52%	3
M6 north bound on slip	736	36%	0	762	33%	0
A34 east-bound	946	28%	0	1099	33%	0
A34 west-bound	1195	50%	0	1352	58%	0
A5013Eccleshall Road east-bound	464	26%	0	470	26%	0
A5013 Eccleshall Road west-bound	877	52%	1	784	51%	1

[13] Volume-to-Capacity ratio, which represents the sufficiency of an intersection to accommodate the vehicular demand

Approach	Flow, PCU/hr	V/C[13]	Q, PCU	Flow, PCU/hr	V/C	Q, PCU
A5013 Creswell Grove east-bound	693	79%	1	723	87%	2
A5013 Creswell Grove west-bound	951	69%	0	906	66%	0

3.6.68 The conclusions drawn in paragraph 8.4.57 of the main TA are replaced by:

"The junction will be at capacity in the 2023 baseline and with the addition of the AP2 revised scheme construction traffic in the AM peak. In the PM peak, the junction approaches capacity in the future baseline and will be close to capacity with the addition of the AP2 revised scheme construction traffic. The AP2 revised scheme construction traffic does not result in substantial increases in queuing or V/C.

In the AM peak, the AP2 revised scheme construction traffic will result in the A5013 Creswell Grove (east-bound) arm V/C increasing from 98% to 105% with a corresponding increase in queue from six to 26 PCUs."

A51 London Road/Pasturefields Lane

3.6.69 Table 233.1 summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 233.1: A51 London Road/Pasturefields Lane 2023 future baseline and with the AP2 revised scheme junction capacity assessment results

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
Pasturefields Lane (left + right)	12	0.03	0	12	0.04	0
A51 London Road (south east) (ahead + right)	16	0.02	0	20	0.03	0
A51 London Road (south east) (ahead)	509	-	-	629	-	-
A51 London Road (north-west) (left)	3	-	-	3	-	-
A51 London Road (north-west) (ahead)	547	-	-	672	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
Pasturefields Lane (left + right)	0	0	0	0	0	0
A51 London Road (south east) (ahead + right)	3	0	0	4	0	0
A51 London Road (south east) (ahead)	539	-	-	662	-	-
A51 London Road (north-west) (left)	0	-	-	0	-	-
A51 London Road (north-west) (ahead)	668	-	-	792	-	-

3.6.70 The results show that the junction operates within capacity in the 2023 baseline and with the addition of the AP2 revised scheme construction traffic in the AM and PM peak periods, with minimal increases in the RFC values.

A51 Main Road/Bellamour Lane

3.6.71 Table 233.2 summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 233.2: A51 Main Road/Bellamour Lane 2023 future baseline and with the AP2 revised scheme junction capacity assessment results

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
Bellamour Lane (left)	4	0.01	0	4	0.01	0
Bellamour Lane (right)	57	0.25	0	57	0.38	1
A51 Main Road (north) (ahead + right)	1	0.00	0	1	0.00	0
A51 Main Road (north) (ahead)	652	-	-	819	-	-
A51 Main Road (south) (left)	62	-	-	62	-	-
A51 Main Road (south) (ahead)	748	-	-	915	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
Bellamour Lane (left)	3	0.01	0	3	0.01	0
Bellamour Lane (right)	44	0.24	0	44	0.41	1
A51 Main Road (north) (ahead + right)	1	0.00	0	1	0.00	0
A51 Main Road (north) (ahead)	823	-	-	986	-	-
A51 Main Road (south) (left)	39	-	-	39	-	-
A51 Main Road (south) (ahead)	806	-	-	969	-	-

3.6.72 The results show that the junction operates within capacity in the 2023 baseline and with the addition of the AP2 revised scheme construction traffic in the AM and PM peak periods, with minimal increases in the RFC values.

A51 Lichfield Road/A51 Main Road/Main Road (Colwich)

3.6.73 Table 233.3 summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 233.3: A51 Lichfield Road/A51 Main Road/Main Road (Colwich) 2023 future baseline and with the AP2 revised scheme junction capacity assessment results

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
Main Road (left)	37	0.08	0	37	0.09	0
Main Road (right)	183	0.58	1	183	0.74	3
A51 Lichfield Road (north) (ahead + right)	34	0.07	0	34	0.07	0
A51 Lichfield Road (north) (ahead)	627	-	-	793	-	-
A51 Main Road (south) (left)	106	-	-	106	-	-
A51 Main Road (south) (ahead)	783	-	-	783	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
Bellamour Lane (left)	22	0.05	0	22	0.05	0
Bellamour Lane (right)	112	0.40	1	112	0.53	1
A51 Main Road (north) (ahead + right)	34	0.07	0	34	0.08	0
A51 Main Road (north) (ahead)	733	-	-	897	-	-
A51 Main Road (south) (left)	180	-	-	180	-	-
A51 Main Road (south) (ahead)	676	-	-	840	-	-

3.6.74 The results show that the junction operates within capacity in the 2023 baseline and is approaching capacity with the addition of the AP2 revised scheme construction traffic in the AM peak. In the PM peak, the junction operates within capacity in the 2023 baseline and with the addition of the AP2 revised scheme construction traffic.

3.6.75 In the AM peak, the Main Road arm shows an increase in RFC value from 0.58 to 0.74 with a corresponding increase in queue length from one to three PCUs.

3.6.76 The addition of the AP2 revised scheme construction traffic does not result in substantial increases in queuing from the future baseline.

