London Borough of Bexley Local Plan

Strategic transport modelling

A282 / M25 corridor (J1a, J1b and J2)

A2 corridor (A2 / A2018 junction and Bean junction)

2nd DRAFT FOR COMMENT

On behalf of

LONDON BOROUGH OF BEXLEY
Trusted by Bexley residents

Project Ref: 332410519 | Rev: AA | Date: March 2022

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Project Name: **London Borough of Bexley - Local Plan**

Project Ref: **332410519**

Report Title: **Strategic transport modelling – A282 / M25 corridor (J1a, J1b and J2)**

Date: **8th March 2022**

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For and on behalf of Stantec UK Limited				

Revision	Date	Description	Prepared	Reviewed	Approved

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Appendices

1 Introduction

1.1.1 Stantec have been appointed by the London Borough of Bexley (LB Bexley) to provide strategic modelling evidence in support of their Regulation 19 draft Local Plan

1.1.2 The objective of the strategic modelling appointment is to address comments made by National Highways (NH) during the Regulation 18 stage.

1.1.3 NH advised that they require an assessment of the cumulative effect of non consented development within Bexley, that will form part of the emerging Local Plan, upon the strategic road network outside of the LB Bexley boundary, namely Junctions 1a, 1b and 2 of the M25.

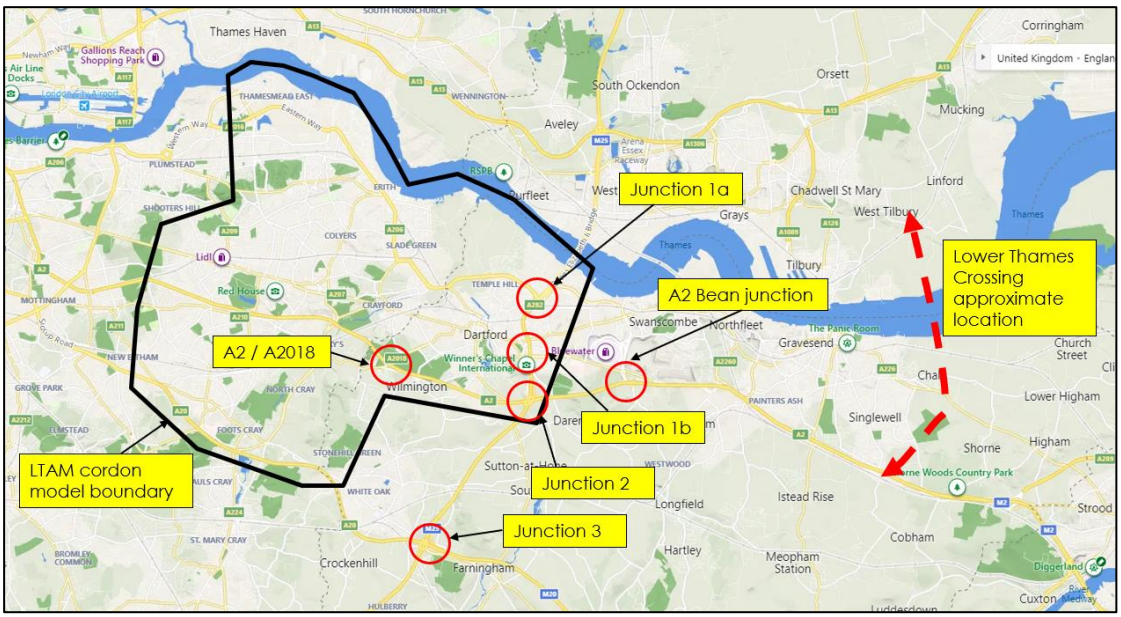
1.1.4 NH requested that this should also consider scenarios with and without the Lower Thames Crossing (LTC).

1.1.5 Subsequently, a draft Strategic Transport Modelling Report was submitted to NH for comment during January 2022. Comments were received from NH and additional discussion, modelling and assessment has been completed and included within the following report to respond to NH requests. This includes additional assessment and information for the M25 J3 and the A2 corridor at the A2018 Old Bexley Lane junction and Bean junction.

1.2 LB Bexley cordon of the Lower Thames Area Model

1.2.1 The donor model used for this study is the LTAM (Lower Thames Area Model) which has been developed by NH to assess the LTC scheme. It has a base year of 2016, with a number of forecast years comprising 2029, 2036, 2044 and 2051.

1.2.2 LB Bexley have been provided with a LB Bexley cordon area of the Lower Thames Area Model (LTAM) by NH during July 2021 as illustrated by the black polygon below. This model forms the basis of the assessment described within this document.



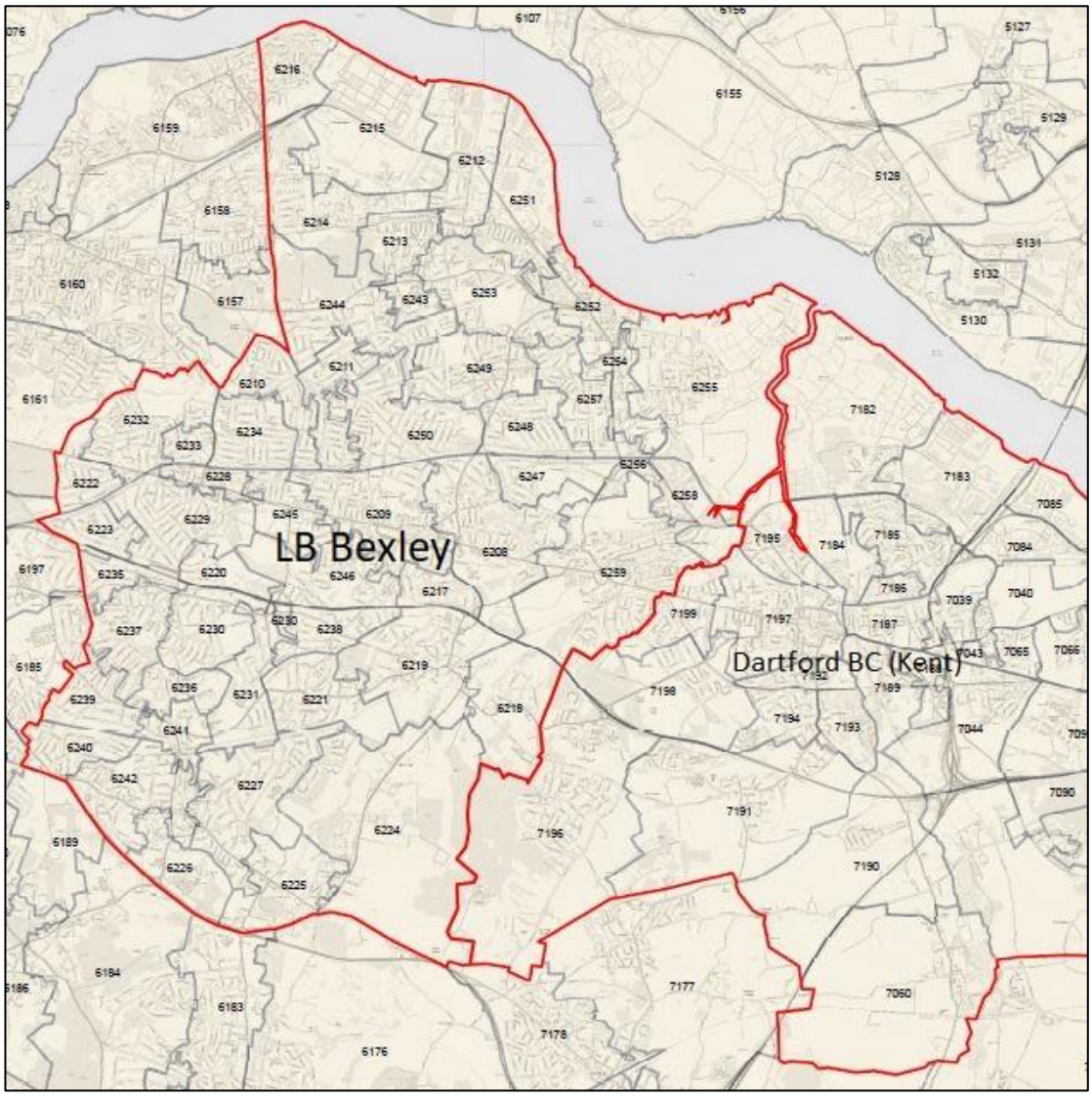
1.2.3 The cordon includes the geography of LB Bexley, and the routes to the M25 / A282 corridor under consideration, particularly the A2 strategic route to M25 J2, and the secondary routes via the 'Dartford northern bypass' A206 (to J1a) and A207 (to J1b).

1.2.4 Therefore, the cordon also includes an area of Dartford Borough (county of Kent) between the London Borough of Bexley and the M25.

1.2.5 The cordon has the following zoning set-up:

- LB Bexley has 52 zones, covering the key areas of the borough.
- 25 zones are used to represent the included portion of Dartford Borough
- 5 zones are included from London Borough of Greenwich
- There are 47 external zones

1.2.6 The zone plan is shown below.



1.2.7 On the basis that only the NH strategic network requires assessment, the cordoned LTAM models have not been adjusted with respect to network coding or zone sizing within the LB Bexley boundary. It has been assumed that the strategic highway network is coded to an

appropriate level of detail and to NH's satisfaction within the LTAM to undertake such an assessment.

1.2.8 The LTAM adopts an 0700-0800 morning peak hour and 1700-1800 evening peak hour on the basis that these represent the peak hours for the Strategic Road Network (SRN). This study adopts these assessment hours on the basis that NH require assessment of the SRN, rather than reverting to an 0800-0900 morning peak hour which would be more appropriate for a Local Road Network (LRN) assessment.

1.2.9 The LTAM uses 10 vehicle classes. For the purposes of this study these have been combined to 3 user classes, those being car, LGV and HGV. This simplifies the data handling of output data from the SATURN model and has been agreed with NH.

1.2.10 Stantec's remit is to review and update the LTAM to create a 2038 Reference Case model and a 2038 "with Local Plan" model. The purpose is to assess the potential effect of the LB Bexley Local Plan on the SRN. In addition, a sensitivity assessment has also been completed that considers the potential for mode shift away from private car in accordance with the Mayor's Transport Strategy and the London Borough of Bexley Local Implementation Plan.

1.2.11 The following report has been prepared to set out the proposed methodology and parameters for assessing (against a Reference Case model) a Local Plan option with respect to the traffic generation and distribution potential effects on the SRN.

1.3 This document

1.3.1 Prior to progressing the assessment, a scoping exercise was conducted and agreed with NH. Further correspondence and agreement with NH was achieved following submission of the draft report. The scope and methodology adopted within this study reflects the scoping exercise and discussions had with NH officers.

1.3.2 This document is structured in the following way.

- Section 2 presents the 2016 base year model flows for reference.
- Section 3 describes the land use quanta assessed for each scenario.
- Section 4 considers the traffic generation and distribution parameters for the various land uses assessed.
- Section 5 considers the traffic generation and distribution parameters for the various land uses assessed for the sensitivity assessment.
- Section 6 summarises the SATURN assignment outputs.
- Sections 7 to 13 summarise the outputs for J1a, J1b and J2
- Sections 14 to 22 summarise the merge and diverge assessments.
- Section 23 summarises the report

2 Base year and baseline

2.1 2016 base year

2.1.1 The LB Bexley cordon model has a 2016 base year. Data has been extracted from the base year model and presented at Appendix A within highway network figures for the A282 / M25 corridor and the A2 / A2018 junction.

2.1.2 Data presented comprises :

- Demand flows (in vehicles). The LTAM outputs PCUs and this has been converted to vehicles by assuming a PCU factor of 2.0 for HGVs and 1.0 for other vehicle classes.
- Link delay (in seconds)
- Link V/C statistic (in percent). This is a measure of the ratio of Volume to Capacity and provides a measure of how close (or in excess) the link is to capacity.
- The above data is presented for AM 0700-0800 and PM 1700-1800.

2.1.3 The tables below provide a headline summary of traffic movements through the M25 cordon assessed and for each of the junctions assessed on the M25 corridor and A2 corridor.

Cordon flows (inbound)	0700-0800	1700-1800
M25 corridor (Jcts 1a-2)	24,946	25,034

2.1.4 The modelling data shows that during the morning peak hour a total of 24,946 vehicles enter a cordon drawn around junctions 1a, 1b and 2 of the A282 / M25 corridor. During the evening peak hour the total is 25,034 vehicles.

2.1.5 The table below summarises the number of vehicles using the SRN corridors as predicted by the 2016 LTAM.

Junction throughput	0700-0800		1700-1800	
	NB / EB	SB / WB	NB / EB	SB / WB
M25 north (tunnels / bridge)	5756	6110	5401	5839
M25 south (J2-J3)	5286	6005	4947	4937
A2 west	3767	4946	5338	4033
A2 east	4304	6320	7219	5142

2.1.6 It is noted that the AM peak hour experiences higher traffic flows on the A282 / M25 corridor than the PM peak hour. With respect to the A2 corridor it is noted that traffic flows are tidal in nature and that the dominant flow tends to be higher in the PM peak hour than the AM peak hour.

2.1.7 The table below summarises the volume of vehicles passing through each junction in the 2016 base year morning and evening peak hours.

Junction throughput	0700-0800		1700-1800	
	Inbound	Outbound	Inbound	Outbound
Junction 1a - west roundabout	2370	2370	1930	1930
Junction 1a - east roundabout	2938	2938	2746	2746
Junction 1b roundabout	3023	3023	3137	3137
Junction 2 roundabout	4808	4808	4642	4642

2.1.8 It is noted that traffic flows are generally higher during the morning peak hour than the evening peak hour, with the exception of junction 1b.

2.1.9 Junction 2 experiences the highest traffic throughput and this relates to its role of also serving the strategic A2 corridor.

2.2 2038 baseline

2.2.1 The LTAM model has been interpolated between the years 2036 and 2044 to derive a 2038 baseline model.

2.2.2 This 2038 model is then adapted to derive a 2038 Reference Case model, and Local Plan scenario model as described later within this report.

2.2.3 The 2038 forecast year models consider scenarios with both the proposed Lower Thames Crossing present, and with it omitted.

3 Land use quanta

3.1.1 The following section summarises the Reference Case and Local Plan land use quanta adopted for assessment purposes.

3.2 Reference Case land use quanta

3.2.1 The Reference Case scenario has been initially based upon the Uncertainty Log (UL) that underpins the LTAM. Each of the UL sites has been reviewed and identified as already having planning permission. Hence each UL site is appropriate to include within the Reference Case.

3.2.2 In addition to the UL sites, a number of other sites have been included within the Reference Case on the basis that they have been granted planning permission in recent years (ie post UL site identification). These additional sites have been advised by LB Bexley and comprise those included in Appendix B.

3.2.3 The table below summarises the quanta allowed for within the Reference Case model. The manner in which the traffic generation associated with the additional land use quanta has been added to the LTAM is summarised later within this report.

Land use (resi units or m2)	UL Quantum	Uplift to achieve Reference Case	Reference Case
Flats	877	269	1146
Houses	3320	38	3358
Residential	**4197**	**307**	**4504**
B1a Office	26494	-3076	23418
B1c Light Industrial	15156	22070	37226
B2 Industrial	59725	9452	69177
B8 Warehousing	65883	20334	86217
Employment	**167258**	**48780**	**216038**
Local shops	1646	0	1646
Retail Park-incl food	4326	0	4326
Retail	**5972**	**0**	**5972**
Pub Restaurant	3534	0	3534
Hospitality	**3534**	**0**	**3534**
Leisure - centre	4370	0	4370
Community centre	2364	1349	3713
Leisure	**6734**	**1349**	**8083**
Primary School	22374	3308	25682
Secondary School	0	0	0
Education	**22374**	**3308**	**25682**
Care home (residents)	0	0	0
Hospital	5557	0	5557

Clinic	0	0	0
Health / Care	**5557**	**0**	**5557**
Sui Generis	325	-1131	-806
Sui Generis	**325**	**-1131**	**-806**

3.3 Local Plan scenario - residential

3.3.1 To determine the additional residential allowance (over and above the Reference Case) to represent the Local Plan scenario, the following principles / assumptions are applied:

- The Regulation 19 Local Plan includes 23 site allocations for residential use as summarised in Appendix C of the Regulation 19 Local Plan. These comprise a total of 4733 units and have been assigned to the model zone that they sit within.
- LB Bexley have confirmed that they will require 305 “windfall” units per annum between 2022 and 2038. This equates to a total of 5185 units. These windfall units have been allocated equitably between the LB Bexley Sustainable Development Locations as defined by Figure 1 in the regulation 19 Local Plan.
- The above principles result in a total of 9918 residential units associated with the Local Plan.
- Based upon the SHMA document (p.159 Table 8.7) an assumption of 19.2% flats and 80.8% houses has been assumed as the residential split.

3.3.2 The resultant residential development for the Local Plan (ie over and above the Reference Case) is summarised (by LTAM zone) at Appendix C

3.4 Local Plan scenario – non residential

3.4.1 To determine the non residential allowance (over and above the Reference Case) to represent the Local Plan scenario, the following principles / assumptions are applied:

- LB Bexley advised that an assessment should comprise a total of 10,000 jobs associated with the Local Plan between 2022 and 2036. This was extrapolated forward by a further two years to 2038, resulting in 11,333 jobs (assuming 667 jobs per annum).
- Appendix 2 of the Employment Land Review document provides a breakdown of the jobs into sectors and land use type (office, industrial, distribution and non employment use). This has been used to classify each job into one of the land uses listed below.
    - Office - 70% assumed in town centre sites as per the Employment Land Review (para 3.57). The remaining 30% are assumed to be located in Sustainable Development Locations
    - Industrial - assumed to be located in Strategic Industrial Locations.
    - Light industrial - assumed to be located in Strategic Industrial Locations.
    - Distribution - assumed to be located in Strategic Industrial Locations.
    - A3 / A4 / A5 pub / rest – assumed to be located in town centre zones.
    - Primary school – assumed to be located in education zones.
    - Secondary school – assumed to be located in education zones.

- GP / Medical centre - assumed to be located in Sustainable Development Locations.
- Local shops - assumed to be located in Sustainable Development Locations and town centre zones.
- Leisure centre – assumed to be located in town centre zones.
- Residential care home - assumed to be located in Sustainable Development Locations.

- For the purposes of assessment, the number of jobs for each land use has been converted to a land use floor area to be consistent with the TRICS units agreed for traffic generation. The following assumptions / principles have been adopted for this conversion:
  - Office – 12.9m^2 per employee calculated from Employment Land Review tables 3.1 and 3.3
  - Industrial – 46.5m^2 per employee calculated from Employment Land Review tables 3.1 and 3.3
  - Light industrial – 46.5m^2 per employee calculated from Employment Land Review tables 3.1 and 3.3
  - Distribution – 74.9m^2 per employee calculated from Employment Land Review tables 3.1 and 3.3
  - A3 / A4 / A5 pub / rest – 15m^2 per employee from HCA 3rd edition (2015)
  - Primary school – 36m^2 per employee based upon TRICS data
  - Secondary school – 99m^2 per employee based upon TRICS data
  - GP / Medical centre – 10,500 m^2 total based upon TRICS data (jobs vs floorspace)
  - Local shops – 15m^2 per employee from HCA 3rd edition (2015)
  - Leisure centre – 65m^2 per employee from HCA 3rd edition (2015)
  - Residential care home – 1.42 employees per resident based upon data from carehome.co.uk

3.4.2 The resultant non residential development associated with the Local Plan is summarised (by LTAM zone) at Appendix C.

3.5 Uplift of Reference Case to Local Plan Scenario

3.5.1 The Local Plan land use quanta has been added to the Reference Case land use quanta to achieve the Reference Case + Local Plan scenario. This is summarised in the table below.

Land use (resi units or m2)	Reference Case	Uplift to achieve Local Plan scenario	Reference Case + Local Plan scenario
Flats	1146	1904	3050
Houses	3358	8014	11372
Residential	**4504**	**9918**	**14422**
B1a Office	23418	44356	67774
B1c Light Industrial	37226	50751	87977
B2 Industrial	69177	43724	112901
B8 Warehousing	86217	117940	204157

Employment	**216038**	**256771**	**472809**
Local shops	1646	18700	20346
Retail Park-incl food	4326	0	4326
Retail	**5972**	**18700**	**24672**
Pub Restaurant	3534	9758	13292
Hospitality	**3534**	**9758**	**13292**
Leisure - centre	4370	11639	16009
Community centre	3713	0	3713
Leisure	**8083**	**11639**	**19722**
Primary School	25682	23959	49641
Secondary School	0	45040	45040
Education	**25682**	**68999**	**94681**
Care home (residents)	0	487	487
Hospital	5557	0	5557
Clinic	0	11900	11900
Health / Care	**5557**	**12387**	**17944**
Sui Generis	-806	0	-806
Sui Generis	**-806**	**0**	**-806**

4 Traffic generation and distribution

4.1.1 The following section considers the traffic generation parameters extracted from TRICS for inclusion to the modelling options / scenarios. This follows comments received from NH during the scoping exercise as follows:

"We are content that TRICS will be used as the source of trip rates for the assessment. LB Bexley, has relatively high car usage and lower public transport use than the London average through its location as an Outer London Borough and its remoteness from the Underground network. Non-London trip rates would provide a robust assessment although should you wish to use London sites selectively and with appropriate justification this should be acceptable. We would need to review and agree the proposed trip rates."

4.1.2 Further to the scoping exercise and additional comments received in relation to the draft report, further exchanges were had with NH in respect of trip generation rates. Further agreement was reached with respect to the trip generation rates used for a number of land uses, incorporating London sites.

4.2 Methodology

4.2.1 On the basis of the correspondence exchanged with NH and the NH advice above, the following approach has been adopted :

- TRICS data for sites within Greater London are extracted.
- This has then been filtered for outer London Boroughs
- Non-town centre or edge of centre sites are excluded
- Weekday data only is extracted.
- Data from at least 5 sites is sought for each land use.
- The TRICS data extracted through this approach is used for sites containing that land use regardless of location within Bexley .

4.2.2 The residential land use is based upon "Mixed private / affordable housing" on the basis that policy is to achieve 50% affordable residential units. Flats have been assumed as "private" on the basis that insufficient data is available for "affordable" flats.

4.2.3 Where sufficient sample size can not be achieved, then the criteria is widened to include all sites within England as summarised below. This will result in a robust approach.

- Sites in England (excluding London) are selected.
- Weekday data only is used.
- Vehicular trip generation rates are extracted only.
- Default date range used. Where sample size needs to be expanded then older data may be used. This will tend to be a robust assumption as trip generation rates have typically reduced over time.
- Sites with no Travel Plan implemented are selected.
- Suburban and Edge of Town sites used as a proxy for suburban locations.

- Town Centre and Edge of Town Centre sites used as a proxy for urban locations. Where an insufficient sample size is available assuming the criteria above, the suburban trip generation rate has been adopted as a robust alternative.

- The criteria above is followed to try and achieve a sample size of at least 5 sites.

4.3 TRICS data

4.3.1 Using the above parameters, trip rates have been extracted from the TRICS database and are summarised in the table below, and included in full as Appendix D (urban) and Appendix E (suburban).

4.3.2 The assessment completed relates to a morning peak hour of 0700-0800 and an evening peak hour of 1700-1800. This is consistent with the LTAM model hours and reflects the peak hours on the strategic highway network, including the A282 / M25 corridor.

4.3.3 The tables below show the adopted trip generation rates from urban and rural locations.

Urban location	**0700-0800**			**1700-1800**		
	In	**Out**	**2 Way**	**In**	**Out**	**2 Way**
Private Flats	0.038	0.108	0.146	0.120	0.076	0.196
Priv. / Afford. Housing	0.055	0.177	0.232	0.179	0.102	0.281
Office	0.527	0.064	0.591	0.076	0.757	0.833
Light industrial	0.172	0.042	0.214	0.063	0.236	0.299
General industrial	0.635	0.361	0.996	0.257	0.624	0.881
Warehousing *	0.184	0.071	0.255	0.069	0.182	0.251
Local Retail**	2.696	2.400	5.096	4.015	4.344	8.359
Retail Park Including Food*	0.497	0.329	0.826	2.264	2.115	4.379
Pub / Restaurant	0.000	0.000	0.000	1.361	0.749	2.110
Leisure Centre	0.545	0.504	1.049	0.963	0.960	1.923
Community Centre	0.196	0.065	0.261	0.749	0.513	1.262
Primary school*	1.009	0.374	1.383	0.394	0.584	0.978
Secondary school*	0.421	0.116	0.537	0.152	0.209	0.361
Care home	0.120	0.080	0.200	0.050	0.125	0.175
Hospital*	1.031	0.373	1.404	0.388	0.972	1.360
Clinic	0.140	0.000	0.140	0.410	0.821	1.231
Sui Generis	0.461	0.066	0.527	0.431	1.102	1.533

**Suburban rate used due to lack of urban data*
***Neighbourhood centre sites used for local shops*

Suburban location	0700-0800			1700-1800		
	In	Out	2 Way	In	Out	2 Way
Private Flats	0.038	0.108	0.146	0.120	0.076	0.196
Priv. / Afford. Housing	0.055	0.177	0.232	0.179	0.102	0.281
Office	0.527	0.064	0.591	0.076	0.757	0.833
Light industrial	0.172	0.042	0.214	0.063	0.236	0.299
General industrial	0.635	0.361	0.996	0.257	0.624	0.881
Warehousing	0.184	0.071	0.255	0.069	0.182	0.251
Local Retail**	2.696	2.400	5.096	4.015	4.344	8.359
Retail Park Including Food*	0.497	0.329	0.826	2.264	2.115	4.379
Pub / Restaurant	0.000	0.000	0.000	3.580	1.977	5.557
Leisure Centre	0.545	0.504	1.049	0.963	0.960	1.923
Community Centre	0.000	0.000	0.000	0.475	0.339	0.814
Primary school*	1.009	0.374	1.383	0.394	0.584	0.978
Secondary school*	0.421	0.116	0.537	0.152	0.209	0.361
Care home	0.082	0.032	0.114	0.036	0.050	0.086
Hospital*	1.031	0.373	1.404	0.388	0.972	1.360
Clinic	0.603	0.134	0.737	1.305	2.246	3.551
Sui Generis	0.361	0.155	0.516	0.431	0.959	1.390

***Neighbourhood centre sites used for local shops*

4.3.4 Using the information within the tables above, the trip rates can be applied to the different land uses and floor areas coming forward within the LB Bexley Local Plan to determine the total traffic generated from each of those locations.

4.4 Potential traffic generation

4.4.1 The potential traffic generation (2 way) from each scenario has been calculated by multiplying the land use quanta by the appropriate land use urban / suburban trip generation rate.

4.4.2 A summary of the calculated traffic generation is shown in the tables.

	0700-0800			1700-1800		
	Reference Case	Local Plan	Diffs	Reference Case	Local Plan	Diffs
Private Flats	167	445	278	225	598	373
Priv. / Afford. Housing	779	2638	1859	944	3195	2252

Office	138	401	262	195	565	369
Light industrial	80	188	109	111	263	152
General industrial	689	1124	435	609	995	385
Warehousing *	220	521	301	216	512	296
Local Retail**	84	1037	953	138	1701	1563
Retail Park Including Food*	36	36	0	189	189	0
Pub / Restaurant	0	0	0	182	444	262
Leisure Centre	46	168	122	84	308	224
Community Centre	0	0	0	30	30	0
Primary school*	355	687	331	251	485	234
Secondary school*	0	242	242	0	163	163
Care home	0	96	96	0	84	84
Hospital*	78	78	0	76	76	0
Clinic	0	19	19	0	157	157
Sui Generis	-4	-4	0	-11	-11	0
Total	**2668**	**7676**	**5008**	**3239**	**9753**	**6514**

4.4.3 It is noted from the table above that the Local Plan option is predicted to generate more vehicle trips than the Reference Case scenario.

4.4.4 The additional vehicle movements (associated with the Local Plan development) during the morning peak hour amounts to 5008 vehicles (2 way) and the additional vehicle movements during the evening peak hour amounts to 6514 vehicles (2 way).

4.5 Distribution

4.5.1 The distribution of the Reference Case and Local Plan traffic generation is based upon the existing distribution within the LTAM matrices. In effect, the rows and columns of the LTAM matrices were factored to represent the uplift due to either Reference Case traffic or Local Plan traffic.

4.5.2 With respect to the local retail land use and primary school use, whilst the distribution is based upon the existing distribution within the LTAM matrices, a distance constraint has been applied as described below. This has been based upon a distance skim from the LTAM to determine a matrix of distances between each OD pair.

4.5.3 With respect to local retail journeys, reference was made to “The Local Shop Report 2020” which confirms the distances that people travel to local retail. Based upon this the following proportions were adopted :

- 51% less than ¼ mile (402m)

- 29% between ¼ mile and 1 mile (1,609m)
- 21% between 1 mile and 2 miles (3,219m)

4.5.4 The above percentages were applied as weightings to each OD pair between 0m and 3219m, whilst a weighting of 0 was used for distances greater than this. It is considered that this is a reasonable assumption on the basis that local shops typically serve local communities and would not be expected to generate long distance journeys.

4.5.5 With respect to primary school journeys, reference was made to National Travel Statistics data which confirm the typical distances that primary school children travel to school. Based upon this the following proportions were adopted :

- 20% less than 1 mile (1,609m)
- 36% between 1 mile and 2 miles (3,219m)
- 31% between 2 mile and 5 miles (8047m)
- The remainder uses a cut off of 10 miles (16,940m)

4.5.6 The above percentages were applied as weightings to each OD pair between 0m and 16,940m, whilst a weighting of 0 was used for distances greater than this.

4.6 Vehicle trip matrix totals – without Lower Thames Crossing

4.6.1 The trip generation figures for Reference Case and Local Plan scenario are applied to the baseline forecast matrices and assigned to the network. This process is summarised later in the report.

4.6.2 The tables below summarise the derived trip matrix totals (in PCUs) adopted for assessment purposes without the Lower Thames Crossing included. The 2016 base model totals are also included for reference.

	Base (2016)	Reference Case (2038)	Local Plan (2038)
AM peak hour	59356	75097	79193
PM peak hour	64753	84218	89412

4.6.3 It is noted that :

- The Local Plan matrix is higher than the Reference Case for both peak hours (around 5.5% in the morning peak and 6.2% in the evening peak).

4.7 Vehicle trip matrix totals – with Lower Thames Crossing

4.7.1 The tables below summarise the derived trip matrix totals (in PCUs) adopted for assessment purposes with the Lower Thames Crossing included. The 2016 base model totals are also included for reference.

	Base (2016)	Reference case (2038)	Local Plan (2038)
AM peak hour	59356	72825	76925
PM peak hour	64753	81579	86777

4.7.2 It is noted that :

- The Local Plan matrix is higher than the Reference Case for both peak hours (around 5.6% in the morning peak and 6.4% in the evening peak).
- The trip matrices are higher in the “without LTC” scenario than the “with LTC” scenario. This is inherent in the LTAM model provided by National Highways and is assumed to relate to the different distribution of traffic between the scenarios.

5 Traffic generation and distribution – Sensitivity

5.1.1 The following section considers a potential mode shift away from the private car and towards sustainable transport modes. Such a mode shift would be consistent with strategy and policy documents as described below.

5.2 Targets

5.2.1 The Mayor's Transport Strategy (MTS) sets out the need to generate a mode shift away from the private car towards sustainable transport modes with the aim of 80% of all trips in London to be made on foot, by cycle or using public transport by 2041.

5.2.2 The LB Bexley Local Implementation Plan (LIP) sets out LB Bexley's response to achieving the aims of the MTS. It states that currently, 57% of journeys made by LB Bexley residents are by car. The trajectory is to reduce this to 37% by 2041.

5.2.3 Achieving a 37% car mode share by 2041 would mean achieving 39.5% by 2038 (the Local Plan horizon). This would mean a reduction in car trips of 31.9% by 2038. For the purpose of this sensitivity assessment an assumption of a 30% reduction is made.

5.3 Sensitivity test assumptions

5.3.1 The sensitivity assessment assumes that a 30% reduction in traffic generation can be applied to all Local Plan traffic generation for trips that remain within Bexley (ie those with an origin and destination within Bexley) and those trips between Bexley and other London Boroughs. This will capture the relatively shorter distance (local) trips and urban (London) trips that are more likely to transfer to walking, cycling and public transport.

5.3.2 With respect to all other Local Plan journeys (those external to Bexley and Greater London) a reduction of 10% has been assumed. This is on the basis that Travel Plans for new development sites typically use a 10% reduction in vehicle generation as a starting position target, regardless of trip length.

5.3.3 The above assumptions are considered reasonable for the purposes of this assessment in the context of policy and strategy targets. The above assumptions are also considered robust insofar as they are only being applied to journeys to and from new Local Plan sites. In practise, the policy and strategy targets have been set for all journeys, including existing (background / baseline) journeys to and from established developments within Bexley.

5.4 Methodology

5.4.1 To allow for the above mode shift assumptions the following exercise has been completed:

- The difference between the Local Plan matrix and the Reference Case matrix has been calculated for each OD cell.
- A reduction of 30% has been applied to the differences for OD cells that represent wholly internal Bexley trips.
- A reduction of 30% has been applied to the differences for OD cells that occur between Bexley and other London Boroughs.
- A reduction of 10% has been applied to the differences for all other journeys to and from Bexley, generally journeys between Bexley and the east and south.

- The updated differences matrix is added to the Reference Case matrix to create the Sensitivity test matrix.

5.5 Vehicle trip matrix totals (sensitivity) – without Lower Thames Crossing

5.5.1 The tables below summarise the derived trip matrix totals (in PCUs) adopted for sensitivity assessment purposes without the Lower Thames Crossing included. The 2016 base model totals are also included for reference.

	Base (2016)	Reference Case (2038)	Local Plan (2038)	Local Plan Sensitivity (2038)
AM peak hour	59356	75097	79193	78223
PM peak hour	64753	84218	89412	88142

5.5.2 It is noted that :

- The Local Plan sensitivity matrix is higher than the Reference Case for both peak hours (around 4.2% in the morning peak and 4.5% in the evening peak).

5.6 Vehicle trip matrix totals (sensitivity) – with Lower Thames Crossing

5.6.1 The tables below summarise the derived trip matrix totals (in PCUs) adopted for sensitivity assessment purposes with the Lower Thames Crossing included. The 2016 base model totals are also included for reference.

	Base (2016)	Reference Case (2038)	Local Plan (2038)	Local Plan Sensitivity (2038)
AM peak hour	59356	72825	76925	75957
PM peak hour	64753	81579	86777	85509

5.6.2 It is noted that :

- The Local Plan sensitivity matrix is higher than the Reference Case for both peak hours (around 4.3% in the morning peak and 4.8% in the evening peak).
- The trip matrices are higher in the “without LTC” scenario than the “with LTC” scenario. This is inherent in the LTAM model provided by National Highways and is assumed to relate to the different distribution of traffic between the scenarios.

6 Assignments and output - overview

6.1.1 The key objective of Stantec's appointment is to provide London Borough of Bexley with modelling output that can demonstrate to NH the potential effect of their Local Plan on the A282 / M25 corridor between Junctions 1a and 2. A further request was made by NH to provide information with respect to the M25 J3 and the A2 / A2018 junction and A2 Bean junction.

6.1.2 The following data has been output from the LTAM models and input to spreadsheets for analysis.

- Demand flow data
- Link delay
- V / C statistic

6.1.3 Each of the above outputs has been presented for the following scenarios:

- 2016 base year (AM and PM)
- 2038 Reference Case – without LTC (AM and PM)
- 2038 Reference Case – with LTC (AM and PM)
- 2038 Local Plan – without LTC (AM and PM)
- 2038 Local Plan – with LTC (AM and PM)
- 2038 Local Plan – without LTC (AM and PM) – Sensitivity assessment
- 2038 Local Plan – with LTC (AM and PM) – Sensitivity assessment

6.1.4 Appendices F to J contain figures showing the above outputs. The findings are considered and tabulated below.

6.2 Overview

6.2.1 The tables below provide a summary of the demand flow (in vehicles) using the A282 / M25 corridor, in effect a cordon total incorporating Junctions 1a, 1b and 2. The top table summarises the core assessment whilst the bottom table summarises the sensitivity assessment.

	0700-0800 Cordon vehicle flows		1700-1800 Cordon vehicle flows	
	No LTC	**With LTC**	**No LTC**	**With LTC**
Reference	30695	29175	32909	31267
Local Plan	31225	29759	33469	31864
Differences	529	584	560	597

% differences	1.7%	2.0%	1.7%	1.9%

	0700-0800 Cordon vehicle flows		1700-1800 Cordon vehicle flows	
	No LTC	**With LTC**	**No LTC**	**With LTC**
Reference	30695	29175	32909	31267
Local Plan sensitivity	31173	29683	33413	31797
Differences	478	508	505	531
% differences	1.6%	1.7%	1.5%	1.7%

6.2.2 It is noted from the above table that the implementation of the Local Plan development is predicted to increase flows passing through the J1a to J2 cordon between 1.5% and 2.0% dependent upon which scenario is being considered. This equates to 478 to 597 vehicles.

6.3 Link flows

6.3.1 The tables below provide a summary of the demand flow (in vehicles) using the M25 and A2 corridors.

M25 north Core assessment	Reference	Local Plan	Diffs	% Diffs
0700-0800 No LTC	13760	13822	62	0.4%
0700-0800 With LTC	11873	11956	83	0.7%
1700-1800 No LTC	13947	14011	64	0.5%
1700-1800 With LTC	11604	11682	78	0.7%

M25 north Sensitivity assessment	Reference	Local Plan	Diffs	% Diffs
0700-0800 No LTC	13760	13816	56	0.4%
0700-0800 With LTC	11873	11948	75	0.6%
1700-1800 No LTC	13947	14005	58	0.4%
1700-1800 With LTC	11604	11674	70	0.6%

6.3.2 It is noted from the above table that the Local Plan leads to an increase of 0.4% to 0.7% in mainline demand flows on the M25 north of J1a (A282 Dartford Crossing) depending on scenario considered. This equates to a range of 56 to 83 vehicles (2 way). The “with LTC” mainline flows are lower than the “no LTC” flows for all scenarios.

M25 south Core assessment	Reference	Local Plan	Diffs	% Diffs
0700-0800 No LTC	13343	13469	126	0.9%
0700-0800 With LTC	12936	13060	124	1.0%
1700-1800 No LTC	12864	12951	88	0.7%
1700-1800 With LTC	12609	12695	86	0.7%

M25 south Sensitivity assessment	Reference	Local Plan	Diffs	% Diffs
0700-0800 No LTC	13343	13456	113	0.8%
0700-0800 With LTC	12936	13048	112	0.9%
1700-1800 No LTC	12864	12943	79	0.6%
1700-1800 With LTC	12609	12686	78	0.6%

6.3.3 It is noted from the above table that the Local Plan leads to an increase of 0.6% to 1.0% in mainline demand flows on the M25 south of J2 depending on scenario considered. This equates to a range of 78 to 126 vehicles (2 way). The “with LTC” mainline flows are lower than the “no LTC” flows for all scenarios.

A2 west Core assessment	Reference	Local Plan	Diffs	% Diffs
0700-0800 No LTC	10286	10607	321	3.1%
0700-0800 With LTC	10428	10733	305	2.9%
1700-1800 No LTC	11347	11729	382	3.4%
1700-1800 With LTC	11542	11952	410	3.6%

A2 west Sensitivity assessment	Reference	Local Plan	Diffs	% Diffs
0700-0800 No LTC	10286	10570	284	2.8%
0700-0800 With LTC	10428	10687	259	2.5%
1700-1800 No LTC	11347	11684	337	3.0%
1700-1800 With LTC	11542	11898	356	3.1%

6.3.4 It is noted from the above table that the A2 west has a 2.5% to 3.6% increase in mainline demand flow depending on scenario considered. This equates to a range of 259 to 410 vehicles (2 way). The “with LTC” mainline flows are higher than the “no LTC” flows for all scenarios.

6.3.5 This increase in corridor flow represents a large proportion of the trips leaving LB Bexley and headed east.

A2 east Core assessment	Reference	Local Plan	Diffs	% Diffs
0700-0800 No LTC	12573	12806	233	1.8%
0700-0800 With LTC	11159	11415	256	2.3%
1700-1800 No LTC	14723	15013	290	2.0%
1700-1800 With LTC	13414	13722	308	2.3%

A2 east Sensitivity assessment	Reference	Local Plan	Diffs	% Diffs
0700-0800 No LTC	12573	12783	209	1.7%
0700-0800 With LTC	11159	11389	231	2.1%
1700-1800 No LTC	14723	14984	261	1.8%
1700-1800 With LTC	13414	13691	277	2.1%

6.3.1 It is noted from the above table that the A2 east experiences a 1.7% to 2.3% increase in demand flow depending on scenario considered. This equates to a range of 209 to 308 vehicles (2 way). The “with LTC” mainline flows are lower than the “no LTC” flows for all scenarios.

7 Assignments and output – Junction 1a (west)

7.1 Demand flows

7.1.1 The table below provides a summary of the demand flow (in vehicles) using Junction 1a (west roundabout) on the A282 / M25 corridor. These are illustrated as link flows at Appendices F to H.

Core Assessment	Reference	Local Plan	Diffs	% Diffs
0700-0800 No LTC	3841	4029	188	4.9%
0700-0800 With LTC	4480	4612	132	2.9%
1700-1800 No LTC	4235	4393	158	3.7%
1700-1800 With LTC	4672	4819	148	3.2%

Sensitivity Assessment	Reference	Local Plan	Diffs	% Diffs
0700-0800 No LTC	3841	4005	164	4.3%
0700-0800 With LTC	4480	4590	110	2.5%
1700-1800 No LTC	4235	4379	144	3.4%
1700-1800 With LTC	4672	4805	133	2.9%

7.1.2 It is noted from the above table that J1a (west) demand flow increases by 2.5% to 4.9% depending on scenario considered. The with LTC scenarios are a lower increase. The absolute numbers lay in a range between 110 and 188 vehicles.

7.1.3 Appendix I summarises the demand flows for individual links in tabular form. The link ID is also shown at Appendix I. The following is noted :

- Rennie Drive has a high percentage increase but this relates to a low volume of vehicles (less than 20 vehicles).

7.2 Link delays

7.2.1 Appendix I summarises the link delays for individual links in tabular form. It is noted that link delays only change by 0 to 1 second for all links as a result of Local Plan development.

7.3 V / C statistic

7.3.1 Appendix I summarises the V/C statistic for individual links in tabular form. It is noted that all links experience a V/C below 100%.

8 Assignments and output – Junction 1a (east)

8.1 Demand flows

8.1.1 The table below provides a summary of the demand flow (in vehicles) using Junction 1a (east roundabout) on the A282 / M25 corridor. These are illustrated as link flows at Appendices F to H.

Core Assessment	Reference	Local Plan	Diffs	% Diffs
0700-0800 No LTC	4494	4634	140	3.1%
0700-0800 With LTC	4789	4957	168	3.5%
1700-1800 No LTC	5016	5107	91	1.8%
1700-1800 With LTC	5272	5356	84	1.6%

Sensitivity Assessment	Reference	Local Plan	Diffs	% Diffs
0700-0800 No LTC	4494	4618	124	2.8%
0700-0800 With LTC	4789	4916	127	2.6%
1700-1800 No LTC	5016	5098	82	1.6%
1700-1800 With LTC	5272	5344	72	1.4%

8.1.2 It is noted from the above table that J1a (east) demand flow increases by 1.4% to 3.5% depending on scenario considered. The absolute numbers lie in the range between 72 and 168 PCUs.

8.1.3 Appendix I summarises the demand flows for individual links in tabular form. The link ID is also shown at Appendix I. It is noted that no link flows increase by 10%.

8.2 Link delays

8.2.1 Appendix I summarises the link delays for individual links in tabular form. Link delays only change by 0 to 1 second for all links with the exception of the southbound on slip during the evening peak hour for the “with LTC” scenario which changes by around 30 seconds.

8.3 V / C statistic

8.3.1 Appendix I summarises the V/C statistic for individual links in tabular form. It is noted that all links experience a V/C below 100% with the exception of the southbound on slip. This exceeds 100% for the Reference Case (101.2%) and Local Plan scenario (102.8%) during the PM peak hour in the “with LTC “ scenario.

9 Junction 1a TRANSYT modelling

9.1.1 National Highways have requested more detailed modelling be completed for the M25 Junctions 1a, 1b and 2.

9.1.2 National Highways have advised that for the purposes of Local Plan evidence they would be content with future year models based upon sensible input parameters and the SATURN model flows described within this report. On this basis a TRANSYT model has been developed for Junction 1a.

9.2 Scenarios

9.2.1 The following scenarios have been modelled:

- 2038 Reference Case – without LTC (AM and PM)
- 2038 Reference Case – with LTC (AM and PM)
- 2038 Local Plan – without LTC (AM and PM)
- 2038 Local Plan – with LTC (AM and PM)

9.3 Findings

9.3.1 Appendix M summarises the results of the TRANSYT modelling whilst Appendix N contains the model output. The table below summarises the total delay experienced by each model scenario.

Network delay PCUhr / hr	0700-0800			1700-1800		
	Reference	Local Plan	Diffs	Reference	Local Plan	Diffs
No LTC	1147	1099	-47	539	624	86
With LTC	1191	1495	303	1139	1646	507

9.4 Mitigation

9.4.1 As Local Plan applications come forward it may be necessary for them to assess the operation of this junction in detail, following scoping with National Highways. This will determine whether it would be appropriate or necessary for the proposed development to implement, or contribute towards, mitigation measures at this location.

9.4.2 At this stage it is considered appropriate to consider the potential for mitigation at this junction to support Local Plan development, on the basis of the modelling exercise completed above. On the basis of the model outputs above the following mitigation measures have been considered :

- A206 (Bobb Dun Way) - The white lining has been adjusted to allow vehicles to enter Lane 3 and Lane 4 for the movement from A206 to A282 eastbound on-slip. At present only Lane 4 is able to serve this movement.

9.4.3 The above measures have been input to the modelling for the Core Assessment and the results summarised below and at Appendix M.

9.4.4 The table below summarises the total delay experienced by each model scenario.

Network delay PCUhr / hr	0700-0800			1700-1800		
	Reference	Local Plan + Mitigation	Diffs	Reference	Local Plan + Mitigation	Diffs
No LTC	1147	383	-763	539	264	-275
With LTC	1191	323	-869	1139	481	-657

9.4.5 It is noted from the table above and the results summarised at Appendix M that the mitigation measures considered would mitigate the effects of the Local Plan traffic at this junction.

10 Assignments and output – Junction 1b

10.1 Demand flows

10.1.1 The table below provides a summary of the demand flow (in vehicles) using Junction 1b on the A282 / M25 corridor. These are illustrated as link flows at Appendices F to H.

Core Assessment	Reference	Local Plan	Diffs	% Diffs
0700-0800 No LTC	4455	4518	63	1.4%
0700-0800 With LTC	4103	4217	114	2.8%
1700-1800 No LTC	4648	4752	104	2.2%
1700-1800 With LTC	4697	4787	89	1.9%

Sensitivity Assessment	Reference	Local Plan	Diffs	% Diffs
0700-0800 No LTC	4455	4505	50	1.1%
0700-0800 With LTC	4103	4215	112	2.7%
1700-1800 No LTC	4648	4747	99	2.1%
1700-1800 With LTC	4697	4779	82	1.7%

10.1.2 It is noted from the above table that J1b demand flow increases by 1.1% to 2.8% depending on scenario considered. The increase in absolute vehicle numbers lies in the range between 50 and 114 vehicles.

10.1.3 Appendix I summarises the demand flows for individual links in tabular form. The link ID is also shown at Appendix I. It is noted that no link flows increase by 10%.

10.2 Link delays

10.2.1 Appendix I summarises the link delays for individual links in tabular form. Link delays only change by 0 to 1 second for all links.

10.3 V / C statistic

10.3.1 Appendix I summarises the V/C statistic for individual links in tabular form. It is noted that all links experience a V/C below 100%.

11 Junction 1b TRANSYT modelling

11.1.1 National Highways have requested more detailed modelling be completed for the M25 Junctions 1a, 1b and 2.

11.1.2 National Highways have advised that for the purposes of Local Plan evidence they would be content with future year models based upon sensible input parameters and the SATURN model flows described within this report. On this basis a TRANSYT model has been developed for Junction 1b.

11.2 Scenarios

11.2.1 The following scenarios have been modelled:

- 2038 Reference Case – without LTC (AM and PM)
- 2038 Reference Case – with LTC (AM and PM)
- 2038 Local Plan – without LTC (AM and PM)
- 2038 Local Plan – with LTC (AM and PM)

11.3 Findings

11.3.1 Appendix M summarises the results of the TRANSYT modelling whilst Appendix O contains the model output. The table below summarises the total delay experienced by each model scenario.

Network delay PCUhr / hr	0700-0800			1700-1800		
	Reference	Local Plan	Diffs	Reference	Local Plan	Diffs
No LTC	143	163	20	416	576	160
With LTC	70	75	5	301	378	77

11.4 Mitigation

11.4.1 As Local Plan applications come forward it may be necessary for them to assess the operation of this junction in detail, following scoping with National Highways. This will determine whether it would be appropriate or necessary for the proposed development to implement, or contribute towards, mitigation measures at this location.

11.4.2 At this stage it is considered appropriate to consider the potential for mitigation at this junction to support Local Plan development, on the basis of the modelling exercise completed above. On the basis of the model outputs above the following mitigation measures have been considered :

- A282 northbound entry lanes are adjusted to allow the right turn from lane 2 and 3 (rather than just lane 3).

11.4.3 The above measures have been input to the modelling for the Core Assessment and the results summarised below and at Appendix M.

11.4.4 The table below summarises the total delay experienced by each model scenario.

Network delay PCUhr / hr	0700-0800			1700-1800		
	Reference	Local Plan + Mitigation	Diffs	Reference	Local Plan + Mitigation	Diffs
No LTC	143	75	-68	416	91	-325
With LTC	70	66	-4	301	85	-216

11.4.5 It is noted from the table above and the results summarised at Appendix M that the mitigation measures considered would mitigate the effects of the Local Plan traffic at this junction.

12 Assignments and output – Junction 2

12.1 Demand flows

12.1.1 The table below provides a summary of the demand flow (in vehicles) using Junction 1b on the A282 / M25 corridor. These are illustrated as link flows at Appendices F to H.

Core Assessment	Reference	Local Plan	Diffs	% Diffs
0700-0800 No LTC	5713	5810	97	1.7%
0700-0800 With LTC	5824	5880	56	1.0%
1700-1800 No LTC	5910	6046	136	2.3%
1700-1800 With LTC	6197	6332	136	2.2%

Sensitivity Assessment	Reference	Local Plan	Diffs	% Diffs
0700-0800 No LTC	5713	5797	84	1.5%
0700-0800 With LTC	5824	5866	42	0.7%
1700-1800 No LTC	5910	6031	121	2.0%
1700-1800 With LTC	6197	6315	119	1.9%

12.1.2 It is noted from the above table that J2 demand flow increases by 0.7% to 2.3% depending on scenario considered. The increase in absolute vehicle numbers lies in the range between 42 and 136 vehicles.

12.1.3 Appendix I summarises the demand flows for individual links in tabular form. The link ID is also shown at Appendix I. The following is noted :

- The A2 WB offslip to J2 has an increase greater than 10% for the “No LTC” scenario. However, this relates to an increase in the range of only 2 to 21 vehicles in the Core Assessment.

12.2 Link delays

12.2.1 Appendix I summarises the link delays for individual links in tabular form. Link delays do not increase with the exception of the southbound on slip during the morning peak hour for the “with LTC” scenario which changes by 6 seconds.

12.3 V / C statistic

12.3.1 Appendix I summarises the V/C statistic for individual links in tabular form. It is noted that all links experience a V/C below 100% with the exception of the SB on slip during the morning peak hour of both scenarios. The V/C exceeds 100% for both the Reference Case and Local Plan scenario during the AM peak hour, albeit the change is marginal.

13 Junction 2 TRANSYT modelling

13.1 Demand flows

13.1.1 National Highways have requested more detailed modelling be completed for the M25 Junctions 1a, 1b and 2.

13.1.2 National Highways have advised that for the purposes of Local Plan evidence they would be content with future year models based upon sensible input parameters and the SATURN model flows described within this report. On this basis a TRANSYT model has been developed for Junction 2.

13.2 Scenarios

13.2.1 The following scenarios have been modelled:

- 2038 Reference Case – without LTC (AM and PM)
- 2038 Reference Case – with LTC (AM and PM)
- 2038 Local Plan – without LTC (AM and PM)
- 2038 Local Plan – with LTC (AM and PM)

13.3 Findings

13.3.1 Appendix M summarises the results of the TRANSYT modelling whilst Appendix P contains the model output. The table below summarises the total delay experienced by each model scenario.

Network delay PCUhr / hr	0700-0800			1700-1800		
	Reference	Local Plan	Diffs	Reference	Local Plan	Diffs
No LTC	1922	1745	-176	1560	1618	57
With LTC	1405	1471	66	1687	1752	65

13.4 Mitigation

13.4.1 As Local Plan applications come forward it may be necessary for them to assess the operation of this junction in detail, following scoping with National Highways. This will determine whether it would be appropriate or necessary for the proposed development to implement, or contribute towards, mitigation measures at this location.

13.4.2 At this stage it is considered appropriate to consider the potential for mitigation at this junction to support Local Plan development, on the basis of the modelling exercise completed above. On the basis of the model outputs above the following mitigation measures have been considered :

- The movement continuing around the circulatory after the M25 northbound on-slip has had an additional lane provided within the model (utilising a currently hatched area). This therefore means that Lane 1 can exit the circulatory to merge with the M25, or continue in Lane 1 towards the A2 eastbound.

13.4.3 The above measures have been input to the modelling for the Core Assessment and the results summarised below and at Appendix M.

13.4.4 The table below summarises the total delay experienced by each model scenario.

Network delay PCUhr / hr	0700-0800			1700-1800		
	Reference	Local Plan + Mitigation	Diffs	Reference	Local Plan + Mitigation	Diffs
No LTC	1922	643	-1279	1560	513	-1047
With LTC	1405	574	-831	1687	572	-1116

13.4.5 It is noted from the table above and the results summarised at Appendix M that the mitigation measures considered would mitigate the effects of the Local Plan traffic at this junction.

14 Merge and diverge review

14.1.1 At this stage it is considered appropriate to review the merge / diverge movements predicted by the strategic modelling work.

14.1.2 Demand flows and Actual flows (and the differences) have been extracted from the various model scenarios for different user classes and these are converted from their standard SATURN PCU output to vehicles. Appendix K contains the merge and diverge flow diagrams whilst Appendix L contains the same figures for the Sensitivity scenario.

14.1.3 Document CD122 has been used to adjust the SATURN output vehicle flows described above to allow for uphill gradients (using LIDAR data) and percentage of HGV flow.

14.1.4 Table 3.9a and Table 3.9b (extracted from CD122) shown below, give the criteria for applying an adjustment factor to each flow group, with the exception of diverging traffic which does not have a factor applied to it.

Table 3.9a Adjustment factors for uphill gradients and for the presence of large goods vehicles on the mainline

% HGVs on mainline	Mainline gradient	
	<2%	≥2%
5	none	1.10
10	none	1.15
15	none	1.20
20	1.05	1.25

Table 3.9b Adjustment factors for uphill gradients and for the presence of large goods vehicles on merge connector roads

% HGVs on merge connector	Merge connector gradient		
	<2%	2% to 4%	>4%
5	-	1.15	1.30
10	-	1.20	1.35
15	1.05	1.25	1.40
20	1.10	1.30	1.45

14.1.5 Using the resulting factored flows, a review is completed for each of the junction merges and diverges on the basis summarised below.

- The mainline Demand flow and merge / diverge Demand flow are added together for each scenario to obtain the total flow for each merge / diverge location.
- The difference in total Demand flow between the Reference Case and the Local Plan scenario is calculated.
- Where the potential effect of the Local Plan results in an increase in Demand flow of around 100 vehicles using a merge or diverge then further examination is undertaken as summarised below. The adoption of around 100 vehicles as a threshold is consistent with

the approach taken by National Highways when responding to a drafet version of this report.

- Where a Demand flow increase of around 100 vehicles is calculated then a comparison of the Actual flows is presented to determine whether this would result in an increase of less than 100 vehicles.

- If the Actual flow is calculated to increase total flow by around 100 vehicles then the Sensitivity assessment flows are reviewed to see whether this would result in an increase of less than 100 vehicles.

- Based upon the findings of the above, an analysis of the slip road may be completed with reference to the layout categories in CD122 (also included at Appendix J for ease of reference). National Highways have advised that they may require nil detriment mitigation if either :

    - The slip is not to the required standard to serve the Reference Case and the Local Plan is adding sizeable traffic volumes or

    - The slip is to the required standard to serve the Reference Case but the Local Plan adds sizeable traffic volumes so as to comfortably exceed the requirement for improvement.

14.1.6 The following sections of this report consider each junction in turn and the merge and diverge slips associated with each. The flows using each slip has been summarised and the potential effect of the Local Plan quantified and summarised.

15 Junction 1a

15.1 Northbound A282 merge

Demand flows

15.1.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	1,937	1,232	3,169	1,912	1,214	3,125
Local Plan	1,937	1,250	3,187	1,902	1,248	3,150
Difference	18			24		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	1,557	1,007	2,564	1,433	1,259	2,692
Local Plan	1,535	970	2,505	1,435	1,286	2,722
Difference	-59			30		

15.1.2 It is noted from the tables above that the inclusion of the Local Plan does not increase the use of this slip road by more than 30 vehicles.

15.1.3 It is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase. On this basis it is not considered necessary to review this slip road further as a result of Local Plan implementation.

15.2 Southbound A282 merge

Demand flows

15.2.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	7,025	1,164	8,190	6,894	1,646	8,540
Local Plan	7,021	1,235	8,256	6,936	1,704	8,640
Difference	66			101		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	6,225	1,462	7,687	5,480	2,060	7,540
Local Plan	6,281	1,564	7,844	5,530	2,111	7,641
Difference	157			101		

15.2.2 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 157 vehicles during the morning peak hour with LTC implemented.

15.2.3 On this basis, further investigation has been completed by reviewing Actual flows as summarised below.

Actual flows

15.2.4 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	7,020	1,159	8,179	6,894	1,639	8,534
Local Plan	6,987	1,226	8,213	6,936	1,690	8,626
Difference	33			93		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	6,225	1,457	7,682	5,480	2,051	7,531
Local Plan	6,281	1,545	7,826	5,530	2,087	7,617
Difference	144			86		

15.2.5 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 144 vehicles during the morning peak hour with LTC implemented.

15.2.6 On this basis, further investigation has been completed by reviewing Sensitivity flows as summarised below.

Sensitivity flows

15.2.7 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	7,020	1,159	8,179	6,894	1,639	8,534

Local Plan	6,986	1,216	8,202	6,935	1,689	8,623
Difference	23			90		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	6,225	1,457	7,682	5,480	2,051	7,531
Local Plan	6,277	1,527	7,805	5,527	2,082	7,609
Difference	123			78		

15.2.8 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 123 vehicles during the morning peak hour with LTC implemented.

Findings

15.2.9 On the basis of the above, National Highways may require nil detriment mitigation to be implemented at this location as described in section 14. National Highways have advised that a nil detriment solution does not necessarily mean provision of a slip road to meet the layout requirement, but could instead be a provision sufficient to accommodate the additional Local Plan traffic.

15.2.10 Reference to the layout categories in CD122 (also included at Appendix J) it is noted that the existing layout is category B (parallel merge).

15.2.11 It is anticipated that discussions would need to be completed with National Highways to agree whether an improvement to the slip road is necessary and whether a practical nil detriment improvement can be achieved. This may result in a provision of a category C layout, a ghost island merge for example (subject to further design study and land constraints).

15.2.12 However, it is noted that the addition of 123 vehicles using this merge does not alter the merge requirement beyond that for the Reference Case as illustrated at Appendix K and L.

15.3 Northbound A282 diverge

Demand flows

15.3.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,719	1,276	6,995	5,579	1,139	6,719
Local Plan	5,729	1,320	7,049	5,574	1,194	6,768
Difference	54			49		

With LTC	AM peak hour	PM peak hour

DEMAND	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,453	1,819	6,272	4,602	1,374	5,976
Local Plan	4,522	1,832	6,354	4,612	1,425	6,036
Difference	82			61		

15.3.2 It is noted from the tables above that the inclusion of the Local Plan does not increase the use of this slip road by more than 82 vehicles.

15.3.3 It is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase. On this basis it is not considered necessary to review this slip road further as a result of Local Plan implementation.

15.4 Southbound A282 diverge

Demand flows

15.4.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,620	1,301	6,922	5,995	1,159	7,154
Local Plan	5,616	1,340	6,957	6,031	1,158	7,189
Difference	35			36		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,980	1,524	6,504	4,765	977	5,743
Local Plan	5,024	1,528	6,552	4,809	976	5,784
Difference	48			41		

15.4.2 It is noted from the tables above that the inclusion of the Local Plan does not increase the use of this slip road by more than 48 vehicles.

15.4.3 It is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase. On this basis it is not considered necessary to review this slip road further as a result of Local Plan implementation.

16 Junction 1b

16.1 Northbound A282 merge

Demand flows

16.1.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,784	1,210	6,995	5,663	1,055	6,719
Local Plan	5,813	1,237	7,049	5,679	1,088	6,768
Difference	54			49		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,378	894	6,272	5,022	954	5,976
Local Plan	5,422	932	6,354	5,073	963	6,036
Difference	82			61		

16.1.2 It is noted from the tables above that the inclusion of the Local Plan does not increase the use of this slip road by more than 82 vehicles.

16.1.3 It is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase. On this basis it is not considered necessary to review this slip road further as a result of Local Plan implementation.

16.2 Southbound A282 diverge

Demand flows

16.2.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	6,167	512	6,679	7,046	595	7,640
Local Plan	6,226	513	6,739	7,111	625	7,736
Difference	60			95		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,788	584	6,372	6,048	777	6,826
Local Plan	5,898	616	6,514	6,120	800	6,920
Difference	141			94		

16.2.2 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 141 vehicles during the morning peak hour with LTC implemented.

16.2.3 On this basis, further investigation has been completed by reviewing Actual flows as summarised below.

Actual flows

16.2.4 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	6,093	506	6,599	6,730	568	7,298
Local Plan	6,109	504	6,612	6,707	589	7,296
Difference	13			-2		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,784	584	6,367	6,021	774	6,794
Local Plan	5,883	614	6,497	6,052	791	6,842
Difference	129			48		

16.2.5 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 129 vehicles during the morning peak hour with LTC implemented.

16.2.6 On this basis, further investigation has been completed by reviewing Sensitivity flows as summarised below.

Sensitivity flows

16.2.7 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	6,093	506	6,599	6,730	568	7,298

Local Plan	6,105	504	6,609	6,706	589	7,295
Difference	10			-3		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,784	584	6,367	6,021	774	6,794
Local Plan	5,858	619	6,477	6,047	792	6,839
Difference	110			45		

16.2.8 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 110 vehicles during the morning peak hour with LTC implemented.

Findings

16.2.9 On the basis of the above, National Highways may require nil detriment mitigation to be implemented at this location as described in section 14. National Highways have advised that a nil detriment solution does not necessarily mean provision of a slip road to meet the layout requirement, but could instead be a provision sufficient to accommodate the additional Local Plan traffic.

16.2.10 Reference to the layout categories in CD122 (also included at Appendix J) it is noted that the existing layout is category A Option 2 (single lane auxiliary diverge).

16.2.11 It is anticipated that discussions would need to be completed with National Highways to agree whether an improvement to the slip road is necessary and whether a practical nil detriment improvement can be achieved. This may result in a provision of a category B Option 1 layout, a ghost island diverge for example (subject to further design study and land constraints).

16.2.12 However, it is noted that the addition of 110 vehicles using this diverge does not alter the merge requirement beyond that for the Reference Case as illustrated at Appendix K and L.

17 Junction 2 – Interchange filter roads

17.1 Northbound A282 merge (filter from A2)

Demand flows

17.1.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,027	1,846	5,872	3,799	1,864	5,663
Local Plan	4,042	1,859	5,901	3,816	1,863	5,679
Difference	29			16		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,526	852	5,378	3,820	1,202	5,022
Local Plan	4,551	871	5,422	3,861	1,212	5,073
Difference	45			51		

17.1.2 It is noted from the tables above that the inclusion of the Local Plan does not increase the use of this slip road by more than 51 vehicles.

17.1.3 It is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase. On this basis it is not considered necessary to review this slip road further as a result of Local Plan implementation.

17.2 Eastbound A2 merge (filter from A282)

Demand flows

17.2.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,990	1,787	6,777	5,529	2,659	8,188
Local Plan	5,137	1,800	6,937	5,660	2,670	8,330
Difference	160			142		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,869	800	5,669	5,650	1,221	6,871
Local Plan	5,012	828	5,841	5,778	1,239	7,017
Difference	172			146		

17.2.2 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 172 vehicles during the morning peak hour with LTC implemented.

17.2.3 On this basis, further investigation has been completed by reviewing Actual flows as summarised below.

Actual flows

17.2.4 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,923	1,749	6,673	5,388	2,539	7,927
Local Plan	5,008	1,752	6,761	5,373	2,518	7,891
Difference	88			-36		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,804	799	5,603	5,481	1,215	6,696
Local Plan	4,916	826	5,742	5,464	1,225	6,689
Difference	139			-7		

17.2.5 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 139 vehicles during the morning peak hour with LTC implemented.

17.2.6 On this basis, further investigation has been completed by reviewing Sensitivity flows as summarised below.

Sensitivity flows

17.2.7 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,923	1,749	6,673	5,388	2,539	7,927

Local Plan	5,006	1,753	6,760	5,377	2,518	7,895
Difference	87			-32		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,804	799	5,603	5,481	1,215	6,696
Local Plan	4,906	823	5,729	5,470	1,224	6,695
Difference	126			-1		

17.2.8 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 126 vehicles during the morning peak hour with LTC implemented.

Findings

17.2.9 The existing merge is a layout Category E Option 1 (lane gain with ghost island offside merge) with 3 upstream lanes.