A51 London Road/New Road

3.6.77 Table 233.4 summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 233.4: A51 London Road/New Road 2023 future baseline and with the AP2 revised scheme junction capacity assessment results

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
New Road (left)	18	0.08	0	18	0.93	2
New Road (right)	174	0.69	2	174	0.91	6
A51 London Road (north) (ahead + right)	29	0.06	0	31	0.07	0
A51 London Road (north) (ahead)	596	-	-	738	-	-
A51 London Road (south) (left)	202	-	-	202	-	-
A51 London Road (south) (ahead)	569	-	-	713	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
New Road (left)	18	0.25	0	18	1.17	3
New Road (right)	229	0.88	1	229	1.15	22
A51 London Road (north) (ahead + right)	8	0.02	0	8	0.02	0
A51 London Road (north) (ahead)	569	-	-	713	-	-
A51 London Road (south) (left)	170	-	-	170	-	-
A51 London Road (south) (ahead)	597	-	-	741	-	-

3.6.78 The results show that the junction is within capacity in the AM peak in the 2023 baseline and at capacity with the addition of the AP2 construction traffic in the AM peak. In the PM peak, the junction operates close to capacity in the 2023 baseline and above capacity with the addition of the AP2 revised scheme construction traffic.

3.6.79 The New Road arm shows an increase in RFC value from 0.69 to 0.93 with a corresponding increase in queue length from two to eight PCUs in the AM peak and an increase in the RFC value from 0.88 to 1.17 and a corresponding increase in queue length from one to 25 PCUs in the PM peak.

A51 Lichfield Road/Milwich Road

3.6.80 Table 233.5 summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 233.5: A51 Lichfield Road/Milwich Road 2023 future baseline and with the AP2 revised scheme junction capacity assessment results

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
Milwich Road (left)	36	0.09	0	36	0.10	0
Milwich Road (right)	5	0.03	0	5	0.04	0
A51 Lichfield Road (north) (ahead + right)	25	0.06	0	25	0.07	0
A51 Lichfield Road (north) (ahead)	769	-	-	869	-	-
A51 Lichfield Road (south) (left)	4	-	-	4	-	-
A51 Lichfield Road (south) (ahead)	1072	-	-	1172	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
Milwich Road (left)	25	0.06	0	25	0.06	0
Milwich Road (right)	5	0.03	0	5	0.04	0
A51 Lichfield Road (north) (ahead + right)	52	0.11	0	52	0.12	0
A51 Lichfield Road (north) (ahead)	1167	-	-	1267	-	-
A51 Lichfield Road (south) (left)	26	-	-	26	-	-
A51 Lichfield Road (south) (ahead)	764	-	-	864	-	-

3.6.81 The results show that the junction operates within capacity in the 2023 baseline and with the addition of the AP2 revised scheme construction traffic in the AM and PM peak periods, without any substantial increases in RFC values.

A51 Lichfield Road/B5066 Hilderstone Road

3.6.82 Table 233.6 summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 233.6: A51 Lichfield Road/B5066 Hilderstone Road 2023 future baseline and with the AP2 revised scheme junction capacity assessment results

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
B5066 Hilderstone Road (left)	463	0.94	10	463	1.00	16
B5066 Hilderstone Road (right)	9	0.87	1	9	0.99	2
A51 Lichfield Road (north)	184	0.36	1	184	0.38	1

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
(ahead + right)						
A51 Lichfield Road (north) (ahead)	599	-	-	699	-	-
A51 Lichfield Road (south) (left)	8	-	-	8	-	-
A51 Lichfield Road (south) (ahead)	610	-	-	710	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
B5066 Hilderstone Road (left)	175	0.36	1	175	0.38	1
B5066 Hilderstone Road (right)	6	0.07	0	6	0.11	0
A51 Lichfield Road (north) (ahead + right)	704	0.96	15	934	1.01	28
A51 Lichfield Road (north) (ahead)	473	-	-	343	-	-
A51 Lichfield Road (south) (left)	15	-	-	15	-	-
A51 Lichfield Road (south) (ahead)	613	-	-	713	-	-

3.6.83 The results show that the junction operates at capacity in the 2023 baseline and with the addition of the AP2 revised scheme construction traffic in the AM and PM peak periods.

3.6.84 The Hilderstone Road arm shows an increase in RFC value from 0.94 to 1.00 with a corresponding increase in queue length from 10 to 16 PCUs in the AM peak. In the PM peak, the A51 Lichfield Road (right) arm shows an increase in the RFC value from 0.96 to 1.01 and a corresponding increase in queue length from 15 to 28 PCUs.

3.6.85 The impact of the AP2 revised scheme construction traffic is not substantial, with no substantial changes in the RFC or queue lengths. The junction already operates at capacity in the 2023 future baseline.

A51 Lichfield Road/Old Lichfield Road (south)

3.6.86 Table 233.7 summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 233.7: A51 Lichfield Road/Old Lichfield Road (south) 2023 future baseline and with the AP2 revised scheme junction capacity assessment results

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
Old Lichfield Road (left)	0	0	0	0	0	0
Old Lichfield Road (right)	7	0.02	0	7	0.03	0

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
A51 Lichfield Road (north) (ahead + right)	0	0	0	0	0	0
A51 Lichfield Road (north) (ahead)	609	-	-	709	-	-
A51 Lichfield Road (south) (left)	8	-	-	8	-	-
A51 Lichfield Road (south) (ahead)	599	-	-	699	-	-
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
Old Lichfield Road (left)	2	0	0	2	0	0
Old Lichfield Road (right)	3	0.01	0	3	0.01	0
A51 Lichfield Road (north) (ahead + right)	0	0	0	0	0	0
A51 Lichfield Road (north) (ahead)	620	-	-	720	-	-
A51 Lichfield Road (south) (left)	4	-	-	4	-	-
A51 Lichfield Road (south) (ahead)	695	-	-	795	-	-

3.6.87 The results show that the junction operates within capacity in the 2023 baseline and with the addition of the AP2 revised scheme construction traffic in the AM and PM peak periods, without any substantial increases in RFC values.

A51 Butterhill Bank/A51 Lichfield Road/Old Lichfield Road (north)

3.6.88 Table 233.8 summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 233.8: A51 Butterhill Bank/A51 Lichfield Road/Old Lichfield Road (north) 2023 future baseline and with the AP2 revised scheme junction capacity assessment results

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
Old Lichfield Road (left)	3	0.01	0	3	0.01	0
Old Lichfield Road (right)	4	0.01	0	4	0.02	0
A51 Butterhill Bank (north) (ahead + right)	5	0.01	0	5	0.01	0
A51 Butterhill Bank (north) (ahead)	610	-	-	710	-	-
A51 Lichfield Road (south) (left)	2	-	-	2	-	-
A51 Lichfield Road (south) (ahead)	595	-	-	695	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
Old Lichfield Road (left)	5	0.01	0	5	0.01	0
Old Lichfield Road (right)	2	0.01	0	2	0.01	0
A51 Butterhill Bank (north) (ahead + right)	6	0.01	0	6	0.01	0
A51 Butterhill Bank (north) (ahead)	620	-	-	720	-	-
A51 Lichfield Road (south) (left)	0	-	-	0	-	-
A51 Lichfield Road (south) (ahead)	697	-	-	798	-	-

3.6.89 The results show that the junction operates within capacity in the 2023 baseline and with the addition of the AP2 revised scheme construction traffic in the AM and PM peak periods, without any substantial increases in RFC.

A51 Lichfield Road/B5066 Sandon Bank/School Lane

3.6.90 Table 233.9 summarises the results of the changes to the performance of the junction as a result of the AP2 revised scheme.

Table 233.9: A51 Lichfield Road/B5066 Sandon Bank/School Lane 2023 future baseline and with the AP2 revised scheme junction capacity assessment results

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
School Lane (left + ahead)	0	0	0	0	0.00	0
School Lane (ahead + right)	0	0	0	0	0.00	0
A51 Lichfield Road (north) (Left + ahead + right)	501	0.90	8	613	0.96	13
A51 Lichfield Road (north) (Left)	2	-	-	2	-	-
A51 Lichfield Road (north) (right)	605	-	-	594	-	-
B5066 Sandon Bank (left + ahead)	168	0.37	1	167	0.42	1
B5066 Sandon Bank (ahead + right)	81	0.56	1	81	0.81	3
A51 Lichfield Road (south) (left + ahead+ right)	0	0	0	2	0.01	0
A51 Lichfield Road (south) (left)	131	-	-	131	-	-
A51 Lichfield Road (south) (ahead)	629	-	-	729	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
17:00 – 18:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme**		
School Lane (left + ahead)	0	0	0	0	0.00	0
School Lane (ahead + right)	0	0	0	0	0.00	0
A51 Lichfield Road (north) (Left + ahead + right)	159	0.36	1	159	0.38	1
A51 Lichfield Road (north) (Left)	1	-	-	1	-	-
A51 Lichfield Road (north) (right)	634	-	-	734	-	-
B5066 Sandon Bank (left + ahead)	423	0.93	9	423	1.01	16
B5066 Sandon Bank (ahead + right)	67	0.31	1	67	0.38	1
A51 Lichfield Road (south) (left + ahead+ right)	1	0	0	3	0.01	0
A51 Lichfield Road (south) (left)	114	-	-	114	-	-
A51 Lichfield Road (south) (ahead)	793	-	-	893	-	-

3.6.91 The results show that the junction operates at capacity in the 2023 baseline and at capacity with the addition of the AP2 revised scheme construction traffic in the AM peak. In the PM peak, the junction operates at capacity in the 2023 baseline and above capacity with the addition of the AP2 revised scheme construction traffic.

3.6.92 In the AM peak, the A51 Lichfield Road arm shows an increase in RFC from 0.90 to 0.96 with a corresponding increase in queue length from eight to 13 PCUs and the B5066 Sandon Bank arm showing an increase in RFC from 0.56 to 0.81 with a corresponding increase in queue length from one to three PCUs.

3.6.93 In the PM peak, the B5066 Sandon Bank arm shows an increase in RFC from 0.93 to 1.01 and a corresponding increase in queue length from nine to 16 PCUs.

3.6.94 The addition of the AP2 revised scheme construction traffic does not result in any substantial increases to queuing on either the A51 Lichfield Road or the B5066 Sandon Bank approach. On both approaches the junction already operates at capacity in the 2023 future baseline.

A34 Stone Road/Yarlet School

3.6.95 The AP2 revised scheme includes works to A34 Stone Road/Yarlet School priority left-in/left-out access. The junction will be upgraded to an all-movement priority junction, including carriageway widening, a kerbed right-turn lane and the relocation of the junction to the north.

3.6.96 As noted in Section 3.2, the PM peak hour of 15:00 to 16:00 has been assessed to consider the peak vehicle demand of the school. This has been assessed cumulatively with the peak demand of the AP2 revised scheme construction traffic.