17.2.10 It is unlikely that a practical physical mitigation measure can be implemented at this location to offset the effect of this modest number of vehicles.

17.2.11 However, it is noted that the addition of 126 vehicles using this merge does not alter the merge requirement beyond that for the Reference Case as illustrated at Appendix K and L.

17.3 Southbound A282 diverge (filter to A2)

Demand flows

17.3.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,108	1,430	5,538	4,008	2,216	6,224
Local Plan	4,135	1,440	5,575	4,026	2,225	6,251
Difference	38			27		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,352	666	5,019	3,872	1,221	5,093
Local Plan	4,423	690	5,113	3,888	1,239	5,127
Difference	94			34		

17.3.2 It is noted from the tables above that the inclusion of the Local Plan does not increase the use of this slip road by more than 94 vehicles.

17.3.3 It is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase. On this basis it is not considered necessary to review this slip road further as a result of Local Plan implementation.

17.4 Westbound A2 diverge (filter to A282)

Demand flows

17.4.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the "no LTC" scenario and "With LTC" scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,850	1,758	6,607	5,114	1,864	6,978
Local Plan	4,925	1,771	6,696	5,266	1,863	7,128
Difference	89			150		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,214	852	6,066	5,341	1,202	6,543
Local Plan	5,297	871	6,168	5,493	1,212	6,705
Difference	102			162		

17.4.2 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 162 vehicles during the evening peak hour with LTC implemented.

17.4.3 On this basis, further investigation has been completed by reviewing Actual flows as summarised below.

Actual flows

17.4.4 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the "no LTC" scenario and "With LTC" scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,850	1,758	6,607	5,114	1,864	6,978
Local Plan	4,925	1,771	6,696	5,266	1,863	7,128
Difference	89			150		

With LTC	AM peak hour	PM peak hour

ACTUAL	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,214	852	6,066	5,341	1,202	6,543
Local Plan	5,297	871	6,168	5,493	1,212	6,705
Difference	102			162		

17.4.5 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 162 vehicles during the evening peak hour with LTC implemented.

17.4.6 On this basis, further investigation has been completed by reviewing Sensitivity flows as summarised below.

Sensitivity flows

17.4.7 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,850	1,758	6,607	5,114	1,864	6,978
Local Plan	4,918	1,769	6,687	5,248	1,865	7,113
Difference	80			135		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,214	852	6,066	5,341	1,202	6,543
Local Plan	5,288	870	6,158	5,471	1,217	6,689
Difference	92			146		

17.4.8 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 146 vehicles during the evening peak hour with LTC implemented.

Findings

17.4.9 On the basis of the above, National Highways may require nil detriment mitigation to be implemented at this location as described in section 14. National Highways have advised that a nil detriment solution does not necessarily mean provision of a slip road to meet the layout requirement, but could instead be a provision sufficient to accommodate the additional Local Plan traffic.

17.4.10 Reference to the layout categories in CD122 (also included at Appendix J) it is noted that the existing layout is a Category D Option 2 (auxiliary lane drop) with 4 upstream lanes.

17.4.11 It is anticipated that discussions would need to be completed with National Highways to agree whether an improvement to the slip road is necessary and whether a practical nil detriment improvement can be achieved. This may result in a provision of a category F layout with a

mainline lane drop and ghost island diverge for example (subject to further design study and land constraints).

17.4.12 However, it is noted that the addition of 146 vehicles using this merge does not alter the diverge requirement beyond that for the Reference Case as illustrated at Appendix K and L.

18 Junction 2 – roundabout slip roads

18.1 Northbound A282 merge

Demand flows

18.1.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,013	14	4,027	3,487	406	3,893
Local Plan	4,042	0	4,042	3,502	409	3,911
Difference	15			18		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	3,660	1,040	4,700	3,341	575	3,916
Local Plan	3,676	1,051	4,726	3,355	607	3,962
Difference	27			46		

18.1.2 It is noted from the tables above that the inclusion of the Local Plan does not increase the use of this slip road by more than 46 vehicles.

18.1.3 It is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase. On this basis it is not considered necessary to review this slip road further as a result of Local Plan implementation.

18.2 Southbound A282 merge

Demand flows

18.2.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,313	1,641	5,955	4,008	1,534	5,542
Local Plan	4,342	1,690	6,032	4,026	1,572	5,597
Difference	77			55		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,570	1,273	5,843	3,872	1,494	5,366
Local Plan	4,644	1,275	5,919	3,888	1,533	5,420
Difference	77			55		

18.2.2 It is noted from the tables above that the inclusion of the Local Plan does not increase the use of this slip road by more than 77 vehicles.

18.2.3 It is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase. On this basis it is not considered necessary to review this slip road further as a result of Local Plan implementation.

18.3 Northbound A282 diverge

Demand flows

18.3.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,013	2,446	6,459	3,487	2,498	5,985
Local Plan	4,042	2,467	6,509	3,502	2,516	6,018
Difference	50			33		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	3,660	2,424	6,084	3,341	2,475	5,816
Local Plan	3,676	2,459	6,135	3,355	2,493	5,848
Difference	51			32		

18.3.2 It is noted from the tables above that the inclusion of the Local Plan does not increase the use of this slip road by more than 51 vehicles.

18.3.3 It is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase. On this basis it is not considered necessary to review this slip road further as a result of Local Plan implementation.

18.4 Southbound A282 diverge

Demand flows

18.4.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,538	629	6,167	6,224	822	7,046
Local Plan	5,575	651	6,226	6,251	860	7,111
Difference	59			66		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,019	769	5,788	5,093	955	6,048
Local Plan	5,113	785	5,898	5,127	993	6,120
Difference	110			72		

18.4.2 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 110 vehicles during the morning peak hour with LTC implemented.

18.4.3 On this basis, further investigation has been completed by reviewing Actual flows as summarised below.

Actual flows

18.4.4 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,421	622	6,042	5,945	785	6,730
Local Plan	5,428	638	6,067	5,895	811	6,707
Difference	25			-23		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,015	769	5,784	5,070	951	6,021
Local Plan	5,100	783	5,883	5,069	982	6,052
Difference	99			31		

18.4.5 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 99 vehicles during the morning peak hour with LTC implemented.

18.4.6 Whilst this is less than the 100 vehicle threshold being considered within this assessment, further investigation has been completed by reviewing Sensitivity flows as summarised below.

Sensitivity flows

18.4.7 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the "no LTC" scenario and "With LTC" scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,421	622	6,042	5,945	785	6,730
Local Plan	5,426	636	6,062	5,898	808	6,706
Difference	20			-23		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,015	769	5,784	5,070	951	6,021
Local Plan	5,082	776	5,858	5,070	977	6,047
Difference	75			27		

18.4.8 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 75 vehicles during the morning peak hour with LTC implemented.

18.4.9 On the basis of the findings above, it is considered reasonable to assume that the likely effect of the Local Plan would be less than 100 vehicles on this slip road.

18.4.10 Consequently, it is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase.

18.5 Eastbound A2 merge

Demand flows

18.5.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the "no LTC" scenario and "With LTC" scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	3,042	1,494	4,536	3,939	1,590	5,529
Local Plan	3,176	1,494	4,670	4,068	1,592	5,660
Difference	133			131		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	2,916	1,511	4,426	3,993	1,657	5,650

Local Plan	3,044	1,512	4,557	4,111	1,667	5,778
Difference	130			128		

18.5.2 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 133 vehicles during the morning peak hour without LTC implemented.

18.5.3 On this basis, further investigation has been completed by reviewing Actual flows as summarised below.

Actual flows

18.5.4 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	3,015	1,461	4,476	3,857	1,531	5,388
Local Plan	3,112	1,442	4,554	3,863	1,510	5,373
Difference	77			-15		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	2,887	1,481	4,368	3,868	1,612	5,480
Local Plan	3,001	1,469	4,470	3,865	1,598	5,463
Difference	102			-17		

18.5.5 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 102 vehicles during the morning peak hour with LTC implemented.

18.5.6 On this basis, further investigation has been completed by reviewing Sensitivity flows as summarised below.

Sensitivity flows

18.5.7 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	3,015	1,461	4,476	3,857	1,531	5,388
Local Plan	3,108	1,444	4,552	3,863	1,514	5,377
Difference	76			-11		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	2,887	1,481	4,368	3,868	1,612	5,480
Local Plan	2,991	1,470	4,461	3,868	1,602	5,470
Difference	93			-11		

18.5.8 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 93 vehicles during the morning peak hour with LTC implemented.

Findings

18.5.9 On the basis of the findings above, it is considered reasonable to assume that the likely effect of the Local Plan would be less than 100 vehicles on this slip road.

18.5.10 Consequently, it is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase. On this basis it is not considered necessary to review this slip road further as a result of Local Plan implementation.

18.6 Westbound A2 merge

Demand flows

18.6.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	3,715	1,510	5,225	3,716	1,605	5,321
Local Plan	3,788	1,556	5,344	3,847	1,656	5,502
Difference	119			181		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	3,931	1,530	5,461	3,794	1,650	5,445
Local Plan	4,013	1,584	5,597	3,945	1,708	5,653
Difference	136			209		

18.6.2 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 209 vehicles during the evening peak hour with LTC implemented.

18.6.3 On this basis, further investigation has been completed by reviewing Actual flows as summarised below.

Actual flows

18.6.4 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	3,715	1,435	5,150	3,716	1,516	5,233
Local Plan	3,788	1,465	5,254	3,847	1,552	5,399
Difference	103			166		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	3,931	1,462	5,393	3,794	1,575	5,370
Local Plan	4,013	1,495	5,507	3,945	1,618	5,563
Difference	115			193		

18.6.5 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 193 vehicles during the evening peak hour with LTC implemented.

18.6.6 On this basis, further investigation has been completed by reviewing Sensitivity flows as summarised below.

Sensitivity flows

18.6.7 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	3,715	1,435	5,150	3,716	1,516	5,233
Local Plan	3,781	1,461	5,242	3,833	1,547	5,381
Difference	91			148		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	3,931	1,462	5,393	3,794	1,575	5,370
Local Plan	4,003	1,477	5,480	3,924	1,612	5,536
Difference	88			167		

18.6.8 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 167 vehicles during the evening peak hour with LTC implemented.

Findings

18.6.9 On the basis of the above, National Highways may require nil detriment mitigation to be implemented at this location as described in section 14. National Highways have advised that a nil detriment solution does not necessarily mean provision of a slip road to meet the layout requirement, but could instead be a provision sufficient to accommodate the additional Local Plan traffic.

18.6.10 Reference to the layout categories in CD122 (also included at Appendix J) it is noted that the existing layout is a Layout A option 2 (2 lane taper merge) with 3 upstream lanes.

18.6.11 It is anticipated that discussions would need to be completed with National Highways to agree whether an improvement to the slip road is necessary and whether a practical nil detriment improvement can be achieved. This may result in a provision of a category C layout with a ghost island merge for example (subject to further design study and land constraints).

18.6.12 However, it is noted that the addition of 167 vehicles using this merge does not alter the merge requirement beyond that for the Reference Case as illustrated at Appendix K and L.

18.7 Eastbound A2 diverge

Demand flows

18.7.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	3,042	2,019	5,061	3,939	2,086	6,026
Local Plan	3,176	2,087	5,263	4,068	2,158	6,226
Difference	203			201		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	2,916	2,051	4,967	3,993	2,104	6,098
Local Plan	3,044	2,092	5,137	4,111	2,188	6,299
Difference	170			201		

18.7.2 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 203 vehicles during the morning peak hour without LTC implemented.

18.7.3 On this basis, further investigation has been completed by reviewing Actual flows as summarised below.

Actual flows

18.7.4 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	3,015	1,972	4,987	3,857	2,004	5,861
Local Plan	3,112	1,977	5,089	3,863	2,008	5,871
Difference	102			10		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	2,887	1,986	4,873	3,868	2,002	5,870
Local Plan	3,001	1,986	4,987	3,865	2,007	5,872
Difference	114			2		

18.7.5 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 115 vehicles during the morning peak hour with LTC implemented.

18.7.6 On this basis, further investigation has been completed by reviewing Sensitivity flows as summarised below.

Sensitivity flows

18.7.7 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	3,015	1,972	4,987	3,857	2,004	5,861
Local Plan	3,108	1,976	5,084	3,863	2,007	5,871
Difference	97			10		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	2,887	1,986	4,873	3,868	2,002	5,870
Local Plan	2,991	1,986	4,977	3,868	2,006	5,874
Difference	103			4		

18.7.8 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 103 vehicles during the morning peak hour with LTC implemented.

Findings

18.7.9 On the basis of the findings above, it is considered reasonable to assume that the likely effect of the Local Plan would be around 100 vehicles on this slip road. Consequently, it is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase.

18.8 Westbound A2 diverge

Demand flows

18.8.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the "no LTC" scenario and "With LTC" scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	3,715	1,135	4,850	3,716	1,398	5,114
Local Plan	3,788	1,137	4,925	3,847	1,419	5,266
Difference	76			151		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	3,931	1,284	5,214	3,794	1,547	5,341
Local Plan	4,013	1,285	5,297	3,945	1,547	5,493
Difference	83			152		

18.8.2 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 152 vehicles during the evening peak hour with LTC implemented.

18.8.3 On this basis, further investigation has been completed by reviewing Actual flows as summarised below.

Actual flows

18.8.4 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the "no LTC" scenario and "With LTC" scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	3,715	1,135	4,850	3,716	1,398	5,114
Local Plan	3,788	1,137	4,925	3,847	1,419	5,266
Difference	76			151		

With LTC	AM peak hour	PM peak hour

ACTUAL	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	3,931	1,284	5,214	3,794	1,547	5,341
Local Plan	4,013	1,285	5,297	3,945	1,547	5,493
Difference	83			152		

18.8.5 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 152 vehicles during the evening peak hour with LTC implemented.

18.8.6 On this basis, further investigation has been completed by reviewing Sensitivity flows as summarised below.

Sensitivity flows

18.8.7 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	3,715	1,135	4,850	3,716	1,398	5,114
Local Plan	3,781	1,137	4,918	3,833	1,415	5,248
Difference	68			134		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	3,931	1,284	5,214	3,794	1,547	5,341
Local Plan	4,003	1,285	5,288	3,924	1,547	5,471
Difference	73			130		

18.8.8 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 134 vehicles during the evening peak hour without LTC implemented.

Findings

18.8.9 On the basis of the above, National Highways may require nil detriment mitigation to be implemented at this location as described in section 14. National Highways have advised that a nil detriment solution does not necessarily mean provision of a slip road to meet the layout requirement, but could instead be a provision sufficient to accommodate the additional Local Plan traffic.

18.8.10 Reference to the layout categories in CD122 (also included at Appendix J) it is noted that the existing layout is a Layout A option 1 (taper diverge) with 3 upstream lanes.

18.8.11 It is anticipated that discussions would need to be completed with National Highways to agree whether an improvement to the slip road is necessary and whether a practical nil detriment improvement can be achieved.

18.8.12 However, it is noted that the addition of 134 vehicles using this merge does not alter the diverge requirement beyond that for the Reference Case as illustrated at Appendix K and L.

19 Junction 3 – Interchange filter roads

19.1.1 Data for this junction has been extracted from the Webtris database to obtain the proportionate splits for the mainline, merge and diverge locations. This data has then been combined with the mainline flows on the A20 (west) and M25 (north) arms from the LTAM model to derive merge and diverge flows through the junction. This is a methodology confirmed as acceptable by National Highways during correspondence.

19.2 Northbound A282 merge (filter from M20)

Demand flows

19.2.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the "no LTC" scenario and "With LTC" scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,818	1,641	6,459	5,076	909	5,985
Local Plan	4,855	1,653	6,509	5,104	914	6,018
Difference	50			33		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,538	1,545	6,084	4,933	884	5,816
Local Plan	4,577	1,558	6,135	4,960	888	5,848
Difference	51			32		

19.2.2 It is noted from the tables above that the inclusion of the Local Plan does not increase the use of this slip road by more than 51 vehicles.

19.2.3 It is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase. On this basis it is not considered necessary to review this slip road further as a result of Local Plan implementation.

19.3 Eastbound A2 merge (filter from M25)

Demand flows

19.3.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the "no LTC" scenario and "With LTC" scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	1,984	1,281	3,265	2,575	1,605	4,181

Local Plan	2,021	1,236	3,257	2,621	1,618	4,239
Difference	-8			58		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	2,065	1,275	3,339	2,620	1,585	4,205
Local Plan	2,103	1,288	3,391	2,668	1,598	4,265
Difference	52			61		

19.3.2 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 61 vehicles.

19.3.3 It is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase. On this basis it is not considered necessary to review this slip road further as a result of Local Plan implementation.

19.4 Southbound A282 diverge (filter to M20)

Demand flows

19.4.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,720	1,164	6,884	5,274	1,605	6,879
Local Plan	5,783	1,177	6,960	5,316	1,618	6,934
Difference	76			55		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,694	1,159	6,852	5,207	1,585	6,792
Local Plan	5,754	1,171	6,925	5,249	1,598	6,847
Difference	73			55		

19.4.2 It is noted from the tables above that the inclusion of the Local Plan does not increase the use of this slip road by more than 76 vehicles.

19.4.3 It is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase. On this basis it is not considered necessary to review this slip road further as a result of Local Plan implementation.

19.5 Westbound A2 diverge (filter to M25)

Demand flows

19.5.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	2,846	1,641	4,487	1,487	909	2,396
Local Plan	2,889	1,653	4,543	1,504	914	2,418
Difference	56			22		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	2,943	1,545	4,489	1,465	884	2,348
Local Plan	2,986	1,558	4,545	1,481	888	2,369
Difference	56			21		

19.5.2 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 162 vehicles.

19.5.3 It is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase. On this basis it is not considered necessary to review this slip road further as a result of Local Plan implementation.

20 Junction 3 – roundabout slip roads

20.1.1 Data for this junction has been extracted from the Webtris database to obtain the proportionate splits for the mainline, merge and diverge locations. This data has then been combined with the mainline flows on the A20 (west) and M25 (north) arms from the LTAM model to derive merge and diverge flows through the junction. This is a methodology confirmed as acceptable by National Highways during correspondence.

20.2 Northbound A282 merge

Demand flows

20.2.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the "no LTC" scenario and "With LTC" scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	3,898	920	4,818	4,214	862	5,076
Local Plan	3,928	928	4,855	4,237	867	5,104
Difference	37			28		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	3,671	867	4,538	4,095	838	4,933
Local Plan	3,702	874	4,577	4,118	842	4,960
Difference	38			27		

20.2.2 It is noted from the tables above that the inclusion of the Local Plan does not increase the use of this slip road by more than 38 vehicles.

20.2.3 It is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase. On this basis it is not considered necessary to review this slip road further as a result of Local Plan implementation.

20.3 Southbound A282 merge

Demand flows

20.3.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the "no LTC" scenario and "With LTC" scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,034	2,086	7,120	4,126	1,661	5,787

Local Plan	4,847	2,013	6,860	4,158	1,675	5,833
Difference	-260			46		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,011	2,076	7,087	4,074	1,641	5,714
Local Plan	5,064	2,098	7,163	4,106	1,654	5,760
Difference	75			46		

20.3.2 It is noted from the tables above that the inclusion of the Local Plan does not increase the use of this slip road by more than 75 vehicles.

20.3.3 It is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase. On this basis it is not considered necessary to review this slip road further as a result of Local Plan implementation.

20.4 Northbound A282 diverge

Demand flows

20.4.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	3,898	1,185	5,083	4,214	1,889	6,103
Local Plan	3,928	1,194	5,122	4,237	1,899	6,136
Difference	39			34		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	3,671	1,116	4,788	4,095	1,836	5,931
Local Plan	3,702	1,126	4,828	4,118	1,846	5,963
Difference	40			32		

20.4.2 It is noted from the tables above that the inclusion of the Local Plan does not increase the use of this slip road by more than 40 vehicles.

20.4.3 It is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase. On this basis it is not considered necessary to review this slip road further as a result of Local Plan implementation.

20.5 Southbound A282 diverge

Demand flows

20.5.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,795	926	5,720	4,126	1,148	5,274
Local Plan	4,847	936	5,783	4,158	1,157	5,316
Difference	63			42		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,772	921	5,694	4,074	1,133	5,207
Local Plan	4,823	931	5,754	4,106	1,143	5,249
Difference	61			42		

20.5.2 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 63 vehicles.

20.5.3 It is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase. On this basis it is not considered necessary to review this slip road further as a result of Local Plan implementation.

20.6 Eastbound A2 merge

Demand flows

20.6.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	1,559	425	1,984	1,228	1,348	2,575
Local Plan	1,588	433	2,021	1,249	1,372	2,621
Difference	37			46		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	1,623	442	2,065	1,249	1,371	2,620

Local Plan	1,653	450	2,103	1,272	1,396	2,668
Difference	38			48		

20.6.2 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 48 vehicles.

20.6.3 It is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase. On this basis it is not considered necessary to review this slip road further as a result of Local Plan implementation.

20.7 Westbound A2 merge

Demand flows

20.7.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the "no LTC" scenario and "With LTC" scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	1,813	1,362	3,175	1,115	1,313	2,429
Local Plan	1,841	1,383	3,224	1,128	1,328	2,456
Difference	48			27		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	1,875	1,409	3,284	1,098	1,294	2,392
Local Plan	1,902	1,429	3,331	1,111	1,308	2,418
Difference	48			27		

20.7.2 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 48 vehicles.

20.7.3 It is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase. On this basis it is not considered necessary to review this slip road further as a result of Local Plan implementation.

20.8 Eastbound A2 diverge

Demand flows

20.8.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the "no LTC" scenario and "With LTC" scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined

Reference	1,559	1,045	2,604	1,228	2,425	3,653
Local Plan	1,588	1,064	2,652	1,249	2,468	3,717
Difference	48			65		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	1,623	1,087	2,710	1,249	2,467	3,715
Local Plan	1,653	1,108	2,761	1,272	2,512	3,783
Difference	50			68		

20.8.2 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 68 vehicles.

20.8.3 It is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase. On this basis it is not considered necessary to review this slip road further as a result of Local Plan implementation.

20.9 Westbound A2 diverge

Demand flows

20.9.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	1,813	1,033	2,846	1,115	372	1,487
Local Plan	1,841	1,049	2,889	1,128	376	1,504
Difference	43			17		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	1,875	1,068	2,943	1,098	367	1,465
Local Plan	1,902	1,084	2,986	1,111	371	1,481
Difference	43			16		

20.9.2 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 43 vehicles.

20.9.3 It is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase. On this basis it is not considered necessary to review this slip road further as a result of Local Plan implementation.

21 A2 Bean junction

21.1.1 Data for this junction has been extracted from the Webtris database to obtain the proportionate splits for the mainline, merge and diverge locations. This data has then been combined with the mainline flows on the A2 from the LTAM model to derive merge and diverge flows through the junction. This is a methodology confirmed as acceptable by National Highways during correspondence.

21.2 Eastbound A2 merge

Demand flows

21.2.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the "no LTC" scenario and "With LTC" scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,237	131	5,367	6,664	170	6,834
Local Plan	5,363	134	5,497	6,784	173	6,957
Difference	129			124		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,470	107	4,577	5,912	131	6,043
Local Plan	4,605	110	4,716	6,038	134	6,172
Difference	138			129		

21.2.2 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 138 vehicles during the morning peak hour with LTC implemented.

21.2.3 On this basis, further investigation has been completed by reviewing Actual flows as summarised below.

Actual flows

21.2.4 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the "no LTC" scenario and "With LTC" scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,157	129	5,286	6,456	165	6,621
Local Plan	5,227	131	5,357	6,428	164	6,592
Difference	72			-29		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,418	106	4,524	5,761	128	5,889
Local Plan	4,527	108	4,635	5,756	128	5,883
Difference	112			-6		

21.2.5 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 112 vehicles during the morning peak hour with LTC implemented.

21.2.6 On this basis, further investigation has been completed by reviewing Sensitivity flows as summarised below.

Sensitivity flows

21.2.7 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,157	129	5,286	6,456	165	6,621
Local Plan	5,226	131	5,357	6,432	164	6,596
Difference	71			-25		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,418	106	4,524	5,761	128	5,889
Local Plan	4,517	108	4,625	5,760	128	5,888
Difference	101			-1		

21.2.8 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 101 vehicles during the morning peak hour with LTC implemented.

21.2.9 It is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase, particularly in the context of this junction currently being upgraded to accommodate strategic growth on the SRN. On this basis it is not considered necessary to review this slip road further as a result of Local Plan implementation.

21.3 Westbound A2 merge

Demand flows

21.3.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,931	676	6,607	5,563	1,415	6,978
Local Plan	6,011	685	6,696	5,683	1,445	7,128
Difference	89			150		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,445	621	6,066	5,216	1,326	6,543
Local Plan	5,537	631	6,168	5,346	1,359	6,705
Difference	102			162		

21.3.2 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 162 vehicles during the evening peak hour with LTC implemented.

21.3.3 On this basis, further investigation has been completed by reviewing Actual flows as summarised below.

Actual flows

21.3.4 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,931	676	6,607	5,563	1,415	6,978
Local Plan	6,011	685	6,696	5,683	1,445	7,128
Difference	89			150		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,445	621	6,066	5,216	1,326	6,543
Local Plan	5,537	631	6,168	5,346	1,359	6,705
Difference	102			162		

21.3.5 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 162 vehicles during the evening peak hour with LTC implemented.

21.3.6 On this basis, further investigation has been completed by reviewing Sensitivity flows as summarised below.

Sensitivity flows

21.3.7 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the "no LTC" scenario and "With LTC" scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,931	676	6,607	5,563	1,415	6,978
Local Plan	6,003	685	6,687	5,671	1,442	7,113
Difference	80			135		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,445	621	6,066	5,216	1,326	6,543
Local Plan	5,527	630	6,158	5,333	1,356	6,689
Difference	92			146		

21.3.8 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 146 vehicles during the evening peak hour with LTC implemented.

Findings

21.3.9 On the basis of the above, National Highways may require nil detriment mitigation to be implemented at this location as described in section 14. National Highways have advised that a nil detriment solution does not necessarily mean provision of a slip road to meet the layout requirement, but could instead be a provision sufficient to accommodate the additional Local Plan traffic.

21.3.10 It is anticipated that discussions would need to be completed with National Highways to agree whether an improvement to the slip road is necessary and whether a practical nil detriment improvement can be achieved. Such a discussion would need to be in the context of the Bean junction improvements being undertaken and the extent to which these allow for strategic growth.

21.4 Eastbound A2 diverge

Demand flows

21.4.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the "no LTC" scenario and "With LTC" scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,237	729	5,966	6,664	1,081	7,745
Local Plan	5,363	747	6,110	6,784	1,101	7,885

Difference	144	140

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,470	623	5,093	5,912	959	6,871
Local Plan	4,605	641	5,247	6,038	980	7,017
Difference	154			146		

21.4.2 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 154 vehicles during the morning peak hour with LTC implemented.

21.4.3 On this basis, further investigation has been completed by reviewing Actual flows as summarised below.

Actual flows

21.4.4 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,157	718	5,875	6,456	1,047	7,504
Local Plan	5,227	728	5,955	6,428	1,043	7,471
Difference	80			-33		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,418	615	5,033	5,761	935	6,696
Local Plan	4,527	631	5,158	5,756	934	6,689
Difference	124			-7		

21.4.5 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 124 vehicles during the morning peak hour with LTC implemented.

21.4.6 On this basis, further investigation has been completed by reviewing Sensitivity flows as summarised below.

Sensitivity flows

21.4.7 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,157	718	5,875	6,456	1,047	7,504
Local Plan	5,226	728	5,954	6,432	1,043	7,476
Difference	79			-28		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,418	615	5,033	5,761	935	6,696
Local Plan	4,517	629	5,146	5,760	934	6,695
Difference	113			-1		

21.4.8 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 113 vehicles during the morning peak hour with LTC implemented.

Findings

21.4.9 On the basis of the above, National Highways may require nil detriment mitigation to be implemented at this location as described in section 14. National Highways have advised that a nil detriment solution does not necessarily mean provision of a slip road to meet the layout requirement, but could instead be a provision sufficient to accommodate the additional Local Plan traffic.

21.4.10 It is anticipated that discussions would need to be completed with National Highways to agree whether an improvement to the slip road is necessary and whether a practical nil detriment improvement can be achieved. Such a discussion would need to be in the context of the Bean junction improvements being undertaken and the extent to which these allow for strategic growth.

21.5 Westbound A2 diverge

Demand flows

21.5.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,931	1,315	7,246	5,563	1,825	7,388
Local Plan	6,011	1,332	7,343	5,683	1,864	7,547
Difference	97			159		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,445	1,207	6,652	5,216	1,711	6,927
Local Plan	5,537	1,227	6,764	5,346	1,753	7,099
Difference	112			172		

21.5.2 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 172 vehicles during the evening peak hour with LTC implemented.

21.5.3 On this basis, further investigation has been completed by reviewing Actual flows as summarised below.

Actual flows

21.5.4 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,931	1,315	7,246	5,563	1,825	7,388
Local Plan	6,011	1,332	7,343	5,683	1,864	7,547
Difference	97			159		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,445	1,207	6,652	5,216	1,711	6,927
Local Plan	5,537	1,227	6,764	5,346	1,753	7,099
Difference	112			172		

21.5.5 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 172 vehicles during the evening peak hour with LTC implemented.

21.5.6 On this basis, further investigation has been completed by reviewing Sensitivity flows as summarised below.

Sensitivity flows

21.5.7 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,931	1,315	7,246	5,563	1,825	7,388

Local Plan	6,003	1,330	7,333	5,671	1,860	7,532
Difference	88			143		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	5,445	1,207	6,652	5,216	1,711	6,927
Local Plan	5,527	1,225	6,753	5,333	1,749	7,082
Difference	101			154		

21.5.8 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 154 vehicles during the evening peak hour with LTC implemented.

Findings

21.5.9 On the basis of the above, National Highways may require nil detriment mitigation to be implemented at this location as described in section 14. National Highways have advised that a nil detriment solution does not necessarily mean provision of a slip road to meet the layout requirement, but could instead be a provision sufficient to accommodate the additional Local Plan traffic.

21.5.10 It is anticipated that discussions would need to be completed with National Highways to agree whether an improvement to the slip road is necessary and whether a practical nil detriment improvement can be achieved. Such a discussion would need to be in the context of the Bean junction improvements being undertaken and the extent to which these allow for strategic growth.

22 A2 / A2018 Old Bexley Lane

22.1 A2 Eastbound merge

Demand flows

22.1.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,133	928	5,061	4,914	1,112	6,026
Local Plan	4,212	1,052	5,263	5,123	1,104	6,226
Difference	203			201		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,084	883	4,967	5,034	1,064	6,098
Local Plan	4,127	1,009	5,137	5,266	1,033	6,299
Difference	170			201		

22.1.2 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 203 vehicles during the morning peak hour without LTC implemented.

22.1.3 On this basis, further investigation has been completed by reviewing Actual flows as summarised below.

Actual flows

22.1.4 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,093	922	5,015	4,845	1,066	5,911
Local Plan	4,118	1,040	5,157	4,928	1,038	5,965
Difference	142			54		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,040	878	4,918	4,921	1,025	5,946

Local Plan	4,064	1,000	5,063	5,037	980	6,017
Difference	145			71		

22.1.5 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 145 vehicles during the morning peak hour with LTC implemented.

22.1.6 On this basis, further investigation has been completed by reviewing Sensitivity flows as summarised below.

Sensitivity flows

22.1.7 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,093	922	5,015	4,845	1,066	5,911
Local Plan	4,129	1,020	5,149	4,919	1,045	5,965
Difference	134			53		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,040	878	4,918	4,921	1,025	5,946
Local Plan	4,070	981	5,051	5,017	996	6,012
Difference	133			66		

22.1.8 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 134 vehicles during the morning peak hour without LTC implemented.

Findings

22.1.9 On the basis of the above, National Highways may require nil detriment mitigation to be implemented at this location as described in section 14. National Highways have advised that a nil detriment solution does not necessarily mean provision of a slip road to meet the layout requirement, but could instead be a provision sufficient to accommodate the additional Local Plan traffic.

22.1.10 Reference to the layout categories in CD122 (also included at Appendix J) it is noted that the existing layout is a Layout A option 1 (taper merge) with 3 upstream lanes.

22.1.11 It is anticipated that discussions would need to be completed with National Highways to agree whether an improvement to the slip road is necessary and whether a practical nil detriment improvement can be achieved. This may result in a provision of a category B layout with a parallel merge for example (subject to further design study and land constraints).

22.1.12 However, it is noted that the additional vehicles using this merge does not alter the merge requirement beyond that for the Reference Case as illustrated at Appendix K and L.

22.2 Westbound A2 merge

Demand flows

22.2.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,393	556	4,949	4,272	797	5,069
Local Plan	4,505	551	5,055	4,350	905	5,255
Difference	107			185		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,640	438	5,078	4,360	727	5,086
Local Plan	4,821	388	5,209	4,447	845	5,292
Difference	132			205		

22.2.2 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 205 vehicles during the evening peak hour with LTC implemented.

22.2.3 On this basis, further investigation has been completed by reviewing Actual flows as summarised below.

Actual flows

22.2.4 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,330	552	4,882	4,199	766	4,966
Local Plan	4,429	546	4,975	4,266	864	5,130
Difference	92			164		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,582	436	5,017	4,298	697	4,995
Local Plan	4,745	384	5,129	4,374	808	5,182
Difference	112			187		

22.2.5 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 187 vehicles during the evening peak hour with LTC implemented.

22.2.6 On this basis, further investigation has been completed by reviewing Sensitivity flows as summarised below.

Sensitivity flows

22.2.7 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the "no LTC" scenario and "With LTC" scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,330	552	4,882	4,199	766	4,966
Local Plan	4,424	538	4,963	4,273	825	5,098
Difference	80			132		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,582	436	5,017	4,298	697	4,995
Local Plan	4,734	377	5,111	4,385	768	5,153
Difference	94			158		

22.2.8 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 158 vehicles during the evening peak hour with LTC implemented.

Findings

22.2.9 On the basis of the above, National Highways may require nil detriment mitigation to be implemented at this location as described in section 14. National Highways have advised that a nil detriment solution does not necessarily mean provision of a slip road to meet the layout requirement, but could instead be a provision sufficient to accommodate the additional Local Plan traffic.

22.2.10 Reference to the layout categories in CD122 (also included at Appendix J) it is noted that the existing layout is a Layout A option 1 (taper merge) with 3 upstream lanes.

22.2.11 It is anticipated that discussions would need to be completed with National Highways to agree whether an improvement to the slip road is necessary and whether a practical nil detriment improvement can be achieved. This may result in a provision of a category B layout with a parallel merge for example (subject to further design study and land constraints).

22.2.12 However, it is noted that the additional vehicles using this merge does not alter the merge requirement beyond that for the Reference Case as illustrated at Appendix K and L.

22.3 Eastbound A2 diverge

Demand flows

22.3.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,133	1,087	5,220	4,914	470	5,384
Local Plan	4,212	1,111	5,323	5,123	476	5,599
Difference	103			215		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,084	1,100	5,183	5,034	454	5,488
Local Plan	4,127	1,120	5,247	5,266	452	5,717
Difference	64			229		

22.3.2 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 229 vehicles during the evening peak hour with LTC implemented.

22.3.3 On this basis, further investigation has been completed by reviewing Actual flows as summarised below.

Actual flows

22.3.4 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,093	1,077	5,170	4,845	463	5,308
Local Plan	4,118	1,087	5,204	4,928	458	5,386
Difference	34			77		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,040	1,088	5,128	4,921	444	5,365
Local Plan	4,064	1,103	5,167	5,037	432	5,469
Difference	38			103		

22.3.5 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 103 vehicles during the evening peak hour with LTC implemented.

22.3.6 On this basis, further investigation has been completed by reviewing Sensitivity flows as summarised below.

Sensitivity flows

22.3.7 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,093	1,077	5,170	4,845	463	5,308
Local Plan	4,129	1,088	5,217	4,919	457	5,376
Difference	47			68		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,040	1,088	5,128	4,921	444	5,365
Local Plan	4,070	1,104	5,174	5,017	445	5,461
Difference	46			96		

22.3.8 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 96 vehicles during the morning peak hour with LTC implemented.

Findings

22.3.9 On the basis of the findings above, it is considered reasonable to assume that the likely effect of the Local Plan would be less than 100 vehicles on this slip road.

22.3.10 Consequently, it is not anticipated that National Highways would request mitigation to be considered for this slip road on the basis of such an increase.

22.4 Westbound A2 diverge

Demand flows

22.4.1 The tables below summarise the Demand flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,393	832	5,225	4,272	1,049	5,321
Local Plan	4,505	839	5,344	4,350	1,153	5,502
Difference	119			181		

With LTC DEMAND	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,640	821	5,461	4,360	1,085	5,445
Local Plan	4,821	776	5,597	4,447	1,206	5,653
Difference	136			209		

22.4.2 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 209 vehicles during the evening peak hour with LTC implemented.

22.4.3 On this basis, further investigation has been completed by reviewing Actual flows as summarised below.

Actual flows

22.4.4 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,330	820	5,150	4,199	1,031	5,230
Local Plan	4,429	825	5,254	4,266	1,130	5,396
Difference	103			166		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,582	811	5,393	4,298	1,070	5,368
Local Plan	4,745	764	5,509	4,374	1,187	5,561
Difference	116			193		

22.4.5 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 193 vehicles during the evening peak hour with LTC implemented.

22.4.6 On this basis, further investigation has been completed by reviewing Sensitivity flows as summarised below.

Sensitivity flows

22.4.7 The tables below summarise the Actual flows (factored) which have been assessed for this slip road for the “no LTC” scenario and “With LTC” scenario.

No LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined

Reference	4,330	820	5,150	4,199	1,031	5,230
Local Plan	4,424	818	5,242	4,273	1,105	5,378
Difference	91			147		

With LTC ACTUAL	AM peak hour			PM peak hour		
	Upstream	Merge / Diverge	Combined	Merge / Diverge	Upstream	Combined
Reference	4,582	811	5,393	4,298	1,070	5,368
Local Plan	4,734	748	5,482	4,385	1,149	5,534
Difference	89			166		

22.4.8 It is noted from the tables above that the inclusion of the Local Plan increases the use of this slip road by 166 vehicles during the evening peak hour with LTC implemented.

Findings

22.4.9 On the basis of the above, National Highways may require nil detriment mitigation to be implemented at this location as described in section 14. National Highways have advised that a nil detriment solution does not necessarily mean provision of a slip road to meet the layout requirement, but could instead be a provision sufficient to accommodate the additional Local Plan traffic.

22.4.10 Reference to the layout categories in CD122 (also included at Appendix J) it is noted that the existing layout is a Layout A option 1 (taper diverge) with 3 upstream lanes.

22.4.11 It is anticipated that discussions would need to be completed with National Highways to agree whether an improvement to the slip road is necessary and whether a practical nil detriment improvement can be achieved. This may result in a provision of a Layout A option 2 (single lane auxiliary diverge) for example (subject to further design study and land constraints).

22.4.12 However, it is noted that the additional vehicles using this merge does not alter the diverge requirement beyond that for the Reference Case as illustrated on the figure at Appendix K and L.

23 Summary

23.1.1 Stantec have been appointed by the London Borough of Bexley (LB Bexley) to provide strategic modelling evidence in support of their Regulation 19 draft Local Plan. The objective of the strategic modelling appointment is to address comments made by National Highways (NH) during the Regulation 18 stage.

23.1.2 A draft Strategic Transport Modelling Report was submitted to NH for comment during January 2022. Comments were received from NH and additional discussion, modelling and assessment has been completed and included within this report to respond to NH requests.

23.1.3 The donor model used for this study is the LTAM (Lower Thames Area Model) which has been developed by NH to assess the LTC scheme. LB Bexley have been provided with a LB Bexley cordon area of the Lower Thames Area Model (LTAM) by NH and this model forms the basis of the assessment described within this document.

23.1.4 Stantec's remit is to review and update the LTAM to create a 2038 Reference Case model and a 2038 "with Local Plan" model. The purpose is to assess the potential effect of the LB Bexley Local Plan on the SRN. In addition, a sensitivity assessment has also been completed that considers the potential for mode shift away from private car in accordance with the Mayor's Transport Strategy and the London Borough of Bexley Local Implementation Plan.

23.1.5 Prior to progressing the assessment, a scoping exercise was conducted and agreed with NH. Further correspondence and agreement with NH was achieved following submission of the draft report. The scope and methodology adopted within this study reflects the scoping exercise and discussions had with NH officers.

23.1.6 The LB Bexley cordon model has a 2016 base year. The 2016 AM peak hour experiences higher traffic flows on the A282 / M25 corridor than the PM peak hour. With respect to the A2 corridor it is noted that traffic flows are tidal in nature and that the dominant flow tends to be higher in the PM peak hour than the AM peak hour.

23.1.7 With respect to traffic flows passing through each junction, these are generally higher during the morning peak hour than the evening peak hour, with the exception of junction 1b. Junction 2 experiences the highest traffic throughput and this relates to its role of also serving the strategic A2 corridor.

23.1.8 The LTAM model has been interpolated between the years 2036 and 2044 to derive a 2038 baseline model and this is adapted to derive a 2038 Reference Case model and Local Plan scenario model.

23.1.9 The Reference Case scenario has been initially based upon the Uncertainty Log that underpins the LTAM. Each of the UL sites has been reviewed and identified as already having planning permission and hence appropriate to include within the Reference Case. A number of other sites have been included within the Reference Case on the basis that they have been granted planning permission in recent years.

23.1.10 With respect to the Local Plan scenario, residential and non residential development has been added to the LTAM model, over and above the Reference Case allowance, using a number of principles and assumptions. In summary the Local Plan results in an uplift of 11,240 residential units compared to the Reference Case, plus around 380,000m2 of non residential use.

23.1.11 Traffic generation parameters were extracted from TRICS for inclusion to the modelling process and taking on board comments received from NH during the scoping exercise. The potential traffic generation from the Reference Case and Local Plan scenario has been

calculated. The Local Plan scenario is predicted to generate more vehicle trips than the Reference Case scenario.

23.1.12 The distribution of the Reference Case and Local Plan traffic generation is based upon the existing distribution within the LTAM matrices. In effect, the rows and columns of the LTAM matrices were factored to represent the uplift due to either Reference Case traffic or Local Plan traffic.

23.1.13 With respect to the local retail land use and primary school use, whilst the distribution is based upon the existing distribution within the LTAM matrices, a distance constraint has been applied on the basis that local shops and primary schools typically serve local communities and would not be expected to generate long distance journeys.

23.1.14 A sensitivity assessment has been completed that considers a potential mode shift away from the private car and towards sustainable transport modes. Such a mode shift would be consistent with strategy and policy documents.

23.1.15 The implementation of the Local Plan development is predicted to increase flows passing through the J1a to J2 cordon between 1.5% and 2.0% dependent upon which scenario is being considered. This equates to 478 to 597 vehicles.

23.1.16 The LTAM assignments have been reviewed within spreadsheets to determine the potential effect on the SRN of the Local Plan. Each junction on the A282 corridor has been considered as follows :

23.1.17 Junction 1a (west) - Demand flow increases by 2.5% to 4.9% with the absolute increase lying in a range between 110 and 188 vehicles. Link delays only change by 0 to 1 second for all links as a result of Local Plan development and all links experience a V/C below 100%.

23.1.18 Junction 1a (east) - Demand flow increases by 1.4% to 3.5% with the absolute increase lying in the range between 72 and 168 PCUs. Link delays only change by 0 to 1 second for all links with the exception of the southbound on slip during the evening peak hour for the “with LTC” scenario which changes by 30 seconds. All links experience a V/C below 100% with the exception of the southbound on slip which exceeds 100% for the Reference Case (101.2%) and Local Plan scenario (102.8%) during the PM peak hour in the “with LTC” scenario.

23.1.19 Junction 1b - Demand flow increases by 1.1% to 2.8% with the increase in absolute vehicle numbers lying in the range between 50 and 114 vehicles. Link delays only change by 0 to 1 seconds for all links and all links experience a V/C below 100%.

23.1.20 Junction 2 – Demand flow increases by 0.7% to 2.3% with the increase in absolute vehicle numbers lying in the range between 42 and 136 vehicles. Link delays only change by 0 to 1 seconds for all links with the exception of the southbound on slip during the morning peak hour for the “with LTC” scenario which changes by 6 seconds. All links experience a V/C below 100% with the exception of the SB on slip during the morning peak hour of both scenarios, albeit the change is marginal.

23.1.21 National Highways have requested more detailed modelling be completed for Junctions 1a, 1b and 2 using TRANSYT. National Highways have advised that for the purposes of Local Plan evidence they would be content with future year models based upon sensible input parameters and the SATURN model flows described within this report. On this basis a TRANSYT model has been developed for each junction. The findings are as follows :

23.1.22 Junction 1a – A mitigation measure comprising white lining changes at Bob Dun Way would mitigate the effects of the Local Plan traffic at this junction.

23.1.23 Junction 1b – A mitigation measure comprising adjustment of the A282 northbound entry lanes would mitigate the effects of the Local Plan traffic at this junction.

23.1.24 Junction 2 – A mitigation measure comprising adjustment of the movement continuing around the circulatory after the M25 northbound on-slip. An additional lane is provided within the model and this would mitigate the effects of the Local Plan traffic at this junction.

23.1.25 With respect to the merge and diverge slip roads National Highways may require nil detriment mitigation to be implemented at the locations summarised below. It is anticipated that discussions would need to be completed with National Highways to agree whether an improvement to these slip roads is necessary and whether a practical nil detriment improvement can be achieved.

23.1.26 Junction 1a Southbound A282 merge - This may result in a provision of a category C layout, a ghost island merge for example (subject to further design study and land constraints).

23.1.27 Junction 1b Southbound A282 diverge - This may result in a provision of a category B Option 1 layout, a ghost island diverge for example (subject to further design study and land constraints).

23.1.28 Junction 2 Interchange filter roads Eastbound A2 merge (filter from A282) - It is unlikely that a practical physical mitigation measure can be implemented at this location to offset the effect of this modest number of vehicles. However, it is noted that the addition of 126 vehicles using this merge does not alter the merge requirement beyond that for the Reference Case.

23.1.29 Junction 2 Westbound A2 diverge (filter to A282) - This may result in a provision of a category F layout with a mainline lane drop and ghost island diverge for example (subject to further design study and land constraints).

23.1.30 Junction 2 Westbound A2 merge - This may result in a provision of a category C layout with a ghost island merge for example (subject to further design study and land constraints).

23.1.31 Junction 2 Westbound A2 diverge - It is anticipated that discussions would need to be completed with National Highways to agree whether an improvement to the slip road is necessary and whether a practical nil detriment improvement can be achieved. However, it is noted that the addition of 134 vehicles using this merge does not alter the diverge requirement beyond that for the Reference Case.

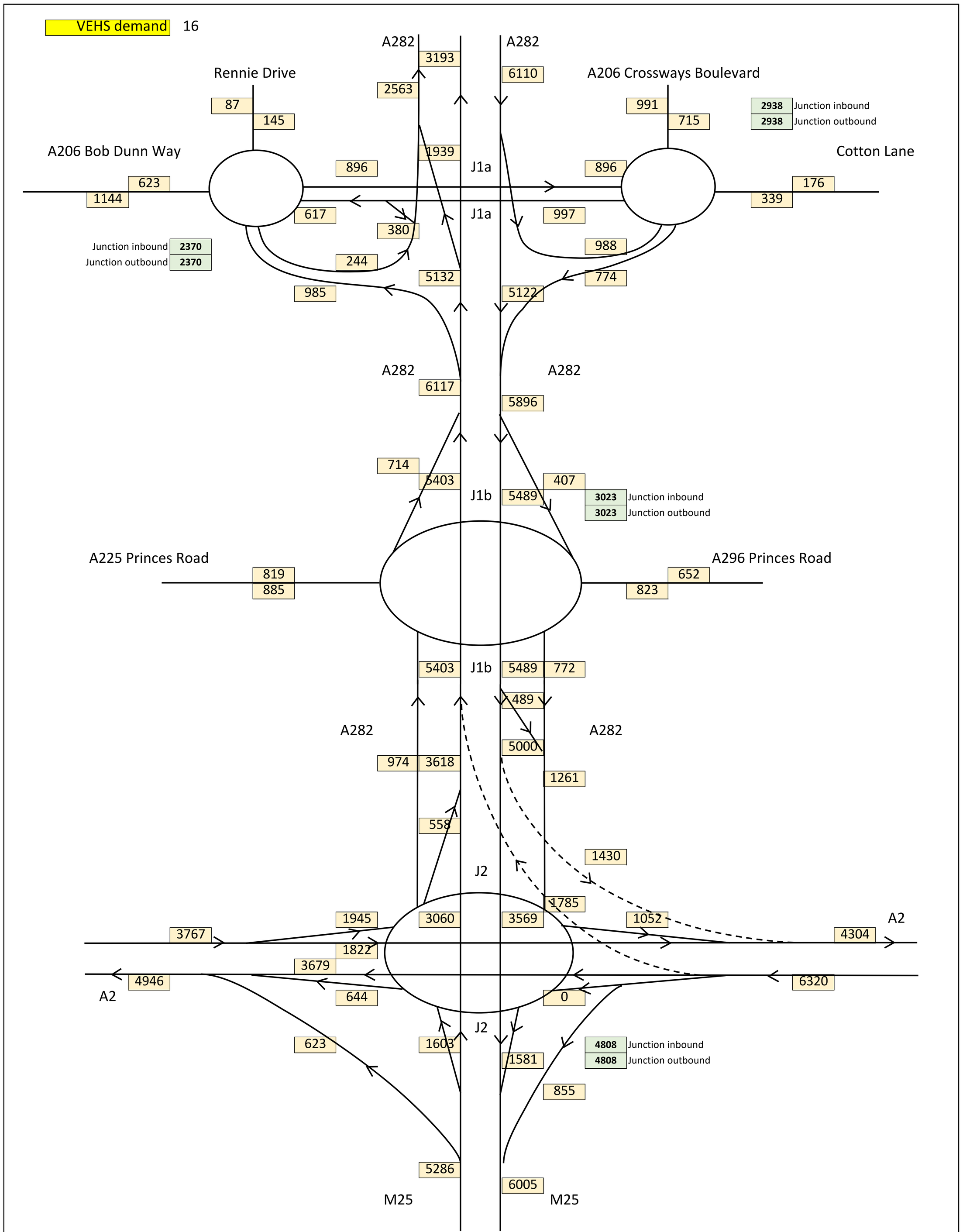
23.1.32 A2 Bean junction - It is anticipated that discussions would need to be completed with National Highways to agree whether an improvement to the slip roads at this junction are necessary and whether a practical nil detriment improvement can be achieved. Such a discussion would need to be in the context of the Bean junction improvements being undertaken and the extent to which these allow for strategic growth.

23.1.33 A2 / A2018 Old Bexley Lane Eastbound merge - This may result in a provision of a category B layout with a parallel merge for example (subject to further design study and land constraints).

23.1.34 A2 / A2018 Old Bexley Lane Westbound A2 merge - This may result in a provision of a category B layout with a parallel merge for example (subject to further design study and land constraints).

23.1.35 A2 / A2018 Old Bexley Lane Westbound A2 diverge - This may result in a provision of a Layout A option 2 (single lane auxiliary diverge) for example (subject to further design study and land constraints).

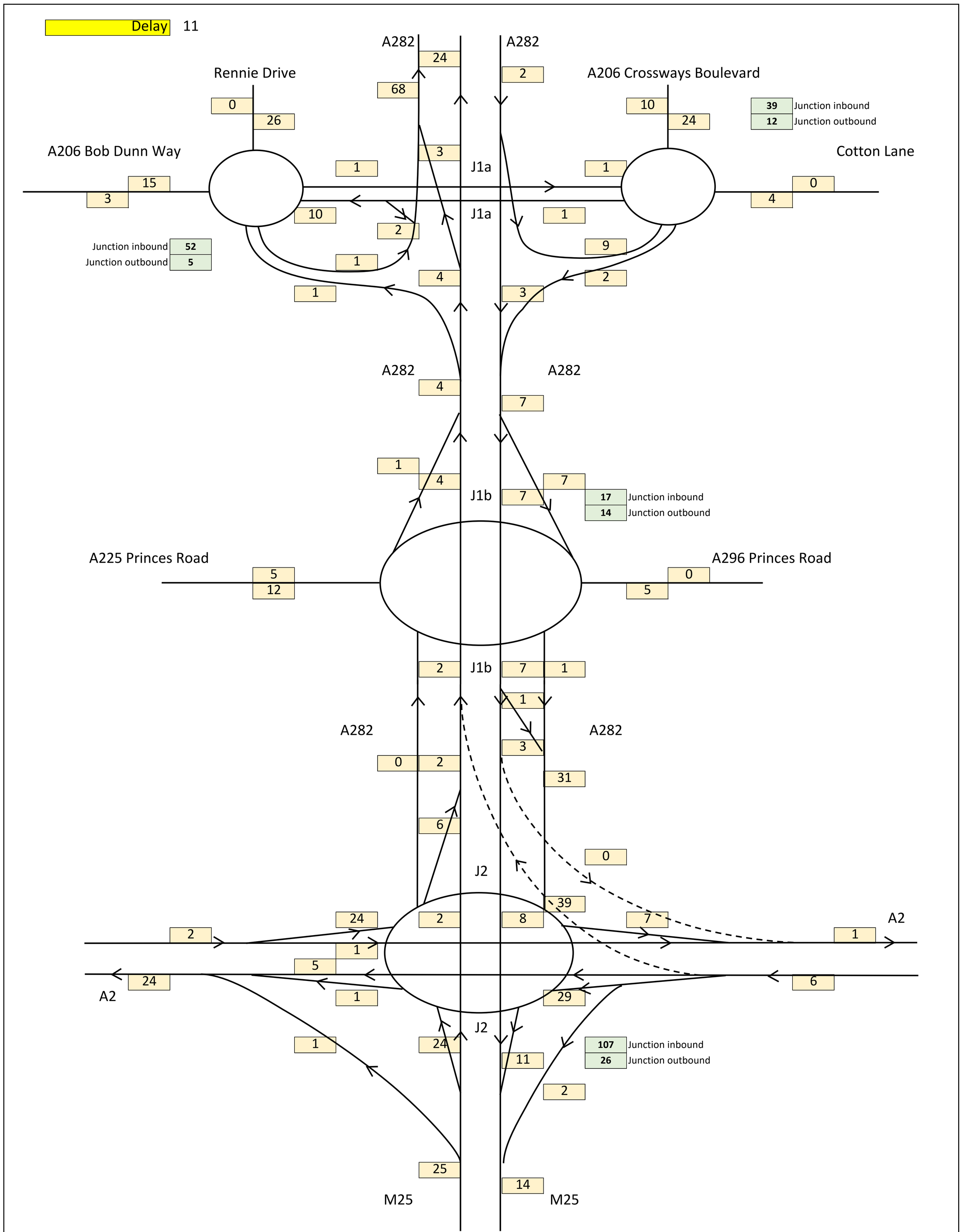
Appendix A
2016 flows



2016 Base Year (0700-0800)

Demand flow (Vehicles)

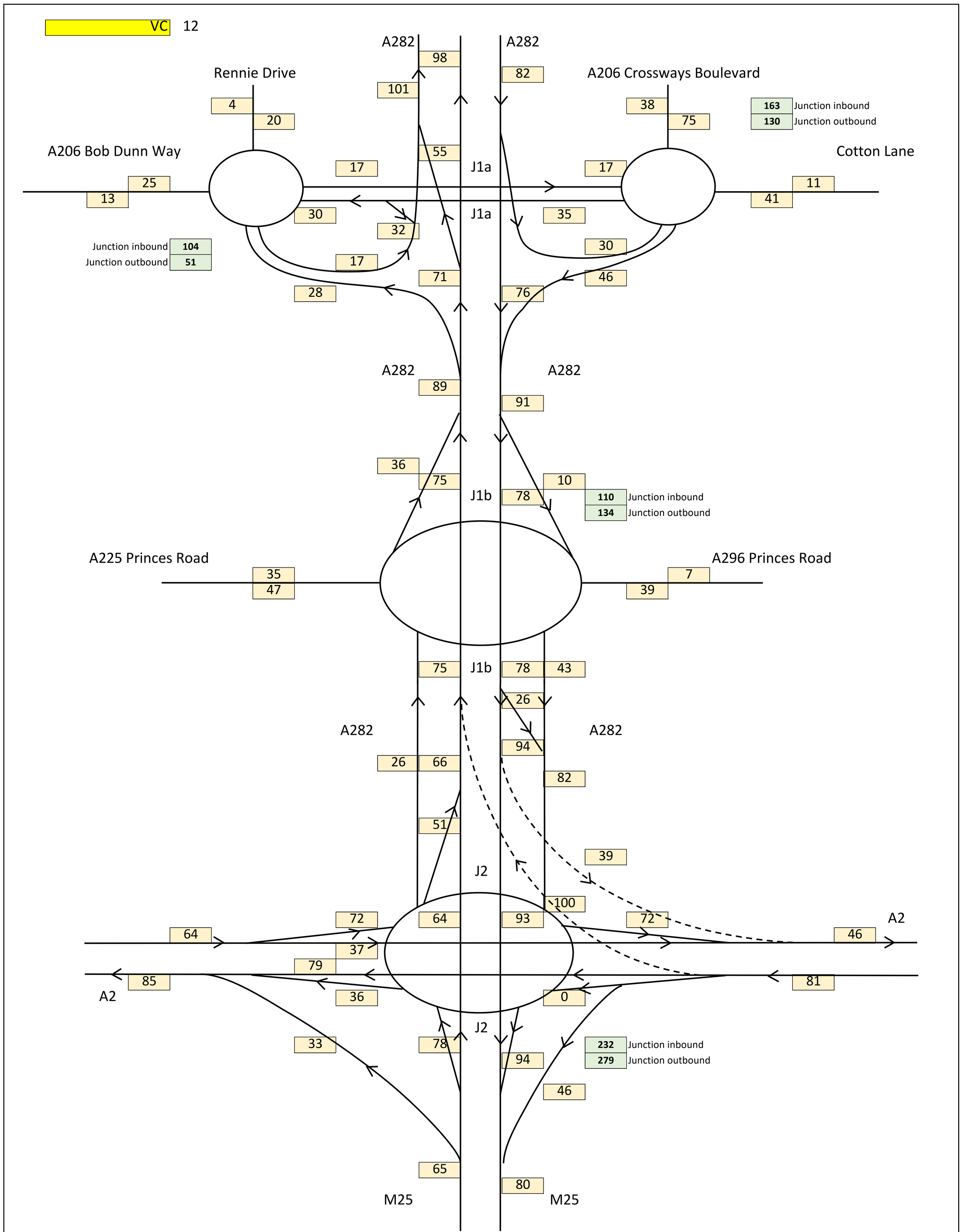
Figure A1



2016 Base Year (0700-0800)

Link Delay (seconds)

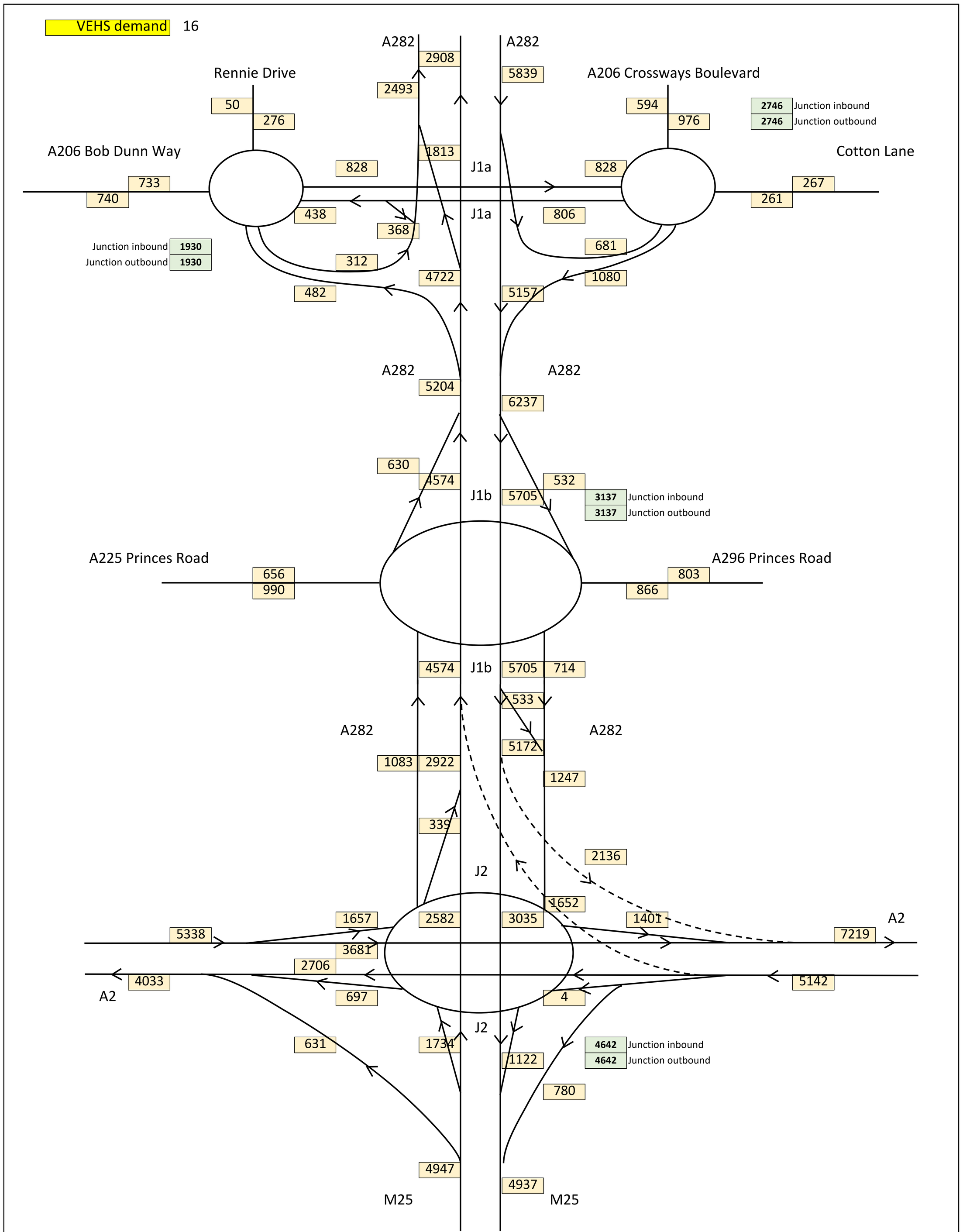
Figure A2



2016 Base Year (0700-0800)

Link V / C (%)

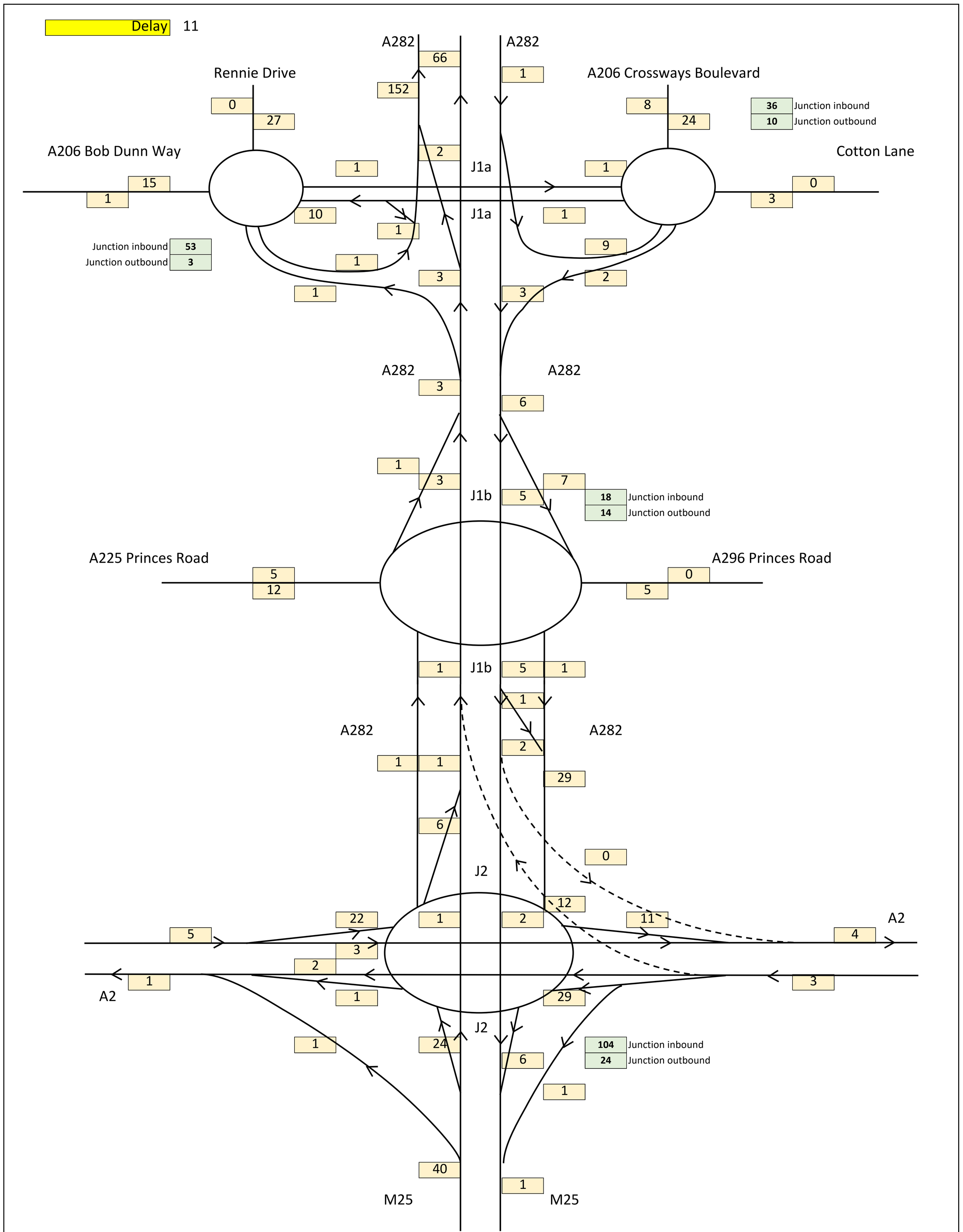
Figure A3



2016 Base Year (1700-1800)

Demand flow (Vehicles)

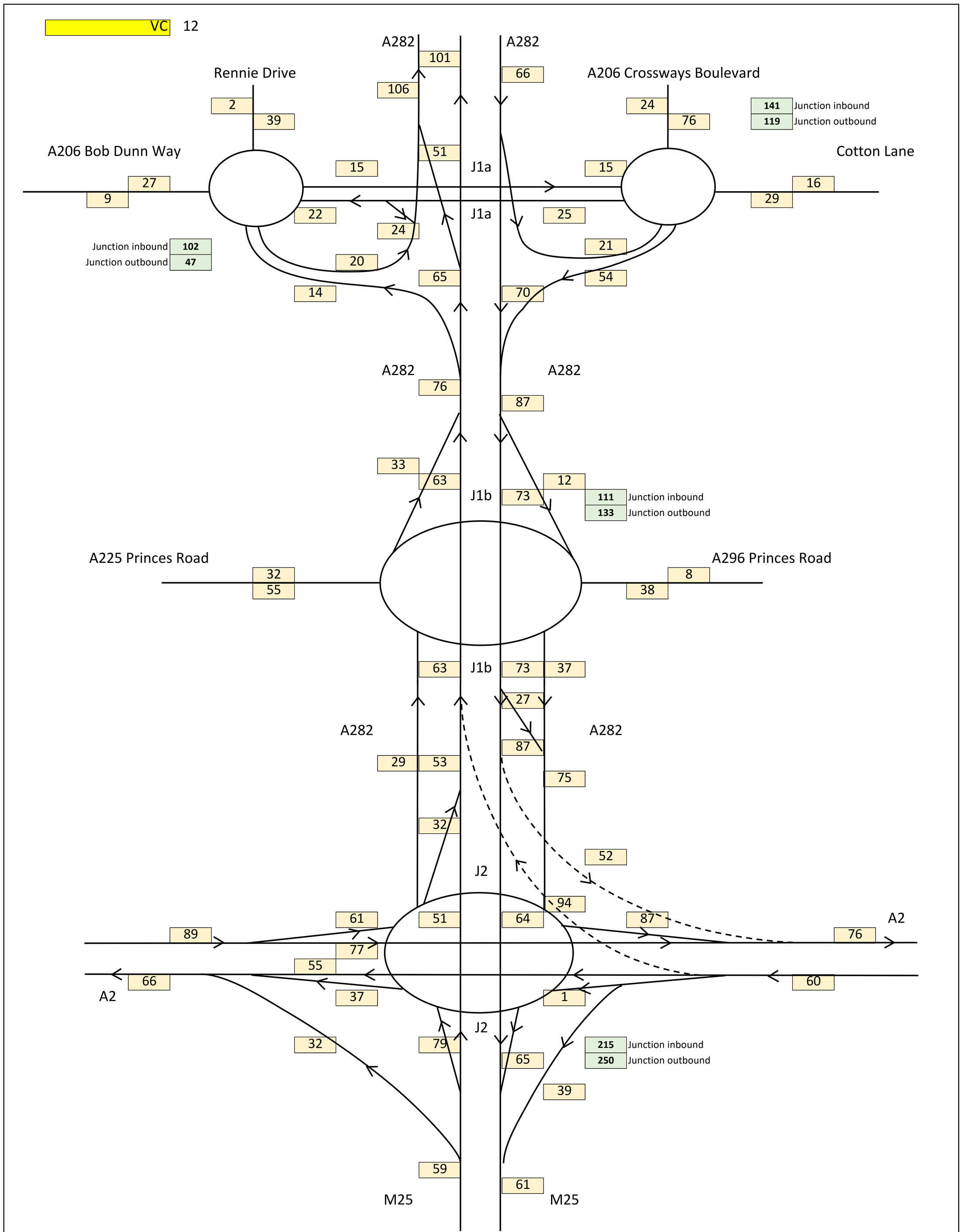
Figure A4



2016 Base Year (1700-1800)

Link Delay (seconds)

Figure A5



2016 Base Year (1700-1800)

Link V / C (%)

Figure A6

Appendix B
Reference Case land use

Reference Case land use

		3,358	1,146	4,326	1,646	23,418	3,534	37,226	69,177	86,217	4,370	3,713	0	25,682	5,557	0	0	-806
Description of zone	**Bexley zone number**	**Houses**	**Flats**	**Retail park including food**	**Local retail**	**Office**	**Pub / restaurant**	**B1c industrial**	**B2 industrial**	**B8 storage / warehouse**	**Leisure centre**	**Community centre**	**Secondary school**	**Primary school**	**Hospital**	**Clinic**	**Care home**	**Sui Generis**
Shenstone Park	**6208**	0	10	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Broadway	**6209**	0	518	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Hillsgrove	**6210**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Bexleyheath	**6211**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Norman Road	**6212**	402	69	2,011	0	18,572	1,276	35,846	19,815	66,071	782	0	0	0	0	0	0	325
Gilbert Road	**6213**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Abbey Wood	**6214**	1,622	0	2,315	1,646	7,922	1,839	0	4,850	0	1,952	1,692	0	1,761	0	0	0	0
Crossness	**6215**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Eastern Thamesmead	**6216**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Rochester Drive	**6217**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Coldblow	**6218**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Bexley	**6219**	6	4	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Danson Park South	**6220**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Hurst	**6221**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Eastcote	**6222**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Falconwood	**6223**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
North Cray	**6224**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	-1,131
Foots Cray	**6225**	0	0	0	0	3,673	0	0	9,898	0	0	0	0	0	0	0	0	0
Queen Mary's Hospital	**6226**	0	0	0	0	0	0	0	0	0	0	0	0	0	5,557	0	0	0
Waring Park	**6227**	0	12	0	0	0	0	0	0	0	0	0	0	6,616	0	0	0	0
Welling	**6228**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Danson Park West	**6229**	0	0	0	0	0	0	0	0	0	0	0	0	6,795	0	0	0	0
Sherwood Park	**6230**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Abbeyhill Park	**6231**	0	0	0	0	0	0	0	0	0	0	0	0	1,695	0	0	0	0
East Wickham	**6232**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Lovel Avenue	**6233**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Northdown Road	**6234**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Boundary Road	**6235**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Marlborough	**6236**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Blackfen	**6237**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Blendon	**6238**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Holland Gardens	**6239**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Harland Avenue	**6240**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Lamorbey	**6241**	0	26	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Longlands Recreation Ground	**6242**	0	0	0	0	-1,160	0	0	0	0	0	0	0	0	0	0	0	0
Lossness Heath	**6243**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Upper Belvedere	**6244**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Park view	**6245**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Bexleyheath Golf Course	**6246**	11	0	0	0	0	0	0	0	0	0	0	0	1,617	0	0	0	0
Manor Way	**6247**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Barneshurst	**6248**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Northumberland Heath	**6249**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Burstead Wood	**6250**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Anderson Way Industrial	**6251**	0	0	0	0	0	0	0	28,600	0	0	2,021	0	0	0	0	0	0
Erith	**6252**	0	30	0	0	-3,569	0	0	0	-696	0	0	0	0	0	0	0	0
Frankis Park	**6253**	352	8	0	0	-2,020	0	0	0	0	0	0	0	7,198	0	0	0	0
Erith Park	**6254**	244	57	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Slade Green	**6255**	708	0	0	0	0	0	1,040	0	0	0	0	0	0	0	0	0	0
Thames Road	**6256**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Frinstead Road	**6257**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Barnes Cray	**6258**	0	18	0	0	0	0	340	6,014	20,842	0	0	0	0	0	0	0	0
Crayford	**6259**	13	394	0	0	0	419	0	0	0	1,636	0	0	0	0	0	0	0
		3,358	1,146	4,326	1,646	23,418	3,534	37,226	69,177	86,217	4,370	3,713	0	25,682	5,557	0	0	-806

Appendix C
Local Plan land use

Local Plan land use

Factor to extrapolate non resi from 2036 to 2038 > 1.133

		8,014	1,904	0	18,700	44,356	9,758	50,751	43,724	117,940	11,639	0	45,040	23,959	0	11,900	487	0
Description of zone	**Bexley zone number**	**Houses**	**Flats**	**Retail park including food**	**Local retail**	**Office**	**Pub / restaurant**	**B1c industrial**	**B2 industrial**	**B8 storage / warehouse**	**Leisure centre**	**Community centre**	**Secondary school**	**Primary school**	**Hospital**	**Clinic**	**Care home**	**Sui Generis**
Shenstone Park	**6208**	161	38	0	693	0	0	0	0	0	0	0	1,553	826	0	458	19	0
Broadway	**6209**	469	111	0	693	5,175	1,626	0	0	0	1,940	0	1,553	826	0	458	19	0
Hillsgrove	**6210**	0	0	0	0	0	0	0	0	0	0	0	1,553	826	0	0	0	0
Bexleyheath	**6211**	180	43	0	693	0	0	0	0	0	0	0	0	0	0	458	19	0
Norman Road	**6212**	544	129	0	693	7,076	1,626	7,250	6,246	16,849	1,940	0	1,553	826	0	0	0	0
Gilbert Road	**6213**	161	38	0	693	0	0	0	0	0	0	0	0	0	0	458	19	0
Abbey Wood	**6214**	1,202	286	0	693	0	0	0	0	0	0	0	1,553	826	0	458	19	0
Crossness	**6215**	0	0	0	0	1,901	0	7,250	6,246	16,849	0	0	1,553	826	0	0	0	0
Eastern Thamesmead	**6216**	0	0	0	0	0	0	0	0	0	0	0	1,553	826	0	0	0	0
Rochester Drive	**6217**	0	0	0	0	0	0	0	0	0	0	0	1,553	826	0	0	0	0
Coldblow	**6218**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Bexley	**6219**	161	38	0	693	0	0	0	0	0	0	0	0	0	0	458	19	0
Danson Park South	**6220**	0	0	0	0	0	0	0	0	0	0	0	1,553	826	0	0	0	0
Hurst	**6221**	161	38	0	693	0	0	0	0	0	0	0	0	0	0	458	19	0
Eastcote	**6222**	0	0	0	0	0	0	0	0	0	0	0	1,553	826	0	0	0	0
Falconwood	**6223**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
North Cray	**6224**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Foots Cray	**6225**	0	0	0	0	1,901	0	7,250	6,246	16,849	0	0	1,553	826	0	0	0	0
Queen Mary's Hospital	**6226**	0	0	0	0	0	0	0	0	0	0	0	1,553	826	0	0	0	0
Waring Park	**6227**	161	38	0	693	0	0	0	0	0	0	0	1,553	826	0	458	19	0
Welling	**6228**	161	38	0	693	5,175	1,626	0	0	0	1,940	0	0	0	0	458	19	0
Danson Park West	**6229**	161	38	0	693	0	0	0	0	0	0	0	1,553	826	0	458	19	0
Sherwood Park	**6230**	161	38	0	693	0	0	0	0	0	0	0	0	0	0	458	19	0
Abbeyhill Park	**6231**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
East Wickham	**6232**	161	38	0	693	0	0	0	0	0	0	0	1,553	826	0	458	19	0
Lovel Avenue	**6233**	161	38	0	693	0	0	0	0	0	0	0	0	0	0	458	19	0
Northdown Road	**6234**	161	38	0	693	0	0	0	0	0	0	0	1,553	826	0	458	19	0
Boundary Road	**6235**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Marlborough	**6236**	0	0	0	0	0	0	0	0	0	0	0	1,553	826	0	0	0	0
Blackfen	**6237**	161	38	0	693	0	0	0	0	0	0	0	1,553	826	0	458	19	0
Blendon	**6238**	161	38	0	693	0	0	0	0	0	0	0	1,553	826	0	458	19	0
Holland Gardens	**6239**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Harland Avenue	**6240**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Lamorbey	**6241**	161	38	0	693	0	0	0	0	0	0	0	1,553	826	0	458	19	0
Longlands Recreation Ground	**6242**	161	38	0	693	5,175	1,626	0	0	0	1,940	0	1,553	826	0	458	19	0
Lossness Heath	**6243**	161	38	0	693	0	0	0	0	0	0	0	0	0	0	458	19	0
Upper Belvedere	**6244**	0	0	0	0	0	0	0	0	0	0	0	1,553	826	0	0	0	0
Park view	**6245**	161	38	0	693	0	0	0	0	0	0	0	0	0	0	458	19	0
Bexleyheath Golf Course	**6246**	0	0	0	0	0	0	0	0	0	0	0	1,553	826	0	0	0	0
Manor Way	**6247**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Barneshurst	**6248**	161	38	0	693	0	0	0	0	0	0	0	0	0	0	458	19	0
Northumberland Heath	**6249**	161	38	0	693	0	0	0	0	0	0	0	1,553	826	0	458	19	0
Burstead Wood	**6250**	308	73	0	693	0	0	0	0	0	0	0	1,553	826	0	458	19	0
Anderson Way Industrial	**6251**	479	114	0	0	1,901	0	7,250	6,246	16,849	0	0	0	0	0	0	0	0
Erith	**6252**	773	184	0	693	5,175	1,626	0	0	0	1,940	0	0	0	0	458	19	0
Frankis Park	**6253**	0	0	0	0	0	0	0	0	0	0	0	1,553	826	0	0	0	0
Erith Park	**6254**	161	38	0	693	0	0	0	0	0	0	0	1,553	826	0	458	19	0
Slade Green	**6255**	155	37	0	0	1,901	0	7,250	6,246	16,849	0	0	0	0	0	0	0	0
Thames Road	**6256**	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Frinstead Road	**6257**	0	0	0	0	0	0	0	0	0	0	0	1,553	826	0	0	0	0
Barnes Cray	**6258**	0	0	0	0	1,901	0	7,250	6,246	16,849	0	0	0	0	0	0	0	0
Crayford	**6259**	681	162	0	693	7,076	1,626	7,250	6,246	16,849	1,940	0	1,553	826	0	458	19	0
		8,014	1,904	0	18,700	44,356	9,758	50,751	43,724	117,940	11,639	0	45,040	23,959	0	11,900	487	0

Appendix D
Urban trip rates

Filtering Summary

Land Use	03/C	RESIDENTIAL/FLATS PRIVATELY OWNED
Selected Trip Rate Calculation Parameter Range	9-493 DWELLS	
Actual Trip Rate Calculation Parameter Range	14-493 DWELLS	
Date Range	Minimum: 01/01/13	Maximum: 30/06/21
Parking Spaces Range	All Surveys Included	
Parking Spaces Per Dwelling Range:	All Surveys Included	
Bedrooms Per Dwelling Range:	All Surveys Included	
Percentage of dwellings privately owned:	All Surveys Included	
Days of the week selected	Monday	2
	Tuesday	1
	Wednesday	5
	Friday	2
Main Location Types selected	Edge of Town Centre	3
	Suburban Area (PPS6 Out of Centre)	5
	Edge of Town	2
Population within 500m	All Surveys Included	
Population <1 Mile ranges selected	10,001 to 15,000	1
	15,001 to 20,000	1
	20,001 to 25,000	1
	25,001 to 50,000	6
	50,001 to 100,000	1
Population <5 Mile ranges selected	125,001 to 250,000	1
	500,001 or More	9
Car Ownership <5 Mile ranges selected	0.5 or Less	1
	0.6 to 1.0	7
	1.1 to 1.5	2
PTAL Rating	1a (Low) Very poor	1
	2 Poor	6
	3 Moderate	2
	4 Good	1

Calculation Reference: AUDIT-706709-220125-0140

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 03 - RESIDENTIAL
Category : C - FLATS PRIVATELY OWNED
TOTAL VEHICLES

Selected regions and areas:

01	GREATER LONDON	
BE	BEXLEY	2 days
BT	BRENT	1 days
EN	ENFIELD	1 days
HG	HARINGEY	1 days
HO	HOUNSLOW	2 days
HV	HAVERING	1 days
KI	KINGSTON	1 days
RD	RICHMOND	1 days

This section displays the number of survey days per TRICS® sub-region in the selected set

Primary Filtering selection:

This data displays the chosen trip rate parameter and its selected range. Only sites that fall within the parameter range are included in the trip rate calculation.

Parameter: No of Dwellings
Actual Range: 14 to 493 (units:)
Range Selected by User: 9 to 493 (units:)

Parking Spaces Range: All Surveys Included

Parking Spaces per Dwelling Range: All Surveys Included

Bedrooms per Dwelling Range: All Surveys Included

Percentage of dwellings privately owned: All Surveys Included

Public Transport Provision:
Selection by: Include all surveys

Date Range: 01/01/13 to 30/06/21

This data displays the range of survey dates selected. Only surveys that were conducted within this date range are included in the trip rate calculation.

Selected survey days:

Monday	2 days
Tuesday	1 days
Wednesday	5 days
Friday	2 days

This data displays the number of selected surveys by day of the week.

Selected survey types:

Manual count	10 days
Directional ATC Count	0 days

This data displays the number of manual classified surveys and the number of unclassified ATC surveys, the total adding up to the overall number of surveys in the selected set. Manual surveys are undertaken using staff, whilst ATC surveys are undertaking using machines.

Selected Locations:

Edge of Town Centre	3
Suburban Area (PPS6 Out of Centre)	5
Edge of Town	2

This data displays the number of surveys per main location category within the selected set. The main location categories consist of Free Standing, Edge of Town, Suburban Area, Neighbourhood Centre, Edge of Town Centre, Town Centre and Not Known.

Selected Location Sub Categories:

Industrial Zone	1
Development Zone	2
Residential Zone	5
Built-Up Zone	2

This data displays the number of surveys per location sub-category within the selected set. The location sub-categories consist of Commercial Zone, Industrial Zone, Development Zone, Residential Zone, Retail Zone, Built-Up Zone, Village, Out of Town, High Street and No Sub Category.

Secondary Filtering selection:

Use Class:

C3	10 days

This data displays the number of surveys per Use Class classification within the selected set. The Use Classes Order 2005 has been used for this purpose, which can be found within the Library module of TRICS®.

Population within 500m Range:

All Surveys Included

Population within 1 mile:

10,001 to 15,000	1 days
15,001 to 20,000	1 days
20,001 to 25,000	1 days
25,001 to 50,000	6 days
50,001 to 100,000	1 days

This data displays the number of selected surveys within stated 1-mile radii of population.

Population within 5 miles:

125,001 to 250,000	1 days
500,001 or More	9 days

This data displays the number of selected surveys within stated 5-mile radii of population.

Car ownership within 5 miles:

0.5 or Less	1 days
0.6 to 1.0	7 days
1.1 to 1.5	2 days

This data displays the number of selected surveys within stated ranges of average cars owned per residential dwelling, within a radius of 5-miles of selected survey sites.

Travel Plan:

Yes	5 days
No	5 days

This data displays the number of surveys within the selected set that were undertaken at sites with Travel Plans in place, and the number of surveys that were undertaken at sites without Travel Plans.

PTAL Rating:

1a (Low) Very poor	1 days
2 Poor	6 days
3 Moderate	2 days
4 Good	1 days

This data displays the number of selected surveys with PTAL Ratings.

Covid-19 Restrictions	Yes	At least one survey within the selected data set was undertaken at a time of Covid-19 restrictions

LIST OF SITES relevant to selection parameters

1 BE-03-C-01 BLOCKS OF FLATS BEXLEY
CROOK LOG
BEXLEYHEATH

Edge of Town Centre
Residential Zone
Total No of Dwellings: 79
Survey date: WEDNESDAY *19/09/18* *Survey Type: MANUAL*

2 BE-03-C-02 BLOCKS OF FLATS BEXLEY
CLYDESDALE WAY
BELVEDERE

Edge of Town
Industrial Zone
Total No of Dwellings: 402
Survey date: WEDNESDAY *19/09/18* *Survey Type: MANUAL*

3 BT-03-C-01 BLOCKS OF FLATS BRENT
LAKESIDE DRIVE
PARK ROYAL

Suburban Area (PPS6 Out of Centre)
Development Zone
Total No of Dwellings: 170
Survey date: WEDNESDAY *28/09/16* *Survey Type: MANUAL*

4 EN-03-C-01 BLOCK OF FLATS ENFIELD
SOUTH STREET
ENFIELD

Suburban Area (PPS6 Out of Centre)
Built-Up Zone
Total No of Dwellings: 16
Survey date: MONDAY *16/11/15* *Survey Type: MANUAL*

5 HG-03-C-02 BLOCK OF FLATS HARINGEY
HIGH ROAD
WOOD GREEN
WOODSIDE PARK
Suburban Area (PPS6 Out of Centre)
Residential Zone
Total No of Dwellings: 30
Survey date: WEDNESDAY *01/10/14* *Survey Type: MANUAL*

6 HO-03-C-03 BLOCKS OF FLATS HOUNSLOW
COMMERCE ROAD
BRENTFORD

Edge of Town Centre
Development Zone
Total No of Dwellings: 150
Survey date: FRIDAY *18/11/16* *Survey Type: MANUAL*

7 HO-03-C-05 BLOCK OF FLATS HOUNSLOW
PARK LANE
HOUNSLOW
CRANFORD
Edge of Town
Residential Zone
Total No of Dwellings: 14
Survey date: FRIDAY *06/03/20* *Survey Type: MANUAL*

LIST OF SITES relevant to selection parameters (Cont.)

8	HV-03-C-02 WATERLOO ROAD ROMFORD	BLOCKS OF FLATS		HAVERING
	Suburban Area (PPS6 Out of Centre) Built-Up Zone Total No of Dwellings:		493	
	Survey date: TUESDAY		*22/11/16*	*Survey Type: MANUAL*
9	KI-03-C-03 PORTSMOUTH ROAD SURBITON	BLOCK OF FLATS		KINGSTON
	Edge of Town Centre Residential Zone Total No of Dwellings:		20	
	Survey date: MONDAY		*11/07/16*	*Survey Type: MANUAL*
10	RD-03-C-05 BESSANT DRIVE KEW	BLOCKS OF FLATS		RICHMOND
	Suburban Area (PPS6 Out of Centre) Residential Zone Total No of Dwellings:		170	
	Survey date: WEDNESDAY		*30/06/21*	*Survey Type: MANUAL*

This section provides a list of all survey sites and days in the selected set. For each individual survey site, it displays a unique site reference code and site address, the selected trip rate calculation parameter and its value, the day of the week and date of each survey, and whether the survey was a manual classified count or an ATC count.

TRIP RATE for Land Use 03 - RESIDENTIAL/C - FLATS PRIVATELY OWNED
TOTAL VEHICLES
Calculation factor: 1 DWELLS
BOLD print indicates peak (busiest) period

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	No. Days	Ave. DWELLS	Trip Rate	No. Days	Ave. DWELLS	Trip Rate	No. Days	Ave. DWELLS	Trip Rate
00:00 - 01:00									
01:00 - 02:00									
02:00 - 03:00									
03:00 - 04:00									
04:00 - 05:00									
05:00 - 06:00									
06:00 - 07:00									
07:00 - 08:00	10	154	0.038	10	154	0.108	10	154	0.146
08:00 - 09:00	10	154	0.040	10	154	0.119	10	154	0.159
09:00 - 10:00	10	154	0.052	10	154	0.059	10	154	0.111
10:00 - 11:00	10	154	0.051	10	154	0.060	10	154	0.111
11:00 - 12:00	10	154	0.043	10	154	0.062	10	154	0.105
12:00 - 13:00	10	154	0.049	10	154	0.047	10	154	0.096
13:00 - 14:00	10	154	0.062	10	154	0.070	10	154	0.132
14:00 - 15:00	10	154	0.049	10	154	0.054	10	154	0.103
15:00 - 16:00	10	154	0.075	10	154	0.063	10	154	0.138
16:00 - 17:00	10	154	0.098	10	154	0.065	10	154	0.163
17:00 - 18:00	10	154	0.120	10	154	0.076	10	154	0.196
18:00 - 19:00	10	154	0.118	10	154	0.067	10	154	0.185
19:00 - 20:00	7	144	0.118	7	144	0.076	7	144	0.194
20:00 - 21:00	7	144	0.108	7	144	0.071	7	144	0.179
21:00 - 22:00									
22:00 - 23:00									
23:00 - 24:00									
Total Rates:			1.021			0.997			2.018

This section displays the trip rate results based on the selected set of surveys and the selected count type (shown just above the table). It is split by three main columns, representing arrivals trips, departures trips, and total trips (arrivals plus departures). Within each of these main columns are three sub-columns. These display the number of survey days where count data is included (per time period), the average value of the selected trip rate calculation parameter (per time period), and the trip rate result (per time period). Total trip rates (the sum of the column) are also displayed at the foot of the table.

*To obtain a trip rate, the average (mean) trip rate parameter value (TRP) is first calculated for all selected survey days that have count data available for the stated time period. The average (mean) number of arrivals, departures or totals (whichever applies) is also calculated (COUNT) for all selected survey days that have count data available for the stated time period. Then, the average count is divided by the average trip rate parameter value, and multiplied by the stated calculation factor (shown just above the table and abbreviated here as FACT). So, the method is: COUNT/TRP*FACT. Trip rates are then rounded to 3 decimal places.*

Parameter summary

Trip rate parameter range selected:	14 - 493 (units:)
Survey date date range:	01/01/13 - 30/06/21
Number of weekdays (Monday-Friday):	10
Number of Saturdays:	0
Number of Sundays:	0
Surveys automatically removed from selection:	3
Surveys manually removed from selection:	0

This section displays a quick summary of some of the data filtering selections made by the TRICS® user. The trip rate calculation parameter range of all selected surveys is displayed first, followed by the range of minimum and maximum survey dates selected by the user. Then, the total number of selected weekdays and weekend days in the selected set of surveys are show. Finally, the number of survey days that have been manually removed from the selected set outside of the standard filtering procedure are displayed.

Filtering Summary

Land Use	03/M	RESIDENTIAL/MIXED PRIVATE/AFFORDABLE HOUSING
Selected Trip Rate Calculation Parameter Range	40-1751 DWELLS	
Actual Trip Rate Calculation Parameter Range	45-343 DWELLS	
Date Range	Minimum: 01/01/13	Maximum: 12/10/21
Parking Spaces Range	All Surveys Included	
Parking Spaces Per Dwelling Range:	All Surveys Included	
Bedrooms Per Dwelling Range:	All Surveys Included	
Percentage of dwellings privately owned:	All Surveys Included	
Days of the week selected	Tuesday	2
	Wednesday	5
	Thursday	2
Main Location Types selected	Edge of Town Centre	1
	Suburban Area (PPS6 Out of Centre)	4
	Edge of Town	1
	Neighbourhood Centre (PPS6 Local Centre)	3
Population within 500m	All Surveys Included	
Population <1 Mile ranges selected	25,001 to 50,000	9
Population <5 Mile ranges selected	500,001 or More	9
Car Ownership <5 Mile ranges selected	0.6 to 1.0	6
	1.1 to 1.5	3
PTAL Rating	1a (Low) Very poor	1
	1b Very poor	4
	2 Poor	2
	3 Moderate	1
	4 Good	1

Calculation Reference: AUDIT-706709-220201-0211

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 03 - RESIDENTIAL
Category : M - MIXED PRIVATE/AFFORDABLE HOUSING
TOTAL VEHICLES

Selected regions and areas:

01	GREATER LONDON		
	BE	BEXLEY	2 days
	BN	BARNET	1 days
	EN	ENFIELD	2 days
	HD	HILLINGDON	2 days
	HO	HOUNSLOW	1 days
	RD	RICHMOND	1 days

This section displays the number of survey days per TRICS® sub-region in the selected set

Primary Filtering selection:

This data displays the chosen trip rate parameter and its selected range. Only sites that fall within the parameter range are included in the trip rate calculation.

Parameter: No of Dwellings
Actual Range: 45 to 343 (units:)
Range Selected by User: 40 to 1751 (units:)

Parking Spaces Range: All Surveys Included

Parking Spaces per Dwelling Range: All Surveys Included

Bedrooms per Dwelling Range: All Surveys Included

Percentage of dwellings privately owned: All Surveys Included

Public Transport Provision:
Selection by: Include all surveys

Date Range: 01/01/13 to 12/10/21

This data displays the range of survey dates selected. Only surveys that were conducted within this date range are included in the trip rate calculation.

Selected survey days:

Tuesday	2 days
Wednesday	5 days
Thursday	2 days

This data displays the number of selected surveys by day of the week.

Selected survey types:

Manual count	9 days
Directional ATC Count	0 days

This data displays the number of manual classified surveys and the number of unclassified ATC surveys, the total adding up to the overall number of surveys in the selected set. Manual surveys are undertaken using staff, whilst ATC surveys are undertaking using machines.

Selected Locations:

Edge of Town Centre	1
Suburban Area (PPS6 Out of Centre)	4
Edge of Town	1
Neighbourhood Centre (PPS6 Local Centre)	3

This data displays the number of surveys per main location category within the selected set. The main location categories consist of Free Standing, Edge of Town, Suburban Area, Neighbourhood Centre, Edge of Town Centre, Town Centre and Not Known.

Selected Location Sub Categories:

Residential Zone	8
High Street	1

This data displays the number of surveys per location sub-category within the selected set. The location sub-categories consist of Commercial Zone, Industrial Zone, Development Zone, Residential Zone, Retail Zone, Built-Up Zone, Village, Out of Town, High Street and No Sub Category.

Secondary Filtering selection:

Use Class:

C3	9 days

This data displays the number of surveys per Use Class classification within the selected set. The Use Classes Order 2005 has been used for this purpose, which can be found within the Library module of TRICS®.

Population within 500m Range:

All Surveys Included

Population within 1 mile:

25,001 to 50,000	9 days

This data displays the number of selected surveys within stated 1-mile radii of population.

Population within 5 miles:

500,001 or More	9 days

This data displays the number of selected surveys within stated 5-mile radii of population.

Car ownership within 5 miles:

0.6 to 1.0	6 days
1.1 to 1.5	3 days

This data displays the number of selected surveys within stated ranges of average cars owned per residential dwelling, within a radius of 5-miles of selected survey sites.

Travel Plan:

Yes	6 days
No	3 days

This data displays the number of surveys within the selected set that were undertaken at sites with Travel Plans in place, and the number of surveys that were undertaken at sites without Travel Plans.

PTAL Rating:

1a (Low) Very poor	1 days
1b Very poor	4 days
2 Poor	2 days
3 Moderate	1 days
4 Good	1 days

This data displays the number of selected surveys with PTAL Ratings.

LIST OF SITES relevant to selection parameters

1 BE-03-M-01 FLATS & SEMI DETACHED BEXLEY
LARNER ROAD
ERITH

Edge of Town
Residential Zone
Total No of Dwellings: 343
Survey date: THURSDAY *20/09/18* *Survey Type: MANUAL*

2 BE-03-M-04 BLOCKS OF FLATS BEXLEY
JUBILEE WAY
SIDCUP

Neighbourhood Centre (PPS6 Local Centre)
High Street
Total No of Dwellings: 98
Survey date: WEDNESDAY *19/09/18* *Survey Type: MANUAL*

3 BN-03-M-02 TERRACED & BLOCKS OF FLATS BARNET
MAYS LANE
BARNET

Edge of Town Centre
Residential Zone
Total No of Dwellings: 271
Survey date: WEDNESDAY *24/04/19* *Survey Type: MANUAL*

4 EN-03-M-01 BLOCKS OF FLATS & TERRACED ENFIELD
CARTERHATCH LANE
ENFIELD

Suburban Area (PPS6 Out of Centre)
Residential Zone
Total No of Dwellings: 220
Survey date: WEDNESDAY *22/06/16* *Survey Type: MANUAL*

5 EN-03-M-02 FLATS & TERRACED HOUSES ENFIELD
NELSON ROAD
ENFIELD
PONDERS END

Neighbourhood Centre (PPS6 Local Centre)
Residential Zone
Total No of Dwellings: 58
Survey date: TUESDAY *12/10/21* *Survey Type: MANUAL*

6 HD-03-M-04 BLOCK OF FLATS HILLINGDON
UXBRIDGE ROAD
HAYES

Neighbourhood Centre (PPS6 Local Centre)
Residential Zone
Total No of Dwellings: 45
Survey date: WEDNESDAY *08/06/16* *Survey Type: MANUAL*

7 HD-03-M-05 TERRACED & FLATS HILLINGDON
JUDGE HEATH LANE
HAYES

Suburban Area (PPS6 Out of Centre)
Residential Zone
Total No of Dwellings: 261
Survey date: TUESDAY *27/06/17* *Survey Type: MANUAL*

LIST OF SITES relevant to selection parameters (Cont.)

8 HO-03-M-01 BLOCKS OF FLATS HOUNSLOW
PUMP HOUSE CRESCENT
BRENTFORD

Suburban Area (PPS6 Out of Centre)
Residential Zone
Total No of Dwellings: 336
Survey date: WEDNESDAY 21/11/18 Survey Type: MANUAL

9 RD-03-M-01 MIXED FLATS & HOUSES RICHMOND
WILLIAMS LANE
RICHMOND
MORTLAKE
Suburban Area (PPS6 Out of Centre)
Residential Zone
Total No of Dwellings: 76
Survey date: THURSDAY 10/03/16 Survey Type: MANUAL

This section provides a list of all survey sites and days in the selected set. For each individual survey site, it displays a unique site reference code and site address, the selected trip rate calculation parameter and its value, the day of the week and date of each survey, and whether the survey was a manual classified count or an ATC count.

MANUALLY DESELECTED SITES

Site Ref	Reason for Deselection
BT-03-M-01	filtering
BT-03-M-02	filtering
BT-03-M-03	filtering
EG-03-M-03	filtering
EG-03-M-04	filtering
EG-03-M-05	filtering
EG-03-M-06	filtering
GR-03-M-01	filtering
GR-03-M-02	filtering
GR-03-M-03	filtering
HM-03-M-01	filtering
SK-03-M-02	filtering

TRIP RATE for Land Use 03 - RESIDENTIAL/M - MIXED PRIVATE/AFFORDABLE HOUSING
TOTAL VEHICLES
Calculation factor: 1 DWELLS
BOLD print indicates peak (busiest) period

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	No. Days	Ave. DWELLS	Trip Rate	No. Days	Ave. DWELLS	Trip Rate	No. Days	Ave. DWELLS	Trip Rate
00:00 - 01:00									
01:00 - 02:00									
02:00 - 03:00									
03:00 - 04:00									
04:00 - 05:00									
05:00 - 06:00									
06:00 - 07:00									
07:00 - 08:00	9	190	0.055	9	190	0.177	9	190	0.232
08:00 - 09:00	9	190	0.107	9	190	0.254	9	190	0.361
09:00 - 10:00	9	190	0.094	9	190	0.125	9	190	0.219
10:00 - 11:00	9	190	0.081	9	190	0.115	9	190	0.196
11:00 - 12:00	9	190	0.086	9	190	0.109	9	190	0.195
12:00 - 13:00	9	190	0.095	9	190	0.115	9	190	0.210
13:00 - 14:00	9	190	0.102	9	190	0.112	9	190	0.214
14:00 - 15:00	9	190	0.099	9	190	0.119	9	190	0.218
15:00 - 16:00	9	190	0.157	9	190	0.101	9	190	0.258
16:00 - 17:00	9	190	0.146	9	190	0.107	9	190	0.253
17:00 - 18:00	9	190	0.179	9	190	0.102	9	190	0.281
18:00 - 19:00	9	190	0.197	9	190	0.096	9	190	0.293
19:00 - 20:00	9	190	0.164	9	190	0.104	9	190	0.268
20:00 - 21:00	9	190	0.118	9	190	0.070	9	190	0.188
21:00 - 22:00									
22:00 - 23:00									
23:00 - 24:00									
Total Rates:			1.680			1.706			3.386

This section displays the trip rate results based on the selected set of surveys and the selected count type (shown just above the table). It is split by three main columns, representing arrivals trips, departures trips, and total trips (arrivals plus departures). Within each of these main columns are three sub-columns. These display the number of survey days where count data is included (per time period), the average value of the selected trip rate calculation parameter (per time period), and the trip rate result (per time period). Total trip rates (the sum of the column) are also displayed at the foot of the table.

*To obtain a trip rate, the average (mean) trip rate parameter value (TRP) is first calculated for all selected survey days that have count data available for the stated time period. The average (mean) number of arrivals, departures or totals (whichever applies) is also calculated (COUNT) for all selected survey days that have count data available for the stated time period. Then, the average count is divided by the average trip rate parameter value, and multiplied by the stated calculation factor (shown just above the table and abbreviated here as FACT). So, the method is: COUNT/TRP*FACT. Trip rates are then rounded to 3 decimal places.*

Parameter summary

Trip rate parameter range selected:	45 - 343 (units:)
Survey date date range:	01/01/13 - 12/10/21
Number of weekdays (Monday-Friday):	9
Number of Saturdays:	0
Number of Sundays:	0
Surveys automatically removed from selection:	6
Surveys manually removed from selection:	12

This section displays a quick summary of some of the data filtering selections made by the TRICS® user. The trip rate calculation parameter range of all selected surveys is displayed first, followed by the range of minimum and maximum survey dates selected by the user. Then, the total number of selected weekdays and weekend days in the selected set of surveys are show. Finally, the number of survey days that have been manually removed from the selected set outside of the standard filtering procedure are displayed.

PBA Bank Street Ashford Licence No: 706709

Filtering Summary

Land Use	02/A	EMPLOYMENT/OFFICE
Selected Trip Rate Calculation Parameter Range	408-120000 sqm GFA	
Actual Trip Rate Calculation Parameter Range	1400-120000 sqm GFA	
Date Range	Minimum: 01/01/13	Maximum: 05/11/19
Parking Spaces Range	All Surveys Included	
Days of the week selected	Monday	1
	Tuesday	1
	Wednesday	1
Main Location Types selected	Edge of Town Centre	1
	Suburban Area (PPS6 Out of Centre)	2
Population within 500m	All Surveys Included	
Population <1 Mile ranges selected	25,001 to 50,000	2
	50,001 to 100,000	1
Population <5 Mile ranges selected	500,001 or More	3
Car Ownership <5 Mile ranges selected	0.6 to 1.0	2
	1.1 to 1.5	1
PTAL Rating	1b Very poor	1
	4 Good	2
Filter by Site Operations Breakdown	All Surveys Included	

Calculation Reference: AUDIT-706709-220125-0122

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 02 - EMPLOYMENT
Category : A - OFFICE
TOTAL VEHICLES

Selected regions and areas:

01	GREATER LONDON		
	HD	HILLINGDON	1 days
	HO	HOUNSLOW	1 days
	WH	WANDSWORTH	1 days

This section displays the number of survey days per TRICS® sub-region in the selected set

Primary Filtering selection:

This data displays the chosen trip rate parameter and its selected range. Only sites that fall within the parameter range are included in the trip rate calculation.

Parameter: Gross floor area
Actual Range: 1400 to 120000 (units: sqm)
Range Selected by User: 408 to 120000 (units: sqm)

Parking Spaces Range: All Surveys Included

Public Transport Provision:
Selection by: Include all surveys

Date Range: 01/01/13 to 05/11/19

This data displays the range of survey dates selected. Only surveys that were conducted within this date range are included in the trip rate calculation.

Selected survey days:

Monday	1 days
Tuesday	1 days
Wednesday	1 days

This data displays the number of selected surveys by day of the week.

Selected survey types:

Manual count	3 days
Directional ATC Count	0 days

This data displays the number of manual classified surveys and the number of unclassified ATC surveys, the total adding up to the overall number of surveys in the selected set. Manual surveys are undertaken using staff, whilst ATC surveys are undertaking using machines.

Selected Locations:

Edge of Town Centre	1
Suburban Area (PPS6 Out of Centre)	2

This data displays the number of surveys per main location category within the selected set. The main location categories consist of Free Standing, Edge of Town, Suburban Area, Neighbourhood Centre, Edge of Town Centre, Town Centre and Not Known.

Selected Location Sub Categories:

Commercial Zone	1
Built-Up Zone	1
No Sub Category	1

This data displays the number of surveys per location sub-category within the selected set. The location sub-categories consist of Commercial Zone, Industrial Zone, Development Zone, Residential Zone, Retail Zone, Built-Up Zone, Village, Out of Town, High Street and No Sub Category.

Secondary Filtering selection:

Use Class:

Not Known	3 days

This data displays the number of surveys per Use Class classification within the selected set. The Use Classes Order 2005 has been used for this purpose, which can be found within the Library module of TRICS®.

Filter by Site Operations Breakdown:
All Surveys Included

Population within 500m Range:
All Surveys Included

Population within 1 mile:

25,001 to 50,000	2 days
50,001 to 100,000	1 days

This data displays the number of selected surveys within stated 1-mile radii of population.

Population within 5 miles:

500,001 or More	3 days

This data displays the number of selected surveys within stated 5-mile radii of population.

Car ownership within 5 miles:

0.6 to 1.0	2 days
1.1 to 1.5	1 days

This data displays the number of selected surveys within stated ranges of average cars owned per residential dwelling, within a radius of 5-miles of selected survey sites.

Travel Plan:

Yes	2 days
No	1 days

This data displays the number of surveys within the selected set that were undertaken at sites with Travel Plans in place, and the number of surveys that were undertaken at sites without Travel Plans.

PTAL Rating:

1b Very poor	1 days
4 Good	2 days

This data displays the number of selected surveys with PTAL Ratings.

LIST OF SITES relevant to selection parameters

1 HD-02-A-09 DATA CENTRE HILLINGDON
MILLINGTON ROAD
HAYES

Edge of Town Centre
Commercial Zone
Total Gross floor area: 12100 sqm
Survey date: TUESDAY *26/06/18* *Survey Type: MANUAL*

2 HO-02-A-01 SKY HEADQUARTERS HOUNSLOW
SYON LANE
ISLEWORTH

Suburban Area (PPS6 Out of Centre)
No Sub Category
Total Gross floor area: 120000 sqm
Survey date: WEDNESDAY *05/07/17* *Survey Type: MANUAL*

3 WH-02-A-03 OFFICE WANDSWORTH
BROUGHTON STREET
NINE ELMS

Suburban Area (PPS6 Out of Centre)
Built-Up Zone
Total Gross floor area: 1400 sqm
Survey date: MONDAY *16/11/15* *Survey Type: MANUAL*

This section provides a list of all survey sites and days in the selected set. For each individual survey site, it displays a unique site reference code and site address, the selected trip rate calculation parameter and its value, the day of the week and date of each survey, and whether the survey was a manual classified count or an ATC count.

TRIP RATE for Land Use 02 - EMPLOYMENT/A - OFFICE
TOTAL VEHICLES
Calculation factor: 100 sqm
BOLD print indicates peak (busiest) period

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate
00:00 - 01:00									
01:00 - 02:00									
02:00 - 03:00									
03:00 - 04:00									
04:00 - 05:00									
05:00 - 06:00									
06:00 - 07:00	1	120000	0.343	1	120000	0.052	1	120000	0.395
07:00 - 08:00	3	44500	0.527	3	44500	0.064	3	44500	0.591
08:00 - 09:00	3	44500	0.724	3	44500	0.090	3	44500	0.814
09:00 - 10:00	3	44500	0.501	3	44500	0.097	3	44500	0.598
10:00 - 11:00	3	44500	0.164	3	44500	0.083	3	44500	0.247
11:00 - 12:00	3	44500	0.097	3	44500	0.064	3	44500	0.161
12:00 - 13:00	3	44500	0.112	3	44500	0.112	3	44500	0.224
13:00 - 14:00	3	44500	0.081	3	44500	0.103	3	44500	0.184
14:00 - 15:00	3	44500	0.075	3	44500	0.100	3	44500	0.175
15:00 - 16:00	3	44500	0.058	3	44500	0.192	3	44500	0.250
16:00 - 17:00	3	44500	0.074	3	44500	0.485	3	44500	0.559
17:00 - 18:00	3	44500	0.076	3	44500	0.757	3	44500	0.833
18:00 - 19:00	3	44500	0.067	3	44500	0.404	3	44500	0.471
19:00 - 20:00	1	120000	0.047	1	120000	0.227	1	120000	0.274
20:00 - 21:00	1	120000	0.036	1	120000	0.089	1	120000	0.125
21:00 - 22:00	1	120000	0.048	1	120000	0.072	1	120000	0.120
22:00 - 23:00									
23:00 - 24:00									
Total Rates:			3.030			2.991			6.021

This section displays the trip rate results based on the selected set of surveys and the selected count type (shown just above the table). It is split by three main columns, representing arrivals trips, departures trips, and total trips (arrivals plus departures). Within each of these main columns are three sub-columns. These display the number of survey days where count data is included (per time period), the average value of the selected trip rate calculation parameter (per time period), and the trip rate result (per time period). Total trip rates (the sum of the column) are also displayed at the foot of the table.

*To obtain a trip rate, the average (mean) trip rate parameter value (TRP) is first calculated for all selected survey days that have count data available for the stated time period. The average (mean) number of arrivals, departures or totals (whichever applies) is also calculated (COUNT) for all selected survey days that have count data available for the stated time period. Then, the average count is divided by the average trip rate parameter value, and multiplied by the stated calculation factor (shown just above the table and abbreviated here as FACT). So, the method is: COUNT/TRP*FACT. Trip rates are then rounded to 3 decimal places.*

Parameter summary

Trip rate parameter range selected:	1400 - 120000 (units: sqm)
Survey date date range:	01/01/13 - 05/11/19
Number of weekdays (Monday-Friday):	3
Number of Saturdays:	0
Number of Sundays:	0
Surveys automatically removed from selection:	2
Surveys manually removed from selection:	0

This section displays a quick summary of some of the data filtering selections made by the TRICS® user. The trip rate calculation parameter range of all selected surveys is displayed first, followed by the range of minimum and maximum survey dates selected by the user. Then, the total number of selected weekdays and weekend days in the selected set of surveys are show. Finally, the number of survey days that have been manually removed from the selected set outside of the standard filtering procedure are displayed.

PBA Bank Street Ashford Licence No: 706709

Filtering Summary

Land Use	02/B	EMPLOYMENT/BUSINESS PARK
Selected Trip Rate Calculation Parameter Range	1200-185000 sqm GFA	
Actual Trip Rate Calculation Parameter Range	1200-185000 sqm GFA	
Date Range	Minimum: 01/01/13	Maximum: 07/09/20
Parking Spaces Range	All Surveys Included	
Days of the week selected	Monday	1
	Thursday	2
	Friday	1
Main Location Types selected	Suburban Area (PPS6 Out of Centre)	3
	Edge of Town	1
Population within 500m	All Surveys Included	
Population <1 Mile ranges selected	10,001 to 15,000	1
	25,001 to 50,000	2
	50,001 to 100,000	1
Population <5 Mile ranges selected	500,001 or More	4
Car Ownership <5 Mile ranges selected	0.6 to 1.0	3
	1.1 to 1.5	1
PTAL Rating	2 Poor	3
	5 Very Good	1
Filter by Site Operations Breakdown	All Surveys Included	

Calculation Reference: AUDIT-706709-220201-0219

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 02 - EMPLOYMENT
Category : B - BUSINESS PARK
TOTAL VEHICLES

Selected regions and areas:

01	GREATER LONDON		
	HD	HILLINGDON	1 days
	HO	HOUNSLOW	2 days
	WF	WALTHAM FOREST	1 days

This section displays the number of survey days per TRICS® sub-region in the selected set

Primary Filtering selection:

This data displays the chosen trip rate parameter and its selected range. Only sites that fall within the parameter range are included in the trip rate calculation.

Parameter:	Gross floor area
Actual Range:	1200 to 185000 (units: sqm)
Range Selected by User:	1200 to 185000 (units: sqm)

Parking Spaces Range: All Surveys Included

Public Transport Provision:
Selection by: Include all surveys

Date Range: 01/01/13 to 07/09/20

This data displays the range of survey dates selected. Only surveys that were conducted within this date range are included in the trip rate calculation.

Selected survey days:

Monday	1 days
Thursday	2 days
Friday	1 days

This data displays the number of selected surveys by day of the week.

Selected survey types:

Manual count	4 days
Directional ATC Count	0 days

This data displays the number of manual classified surveys and the number of unclassified ATC surveys, the total adding up to the overall number of surveys in the selected set. Manual surveys are undertaken using staff, whilst ATC surveys are undertaking using machines.

Selected Locations:

Suburban Area (PPS6 Out of Centre)	3
Edge of Town	1

This data displays the number of surveys per main location category within the selected set. The main location categories consist of Free Standing, Edge of Town, Suburban Area, Neighbourhood Centre, Edge of Town Centre, Town Centre and Not Known.

Selected Location Sub Categories:

Industrial Zone	1
Development Zone	1
Residential Zone	1
No Sub Category	1

This data displays the number of surveys per location sub-category within the selected set. The location sub-categories consist of Commercial Zone, Industrial Zone, Development Zone, Residential Zone, Retail Zone, Built-Up Zone, Village, Out of Town, High Street and No Sub Category.

Secondary Filtering selection:

Use Class:

Not Known	4 days

This data displays the number of surveys per Use Class classification within the selected set. The Use Classes Order 2005 has been used for this purpose, which can be found within the Library module of TRICS®.

Filter by Site Operations Breakdown:
All Surveys Included

Population within 500m Range:
All Surveys Included

Population within 1 mile:

10,001 to 15,000	1 days
25,001 to 50,000	2 days
50,001 to 100,000	1 days

This data displays the number of selected surveys within stated 1-mile radii of population.

Population within 5 miles:

500,001 or More	4 days

This data displays the number of selected surveys within stated 5-mile radii of population.

Car ownership within 5 miles:

0.6 to 1.0	3 days
1.1 to 1.5	1 days

This data displays the number of selected surveys within stated ranges of average cars owned per residential dwelling, within a radius of 5-miles of selected survey sites.

Travel Plan:

Yes	1 days
No	3 days

This data displays the number of surveys within the selected set that were undertaken at sites with Travel Plans in place, and the number of surveys that were undertaken at sites without Travel Plans.

PTAL Rating:

2 Poor	3 days
5 Very Good	1 days

This data displays the number of selected surveys with PTAL Ratings.

LIST OF SITES relevant to selection parameters

1 HD-02-B-06 BUSINESS PARK HILLINGDON
WEST END ROAD
SOUTH RUISLIP

Edge of Town
No Sub Category
Total Gross floor area: 10325 sqm
Survey date: THURSDAY *25/06/15* *Survey Type: MANUAL*

2 HO-02-B-02 BUSINESS PARK HOUNSLOW
HANWORTH ROAD
LONDON
HOUNSLOW
Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 1200 sqm
Survey date: FRIDAY *08/11/13* *Survey Type: MANUAL*

3 HO-02-B-04 BUSINESS PARK HOUNSLOW
CHISWICK HIGH ROAD
CHISWICK
GUNNERSBURY
Suburban Area (PPS6 Out of Centre)
Development Zone
Total Gross floor area: 185000 sqm
Survey date: THURSDAY *08/11/18* *Survey Type: MANUAL*

4 WF-02-B-01 BUSINESS PARK WALTHAM FOREST
ARGALL WAY
WALTHAMSTOW

Suburban Area (PPS6 Out of Centre)
Industrial Zone
Total Gross floor area: 2148 sqm
Survey date: MONDAY *06/11/17* *Survey Type: MANUAL*

This section provides a list of all survey sites and days in the selected set. For each individual survey site, it displays a unique site reference code and site address, the selected trip rate calculation parameter and its value, the day of the week and date of each survey, and whether the survey was a manual classified count or an ATC count.

MANUALLY DESELECTED SITES

Site Ref	Reason for Deselection
BK-02-B-01	filtering
BT-02-B-01	filtering
HM-02-B-01	filtering
NH-02-B-01	filtering
TH-02-B-01	filtering

TRIP RATE for Land Use 02 - EMPLOYMENT/B - BUSINESS PARK
TOTAL VEHICLES
Calculation factor: 100 sqm
BOLD print indicates peak (busiest) period

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate
00:00 - 01:00									
01:00 - 02:00									
02:00 - 03:00									
03:00 - 04:00									
04:00 - 05:00									
05:00 - 06:00									
06:00 - 07:00									
07:00 - 08:00	4	49668	0.172	4	49668	0.042	4	49668	0.214
08:00 - 09:00	4	49668	0.258	4	49668	0.052	4	49668	0.310
09:00 - 10:00	4	49668	0.204	4	49668	0.059	4	49668	0.263
10:00 - 11:00	4	49668	0.106	4	49668	0.062	4	49668	0.168
11:00 - 12:00	4	49668	0.096	4	49668	0.068	4	49668	0.164
12:00 - 13:00	4	49668	0.082	4	49668	0.094	4	49668	0.176
13:00 - 14:00	4	49668	0.109	4	49668	0.075	4	49668	0.184
14:00 - 15:00	4	49668	0.084	4	49668	0.092	4	49668	0.176
15:00 - 16:00	4	49668	0.049	4	49668	0.089	4	49668	0.138
16:00 - 17:00	4	49668	0.071	4	49668	0.201	4	49668	0.272
17:00 - 18:00	4	49668	0.063	4	49668	0.236	4	49668	0.299
18:00 - 19:00	4	49668	0.058	4	49668	0.189	4	49668	0.247
19:00 - 20:00									
20:00 - 21:00									
21:00 - 22:00									
22:00 - 23:00									
23:00 - 24:00									
Total Rates:			1.352			1.259			2.611

This section displays the trip rate results based on the selected set of surveys and the selected count type (shown just above the table). It is split by three main columns, representing arrivals trips, departures trips, and total trips (arrivals plus departures). Within each of these main columns are three sub-columns. These display the number of survey days where count data is included (per time period), the average value of the selected trip rate calculation parameter (per time period), and the trip rate result (per time period). Total trip rates (the sum of the column) are also displayed at the foot of the table.

*To obtain a trip rate, the average (mean) trip rate parameter value (TRP) is first calculated for all selected survey days that have count data available for the stated time period. The average (mean) number of arrivals, departures or totals (whichever applies) is also calculated (COUNT) for all selected survey days that have count data available for the stated time period. Then, the average count is divided by the average trip rate parameter value, and multiplied by the stated calculation factor (shown just above the table and abbreviated here as FACT). So, the method is: COUNT/TRP*FACT. Trip rates are then rounded to 3 decimal places.*

Parameter summary

Trip rate parameter range selected:	1200 - 185000 (units: sqm)
Survey date date range:	01/01/13 - 07/09/20
Number of weekdays (Monday-Friday):	4
Number of Saturdays:	0
Number of Sundays:	0
Surveys automatically removed from selection:	0
Surveys manually removed from selection:	5

This section displays a quick summary of some of the data filtering selections made by the TRICS® user. The trip rate calculation parameter range of all selected surveys is displayed first, followed by the range of minimum and maximum survey dates selected by the user. Then, the total number of selected weekdays and weekend days in the selected set of surveys are show. Finally, the number of survey days that have been manually removed from the selected set outside of the standard filtering procedure are displayed.

PBA Bank Street Ashford Licence No: 706709

Filtering Summary

Land Use	02/D	EMPLOYMENT/INDUSTRIAL ESTATE
Selected Trip Rate Calculation Parameter Range	3120-13850 sqm GFA	
Actual Trip Rate Calculation Parameter Range	3300-13850 sqm GFA	
Date Range	Minimum: 01/01/13	Maximum: 08/09/20
Parking Spaces Range	All Surveys Included	
Days of the week selected	Monday	1
	Tuesday	2
	Wednesday	2
	Thursday	2
Main Location Types selected	Suburban Area (PPS6 Out of Centre)	4
	Edge of Town	3
Population within 500m	All Surveys Included	
Population <1 Mile ranges selected	5,001 to 10,000	1
	10,001 to 15,000	2
	15,001 to 20,000	1
	20,001 to 25,000	1
	50,001 to 100,000	2
Population <5 Mile ranges selected	50,001 to 75,000	1
	250,001 to 500,000	1
	500,001 or More	5
Car Ownership <5 Mile ranges selected	0.6 to 1.0	4
	1.1 to 1.5	3
PTAL Rating	0 None	1
	1b Very poor	3
	2 Poor	2
	3 Moderate	1
Filter by Site Operations Breakdown	All Surveys Included	

Calculation Reference: AUDIT-706709-220201-0251

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 02 - EMPLOYMENT
Category : D - INDUSTRIAL ESTATE
TOTAL VEHICLES

Selected regions and areas:

01	GREATER LONDON		
	BE	BEXLEY	1 days
	BK	BARKING	1 days
	BT	BRENT	1 days
	HD	HILLINGDON	2 days
	HO	HOUNSLOW	1 days
	HV	HAVERING	1 days

This section displays the number of survey days per TRICS® sub-region in the selected set

Primary Filtering selection:

This data displays the chosen trip rate parameter and its selected range. Only sites that fall within the parameter range are included in the trip rate calculation.

Parameter: Gross floor area
Actual Range: 3300 to 13850 (units: sqm)
Range Selected by User: 3120 to 13850 (units: sqm)

Parking Spaces Range: All Surveys Included

Public Transport Provision:
Selection by: Include all surveys

Date Range: 01/01/13 to 08/09/20

This data displays the range of survey dates selected. Only surveys that were conducted within this date range are included in the trip rate calculation.

Selected survey days:

Monday	1 days
Tuesday	2 days
Wednesday	2 days
Thursday	2 days

This data displays the number of selected surveys by day of the week.

Selected survey types:

Manual count	7 days
Directional ATC Count	0 days

This data displays the number of manual classified surveys and the number of unclassified ATC surveys, the total adding up to the overall number of surveys in the selected set. Manual surveys are undertaken using staff, whilst ATC surveys are undertaking using machines.

Selected Locations:

Suburban Area (PPS6 Out of Centre)	4
Edge of Town	3

This data displays the number of surveys per main location category within the selected set. The main location categories consist of Free Standing, Edge of Town, Suburban Area, Neighbourhood Centre, Edge of Town Centre, Town Centre and Not Known.

Selected Location Sub Categories:

Industrial Zone	5
Residential Zone	1
Built-Up Zone	1

This data displays the number of surveys per location sub-category within the selected set. The location sub-categories consist of Commercial Zone, Industrial Zone, Development Zone, Residential Zone, Retail Zone, Built-Up Zone, Village, Out of Town, High Street and No Sub Category.

Secondary Filtering selection:

Use Class:

Not Known	7 days

This data displays the number of surveys per Use Class classification within the selected set. The Use Classes Order 2005 has been used for this purpose, which can be found within the Library module of TRICS®.

Filter by Site Operations Breakdown:
All Surveys Included

Population within 500m Range:
All Surveys Included

Population within 1 mile:

5,001 to 10,000	1 days
10,001 to 15,000	2 days
15,001 to 20,000	1 days
20,001 to 25,000	1 days
50,001 to 100,000	2 days

This data displays the number of selected surveys within stated 1-mile radii of population.

Population within 5 miles:

50,001 to 75,000	1 days
250,001 to 500,000	1 days
500,001 or More	5 days

This data displays the number of selected surveys within stated 5-mile radii of population.

Car ownership within 5 miles:

0.6 to 1.0	4 days
1.1 to 1.5	3 days

This data displays the number of selected surveys within stated ranges of average cars owned per residential dwelling, within a radius of 5-miles of selected survey sites.

Travel Plan:

Yes	1 days
No	6 days

This data displays the number of surveys within the selected set that were undertaken at sites with Travel Plans in place, and the number of surveys that were undertaken at sites without Travel Plans.

PTAL Rating:

0 None	1 days
1b Very poor	3 days
2 Poor	2 days
3 Moderate	1 days

This data displays the number of selected surveys with PTAL Ratings.

Covid-19 Restrictions	Yes	At least one survey within the selected data set was undertaken at a time of Covid-19 restrictions

LIST OF SITES relevant to selection parameters

1 BE-02-D-01 INDUSTRIAL ESTATE BEXLEY
CRABTREE MANORWAY N.
ERITH

Edge of Town
Industrial Zone
Total Gross floor area: 3300 sqm
Survey date: WEDNESDAY 19/09/18 Survey Type: MANUAL

2 BK-02-D-01 INDUSTRIAL ESTATE BARKING
RIVER ROAD
BARKING

Suburban Area (PPS6 Out of Centre)
Industrial Zone
Total Gross floor area: 4180 sqm
Survey date: TUESDAY 08/09/20 Survey Type: MANUAL

3 BT-02-D-01 INDUSTRIAL ESTATE BRENT
NORTH CIRCULAR ROAD
NEASDEN
BRENT PARK
Suburban Area (PPS6 Out of Centre)
Built-Up Zone
Total Gross floor area: 5565 sqm
Survey date: WEDNESDAY 14/11/18 Survey Type: MANUAL

4 HD-02-D-02 INDUSTRIAL ESTATE HILLINGDON
BRADFIELD ROAD
RUISLIP
SOUTH RUISLIP
Edge of Town
Industrial Zone
Total Gross floor area: 13850 sqm
Survey date: THURSDAY 25/06/15 Survey Type: MANUAL

5 HD-02-D-03 INDUSTRIAL ESTATE HILLINGDON
BRADFIELD ROAD
RUISLIP
SOUTH RUISLIP
Suburban Area (PPS6 Out of Centre)
Industrial Zone
Total Gross floor area: 8310 sqm
Survey date: MONDAY 10/06/19 Survey Type: MANUAL

6 HO-02-D-01 INDUSTRIAL ESTATE HOUNSLOW
HAMPTON ROAD WEST
FELTHAM
HANWORTH
Suburban Area (PPS6 Out of Centre)
Industrial Zone
Total Gross floor area: 7400 sqm
Survey date: THURSDAY 25/06/15 Survey Type: MANUAL

7 HV-02-D-01 INDUSTRIAL ESTATE HAVERING
CHURCH ROAD
ROMFORD
HAROLD WOOD
Edge of Town
Residential Zone
Total Gross floor area: 13000 sqm
Survey date: TUESDAY 07/10/14 Survey Type: MANUAL

This section provides a list of all survey sites and days in the selected set. For each individual survey site, it displays a unique site reference code and site address, the selected trip rate calculation parameter and its value, the day of the week and date of each survey, and whether the survey was a manual classified count or an ATC count.

TRIP RATE for Land Use 02 - EMPLOYMENT/D - INDUSTRIAL ESTATE
TOTAL VEHICLES
Calculation factor: 100 sqm
BOLD print indicates peak (busiest) period

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate
00:00 - 01:00									
01:00 - 02:00									
02:00 - 03:00									
03:00 - 04:00									
04:00 - 05:00									
05:00 - 06:00	3	6630	0.090	3	6630	0.040	3	6630	0.130
06:00 - 07:00	3	6630	0.387	3	6630	0.221	3	6630	0.608
07:00 - 08:00	7	7944	0.635	7	7944	0.361	7	7944	0.996
08:00 - 09:00	7	7944	0.888	7	7944	0.484	7	7944	1.372
09:00 - 10:00	7	7944	0.806	7	7944	0.597	7	7944	1.403
10:00 - 11:00	7	7944	0.807	7	7944	0.734	7	7944	1.541
11:00 - 12:00	7	7944	0.736	7	7944	0.806	7	7944	1.542
12:00 - 13:00	7	7944	0.682	7	7944	0.716	7	7944	1.398
13:00 - 14:00	7	7944	0.638	7	7944	0.640	7	7944	1.278
14:00 - 15:00	7	7944	0.613	7	7944	0.665	7	7944	1.278
15:00 - 16:00	7	7944	0.558	7	7944	0.642	7	7944	1.200
16:00 - 17:00	7	7944	0.441	7	7944	0.622	7	7944	1.063
17:00 - 18:00	7	7944	0.257	7	7944	0.624	7	7944	0.881
18:00 - 19:00	7	7944	0.207	7	7944	0.338	7	7944	0.545
19:00 - 20:00	4	5798	0.125	4	5798	0.181	4	5798	0.306
20:00 - 21:00	3	5263	0.006	3	5263	0.076	3	5263	0.082
21:00 - 22:00									
22:00 - 23:00									
23:00 - 24:00									
Total Rates:			7.876			7.747			15.623

This section displays the trip rate results based on the selected set of surveys and the selected count type (shown just above the table). It is split by three main columns, representing arrivals trips, departures trips, and total trips (arrivals plus departures). Within each of these main columns are three sub-columns. These display the number of survey days where count data is included (per time period), the average value of the selected trip rate calculation parameter (per time period), and the trip rate result (per time period). Total trip rates (the sum of the column) are also displayed at the foot of the table.

*To obtain a trip rate, the average (mean) trip rate parameter value (TRP) is first calculated for all selected survey days that have count data available for the stated time period. The average (mean) number of arrivals, departures or totals (whichever applies) is also calculated (COUNT) for all selected survey days that have count data available for the stated time period. Then, the average count is divided by the average trip rate parameter value, and multiplied by the stated calculation factor (shown just above the table and abbreviated here as FACT). So, the method is: COUNT/TRP*FACT. Trip rates are then rounded to 3 decimal places.*

Parameter summary

Trip rate parameter range selected:	3300 - 13850 (units: sqm)
Survey date date range:	01/01/13 - 08/09/20
Number of weekdays (Monday-Friday):	7
Number of Saturdays:	0
Number of Sundays:	0
Surveys automatically removed from selection:	0
Surveys manually removed from selection:	0

This section displays a quick summary of some of the data filtering selections made by the TRICS® user. The trip rate calculation parameter range of all selected surveys is displayed first, followed by the range of minimum and maximum survey dates selected by the user. Then, the total number of selected weekdays and weekend days in the selected set of surveys are show. Finally, the number of survey days that have been manually removed from the selected set outside of the standard filtering procedure are displayed.

Calculation Reference: AUDIT-706709-210629-0631

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 06 - HOTEL, FOOD & DRINK
Category : C - PUB/RESTAURANT
TOTAL VEHICLES

Selected regions and areas:

03	SOUTH WEST		
	BR	BRISTOL CITY	1 days
06	WEST MIDLANDS		
	WK	WARWICKSHIRE	1 days
	WO	WORCESTERSHIRE	1 days
08	NORTH WEST		
	CH	CHESHIRE	1 days
	LC	LANCASHIRE	2 days

This section displays the number of survey days per TRICS® sub-region in the selected set

Primary Filtering selection:

This data displays the chosen trip rate parameter and its selected range. Only sites that fall within the parameter range are included in the trip rate calculation.