3.6.97 Table 233.10 summarises the results of the changes to the performance of the existing junction as a result of the AP2 revised scheme construction traffic. Table 233.11 summarises the results of the changes to the performance of the revised junction as a result of the AP2 revised scheme upgrade.

Table 233.10: A34 Stone Road/Yarlet School 2023 future baseline and with the AP2 revised scheme (existing junction) junction capacity assessment

Approach	**Flow, PCU/hr**	**RFC**	**Q, PCU**	**Flow, PCU/hr**	**RFC**	**Q, PCU**
08:00-09:00	**2023 future baseline**			**2023 future baseline with AP2 revised scheme (existing junction)**		
Yarlet School (left)	99	0.46	1	99	0.50	1
A34 Stone Road (south) (ahead)	800	-	-	972	-	-
A34 Stone Road (north) (left)	116	-	-	116	-	-
A34 Stone Road (north) (ahead)	1348	-	-	1520	-	-
15:00-16:00	**2023 future baseline)**			**2023 future baseline with AP2 revised scheme (existing junction)**		
Yarlet School (left)	40	0.14	0	40	0.15	0
A34 Stone Road (south) (ahead)	990	-	-	1056	-	-
A34 Stone Road (north) (left)	39	-	-	39	-	-
A34 Stone Road (north) (ahead)	800	-	-	866	-	-

Table 233.11: A34 Stone Road/Yarlet School 2023 AP2 revised scheme (revised junction) junction capacity assessment

Approach	**Flow, PCU/hr**	**RFC**	**Q, PCU**
08:00 – 09:00	**2023 future baseline with AP2 revised scheme (revised junction)**		
Yarlet School (left)	45	0.13	0
Yarlet School (right)	54	0.30	0
A34 Stone Road (south) (ahead + right)	58	0.16	0
A34 Stone Road (south) (ahead)	972	-	-
A34 Stone Road (north) (left)	74	-	-
A34 Stone Road (north) (ahead)	1520	-	-
15:00 – 16:00	**2023 future baseline with AP2 revised scheme (revised junction)**		
Yarlet School (left)	18	0.04	0
Yarlet School (right)	22	0.07	0
A34 Stone Road (south) (ahead + right)	18	0.03	0
A34 Stone Road (south) (ahead)	1056	-	-
A34 Stone Road (north) (left)	21	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU
A34 Stone Road (north) (ahead)	866	-	-

3.6.98 The results show that the existing junction will operate within capacity in the 2023 baseline in the AM and PM peak periods and with the addition of the AP2 revised scheme construction traffic, with minimal RFC and queuing.

3.6.99 The AP2 revised scheme upgrade junction will operate within capacity with minimal RFC values and queuing, while accommodating right turn manoeuvres and reducing the travel distance for those accessing and exiting Yarlet School.

Summary of junction impacts

3.6.100 The introduction of the construction route along the A51 between A34 Stone Road and Weston as part of the AP2 revised scheme and changes to the movement and use of surplus excavated material, will remove or reduce the substantial increases in the capacity indicators along the A513 and A518 corridors reported for the original scheme in the main TA. This includes the A513 Beaconside/A34 Stone Road, the A513 Beaconside/B5066 Sandon Road, the A518 Weston Road/Blackheath Lane and the A518 Stafford Road/A51 London Road junctions.

3.6.101 In addition, the AP2 revised scheme will introduce temporary and permanent junction upgrades at the A513 Beaconside/B5066 Sandon Road, the A513 Beaconside/Marston Lane and the A518 Weston Road/A513 Beaconside/Hydrant Way junctions, which will also reduce the increases in capacity indicators at these locations.

3.6.102 As a result of the AP2 revised scheme, the number of junctions that will experience substantial increases in the capacity indicators will be reduced when compared to the original scheme. However, additional delays would occur at the following junctions as a result of the AP2 revised scheme:

- M6 junction 14;
- A51 Lichfield Road/New Road; and
- A51 Lichfield Road/B5066 Sandon Road/School Lane.

3.6.103 It should be noted that these junctions are shown to operate either close to, or over capacity in the future baseline regardless of the AP2 revised scheme and that the assessment considers the peak level of construction traffic and these conditions would not be present across the whole construction period.

Accidents and safety

3.6.104 The impacts on accident and safety risks during construction is reported in Section 8.4 of the main TA. This section of the main TA is unchanged.

Parking and loading

3.6.105 The impacts on parking during construction is reported in Section 8.4 of the main TA. Paragraph 8.4.64 is replaced by:

"The original scheme would have impacted on the parking provision at the Staffordshire County Showground during construction with the loss of some existing

parking. However, the AP2 revised scheme will provide additional land to fully mitigate the loss of parking, which is reported in the assessment of operational impacts."

Public transport

Rail

3.6.106 The impacts on the rail network and service provision during construction is reported in Section 8.4 of the main TA. This section of the main TA is unchanged.

Local bus services

3.6.107 The impacts on bus services during construction are reported in Section 8.4 of the main TA. This section of the main TA is unchanged.

Public transport interchanges

3.6.108 The impacts on public transport interchanges during construction are reported in Section 8.4 of the main TA. This section of the main TA is unchanged.

Pedestrian, cyclists and equestrian

3.6.109 There are a number of minor utility diversions associated with temporary utility compounds in the Colwich to Yarlet area. These cross Colwich Footpath 54, Colwich Bridleway 58 diversion, Hopton and Coton Bridleway 11, Hopton and Coton Bridleway 12 and the Hopton and Coton Bridleway 16. However, it is expected that these works would be localised with a short duration and will not have a substantial impact on non-motorised users.