Parameter: Gross floor area
Actual Range: 250 to 830 (units: sqm)
Range Selected by User: 112 to 2384 (units: sqm)

Parking Spaces Range: All Surveys Included

Public Transport Provision:
Selection by: Include all surveys

Date Range: 01/01/13 to 11/06/19

This data displays the range of survey dates selected. Only surveys that were conducted within this date range are included in the trip rate calculation.

Selected survey days:

Wednesday	1 days
Thursday	3 days
Friday	2 days

This data displays the number of selected surveys by day of the week.

Selected survey types:

Manual count	6 days
Directional ATC Count	0 days

This data displays the number of manual classified surveys and the number of unclassified ATC surveys, the total adding up to the overall number of surveys in the selected set. Manual surveys are undertaken using staff, whilst ATC surveys are undertaking using machines.

Selected Locations:

Town Centre	4
Edge of Town Centre	2

This data displays the number of surveys per main location category within the selected set. The main location categories consist of Free Standing, Edge of Town, Suburban Area, Neighbourhood Centre, Edge of Town Centre, Town Centre and Not Known.

Selected Location Sub Categories:

Development Zone	1
Built-Up Zone	2
High Street	1
No Sub Category	2

This data displays the number of surveys per location sub-category within the selected set. The location sub-categories consist of Commercial Zone, Industrial Zone, Development Zone, Residential Zone, Retail Zone, Built-Up Zone, Village, Out of Town, High Street and No Sub Category.

Secondary Filtering selection:

Use Class:

Sui Generis	6 days

This data displays the number of surveys per Use Class classification within the selected set. The Use Classes Order 2005 has been used for this purpose, which can be found within the Library module of TRICS®.

Population within 500m Range:

All Surveys Included

Population within 1 mile:

1,001 to 5,000	1 days
5,001 to 10,000	1 days
10,001 to 15,000	1 days
20,001 to 25,000	1 days
25,001 to 50,000	2 days

This data displays the number of selected surveys within stated 1-mile radii of population.

Population within 5 miles:

25,001 to 50,000	2 days
75,001 to 100,000	1 days
125,001 to 250,000	3 days

This data displays the number of selected surveys within stated 5-mile radii of population.

Car ownership within 5 miles:

0.6 to 1.0	5 days
1.1 to 1.5	1 days

This data displays the number of selected surveys within stated ranges of average cars owned per residential dwelling, within a radius of 5-miles of selected survey sites.

Travel Plan:

No	6 days

This data displays the number of surveys within the selected set that were undertaken at sites with Travel Plans in place, and the number of surveys that were undertaken at sites without Travel Plans.

PTAL Rating:

No PTAL Present	6 days

This data displays the number of selected surveys with PTAL Ratings.

LIST OF SITES relevant to selection parameters

1	BR-06-C-01 THE WATERFRONT BRISTOL HARBOURSIDE Town Centre Development Zone Total Gross floor area: *Survey date: FRIDAY*	WETHERSPOON	327 sqm *29/11/13*	BRISTOL CITY *Survey Type: MANUAL*
2	CH-06-C-02 OXFORD ROAD MACCLESFIELD Edge of Town Centre No Sub Category Total Gross floor area: *Survey date: FRIDAY*	PUB/RESTAURANT	471 sqm *10/11/17*	CHESHIRE *Survey Type: MANUAL*
3	LC-06-C-01 MANCHESTER ROAD BURNLEY Edge of Town Centre No Sub Category Total Gross floor area: *Survey date: THURSDAY*	FAYRE & SQUARE	830 sqm *29/09/16*	LANCASHIRE *Survey Type: MANUAL*
4	LC-06-C-04 ST JAMES STREET BURNLEY Town Centre Built-Up Zone Total Gross floor area: *Survey date: THURSDAY*	PUB/RESTAURANT	600 sqm *29/09/16*	LANCASHIRE *Survey Type: MANUAL*
5	WK-06-C-01 GREYFRIARS LANE COVENTRY Town Centre Built-Up Zone Total Gross floor area: *Survey date: THURSDAY*	PUB/RESTAURANT	461 sqm *17/10/13*	WARWICKSHIRE *Survey Type: MANUAL*
6	WO-06-C-03 THE TYTHING WORCESTER Town Centre High Street Total Gross floor area: *Survey date: WEDNESDAY*	PUB/RESTAURANT	250 sqm *23/11/16*	WORCESTERSHIRE *Survey Type: MANUAL*

This section provides a list of all survey sites and days in the selected set. For each individual survey site, it displays a unique site reference code and site address, the selected trip rate calculation parameter and its value, the day of the week and date of each survey, and whether the survey was a manual classified count or an ATC count.

TRIP RATE for Land Use 06 - HOTEL, FOOD & DRINK/C - PUB/RESTAURANT
TOTAL VEHICLES
Calculation factor: 100 sqm
BOLD print indicates peak (busiest) period

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate
00:00 - 01:00									
01:00 - 02:00									
02:00 - 03:00									
03:00 - 04:00									
04:00 - 05:00									
05:00 - 06:00									
06:00 - 07:00									
07:00 - 08:00	1	600	0.000	1	600	0.000	1	600	0.000
08:00 - 09:00	1	600	0.000	1	600	0.000	1	600	0.000
09:00 - 10:00	1	600	0.000	1	600	0.000	1	600	0.000
10:00 - 11:00	6	490	0.374	6	490	0.272	6	490	0.646
11:00 - 12:00	6	490	0.885	6	490	0.442	6	490	1.327
12:00 - 13:00	6	490	3.300	6	490	1.157	6	490	4.457
13:00 - 14:00	6	490	2.926	6	490	2.042	6	490	4.968
14:00 - 15:00	6	490	1.633	6	490	1.021	6	490	2.654
15:00 - 16:00	6	490	1.905	6	490	1.633	6	490	3.538
16:00 - 17:00	6	490	1.157	6	490	1.429	6	490	2.586
17:00 - 18:00	6	490	1.361	6	490	0.749	6	490	2.110
18:00 - 19:00	6	490	3.062	6	490	3.709	6	490	6.771
19:00 - 20:00	6	490	3.232	6	490	3.947	6	490	7.179
20:00 - 21:00	6	490	2.926	6	490	3.403	6	490	6.329
21:00 - 22:00	6	490	1.531	6	490	1.837	6	490	3.368
22:00 - 23:00	6	490	0.783	6	490	2.280	6	490	3.063
23:00 - 24:00	6	490	0.851	6	490	2.110	6	490	2.961
Total Rates:			25.926			26.031			51.957

This section displays the trip rate results based on the selected set of surveys and the selected count type (shown just above the table). It is split by three main columns, representing arrivals trips, departures trips, and total trips (arrivals plus departures). Within each of these main columns are three sub-columns. These display the number of survey days where count data is included (per time period), the average value of the selected trip rate calculation parameter (per time period), and the trip rate result (per time period). Total trip rates (the sum of the column) are also displayed at the foot of the table.

*To obtain a trip rate, the average (mean) trip rate parameter value (TRP) is first calculated for all selected survey days that have count data available for the stated time period. The average (mean) number of arrivals, departures or totals (whichever applies) is also calculated (COUNT) for all selected survey days that have count data available for the stated time period. Then, the average count is divided by the average trip rate parameter value, and multiplied by the stated calculation factor (shown just above the table and abbreviated here as FACT). So, the method is: COUNT/TRP*FACT. Trip rates are then rounded to 3 decimal places.*

Parameter summary

Trip rate parameter range selected:	250 - 830 (units: sqm)
Survey date date range:	01/01/13 - 11/06/19
Number of weekdays (Monday-Friday):	6
Number of Saturdays:	0
Number of Sundays:	0
Surveys automatically removed from selection:	0
Surveys manually removed from selection:	0

This section displays a quick summary of some of the data filtering selections made by the TRICS® user. The trip rate calculation parameter range of all selected surveys is displayed first, followed by the range of minimum and maximum survey dates selected by the user. Then, the total number of selected weekdays and weekend days in the selected set of surveys are show. Finally, the number of survey days that have been manually removed from the selected set outside of the standard filtering procedure are displayed.

PBA Bank Street Ashford Licence No: 706709

Filtering Summary

Land Use	07/C	LEISURE/LEISURE CENTRE
Selected Trip Rate Calculation Parameter Range	1300-19750 sqm GFA	
Actual Trip Rate Calculation Parameter Range	4000-8460 sqm GFA	
Date Range	Minimum: 01/01/13	Maximum: 05/11/19
Parking Spaces Range	All Surveys Included	
Days of the week selected	Tuesday	2
	Wednesday	2
	Friday	1
Main Location Types selected	Edge of Town Centre	1
	Suburban Area (PPS6 Out of Centre)	4
Population within 500m	All Surveys Included	
Population <1 Mile ranges selected	25,001 to 50,000	1
	50,001 to 100,000	3
	100,001 or More	1
Population <5 Mile ranges selected	500,001 or More	5
Car Ownership <5 Mile ranges selected	0.6 to 1.0	3
	1.1 to 1.5	2
PTAL Rating	1a (Low) Very poor	1
	2 Poor	1
	3 Moderate	1
	4 Good	2

Calculation Reference: AUDIT-706709-220125-0132

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 07 - LEISURE
Category : C - LEISURE CENTRE
TOTAL VEHICLES

Selected regions and areas:

01	GREATER LONDON		
	EG	EALING	1 days
	HD	HILLINGDON	1 days
	HK	HACKNEY	1 days
	LB	LAMBETH	1 days
	WF	WALTHAM FOREST	1 days

This section displays the number of survey days per TRICS® sub-region in the selected set

Primary Filtering selection:

This data displays the chosen trip rate parameter and its selected range. Only sites that fall within the parameter range are included in the trip rate calculation.

Parameter: Gross floor area
Actual Range: 4000 to 8460 (units: sqm)
Range Selected by User: 1300 to 19750 (units: sqm)

Parking Spaces Range: All Surveys Included

Public Transport Provision:
Selection by: Include all surveys

Date Range: 01/01/13 to 05/11/19

This data displays the range of survey dates selected. Only surveys that were conducted within this date range are included in the trip rate calculation.

Selected survey days:

Tuesday	2 days
Wednesday	2 days
Friday	1 days

This data displays the number of selected surveys by day of the week.

Selected survey types:

Manual count	5 days
Directional ATC Count	0 days

This data displays the number of manual classified surveys and the number of unclassified ATC surveys, the total adding up to the overall number of surveys in the selected set. Manual surveys are undertaken using staff, whilst ATC surveys are undertaking using machines.

Selected Locations:

Edge of Town Centre	1
Suburban Area (PPS6 Out of Centre)	4

This data displays the number of surveys per main location category within the selected set. The main location categories consist of Free Standing, Edge of Town, Suburban Area, Neighbourhood Centre, Edge of Town Centre, Town Centre and Not Known.

Selected Location Sub Categories:

Residential Zone	5

This data displays the number of surveys per location sub-category within the selected set. The location sub-categories consist of Commercial Zone, Industrial Zone, Development Zone, Residential Zone, Retail Zone, Built-Up Zone, Village, Out of Town, High Street and No Sub Category.

Secondary Filtering selection:

Use Class:

n/a	5 days

This data displays the number of surveys per Use Class classification within the selected set. The Use Classes Order 2005 has been used for this purpose, which can be found within the Library module of TRICS®.

Population within 500m Range:

All Surveys Included

Population within 1 mile:

25,001 to 50,000	1 days
50,001 to 100,000	3 days
100,001 or More	1 days

This data displays the number of selected surveys within stated 1-mile radii of population.

Population within 5 miles:

500,001 or More	5 days

This data displays the number of selected surveys within stated 5-mile radii of population.

Car ownership within 5 miles:

0.6 to 1.0	3 days
1.1 to 1.5	2 days

This data displays the number of selected surveys within stated ranges of average cars owned per residential dwelling, within a radius of 5-miles of selected survey sites.

Travel Plan:

Yes	1 days
No	4 days

This data displays the number of surveys within the selected set that were undertaken at sites with Travel Plans in place, and the number of surveys that were undertaken at sites without Travel Plans.

PTAL Rating:

1a (Low) Very poor	1 days
2 Poor	1 days
3 Moderate	1 days
4 Good	2 days

This data displays the number of selected surveys with PTAL Ratings.

LIST OF SITES relevant to selection parameters

1 EG-07-C-04 LEISURE CENTRE EALING
EASTCOTE LANE NORTH
NORTHOLT

Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 4500 sqm
Survey date: TUESDAY *30/06/15* *Survey Type: MANUAL*

2 HD-07-C-01 LEISURE CENTRE HILLINGDON
HUME WAY
RUISLIP

Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 4000 sqm
Survey date: FRIDAY *26/06/15* *Survey Type: MANUAL*

3 HK-07-C-02 LEISURE CENTRE HACKNEY
HYDE ROAD
SHOREDITCH

Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 4627 sqm
Survey date: WEDNESDAY *17/09/14* *Survey Type: MANUAL*

4 LB-07-C-01 LEISURE CENTRE LAMBETH
DEVANE WAY
WEST NORWOOD

Edge of Town Centre
Residential Zone
Total Gross floor area: 5400 sqm
Survey date: WEDNESDAY *07/11/18* *Survey Type: MANUAL*

5 WF-07-C-02 LEISURE CENTRE WALTHAM FOREST
CHINGFORD ROAD
WALTHAMSTOW

Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 8460 sqm
Survey date: TUESDAY *05/11/19* *Survey Type: MANUAL*

This section provides a list of all survey sites and days in the selected set. For each individual survey site, it displays a unique site reference code and site address, the selected trip rate calculation parameter and its value, the day of the week and date of each survey, and whether the survey was a manual classified count or an ATC count.

TRIP RATE for Land Use 07 - LEISURE/C - LEISURE CENTRE
TOTAL VEHICLES
Calculation factor: 100 sqm
BOLD print indicates peak (busiest) period

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate
00:00 - 01:00									
01:00 - 02:00									
02:00 - 03:00									
03:00 - 04:00									
04:00 - 05:00									
05:00 - 06:00	1	8460	0.165	1	8460	0.083	1	8460	0.248
06:00 - 07:00	5	5397	0.574	5	5397	0.104	5	5397	0.678
07:00 - 08:00	5	5397	0.545	5	5397	0.504	5	5397	1.049
08:00 - 09:00	5	5397	0.604	5	5397	0.441	5	5397	1.045
09:00 - 10:00	5	5397	0.671	5	5397	0.519	5	5397	1.190
10:00 - 11:00	5	5397	0.541	5	5397	0.567	5	5397	1.108
11:00 - 12:00	5	5397	0.571	5	5397	0.656	5	5397	1.227
12:00 - 13:00	5	5397	0.467	5	5397	0.500	5	5397	0.967
13:00 - 14:00	5	5397	0.352	5	5397	0.526	5	5397	0.878
14:00 - 15:00	5	5397	0.371	5	5397	0.389	5	5397	0.760
15:00 - 16:00	5	5397	0.763	5	5397	0.441	5	5397	1.204
16:00 - 17:00	5	5397	0.926	5	5397	0.726	5	5397	1.652
17:00 - 18:00	5	5397	0.963	5	5397	0.960	5	5397	1.923
18:00 - 19:00	5	5397	1.186	5	5397	0.930	5	5397	2.116
19:00 - 20:00	5	5397	1.152	5	5397	1.134	5	5397	2.286
20:00 - 21:00	5	5397	0.422	5	5397	1.212	5	5397	1.634
21:00 - 22:00	5	5397	0.122	5	5397	0.545	5	5397	0.667
22:00 - 23:00	3	6162	0.022	3	6162	0.151	3	6162	0.173
23:00 - 24:00									
Total Rates:			10.417			10.388			20.805

This section displays the trip rate results based on the selected set of surveys and the selected count type (shown just above the table). It is split by three main columns, representing arrivals trips, departures trips, and total trips (arrivals plus departures). Within each of these main columns are three sub-columns. These display the number of survey days where count data is included (per time period), the average value of the selected trip rate calculation parameter (per time period), and the trip rate result (per time period). Total trip rates (the sum of the column) are also displayed at the foot of the table.

*To obtain a trip rate, the average (mean) trip rate parameter value (TRP) is first calculated for all selected survey days that have count data available for the stated time period. The average (mean) number of arrivals, departures or totals (whichever applies) is also calculated (COUNT) for all selected survey days that have count data available for the stated time period. Then, the average count is divided by the average trip rate parameter value, and multiplied by the stated calculation factor (shown just above the table and abbreviated here as FACT). So, the method is: COUNT/TRP*FACT. Trip rates are then rounded to 3 decimal places.*

Parameter summary

Trip rate parameter range selected:	4000 - 8460 (units: sqm)
Survey date date range:	01/01/13 - 05/11/19
Number of weekdays (Monday-Friday):	5
Number of Saturdays:	0
Number of Sundays:	0
Surveys automatically removed from selection:	0
Surveys manually removed from selection:	0

This section displays a quick summary of some of the data filtering selections made by the TRICS® user. The trip rate calculation parameter range of all selected surveys is displayed first, followed by the range of minimum and maximum survey dates selected by the user. Then, the total number of selected weekdays and weekend days in the selected set of surveys are show. Finally, the number of survey days that have been manually removed from the selected set outside of the standard filtering procedure are displayed.

PBA Bank Street Ashford Licence No: 706709

Filtering Summary

Land Use	07/Q	LEISURE/COMMUNITY CENTRE
Selected Trip Rate Calculation Parameter Range	100-2329 sqm GFA	
Actual Trip Rate Calculation Parameter Range	415-2329 sqm GFA	
Date Range	Minimum: 01/01/00	Maximum: 24/05/19
Parking Spaces Range	All Surveys Included	
Days of the week selected	Monday	1
	Thursday	2
	Friday	2
Main Location Types selected	Edge of Town Centre	5
Population within 500m	All Surveys Included	
Population <1 Mile ranges selected	5,001 to 10,000	1
	25,001 to 50,000	3
	50,001 to 100,000	1
Population <5 Mile ranges selected	25,001 to 50,000	1
	100,001 to 125,000	2
	250,001 to 500,000	1
	500,001 or More	1
Car Ownership <5 Mile ranges selected	0.6 to 1.0	3
	1.1 to 1.5	2
PTAL Rating	No PTAL Present	5

Calculation Reference: AUDIT-706709-210928-0901

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 07 - LEISURE
Category : Q - COMMUNITY CENTRE
TOTAL VEHICLES

Selected regions and areas:

03	SOUTH WEST		
	BA	BATH & NORTH EAST SOMERSET	2 days
04	EAST ANGLIA		
	CA	CAMBRIDGESHIRE	1 days
05	EAST MIDLANDS		
	NT	NOTTINGHAMSHIRE	1 days
06	WEST MIDLANDS		
	ST	STAFFORDSHIRE	1 days

This section displays the number of survey days per TRICS® sub-region in the selected set

Primary Filtering selection:

This data displays the chosen trip rate parameter and its selected range. Only sites that fall within the parameter range are included in the trip rate calculation.

Parameter: Gross floor area
Actual Range: 415 to 2329 (units: sqm)
Range Selected by User: 100 to 2329 (units: sqm)

Parking Spaces Range: All Surveys Included

Public Transport Provision:
Selection by: Include all surveys

Date Range: 01/01/00 to 24/05/19

This data displays the range of survey dates selected. Only surveys that were conducted within this date range are included in the trip rate calculation.

Selected survey days:

Monday	1 days
Thursday	2 days
Friday	2 days

This data displays the number of selected surveys by day of the week.

Selected survey types:

Manual count	5 days
Directional ATC Count	0 days

This data displays the number of manual classified surveys and the number of unclassified ATC surveys, the total adding up to the overall number of surveys in the selected set. Manual surveys are undertaken using staff, whilst ATC surveys are undertaking using machines.

Selected Locations:

Edge of Town Centre	5

This data displays the number of surveys per main location category within the selected set. The main location categories consist of Free Standing, Edge of Town, Suburban Area, Neighbourhood Centre, Edge of Town Centre, Town Centre and Not Known.

Selected Location Sub Categories:

Residential Zone	2
Built-Up Zone	2
High Street	1

This data displays the number of surveys per location sub-category within the selected set. The location sub-categories consist of Commercial Zone, Industrial Zone, Development Zone, Residential Zone, Retail Zone, Built-Up Zone, Village, Out of Town, High Street and No Sub Category.

Secondary Filtering selection:

Use Class:

F2(b)	5 days

This data displays the number of surveys per Use Class classification within the selected set. The Use Classes Order 2005 has been used for this purpose, which can be found within the Library module of TRICS®.

Population within 500m Range:

All Surveys Included

Population within 1 mile:

5,001 to 10,000	1 days
25,001 to 50,000	3 days
50,001 to 100,000	1 days

This data displays the number of selected surveys within stated 1-mile radii of population.

Population within 5 miles:

25,001 to 50,000	1 days
100,001 to 125,000	2 days
250,001 to 500,000	1 days
500,001 or More	1 days

This data displays the number of selected surveys within stated 5-mile radii of population.

Car ownership within 5 miles:

0.6 to 1.0	3 days
1.1 to 1.5	2 days

This data displays the number of selected surveys within stated ranges of average cars owned per residential dwelling, within a radius of 5-miles of selected survey sites.

Travel Plan:

No	5 days

This data displays the number of surveys within the selected set that were undertaken at sites with Travel Plans in place, and the number of surveys that were undertaken at sites without Travel Plans.

PTAL Rating:

No PTAL Present	5 days

This data displays the number of selected surveys with PTAL Ratings.

LIST OF SITES relevant to selection parameters

1 BA-07-Q-01 COMMUNITY CENTRE BATH & NORTH EAST SOMERSET
SAINT MARKS ROAD
BATH

Edge of Town Centre
Built-Up Zone
Total Gross floor area: 900 sqm
Survey date: FRIDAY *29/09/06* *Survey Type: MANUAL*

2 BA-07-Q-02 COMMUNITY CENTRE BATH & NORTH EAST SOMERSET
OFF THE A36
BATH

Edge of Town Centre
Residential Zone
Total Gross floor area: 415 sqm
Survey date: MONDAY *02/10/06* *Survey Type: MANUAL*

3 CA-07-Q-02 COMMUNITY CENTRE CAMBRIDGESHIRE
HIGH STREET
CAMBOURNE

Edge of Town Centre
High Street
Total Gross floor area: 629 sqm
Survey date: THURSDAY *07/06/18* *Survey Type: MANUAL*

4 NT-07-Q-01 COMMUNITY CENTRE NOTTINGHAMSHIRE
61B MANSFIELD ROAD
NOTTINGHAM

Edge of Town Centre
Residential Zone
Total Gross floor area: 800 sqm
Survey date: THURSDAY *13/06/13* *Survey Type: MANUAL*

5 ST-07-Q-01 COMMUNITY CENTRE STAFFORDSHIRE
DUDLEY ROAD
WOLVERHAMPTON

Edge of Town Centre
Built-Up Zone
Total Gross floor area: 2329 sqm
Survey date: FRIDAY *09/05/14* *Survey Type: MANUAL*

This section provides a list of all survey sites and days in the selected set. For each individual survey site, it displays a unique site reference code and site address, the selected trip rate calculation parameter and its value, the day of the week and date of each survey, and whether the survey was a manual classified count or an ATC count.

TRIP RATE for Land Use 07 - LEISURE/Q - COMMUNITY CENTRE
TOTAL VEHICLES
Calculation factor: 100 sqm
BOLD print indicates peak (busiest) period

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate
00:00 - 01:00									
01:00 - 02:00									
02:00 - 03:00									
03:00 - 04:00									
04:00 - 05:00									
05:00 - 06:00									
06:00 - 07:00									
07:00 - 08:00	2	765	0.196	2	765	0.065	2	765	0.261
08:00 - 09:00	5	1015	0.729	5	1015	0.118	5	1015	0.847
09:00 - 10:00	5	1015	0.769	5	1015	0.473	5	1015	1.242
10:00 - 11:00	5	1015	0.611	5	1015	0.493	5	1015	1.104
11:00 - 12:00	5	1015	0.394	5	1015	0.828	5	1015	1.222
12:00 - 13:00	5	1015	0.532	5	1015	0.453	5	1015	0.985
13:00 - 14:00	5	1015	0.394	5	1015	0.394	5	1015	0.788
14:00 - 15:00	5	1015	0.375	5	1015	0.552	5	1015	0.927
15:00 - 16:00	5	1015	0.532	5	1015	0.690	5	1015	1.222
16:00 - 17:00	5	1015	0.237	5	1015	0.315	5	1015	0.552
17:00 - 18:00	5	1015	0.749	5	1015	0.513	5	1015	1.262
18:00 - 19:00	5	1015	0.631	5	1015	0.276	5	1015	0.907
19:00 - 20:00	5	1015	0.414	5	1015	0.729	5	1015	1.143
20:00 - 21:00	5	1015	0.000	5	1015	0.296	5	1015	0.296
21:00 - 22:00	3	1181	0.056	3	1181	0.339	3	1181	0.395
22:00 - 23:00									
23:00 - 24:00									
Total Rates:			6.619			6.534			13.153

This section displays the trip rate results based on the selected set of surveys and the selected count type (shown just above the table). It is split by three main columns, representing arrivals trips, departures trips, and total trips (arrivals plus departures). Within each of these main columns are three sub-columns. These display the number of survey days where count data is included (per time period), the average value of the selected trip rate calculation parameter (per time period), and the trip rate result (per time period). Total trip rates (the sum of the column) are also displayed at the foot of the table.

*To obtain a trip rate, the average (mean) trip rate parameter value (TRP) is first calculated for all selected survey days that have count data available for the stated time period. The average (mean) number of arrivals, departures or totals (whichever applies) is also calculated (COUNT) for all selected survey days that have count data available for the stated time period. Then, the average count is divided by the average trip rate parameter value, and multiplied by the stated calculation factor (shown just above the table and abbreviated here as FACT). So, the method is: COUNT/TRP*FACT. Trip rates are then rounded to 3 decimal places.*

Parameter summary

Trip rate parameter range selected:	415 - 2329 (units: sqm)
Survey date date range:	01/01/00 - 24/05/19
Number of weekdays (Monday-Friday):	5
Number of Saturdays:	0
Number of Sundays:	0
Surveys automatically removed from selection:	0
Surveys manually removed from selection:	0

This section displays a quick summary of some of the data filtering selections made by the TRICS® user. The trip rate calculation parameter range of all selected surveys is displayed first, followed by the range of minimum and maximum survey dates selected by the user. Then, the total number of selected weekdays and weekend days in the selected set of surveys are show. Finally, the number of survey days that have been manually removed from the selected set outside of the standard filtering procedure are displayed.

PBA Bank Street Ashford Licence No: 706709

Filtering Summary

Land Use	05/F	HEALTH/CARE HOME (ELDERLY RESIDENTIAL)
Selected Trip Rate Calculation Parameter Range	17-180 RESIDE	
Actual Trip Rate Calculation Parameter Range	17-69 RESIDE	
Date Range	Minimum: 01/01/00	Maximum: 02/05/19
Parking Spaces Range	All Surveys Included	
Days of the week selected	Monday	1
	Tuesday	1
	Wednesday	1
	Thursday	1
	Friday	1
Main Location Types selected	Edge of Town Centre	5
Population within 500m	All Surveys Included	
Population <1 Mile ranges selected	5,001 to 10,000	1
	10,001 to 15,000	1
	15,001 to 20,000	1
	25,001 to 50,000	2
Population <5 Mile ranges selected	50,001 to 75,000	3
	125,001 to 250,000	1
	250,001 to 500,000	1
Car Ownership <5 Mile ranges selected	0.6 to 1.0	2
	1.1 to 1.5	3
PTAL Rating	No PTAL Present	5

Calculation Reference: AUDIT-706709-211011-1006

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 05 - HEALTH
Category : F - CARE HOME (ELDERLY RESIDENTIAL)
TOTAL VEHICLES

Selected regions and areas:

02	SOUTH EAST		
	ES	EAST SUSSEX	1 days
	EX	ESSEX	1 days
	HF	HERTFORDSHIRE	1 days
05	EAST MIDLANDS		
	NR	NORTHAMPTONSHIRE	1 days
	NT	NOTTINGHAMSHIRE	1 days

This section displays the number of survey days per TRICS® sub-region in the selected set

Primary Filtering selection:

This data displays the chosen trip rate parameter and its selected range. Only sites that fall within the parameter range are included in the trip rate calculation.

Parameter: Number of residents
Actual Range: 17 to 69 (units:)
Range Selected by User: 17 to 180 (units:)

Parking Spaces Range: All Surveys Included

Public Transport Provision:
Selection by: Include all surveys

Date Range: 01/01/00 to 02/05/19

This data displays the range of survey dates selected. Only surveys that were conducted within this date range are included in the trip rate calculation.

Selected survey days:

Monday	1 days
Tuesday	1 days
Wednesday	1 days
Thursday	1 days
Friday	1 days

This data displays the number of selected surveys by day of the week.

Selected survey types:

Manual count	5 days
Directional ATC Count	0 days

This data displays the number of manual classified surveys and the number of unclassified ATC surveys, the total adding up to the overall number of surveys in the selected set. Manual surveys are undertaken using staff, whilst ATC surveys are undertaking using machines.

Selected Locations:

Edge of Town Centre	5

This data displays the number of surveys per main location category within the selected set. The main location categories consist of Free Standing, Edge of Town, Suburban Area, Neighbourhood Centre, Edge of Town Centre, Town Centre and Not Known.

Selected Location Sub Categories:

Residential Zone	3
No Sub Category	2

This data displays the number of surveys per location sub-category within the selected set. The location sub-categories consist of Commercial Zone, Industrial Zone, Development Zone, Residential Zone, Retail Zone, Built-Up Zone, Village, Out of Town, High Street and No Sub Category.

Secondary Filtering selection:

Use Class:

C2	5 days

This data displays the number of surveys per Use Class classification within the selected set. The Use Classes Order 2005 has been used for this purpose, which can be found within the Library module of TRICS®.

Population within 500m Range:

All Surveys Included

Population within 1 mile:

5,001 to 10,000	1 days
10,001 to 15,000	1 days
15,001 to 20,000	1 days
25,001 to 50,000	2 days

This data displays the number of selected surveys within stated 1-mile radii of population.

Population within 5 miles:

50,001 to 75,000	3 days
125,001 to 250,000	1 days
250,001 to 500,000	1 days

This data displays the number of selected surveys within stated 5-mile radii of population.

Car ownership within 5 miles:

0.6 to 1.0	2 days
1.1 to 1.5	3 days

This data displays the number of selected surveys within stated ranges of average cars owned per residential dwelling, within a radius of 5-miles of selected survey sites.

Travel Plan:

No	5 days

This data displays the number of surveys within the selected set that were undertaken at sites with Travel Plans in place, and the number of surveys that were undertaken at sites without Travel Plans.

PTAL Rating:

No PTAL Present	5 days

This data displays the number of selected surveys with PTAL Ratings.

LIST OF SITES relevant to selection parameters

1	ES-05-F-02	CARE HOME		EAST SUSSEX
	BATTLE ROAD			
	HAILSHAM			
	Edge of Town Centre			
	Residential Zone			
	Total Number of residents:		69	
	Survey date: WEDNESDAY		*13/07/16*	*Survey Type: MANUAL*
2	EX-05-F-01	NURSING HOME		ESSEX
	WINSTON AVENUE			
	SOUTHEND-ON-SEA			
	WESTCLIFF			
	Edge of Town Centre			
	Residential Zone			
	Total Number of residents:		17	
	Survey date: THURSDAY		*24/10/13*	*Survey Type: MANUAL*
3	HF-05-F-02	NURSING HOME		HERTFORDSHIRE
	BEACONSFIELD ROAD			
	ST ALBANS			
	Edge of Town Centre			
	No Sub Category			
	Total Number of residents:		25	
	Survey date: TUESDAY		*01/10/13*	*Survey Type: MANUAL*
4	NR-05-F-01	NURSING HOME		NORTHAMPTONSHIRE
	ROCKINGHAM ROAD			
	CORBY			
	Edge of Town Centre			
	Residential Zone			
	Total Number of residents:		55	
	Survey date: FRIDAY		*21/11/08*	*Survey Type: MANUAL*
5	NT-05-F-02	NURSING HOME		NOTTINGHAMSHIRE
	MOOR LANE			
	NEAR NOTTINGHAM			
	BINGHAM			
	Edge of Town Centre			
	No Sub Category			
	Total Number of residents:		34	
	Survey date: MONDAY		*14/11/16*	*Survey Type: MANUAL*

This section provides a list of all survey sites and days in the selected set. For each individual survey site, it displays a unique site reference code and site address, the selected trip rate calculation parameter and its value, the day of the week and date of each survey, and whether the survey was a manual classified count or an ATC count.

TRIP RATE for Land Use 05 - HEALTH/F - CARE HOME (ELDERLY RESIDENTIAL)
TOTAL VEHICLES
Calculation factor: 1 RESIDE
BOLD print indicates peak (busiest) period

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	No. Days	Ave. RESIDE	Trip Rate	No. Days	Ave. RESIDE	Trip Rate	No. Days	Ave. RESIDE	Trip Rate
00:00 - 01:00									
01:00 - 02:00									
02:00 - 03:00									
03:00 - 04:00									
04:00 - 05:00									
05:00 - 06:00									
06:00 - 07:00									
07:00 - 08:00	5	40	0.120	5	40	0.080	5	40	0.200
08:00 - 09:00	5	40	0.095	5	40	0.065	5	40	0.160
09:00 - 10:00	5	40	0.080	5	40	0.040	5	40	0.120
10:00 - 11:00	5	40	0.105	5	40	0.080	5	40	0.185
11:00 - 12:00	5	40	0.110	5	40	0.080	5	40	0.190
12:00 - 13:00	5	40	0.100	5	40	0.070	5	40	0.170
13:00 - 14:00	5	40	0.115	5	40	0.110	5	40	0.225
14:00 - 15:00	5	40	0.100	5	40	0.110	5	40	0.210
15:00 - 16:00	5	40	0.050	5	40	0.105	5	40	0.155
16:00 - 17:00	5	40	0.100	5	40	0.135	5	40	0.235
17:00 - 18:00	5	40	0.050	5	40	0.125	5	40	0.175
18:00 - 19:00	5	40	0.050	5	40	0.020	5	40	0.070
19:00 - 20:00	4	36	0.028	4	36	0.124	4	36	0.152
20:00 - 21:00	4	36	0.007	4	36	0.007	4	36	0.014
21:00 - 22:00									
22:00 - 23:00									
23:00 - 24:00									
Total Rates:			1.110			1.151			2.261

This section displays the trip rate results based on the selected set of surveys and the selected count type (shown just above the table). It is split by three main columns, representing arrivals trips, departures trips, and total trips (arrivals plus departures). Within each of these main columns are three sub-columns. These display the number of survey days where count data is included (per time period), the average value of the selected trip rate calculation parameter (per time period), and the trip rate result (per time period). Total trip rates (the sum of the column) are also displayed at the foot of the table.

*To obtain a trip rate, the average (mean) trip rate parameter value (TRP) is first calculated for all selected survey days that have count data available for the stated time period. The average (mean) number of arrivals, departures or totals (whichever applies) is also calculated (COUNT) for all selected survey days that have count data available for the stated time period. Then, the average count is divided by the average trip rate parameter value, and multiplied by the stated calculation factor (shown just above the table and abbreviated here as FACT). So, the method is: COUNT/TRP*FACT. Trip rates are then rounded to 3 decimal places.*

Parameter summary

Trip rate parameter range selected:	17 - 69 (units:)
Survey date date range:	01/01/00 - 02/05/19
Number of weekdays (Monday-Friday):	5
Number of Saturdays:	0
Number of Sundays:	0
Surveys automatically removed from selection:	0
Surveys manually removed from selection:	0

This section displays a quick summary of some of the data filtering selections made by the TRICS® user. The trip rate calculation parameter range of all selected surveys is displayed first, followed by the range of minimum and maximum survey dates selected by the user. Then, the total number of selected weekdays and weekend days in the selected set of surveys are show. Finally, the number of survey days that have been manually removed from the selected set outside of the standard filtering procedure are displayed.

PBA Bank Street Ashford Licence No: 706709

Filtering Summary

Land Use	05/E	HEALTH/CLINICS
Selected Trip Rate Calculation Parameter Range	75-1790 sqm GFA	
Actual Trip Rate Calculation Parameter Range	210-1400 sqm GFA	
Date Range	Minimum: 01/01/00	Maximum: 26/11/19
Parking Spaces Range	All Surveys Included	
Days of the week selected	Monday	1
	Tuesday	2
	Wednesday	3
	Friday	1
Main Location Types selected	Town Centre	1
	Edge of Town Centre	6
Population within 500m	All Surveys Included	
Population <1 Mile ranges selected	1,001 to 5,000	2
	5,001 to 10,000	1
	20,001 to 25,000	1
	25,001 to 50,000	3
Population <5 Mile ranges selected	5,001 to 25,000	1
	50,001 to 75,000	1
	75,001 to 100,000	2
	125,001 to 250,000	2
	500,001 or More	1
Car Ownership <5 Mile ranges selected	0.5 or Less	1
	0.6 to 1.0	2
	1.1 to 1.5	4
PTAL Rating	No PTAL Present	7

Calculation Reference: AUDIT-706709-211011-1042

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 05 - HEALTH
Category : E - CLINICS
TOTAL VEHICLES

Selected regions and areas:

04	EAST ANGLIA		
	NF	NORFOLK	1 days
05	EAST MIDLANDS		
	DS	DERBYSHIRE	1 days
	LN	LINCOLNSHIRE	2 days
06	WEST MIDLANDS		
	WO	WORCESTERSHIRE	1 days
08	NORTH WEST		
	MS	MERSEYSIDE	1 days
09	NORTH		
	TW	TYNE & WEAR	1 days

This section displays the number of survey days per TRICS® sub-region in the selected set

Primary Filtering selection:

This data displays the chosen trip rate parameter and its selected range. Only sites that fall within the parameter range are included in the trip rate calculation.

Parameter: Gross floor area
Actual Range: 210 to 1400 (units: sqm)
Range Selected by User: 75 to 1790 (units: sqm)

Parking Spaces Range: All Surveys Included

Public Transport Provision:
Selection by: Include all surveys

Date Range: 01/01/00 to 26/11/19

This data displays the range of survey dates selected. Only surveys that were conducted within this date range are included in the trip rate calculation.

Selected survey days:

Monday	1 days
Tuesday	2 days
Wednesday	3 days
Friday	1 days

This data displays the number of selected surveys by day of the week.

Selected survey types:

Manual count	7 days
Directional ATC Count	0 days

This data displays the number of manual classified surveys and the number of unclassified ATC surveys, the total adding up to the overall number of surveys in the selected set. Manual surveys are undertaken using staff, whilst ATC surveys are undertaking using machines.

Selected Locations:

Town Centre	1
Edge of Town Centre	6

This data displays the number of surveys per main location category within the selected set. The main location categories consist of Free Standing, Edge of Town, Suburban Area, Neighbourhood Centre, Edge of Town Centre, Town Centre and Not Known.

Selected Location Sub Categories:

Residential Zone	3
Built-Up Zone	2
No Sub Category	2

This data displays the number of surveys per location sub-category within the selected set. The location sub-categories consist of Commercial Zone, Industrial Zone, Development Zone, Residential Zone, Retail Zone, Built-Up Zone, Village, Out of Town, High Street and No Sub Category.

Secondary Filtering selection:

Use Class:

E(e)	7 days

This data displays the number of surveys per Use Class classification within the selected set. The Use Classes Order 2005 has been used for this purpose, which can be found within the Library module of TRICS®.

Population within 500m Range:

All Surveys Included

Population within 1 mile:

1,001 to 5,000	2 days
5,001 to 10,000	1 days
20,001 to 25,000	1 days
25,001 to 50,000	3 days

This data displays the number of selected surveys within stated 1-mile radii of population.

Population within 5 miles:

5,001 to 25,000	1 days
50,001 to 75,000	1 days
75,001 to 100,000	2 days
125,001 to 250,000	2 days
500,001 or More	1 days

This data displays the number of selected surveys within stated 5-mile radii of population.

Car ownership within 5 miles:

0.5 or Less	1 days
0.6 to 1.0	2 days
1.1 to 1.5	4 days

This data displays the number of selected surveys within stated ranges of average cars owned per residential dwelling, within a radius of 5-miles of selected survey sites.

Travel Plan:

No	7 days

This data displays the number of surveys within the selected set that were undertaken at sites with Travel Plans in place, and the number of surveys that were undertaken at sites without Travel Plans.

PTAL Rating:

No PTAL Present	7 days

This data displays the number of selected surveys with PTAL Ratings.

LIST OF SITES relevant to selection parameters

1 DS-05-E-01 CHILDREN'S CLINIC DERBYSHIRE
HIGH STREET
NEAR CHESTERFIELD
CLAY CROSS
Town Centre
No Sub Category
Total Gross floor area: 1175 sqm
Survey date: FRIDAY 23/06/06 Survey Type: MANUAL

2 LN-05-E-01 CLINIC LINCOLNSHIRE
AVENUE ROAD
GRANTHAM

Edge of Town Centre
Built-Up Zone
Total Gross floor area: 1400 sqm
Survey date: WEDNESDAY 10/11/10 Survey Type: MANUAL

3 LN-05-E-02 CHIROPRACTIC CLINIC LINCOLNSHIRE
NORTH PARADE
GRANTHAM

Edge of Town Centre
Residential Zone
Total Gross floor area: 210 sqm
Survey date: MONDAY 10/06/13 Survey Type: MANUAL

4 MS-05-E-01 COSMETIC SURGERY CLINIC MERSEYSIDE
RODNEY STREET
LIVERPOOL

Edge of Town Centre
Built-Up Zone
Total Gross floor area: 615 sqm
Survey date: WEDNESDAY 28/11/18 Survey Type: MANUAL

5 NF-05-E-02 COMPLEMENTARY THERAPY NORFOLK
MAGDALEN ROAD
NORWICH

Edge of Town Centre
Residential Zone
Total Gross floor area: 270 sqm
Survey date: TUESDAY 26/11/19 Survey Type: MANUAL

6 TW-05-E-01 ALTERNATIVE CLINIC TYNE & WEAR
HAWKEY'S LANE
NORTH SHIELDS
CHRITON
Edge of Town Centre
Residential Zone
Total Gross floor area: 215 sqm
Survey date: TUESDAY 09/11/10 Survey Type: MANUAL

7 WO-05-E-01 CLINIC WORCESTERSHIRE
NEW ROAD
BROMSGROVE

Edge of Town Centre
No Sub Category
Total Gross floor area: 500 sqm
Survey date: WEDNESDAY 26/02/03 Survey Type: MANUAL

This section provides a list of all survey sites and days in the selected set. For each individual survey site, it displays a unique site reference code and site address, the selected trip rate calculation parameter and its value, the day of the week and date of each survey, and whether the survey was a manual classified count or an ATC count.

TRIP RATE for Land Use 05 - HEALTH/E - CLINICS
TOTAL VEHICLES
Calculation factor: 100 sqm
BOLD print indicates peak (busiest) period

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate
00:00 - 01:00									
01:00 - 02:00									
02:00 - 03:00									
03:00 - 04:00									
04:00 - 05:00									
05:00 - 06:00									
06:00 - 07:00	1	1400	0.000	1	1400	0.000	1	1400	0.000
07:00 - 08:00	5	712	0.140	5	712	0.000	5	712	0.140
08:00 - 09:00	7	626	1.049	7	626	0.228	7	626	1.277
09:00 - 10:00	7	626	1.277	7	626	0.798	7	626	2.075
10:00 - 11:00	7	626	0.844	7	626	1.209	7	626	2.053
11:00 - 12:00	7	626	0.958	7	626	0.798	7	626	1.756
12:00 - 13:00	7	626	0.912	7	626	1.072	7	626	1.984
13:00 - 14:00	7	626	0.821	7	626	0.730	7	626	1.551
14:00 - 15:00	7	626	0.798	7	626	0.707	7	626	1.505
15:00 - 16:00	7	626	0.753	7	626	0.821	7	626	1.574
16:00 - 17:00	7	626	0.821	7	626	1.003	7	626	1.824
17:00 - 18:00	7	626	0.410	7	626	0.821	7	626	1.231
18:00 - 19:00	6	648	0.180	6	648	0.360	6	648	0.540
19:00 - 20:00	3	742	0.000	3	742	0.000	3	742	0.000
20:00 - 21:00	1	615	0.000	1	615	0.000	1	615	0.000
21:00 - 22:00									
22:00 - 23:00									
23:00 - 24:00									
Total Rates:			8.963			8.547			17.510

This section displays the trip rate results based on the selected set of surveys and the selected count type (shown just above the table). It is split by three main columns, representing arrivals trips, departures trips, and total trips (arrivals plus departures). Within each of these main columns are three sub-columns. These display the number of survey days where count data is included (per time period), the average value of the selected trip rate calculation parameter (per time period), and the trip rate result (per time period). Total trip rates (the sum of the column) are also displayed at the foot of the table.

*To obtain a trip rate, the average (mean) trip rate parameter value (TRP) is first calculated for all selected survey days that have count data available for the stated time period. The average (mean) number of arrivals, departures or totals (whichever applies) is also calculated (COUNT) for all selected survey days that have count data available for the stated time period. Then, the average count is divided by the average trip rate parameter value, and multiplied by the stated calculation factor (shown just above the table and abbreviated here as FACT). So, the method is: COUNT/TRP*FACT. Trip rates are then rounded to 3 decimal places.*

Parameter summary

Trip rate parameter range selected:	210 - 1400 (units: sqm)
Survey date date range:	01/01/00 - 26/11/19
Number of weekdays (Monday-Friday):	7
Number of Saturdays:	0
Number of Sundays:	0
Surveys automatically removed from selection:	0
Surveys manually removed from selection:	0

This section displays a quick summary of some of the data filtering selections made by the TRICS® user. The trip rate calculation parameter range of all selected surveys is displayed first, followed by the range of minimum and maximum survey dates selected by the user. Then, the total number of selected weekdays and weekend days in the selected set of surveys are show. Finally, the number of survey days that have been manually removed from the selected set outside of the standard filtering procedure are displayed.

Filtering Summary

Land Use	15/B	VEHICLE SERVICES/MOTORIST CENTRE (FAST FIT)
Selected Trip Rate Calculation Parameter Range	150-1878 sqm GFA	
Actual Trip Rate Calculation Parameter Range	300-850 sqm GFA	
Date Range	Minimum: 01/01/00	Maximum: 14/11/15
Parking Spaces Range	All Surveys Included	
Days of the week selected	Monday	1
	Wednesday	2
	Thursday	4
	Friday	2
Main Location Types selected	Edge of Town Centre	9
Population within 500m	All Surveys Included	
Population <1 Mile ranges selected	1,001 to 5,000	1
	10,001 to 15,000	1
	15,001 to 20,000	2
	20,001 to 25,000	4
	25,001 to 50,000	1
Population <5 Mile ranges selected	50,001 to 75,000	1
	75,001 to 100,000	2
	100,001 to 125,000	2
	125,001 to 250,000	2
	500,001 or More	2
Car Ownership <5 Mile ranges selected	0.6 to 1.0	3
	1.1 to 1.5	6
PTAL Rating	No PTAL Present	9

Calculation Reference: AUDIT-706709-210928-0954

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 15 - VEHICLE SERVICES
Category : B - MOTORIST CENTRE (FAST FIT)
TOTAL VEHICLES

Selected regions and areas:

02	SOUTH EAST		
	BD	BEDFORDSHIRE	1 days
	HC	HAMPSHIRE	1 days
04	EAST ANGLIA		
	CA	CAMBRIDGESHIRE	1 days
	SF	SUFFOLK	1 days
06	WEST MIDLANDS		
	SH	SHROPSHIRE	1 days
07	YORKSHIRE & NORTH LINCOLNSHIRE		
	NO	NORTH LINCOLNSHIRE	1 days
	NY	NORTH YORKSHIRE	1 days
09	NORTH		
	TW	TYNE & WEAR	2 days

This section displays the number of survey days per TRICS® sub-region in the selected set

Primary Filtering selection:

This data displays the chosen trip rate parameter and its selected range. Only sites that fall within the parameter range are included in the trip rate calculation.

Parameter: Gross floor area
Actual Range: 300 to 850 (units: sqm)
Range Selected by User: 150 to 1878 (units: sqm)

Parking Spaces Range: All Surveys Included

Public Transport Provision:
Selection by: Include all surveys

Date Range: 01/01/00 to 14/11/15

This data displays the range of survey dates selected. Only surveys that were conducted within this date range are included in the trip rate calculation.

Selected survey days:

Monday	1 days
Wednesday	2 days
Thursday	4 days
Friday	2 days

This data displays the number of selected surveys by day of the week.

Selected survey types:

Manual count	9 days
Directional ATC Count	0 days

This data displays the number of manual classified surveys and the number of unclassified ATC surveys, the total adding up to the overall number of surveys in the selected set. Manual surveys are undertaken using staff, whilst ATC surveys are undertaking using machines.

Selected Locations:

Edge of Town Centre	9

This data displays the number of surveys per main location category within the selected set. The main location categories consist of Free Standing, Edge of Town, Suburban Area, Neighbourhood Centre, Edge of Town Centre, Town Centre and Not Known.

Selected Location Sub Categories:

Industrial Zone	1
Commercial Zone	1
Development Zone	1
Residential Zone	2
Built-Up Zone	3
High Street	1

This data displays the number of surveys per location sub-category within the selected set. The location sub-categories consist of Commercial Zone, Industrial Zone, Development Zone, Residential Zone, Retail Zone, Built-Up Zone, Village,

Secondary Filtering selection:

Use Class:

Not Known	9 days

This data displays the number of surveys per Use Class classification within the selected set. The Use Classes Order 2005 has been used for this purpose, which can be found within the Library module of TRICS®.

Population within 500m Range:

All Surveys Included

Population within 1 mile:

1,001 to 5,000	1 days
10,001 to 15,000	1 days
15,001 to 20,000	2 days
20,001 to 25,000	4 days
25,001 to 50,000	1 days

This data displays the number of selected surveys within stated 1-mile radii of population.

Population within 5 miles:

50,001 to 75,000	1 days
75,001 to 100,000	2 days
100,001 to 125,000	2 days
125,001 to 250,000	2 days
500,001 or More	2 days

This data displays the number of selected surveys within stated 5-mile radii of population.

Car ownership within 5 miles:

0.6 to 1.0	3 days
1.1 to 1.5	6 days

This data displays the number of selected surveys within stated ranges of average cars owned per residential dwelling, within a radius of 5-miles of selected survey sites.

Travel Plan:

No	9 days

This data displays the number of surveys within the selected set that were undertaken at sites with Travel Plans in place, and the number of surveys that were undertaken at sites without Travel Plans.

PTAL Rating:

No PTAL Present	9 days

This data displays the number of selected surveys with PTAL Ratings.

LIST OF SITES relevant to selection parameters

1 BD-15-B-01 HI-Q BEDFORDSHIRE
HIGH STREET SOUTH
DUNSTABLE

Edge of Town Centre
High Street
Total Gross floor area: 525 sqm
Survey date: MONDAY *05/07/04* *Survey Type: MANUAL*

2 CA-15-B-01 NATIONAL TYRE CAMBRIDGESHIRE
NEWMARKET ROAD
CAMBRIDGE

Edge of Town Centre
Built-Up Zone
Total Gross floor area: 325 sqm
Survey date: FRIDAY *05/11/04* *Survey Type: MANUAL*

3 HC-15-B-01 NATIONAL TYRES HAMPSHIRE
ST CROSS STREET
WINCHESTER

Edge of Town Centre
Built-Up Zone
Total Gross floor area: 315 sqm
Survey date: FRIDAY *07/10/05* *Survey Type: MANUAL*

4 NO-15-B-01 KWIK FIT NORTH LINCOLNSHIRE
BRUMBY WOOD LANE
SCUNTHORPE

Edge of Town Centre
Residential Zone
Total Gross floor area: 850 sqm
Survey date: THURSDAY *20/12/12* *Survey Type: MANUAL*

5 NY-15-B-05 KWIK FIT NORTH YORKSHIRE
LOW SKELLGATE
RIPON

Edge of Town Centre
Residential Zone
Total Gross floor area: 360 sqm
Survey date: WEDNESDAY *25/09/13* *Survey Type: MANUAL*

6 SF-15-B-01 ATS EUROMASTER SUFFOLK
WHITE ELM STREET
IPSWICH

Edge of Town Centre
Industrial Zone
Total Gross floor area: 620 sqm
Survey date: THURSDAY *18/07/13* *Survey Type: MANUAL*

7 SH-15-B-01 KWIK FIT SHROPSHIRE
CASTLE FOREGATE
SHREWSBURY

Edge of Town Centre
Commercial Zone
Total Gross floor area: 500 sqm
Survey date: THURSDAY *11/06/09* *Survey Type: MANUAL*

8 TW-15-B-01 NATIONAL TYRES TYNE & WEAR
BATH LANE
NEWCASTLE

Edge of Town Centre
Built-Up Zone
Total Gross floor area: 300 sqm
Survey date: THURSDAY *28/04/05* *Survey Type: MANUAL*

9 TW-15-B-03 GREAT NTH TYRES TYNE & WEAR
EAST STREET
GATESHEAD

Edge of Town Centre
Development Zone
Total Gross floor area: 380 sqm
Survey date: WEDNESDAY *22/06/05* *Survey Type: MANUAL*

This section provides a list of all survey sites and days in the selected set. For each individual survey site, it displays a unique site reference code and site address, the selected trip rate calculation parameter and its value, the day of the

TRIP RATE for Land Use 15 - VEHICLE SERVICES/B - MOTORIST CENTRE (FAST FIT)
TOTAL VEHICLES
Calculation factor: 100 sqm
BOLD print indicates peak (busiest) period

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate
00:00 - 01:00									
01:00 - 02:00									
02:00 - 03:00									
03:00 - 04:00									
04:00 - 05:00									
05:00 - 06:00									
06:00 - 07:00									
07:00 - 08:00	6	506	0.461	6	506	0.066	6	506	0.527
08:00 - 09:00	9	464	1.341	9	464	0.335	9	464	1.676
09:00 - 10:00	9	464	1.317	9	464	0.814	9	464	2.131
10:00 - 11:00	9	464	1.246	9	464	1.174	9	464	2.420
11:00 - 12:00	9	464	1.198	9	464	1.054	9	464	2.252
12:00 - 13:00	9	464	1.078	9	464	0.982	9	464	2.060
13:00 - 14:00	9	464	0.958	9	464	1.174	9	464	2.132
14:00 - 15:00	9	464	1.078	9	464	1.174	9	464	2.252
15:00 - 16:00	9	464	1.078	9	464	1.365	9	464	2.443
16:00 - 17:00	9	464	0.790	9	464	1.437	9	464	2.227
17:00 - 18:00	9	464	0.431	9	464	1.102	9	464	1.533
18:00 - 19:00	7	499	0.200	7	499	0.572	7	499	0.772
19:00 - 20:00									
20:00 - 21:00									
21:00 - 22:00									
22:00 - 23:00									
23:00 - 24:00									
Total Rates:			11.176			11.249			22.425

This section displays the trip rate results based on the selected set of surveys and the selected count type (shown just above the table). It is split by three main columns, representing arrivals trips, departures trips, and total trips (arrivals plus departures). Within each of these main columns are three sub-columns. These display the number of survey days where count data is included (per time period), the average value of the selected trip rate calculation parameter (per time period), and the trip rate result (per time period). Total trip rates (the sum of the column) are also displayed at the foot of the table.

*To obtain a trip rate, the average (mean) trip rate parameter value (TRP) is first calculated for all selected survey days that have count data available for the stated time period. The average (mean) number of arrivals, departures or totals (whichever applies) is also calculated (COUNT) for all selected survey days that have count data available for the stated time period. Then, the average count is divided by the average trip rate parameter value, and multiplied by the stated calculation factor (shown just above the table and abbreviated here as FACT). So, the method is: COUNT/TRP*FACT. Trip rates are then rounded to 3 decimal places.*

Parameter summary

Trip rate parameter range selected:	300 - 850 (units: sqm)
Survey date date range:	01/01/00 - 14/11/15
Number of weekdays (Monday-Friday):	9
Number of Saturdays:	0
Number of Sundays:	0
Surveys automatically removed from selection:	0
Surveys manually removed from selection:	0

This section displays a quick summary of some of the data filtering selections made by the TRICS® user. The trip rate calculation parameter range of all selected surveys is displayed first, followed by the range of minimum and maximum survey dates selected by the user. Then, the total number of selected weekdays and weekend days in the selected set of surveys are show. Finally, the number of survey days that have been manually removed from the selected set outside of the standard filtering procedure are displayed.

Appendix E
Suburban trip rates

Calculation Reference: AUDIT-706709-210629-0630

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 02 - EMPLOYMENT
Category : F - WAREHOUSING (COMMERCIAL)
TOTAL VEHICLES

Selected regions and areas:

02	SOUTH EAST		
	BD	BEDFORDSHIRE	1 days
	EX	ESSEX	1 days
	HC	HAMPSHIRE	1 days
	KC	KENT	1 days
03	SOUTH WEST		
	DV	DEVON	1 days
04	EAST ANGLIA		
	SF	SUFFOLK	2 days
06	WEST MIDLANDS		
	WM	WEST MIDLANDS	1 days
	WO	WORCESTERSHIRE	1 days
07	YORKSHIRE & NORTH LINCOLNSHIRE		
	WY	WEST YORKSHIRE	1 days
09	NORTH		
	TW	TYNE & WEAR	1 days

This section displays the number of survey days per TRICS® sub-region in the selected set

Primary Filtering selection:

This data displays the chosen trip rate parameter and its selected range. Only sites that fall within the parameter range are included in the trip rate calculation.

Parameter: Gross floor area
Actual Range: 190 to 37530 (units: sqm)
Range Selected by User: 190 to 80066 (units: sqm)

Parking Spaces Range: All Surveys Included

Public Transport Provision:
Selection by: Include all surveys

Date Range: 01/01/13 to 15/10/20

This data displays the range of survey dates selected. Only surveys that were conducted within this date range are included in the trip rate calculation.

Selected survey days:

Monday	1 days
Wednesday	1 days
Thursday	4 days
Friday	5 days

This data displays the number of selected surveys by day of the week.

Selected survey types:

Manual count	11 days
Directional ATC Count	0 days

This data displays the number of manual classified surveys and the number of unclassified ATC surveys, the total adding up to the overall number of surveys in the selected set. Manual surveys are undertaken using staff, whilst ATC surveys are undertaking using machines.

Selected Locations:

Suburban Area (PPS6 Out of Centre)	2
Edge of Town	9

This data displays the number of surveys per main location category within the selected set. The main location categories consist of Free Standing, Edge of Town, Suburban Area, Neighbourhood Centre, Edge of Town Centre, Town Centre and Not Known.

Selected Location Sub Categories:

Industrial Zone	9
Commercial Zone	2

This data displays the number of surveys per location sub-category within the selected set. The location sub-categories consist of Commercial Zone, Industrial Zone, Development Zone, Residential Zone, Retail Zone, Built-Up Zone, Village, Out of Town, High Street and No Sub Category.

Secondary Filtering selection:

Use Class:

n/a	2 days
B8	9 days

This data displays the number of surveys per Use Class classification within the selected set. The Use Classes Order 2005 has been used for this purpose, which can be found within the Library module of TRICS®.

Filter by Site Operations Breakdown:
All Surveys Included

Population within 500m Range:
All Surveys Included

Population within 1 mile:

1,001 to 5,000	2 days
5,001 to 10,000	3 days
10,001 to 15,000	1 days
15,001 to 20,000	2 days
20,001 to 25,000	2 days
25,001 to 50,000	1 days

This data displays the number of selected surveys within stated 1-mile radii of population.

Population within 5 miles:

5,001 to 25,000	2 days
100,001 to 125,000	1 days
125,001 to 250,000	5 days
250,001 to 500,000	2 days
500,001 or More	1 days

This data displays the number of selected surveys within stated 5-mile radii of population.

Car ownership within 5 miles:

0.6 to 1.0	4 days
1.1 to 1.5	7 days

This data displays the number of selected surveys within stated ranges of average cars owned per residential dwelling, within a radius of 5-miles of selected survey sites.

Travel Plan:

No	11 days

This data displays the number of surveys within the selected set that were undertaken at sites with Travel Plans in place, and the number of surveys that were undertaken at sites without Travel Plans.

PTAL Rating:

No PTAL Present	11 days

This data displays the number of selected surveys with PTAL Ratings.

Covid-19 Restrictions	Yes	At least one survey within the selected data set was undertaken at a time of Covid-19 restrictions

LIST OF SITES relevant to selection parameters

1 BD-02-F-02 DRINKS WHOLESALER BEDFORDSHIRE
CAMBRIDGE ROAD
BEDFORD

Edge of Town
Industrial Zone
Total Gross floor area: 3500 sqm
Survey date: THURSDAY *15/10/20* *Survey Type: MANUAL*

2 DV-02-F-01 OPTICS WAREHOUSE DEVON
ALDERS WAY
PAIGNTON

Edge of Town
Industrial Zone
Total Gross floor area: 190 sqm
Survey date: FRIDAY *29/03/19* *Survey Type: MANUAL*

3 EX-02-F-01 SPORTS SUPPLEMENTS ESSEX
BRUNEL WAY
COLCHESTER
SEVERALLS INDUSTRIAL PK
Edge of Town
Industrial Zone
Total Gross floor area: 6560 sqm
Survey date: FRIDAY *18/05/18* *Survey Type: MANUAL*

4 HC-02-F-02 LOGISTICS HAMPSHIRE
RUTHERFORD ROAD
BASINGSTOKE

Suburban Area (PPS6 Out of Centre)
Commercial Zone
Total Gross floor area: 13200 sqm
Survey date: THURSDAY *16/06/16* *Survey Type: MANUAL*

5 KC-02-F-02 COMMERCIAL WAREHOUSING KENT
MILLS ROAD
AYLESFORD
QUARRY WOOD
Edge of Town
Industrial Zone
Total Gross floor area: 11200 sqm
Survey date: FRIDAY *22/09/17* *Survey Type: MANUAL*

6 SF-02-F-02 WAREHOUSING SUFFOLK
WALTON ROAD
FELIXSTOWE

Suburban Area (PPS6 Out of Centre)
Industrial Zone
Total Gross floor area: 22270 sqm
Survey date: THURSDAY *11/07/13* *Survey Type: MANUAL*

7 SF-02-F-03 ROAD HAULAGE SUFFOLK
CENTRAL AVENUE
IPSWICH
WARREN HEATH
Edge of Town
Industrial Zone
Total Gross floor area: 4700 sqm
Survey date: FRIDAY *18/09/15* *Survey Type: MANUAL*

8 TW-02-F-01 ASDA DISTRIBUTION CENTRE TYNE & WEAR
MANDARIN WAY
WASHINGTON
PATTISON IND. ESTATE
Edge of Town
Industrial Zone
Total Gross floor area: 31000 sqm
Survey date: FRIDAY *13/11/15* *Survey Type: MANUAL*

9 WM-02-F-02 LOGISTICS FIRM WEST MIDLANDS
SOVEREIGN ROAD
BIRMINGHAM
KINGS NORTON
Edge of Town
Commercial Zone
Total Gross floor area: 3625 sqm
Survey date: MONDAY *09/11/15* *Survey Type: MANUAL*

LIST OF SITES relevant to selection parameters (Cont.)

10	WO-02-F-03 COTSWOLD WAY WORCESTER	THERMOTECHNOLOGY	WORCESTERSHIRE
	Edge of Town Industrial Zone Total Gross floor area:	37530 sqm	
	Survey date: WEDNESDAY	*14/10/20*	*Survey Type: MANUAL*
11	WY-02-F-02 STAITHGATE LANE BRADFORD NEWHALL Edge of Town Industrial Zone Total Gross floor area:	DISTRIBUTION COMPANY 10446 sqm	WEST YORKSHIRE
	Survey date: THURSDAY	*14/03/19*	*Survey Type: MANUAL*

This section provides a list of all survey sites and days in the selected set. For each individual survey site, it displays a unique site reference code and site address, the selected trip rate calculation parameter and its value, the day of the week and date of each survey, and whether the survey was a manual classified count or an ATC count.

TRIP RATE for Land Use 02 - EMPLOYMENT/F - WAREHOUSING (COMMERCIAL)
TOTAL VEHICLES
Calculation factor: 100 sqm
BOLD print indicates peak (busiest) period

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate
00:00 - 01:00									
01:00 - 02:00									
02:00 - 03:00									
03:00 - 04:00									
04:00 - 05:00									
05:00 - 06:00	4	9102	0.135	4	9102	0.077	4	9102	0.212
06:00 - 07:00	5	14787	0.193	5	14787	0.062	5	14787	0.255
07:00 - 08:00	11	13111	0.184	11	13111	0.071	11	13111	0.255
08:00 - 09:00	11	13111	0.177	11	13111	0.086	11	13111	0.263
09:00 - 10:00	11	13111	0.146	11	13111	0.065	11	13111	0.211
10:00 - 11:00	11	13111	0.103	11	13111	0.084	11	13111	0.187
11:00 - 12:00	11	13111	0.098	11	13111	0.098	11	13111	0.196
12:00 - 13:00	11	13111	0.095	11	13111	0.095	11	13111	0.190
13:00 - 14:00	11	13111	0.116	11	13111	0.110	11	13111	0.226
14:00 - 15:00	11	13111	0.096	11	13111	0.114	11	13111	0.210
15:00 - 16:00	11	13111	0.089	11	13111	0.108	11	13111	0.197
16:00 - 17:00	11	13111	0.067	11	13111	0.148	11	13111	0.215
17:00 - 18:00	11	13111	0.069	11	13111	0.182	11	13111	0.251
18:00 - 19:00	11	13111	0.036	11	13111	0.128	11	13111	0.164
19:00 - 20:00	5	14787	0.034	5	14787	0.164	5	14787	0.198
20:00 - 21:00	5	14787	0.019	5	14787	0.108	5	14787	0.127
21:00 - 22:00	1	22270	0.031	1	22270	0.018	1	22270	0.049
22:00 - 23:00									
23:00 - 24:00									
Total Rates:			1.688			1.718			3.406

This section displays the trip rate results based on the selected set of surveys and the selected count type (shown just above the table). It is split by three main columns, representing arrivals trips, departures trips, and total trips (arrivals plus departures). Within each of these main columns are three sub-columns. These display the number of survey days where count data is included (per time period), the average value of the selected trip rate calculation parameter (per time period), and the trip rate result (per time period). Total trip rates (the sum of the column) are also displayed at the foot of the table.