3.6.110 Table 236 in the main TA summarises the changes on public rights of way for non-motorised users required to accommodate the construction of the original scheme. Table 236.1 summarises the amendments to Table 236 of the main TA associated with the AP2 revised scheme. Those not listed in Table 236.1 remain unchanged from those identified in Table 236 of the main TA.

Table 236.1: CA2 construction changes on public rights of way for non-motorised users

PRoW name	Change in travel distance compared to baseline	Duration
Colwich Bridleway 23	No change to overall length of route	12 months
Colwich Footpath 54	Temporary diversion south is 60m longer, now permanent.	permanent
Colwich Bridleway 58	Temporary diversion south is 60m longer, now permanent.	permanent
Colwich Bridleway 63	Temporary diversions south is 60m longer.	18 months
Hopton and Coton Bridleway 11	Temporary diversion is same length as existing.	36 months/permanent
Hopton and Coton Bridleway 12	Temporary diversion is 90m longer.	18 months
Hopton and Coton Bridleway 16	Temporary diversion is 20m shorter.	36 months
Hopton and Coton Footpath 24	Temporary diversion is 30m longer, now permanent	permanent

3.6.111 The conclusions in Section 8.4.81 in the main TA are replaced with:

"Within the 19 temporary diversions of PROW and roads, the majority of routes affected experience either no change in length (in the case of the A34 Stone Road, Colwich Bridleways 23 and 35 and Hopton and Coton Bridleway 11), or changes of no more than 150m."

3.6.112 The AP2 revised scheme introduces new temporary utility compounds in the vicinity of the Ingestre Park Golf Club, which are required to construct the AP2 revised scheme. The establishment of the utility compounds will introduce some construction traffic onto Ingestre BOAT1 between Lion Lodge and the access to the Ingestre Park Golf Club. However, this will be for a short duration on an existing BOAT and is not expected to have a substantial impact.

Waterways and canals

3.6.113 The impact on waterways and canals during construction are reported in Section 8.4 of the main TA. This section of the main TA is unchanged.

3.7 CA2 AP2 revised scheme operational description and assessment of operation impacts

3.7.1 The changes to the original scheme reported in Section 3.1 of this report mean that Section 8.5 and 8.6 of the main TA and Section 3.7 of the SES1 and AP1 ES TA Addendum are replaced by Section 3.7 in this document unless stated otherwise.

Highway diversions, realignments and closures

3.7.2 Table 237 of the main TA summarises the permanent highway diversions, realignments and closures required to accommodate the original scheme. Table 237 in the main TA is supplemented by the Table 237.1, which summarises the permanent highway diversions, realignments and closures required to accommodate the AP2 revised scheme.

Table 237.1: CA2 permanent highway diversion/realignment/stopping-up

Road name	Description	Change in travel distance (compared to baseline)
Tolldish Lane	Diversion north of existing to re-join A51 Lichfield Road, north of HS2 alignment. Southern section of existing to be stopped up.	Diversion to A51 Lichfield Road for travel to the north is 250m shorter; to A51 Lichfield Road for travel to the south via new underbridge is 250m longer
A51 Lichfield Road	Reinstatement on to new underbridge on existing alignment.	Reinstatement results in no change in travel distance.
Hoo Mill Lane (private access road)	Diversion north of existing to join Ingestre Park Road	Diversion results in a minimal change in travel distance
A518 Weston Road	Realignment of existing to west and new overbridge	Realignment results in a minimal change in travel distance
Hopton Lane	Diversion north of existing to join realigned B5066 Sandon Road. Southern section to be stopped up – provides access to balancing pond	Diversion to B5066 Sandon Road for travel to the north is 200m shorter and to B5066 Sandon Road for travel to the south is 300m longer

Road name	Description	Change in travel distance (compared to baseline)
B5066 Sandon Road	Minor amendment to the original scheme realignment, west of the existing alignment. Approximately 1km of route is realigned	Realignment results in a minimal change in travel distance
Mount Edge	Extension of existing to west to join realignment B5066 Sandon Road. 250m of new route created	Lane is extended by 250m. Route to realigned B5066 Sandon Road is a minimal distance shorter
Marston Lane	Realignment of existing to north, 800m of diverted lane provided	Realignment results in a minimal change in travel distance
A34 Stone Road	Reinstatement on to a new overbridge on existing alignment and inclusion of the upgraded Yarlet School access	Reinstatement results in no change in travel distance. Upgraded School access will result in minor reduction in travel distance for School based trips

PRoW diversions, realignments and closures

3.7.3 The impact on pedestrians, cyclists and equestrians during the operation are reported in Section 8.6 of the main TA. This section of the main TA is unchanged.

Junction performance 2027 and 2041

3.7.4 The AP2 revised scheme includes the permanent upgrade of the A518 Weston Road/A513 Beaconside/Hydrant Way, the A513 Beaconside/Marston Lane and the A34 Stone Road/Yarlet School junctions.

3.7.5 The A513 Beaconside/B5066 Sandon Road junction is a temporary junction improvement and therefore has not been assessed as a permanent junction mitigation scheme.

A518 Weston Road/A513 Beaconside/Hydrant Way

3.7.6 The AP2 revised scheme includes a permanent upgrade to the junction that includes carriageway widening on the Hydrant Way arm. Tables 244.1 and 244.2 summarise the results of the changes to the performance of the junction as a result of the AP2 revised scheme in 2027 and 2041 respectively.