*To obtain a trip rate, the average (mean) trip rate parameter value (TRP) is first calculated for all selected survey days that have count data available for the stated time period. The average (mean) number of arrivals, departures or totals (whichever applies) is also calculated (COUNT) for all selected survey days that have count data available for the stated time period. Then, the average count is divided by the average trip rate parameter value, and multiplied by the stated calculation factor (shown just above the table and abbreviated here as FACT). So, the method is: COUNT/TRP*FACT. Trip rates are then rounded to 3 decimal places.*

Parameter summary

Trip rate parameter range selected:	190 - 37530 (units: sqm)
Survey date date range:	01/01/13 - 15/10/20
Number of weekdays (Monday-Friday):	11
Number of Saturdays:	0
Number of Sundays:	0
Surveys automatically removed from selection:	0
Surveys manually removed from selection:	0

This section displays a quick summary of some of the data filtering selections made by the TRICS® user. The trip rate calculation parameter range of all selected surveys is displayed first, followed by the range of minimum and maximum survey dates selected by the user. Then, the total number of selected weekdays and weekend days in the selected set of surveys are show. Finally, the number of survey days that have been manually removed from the selected set outside of the standard filtering procedure are displayed.

PBA Bank Street Ashford Licence No: 706709

Filtering Summary

Land Use	01/I	RETAIL/SHOPPING CENTRE - LOCAL SHOPS
Selected Trip Rate Calculation Parameter Range	210-8310 sqm GFA	
Actual Trip Rate Calculation Parameter Range	260-4052 sqm GFA	
Date Range	Minimum: 01/01/10	Maximum: 28/06/19
Parking Spaces Range	All Surveys Included	
Days of the week selected	Monday	2
	Tuesday	2
	Wednesday	1
	Thursday	2
	Friday	2
Main Location Types selected	Neighbourhood Centre (PPS6 Local Centre)	9
Population within 500m	All Surveys Included	
Population <1 Mile ranges selected	5,001 to 10,000	1
	10,001 to 15,000	1
	20,001 to 25,000	3
	25,001 to 50,000	4
Population <5 Mile ranges selected	100,001 to 125,000	2
	125,001 to 250,000	3
	250,001 to 500,000	4
Car Ownership <5 Mile ranges selected	0.6 to 1.0	3
	1.1 to 1.5	6
PTAL Rating	No PTAL Present	9

Calculation Reference: AUDIT-706709-210809-0842

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 01 - RETAIL
Category : I - SHOPPING CENTRE - LOCAL SHOPS
TOTAL VEHICLES

Selected regions and areas:

03	SOUTH WEST		
	BR	BRISTOL CITY	1 days
06	WEST MIDLANDS		
	WO	WORCESTERSHIRE	1 days
08	NORTH WEST		
	CH	CHESHIRE	2 days
	LC	LANCASHIRE	1 days
09	NORTH		
	TV	TEES VALLEY	2 days
	TW	TYNE & WEAR	2 days

This section displays the number of survey days per TRICS® sub-region in the selected set

Primary Filtering selection:

This data displays the chosen trip rate parameter and its selected range. Only sites that fall within the parameter range are included in the trip rate calculation.

Parameter: Gross floor area
Actual Range: 260 to 4052 (units: sqm)
Range Selected by User: 210 to 8310 (units: sqm)

Parking Spaces Range: All Surveys Included

Public Transport Provision:
Selection by: Include all surveys

Date Range: 01/01/10 to 28/06/19

This data displays the range of survey dates selected. Only surveys that were conducted within this date range are included in the trip rate calculation.

Selected survey days:

Monday	2 days
Tuesday	2 days
Wednesday	1 days
Thursday	2 days
Friday	2 days

This data displays the number of selected surveys by day of the week.

Selected survey types:

Manual count	9 days
Directional ATC Count	0 days

This data displays the number of manual classified surveys and the number of unclassified ATC surveys, the total adding up to the overall number of surveys in the selected set. Manual surveys are undertaken using staff, whilst ATC surveys are undertaking using machines.

Selected Locations:

Neighbourhood Centre (PPS6 Local Centre)	9

This data displays the number of surveys per main location category within the selected set. The main location categories consist of Free Standing, Edge of Town, Suburban Area, Neighbourhood Centre, Edge of Town Centre, Town Centre and Not Known.

Selected Location Sub Categories:

Residential Zone	8
High Street	1

This data displays the number of surveys per location sub-category within the selected set. The location sub-categories consist of Commercial Zone, Industrial Zone, Development Zone, Residential Zone, Retail Zone, Built-Up Zone, Village, Out of Town, High Street and No Sub Category.

Secondary Filtering selection:

Use Class:

n/a	9 days

This data displays the number of surveys per Use Class classification within the selected set. The Use Classes Order 2005 has been used for this purpose, which can be found within the Library module of TRICS®.

Population within 500m Range:

All Surveys Included

Population within 1 mile:

5,001 to 10,000	1 days
10,001 to 15,000	1 days
20,001 to 25,000	3 days
25,001 to 50,000	4 days

This data displays the number of selected surveys within stated 1-mile radii of population.

Population within 5 miles:

100,001 to 125,000	2 days
125,001 to 250,000	3 days
250,001 to 500,000	4 days

This data displays the number of selected surveys within stated 5-mile radii of population.

Car ownership within 5 miles:

0.6 to 1.0	3 days
1.1 to 1.5	6 days

This data displays the number of selected surveys within stated ranges of average cars owned per residential dwelling, within a radius of 5-miles of selected survey sites.

Petrol filling station:

Included in the survey count	0 days
Excluded from count or no filling station	9 days

This data displays the number of surveys within the selected set that include petrol filling station activity, and the number of surveys that do not.

Travel Plan:

No	9 days

This data displays the number of surveys within the selected set that were undertaken at sites with Travel Plans in place, and the number of surveys that were undertaken at sites without Travel Plans.

PTAL Rating:

No PTAL Present	9 days

This data displays the number of selected surveys with PTAL Ratings.

LIST OF SITES relevant to selection parameters

1 BR-01-I-01 LOCAL SHOPS BRISTOL CITY
BELLAND DRIVE
BRISTOL
WHITCHURCH
Neighbourhood Centre (PPS6 Local Centre)
Residential Zone
Total Gross floor area: 770 sqm
Survey date: TUESDAY *22/09/15* *Survey Type: MANUAL*

2 CH-01-I-02 LOCAL SHOPS CHESHIRE
CHRISTLETON ROAD
CHESTER
BOUGHTON HEATH
Neighbourhood Centre (PPS6 Local Centre)
Residential Zone
Total Gross floor area: 260 sqm
Survey date: TUESDAY *15/05/12* *Survey Type: MANUAL*

3 CH-01-I-03 LOCAL SHOPS CHESHIRE
MILL LANE
CHESTER
BACHE
Neighbourhood Centre (PPS6 Local Centre)
Residential Zone
Total Gross floor area: 365 sqm
Survey date: THURSDAY *17/05/12* *Survey Type: MANUAL*

4 LC-01-I-01 LOCAL SHOPS LANCASHIRE
TALBOT ROW
NEAR CHORLEY
EUXTON
Neighbourhood Centre (PPS6 Local Centre)
Residential Zone
Total Gross floor area: 720 sqm
Survey date: MONDAY *17/10/11* *Survey Type: MANUAL*

5 TV-01-I-03 LOCAL SHOPS TEES VALLEY
ACKLAM ROAD
MIDDLESBROUGH
ACKLAM
Neighbourhood Centre (PPS6 Local Centre)
Residential Zone
Total Gross floor area: 1840 sqm
Survey date: FRIDAY *04/10/13* *Survey Type: MANUAL*

6 TV-01-I-04 LOCAL SHOPS TEES VALLEY
CARGO FLEET LANE
MIDDLESBROUGH
ORMESBY
Neighbourhood Centre (PPS6 Local Centre)
Residential Zone
Total Gross floor area: 585 sqm
Survey date: MONDAY *07/10/13* *Survey Type: MANUAL*

7 TW-01-I-02 LOCAL SHOPS TYNE & WEAR
DURHAM ROAD
SUNDERLAND
BARNES PARK
Neighbourhood Centre (PPS6 Local Centre)
Residential Zone
Total Gross floor area: 540 sqm
Survey date: WEDNESDAY *21/11/12* *Survey Type: MANUAL*

8 TW-01-I-03 LOCAL SHOPS TYNE & WEAR
VICTORIA ROAD
WASHINGTON
CONCORD
Neighbourhood Centre (PPS6 Local Centre)
High Street
Total Gross floor area: 2700 sqm
Survey date: FRIDAY *24/05/19* *Survey Type: MANUAL*

LIST OF SITES relevant to selection parameters (Cont.)

9 WO-01-I-02 LOCAL SHOPS WORCESTERSHIRE
CRANHAM DRIVE
WORCESTER

Neighbourhood Centre (PPS6 Local Centre)
Residential Zone
Total Gross floor area: 4052 sqm
Survey date: THURSDAY *22/05/14* *Survey Type: MANUAL*

This section provides a list of all survey sites and days in the selected set. For each individual survey site, it displays a unique site reference code and site address, the selected trip rate calculation parameter and its value, the day of the week and date of each survey, and whether the survey was a manual classified count or an ATC count.

TRIP RATE for Land Use 01 - RETAIL/I - SHOPPING CENTRE - LOCAL SHOPS
TOTAL VEHICLES
Calculation factor: 100 sqm
BOLD print indicates peak (busiest) period

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate
00:00 - 01:00									
01:00 - 02:00									
02:00 - 03:00									
03:00 - 04:00									
04:00 - 05:00									
05:00 - 06:00									
06:00 - 07:00	1	540	1.296	1	540	1.296	1	540	2.592
07:00 - 08:00	9	1315	2.696	9	1315	2.400	9	1315	5.096
08:00 - 09:00	9	1315	3.229	9	1315	2.890	9	1315	6.119
09:00 - 10:00	9	1315	3.938	9	1315	3.592	9	1315	7.530
10:00 - 11:00	9	1315	3.803	9	1315	3.617	9	1315	7.420
11:00 - 12:00	9	1315	3.989	9	1315	4.082	9	1315	8.071
12:00 - 13:00	9	1315	4.691	9	1315	4.530	9	1315	9.221
13:00 - 14:00	9	1315	4.116	9	1315	4.116	9	1315	8.232
14:00 - 15:00	9	1315	3.769	9	1315	3.888	9	1315	7.657
15:00 - 16:00	9	1315	3.753	9	1315	4.065	9	1315	7.818
16:00 - 17:00	9	1315	3.905	9	1315	3.584	9	1315	7.489
17:00 - 18:00	9	1315	4.015	9	1315	4.344	9	1315	8.359
18:00 - 19:00	9	1315	4.437	9	1315	4.657	9	1315	9.094
19:00 - 20:00	7	1601	3.998	7	1601	4.087	7	1601	8.085
20:00 - 21:00	7	1601	2.793	7	1601	2.855	7	1601	5.648
21:00 - 22:00	5	1287	3.030	5	1287	3.248	5	1287	6.278
22:00 - 23:00									
23:00 - 24:00									
Total Rates:			57.458			57.251			114.709

This section displays the trip rate results based on the selected set of surveys and the selected count type (shown just above the table). It is split by three main columns, representing arrivals trips, departures trips, and total trips (arrivals plus departures). Within each of these main columns are three sub-columns. These display the number of survey days where count data is included (per time period), the average value of the selected trip rate calculation parameter (per time period), and the trip rate result (per time period). Total trip rates (the sum of the column) are also displayed at the foot of the table.

*To obtain a trip rate, the average (mean) trip rate parameter value (TRP) is first calculated for all selected survey days that have count data available for the stated time period. The average (mean) number of arrivals, departures or totals (whichever applies) is also calculated (COUNT) for all selected survey days that have count data available for the stated time period. Then, the average count is divided by the average trip rate parameter value, and multiplied by the stated calculation factor (shown just above the table and abbreviated here as FACT). So, the method is: COUNT/TRP*FACT. Trip rates are then rounded to 3 decimal places.*

Parameter summary

Trip rate parameter range selected:	260 - 4052 (units: sqm)
Survey date date range:	01/01/10 - 28/06/19
Number of weekdays (Monday-Friday):	9
Number of Saturdays:	0
Number of Sundays:	0
Surveys automatically removed from selection:	0
Surveys manually removed from selection:	0

This section displays a quick summary of some of the data filtering selections made by the TRICS® user. The trip rate calculation parameter range of all selected surveys is displayed first, followed by the range of minimum and maximum survey dates selected by the user. Then, the total number of selected weekdays and weekend days in the selected set of surveys are show. Finally, the number of survey days that have been manually removed from the selected set outside of the standard filtering procedure are displayed.

PBA Bank Street Ashford Licence No: 706709

Filtering Summary

Land Use	01/J	RETAIL/RETAIL PARK - INCLUDING FOOD
Selected Trip Rate Calculation Parameter Range	734-45000 sqm GFA	
Actual Trip Rate Calculation Parameter Range	1930-44629 sqm GFA	
Date Range	Minimum: 01/01/00	Maximum: 03/10/20
Parking Spaces Range	All Surveys Included	
Days of the week selected	Wednesday	1
	Thursday	1
	Friday	3
Main Location Types selected	Suburban Area (PPS6 Out of Centre)	3
	Edge of Town	2
Population within 500m	All Surveys Included	
Population <1 Mile ranges selected	10,001 to 15,000	1
	15,001 to 20,000	2
	20,001 to 25,000	1
	25,001 to 50,000	1
Population <5 Mile ranges selected	75,001 to 100,000	1
	100,001 to 125,000	1
	125,001 to 250,000	2
	250,001 to 500,000	1
Car Ownership <5 Mile ranges selected	0.6 to 1.0	2
	1.1 to 1.5	3
PTAL Rating	No PTAL Present	5

Calculation Reference: AUDIT-706709-210809-0803

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 01 - RETAIL
Category : J - RETAIL PARK - INCLUDING FOOD
TOTAL VEHICLES

Selected regions and areas:

02	SOUTH EAST		
	HC	HAMPSHIRE	1 days
06	WEST MIDLANDS		
	WK	WARWICKSHIRE	1 days
08	NORTH WEST		
	LC	LANCASHIRE	1 days
09	NORTH		
	TV	TEES VALLEY	1 days
17	ULSTER (NORTHERN IRELAND)		
	AN	ANTRIM	1 days

This section displays the number of survey days per TRICS® sub-region in the selected set

Primary Filtering selection:

This data displays the chosen trip rate parameter and its selected range. Only sites that fall within the parameter range are included in the trip rate calculation.

Parameter: Gross floor area
Actual Range: 1930 to 44629 (units: sqm)
Range Selected by User: 734 to 45000 (units: sqm)

Parking Spaces Range: All Surveys Included

Public Transport Provision:
Selection by: Include all surveys

Date Range: 01/01/00 to 03/10/20

This data displays the range of survey dates selected. Only surveys that were conducted within this date range are included in the trip rate calculation.

Selected survey days:

Wednesday	1 days
Thursday	1 days
Friday	3 days

This data displays the number of selected surveys by day of the week.

Selected survey types:

Manual count	5 days
Directional ATC Count	0 days

This data displays the number of manual classified surveys and the number of unclassified ATC surveys, the total adding up to the overall number of surveys in the selected set. Manual surveys are undertaken using staff, whilst ATC surveys are undertaking using machines.

Selected Locations:

Suburban Area (PPS6 Out of Centre)	3
Edge of Town	2

This data displays the number of surveys per main location category within the selected set. The main location categories consist of Free Standing, Edge of Town, Suburban Area, Neighbourhood Centre, Edge of Town Centre, Town Centre and Not Known.

Selected Location Sub Categories:

Industrial Zone	2
Residential Zone	1
High Street	1
No Sub Category	1

This data displays the number of surveys per location sub-category within the selected set. The location sub-categories consist of Commercial Zone, Industrial Zone, Development Zone, Residential Zone, Retail Zone, Built-Up Zone, Village, Out of Town, High Street and No Sub Category.

Secondary Filtering selection:

Use Class:

E(a)	5 days

This data displays the number of surveys per Use Class classification within the selected set. The Use Classes Order 2005 has been used for this purpose, which can be found within the Library module of TRICS®.

Population within 500m Range:

All Surveys Included

Population within 1 mile:

10,001 to 15,000	1 days
15,001 to 20,000	2 days
20,001 to 25,000	1 days
25,001 to 50,000	1 days

This data displays the number of selected surveys within stated 1-mile radii of population.

Population within 5 miles:

75,001 to 100,000	1 days
100,001 to 125,000	1 days
125,001 to 250,000	2 days
250,001 to 500,000	1 days

This data displays the number of selected surveys within stated 5-mile radii of population.

Car ownership within 5 miles:

0.6 to 1.0	2 days
1.1 to 1.5	3 days

This data displays the number of selected surveys within stated ranges of average cars owned per residential dwelling, within a radius of 5-miles of selected survey sites.

Petrol filling station:

Included in the survey count	2 days
Excluded from count or no filling station	3 days

This data displays the number of surveys within the selected set that include petrol filling station activity, and the number of surveys that do not.

Travel Plan:

Not Known	2 days
No	3 days

This data displays the number of surveys within the selected set that were undertaken at sites with Travel Plans in place, and the number of surveys that were undertaken at sites without Travel Plans.

PTAL Rating:

No PTAL Present	5 days

This data displays the number of selected surveys with PTAL Ratings.

LIST OF SITES relevant to selection parameters

1 AN-01-J-02 RETAIL PARK ANTRIM
LISBURN ROAD
BELFAST

Suburban Area (PPS6 Out of Centre)
High Street
Total Gross floor area: 1930 sqm
Survey date: THURSDAY *19/10/17* *Survey Type: MANUAL*

2 HC-01-J-01 RETAIL PARK HAMPSHIRE
WALLOP DRIVE
BASINGSTOKE

Edge of Town
Residential Zone
Total Gross floor area: 8845 sqm
Survey date: WEDNESDAY *24/01/01* *Survey Type: MANUAL*

3 LC-01-J-03 RETAIL PARK LANCASHIRE
BLACKPOOL ROAD
PRESTON
HOLME SLACK
Suburban Area (PPS6 Out of Centre)
No Sub Category
Total Gross floor area: 44629 sqm
Survey date: FRIDAY *09/11/18* *Survey Type: MANUAL*

4 TV-01-J-02 RETAIL PARK TEES VALLEY
SKIPPERS LANE
MIDDLESBOROUGH

Suburban Area (PPS6 Out of Centre)
Industrial Zone
Total Gross floor area: 27800 sqm
Survey date: FRIDAY *19/10/18* *Survey Type: MANUAL*

5 WK-01-J-01 RETAIL PARK WARWICKSHIRE
TACHBROOK PARK DRIVE
LEAMINGTON SPA
TACHBROOK PARK
Edge of Town
Industrial Zone
Total Gross floor area: 19128 sqm
Survey date: FRIDAY *13/10/00* *Survey Type: MANUAL*

This section provides a list of all survey sites and days in the selected set. For each individual survey site, it displays a unique site reference code and site address, the selected trip rate calculation parameter and its value, the day of the week and date of each survey, and whether the survey was a manual classified count or an ATC count.

TRIP RATE for Land Use 01 - RETAIL/J - RETAIL PARK - INCLUDING FOOD
TOTAL VEHICLES
Calculation factor: 100 sqm
BOLD print indicates peak (busiest) period

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate
00:00 - 01:00									
01:00 - 02:00									
02:00 - 03:00									
03:00 - 04:00									
04:00 - 05:00									
05:00 - 06:00									
06:00 - 07:00	1	27800	0.061	1	27800	0.011	1	27800	0.072
07:00 - 08:00	5	20466	0.497	5	20466	0.329	5	20466	0.826
08:00 - 09:00	5	20466	1.217	5	20466	0.780	5	20466	1.997
09:00 - 10:00	5	20466	1.819	5	20466	1.284	5	20466	3.103
10:00 - 11:00	5	20466	2.153	5	20466	1.727	5	20466	3.880
11:00 - 12:00	5	20466	2.318	5	20466	2.248	5	20466	4.566
12:00 - 13:00	5	20466	2.575	5	20466	2.678	5	20466	5.253
13:00 - 14:00	5	20466	2.535	5	20466	2.711	5	20466	5.246
14:00 - 15:00	5	20466	2.108	5	20466	2.427	5	20466	4.535
15:00 - 16:00	5	20466	2.141	5	20466	2.243	5	20466	4.384
16:00 - 17:00	5	20466	2.134	5	20466	2.151	5	20466	4.285
17:00 - 18:00	5	20466	2.264	5	20466	2.115	5	20466	4.379
18:00 - 19:00	5	20466	2.113	5	20466	2.262	5	20466	4.375
19:00 - 20:00	4	23372	1.247	4	23372	1.545	4	23372	2.792
20:00 - 21:00	4	23372	0.614	4	23372	0.958	4	23372	1.572
21:00 - 22:00	3	21896	0.414	3	21896	0.636	3	21896	1.050
22:00 - 23:00	1	19128	0.392	1	19128	0.580	1	19128	0.972
23:00 - 24:00									
Total Rates:			26.602			26.685			53.287

This section displays the trip rate results based on the selected set of surveys and the selected count type (shown just above the table). It is split by three main columns, representing arrivals trips, departures trips, and total trips (arrivals plus departures). Within each of these main columns are three sub-columns. These display the number of survey days where count data is included (per time period), the average value of the selected trip rate calculation parameter (per time period), and the trip rate result (per time period). Total trip rates (the sum of the column) are also displayed at the foot of the table.

*To obtain a trip rate, the average (mean) trip rate parameter value (TRP) is first calculated for all selected survey days that have count data available for the stated time period. The average (mean) number of arrivals, departures or totals (whichever applies) is also calculated (COUNT) for all selected survey days that have count data available for the stated time period. Then, the average count is divided by the average trip rate parameter value, and multiplied by the stated calculation factor (shown just above the table and abbreviated here as FACT). So, the method is: COUNT/TRP*FACT. Trip rates are then rounded to 3 decimal places.*

Parameter summary

Trip rate parameter range selected:	1930 - 44629 (units: sqm)
Survey date date range:	01/01/00 - 03/10/20
Number of weekdays (Monday-Friday):	5
Number of Saturdays:	0
Number of Sundays:	0
Surveys automatically removed from selection:	0
Surveys manually removed from selection:	0

This section displays a quick summary of some of the data filtering selections made by the TRICS® user. The trip rate calculation parameter range of all selected surveys is displayed first, followed by the range of minimum and maximum survey dates selected by the user. Then, the total number of selected weekdays and weekend days in the selected set of surveys are show. Finally, the number of survey days that have been manually removed from the selected set outside of the standard filtering procedure are displayed.

Calculation Reference: AUDIT-706709-210629-0644

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 06 - HOTEL, FOOD & DRINK
Category : C - PUB/RESTAURANT
TOTAL VEHICLES

Selected regions and areas:

02	SOUTH EAST		
	EX	ESSEX	1 days
	HC	HAMPSHIRE	1 days
04	EAST ANGLIA		
	SF	SUFFOLK	1 days
05	EAST MIDLANDS		
	LN	LINCOLNSHIRE	1 days
	NR	NORTHAMPTONSHIRE	1 days
06	WEST MIDLANDS		
	ST	STAFFORDSHIRE	1 days
	WM	WEST MIDLANDS	1 days
08	NORTH WEST		
	GM	GREATER MANCHESTER	1 days
09	NORTH		
	DH	DURHAM	1 days
	TW	TYNE & WEAR	1 days

This section displays the number of survey days per TRICS® sub-region in the selected set

Primary Filtering selection:

This data displays the chosen trip rate parameter and its selected range. Only sites that fall within the parameter range are included in the trip rate calculation.

Parameter: Gross floor area
Actual Range: 200 to 875 (units: sqm)
Range Selected by User: 112 to 2384 (units: sqm)

Parking Spaces Range: All Surveys Included

Public Transport Provision:
Selection by: Include all surveys

Date Range: 01/01/13 to 11/06/19

This data displays the range of survey dates selected. Only surveys that were conducted within this date range are included in the trip rate calculation.

Selected survey days:

Tuesday	4 days
Wednesday	1 days
Friday	5 days

This data displays the number of selected surveys by day of the week.

Selected survey types:

Manual count	10 days
Directional ATC Count	0 days

This data displays the number of manual classified surveys and the number of unclassified ATC surveys, the total adding up to the overall number of surveys in the selected set. Manual surveys are undertaken using staff, whilst ATC surveys are undertaking using machines.

Selected Locations:

Suburban Area (PPS6 Out of Centre)	2
Edge of Town	8

This data displays the number of surveys per main location category within the selected set. The main location categories consist of Free Standing, Edge of Town, Suburban Area, Neighbourhood Centre, Edge of Town Centre, Town Centre and Not Known.

Selected Location Sub Categories:

Industrial Zone	2
Commercial Zone	1
Residential Zone	3
Retail Zone	2
Out of Town	1
No Sub Category	1

This data displays the number of surveys per location sub-category within the selected set. The location sub-categories consist of Commercial Zone, Industrial Zone, Development Zone, Residential Zone, Retail Zone, Built-Up Zone, Village, Out of Town, High Street and No Sub Category.

Secondary Filtering selection:

Use Class:

Sui Generis	10 days

This data displays the number of surveys per Use Class classification within the selected set. The Use Classes Order 2005 has been used for this purpose, which can be found within the Library module of TRICS®.

Population within 500m Range:

All Surveys Included

Population within 1 mile:

1,001 to 5,000	1 days
5,001 to 10,000	2 days
10,001 to 15,000	2 days
15,001 to 20,000	3 days
25,001 to 50,000	2 days

This data displays the number of selected surveys within stated 1-mile radii of population.

Population within 5 miles:

5,001 to 25,000	2 days
100,001 to 125,000	1 days
125,001 to 250,000	3 days
250,001 to 500,000	4 days

This data displays the number of selected surveys within stated 5-mile radii of population.

Car ownership within 5 miles:

0.5 or Less	1 days
0.6 to 1.0	3 days
1.1 to 1.5	5 days
1.6 to 2.0	1 days

This data displays the number of selected surveys within stated ranges of average cars owned per residential dwelling, within a radius of 5-miles of selected survey sites.

Travel Plan:

No	10 days

This data displays the number of surveys within the selected set that were undertaken at sites with Travel Plans in place, and the number of surveys that were undertaken at sites without Travel Plans.

PTAL Rating:

No PTAL Present	10 days

This data displays the number of selected surveys with PTAL Ratings.

LIST OF SITES relevant to selection parameters

1 DH-06-C-02 PUB/RESTAURANT DURHAM
STADIUM WAY
BISHOP AUCKLAND
TINDALE
Edge of Town
Retail Zone
Total Gross floor area: 450 sqm
Survey date: FRIDAY *31/03/17* *Survey Type: MANUAL*

2 EX-06-C-02 HARVESTER ESSEX
LONDON ROAD
COLCHESTER
STANWAY
Edge of Town
No Sub Category
Total Gross floor area: 450 sqm
Survey date: FRIDAY *08/11/13* *Survey Type: MANUAL*

3 GM-06-C-04 HUNGRY HORSE GREATER MANCHESTER
HELSMAN LANE
ROCHDALE

Edge of Town
Residential Zone
Total Gross floor area: 525 sqm
Survey date: TUESDAY *20/10/15* *Survey Type: MANUAL*

4 HC-06-C-04 PUB/RESTAURANT HAMPSHIRE
APOLLO RISE
FARNBOROUGH
COVE
Suburban Area (PPS6 Out of Centre)
Industrial Zone
Total Gross floor area: 615 sqm
Survey date: TUESDAY *11/06/19* *Survey Type: MANUAL*

5 LN-06-C-01 FLAMING GRILL LINCOLNSHIRE
CRUSADER ROAD
LINCOLN
NEW BOULTHAM
Edge of Town
Retail Zone
Total Gross floor area: 760 sqm
Survey date: TUESDAY *10/10/17* *Survey Type: MANUAL*

6 NR-06-C-01 PUB/RESTAURANT NORTHAMPTONSHIRE
BEDFORD ROAD
NORTHAMPTON
BRACKMILLS
Edge of Town
Commercial Zone
Total Gross floor area: 620 sqm
Survey date: FRIDAY *11/11/16* *Survey Type: MANUAL*

7 SF-06-C-02 PUB/RESTAURANT SUFFOLK
CLIFF ROAD
IPSWICH

Suburban Area (PPS6 Out of Centre)
Industrial Zone
Total Gross floor area: 875 sqm
Survey date: FRIDAY *18/09/15* *Survey Type: MANUAL*

8 ST-06-C-01 HARVESTER STAFFORDSHIRE
STONE ROAD
STOKE-ON-TRENT
TRENTHAM
Edge of Town
Residential Zone
Total Gross floor area: 720 sqm
Survey date: WEDNESDAY *23/10/13* *Survey Type: MANUAL*

9 TW-06-C-01 PUB/RESTAURANT TYNE & WEAR
WHICKHAM HIGHWAY
GATESHEAD

Edge of Town
Residential Zone
Total Gross floor area: 400 sqm
Survey date: FRIDAY *04/10/13* *Survey Type: MANUAL*

LIST OF SITES relevant to selection parameters (Cont.)

10	WM-06-C-02	PUB/RESTAURANT	WEST MIDLANDS
	PENNWOOD LANE		
	WOLVERHAMPTON		
	PENN COMMON		
	Edge of Town		
	Out of Town		
	Total Gross floor area:	200 sqm	
	Survey date: TUESDAY	*22/11/16*	*Survey Type: MANUAL*

This section provides a list of all survey sites and days in the selected set. For each individual survey site, it displays a unique site reference code and site address, the selected trip rate calculation parameter and its value, the day of the week and date of each survey, and whether the survey was a manual classified count or an ATC count.

TRIP RATE for Land Use 06 - HOTEL, FOOD & DRINK/C - PUB/RESTAURANT
TOTAL VEHICLES
Calculation factor: 100 sqm
BOLD print indicates peak (busiest) period

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate
00:00 - 01:00									
01:00 - 02:00									
02:00 - 03:00									
03:00 - 04:00									
04:00 - 05:00									
05:00 - 06:00									
06:00 - 07:00									
07:00 - 08:00									
08:00 - 09:00									
09:00 - 10:00									
10:00 - 11:00	10	562	0.606	10	562	0.410	10	562	1.016
11:00 - 12:00	10	562	1.549	10	562	0.606	10	562	2.155
12:00 - 13:00	10	562	3.508	10	562	1.300	10	562	4.808
13:00 - 14:00	10	562	2.369	10	562	2.725	10	562	5.094
14:00 - 15:00	10	562	1.264	10	562	2.850	10	562	4.114
15:00 - 16:00	10	562	1.193	10	562	1.318	10	562	2.511
16:00 - 17:00	10	562	2.511	10	562	1.247	10	562	3.758
17:00 - 18:00	10	562	3.580	10	562	1.977	10	562	5.557
18:00 - 19:00	10	562	3.758	10	562	2.778	10	562	6.536
19:00 - 20:00	10	562	3.117	10	562	3.348	10	562	6.465
20:00 - 21:00	10	562	1.834	10	562	3.134	10	562	4.968
21:00 - 22:00	10	562	1.175	10	562	2.173	10	562	3.348
22:00 - 23:00	10	562	0.712	10	562	2.547	10	562	3.259
23:00 - 24:00	9	555	0.200	9	555	0.741	9	555	0.941
Total Rates:			27.376			27.154			54.530

This section displays the trip rate results based on the selected set of surveys and the selected count type (shown just above the table). It is split by three main columns, representing arrivals trips, departures trips, and total trips (arrivals plus departures). Within each of these main columns are three sub-columns. These display the number of survey days where count data is included (per time period), the average value of the selected trip rate calculation parameter (per time period), and the trip rate result (per time period). Total trip rates (the sum of the column) are also displayed at the foot of the table.

*To obtain a trip rate, the average (mean) trip rate parameter value (TRP) is first calculated for all selected survey days that have count data available for the stated time period. The average (mean) number of arrivals, departures or totals (whichever applies) is also calculated (COUNT) for all selected survey days that have count data available for the stated time period. Then, the average count is divided by the average trip rate parameter value, and multiplied by the stated calculation factor (shown just above the table and abbreviated here as FACT). So, the method is: COUNT/TRP*FACT. Trip rates are then rounded to 3 decimal places.*

Parameter summary

Trip rate parameter range selected:	200 - 875 (units: sqm)
Survey date date range:	01/01/13 - 11/06/19
Number of weekdays (Monday-Friday):	10
Number of Saturdays:	0
Number of Sundays:	0
Surveys automatically removed from selection:	0
Surveys manually removed from selection:	0

This section displays a quick summary of some of the data filtering selections made by the TRICS® user. The trip rate calculation parameter range of all selected surveys is displayed first, followed by the range of minimum and maximum survey dates selected by the user. Then, the total number of selected weekdays and weekend days in the selected set of surveys are show. Finally, the number of survey days that have been manually removed from the selected set outside of the standard filtering procedure are displayed.

PBA Bank Street Ashford Licence No: 706709

Filtering Summary

Land Use	07/Q	LEISURE/COMMUNITY CENTRE
Selected Trip Rate Calculation Parameter Range	100-2329 sqm GFA	
Actual Trip Rate Calculation Parameter Range	210-1486 sqm GFA	
Date Range	Minimum: 01/01/00	Maximum: 24/05/19
Parking Spaces Range	All Surveys Included	
Days of the week selected	Tuesday	1
	Wednesday	1
	Thursday	1
	Friday	2
Main Location Types selected	Suburban Area (PPS6 Out of Centre)	4
	Edge of Town	1
Population within 500m	All Surveys Included	
Population <1 Mile ranges selected	5,001 to 10,000	2
	15,001 to 20,000	1
	25,001 to 50,000	2
Population <5 Mile ranges selected	5,001 to 25,000	1
	50,001 to 75,000	1
	100,001 to 125,000	2
	125,001 to 250,000	1
Car Ownership <5 Mile ranges selected	0.6 to 1.0	3
	1.1 to 1.5	2
PTAL Rating	No PTAL Present	5

Calculation Reference: AUDIT-706709-210928-0928

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 07 - LEISURE
Category : Q - COMMUNITY CENTRE
TOTAL VEHICLES

Selected regions and areas:

03	SOUTH WEST		
	WL	WILTSHIRE	1 days
06	WEST MIDLANDS		
	SH	SHROPSHIRE	1 days
09	NORTH		
	DH	DURHAM	1 days
	TV	TEES VALLEY	1 days
	TW	TYNE & WEAR	1 days

This section displays the number of survey days per TRICS® sub-region in the selected set

Primary Filtering selection:

This data displays the chosen trip rate parameter and its selected range. Only sites that fall within the parameter range are included in the trip rate calculation.

Parameter: Gross floor area
Actual Range: 210 to 1486 (units: sqm)
Range Selected by User: 100 to 2329 (units: sqm)

Parking Spaces Range: All Surveys Included

Public Transport Provision:
Selection by: Include all surveys

Date Range: 01/01/00 to 24/05/19

This data displays the range of survey dates selected. Only surveys that were conducted within this date range are included in the trip rate calculation.

Selected survey days:

Tuesday	1 days
Wednesday	1 days
Thursday	1 days
Friday	2 days

This data displays the number of selected surveys by day of the week.

Selected survey types:

Manual count	5 days
Directional ATC Count	0 days

This data displays the number of manual classified surveys and the number of unclassified ATC surveys, the total adding up to the overall number of surveys in the selected set. Manual surveys are undertaken using staff, whilst ATC surveys are undertaking using machines.

Selected Locations:

Suburban Area (PPS6 Out of Centre)	4
Edge of Town	1

This data displays the number of surveys per main location category within the selected set. The main location categories consist of Free Standing, Edge of Town, Suburban Area, Neighbourhood Centre, Edge of Town Centre, Town Centre and Not Known.

Selected Location Sub Categories:

Residential Zone	4
No Sub Category	1

This data displays the number of surveys per location sub-category within the selected set. The location sub-categories consist of Commercial Zone, Industrial Zone, Development Zone, Residential Zone, Retail Zone, Built-Up Zone, Village, Out of Town, High Street and No Sub Category.

Secondary Filtering selection:

Use Class:

F2(b)	5 days

This data displays the number of surveys per Use Class classification within the selected set. The Use Classes Order 2005 has been used for this purpose, which can be found within the Library module of TRICS®.

Population within 500m Range:

All Surveys Included

Population within 1 mile:

5,001 to 10,000	2 days
15,001 to 20,000	1 days
25,001 to 50,000	2 days

This data displays the number of selected surveys within stated 1-mile radii of population.

Population within 5 miles:

5,001 to 25,000	1 days
50,001 to 75,000	1 days
100,001 to 125,000	2 days
125,001 to 250,000	1 days

This data displays the number of selected surveys within stated 5-mile radii of population.

Car ownership within 5 miles:

0.6 to 1.0	3 days
1.1 to 1.5	2 days

This data displays the number of selected surveys within stated ranges of average cars owned per residential dwelling, within a radius of 5-miles of selected survey sites.

Travel Plan:

No	5 days

This data displays the number of surveys within the selected set that were undertaken at sites with Travel Plans in place, and the number of surveys that were undertaken at sites without Travel Plans.

PTAL Rating:

No PTAL Present	5 days

This data displays the number of selected surveys with PTAL Ratings.

LIST OF SITES relevant to selection parameters

1 DH-07-Q-01 COM. CENTRE DURHAM
JUTLAND ROAD
HARTLEPOOL

Suburban Area (PPS6 Out of Centre)
No Sub Category
Total Gross floor area: 500 sqm
Survey date: FRIDAY *28/09/07* *Survey Type: MANUAL*

2 SH-07-Q-01 COMMUNITY CENTRE SHROPSHIRE
SOUTHGATE
TELFORD
SUTTON HILL
Edge of Town
Residential Zone
Total Gross floor area: 1486 sqm
Survey date: THURSDAY *24/10/13* *Survey Type: MANUAL*

3 TV-07-Q-01 COM. CENTRE TEES VALLEY
FULBECK ROAD
MIDDLESBROUGH

Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 225 sqm
Survey date: WEDNESDAY *26/09/07* *Survey Type: MANUAL*

4 TW-07-Q-03 COMMUNITY CENTRE TYNE & WEAR
ASKEW ROAD W
GATESHEAD
TEAMS
Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 750 sqm
Survey date: FRIDAY *24/05/19* *Survey Type: MANUAL*

5 WL-07-Q-01 COM.CENTRE WILTSHIRE
OLD COURT
WOOTTON BASSETT

Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 210 sqm
Survey date: TUESDAY *03/10/06* *Survey Type: MANUAL*

This section provides a list of all survey sites and days in the selected set. For each individual survey site, it displays a unique site reference code and site address, the selected trip rate calculation parameter and its value, the day of the week and date of each survey, and whether the survey was a manual classified count or an ATC count.

TRIP RATE for Land Use 07 - LEISURE/Q - COMMUNITY CENTRE
TOTAL VEHICLES
Calculation factor: 100 sqm
BOLD print indicates peak (busiest) period

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate
00:00 - 01:00									
01:00 - 02:00									
02:00 - 03:00									
03:00 - 04:00									
04:00 - 05:00									
05:00 - 06:00									
06:00 - 07:00									
07:00 - 08:00									
08:00 - 09:00	5	634	0.315	5	634	0.158	5	634	0.473
09:00 - 10:00	5	634	0.568	5	634	0.315	5	634	0.883
10:00 - 11:00	5	634	0.221	5	634	0.473	5	634	0.694
11:00 - 12:00	5	634	0.315	5	634	0.284	5	634	0.599
12:00 - 13:00	4	737	0.781	4	737	0.849	4	737	1.630
13:00 - 14:00	4	737	0.611	4	737	0.645	4	737	1.256
14:00 - 15:00	4	737	0.238	4	737	0.373	4	737	0.611
15:00 - 16:00	4	737	0.305	4	737	0.339	4	737	0.644
16:00 - 17:00	4	737	0.238	4	737	0.170	4	737	0.408
17:00 - 18:00	4	737	0.475	4	737	0.339	4	737	0.814
18:00 - 19:00	3	732	1.594	3	732	0.683	3	732	2.277
19:00 - 20:00	3	732	0.638	3	732	0.638	3	732	1.276
20:00 - 21:00	3	732	0.182	3	732	0.501	3	732	0.683
21:00 - 22:00	3	732	0.228	3	732	1.002	3	732	1.230
22:00 - 23:00									
23:00 - 24:00									
Total Rates:			6.709			6.769			13.478

This section displays the trip rate results based on the selected set of surveys and the selected count type (shown just above the table). It is split by three main columns, representing arrivals trips, departures trips, and total trips (arrivals plus departures). Within each of these main columns are three sub-columns. These display the number of survey days where count data is included (per time period), the average value of the selected trip rate calculation parameter (per time period), and the trip rate result (per time period). Total trip rates (the sum of the column) are also displayed at the foot of the table.

*To obtain a trip rate, the average (mean) trip rate parameter value (TRP) is first calculated for all selected survey days that have count data available for the stated time period. The average (mean) number of arrivals, departures or totals (whichever applies) is also calculated (COUNT) for all selected survey days that have count data available for the stated time period. Then, the average count is divided by the average trip rate parameter value, and multiplied by the stated calculation factor (shown just above the table and abbreviated here as FACT). So, the method is: COUNT/TRP*FACT. Trip rates are then rounded to 3 decimal places.*

Parameter summary

Trip rate parameter range selected:	210 - 1486 (units: sqm)
Survey date date range:	01/01/00 - 24/05/19
Number of weekdays (Monday-Friday):	5
Number of Saturdays:	0
Number of Sundays:	0
Surveys automatically removed from selection:	0
Surveys manually removed from selection:	0

This section displays a quick summary of some of the data filtering selections made by the TRICS® user. The trip rate calculation parameter range of all selected surveys is displayed first, followed by the range of minimum and maximum survey dates selected by the user. Then, the total number of selected weekdays and weekend days in the selected set of surveys are show. Finally, the number of survey days that have been manually removed from the selected set outside of the standard filtering procedure are displayed.

PBA Bank Street Ashford Licence No: 706709

Filtering Summary

Land Use	04/A	EDUCATION/PRIMARY
Selected Trip Rate Calculation Parameter Range	450-4520 sqm GFA	
Actual Trip Rate Calculation Parameter Range	625-3900 sqm GFA	
Date Range	Minimum: 01/01/13	Maximum: 03/04/19
Parking Spaces Range	All Surveys Included	
Days of the week selected	Monday	4
	Tuesday	4
	Wednesday	1
	Thursday	6
Main Location Types selected	Suburban Area (PPS6 Out of Centre)	7
	Edge of Town	8
Population within 500m	All Surveys Included	
Population <1 Mile ranges selected	1,001 to 5,000	1
	5,001 to 10,000	4
	10,001 to 15,000	1
	15,001 to 20,000	4
	20,001 to 25,000	1
	25,001 to 50,000	4
Population <5 Mile ranges selected	5,001 to 25,000	1
	50,001 to 75,000	1
	125,001 to 250,000	4
	250,001 to 500,000	7
	500,001 or More	2
Car Ownership <5 Mile ranges selected	0.6 to 1.0	7
	1.1 to 1.5	8
PTAL Rating	No PTAL Present	15

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 04 - EDUCATION
Category : A - PRIMARY
TOTAL VEHICLES

Selected regions and areas:

02	SOUTH EAST		
	HC	HAMPSHIRE	1 days
03	SOUTH WEST		
	BR	BRISTOL CITY	1 days
	CW	CORNWALL	1 days
05	EAST MIDLANDS		
	DS	DERBYSHIRE	1 days
	LE	LEICESTERSHIRE	1 days
	NR	NORTHAMPTONSHIRE	1 days
06	WEST MIDLANDS		
	WM	WEST MIDLANDS	1 days
07	YORKSHIRE & NORTH LINCOLNSHIRE		
	NE	NORTH EAST LINCOLNSHIRE	1 days
	WY	WEST YORKSHIRE	2 days
08	NORTH WEST		
	CH	CHESHIRE	1 days
	GM	GREATER MANCHESTER	1 days
	LC	LANCASHIRE	1 days
	MS	MERSEYSIDE	1 days
09	NORTH		
	TW	TYNE & WEAR	1 days

This section displays the number of survey days per TRICS® sub-region in the selected set

Primary Filtering selection:

This data displays the chosen trip rate parameter and its selected range. Only sites that fall within the parameter range are included in the trip rate calculation.

Parameter: Gross floor area
Actual Range: 625 to 3900 (units: sqm)
Range Selected by User: 450 to 4520 (units: sqm)

Parking Spaces Range: All Surveys Included

Public Transport Provision:
Selection by: Include all surveys

Date Range: 01/01/13 to 03/04/19

This data displays the range of survey dates selected. Only surveys that were conducted within this date range are included in the trip rate calculation.

Selected survey days:

Monday	4 days
Tuesday	4 days
Wednesday	1 days
Thursday	6 days

This data displays the number of selected surveys by day of the week.

Selected survey types:

Manual count	15 days
Directional ATC Count	0 days

This data displays the number of manual classified surveys and the number of unclassified ATC surveys, the total adding up to the overall number of surveys in the selected set. Manual surveys are undertaken using staff, whilst ATC surveys are undertaking using machines.

Selected Locations:

Suburban Area (PPS6 Out of Centre)	7
Edge of Town	8

This data displays the number of surveys per main location category within the selected set. The main location categories consist of Free Standing, Edge of Town, Suburban Area, Neighbourhood Centre, Edge of Town Centre, Town Centre and Not Known.

Selected Location Sub Categories:

Residential Zone	14

This data displays the number of surveys per location sub-category within the selected set. The location sub-categories consist of Commercial Zone, Industrial Zone, Development Zone, Residential Zone, Retail Zone, Built-Up Zone, Village, Out of Town, High Street and No Sub Category.

Secondary Filtering selection:

Use Class:

F1(a)	15 days

This data displays the number of surveys per Use Class classification within the selected set. The Use Classes Order 2005 has been used for this purpose, which can be found within the Library module of TRICS®.

Population within 500m Range:

All Surveys Included

Population within 1 mile:

1,001 to 5,000	1 days
5,001 to 10,000	4 days
10,001 to 15,000	1 days
15,001 to 20,000	4 days
20,001 to 25,000	1 days
25,001 to 50,000	4 days

This data displays the number of selected surveys within stated 1-mile radii of population.

Population within 5 miles:

5,001 to 25,000	1 days
50,001 to 75,000	1 days
125,001 to 250,000	4 days
250,001 to 500,000	7 days
500,001 or More	2 days

This data displays the number of selected surveys within stated 5-mile radii of population.

Car ownership within 5 miles:

0.6 to 1.0	7 days
1.1 to 1.5	8 days

This data displays the number of selected surveys within stated ranges of average cars owned per residential dwelling, within a radius of 5-miles of selected survey sites.

Travel Plan:

Yes	2 days
No	13 days

This data displays the number of surveys within the selected set that were undertaken at sites with Travel Plans in place, and the number of surveys that were undertaken at sites without Travel Plans.

PTAL Rating:

No PTAL Present	15 days

This data displays the number of selected surveys with PTAL Ratings.

LIST OF SITES relevant to selection parameters

1 BR-04-A-01 PRIMARY SCHOOL BRISTOL CITY
SCHOOL CLOSE
BRISTOL
WHITCHURCH
Edge of Town
Residential Zone
Total Gross floor area: 950 sqm
Survey date: TUESDAY *22/09/15* *Survey Type: MANUAL*

2 CH-04-A-01 PRIMARY SCHOOL CHESHIRE
WESTON GROVE
CHESTER
UPTON
Edge of Town
Residential Zone
Total Gross floor area: 1350 sqm
Survey date: MONDAY *17/11/14* *Survey Type: MANUAL*

3 CW-04-A-03 PRIMARY ACADEMY CORNWALL
TREVERBYN RISE
PENRYN

Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 3900 sqm
Survey date: THURSDAY *28/03/19* *Survey Type: MANUAL*

4 DS-04-A-01 PRIMARY SCHOOL DERBYSHIRE
VICARAGE ROAD
DERBY
MICKLEOVER
Edge of Town
Residential Zone
Total Gross floor area: 1600 sqm
Survey date: THURSDAY *25/06/15* *Survey Type: MANUAL*

5 GM-04-A-01 PRIMARY SCHOOL GREATER MANCHESTER
ROCH MILLS CRESCENT
ROCHDALE

Edge of Town
Residential Zone
Total Gross floor area: 1675 sqm
Survey date: TUESDAY *20/10/15* *Survey Type: MANUAL*

6 HC-04-A-05 PRIMARY SCHOOL HAMPSHIRE
HAVANT ROAD
HAYLING ISLAND

Edge of Town
Residential Zone
Total Gross floor area: 3250 sqm
Survey date: MONDAY *30/11/15* *Survey Type: MANUAL*

7 LC-04-A-05 PRIMARY SCHOOL LANCASHIRE
NEWTON STREET
BLACKBURN

Suburban Area (PPS6 Out of Centre)
No Sub Category
Total Gross floor area: 3359 sqm
Survey date: WEDNESDAY *28/09/16* *Survey Type: MANUAL*

8 LE-04-A-02 PRIMARY SCHOOL LEICESTERSHIRE
BEAUFORT WAY
LEICESTER
OADBY
Edge of Town
Residential Zone
Total Gross floor area: 1750 sqm
Survey date: THURSDAY *30/10/14* *Survey Type: MANUAL*

LIST OF SITES relevant to selection parameters (Cont.)

9	MS-04-A-02 BOOKER AVENUE LIVERPOOL ALVERTON	PRIMARY SCHOOL		MERSEYSIDE
	Suburban Area (PPS6 Out of Centre) Residential Zone Total Gross floor area:		2500 sqm	
	Survey date: THURSDAY		*13/06/13*	*Survey Type: MANUAL*
10	NE-04-A-01 SUNNINGDALE ROAD SCUNTHORPE	PRIMARY SCHOOL		NORTH EAST LINCOLNSHIRE
	Edge of Town Residential Zone Total Gross floor area:		625 sqm	
	Survey date: TUESDAY		*20/05/14*	*Survey Type: MANUAL*
11	NR-04-A-03 BOOTH LANE NORTH NORTHAMPTON	PRIMARY SCHOOL		NORTHAMPTONSHIRE
	Suburban Area (PPS6 Out of Centre) Residential Zone Total Gross floor area:		2635 sqm	
	Survey date: THURSDAY		*24/03/16*	*Survey Type: MANUAL*
12	TW-04-A-01 GLYNWOOD GARDENS GATESHEAD	PRIMARY SCHOOL		TYNE & WEAR
	Suburban Area (PPS6 Out of Centre) Residential Zone Total Gross floor area:		2900 sqm	
	Survey date: MONDAY		*07/10/13*	*Survey Type: MANUAL*
13	WM-04-A-02 HAZEL ROAD BIRMINGHAM RUBERY	PRIMARY SCHOOL		WEST MIDLANDS
	Edge of Town Residential Zone Total Gross floor area:		1375 sqm	
	Survey date: TUESDAY		*10/11/15*	*Survey Type: MANUAL*
14	WY-04-A-01 SHAKESPEARE AVENUE LEEDS	PRIMARY SCHOOL		WEST YORKSHIRE
	Suburban Area (PPS6 Out of Centre) Residential Zone Total Gross floor area:		3756 sqm	
	Survey date: THURSDAY		*19/09/13*	*Survey Type: MANUAL*
15	WY-04-A-02 TOWN STREET LEEDS	PRIMARY SCHOOL		WEST YORKSHIRE
	Suburban Area (PPS6 Out of Centre) Residential Zone Total Gross floor area:		3150 sqm	
	Survey date: MONDAY		*19/10/15*	*Survey Type: MANUAL*

This section provides a list of all survey sites and days in the selected set. For each individual survey site, it displays a unique site reference code and site address, the selected trip rate calculation parameter and its value, the day of the week and date of each survey, and whether the survey was a manual classified count or an ATC count.

TRIP RATE for Land Use 04 - EDUCATION/A - PRIMARY
TOTAL VEHICLES
Calculation factor: 100 sqm
BOLD print indicates peak (busiest) period

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate
00:00 - 01:00									
01:00 - 02:00									
02:00 - 03:00									
03:00 - 04:00									
04:00 - 05:00									
05:00 - 06:00									
06:00 - 07:00									
07:00 - 08:00	15	2318	1.009	15	2318	0.374	15	2318	1.383
08:00 - 09:00	15	2318	4.779	15	2318	3.560	15	2318	8.339
09:00 - 10:00	15	2318	0.477	15	2318	0.791	15	2318	1.268
10:00 - 11:00	15	2318	0.204	15	2318	0.193	15	2318	0.397
11:00 - 12:00	15	2318	0.365	15	2318	0.239	15	2318	0.604
12:00 - 13:00	15	2318	0.362	15	2318	0.437	15	2318	0.799
13:00 - 14:00	15	2318	0.259	15	2318	0.351	15	2318	0.610
14:00 - 15:00	15	2318	1.205	15	2318	0.382	15	2318	1.587
15:00 - 16:00	15	2318	2.522	15	2318	3.796	15	2318	6.318
16:00 - 17:00	15	2318	0.794	15	2318	1.363	15	2318	2.157
17:00 - 18:00	15	2318	0.394	15	2318	0.584	15	2318	0.978
18:00 - 19:00	15	2318	0.158	15	2318	0.262	15	2318	0.420
19:00 - 20:00									
20:00 - 21:00									
21:00 - 22:00									
22:00 - 23:00									
23:00 - 24:00									
Total Rates:			12.528			12.332			24.860

This section displays the trip rate results based on the selected set of surveys and the selected count type (shown just above the table). It is split by three main columns, representing arrivals trips, departures trips, and total trips (arrivals plus departures). Within each of these main columns are three sub-columns. These display the number of survey days where count data is included (per time period), the average value of the selected trip rate calculation parameter (per time period), and the trip rate result (per time period). Total trip rates (the sum of the column) are also displayed at the foot of the table.

*To obtain a trip rate, the average (mean) trip rate parameter value (TRP) is first calculated for all selected survey days that have count data available for the stated time period. The average (mean) number of arrivals, departures or totals (whichever applies) is also calculated (COUNT) for all selected survey days that have count data available for the stated time period. Then, the average count is divided by the average trip rate parameter value, and multiplied by the stated calculation factor (shown just above the table and abbreviated here as FACT). So, the method is: COUNT/TRP*FACT. Trip rates are then rounded to 3 decimal places.*

Parameter summary

Trip rate parameter range selected:	625 - 3900 (units: sqm)
Survey date date range:	01/01/13 - 03/04/19
Number of weekdays (Monday-Friday):	15
Number of Saturdays:	0
Number of Sundays:	0
Surveys automatically removed from selection:	0
Surveys manually removed from selection:	0

This section displays a quick summary of some of the data filtering selections made by the TRICS® user. The trip rate calculation parameter range of all selected surveys is displayed first, followed by the range of minimum and maximum survey dates selected by the user. Then, the total number of selected weekdays and weekend days in the selected set of surveys are show. Finally, the number of survey days that have been manually removed from the selected set outside of the standard filtering procedure are displayed.

Filtering Summary

Land Use	04/B	EDUCATION/SECONDARY
Selected Trip Rate Calculation Parameter Range	4000-49000 sqm GFA	
Actual Trip Rate Calculation Parameter Range	5700-22669 sqm GFA	
Date Range	Minimum: 01/01/13	Maximum: 08/11/19
Parking Spaces Range	All Surveys Included	
Days of the week selected	Monday	6
	Tuesday	4
	Wednesday	4
	Thursday	4
	Friday	6
Main Location Types selected	Suburban Area (PPS6 Out of Centre)	13
	Edge of Town	11
Population within 500m	All Surveys Included	
Population <1 Mile ranges selected	5,001 to 10,000	3
	10,001 to 15,000	2
	15,001 to 20,000	2
	20,001 to 25,000	5
	25,001 to 50,000	11
	50,001 to 100,000	1
Population <5 Mile ranges selected	25,001 to 50,000	2
	50,001 to 75,000	2
	75,001 to 100,000	1
	125,001 to 250,000	6
	250,001 to 500,000	11
	500,001 or More	2
Car Ownership <5 Mile ranges selected	0.5 or Less	2
	0.6 to 1.0	12
	1.1 to 1.5	10
PTAL Rating	No PTAL Present	24

Calculation Reference: AUDIT-706709-211012-1058

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 04 - EDUCATION
Category : B - SECONDARY
TOTAL VEHICLES

Selected regions and areas:

02	SOUTH EAST		
	ES	EAST SUSSEX	1 days
	HC	HAMPSHIRE	1 days
03	SOUTH WEST		
	BR	BRISTOL CITY	1 days
	DV	DEVON	2 days
	WL	WILTSHIRE	1 days
04	EAST ANGLIA		
	NF	NORFOLK	1 days
	SF	SUFFOLK	1 days
05	EAST MIDLANDS		
	LN	LINCOLNSHIRE	1 days
	NT	NOTTINGHAMSHIRE	1 days
06	WEST MIDLANDS		
	WM	WEST MIDLANDS	3 days
07	YORKSHIRE & NORTH LINCOLNSHIRE		
	NE	NORTH EAST LINCOLNSHIRE	1 days
	NY	NORTH YORKSHIRE	1 days
	WY	WEST YORKSHIRE	2 days
08	NORTH WEST		
	GM	GREATER MANCHESTER	2 days
	LC	LANCASHIRE	1 days
09	NORTH		
	TV	TEES VALLEY	1 days
	TW	TYNE & WEAR	3 days

This section displays the number of survey days per TRICS® sub-region in the selected set

Primary Filtering selection:

This data displays the chosen trip rate parameter and its selected range. Only sites that fall within the parameter range are included in the trip rate calculation.

Parameter: Gross floor area
Actual Range: 5700 to 22669 (units: sqm)
Range Selected by User: 4000 to 49000 (units: sqm)

Parking Spaces Range: All Surveys Included

Public Transport Provision:
Selection by: Include all surveys

Date Range: 01/01/13 to 08/11/19

This data displays the range of survey dates selected. Only surveys that were conducted within this date range are included in the trip rate calculation.

Selected survey days:

Monday	6 days
Tuesday	4 days
Wednesday	4 days
Thursday	4 days
Friday	6 days

This data displays the number of selected surveys by day of the week.

Selected survey types:

Manual count	24 days
Directional ATC Count	0 days

This data displays the number of manual classified surveys and the number of unclassified ATC surveys, the total adding up to the overall number of surveys in the selected set. Manual surveys are undertaken using staff, whilst ATC surveys are undertaking using machines.

Selected Locations:

Suburban Area (PPS6 Out of Centre)	13
Edge of Town	11

This data displays the number of surveys per main location category within the selected set. The main location categories consist of Free Standing, Edge of Town, Suburban Area, Neighbourhood Centre, Edge of Town Centre, Town Centre and Not Known.

Selected Location Sub Categories:

Residential Zone	21
No Sub Category	3

This data displays the number of surveys per location sub-category within the selected set. The location sub-categories consist of Commercial Zone, Industrial Zone, Development Zone, Residential Zone, Retail Zone, Built-Up Zone, Village, Out of Town, High Street and No Sub Category.

Secondary Filtering selection:

Use Class:

F1(a)	24 days

This data displays the number of surveys per Use Class classification within the selected set. The Use Classes Order 2005 has been used for this purpose, which can be found within the Library module of TRICS®.

Population within 500m Range:

All Surveys Included

Population within 1 mile:

5,001 to 10,000	3 days
10,001 to 15,000	2 days
15,001 to 20,000	2 days
20,001 to 25,000	5 days
25,001 to 50,000	11 days
50,001 to 100,000	1 days

This data displays the number of selected surveys within stated 1-mile radii of population.

Population within 5 miles:

25,001 to 50,000	2 days
50,001 to 75,000	2 days
75,001 to 100,000	1 days
125,001 to 250,000	6 days
250,001 to 500,000	11 days
500,001 or More	2 days

This data displays the number of selected surveys within stated 5-mile radii of population.

Car ownership within 5 miles:

0.5 or Less	2 days
0.6 to 1.0	12 days
1.1 to 1.5	10 days

This data displays the number of selected surveys within stated ranges of average cars owned per residential dwelling, within a radius of 5-miles of selected survey sites.

Travel Plan:

Yes	2 days
No	22 days

This data displays the number of surveys within the selected set that were undertaken at sites with Travel Plans in place, and the number of surveys that were undertaken at sites without Travel Plans.

PTAL Rating:

No PTAL Present	24 days

This data displays the number of selected surveys with PTAL Ratings.

LIST OF SITES relevant to selection parameters

1 BR-04-B-01 SECONDARY SCHOOL BRISTOL CITY
ST FRANCIS ROAD
NEAR BRISTOL
KEYNSHAM
Edge of Town
Residential Zone
Total Gross floor area: 8650 sqm
Survey date: MONDAY 21/09/15 *Survey Type: MANUAL*

2 DV-04-B-03 SECONDARY ACADEMY DEVON
CRICKETFIELD ROAD
TORQUAY

Suburban Area (PPS6 Out of Centre)
No Sub Category
Total Gross floor area: 21265 sqm
Survey date: MONDAY 01/04/19 *Survey Type: MANUAL*

3 DV-04-B-04 SECONDARY ACADEMY DEVON
EARL RICHARD ' SRD SOUTH
EXETER

Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 12650 sqm
Survey date: TUESDAY 02/04/19 *Survey Type: MANUAL*

4 ES-04-B-01 SECONDARY SCHOOL EAST SUSSEX
NEVILL AVENUE
BRIGHTON
HOVE
Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 18000 sqm
Survey date: WEDNESDAY 27/09/17 *Survey Type: MANUAL*

5 GM-04-B-02 SECONDARY SCHOOL GREATER MANCHESTER
FALINGE ROAD
ROCHDALE
SHAWCLOUGH
Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 8750 sqm
Survey date: WEDNESDAY 21/10/15 *Survey Type: MANUAL*

6 GM-04-B-03 SECONDARY SCHOOL GREATER MANCHESTER
MATTHEW MOSS LANE
ROCHDALE
MARLAND
Edge of Town
Residential Zone
Total Gross floor area: 9589 sqm
Survey date: FRIDAY 23/09/16 *Survey Type: MANUAL*

7 HC-04-B-08 SECONDARY SCHOOL HAMPSHIRE
MINSTEAD AVENUE
SOUTHAMPTON

Edge of Town
Residential Zone
Total Gross floor area: 5700 sqm
Survey date: TUESDAY 24/11/15 *Survey Type: MANUAL*

8 LC-04-B-02 SECONDARY ACADEMY LANCASHIRE
TODD LANE NORTH
LOSTOCK HALL

Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 8300 sqm
Survey date: TUESDAY 06/11/18 *Survey Type: MANUAL*

LIST OF SITES relevant to selection parameters (Cont.)

9 LN-04-B-02 SECONDARY SCHOOL LINCOLNSHIRE
RISEHOLME ROAD
LINCOLN
ERMINE
Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 11112 sqm
Survey date: WEDNESDAY 04/10/17 Survey Type: MANUAL

10 NE-04-B-01 SECONDARY SCHOOL NORTH EAST LINCOLNSHIRE
FOXHILLS ROAD
SCUNTHORPE

Edge of Town
Residential Zone
Total Gross floor area: 12500 sqm
Survey date: MONDAY 19/05/14 Survey Type: MANUAL

11 NF-04-B-01 SECONDARY ACADEMY NORFOLK
SAINT CLEMENTS HILL
NORWICH

Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 21100 sqm
Survey date: FRIDAY 08/11/19 Survey Type: MANUAL

12 NT-04-B-01 SECONDARY SCHOOL NOTTINGHAMSHIRE
THE BANKS
NEAR NOTTINGHAM
BINGHAM
Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 5882 sqm
Survey date: THURSDAY 23/03/17 Survey Type: MANUAL

13 NY-04-B-03 GIRLS' HIGH SCHOOL NORTH YORKSHIRE
GARGRAVE ROAD
SKIPTON

Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 6884 sqm
Survey date: FRIDAY 08/03/19 Survey Type: MANUAL

14 SF-04-B-01 SECONDARY SCHOOL SUFFOLK
MAIN ROAD
IPSWICH
KESGRAVE
Edge of Town
Residential Zone
Total Gross floor area: 18000 sqm
Survey date: FRIDAY 18/09/15 Survey Type: MANUAL

15 TV-04-B-01 SECONDARY SCHOOL TEES VALLEY
COAST ROAD
MARSKE-BY-THE-SEA

Edge of Town
Residential Zone
Total Gross floor area: 7546 sqm
Survey date: WEDNESDAY 24/10/18 Survey Type: MANUAL

16 TW-04-B-01 SECONDARY SCHOOL TYNE & WEAR
SALTWELL ROAD SOUTH
GATESHEAD

Suburban Area (PPS6 Out of Centre)
No Sub Category
Total Gross floor area: 14000 sqm
Survey date: THURSDAY 03/10/13 Survey Type: MANUAL

LIST OF SITES relevant to selection parameters (Cont.)