Table 244.1: A518 Weston Road/A513 Beaconside/Hydrant Way 2027 future baseline, AP2 revised scheme (existing junction) and AP2 revised scheme (revised junction) junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00-09:00	**2027 future baseline**			**2027 with AP2 revised scheme (existing junction)**			**2027 with AP2 revised scheme (revised junction)**		
A513 Beaconside	829	0.71	3	829	0.71	3	829	0.69	3
A518 Weston Road (east)	672	0.50	1	672	0.50	1	672	0.50	1
Hydrant Way	1326	1.35	205	1326	1.35	205	1326	0.83	5
A518 Weston Road (west)	880	0.78	4	880	0.78	4	880	0.95	13

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
17:00-18:00	**2027 future baseline**			**2027 with AP2 revised scheme (no change to junction)**			**2027 with AP2 revised scheme (revised junction)**		
A513 Beaconside	1110	0.97	18	1110	0.97	18	1110	0.97	18
A518 Weston Road (east)	609	0.58	2	609	0.58	2	609	0.58	2
Hydrant Way	795	0.73	3	795	0.73	3	795	0.46	1
A518 Weston Road (west)	1063	0.85	6	1063	0.85	6	1063	0.85	6

Table 244.2: A518 Weston Road/A513 Beaconside/Hydrant Way 2041 future baseline, AP2 revised scheme (existing junction) and AP2 revised scheme (revised junction) junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00-09:00	**2041 future baseline**			**2041 with AP2 revised scheme (existing junction)**			**2041 with AP2 revised scheme (revised junction)**		
A513 Beaconside	860	0.71	3	860	0.71	3	860	0.73	3
A518 Weston Road (east)	695	0.52	1	695	0.52	1	695	0.52	1
Hydrant Way	1376	1.41	252	1376	1.41	252	1376	0.87	7
A518 Weston Road (west)	908	0.80	4	908	0.80	4	908	1.00	22
17:00-18:00	**2041 future baseline**			**2041 with AP2 revised scheme (existing junction)**			**2041 with AP2 revised scheme (revised junction)**		
A513 Beaconside	1147	1.02	33	1147	1.02	33	1147	1.02	33
A518 Weston Road (east)	630	0.61	2	630	0.61	2	630	0.61	2
Hydrant Way	822	0.76	3	822	0.76	3	822	0.48	1
A518 Weston Road (west)	1099	0.89	8	1099	0.89	8	1099	0.89	8

3.7.7 The results show that the junction operates above capacity in the 2027 and 2041 baseline in the AM peak. In the PM peak, the junction operates at and above capacity in the 2027 and 2041 baseline respectively. The AP2 revised scheme will not worsen the 2027 and 2041 baseline traffic conditions and will have no substantial adverse impact on the performance of the junction.

3.7.8 The results show that with the addition of the AP2 revised scheme upgrade in the AM peak in 2041, the junction will operate largely within capacity. The Hydrant Way arm RFC will reduce from 1.41 to 0.87 with a corresponding reduction in queue from 252 to seven PCUs.

A513 Beaconside/Marston Lane

3.7.9 The AP2 revised scheme includes the permanent upgrade of the junction, which includes the introduction of signal control.

3.7.10 Tables 244.3 and 244.4 summarise the results of the changes to the performance of the existing junction as a result of the AP2 revised scheme in 2027 and 2041 respectively. Table 244.5 summarises the results of the changes to the performance of the revised junction as a result of the AP2 revised scheme upgrade in 2027 and 2041.

Table 244.3: Future year baseline performance at A513 Beaconside/Marston Lane junction 2027 future baseline and with the AP2 revised scheme (existing junction) junction capacity assessment

Approach	**Flow, PCU/hr**	**RFC**	**Q, PCU**	**Flow, PCU/hr**	**RFC**	**Q, PCU**
08:00 – 09:00	**2027 future baseline**			**2027 future baseline with AP2 revised scheme (existing junction)**		
Marston Lane (left + right)	48	0.56	1	48	0.56	1
A513 Beaconside (west) (left)	10	-	-	10	-	-
A513 Beaconside (west) (ahead)	976	-	-	976	-	-
A513 Beaconside (west) (ahead)	290	-	-	290	-	-
A513 Beaconside (west)+Marston Lane (ahead)	986	-	-	986	-	-
A513 Beaconside (west)+Marston Lane (right)	307	0.66	2	307	0.66	2
Common Road (left)	211	0.47	1	211	0.47	1
Common Road (right)	16	0.30	1	16	0.30	1
A513 Beaconside (east) (left)	79	-	-	79	-	-
A513 Beaconside (east) (ahead)	727	-	-	727	-	-
A513 Beaconside (east) (ahead)	8	-	-	8	-	-
Common Road+A513 Beaconside (east) (ahead)	933	-	-	933	-	-
Common Road+A513 Beaconside (east) (right)	12	0.04	0	12	0.04	0
17:00 – 18:00	**2027 future baseline**			**2027 future baseline with AP2 revised scheme (existing junction)**		
Marston Lane (left + right)	18	0.15	0	18	0.15	0
A513 Beaconside (west) (left)	13	-	-	13	-	-
A513 Beaconside (west) (ahead)	771	-	-	771	-	-
A513 Beaconside (west) (ahead)	117	-	-	117	-	-
A513 Beaconside (west)+Marston Lane (ahead)	775	-	-	775	-	-
A513 Beaconside (west)+Marston Lane (right)	123	0.33	1	123	0.33	1

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
Common Road (left)	300	0.98	10	300	0.98	10
Common Road (right)	38	0.88	3	38	0.88	3
A513 Beaconside (east) (left)	49	-	-	49	-	-
A513 Beaconside (east) (ahead)	1069	-	-	1069	-	-
A513 Beaconside (east) (ahead)	7	-	-	7	-	-
Common Road+A513 Beaconside (east) (ahead)	1356	-	-	1356	-	-
Common Road+A513 Beaconside (east) (right)	20	0.04	0	20	0.04	0

Table 244.4: Future year baseline performance at A513 Beaconside/Marston Lane junction 2041 future baseline and with the AP2 revised scheme (existing junction) junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00 – 09:00	**2041 future baseline**			**2041 future baseline with AP2 revised scheme (existing junction)**		
Marston Lane (left + right)	52	N/A	27	52	N/A	27
A513 Beaconside (west) (left)	11	-	-	11	-	-
A513 Beaconside (west) (ahead)	1064	-	-	1064	-	-
A513 Beaconside (west) (ahead)	316	-	-	316	-	-
A513 Beaconside (west)+Marston Lane (ahead)	1073	-	-	1073	-	-
A513 Beaconside (west)+Marston Lane (right)	332	0.72	2	332	0.72	2
Common Road (left)	230	2.62	54	230	2.62	54
Common Road (right)	17	2.21	5	17	2.21	5
A513 Beaconside (east) (left)	86	-	-	86	-	-
A513 Beaconside (east) (ahead)	792	-	-	792	-	-
A513 Beaconside (east) (ahead)	9	-	-	9	-	-
Common Road+A513 Beaconside (east) (ahead)	1017	-	-	1017	-	-
Common Road+A513 Beaconside (east) (right)	13	0.04	0	13	0.04	13
17:00 – 18:00	**2041 future baseline**			**2041 future baseline with AP2 revised scheme (existing junction)**		
Marston Lane (left + right)	20	0.71	1	20	0.71	1
A513 Beaconside (west) (left)	15	-	-	15	-	-
A513 Beaconside (west) (ahead)	838	-	-	838	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
A513 Beaconside (west) (ahead)	127	-	-	127	-	-
A513 Beaconside (west)+Marston Lane (ahead)	842	-	-	842	-	-
A513 Beaconside (west)+Marston Lane (right)	133	0.38	1	133	0.38	1
Common Road (left)	325	1.54	64	325	1.54	64
Common Road (right)	41	1.47	9	41	1.47	9
A513 Beaconside (east) (left)	53	-	-	53	-	-
A513 Beaconside (east) (ahead)	1162	-	-	1162	-	-
A513 Beaconside (east) (ahead)	8	-	-	8	-	-
Common Road+A513 Beaconside (east) (ahead)	1438	-	-	1438	-	-
Common Road+A513 Beaconside (east) (right)	20	0.05	0	20	0.05	0

Table 244.5: Future year baseline performance at A513 Beaconside/Marston Lane junction 2027 and 2041 AP2 revised scheme (revised junction) junction capacity assessment

Approach	Flow, PCU/hr	DoS	Q, PCU	Flow, PCU/hr	DoS	Q, PCU
08:00-09:00	**2027 future baseline with AP2 revised scheme (revised junction)**			**2041 future baseline with AP2 revised scheme (revised junction)**		
Marston Lane	48	31%	1	52	34%	2
A513 Beaconside (west)	1276	82%	21	1391	89%	29
A513 Beaconside (west)+Marston Lane	1293	84%	28	1409	99%	32
Common Road	227	81%	7	247	96%	12
A513 Beaconside (east)	814	56%	9	887	60%	10
Common Road+A513 Beaconside (east)	946	56%	6	1031	61%	7
17:00-18:00	**2027 future baseline with AP2 revised scheme (revised junction)**			**2041 future baseline with AP2 revised scheme (revised junction)**		
Marston Lane	19	12%	1	20	13%	1
A513 Beaconside (west)	901	58%	10	980	63%	11
A513 Beaconside (west)+Marston Lane	898	103%	14	976	140%	48
Common Road	337	97%	15	366	141%	66
A513 Beaconside (east)	1125	81%	21	1223	82%	22
Common Road+A513 Beaconside (east)	1375	82%	8	1495	83%	9

3.7.11 The results show that the existing junction operates within capacity in the 2027 baseline in the AM peak and at capacity in the PM peak and that the existing junction operates above capacity in the 2041 baseline in the AM and PM peak periods. In the AM and PM peaks, Common Road has an RFC value in excess of 2.0 and 1.5 and substantial queues in the future baseline.

3.7.12 In the AM peak in the 2041 baseline, the Marston Lane arm reports an RFC value that is unrealistically high and is therefore not reported. The predicted queue length of 27 is a more accurate reflection of the predicted traffic impacts at this junction.

3.7.13 The AP2 revised scheme junction changes result in limited additional queuing on the A513 Beaconside approach arms but with a reduction in queuing on the minor arms. Signalising the junction does not result in substantial queuing on the A513 Beaconside and signals provide for safer turning movements, particularly from the minor arms.

3.7.14 In the AM peak, the revised junction associated with the AP2 revised scheme upgrade will approach capacity and operate at capacity in 2027 and 2041 respectively. In the PM peak the revised junction will continue to operate above capacity.

3.7.15 In the 2041 AM peak, the Marston Lane arm has a DoS of 34% and a queue length of two PCUs with the AP2 revised scheme upgrade, compared to a queue length of 27 PCUs in the baseline. The Common Road arm has a DoS of 96% and a queue length of 12 PCUs with the AP2 revised scheme upgrade, compared with a combined queue length of 59 PCUs in the baseline. Similar reductions on Common Road are shown during the PM peak as a result of the AP2 revised scheme upgrade.