17 TW-04-B-02 SECONDARY SCHOOL TYNE & WEAR
SALTWELL ROAD SOUTH
GATESHEAD
LOW FELL
Edge of Town
Residential Zone
Total Gross floor area: 15855 sqm
Survey date: FRIDAY 13/11/15 Survey Type: MANUAL

18 TW-04-B-03 CATHOLIC HIGH SCHOOL TYNE & WEAR
GRETNA ROAD
NEWCASTLE UPON TYNE

Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 22669 sqm
Survey date: THURSDAY 18/10/18 Survey Type: MANUAL

19 WL-04-B-01 SECONDARY SCHOOL WILTSHIRE
ST PAUL'S DRIVE
SWINDON
COVINGHAM
Edge of Town
No Sub Category
Total Gross floor area: 9925 sqm
Survey date: FRIDAY 23/09/16 Survey Type: MANUAL

20 WM-04-B-04 SECONDARY SCHOOL WEST MIDLANDS
SHANNON ROAD
BIRMINGHAM

Edge of Town
Residential Zone
Total Gross floor area: 8500 sqm
Survey date: MONDAY 09/11/15 Survey Type: MANUAL

21 WM-04-B-05 SECONDARY SCHOOL WEST MIDLANDS
JEREMY ROAD
WOLVERHAMPTON
GOLDTHORN PARK
Edge of Town
Residential Zone
Total Gross floor area: 12500 sqm
Survey date: MONDAY 14/11/16 Survey Type: MANUAL

22 WM-04-B-06 SECONDARY SCHOOL WEST MIDLANDS
PARK ROAD WEST
STOURBRIDGE
WOLLASTON
Edge of Town
Residential Zone
Total Gross floor area: 9420 sqm
Survey date: TUESDAY 21/11/17 Survey Type: MANUAL

23 WY-04-B-02 SECONDARY SCHOOL WEST YORKSHIRE
WHINGATE ROAD
LEEDS

Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 13965 sqm
Survey date: THURSDAY 19/09/13 Survey Type: MANUAL

24 WY-04-B-03 SECONDARY SCHOOL WEST YORKSHIRE
WOODHOUSE CLIFF
LEEDS

Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 10300 sqm
Survey date: MONDAY 19/10/15 Survey Type: MANUAL

This section provides a list of all survey sites and days in the selected set. For each individual survey site, it displays a unique site reference code and site address, the selected trip rate calculation parameter and its value, the day of the week and date of each survey, and whether the survey was a manual classified count or an ATC count.

TRIP RATE for Land Use 04 - EDUCATION/B - SECONDARY
TOTAL VEHICLES
Calculation factor: 100 sqm
BOLD print indicates peak (busiest) period

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate
00:00 - 01:00									
01:00 - 02:00									
02:00 - 03:00									
03:00 - 04:00									
04:00 - 05:00									
05:00 - 06:00									
06:00 - 07:00									
07:00 - 08:00	24	12211	0.421	24	12211	0.116	24	12211	0.537
08:00 - 09:00	24	12211	0.967	24	12211	0.702	24	12211	1.669
09:00 - 10:00	24	12211	0.125	24	12211	0.112	24	12211	0.237
10:00 - 11:00	24	12211	0.080	24	12211	0.071	24	12211	0.151
11:00 - 12:00	24	12211	0.082	24	12211	0.080	24	12211	0.162
12:00 - 13:00	24	12211	0.075	24	12211	0.091	24	12211	0.166
13:00 - 14:00	24	12211	0.087	24	12211	0.107	24	12211	0.194
14:00 - 15:00	24	12211	0.341	24	12211	0.253	24	12211	0.594
15:00 - 16:00	24	12211	0.379	24	12211	0.667	24	12211	1.046
16:00 - 17:00	24	12211	0.203	24	12211	0.449	24	12211	0.652
17:00 - 18:00	24	12211	0.152	24	12211	0.209	24	12211	0.361
18:00 - 19:00	23	12198	0.138	23	12198	0.136	23	12198	0.274
19:00 - 20:00									
20:00 - 21:00									
21:00 - 22:00									
22:00 - 23:00									
23:00 - 24:00									
Total Rates:			3.050			2.993			6.043

This section displays the trip rate results based on the selected set of surveys and the selected count type (shown just above the table). It is split by three main columns, representing arrivals trips, departures trips, and total trips (arrivals plus departures). Within each of these main columns are three sub-columns. These display the number of survey days where count data is included (per time period), the average value of the selected trip rate calculation parameter (per time period), and the trip rate result (per time period). Total trip rates (the sum of the column) are also displayed at the foot of the table.

*To obtain a trip rate, the average (mean) trip rate parameter value (TRP) is first calculated for all selected survey days that have count data available for the stated time period. The average (mean) number of arrivals, departures or totals (whichever applies) is also calculated (COUNT) for all selected survey days that have count data available for the stated time period. Then, the average count is divided by the average trip rate parameter value, and multiplied by the stated calculation factor (shown just above the table and abbreviated here as FACT). So, the method is: COUNT/TRP*FACT. Trip rates are then rounded to 3 decimal places.*

Parameter summary

Trip rate parameter range selected:	5700 - 22669 (units: sqm)
Survey date date range:	01/01/13 - 08/11/19
Number of weekdays (Monday-Friday):	24
Number of Saturdays:	0
Number of Sundays:	0
Surveys automatically removed from selection:	0
Surveys manually removed from selection:	0

This section displays a quick summary of some of the data filtering selections made by the TRICS® user. The trip rate calculation parameter range of all selected surveys is displayed first, followed by the range of minimum and maximum survey dates selected by the user. Then, the total number of selected weekdays and weekend days in the selected set of surveys are show. Finally, the number of survey days that have been manually removed from the selected set outside of the standard filtering procedure are displayed.

PBA Bank Street Ashford Licence No: 706709

Filtering Summary

Land Use	05/F	HEALTH/CARE HOME (ELDERLY RESIDENTIAL)
Selected Trip Rate Calculation Parameter Range	17-180 RESIDE	
Actual Trip Rate Calculation Parameter Range	17-70 RESIDE	
Date Range	Minimum: 01/01/13	Maximum: 02/05/19
Parking Spaces Range	All Surveys Included	
Days of the week selected	Monday	1
	Tuesday	3
	Wednesday	1
	Thursday	1
	Friday	1
Main Location Types selected	Suburban Area (PPS6 Out of Centre)	2
	Edge of Town	5
Population within 500m	All Surveys Included	
Population <1 Mile ranges selected	1,000 or Less	1
	5,001 to 10,000	1
	10,001 to 15,000	1
	15,001 to 20,000	1
	25,001 to 50,000	3
Population <5 Mile ranges selected	25,001 to 50,000	1
	125,001 to 250,000	2
	250,001 to 500,000	4
Car Ownership <5 Mile ranges selected	0.6 to 1.0	2
	1.1 to 1.5	5
PTAL Rating	No PTAL Present	7

Calculation Reference: AUDIT-706709-211011-1009

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 05 - HEALTH
Category : F - CARE HOME (ELDERLY RESIDENTIAL)
TOTAL VEHICLES

Selected regions and areas:

02	SOUTH EAST		
	HC	HAMPSHIRE	1 days
04	EAST ANGLIA		
	SF	SUFFOLK	1 days
05	EAST MIDLANDS		
	DS	DERBYSHIRE	1 days
07	YORKSHIRE & NORTH LINCOLNSHIRE		
	NY	NORTH YORKSHIRE	1 days
08	NORTH WEST		
	GM	GREATER MANCHESTER	1 days
	LC	LANCASHIRE	1 days
09	NORTH		
	TW	TYNE & WEAR	1 days

This section displays the number of survey days per TRICS® sub-region in the selected set

Primary Filtering selection:

This data displays the chosen trip rate parameter and its selected range. Only sites that fall within the parameter range are included in the trip rate calculation.

Parameter: Number of residents
Actual Range: 17 to 70 (units:)
Range Selected by User: 17 to 180 (units:)

Parking Spaces Range: All Surveys Included

Public Transport Provision:
Selection by: Include all surveys

Date Range: 01/01/13 to 02/05/19

This data displays the range of survey dates selected. Only surveys that were conducted within this date range are included in the trip rate calculation.

Selected survey days:

Monday	1 days
Tuesday	3 days
Wednesday	1 days
Thursday	1 days
Friday	1 days

This data displays the number of selected surveys by day of the week.

Selected survey types:

Manual count	7 days
Directional ATC Count	0 days

This data displays the number of manual classified surveys and the number of unclassified ATC surveys, the total adding up to the overall number of surveys in the selected set. Manual surveys are undertaken using staff, whilst ATC surveys are undertaking using machines.

Selected Locations:

Suburban Area (PPS6 Out of Centre)	2
Edge of Town	5

This data displays the number of surveys per main location category within the selected set. The main location categories consist of Free Standing, Edge of Town, Suburban Area, Neighbourhood Centre, Edge of Town Centre, Town Centre and Not Known.

Selected Location Sub Categories:

Residential Zone	6
No Sub Category	1

This data displays the number of surveys per location sub-category within the selected set. The location sub-categories consist of Commercial Zone, Industrial Zone, Development Zone, Residential Zone, Retail Zone, Built-Up Zone, Village, Out of Town, High Street and No Sub Category.

Secondary Filtering selection:

Use Class:

C2	7 days

This data displays the number of surveys per Use Class classification within the selected set. The Use Classes Order 2005 has been used for this purpose, which can be found within the Library module of TRICS®.

Population within 500m Range:

All Surveys Included

Population within 1 mile:

1,000 or Less	1 days
5,001 to 10,000	1 days
10,001 to 15,000	1 days
15,001 to 20,000	1 days
25,001 to 50,000	3 days

This data displays the number of selected surveys within stated 1-mile radii of population.

Population within 5 miles:

25,001 to 50,000	1 days
125,001 to 250,000	2 days
250,001 to 500,000	4 days

This data displays the number of selected surveys within stated 5-mile radii of population.

Car ownership within 5 miles:

0.6 to 1.0	2 days
1.1 to 1.5	5 days

This data displays the number of selected surveys within stated ranges of average cars owned per residential dwelling, within a radius of 5-miles of selected survey sites.

Travel Plan:

No	7 days

This data displays the number of surveys within the selected set that were undertaken at sites with Travel Plans in place, and the number of surveys that were undertaken at sites without Travel Plans.

PTAL Rating:

No PTAL Present	7 days

This data displays the number of selected surveys with PTAL Ratings.

LIST OF SITES relevant to selection parameters

1 DS-05-F-01 NURSING HOME DERBYSHIRE
29 VILLAGE STREET
DERBY

Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Number of residents: 70
Survey date: TUESDAY *21/10/14* *Survey Type: MANUAL*

2 GM-05-F-03 NURSING HOME GREATER MANCHESTER
HALIFAX ROAD
ROCHDALE

Edge of Town
Residential Zone
Total Number of residents: 30
Survey date: WEDNESDAY *29/05/13* *Survey Type: MANUAL*

3 HC-05-F-01 CARE HOME HAMPSHIRE
BOTLEY ROAD
SOUTHAMPTON

Edge of Town
No Sub Category
Total Number of residents: 42
Survey date: TUESDAY *24/11/15* *Survey Type: MANUAL*

4 LC-05-F-02 NURSING HOME LANCASHIRE
LYTHAM ROAD
BLACKPOOL
SQUIRES GATE
Edge of Town
Residential Zone
Total Number of residents: 31
Survey date: TUESDAY *27/09/16* *Survey Type: MANUAL*

5 NY-05-F-05 NURSING HOME NORTH YORKSHIRE
SEAGRIM CRESCENT
RICHMOND

Edge of Town
Residential Zone
Total Number of residents: 37
Survey date: MONDAY *04/03/19* *Survey Type: MANUAL*

6 SF-05-F-01 CARE HOME SUFFOLK
COLCHESTER ROAD
IPSWICH

Edge of Town
Residential Zone
Total Number of residents: 17
Survey date: FRIDAY *18/09/15* *Survey Type: MANUAL*

7 TW-05-F-03 NURSING HOME TYNE & WEAR
MOORE STREET
GATESHEAD
FELLING SHORE
Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Number of residents: 52
Survey date: THURSDAY *02/05/19* *Survey Type: MANUAL*

This section provides a list of all survey sites and days in the selected set. For each individual survey site, it displays a unique site reference code and site address, the selected trip rate calculation parameter and its value, the day of the week and date of each survey, and whether the survey was a manual classified count or an ATC count.

TRIP RATE for Land Use 05 - HEALTH/F - CARE HOME (ELDERLY RESIDENTIAL)
TOTAL VEHICLES
Calculation factor: 1 RESIDE
BOLD print indicates peak (busiest) period

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	No. Days	Ave. RESIDE	Trip Rate	No. Days	Ave. RESIDE	Trip Rate	No. Days	Ave. RESIDE	Trip Rate
00:00 - 01:00									
01:00 - 02:00									
02:00 - 03:00									
03:00 - 04:00									
04:00 - 05:00									
05:00 - 06:00									
06:00 - 07:00									
07:00 - 08:00	7	40	0.082	7	40	0.032	7	40	0.114
08:00 - 09:00	7	40	0.072	7	40	0.050	7	40	0.122
09:00 - 10:00	7	40	0.068	7	40	0.029	7	40	0.097
10:00 - 11:00	7	40	0.072	7	40	0.050	7	40	0.122
11:00 - 12:00	7	40	0.057	7	40	0.079	7	40	0.136
12:00 - 13:00	7	40	0.068	7	40	0.072	7	40	0.140
13:00 - 14:00	7	40	0.093	7	40	0.054	7	40	0.147
14:00 - 15:00	7	40	0.100	7	40	0.140	7	40	0.240
15:00 - 16:00	7	40	0.104	7	40	0.158	7	40	0.262
16:00 - 17:00	7	40	0.057	7	40	0.108	7	40	0.165
17:00 - 18:00	7	40	0.036	7	40	0.050	7	40	0.086
18:00 - 19:00	7	40	0.032	7	40	0.029	7	40	0.061
19:00 - 20:00	7	40	0.054	7	40	0.039	7	40	0.093
20:00 - 21:00	7	40	0.050	7	40	0.068	7	40	0.118
21:00 - 22:00									
22:00 - 23:00									
23:00 - 24:00									
Total Rates:			0.945			0.958			1.903

This section displays the trip rate results based on the selected set of surveys and the selected count type (shown just above the table). It is split by three main columns, representing arrivals trips, departures trips, and total trips (arrivals plus departures). Within each of these main columns are three sub-columns. These display the number of survey days where count data is included (per time period), the average value of the selected trip rate calculation parameter (per time period), and the trip rate result (per time period). Total trip rates (the sum of the column) are also displayed at the foot of the table.

*To obtain a trip rate, the average (mean) trip rate parameter value (TRP) is first calculated for all selected survey days that have count data available for the stated time period. The average (mean) number of arrivals, departures or totals (whichever applies) is also calculated (COUNT) for all selected survey days that have count data available for the stated time period. Then, the average count is divided by the average trip rate parameter value, and multiplied by the stated calculation factor (shown just above the table and abbreviated here as FACT). So, the method is: COUNT/TRP*FACT. Trip rates are then rounded to 3 decimal places.*

Parameter summary

Trip rate parameter range selected:	17 - 70 (units:)
Survey date date range:	01/01/13 - 02/05/19
Number of weekdays (Monday-Friday):	7
Number of Saturdays:	0
Number of Sundays:	0
Surveys automatically removed from selection:	0
Surveys manually removed from selection:	0

This section displays a quick summary of some of the data filtering selections made by the TRICS® user. The trip rate calculation parameter range of all selected surveys is displayed first, followed by the range of minimum and maximum survey dates selected by the user. Then, the total number of selected weekdays and weekend days in the selected set of surveys are show. Finally, the number of survey days that have been manually removed from the selected set outside of the standard filtering procedure are displayed.

Filtering Summary

Land Use	05/A	HEALTH/GENERAL HOSPITAL - WITH CASUALTY
Selected Trip Rate Calculation Parameter Range	12335-246876 sqm GFA	
Actual Trip Rate Calculation Parameter Range	13700-246876 sqm GFA	
Date Range	Minimum: 01/01/13	Maximum: 07/11/19
Parking Spaces Range	All Surveys Included	
Days of the week selected	Monday	1
	Tuesday	4
	Wednesday	1
	Thursday	3
Main Location Types selected	Suburban Area (PPS6 Out of Centre)	2
	Edge of Town	7
Population within 500m	All Surveys Included	
Population <1 Mile ranges selected	5,001 to 10,000	2
	10,001 to 15,000	2
	15,001 to 20,000	2
	20,001 to 25,000	1
	25,001 to 50,000	2
Population <5 Mile ranges selected	100,001 to 125,000	1
	125,001 to 250,000	7
	250,001 to 500,000	1
Car Ownership <5 Mile ranges selected	0.6 to 1.0	3
	1.1 to 1.5	6
PTAL Rating	No PTAL Present	9

Calculation Reference: AUDIT-706709-210928-0900

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 05 - HEALTH
Category : A - GENERAL HOSPITAL - WITH CASUALTY
TOTAL VEHICLES

Selected regions and areas:

02	SOUTH EAST		
	ES	EAST SUSSEX	2 days
	SC	SURREY	1 days
	SO	SLOUGH	1 days
03	SOUTH WEST		
	DC	DORSET	1 days
	WL	WILTSHIRE	1 days
04	EAST ANGLIA		
	CA	CAMBRIDGESHIRE	1 days
	NF	NORFOLK	1 days
08	NORTH WEST		
	GM	GREATER MANCHESTER	1 days

This section displays the number of survey days per TRICS® sub-region in the selected set

Primary Filtering selection:

This data displays the chosen trip rate parameter and its selected range. Only sites that fall within the parameter range are included in the trip rate calculation.

Parameter: Gross floor area
Actual Range: 13700 to 246876 (units: sqm)
Range Selected by User: 12335 to 246876 (units: sqm)

Parking Spaces Range: All Surveys Included

Public Transport Provision:
Selection by: Include all surveys

Date Range: 01/01/13 to 07/11/19

This data displays the range of survey dates selected. Only surveys that were conducted within this date range are included in the trip rate calculation.

Selected survey days:

Monday	1 days
Tuesday	4 days
Wednesday	1 days
Thursday	3 days

This data displays the number of selected surveys by day of the week.

Selected survey types:

Manual count	9 days
Directional ATC Count	0 days

This data displays the number of manual classified surveys and the number of unclassified ATC surveys, the total adding up to the overall number of surveys in the selected set. Manual surveys are undertaken using staff, whilst ATC surveys are undertaking using machines.

Selected Locations:

Suburban Area (PPS6 Out of Centre)	2
Edge of Town	7

This data displays the number of surveys per main location category within the selected set. The main location categories consist of Free Standing, Edge of Town, Suburban Area, Neighbourhood Centre, Edge of Town Centre, Town Centre and Not Known.

Selected Location Sub Categories:

Residential Zone	4
Out of Town	2
No Sub Category	3

This data displays the number of surveys per location sub-category within the selected set. The location sub-categories consist of Commercial Zone, Industrial Zone, Development Zone, Residential Zone, Retail Zone, Built-Up Zone, Village, Out of Town, High Street and No Sub Category.

Secondary Filtering selection:

Use Class:

C2	9 days

This data displays the number of surveys per Use Class classification within the selected set. The Use Classes Order 2005 has been used for this purpose, which can be found within the Library module of TRICS®.

Population within 500m Range:

All Surveys Included

Population within 1 mile:

5,001 to 10,000	2 days
10,001 to 15,000	2 days
15,001 to 20,000	2 days
20,001 to 25,000	1 days
25,001 to 50,000	2 days

This data displays the number of selected surveys within stated 1-mile radii of population.

Population within 5 miles:

100,001 to 125,000	1 days
125,001 to 250,000	7 days
250,001 to 500,000	1 days

This data displays the number of selected surveys within stated 5-mile radii of population.

Car ownership within 5 miles:

0.6 to 1.0	3 days
1.1 to 1.5	6 days

This data displays the number of selected surveys within stated ranges of average cars owned per residential dwelling, within a radius of 5-miles of selected survey sites.

Travel Plan:

Yes	6 days
No	3 days

This data displays the number of surveys within the selected set that were undertaken at sites with Travel Plans in place, and the number of surveys that were undertaken at sites without Travel Plans.

PTAL Rating:

No PTAL Present	9 days

This data displays the number of selected surveys with PTAL Ratings.

LIST OF SITES relevant to selection parameters

1 CA-05-A-01 GENERAL HOSPITAL CAMBRIDGESHIRE
HILLS ROAD
CAMBRIDGE

Edge of Town
Residential Zone
Total Gross floor area: 246876 sqm
Survey date: THURSDAY *04/12/14* *Survey Type: MANUAL*

2 DC-05-A-07 GENERAL HOSPITAL DORSET
CASTLE LANE EAST
BOURNEMOUTH

Edge of Town
No Sub Category
Total Gross floor area: 105900 sqm
Survey date: TUESDAY *25/03/14* *Survey Type: MANUAL*

3 ES-05-A-04 GENERAL HOSPITAL EAST SUSSEX
KING'S DRIVE
EASTBOURNE

Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 65000 sqm
Survey date: TUESDAY *06/10/15* *Survey Type: MANUAL*

4 ES-05-A-05 HOSPITAL EAST SUSSEX
THE RIDGE
HASTINGS

Edge of Town
Residential Zone
Total Gross floor area: 41500 sqm
Survey date: THURSDAY *08/10/15* *Survey Type: MANUAL*

5 GM-05-A-06 GENERAL HOSPITAL GREATER MANCHESTER
POPLAR GROVE
STOCKPORT
HAZEL GROVE
Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 79220 sqm
Survey date: TUESDAY *18/11/14* *Survey Type: MANUAL*

6 NF-05-A-04 GENERAL HOSPITAL NORFOLK
COLNEY LANE
NORWICH
COLNEY
Edge of Town
Out of Town
Total Gross floor area: 13700 sqm
Survey date: THURSDAY *07/11/19* *Survey Type: MANUAL*

7 SC-05-A-07 HOSPITAL SURREY
CANADA AVENUE
REDHILL

Edge of Town
No Sub Category
Total Gross floor area: 53146 sqm
Survey date: MONDAY *06/10/14* *Survey Type: MANUAL*

LIST OF SITES relevant to selection parameters (Cont.)

8 SO-05-A-01 HOSPITAL SLOUGH
WEXHAM STREET
SLOUGH
WEXHAM
Edge of Town
No Sub Category
Total Gross floor area: 82226 sqm
Survey date: WEDNESDAY *22/04/15* *Survey Type: MANUAL*

9 WL-05-A-01 HOSPITAL WILTSHIRE
MARLBOROUGH ROAD
SWINDON

Edge of Town
Out of Town
Total Gross floor area: 67000 sqm
Survey date: TUESDAY *20/09/16* *Survey Type: MANUAL*

This section provides a list of all survey sites and days in the selected set. For each individual survey site, it displays a unique site reference code and site address, the selected trip rate calculation parameter and its value, the day of the week and date of each survey, and whether the survey was a manual classified count or an ATC count.

TRIP RATE for Land Use 05 - HEALTH/A - GENERAL HOSPITAL - WITH CASUALTY
TOTAL VEHICLES
Calculation factor: 100 sqm
BOLD print indicates peak (busiest) period

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate
00:00 - 01:00									
01:00 - 02:00									
02:00 - 03:00									
03:00 - 04:00									
04:00 - 05:00									
05:00 - 06:00									
06:00 - 07:00	3	53215	0.318	3	53215	0.095	3	53215	0.413
07:00 - 08:00	9	83841	1.031	9	83841	0.373	9	83841	1.404
08:00 - 09:00	9	83841	1.202	9	83841	0.392	9	83841	1.594
09:00 - 10:00	9	83841	0.883	9	83841	0.439	9	83841	1.322
10:00 - 11:00	9	83841	0.636	9	83841	0.497	9	83841	1.133
11:00 - 12:00	9	83841	0.527	9	83841	0.545	9	83841	1.072
12:00 - 13:00	9	83841	0.483	9	83841	0.589	9	83841	1.072
13:00 - 14:00	9	83841	0.662	9	83841	0.570	9	83841	1.232
14:00 - 15:00	9	83841	0.621	9	83841	0.665	9	83841	1.286
15:00 - 16:00	9	83841	0.543	9	83841	0.799	9	83841	1.342
16:00 - 17:00	9	83841	0.440	9	83841	1.051	9	83841	1.491
17:00 - 18:00	9	83841	0.388	9	83841	0.972	9	83841	1.360
18:00 - 19:00	9	83841	0.475	9	83841	0.618	9	83841	1.093
19:00 - 20:00	8	63462	0.377	8	63462	0.620	8	63462	0.997
20:00 - 21:00	6	66865	0.248	6	66865	0.571	6	66865	0.819
21:00 - 22:00	3	75349	0.086	3	75349	0.160	3	75349	0.246
22:00 - 23:00									
23:00 - 24:00									
Total Rates:			8.920			8.956			17.876

This section displays the trip rate results based on the selected set of surveys and the selected count type (shown just above the table). It is split by three main columns, representing arrivals trips, departures trips, and total trips (arrivals plus departures). Within each of these main columns are three sub-columns. These display the number of survey days where count data is included (per time period), the average value of the selected trip rate calculation parameter (per time period), and the trip rate result (per time period). Total trip rates (the sum of the column) are also displayed at the foot of the table.

*To obtain a trip rate, the average (mean) trip rate parameter value (TRP) is first calculated for all selected survey days that have count data available for the stated time period. The average (mean) number of arrivals, departures or totals (whichever applies) is also calculated (COUNT) for all selected survey days that have count data available for the stated time period. Then, the average count is divided by the average trip rate parameter value, and multiplied by the stated calculation factor (shown just above the table and abbreviated here as FACT). So, the method is: COUNT/TRP*FACT. Trip rates are then rounded to 3 decimal places.*

Parameter summary

Trip rate parameter range selected:	13700 - 246876 (units: sqm)
Survey date date range:	01/01/13 - 07/11/19
Number of weekdays (Monday-Friday):	9
Number of Saturdays:	0
Number of Sundays:	0
Surveys automatically removed from selection:	0
Surveys manually removed from selection:	0

This section displays a quick summary of some of the data filtering selections made by the TRICS® user. The trip rate calculation parameter range of all selected surveys is displayed first, followed by the range of minimum and maximum survey dates selected by the user. Then, the total number of selected weekdays and weekend days in the selected set of surveys are show. Finally, the number of survey days that have been manually removed from the selected set outside of the standard filtering procedure are displayed.

PBA Bank Street Ashford Licence No: 706709

Filtering Summary

Land Use	05/E	HEALTH/CLINICS
Selected Trip Rate Calculation Parameter Range	75-1790 sqm GFA	
Actual Trip Rate Calculation Parameter Range	75-1790 sqm GFA	
Date Range	Minimum: 01/01/00	Maximum: 26/11/19
Parking Spaces Range	All Surveys Included	
Days of the week selected	Monday	1
	Tuesday	1
	Wednesday	2
	Thursday	1
	Friday	1
Main Location Types selected	Suburban Area (PPS6 Out of Centre)	2
	Edge of Town	4
Population within 500m	All Surveys Included	
Population <1 Mile ranges selected	1,001 to 5,000	1
	5,001 to 10,000	1
	10,001 to 15,000	3
	15,001 to 20,000	1
Population <5 Mile ranges selected	5,001 to 25,000	1
	25,001 to 50,000	2
	50,001 to 75,000	2
	75,001 to 100,000	1
Car Ownership <5 Mile ranges selected	0.6 to 1.0	1
	1.1 to 1.5	5
PTAL Rating	No PTAL Present	6

Calculation Reference: AUDIT-706709-211011-1045

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 05 - HEALTH
Category : E - CLINICS
TOTAL VEHICLES

Selected regions and areas:

03	SOUTH WEST		
	CW	CORNWALL	1 days
	DC	DORSET	1 days
	WL	WILTSHIRE	1 days
04	EAST ANGLIA		
	CA	CAMBRIDGESHIRE	1 days
	NF	NORFOLK	1 days
06	WEST MIDLANDS		
	WK	WARWICKSHIRE	1 days

This section displays the number of survey days per TRICS® sub-region in the selected set

Primary Filtering selection:

This data displays the chosen trip rate parameter and its selected range. Only sites that fall within the parameter range are included in the trip rate calculation.

Parameter: Gross floor area
Actual Range: 75 to 1790 (units: sqm)
Range Selected by User: 75 to 1790 (units: sqm)

Parking Spaces Range: All Surveys Included

Public Transport Provision:
Selection by: Include all surveys

Date Range: 01/01/00 to 26/11/19

This data displays the range of survey dates selected. Only surveys that were conducted within this date range are included in the trip rate calculation.

Selected survey days:

Monday	1 days
Tuesday	1 days
Wednesday	2 days
Thursday	1 days
Friday	1 days

This data displays the number of selected surveys by day of the week.

Selected survey types:

Manual count	6 days
Directional ATC Count	0 days

This data displays the number of manual classified surveys and the number of unclassified ATC surveys, the total adding up to the overall number of surveys in the selected set. Manual surveys are undertaken using staff, whilst ATC surveys are undertaking using machines.

Selected Locations:

Suburban Area (PPS6 Out of Centre)	2
Edge of Town	4

This data displays the number of surveys per main location category within the selected set. The main location categories consist of Free Standing, Edge of Town, Suburban Area, Neighbourhood Centre, Edge of Town Centre, Town Centre and Not Known.

Selected Location Sub Categories:

Residential Zone	4
No Sub Category	2

This data displays the number of surveys per location sub-category within the selected set. The location sub-categories consist of Commercial Zone, Industrial Zone, Development Zone, Residential Zone, Retail Zone, Built-Up Zone, Village, Out of Town, High Street and No Sub Category.

Secondary Filtering selection:

Use Class:

E(e)	6 days

This data displays the number of surveys per Use Class classification within the selected set. The Use Classes Order 2005 has been used for this purpose, which can be found within the Library module of TRICS®.

Population within 500m Range:

All Surveys Included

Population within 1 mile:

1,001 to 5,000	1 days
5,001 to 10,000	1 days
10,001 to 15,000	3 days
15,001 to 20,000	1 days

This data displays the number of selected surveys within stated 1-mile radii of population.

Population within 5 miles:

5,001 to 25,000	1 days
25,001 to 50,000	2 days
50,001 to 75,000	2 days
75,001 to 100,000	1 days

This data displays the number of selected surveys within stated 5-mile radii of population.

Car ownership within 5 miles:

0.6 to 1.0	1 days
1.1 to 1.5	5 days

This data displays the number of selected surveys within stated ranges of average cars owned per residential dwelling, within a radius of 5-miles of selected survey sites.

Travel Plan:

No	6 days

This data displays the number of surveys within the selected set that were undertaken at sites with Travel Plans in place, and the number of surveys that were undertaken at sites without Travel Plans.

PTAL Rating:

No PTAL Present	6 days

This data displays the number of selected surveys with PTAL Ratings.

LIST OF SITES relevant to selection parameters

1 CA-05-E-01 CLINIC CAMBRIDGESHIRE
ALMOND ROAD
ST NEOTS

Edge of Town
No Sub Category
Total Gross floor area: 650 sqm
Survey date: THURSDAY *06/03/03* *Survey Type: MANUAL*

2 CW-05-E-01 CHIROPRACTIC CLINIC CORNWALL
FALMOUTH ROAD
TRURO

Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 75 sqm
Survey date: MONDAY *10/10/11* *Survey Type: MANUAL*

3 DC-05-E-01 MEDICAL CENTRE DORSET
SALISBURY ROAD
SHAFTESBURY

Suburban Area (PPS6 Out of Centre)
No Sub Category
Total Gross floor area: 1790 sqm
Survey date: TUESDAY *02/09/03* *Survey Type: MANUAL*

4 NF-05-E-01 FOOT CLINIC NORFOLK
27 BERESFORD ROAD
GREAT YARMOUTH

Edge of Town
Residential Zone
Total Gross floor area: 295 sqm
Survey date: WEDNESDAY *09/05/18* *Survey Type: MANUAL*

5 WK-05-E-01 CHIROPRACTIC CLINIC WARWICKSHIRE
ALCESTER ROAD
STRATFORD-UPON-AVON

Edge of Town
Residential Zone
Total Gross floor area: 310 sqm
Survey date: FRIDAY *29/06/18* *Survey Type: MANUAL*

6 WL-05-E-01 PHYSIOTHERAPY CENTRE WILTSHIRE
DEVIZES RD
SALISBURY
BEMERTON
Edge of Town
Residential Zone
Total Gross floor area: 250 sqm
Survey date: WEDNESDAY *19/09/18* *Survey Type: MANUAL*

This section provides a list of all survey sites and days in the selected set. For each individual survey site, it displays a unique site reference code and site address, the selected trip rate calculation parameter and its value, the day of the week and date of each survey, and whether the survey was a manual classified count or an ATC count.

TRIP RATE for Land Use 05 - HEALTH/E - CLINICS
TOTAL VEHICLES
Calculation factor: 100 sqm
BOLD print indicates peak (busiest) period

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate
00:00 - 01:00									
01:00 - 02:00									
02:00 - 03:00									
03:00 - 04:00									
04:00 - 05:00									
05:00 - 06:00									
06:00 - 07:00									
07:00 - 08:00	4	746	0.603	4	746	0.134	4	746	0.737
08:00 - 09:00	6	562	2.433	6	562	1.276	6	562	3.709
09:00 - 10:00	6	562	4.955	6	562	3.353	6	562	8.308
10:00 - 11:00	6	562	4.095	6	562	4.273	6	562	8.368
11:00 - 12:00	6	562	3.116	6	562	3.709	6	562	6.825
12:00 - 13:00	6	562	2.077	6	562	2.641	6	562	4.718
13:00 - 14:00	6	562	2.018	6	562	1.929	6	562	3.947
14:00 - 15:00	5	659	2.762	5	659	2.610	5	659	5.372
15:00 - 16:00	5	659	2.246	5	659	2.367	5	659	4.613
16:00 - 17:00	5	659	2.489	5	659	2.671	5	659	5.160
17:00 - 18:00	5	659	1.305	5	659	2.246	5	659	3.551
18:00 - 19:00	5	659	1.093	5	659	1.548	5	659	2.641
19:00 - 20:00	2	1050	0.143	2	1050	0.238	2	1050	0.381
20:00 - 21:00									
21:00 - 22:00									
22:00 - 23:00									
23:00 - 24:00									
Total Rates:			29.335			28.995			58.330

This section displays the trip rate results based on the selected set of surveys and the selected count type (shown just above the table). It is split by three main columns, representing arrivals trips, departures trips, and total trips (arrivals plus departures). Within each of these main columns are three sub-columns. These display the number of survey days where count data is included (per time period), the average value of the selected trip rate calculation parameter (per time period), and the trip rate result (per time period). Total trip rates (the sum of the column) are also displayed at the foot of the table.

*To obtain a trip rate, the average (mean) trip rate parameter value (TRP) is first calculated for all selected survey days that have count data available for the stated time period. The average (mean) number of arrivals, departures or totals (whichever applies) is also calculated (COUNT) for all selected survey days that have count data available for the stated time period. Then, the average count is divided by the average trip rate parameter value, and multiplied by the stated calculation factor (shown just above the table and abbreviated here as FACT). So, the method is: COUNT/TRP*FACT. Trip rates are then rounded to 3 decimal places.*

Parameter summary

Trip rate parameter range selected:	75 - 1790 (units: sqm)
Survey date date range:	01/01/00 - 26/11/19
Number of weekdays (Monday-Friday):	6
Number of Saturdays:	0
Number of Sundays:	0
Surveys automatically removed from selection:	0
Surveys manually removed from selection:	0

This section displays a quick summary of some of the data filtering selections made by the TRICS® user. The trip rate calculation parameter range of all selected surveys is displayed first, followed by the range of minimum and maximum survey dates selected by the user. Then, the total number of selected weekdays and weekend days in the selected set of surveys are show. Finally, the number of survey days that have been manually removed from the selected set outside of the standard filtering procedure are displayed.

Filtering Summary

Land Use	15/B	VEHICLE SERVICES/MOTORIST CENTRE (FAST FIT)
Selected Trip Rate Calculation Parameter Range	150-1878 sqm GFA	
Actual Trip Rate Calculation Parameter Range	150-1878 sqm GFA	
Date Range	Minimum: 01/01/00	Maximum: 14/11/15
Parking Spaces Range	All Surveys Included	
Days of the week selected	Monday	4
	Tuesday	2
	Wednesday	6
	Thursday	2
	Friday	3
Main Location Types selected	Suburban Area (PPS6 Out of Centre)	15
	Edge of Town	2
Population within 500m	All Surveys Included	
Population <1 Mile ranges selected	5,001 to 10,000	6
	15,001 to 20,000	2
	20,001 to 25,000	3
	25,001 to 50,000	5
	50,001 to 100,000	1
Population <5 Mile ranges selected	5,001 to 25,000	2
	25,001 to 50,000	1
	50,001 to 75,000	1
	125,001 to 250,000	7
	250,001 to 500,000	4
	500,001 or More	2
Car Ownership <5 Mile ranges selected	0.6 to 1.0	11
	1.1 to 1.5	6
PTAL Rating	No PTAL Present	17

Calculation Reference: AUDIT-706709-210928-0902

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 15 - VEHICLE SERVICES
Category : B - MOTORIST CENTRE (FAST FIT)
TOTAL VEHICLES

Selected regions and areas:

03	SOUTH WEST		
	DC	DORSET	1 days
	DV	DEVON	2 days
05	EAST MIDLANDS		
	DS	DERBYSHIRE	2 days
06	WEST MIDLANDS		
	WM	WEST MIDLANDS	2 days
07	YORKSHIRE & NORTH LINCOLNSHIRE		
	NY	NORTH YORKSHIRE	4 days
08	NORTH WEST		
	GM	GREATER MANCHESTER	3 days
	LC	LANCASHIRE	1 days
09	NORTH		
	NB	NORTHUMBERLAND	1 days
	TW	TYNE & WEAR	1 days

This section displays the number of survey days per TRICS® sub-region in the selected set

Primary Filtering selection:

This data displays the chosen trip rate parameter and its selected range. Only sites that fall within the parameter range are included in the trip rate calculation.

Parameter: Gross floor area
Actual Range: 150 to 1878 (units: sqm)
Range Selected by User: 150 to 1878 (units: sqm)

Parking Spaces Range: All Surveys Included

Public Transport Provision:
Selection by: Include all surveys

Date Range: 01/01/00 to 14/11/15

This data displays the range of survey dates selected. Only surveys that were conducted within this date range are included in the trip rate calculation.

Selected survey days:

Monday	4 days
Tuesday	2 days
Wednesday	6 days
Thursday	2 days
Friday	3 days

This data displays the number of selected surveys by day of the week.

Selected survey types:

Manual count	17 days
Directional ATC Count	0 days

This data displays the number of manual classified surveys and the number of unclassified ATC surveys, the total adding up to the overall number of surveys in the selected set. Manual surveys are undertaken using staff, whilst ATC surveys are undertaking using machines.

Selected Locations:

Suburban Area (PPS6 Out of Centre)	15
Edge of Town	2

This data displays the number of surveys per main location category within the selected set. The main location categories consist of Free Standing, Edge of Town, Suburban Area, Neighbourhood Centre, Edge of Town Centre, Town Centre and Not Known.

Selected Location Sub Categories:

Industrial Zone	6
Commercial Zone	1
Residential Zone	3
Built-Up Zone	3
No Sub Category	4

This data displays the number of surveys per location sub-category within the selected set. The location sub-categories consist of Commercial Zone, Industrial Zone, Development Zone, Residential Zone, Retail Zone, Built-Up Zone, Village, Out of Town, High Street and No Sub Category.

Secondary Filtering selection:

Use Class:

Not Known	17 days

This data displays the number of surveys per Use Class classification within the selected set. The Use Classes Order 2005 has been used for this purpose, which can be found within the Library module of TRICS®.

Population within 500m Range:

All Surveys Included

Population within 1 mile:

5,001 to 10,000	6 days
15,001 to 20,000	2 days
20,001 to 25,000	3 days
25,001 to 50,000	5 days
50,001 to 100,000	1 days

This data displays the number of selected surveys within stated 1-mile radii of population.

Population within 5 miles:

5,001 to 25,000	2 days
25,001 to 50,000	1 days
50,001 to 75,000	1 days
125,001 to 250,000	7 days
250,001 to 500,000	4 days
500,001 or More	2 days

This data displays the number of selected surveys within stated 5-mile radii of population.

Car ownership within 5 miles:

0.6 to 1.0	11 days
1.1 to 1.5	6 days

This data displays the number of selected surveys within stated ranges of average cars owned per residential dwelling, within a radius of 5-miles of selected survey sites.

Travel Plan:

Not Known	2 days
No	15 days

This data displays the number of surveys within the selected set that were undertaken at sites with Travel Plans in place, and the number of surveys that were undertaken at sites without Travel Plans.

PTAL Rating:

No PTAL Present	17 days

This data displays the number of selected surveys with PTAL Ratings.

LIST OF SITES relevant to selection parameters

1 DC-15-B-02 ATS EUROMASTER DORSET
FERNSIDE ROAD
POOLE

Suburban Area (PPS6 Out of Centre)
No Sub Category
Total Gross floor area: 895 sqm
Survey date: WEDNESDAY *16/07/08* *Survey Type: MANUAL*

2 DS-15-B-01 KWIK FIT DERBYSHIRE
OSMASTON ROAD
DERBY

Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 525 sqm
Survey date: TUESDAY *21/10/14* *Survey Type: MANUAL*

3 DS-15-B-02 NATIONAL TYRES & AUTOCARE DERBYSHIRE
NOTTINGHAM ROAD
DERBY

Suburban Area (PPS6 Out of Centre)
Industrial Zone
Total Gross floor area: 320 sqm
Survey date: FRIDAY *26/06/15* *Survey Type: MANUAL*

4 DV-15-B-01 KWIK FIT DEVON
ALEXANDRA ROAD
PLYMOUTH
MUTLEY
Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 900 sqm
Survey date: WEDNESDAY *07/10/09* *Survey Type: MANUAL*

5 DV-15-B-02 KWIK FIT DEVON
MARSH BARTON ROAD
EXETER
MARSH BARTON
Suburban Area (PPS6 Out of Centre)
Industrial Zone
Total Gross floor area: 1878 sqm
Survey date: THURSDAY *28/11/13* *Survey Type: MANUAL*

6 GM-15-B-01 KWIK FIT GREATER MANCHESTER
CROSS STREET
SALE

Suburban Area (PPS6 Out of Centre)
Built-Up Zone
Total Gross floor area: 775 sqm
Survey date: MONDAY *24/05/04* *Survey Type: MANUAL*

7 GM-15-B-02 HI-Q GREATER MANCHESTER
ASHTON OLD ROAD
MANCHESTER
OPENSHAW
Suburban Area (PPS6 Out of Centre)
Industrial Zone
Total Gross floor area: 710 sqm
Survey date: FRIDAY *08/10/04* *Survey Type: MANUAL*

8 GM-15-B-03 ATS EUROMASTER GREATER MANCHESTER
YORKSHIRE STREET
ROCHDALE

Suburban Area (PPS6 Out of Centre)
No Sub Category
Total Gross floor area: 600 sqm
Survey date: WEDNESDAY *21/10/15* *Survey Type: MANUAL*

9 LC-15-B-01 ATS EUROMASTER LANCASHIRE
PENDLE STREET
BLACKBURN

Suburban Area (PPS6 Out of Centre)
No Sub Category
Total Gross floor area: 630 sqm
Survey date: WEDNESDAY *23/06/04* *Survey Type: MANUAL*

LIST OF SITES relevant to selection parameters (Cont.)

10 NB-15-B-01 TYRES AND BATTERY NORTHUMBERLAND
STATION ROAD
NEAR NEWCASTLE
LOWER PRUDHOE
Edge of Town
Industrial Zone
Total Gross floor area: 150 sqm
Survey date: MONDAY *23/05/05* *Survey Type: MANUAL*

11 NY-15-B-01 ATS EUROMASTER NORTH YORKSHIRE
LAYERTHORPE ROAD
YORK
LAYERTHORPE
Suburban Area (PPS6 Out of Centre)
Commercial Zone
Total Gross floor area: 1042 sqm
Survey date: THURSDAY *21/04/05* *Survey Type: MANUAL*

12 NY-15-B-02 ATS EUROMASTER NORTH YORKSHIRE
STATION ROAD
TADCASTER

Suburban Area (PPS6 Out of Centre)
Industrial Zone
Total Gross floor area: 436 sqm
Survey date: TUESDAY *10/05/05* *Survey Type: MANUAL*

13 NY-15-B-03 HI-Q NORTH YORKSHIRE
CHARLTON STREET
YORK

Edge of Town
Industrial Zone
Total Gross floor area: 620 sqm
Survey date: MONDAY *09/05/05* *Survey Type: MANUAL*

14 NY-15-B-04 KWIK FIT NORTH YORKSHIRE
LONG STREET
THIRSK

Suburban Area (PPS6 Out of Centre)
Residential Zone
Total Gross floor area: 363 sqm
Survey date: MONDAY *17/10/11* *Survey Type: MANUAL*

15 TW-15-B-02 KWIK FIT TYNE & WEAR
SUNDERLAND ROAD
GATESHEAD

Suburban Area (PPS6 Out of Centre)
No Sub Category
Total Gross floor area: 377 sqm
Survey date: WEDNESDAY *22/06/05* *Survey Type: MANUAL*

16 WM-15-B-02 WHEEL WORKS WEST MIDLANDS
MOSELEY ROAD
BIRMINGHAM
BALSALL HEATH
Suburban Area (PPS6 Out of Centre)
Built-Up Zone
Total Gross floor area: 550 sqm
Survey date: FRIDAY *23/11/01* *Survey Type: MANUAL*

17 WM-15-B-03 KWIK FIT WEST MIDLANDS
MOSELEY ROAD
BIRMINGHAM
BALSALL HEATH
Suburban Area (PPS6 Out of Centre)
Built-Up Zone
Total Gross floor area: 600 sqm
Survey date: WEDNESDAY *08/02/06* *Survey Type: MANUAL*

This section provides a list of all survey sites and days in the selected set. For each individual survey site, it displays a unique site reference code and site address, the selected trip rate calculation parameter and its value, the day of the week and date of each survey, and whether the survey was a manual classified count or an ATC count.

TRIP RATE for Land Use 15 - VEHICLE SERVICES/B - MOTORIST CENTRE (FAST FIT)
TOTAL VEHICLES
Calculation factor: 100 sqm
BOLD print indicates peak (busiest) period

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate
00:00 - 01:00									
01:00 - 02:00									
02:00 - 03:00									
03:00 - 04:00									
04:00 - 05:00									
05:00 - 06:00									
06:00 - 07:00									
07:00 - 08:00	9	646	0.361	9	646	0.155	9	646	0.516
08:00 - 09:00	17	669	1.240	17	669	0.554	17	669	1.794
09:00 - 10:00	17	669	1.152	17	669	1.029	17	669	2.181
10:00 - 11:00	17	669	1.117	17	669	0.967	17	669	2.084
11:00 - 12:00	17	669	1.011	17	669	1.064	17	669	2.075
12:00 - 13:00	17	669	1.134	17	669	1.090	17	669	2.224
13:00 - 14:00	17	669	1.003	17	669	1.029	17	669	2.032
14:00 - 15:00	17	669	0.888	17	669	1.011	17	669	1.899
15:00 - 16:00	17	669	0.897	17	669	0.950	17	669	1.847
16:00 - 17:00	17	669	1.126	17	669	1.152	17	669	2.278
17:00 - 18:00	17	669	0.431	17	669	0.959	17	669	1.390
18:00 - 19:00	11	696	0.091	11	696	0.313	11	696	0.404
19:00 - 20:00									
20:00 - 21:00									
21:00 - 22:00									
22:00 - 23:00									
23:00 - 24:00									
Total Rates:			10.451			10.273			20.724

This section displays the trip rate results based on the selected set of surveys and the selected count type (shown just above the table). It is split by three main columns, representing arrivals trips, departures trips, and total trips (arrivals plus departures). Within each of these main columns are three sub-columns. These display the number of survey days where count data is included (per time period), the average value of the selected trip rate calculation parameter (per time period), and the trip rate result (per time period). Total trip rates (the sum of the column) are also displayed at the foot of the table.

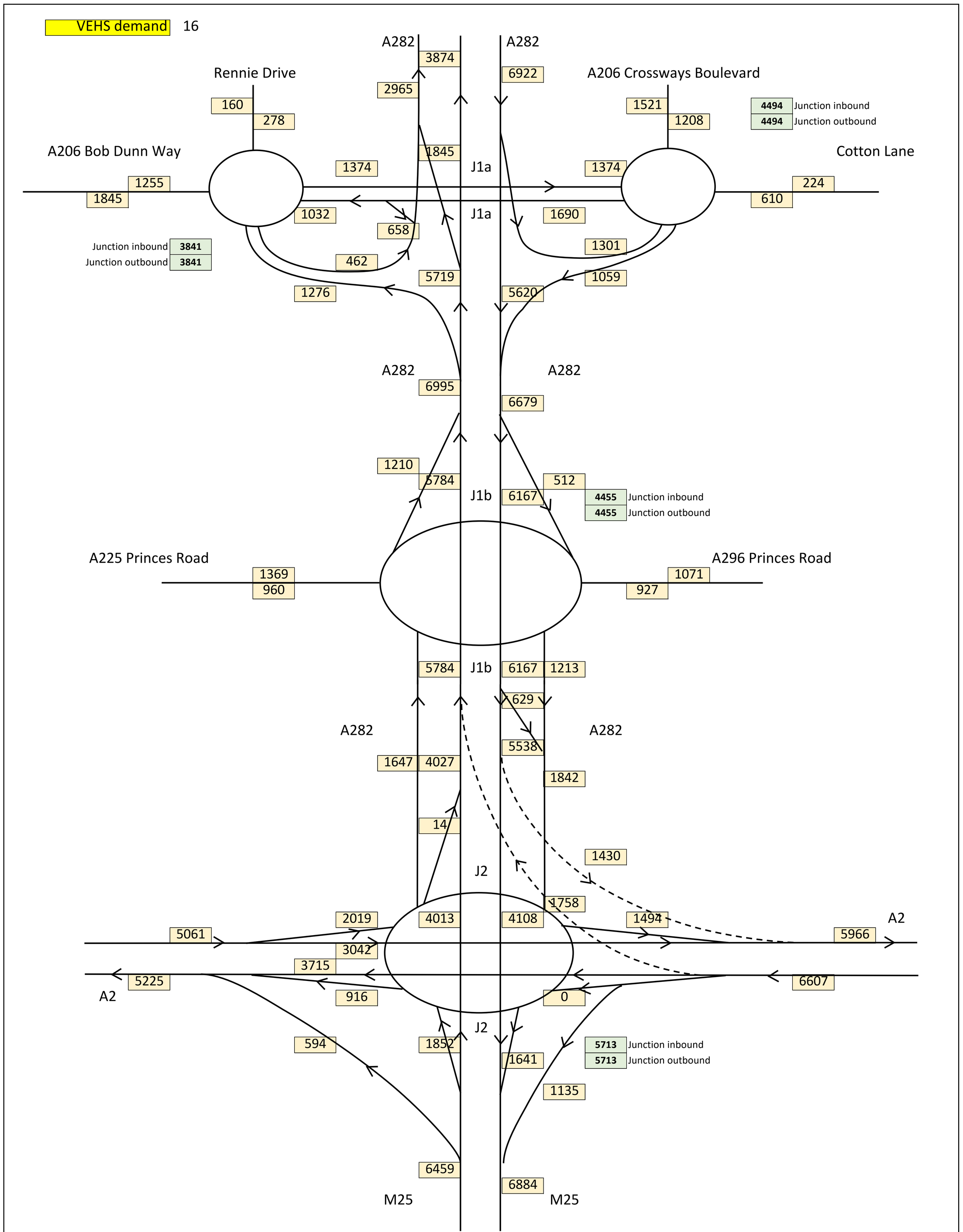
*To obtain a trip rate, the average (mean) trip rate parameter value (TRP) is first calculated for all selected survey days that have count data available for the stated time period. The average (mean) number of arrivals, departures or totals (whichever applies) is also calculated (COUNT) for all selected survey days that have count data available for the stated time period. Then, the average count is divided by the average trip rate parameter value, and multiplied by the stated calculation factor (shown just above the table and abbreviated here as FACT). So, the method is: COUNT/TRP*FACT. Trip rates are then rounded to 3 decimal places.*

Parameter summary

Trip rate parameter range selected:	150 - 1878 (units: sqm)
Survey date date range:	01/01/00 - 14/11/15
Number of weekdays (Monday-Friday):	17
Number of Saturdays:	0
Number of Sundays:	0
Surveys automatically removed from selection:	1
Surveys manually removed from selection:	0

This section displays a quick summary of some of the data filtering selections made by the TRICS® user. The trip rate calculation parameter range of all selected surveys is displayed first, followed by the range of minimum and maximum survey dates selected by the user. Then, the total number of selected weekdays and weekend days in the selected set of surveys are show. Finally, the number of survey days that have been manually removed from the selected set outside of the standard filtering procedure are displayed.

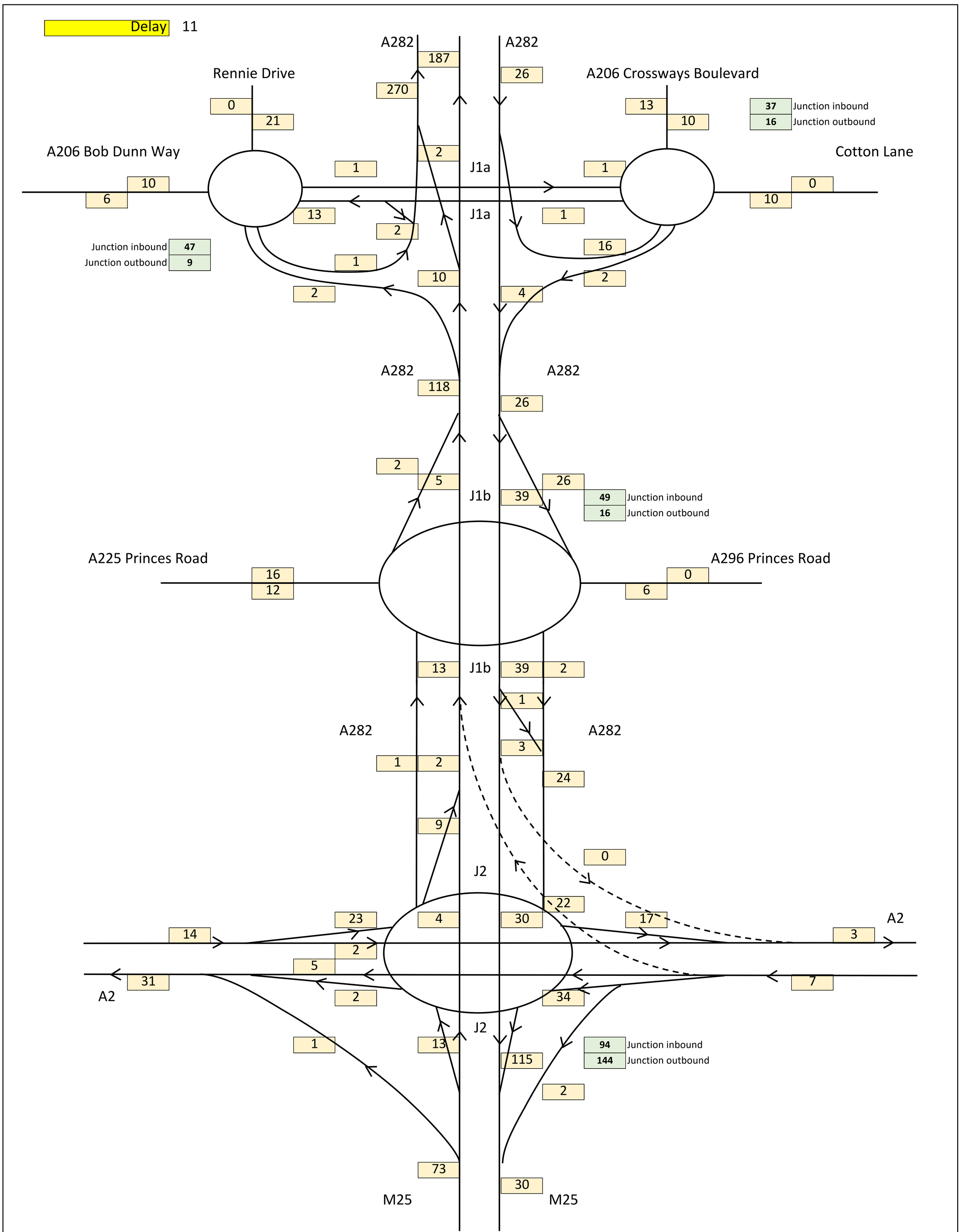
Appendix F
2038 flows – Reference Case



2038 Reference Case - No LTC (0700-0800)

Demand flow (Vehicles)

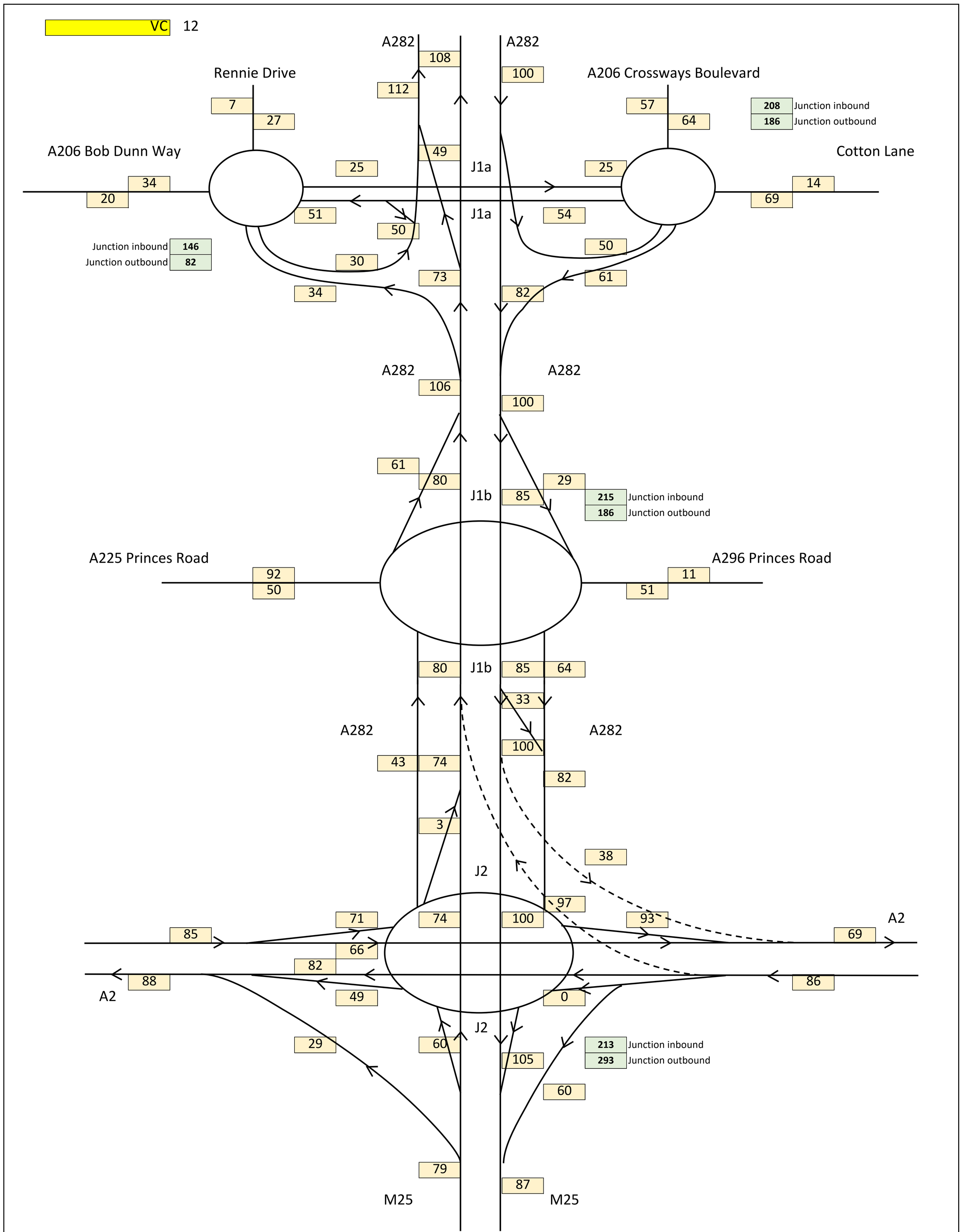
Figure F.1



2038 Reference Case - No LTC (0700-0800)

Link Delay (seconds)

Figure F.2

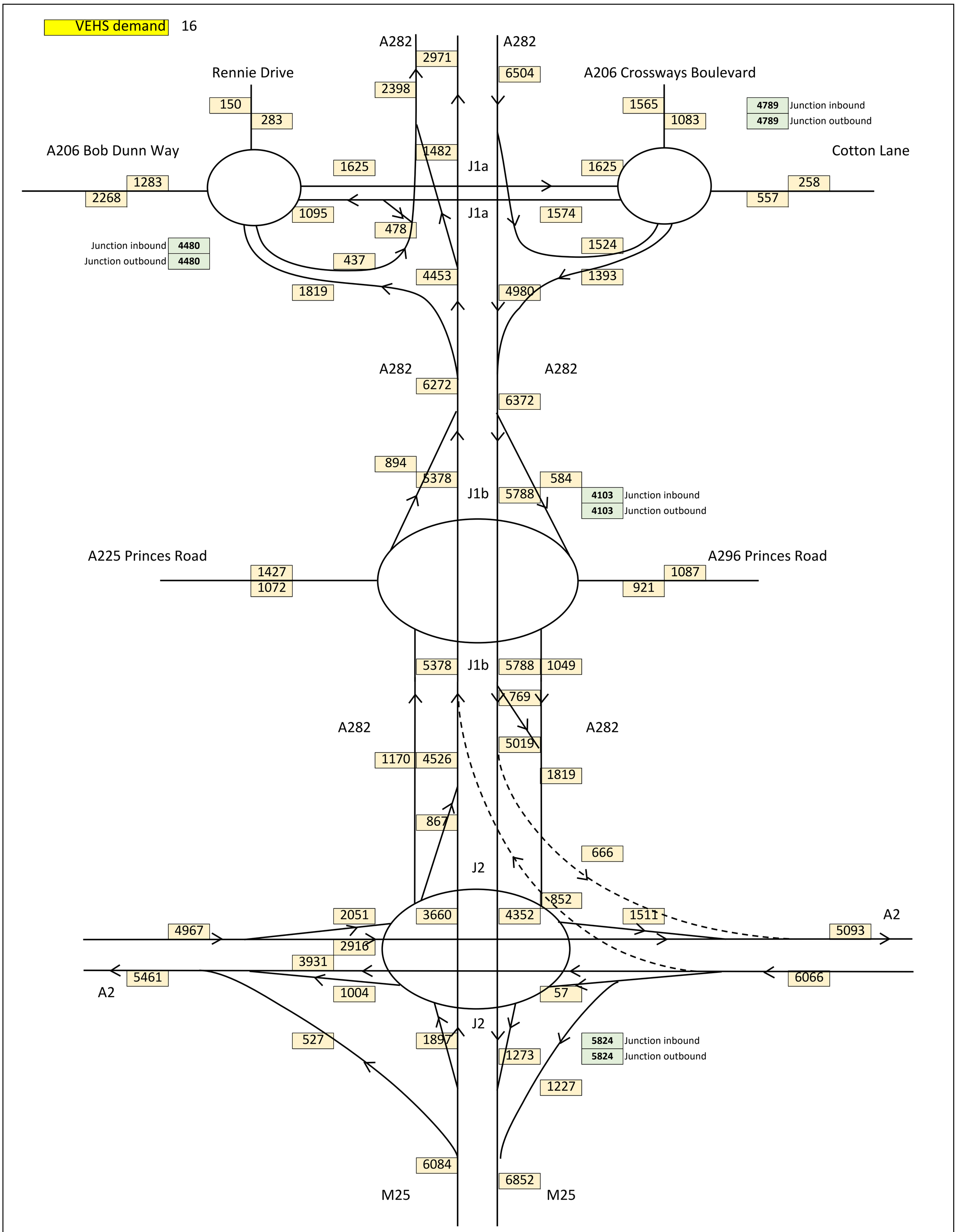


2038 Reference Case - No LTC (0700-0800)

Link V / C (%)

Figure F.3

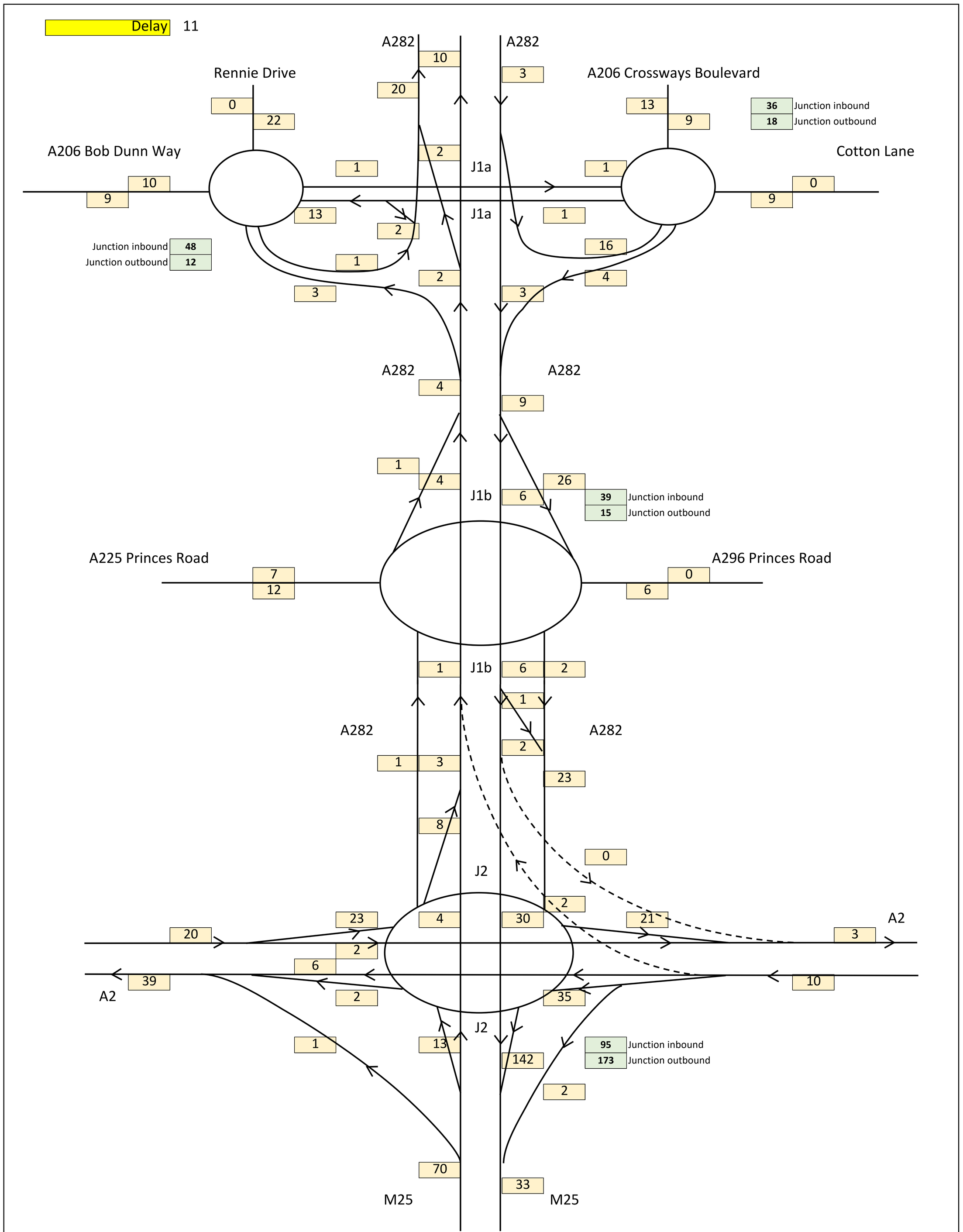
VEHS demand 16



2038 Reference Case - With LTC (0700-0800)

Demand flow (Vehicles)

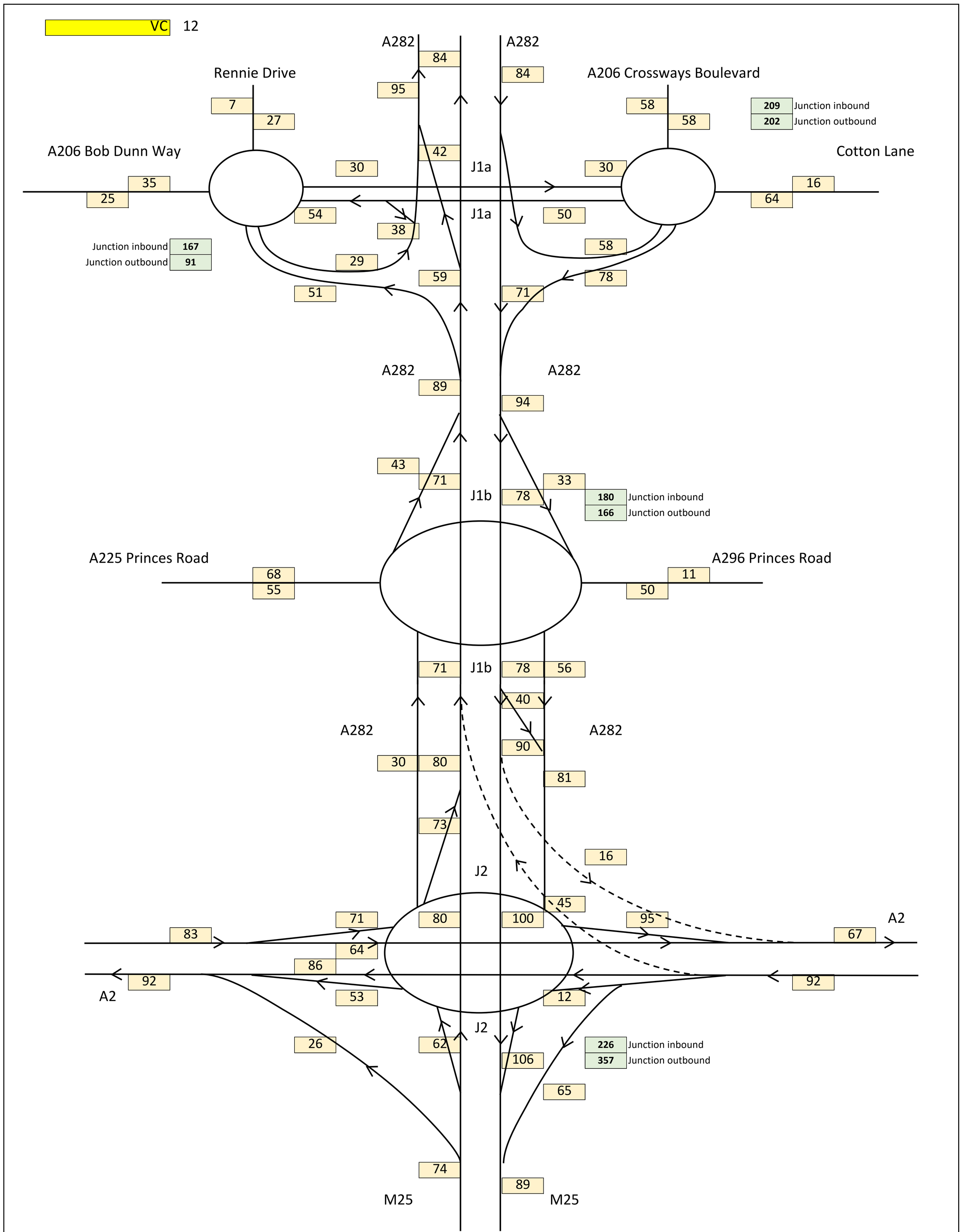
Figure F.4



2038 Reference Case - With LTC (0700-0800)

Link Delay (seconds)

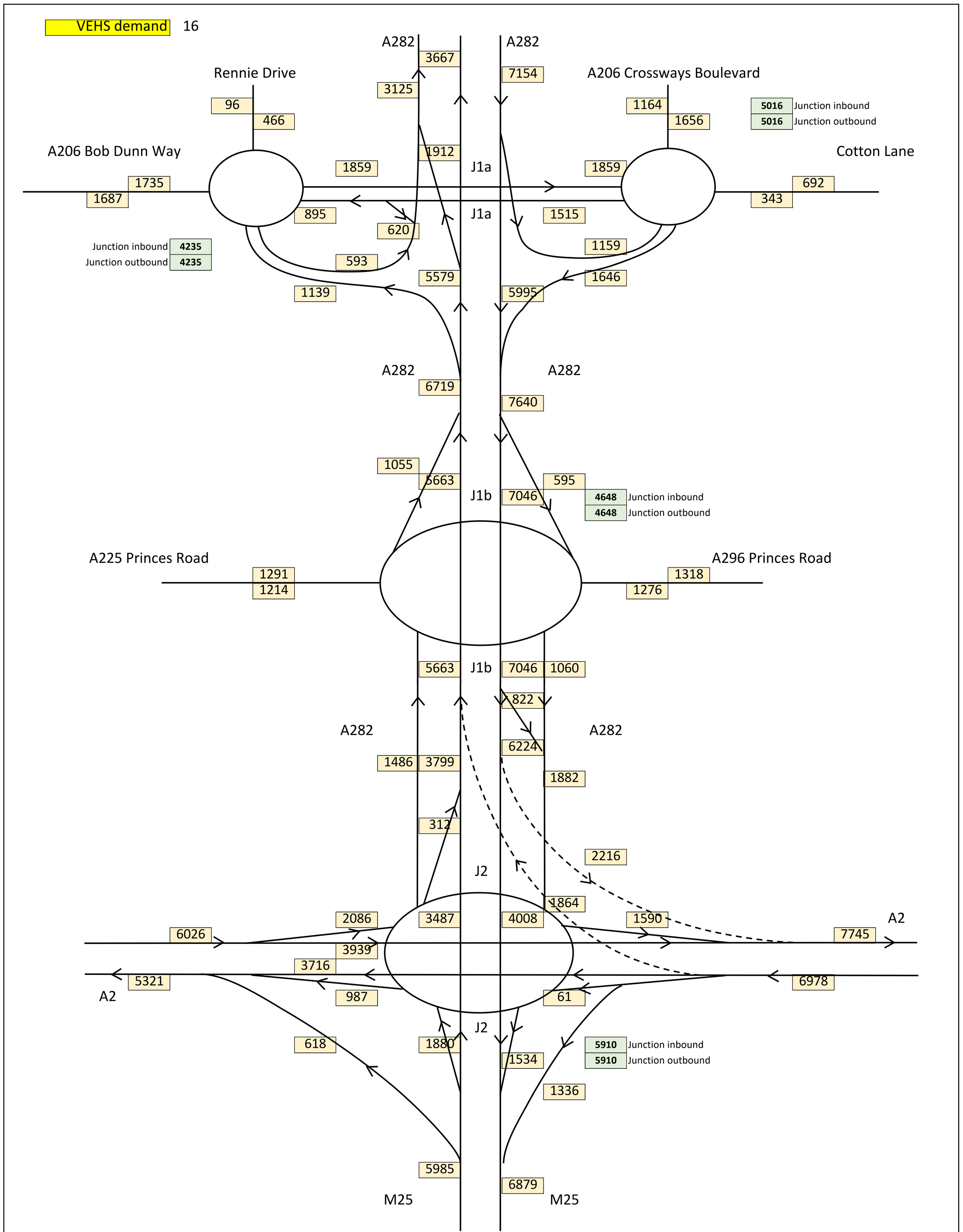
Figure F.5



2038 Reference Case - With LTC (0700-0800)

Link V / C (%)

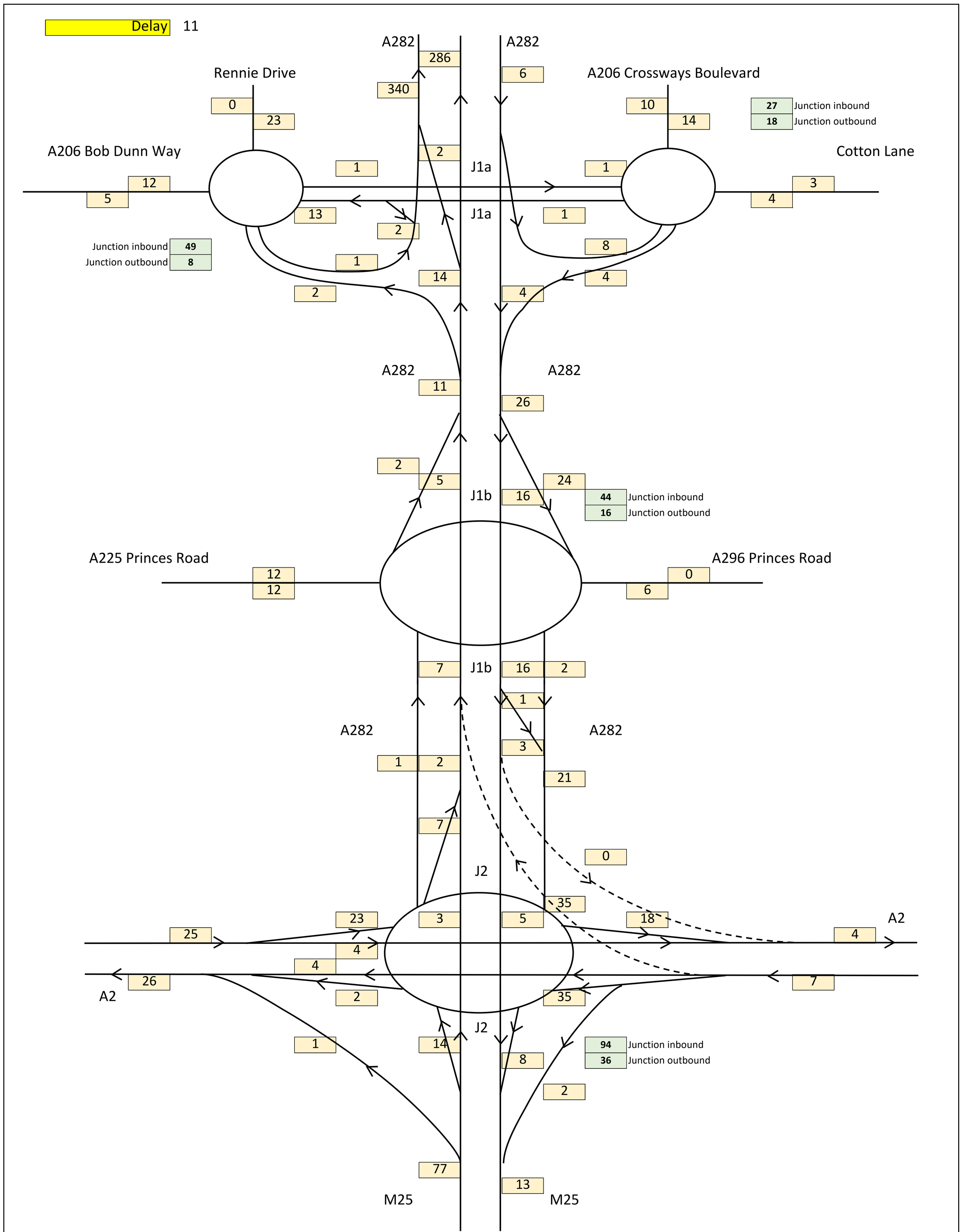
Figure F.6



2038 Reference Case - No LTC (1700-1800)

Demand flow (Vehicles)

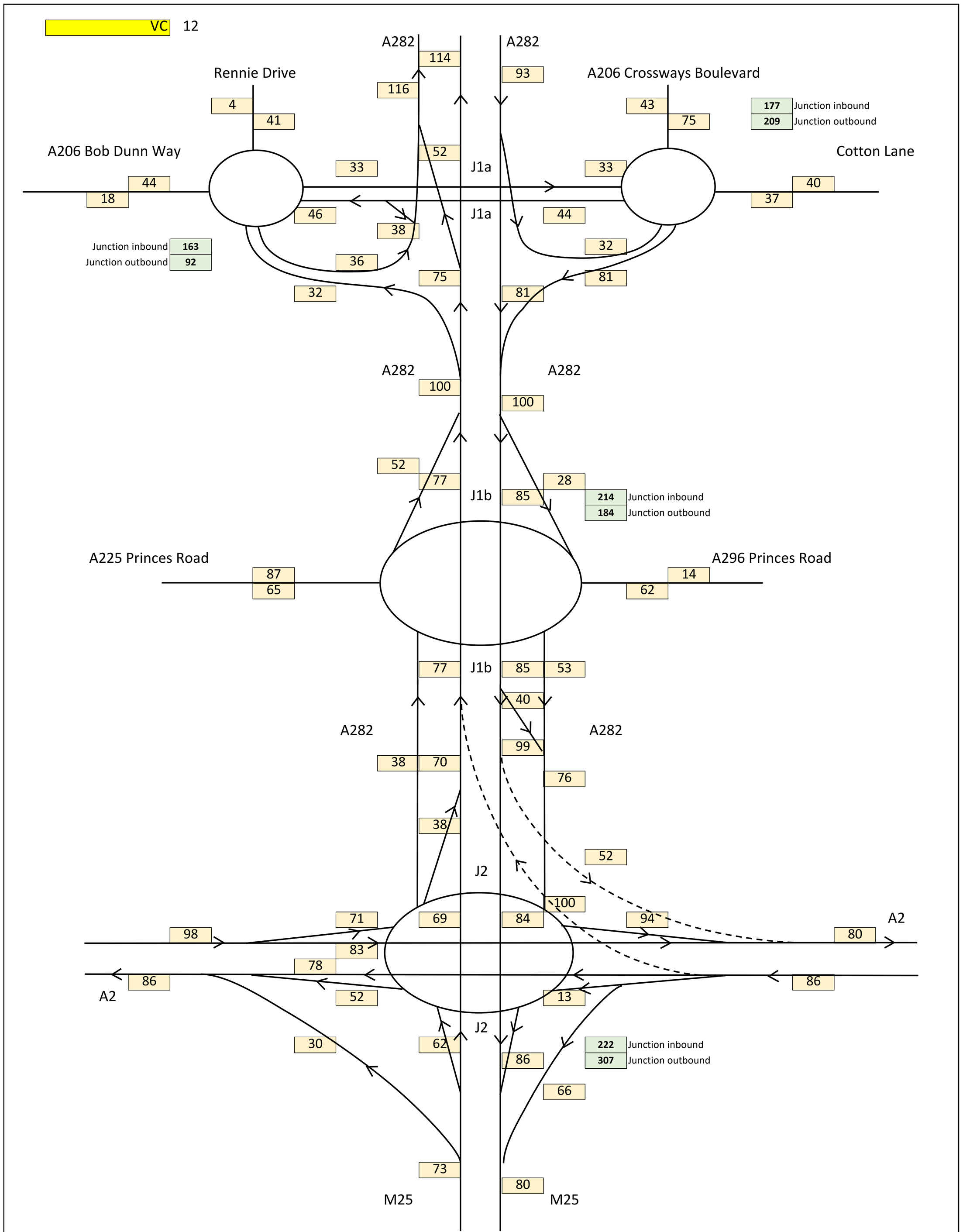
Figure F.7



2038 Reference Case - No LTC (1700-1800)

Link Delay (seconds)

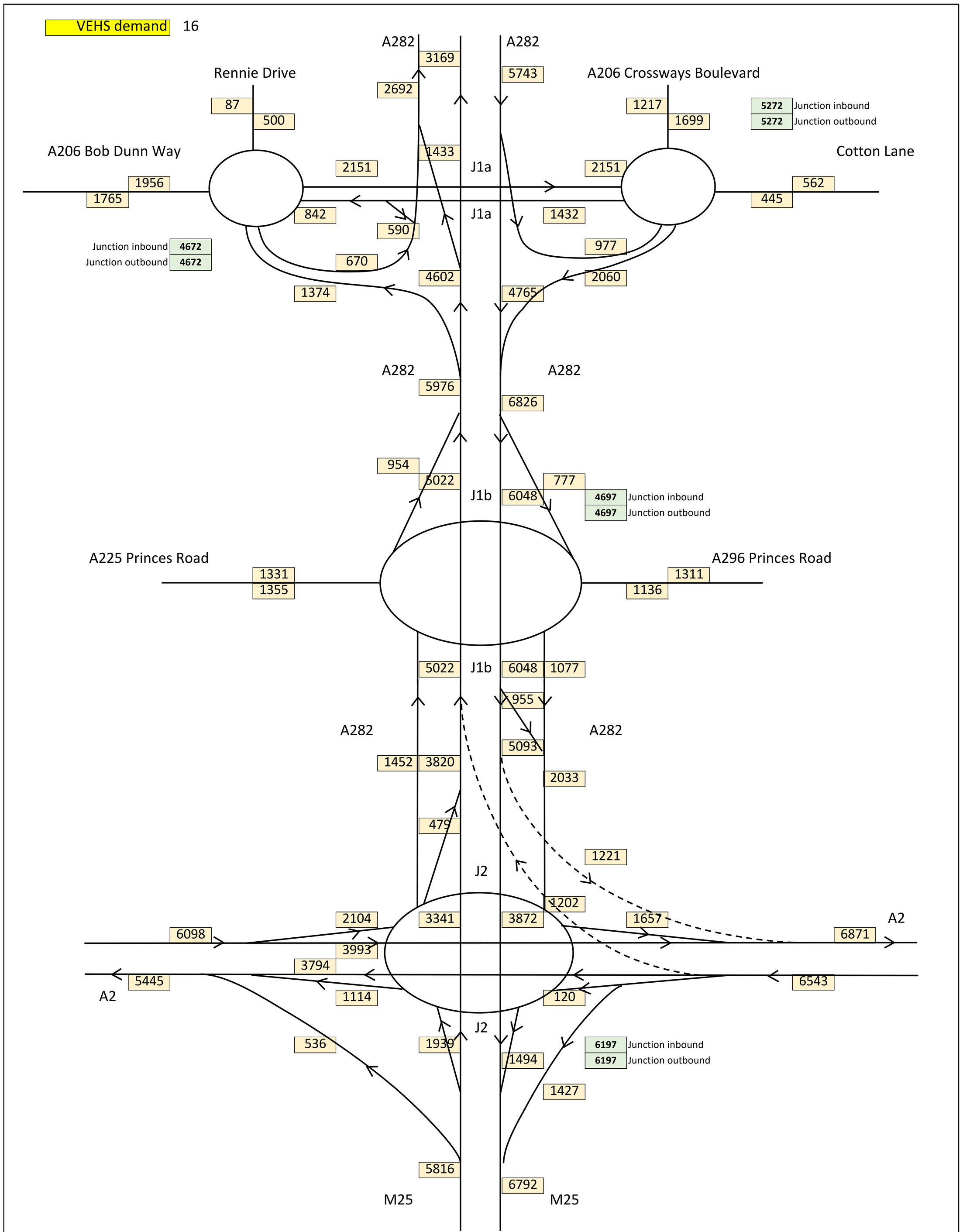
Figure F.8



2038 Reference Case - No LTC (1700-1800)

Link V / C (%)

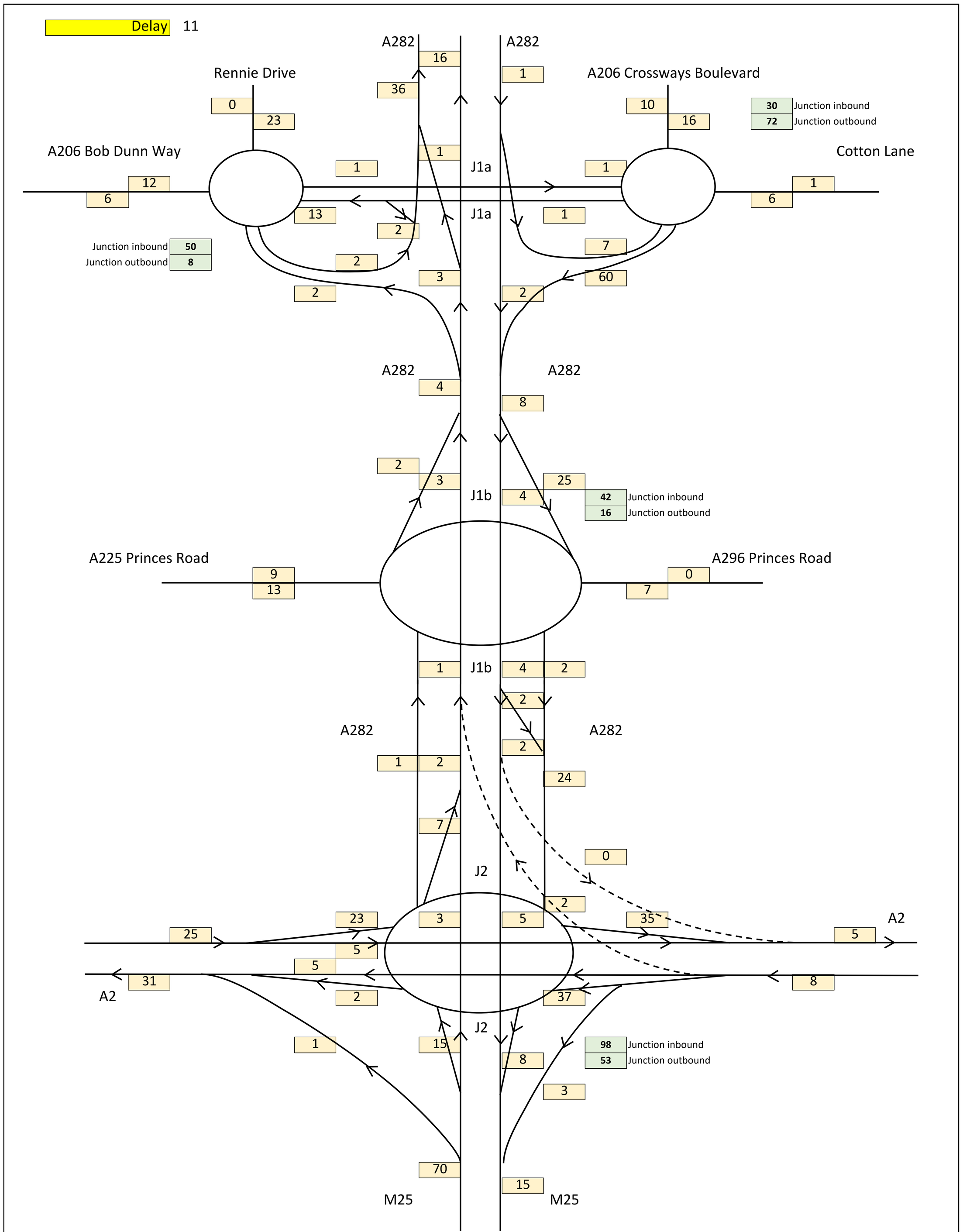
Figure F.9



2038 Reference Case - With LTC (1700-1800)

Demand flow (Vehicles)

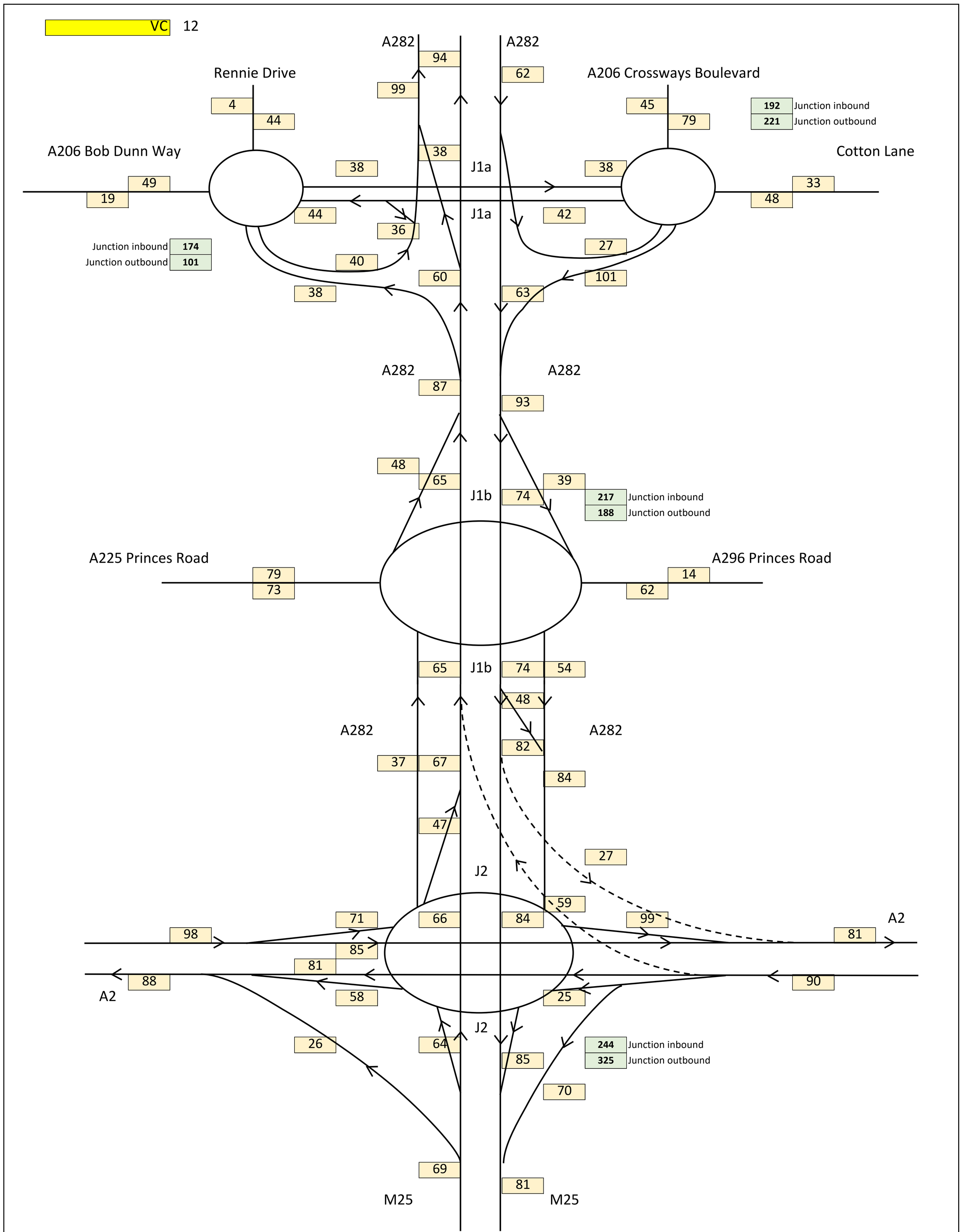
Figure F.10



2038 Reference Case - With LTC (1700-1800)

Link Delay (seconds)

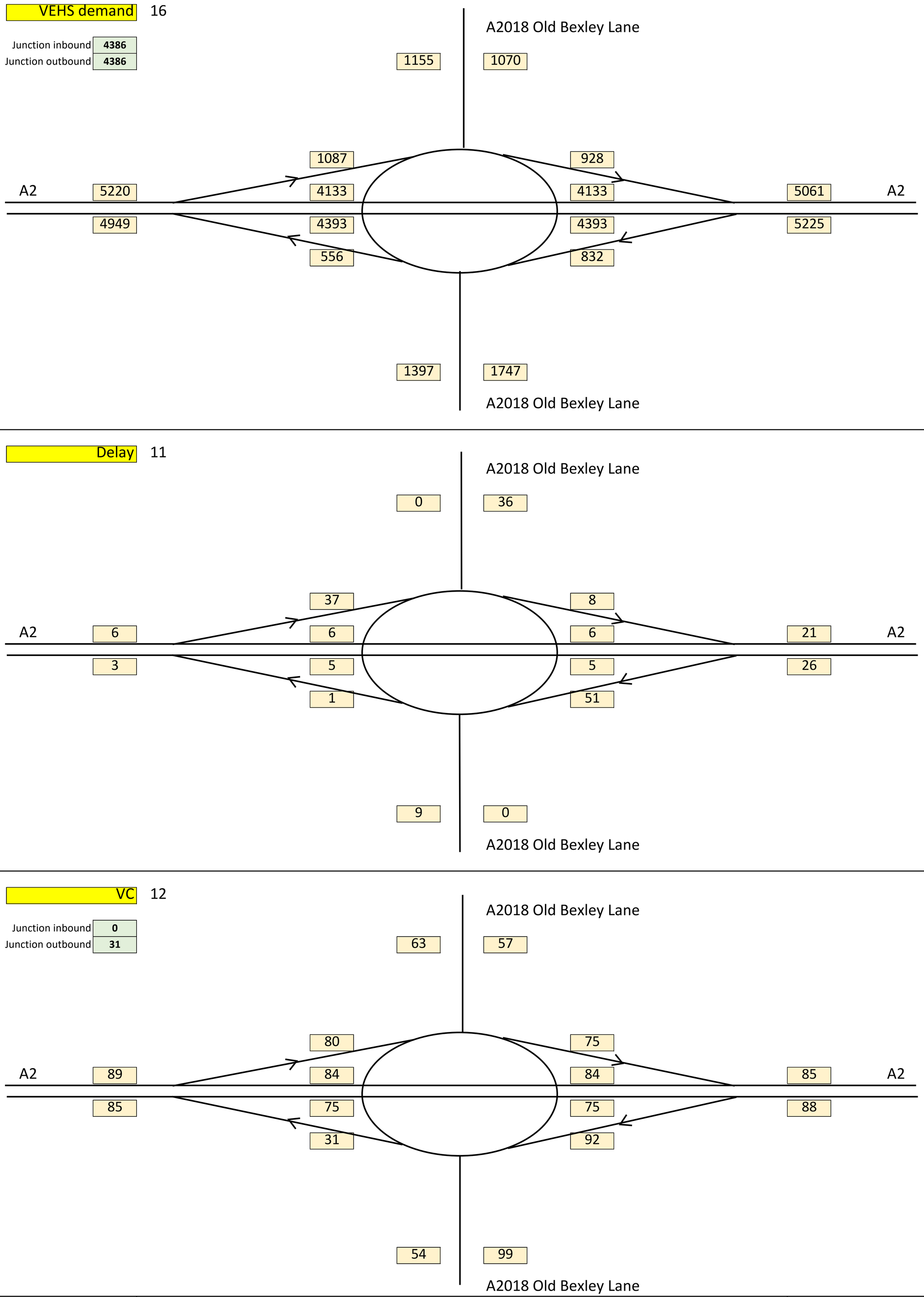
Figure F.11



2038 Reference Case - With LTC (1700-1800)

Link V / C (%)

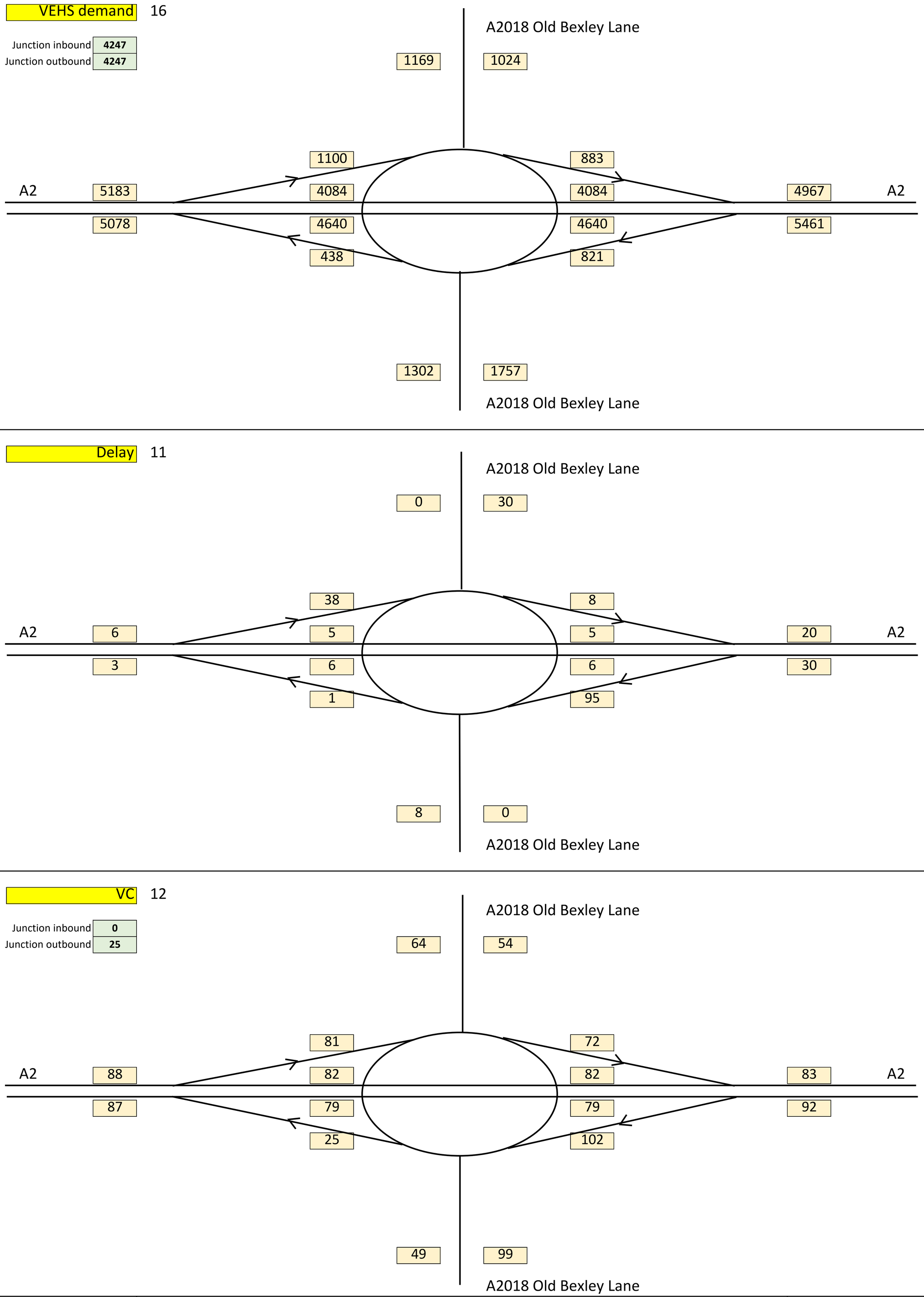
Figure F.12



2038 Reference Case - No LTC (0700-0800)

Demand flow (Vehicles) / Link Delay (seconds) / Link V over C (%)

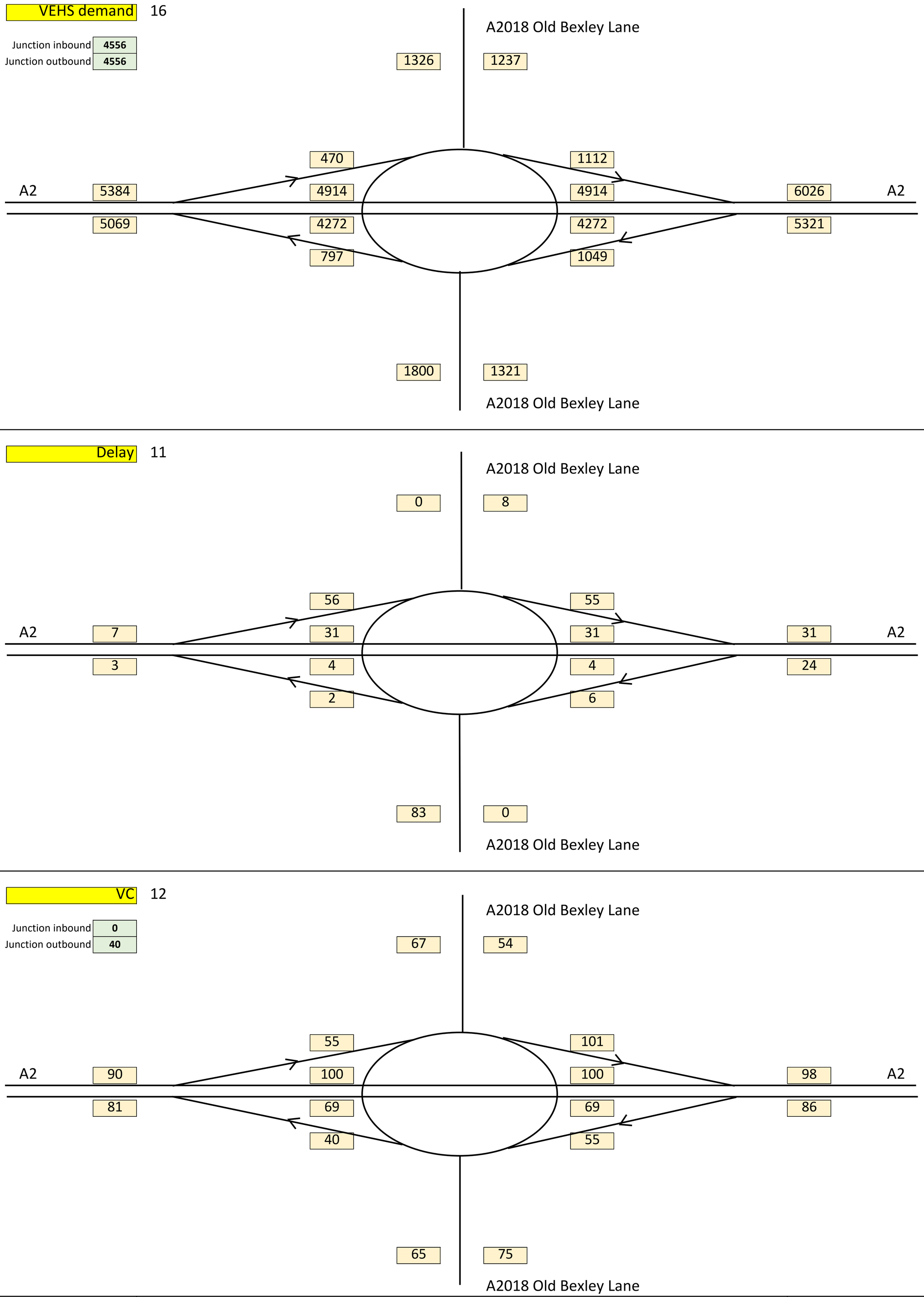
Figure F.13



2038 Reference Case - With LTC (0700-0800)

Demand flow (Vehicles) / Link Delay (seconds) / Link V over C (%)

Figure F.14



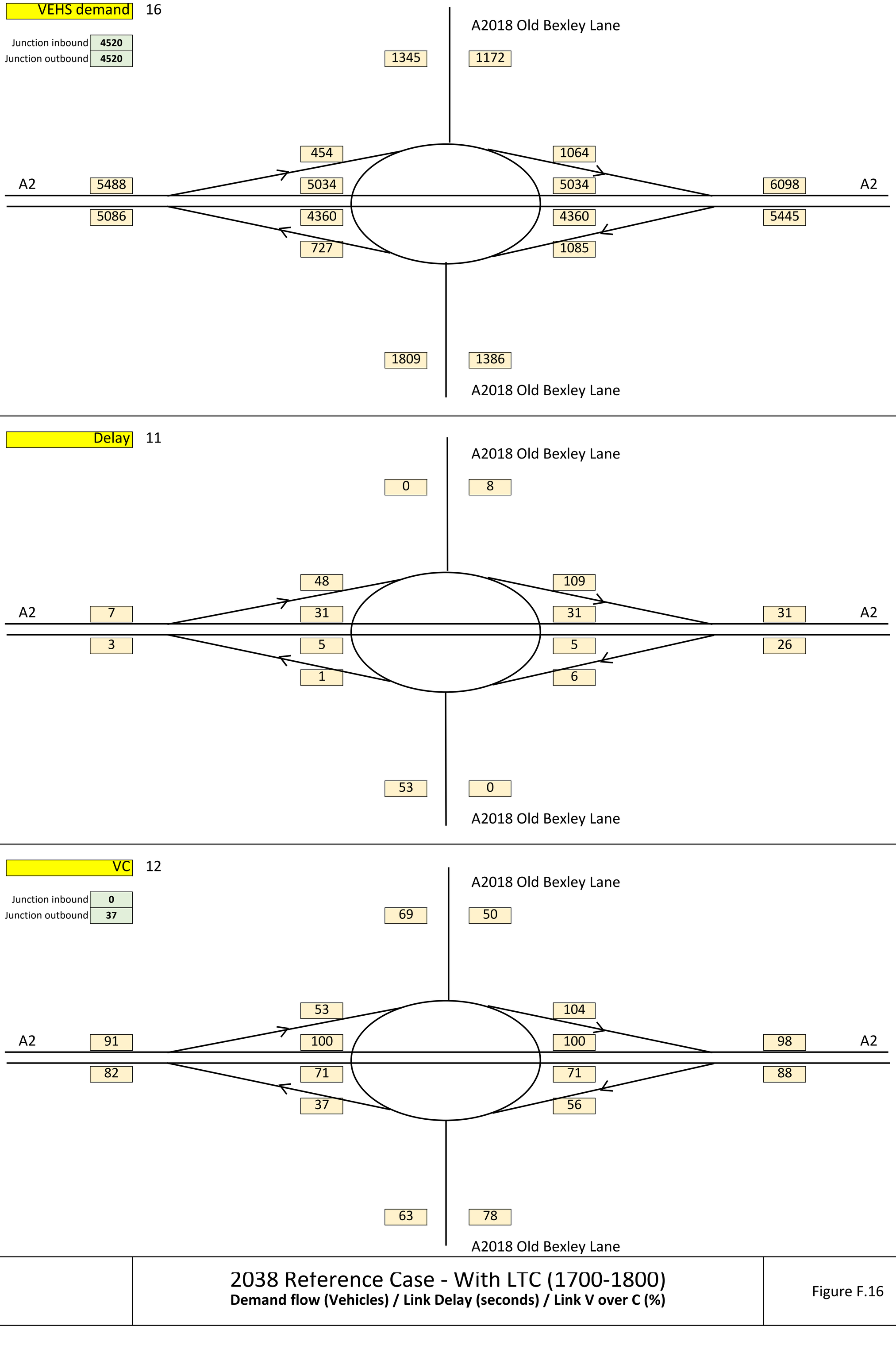
2038 Reference Case - No LTC (1700-1800)

Demand flow (Vehicles) / Link Delay (seconds) / Link V over C (%)

Figure F.15

VEHS demand 16

Junction inbound 4520
Junction outbound 4520



Delay 11

VC 12

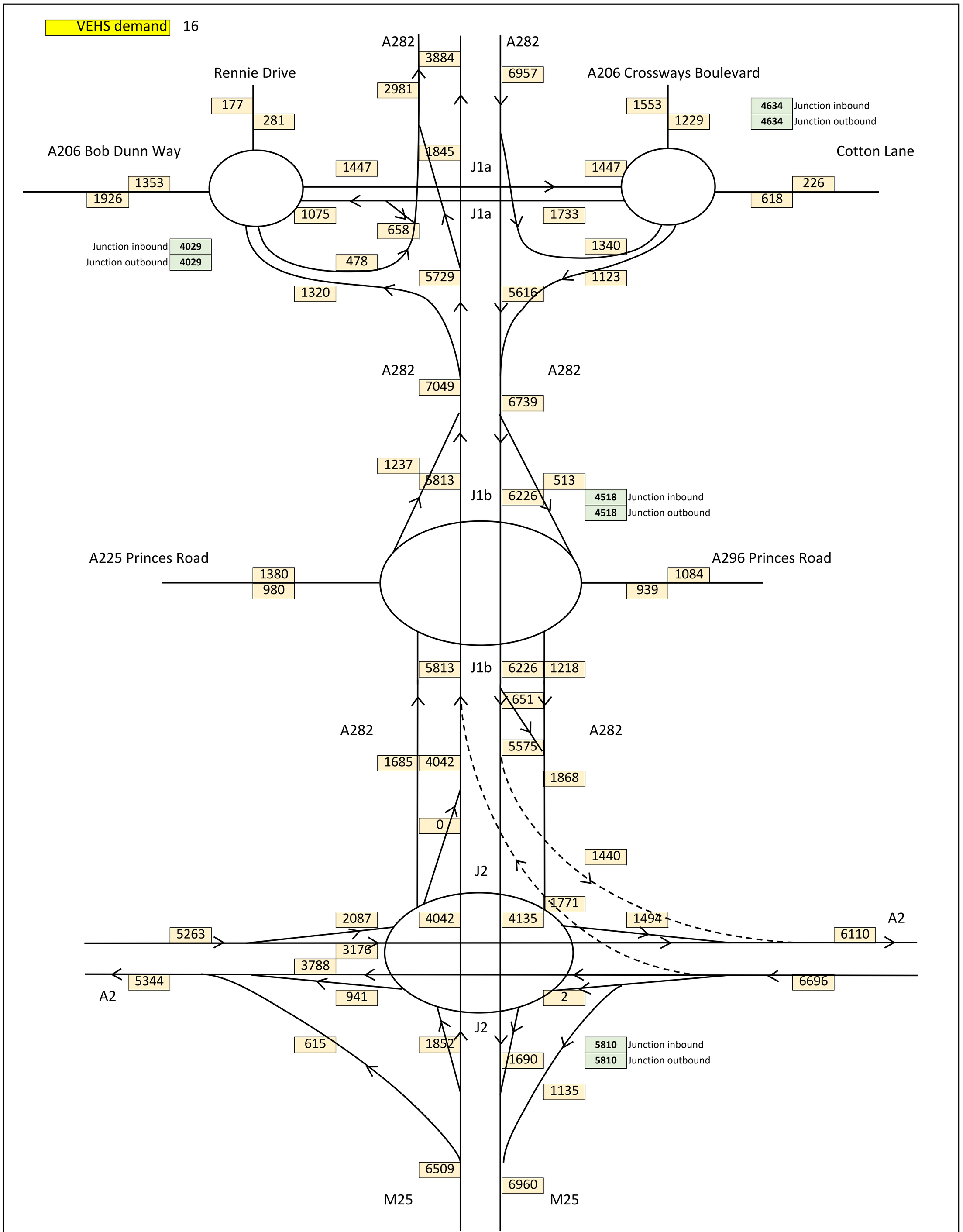
Junction inbound 0
Junction outbound 37

2038 Reference Case - With LTC (1700-1800)

Demand flow (Vehicles) / Link Delay (seconds) / Link V over C (%)

Figure F.16

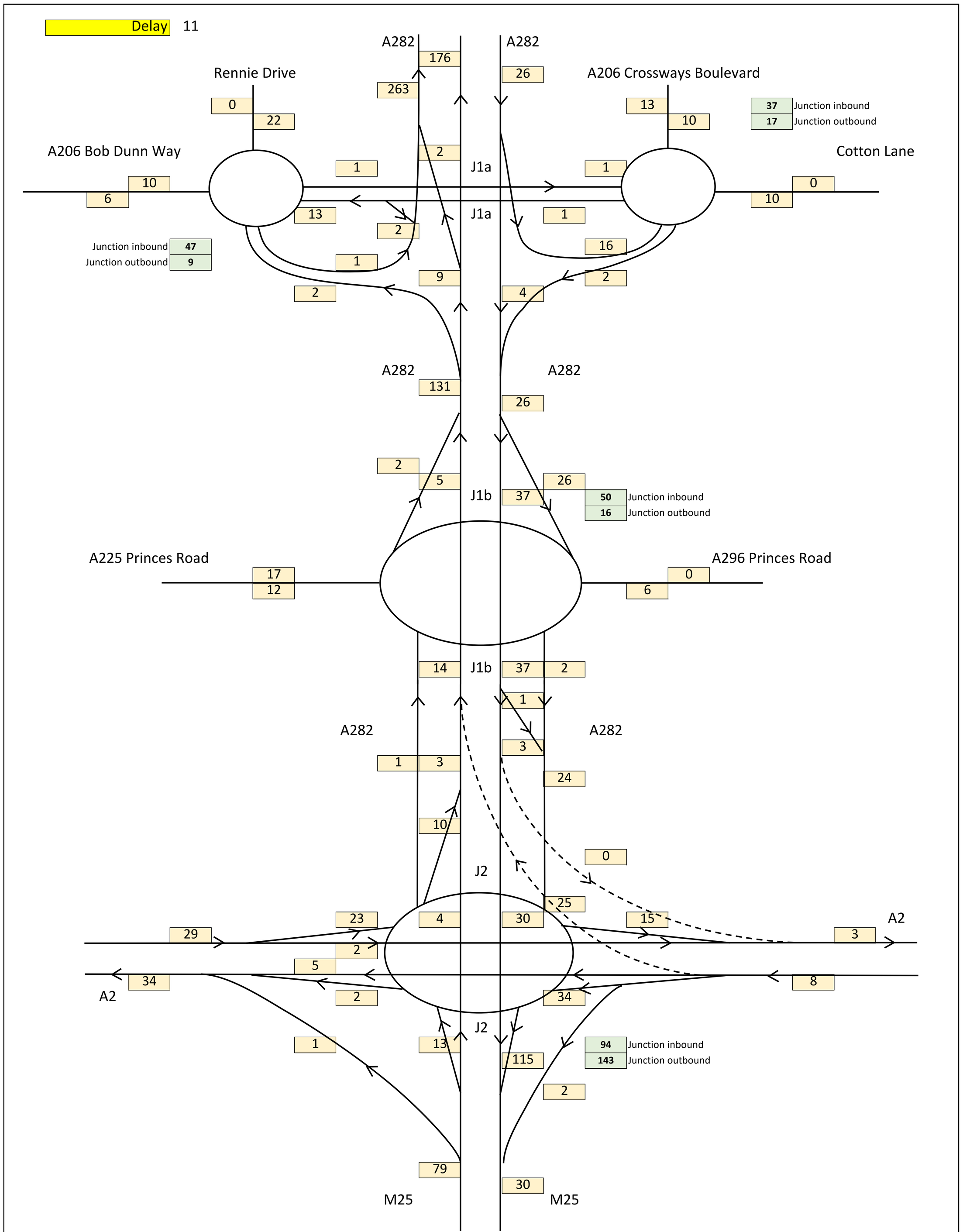
Appendix G
2038 flows – Local Plan scenario



2038 Local Plan - No LTC (0700-0800)

Demand flow (Vehicles)

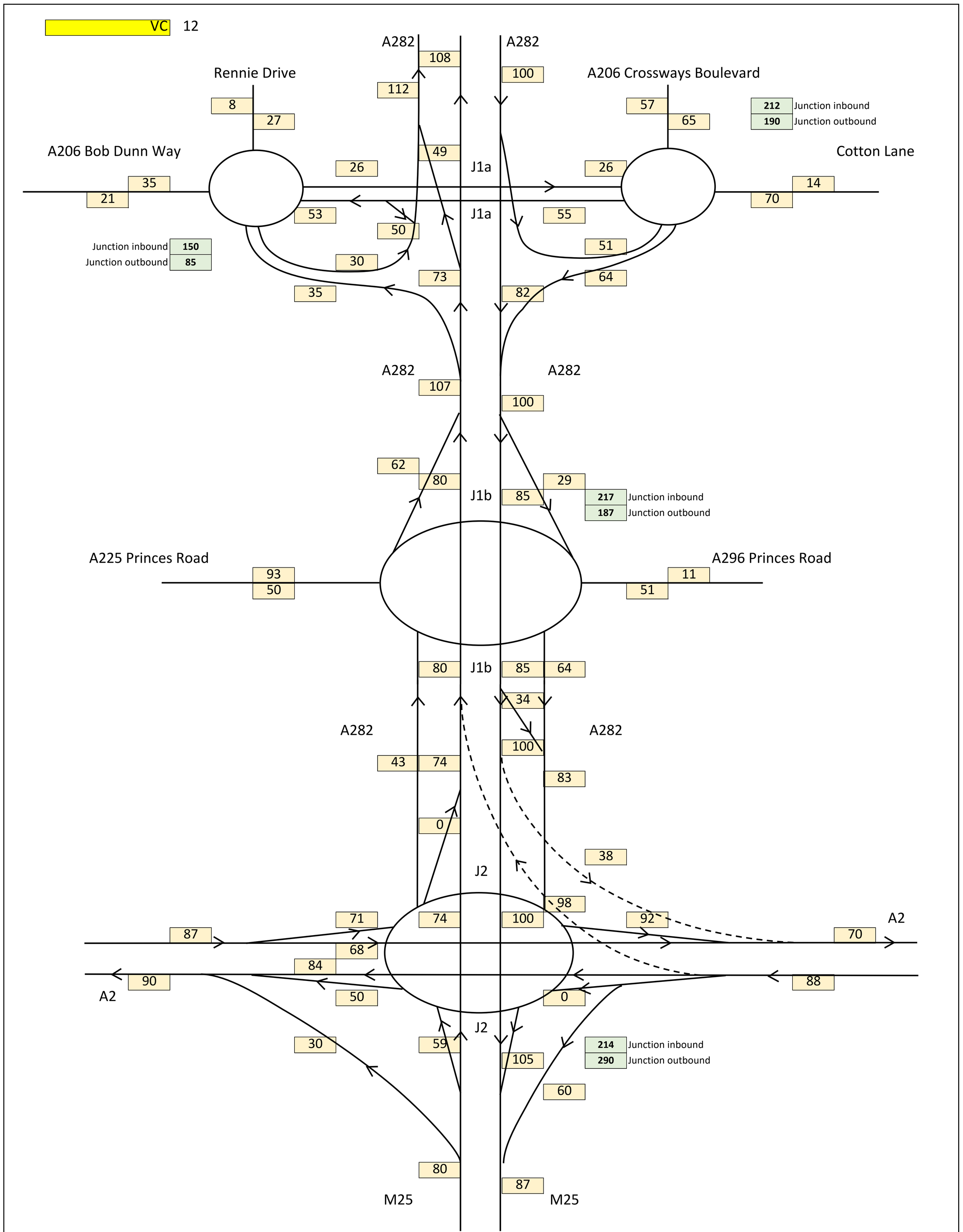
Figure G.1



2038 Local Plan - No LTC (0700-0800)

Link Delay (seconds)

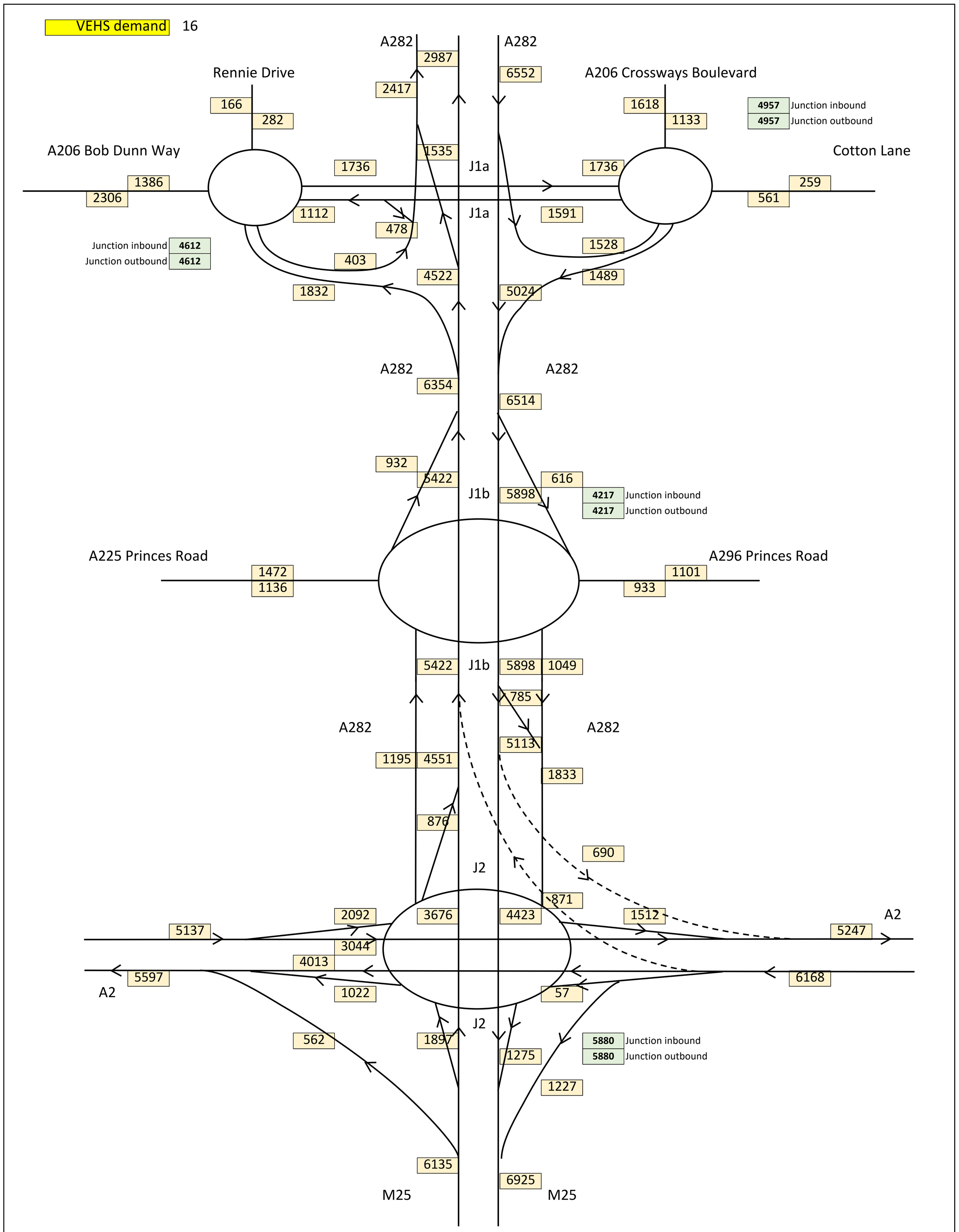
Figure G.2



2038 Local Plan - No LTC (0700-0800)

Link V / C (%)

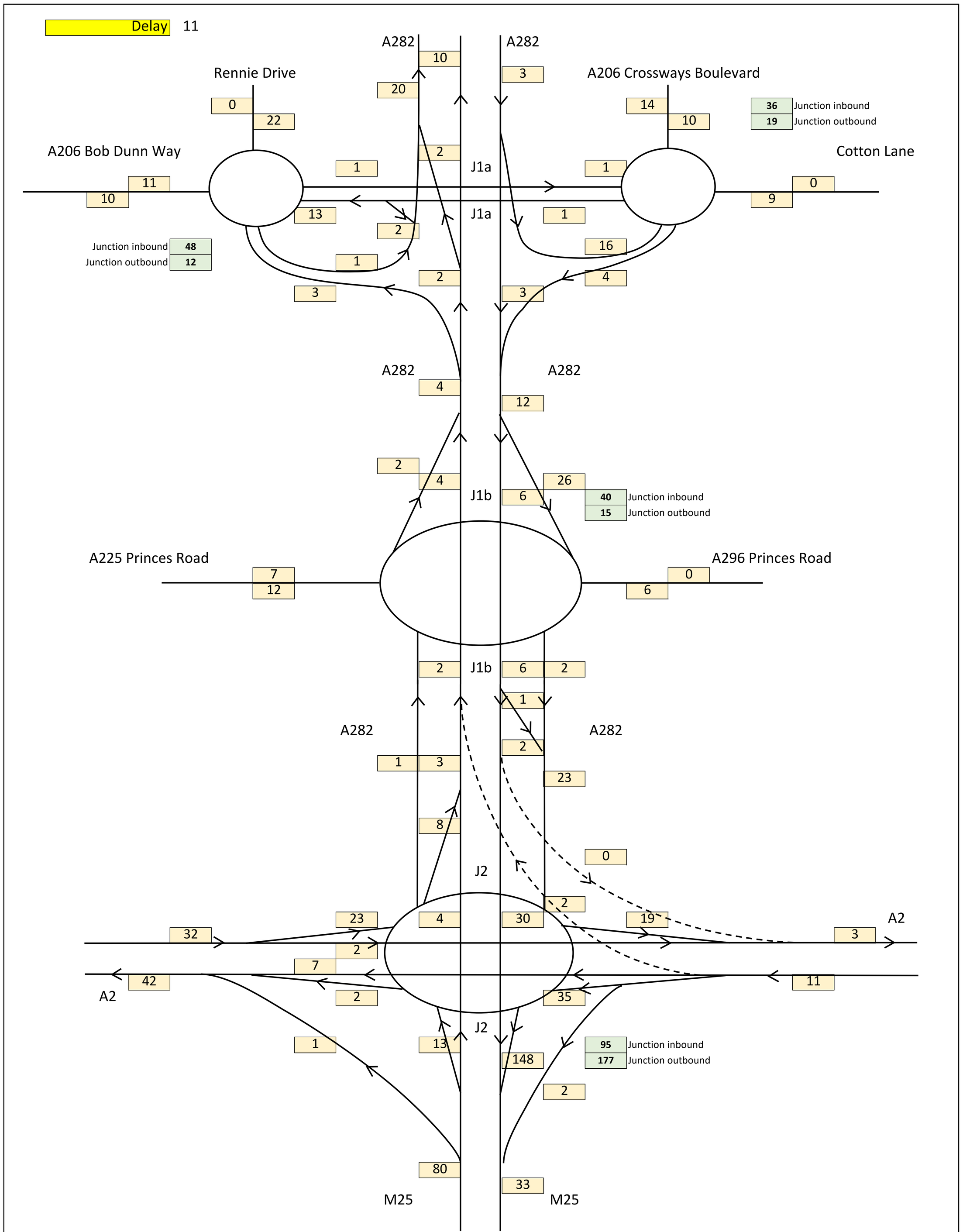
Figure G.3



2038 Local Plan - With LTC (0700-0800)

Demand flow (Vehicles)

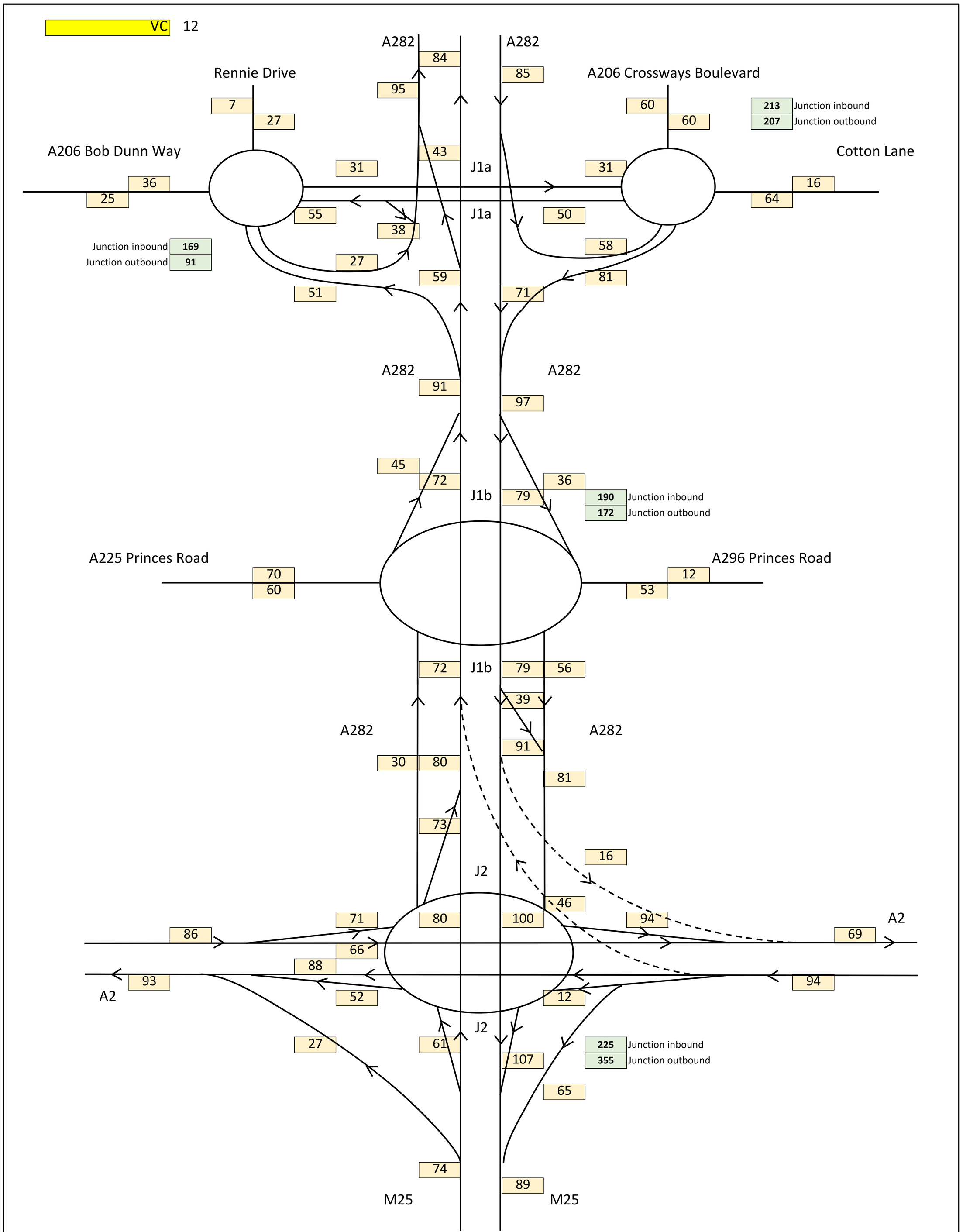
Figure G.4



2038 Local Plan - With LTC (0700-0800)

Link Delay (seconds)