3.7.16 The introduction of signal control will also enhance the safe operation for right turning traffic through the junction.

A34 Stone Road/Yarlet School

3.7.17 The AP2 revised scheme includes a permanent upgrade to an all-movement priority junction, including carriageway widening, a kerbed right-turn lane and the relocation of the junction to the north.

3.7.18 Tables 244.6 and 244.7 summarise the results of the changes to the performance of the existing junction as a result of the AP2 revised scheme in 2027 and 2041 respectively. Table 244.8 summarises the results of the changes to the performance of the revised junction as a result of the AP2 revised scheme upgrade in 2027 and 2041.

3.7.19 As noted in Section 3.2, the school PM peak of 15:00 to 16:00 has been assessed to consider the peak vehicle demand at the junction.

Table 244.6: A34 Stone Road/Yarlet School 2027 future baseline and with the AP2 revised scheme (existing junction) junction capacity assessment

Approach	**Flow, PCU/hr**	**RFC**	**Q, PCU**	**Flow, PCU/hr**	**RFC**	**Q, PCU**
08:00-09:00	**2027 future baseline**			**2027 future baseline with AP2 revised scheme (existing junction)**		
Yarlet School (left)	102	0.48	1	102	0.48	1
A34 Stone Road (south) (ahead)	828	-	-	828	-	-
A34 Stone Road (north) (left)	120	-	-	120	-	-

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
A34 Stone Road (north) (ahead)	1395	-	-	1395	-	-
15:00-16:00	**2027 future baseline)**			**2027 future baseline with AP2 revised scheme (existing junction)**		
Yarlet School (left)	42	0.15	0	42	0.15	0
A34 Stone Road (south) (ahead)	1023	-	-	1023	-	-
A34 Stone Road (north) (left)	40	-	-	40	-	-
A34 Stone Road (north) (ahead)	827	-	-	827	-	-

Table 244.7: A34 Stone Road/Yarlet School 2041 future baseline and with the AP2 revised scheme (existing junction) junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00-09:00	**2041 future baseline**			**2041 future baseline with AP2 revised scheme (existing junction)**		
Yarlet School (left)	111	0.56	1	111	0.56	1
A34 Stone Road (south) (ahead)	902	-	-	902	-	-
A34 Stone Road (north) (left)	131	-	-	131	-	-
A34 Stone Road (north) (ahead)	1519	-	-	1519	-	-
15:00-16:00	**2041 future baseline)**			**2041 future baseline with AP2 revised scheme (existing junction)**		
Yarlet School (left)	46	0.17	0	46	0.17	0
A34 Stone Road (south) (ahead)	1129	-	-	1129	-	-
A34 Stone Road (north) (left)	44	-	-	44	-	-
A34 Stone Road (north) (ahead)	913	-	-	913	-	-

Table 244.8: A34 Stone Road/Yarlet School 2027 and 2041 AP2 revised scheme (revised junction) junction capacity assessment

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
08:00-09:00	**2027 future baseline with AP2 revised scheme (revised junction)**			**2041 future baseline with AP2 revised scheme (revised junction)**		
Yarlet School (left)	46	0.13	0	51	0.15	0
Yarlet School (right)	56	0.25	0	61	0.33	0
A34 Stone Road (south) (ahead + right)	60	0.15	0	66	0.18	0
A34 Stone Road (south) (ahead)	828	-	-	902	-	-
A34 Stone Road (north) (left)	77	-	-	84	-	-
A34 Stone Road (north) (ahead)	1395	-	-	1519	-	-
15:00-16:00	**2027 future baseline with AP2 revised scheme (revised junction)**			**2041 future baseline with AP2 revised scheme (revised junction)**		
Yarlet School (left)	19	0.04	0	21	0.04	0

Approach	Flow, PCU/hr	RFC	Q, PCU	Flow, PCU/hr	RFC	Q, PCU
Yarlet School (right)	23	0.07	0	25	0.09	0
A34 Stone Road (south) (ahead + right)	18	0.04	0	20	0.04	0
A34 Stone Road (south) (ahead)	1023	-	-	1129	-	-
A34 Stone Road (north) (left)	22	-	-	24	-	-
A34 Stone Road (north) (ahead)	827	-	-	913	-	-

3.7.20 The results show that the existing junction will operate within capacity in the 2027 and 2041 baseline. The AP2 revised scheme will not increase the 2027 and 2041 baseline traffic and will have no impact on the performance of the junction.

3.7.21 The AP2 revised scheme upgrade junction will operate within capacity with minimal RFC values and queuing, while accommodating right turn manoeuvres and reducing the travel distance for those accessing and exiting Yarlet School.

Parking and loading

3.7.22 The impacts on parking during operation are reported in Section 8.6 of the main TA. Paragraph 8.6.33 – 8.6.35 of the main TA is replaced by:

> "The AP2 revised scheme will provide additional land to fully mitigate the loss of parking at the Staffordshire Showgrounds. As a result, there will be no permanent loss of parking. The replacement parking is located adjacent to the existing Showgrounds and to the east of the A518 Weston Road removing any need for users of the replacement parking to cross the A518 Weston Road."

Pedestrian, cyclist and equestrian

3.7.23 The impact on pedestrians, cyclists and equestrians during construction are reported in Section 8.6 of the main TA. This section of the main TA is unchanged.

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