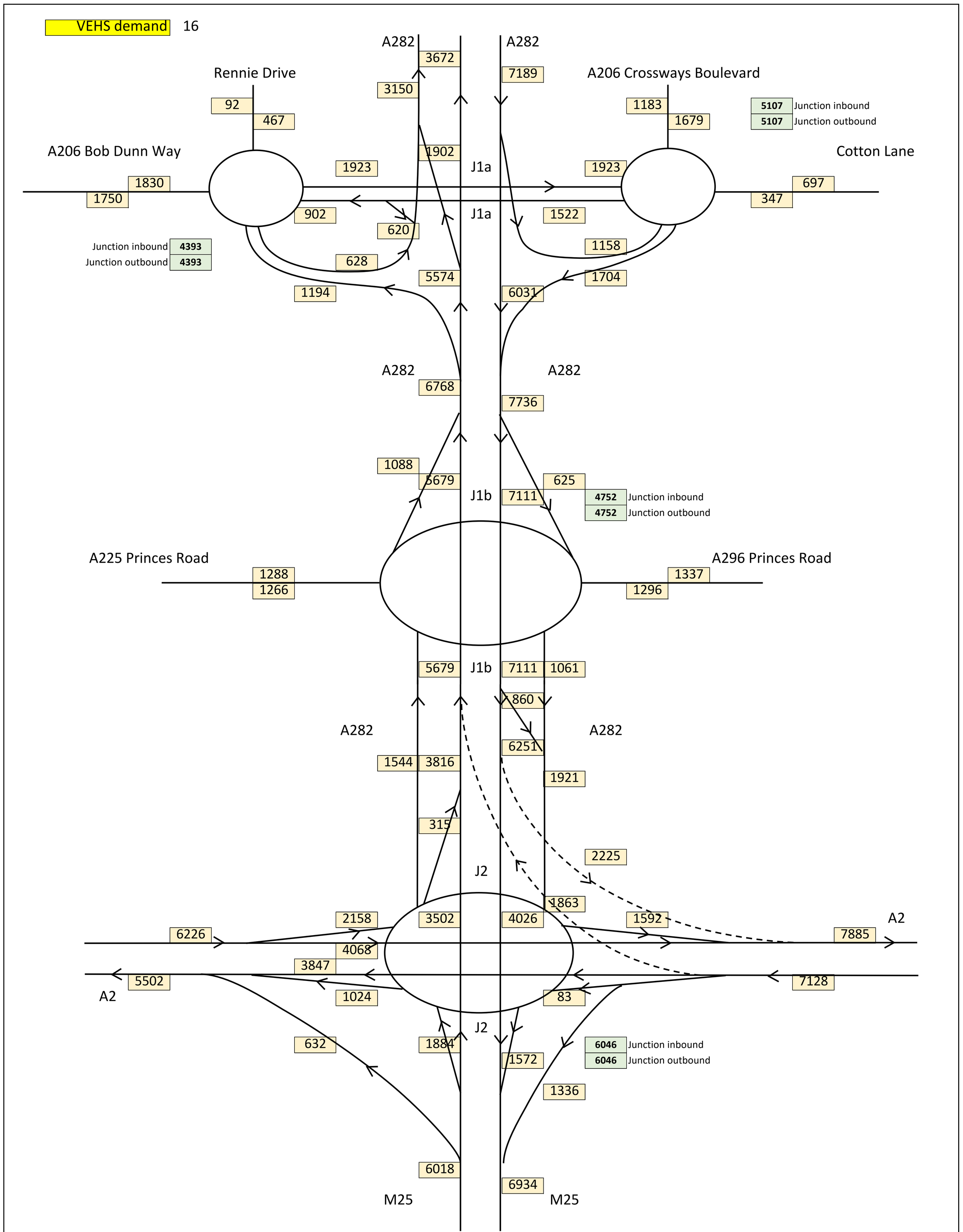
Figure G.5



2038 Local Plan - With LTC (0700-0800)

Link V / C (%)

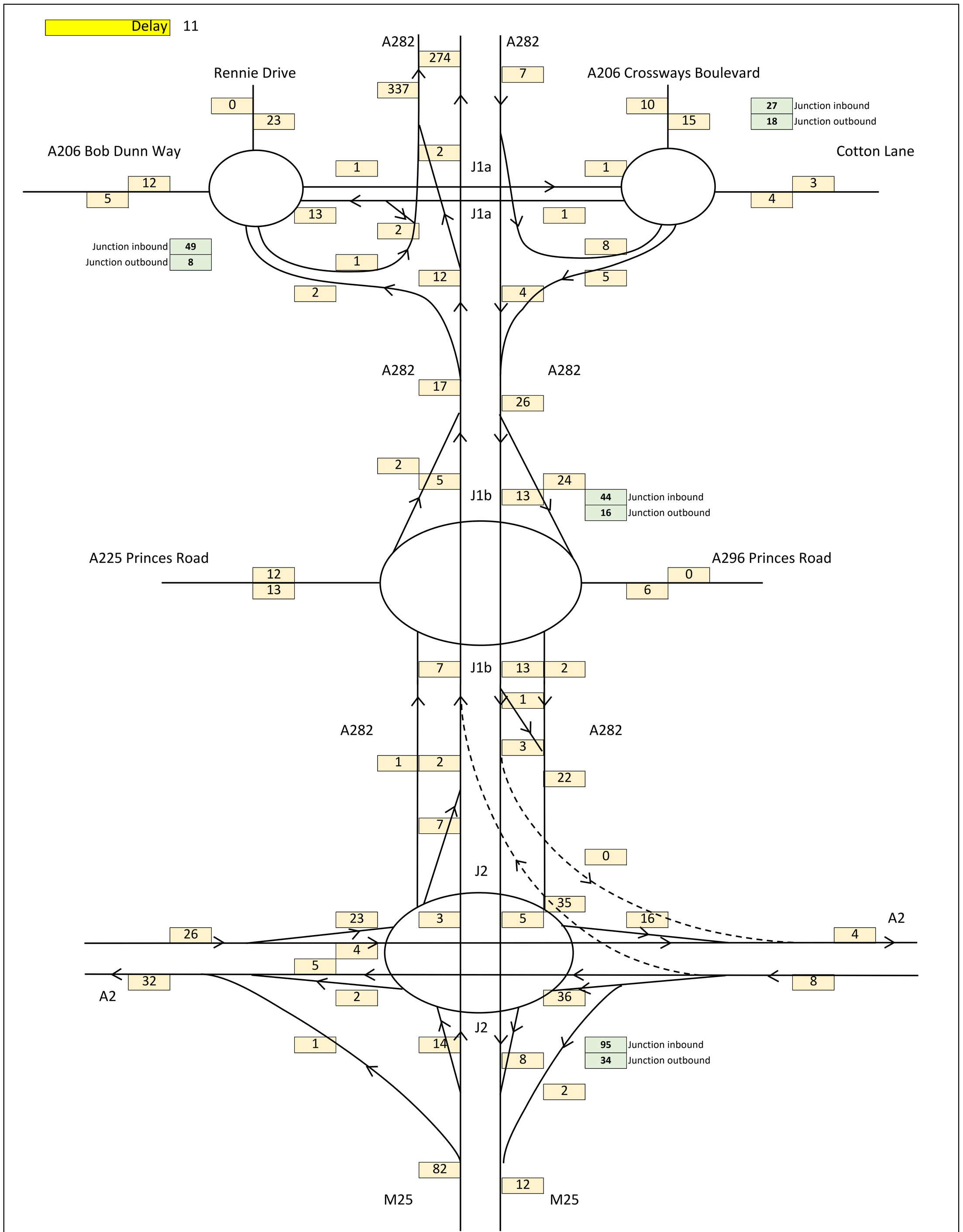
Figure G.6



2038 Local Plan - No LTC (1700-1800)

Demand flow (Vehicles)

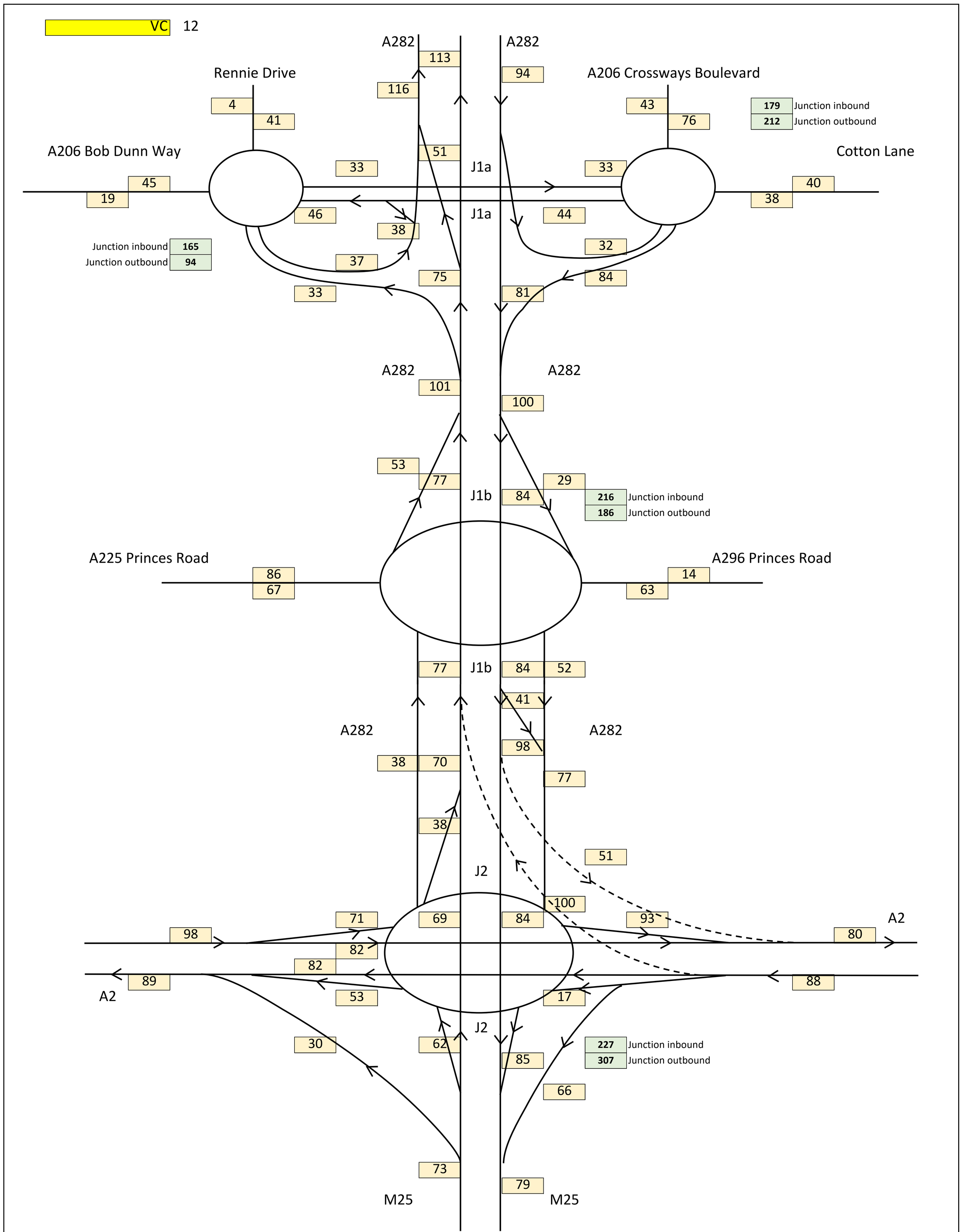
Figure G.7



2038 Local Plan - No LTC (1700-1800)

Link Delay (seconds)

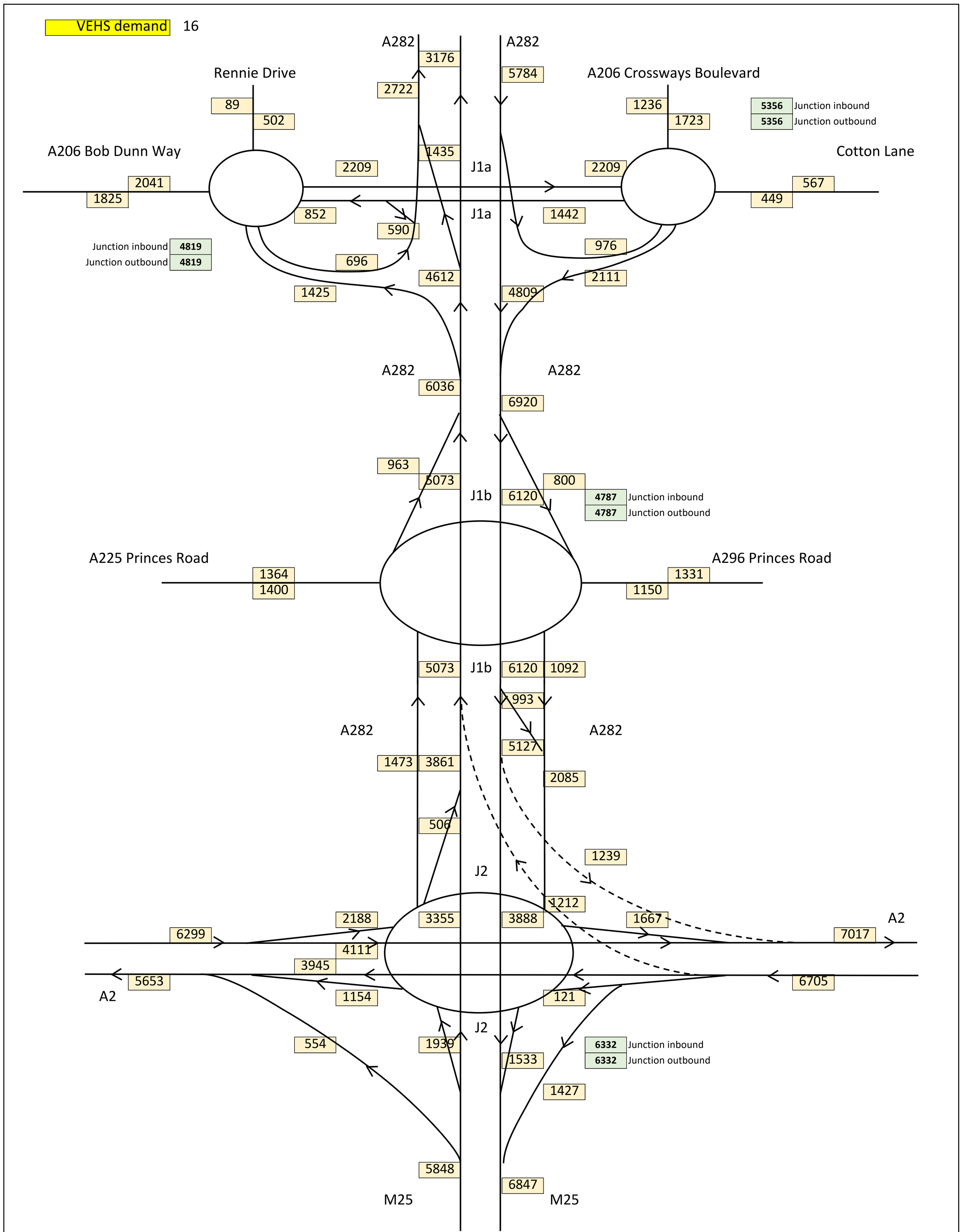
Figure G.8



2038 Local Plan - No LTC (1700-1800)

Link V / C (%)

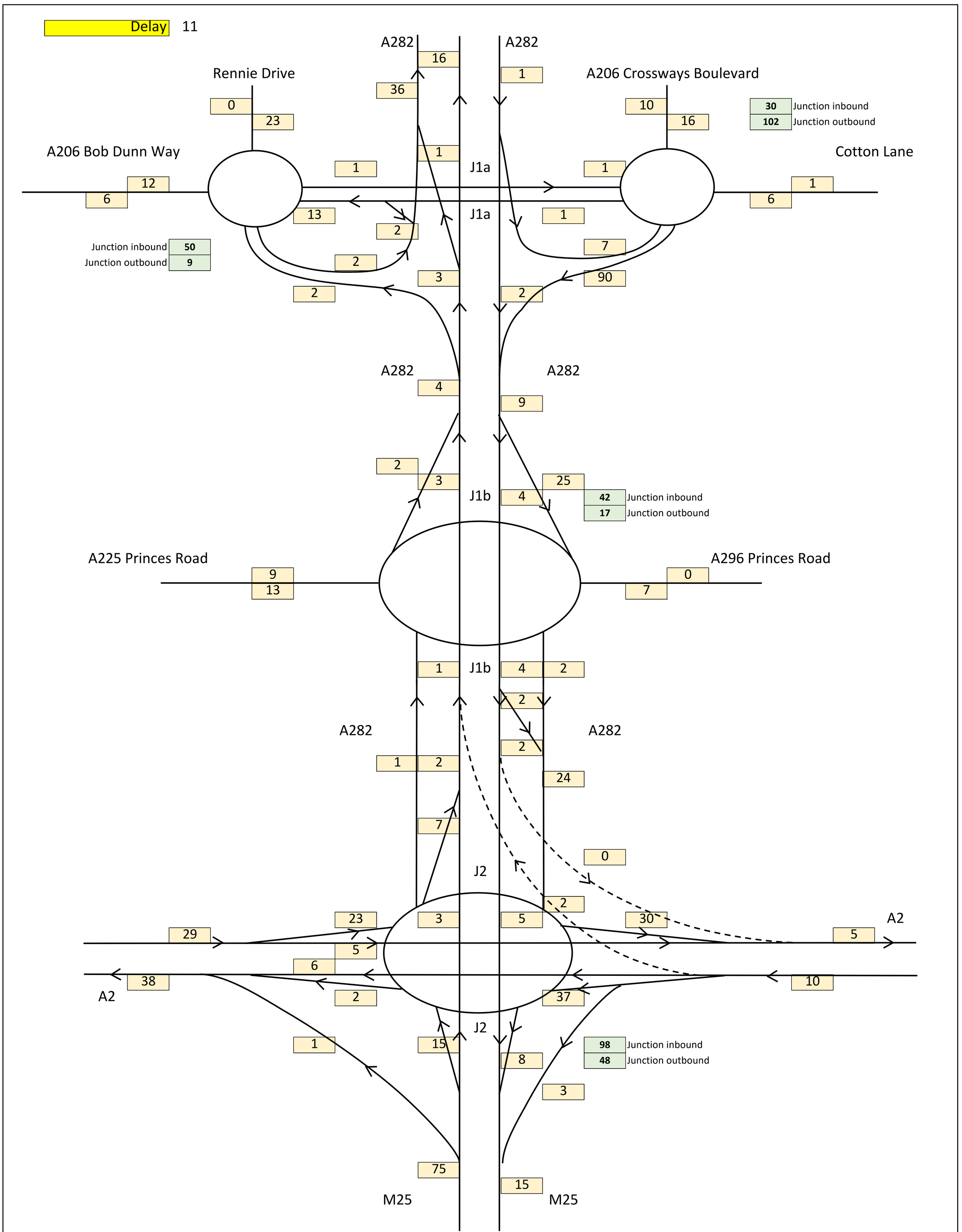
Figure G.9



2038 Local Plan - With LTC (1700-1800)

Demand flow (Vehicles)

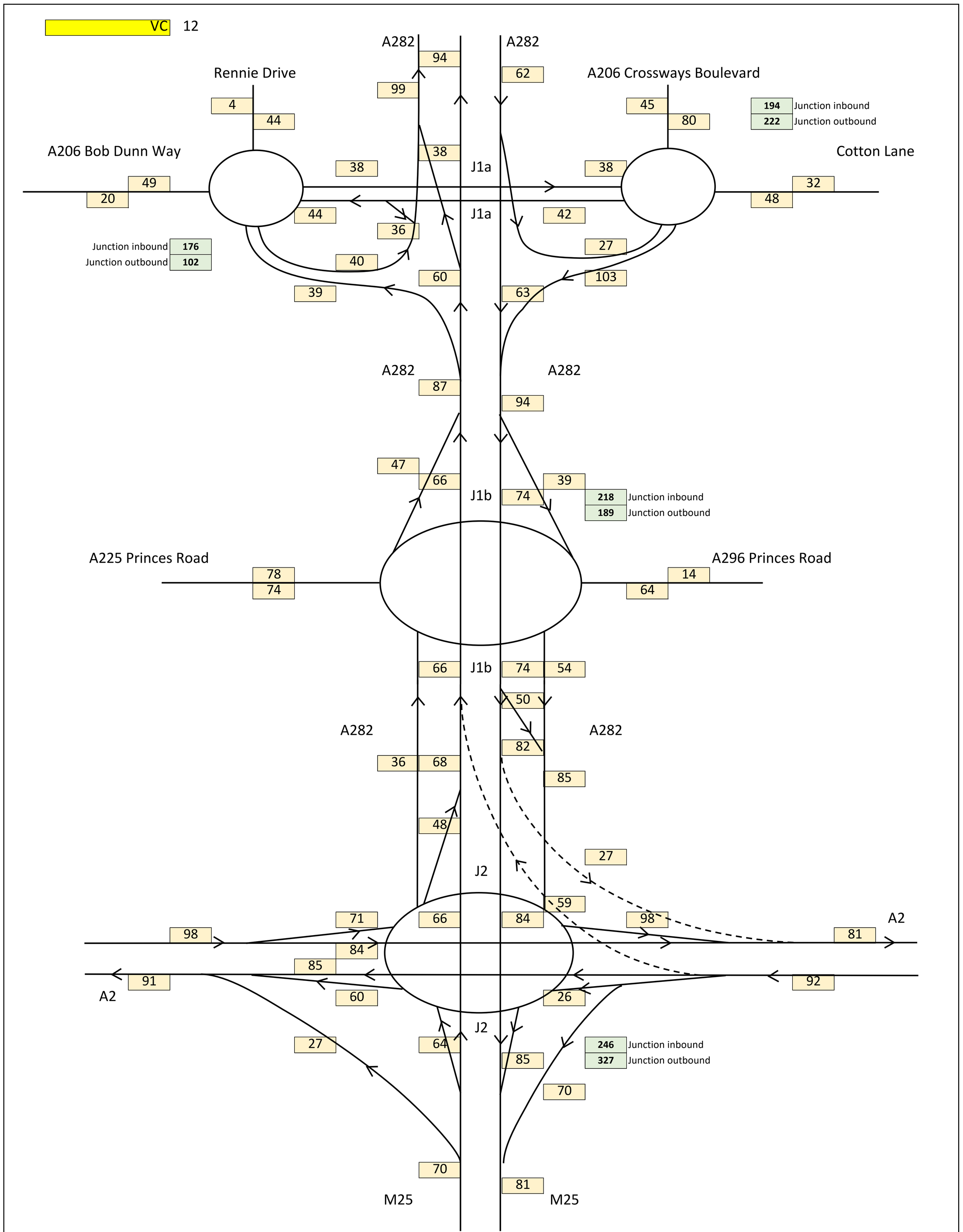
Figure G.10



2038 Local Plan - With LTC (1700-1800)

Link Delay (seconds)

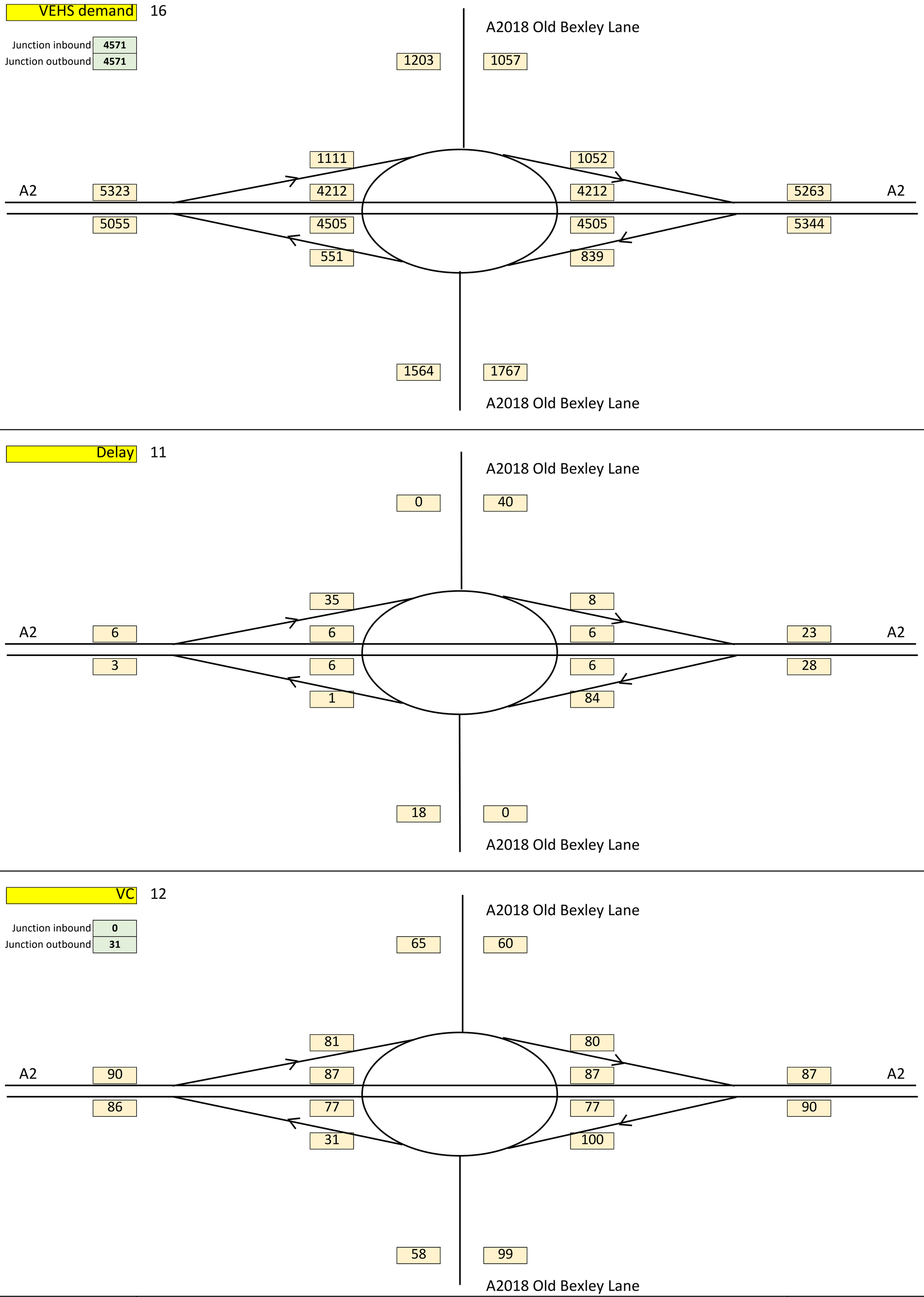
Figure G.11



2038 Local Plan - With LTC (1700-1800)

Link V / C (%)

Figure G.12



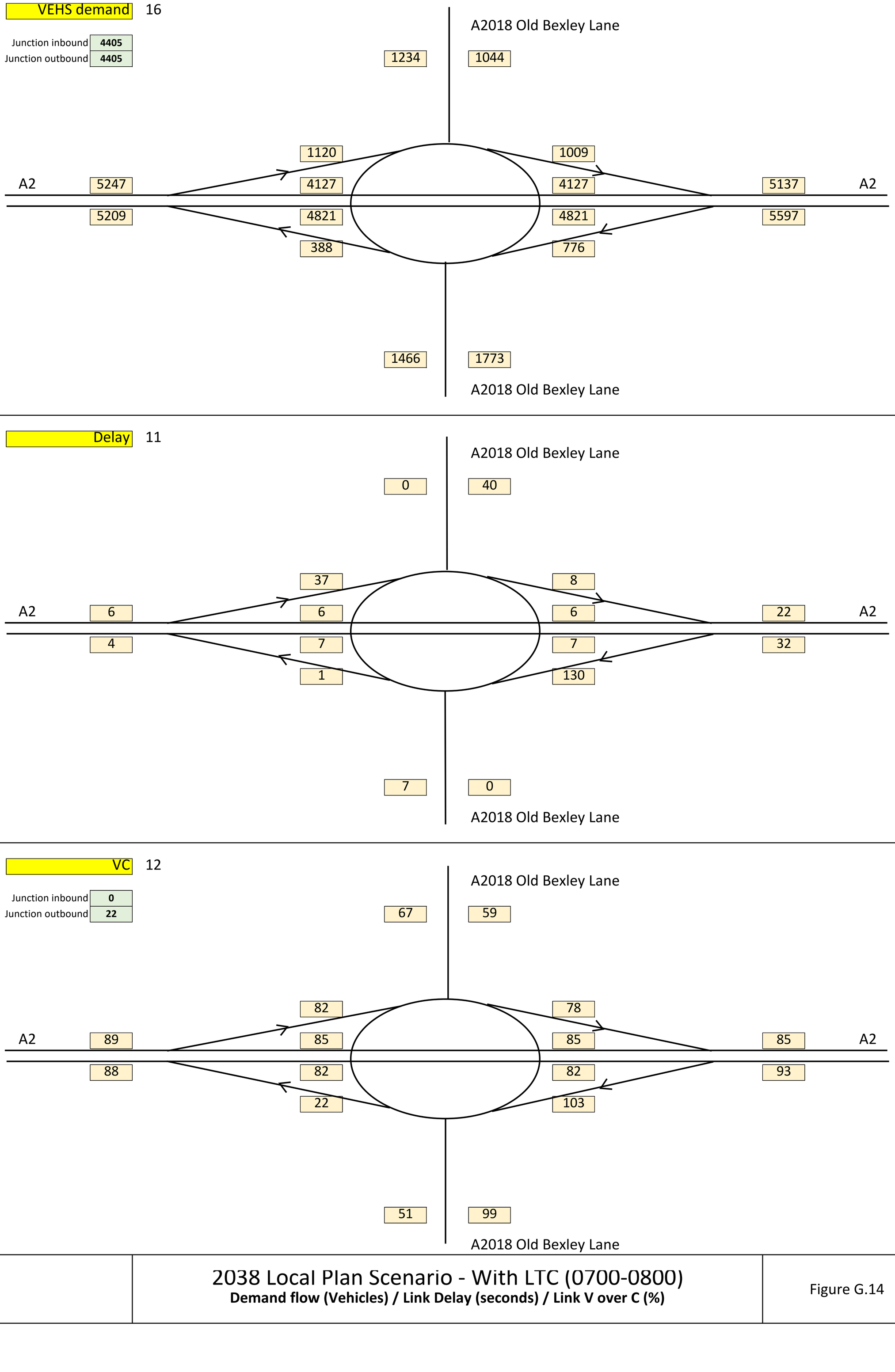
2038 Local Plan Scenario - No LTC (0700-0800)

Demand flow (Vehicles) / Link Delay (seconds) / Link V over C (%)

Figure G.13

VEHS demand 16

Junction inbound 4405
Junction outbound 4405



Delay 11

VC 12

Junction inbound 0
Junction outbound 22

2038 Local Plan Scenario - With LTC (0700-0800)

Demand flow (Vehicles) / Link Delay (seconds) / Link V over C (%)

Figure G.14

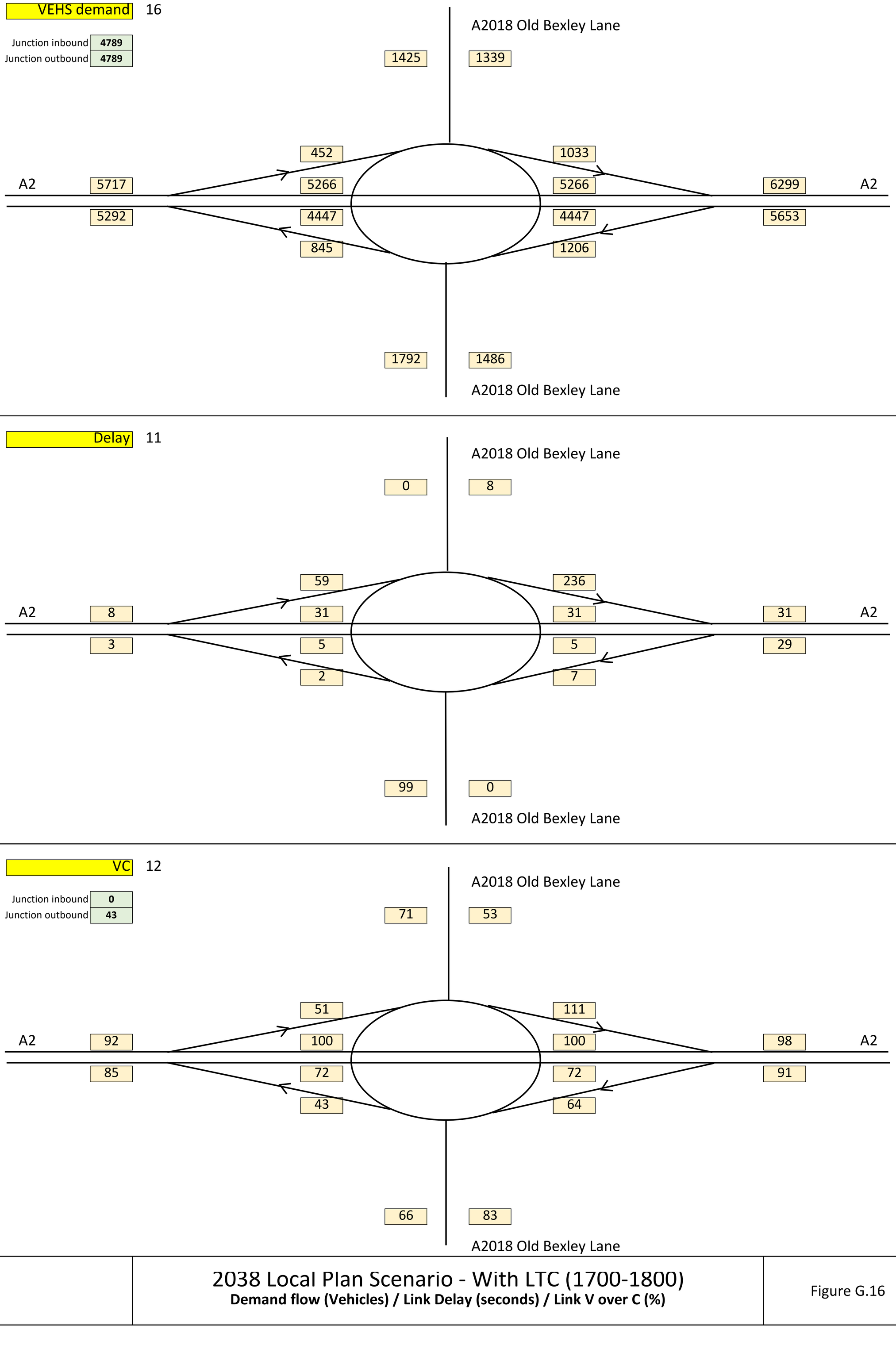
2038 Local Plan Scenario - No LTC (1700-1800)

Demand flow (Vehicles) / Link Delay (seconds) / Link V over C (%)

Figure G.15

VEHS demand 16

Junction inbound 4789
Junction outbound 4789



Delay 11

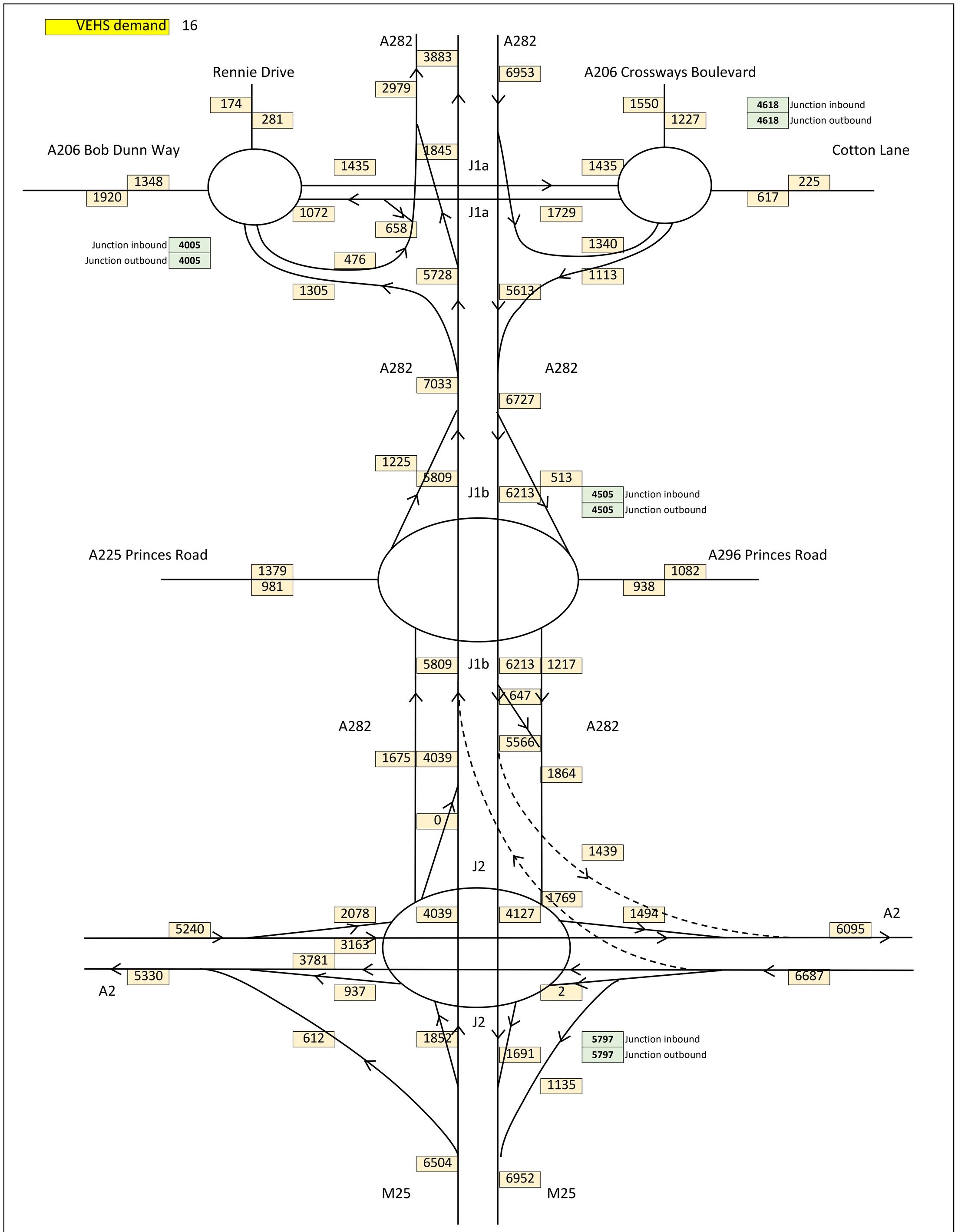
VC 12

Junction inbound 0
Junction outbound 43

2038 Local Plan Scenario - With LTC (1700-1800)

Demand flow (Vehicles) / Link Delay (seconds) / Link V over C (%)

Figure G.16

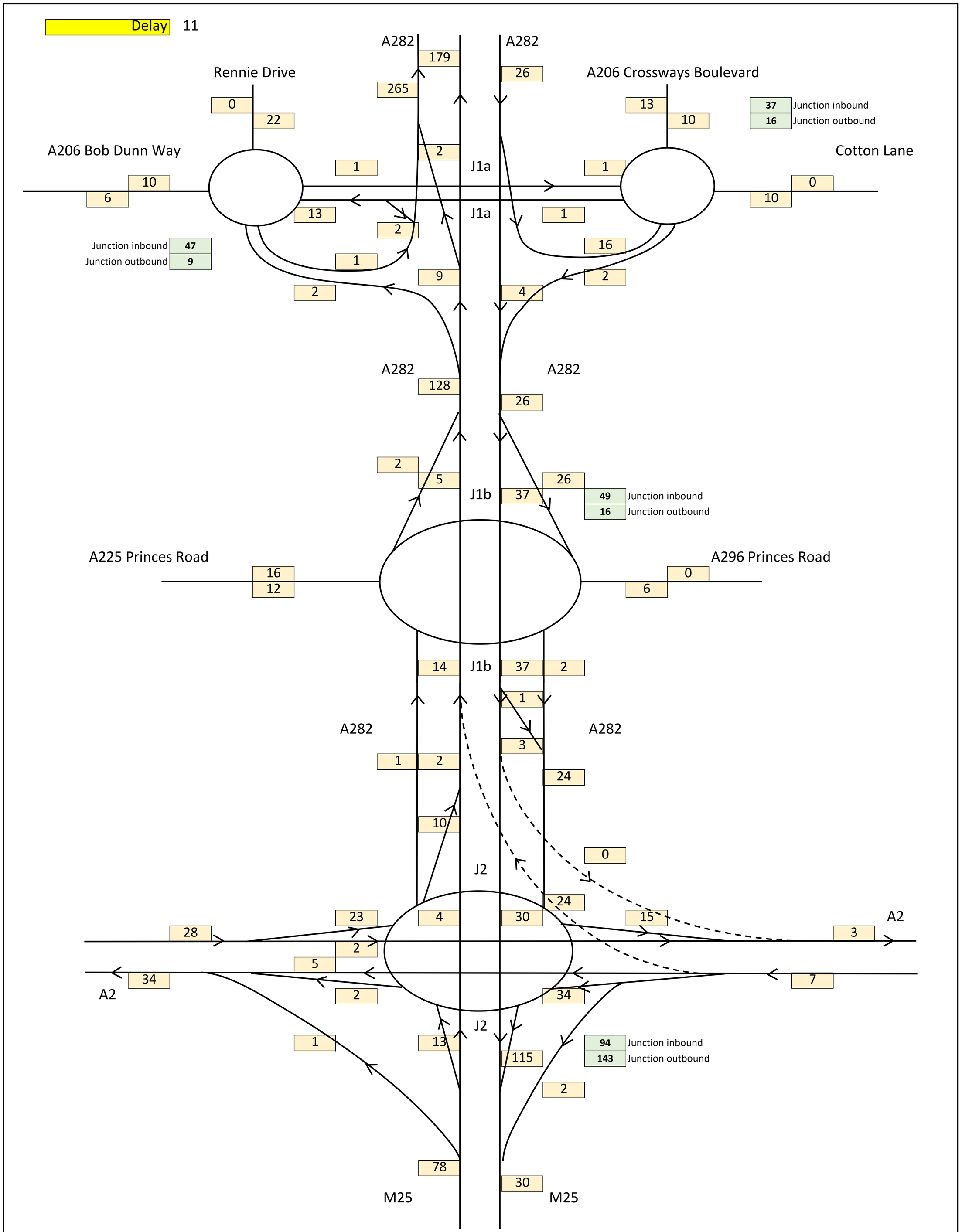


SENSITIVITY ASSESSMENT

2038 Local Plan - No LTC (0700-0800)

Demand flow (Vehicles)

Figure G.1a

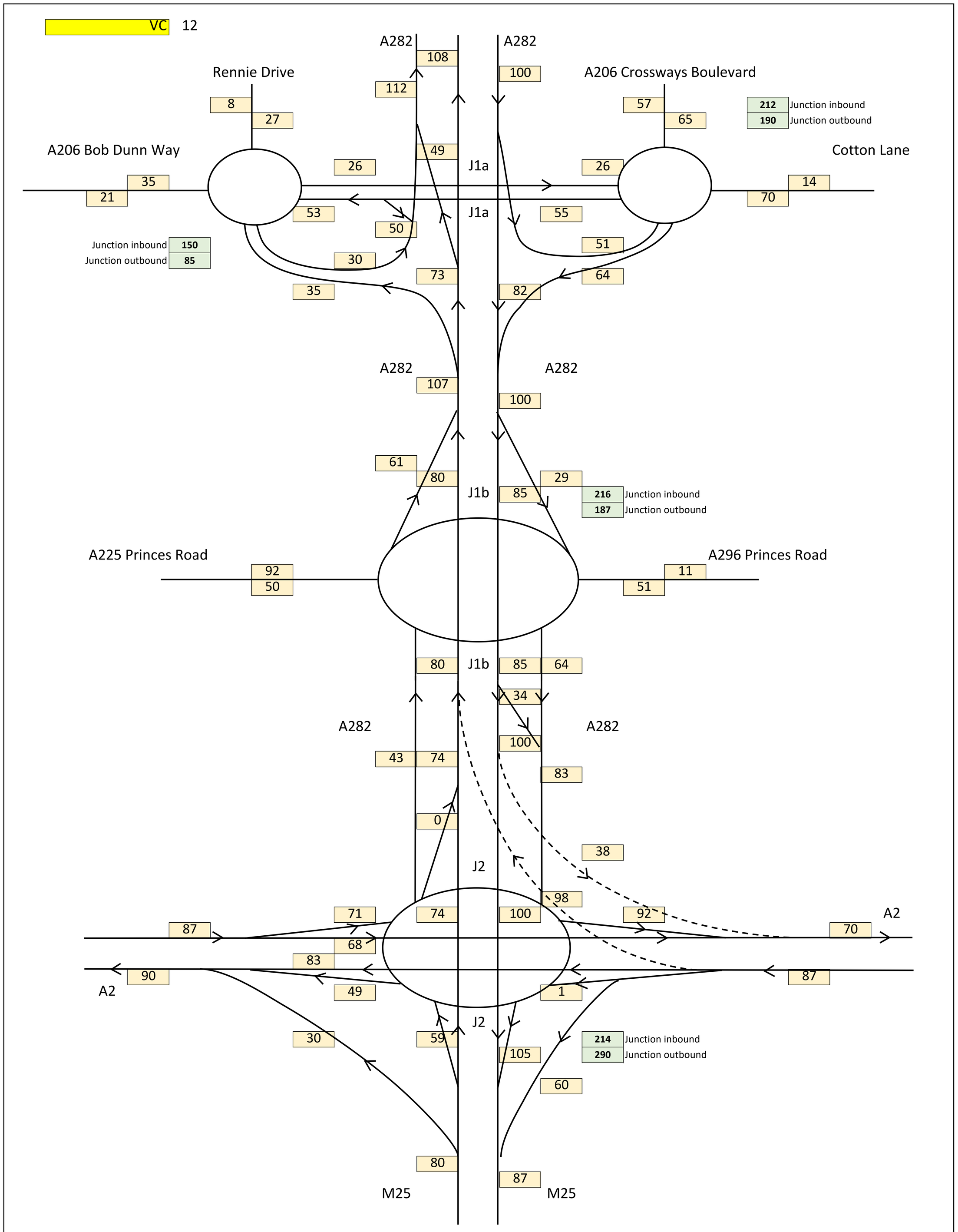


SENSITIVITY ASSESSMENT

2038 Local Plan - No LTC (0700-0800)

Link Delay (seconds)

Figure G.2a

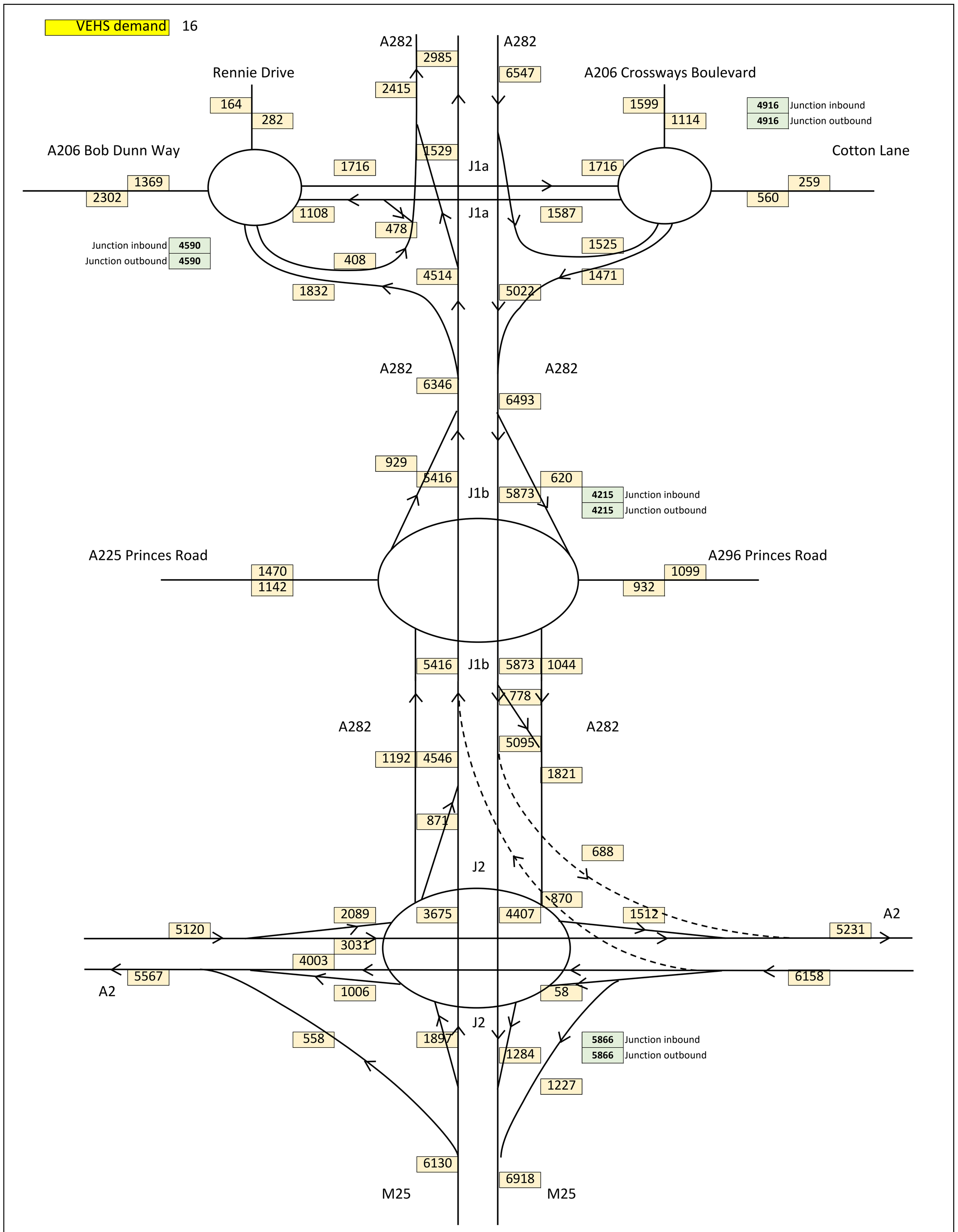


SENSITIVITY ASSESSMENT

2038 Local Plan - No LTC (0700-0800)

Link V / C (%)

Figure G.3a

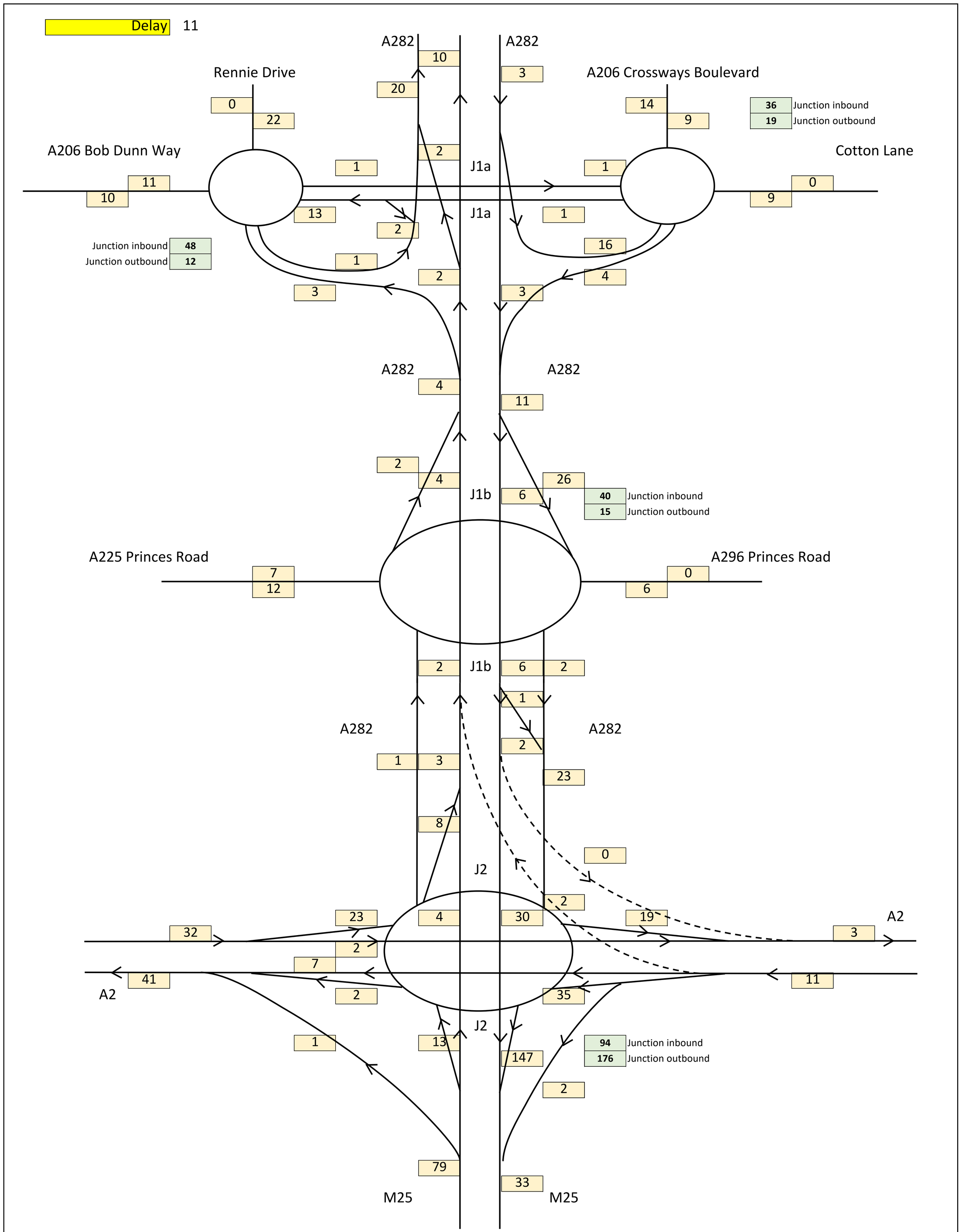


SENSITIVITY ASSESSMENT

2038 Local Plan - With LTC (0700-0800)

Demand flow (Vehicles)

Figure G.4a

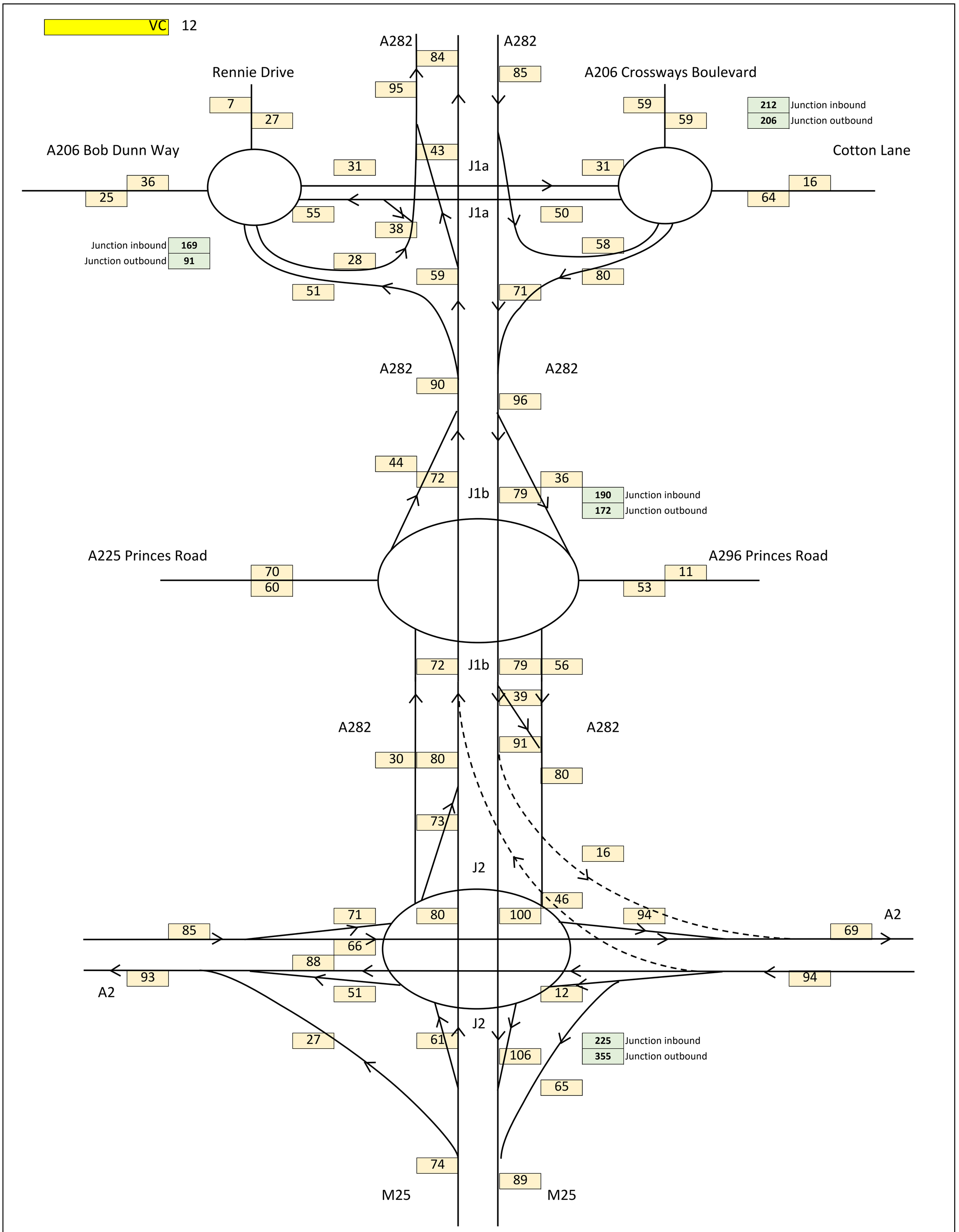


SENSITIVITY ASSESSMENT

2038 Local Plan - With LTC (0700-0800)

Link Delay (seconds)

Figure G.5a

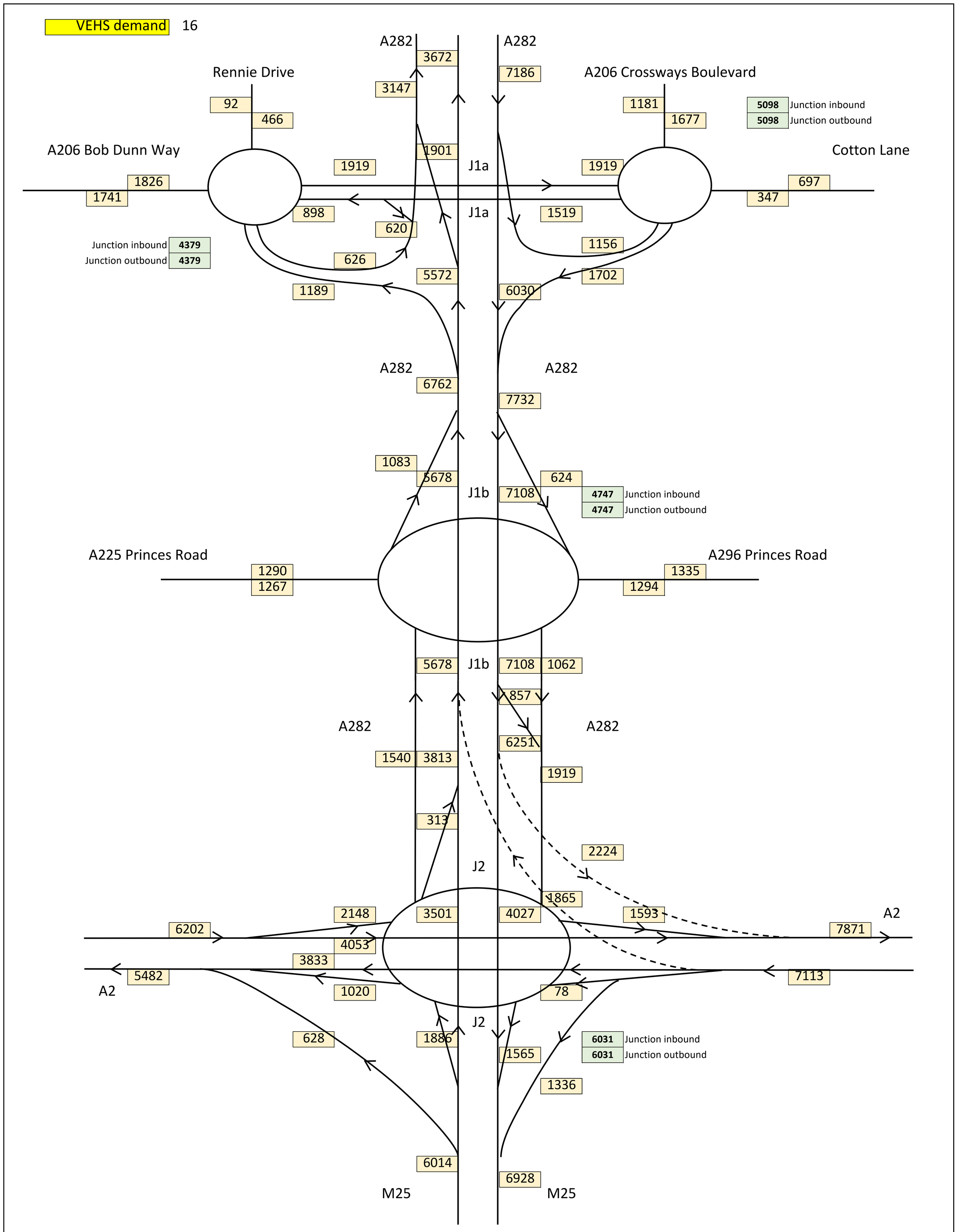


SENSITIVITY ASSESSMENT

2038 Local Plan - With LTC (0700-0800)

Link V / C (%)

Figure G.6a

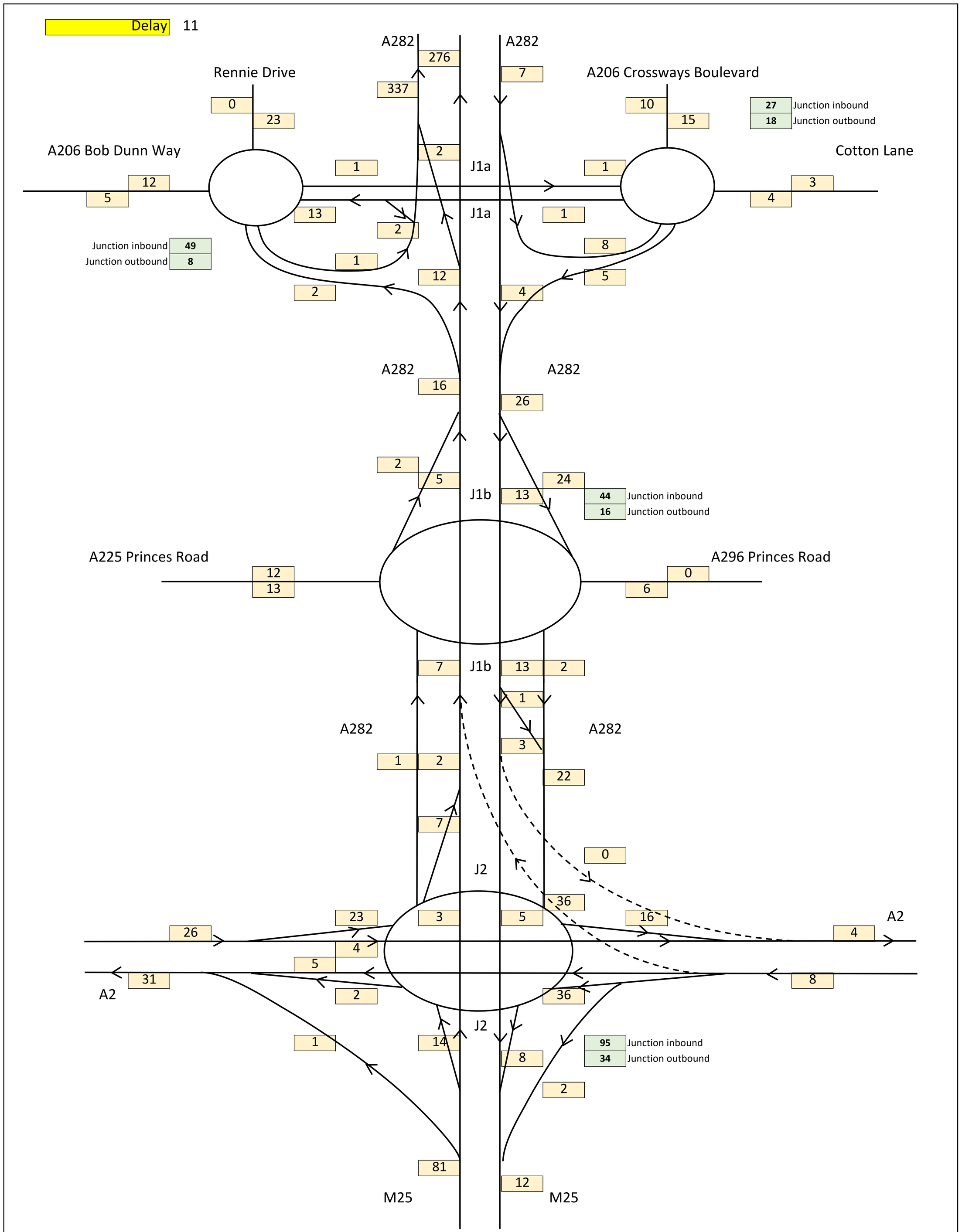


SENSITIVITY ASSESSMENT

2038 Local Plan - No LTC (1700-1800)

Demand flow (Vehicles)

Figure G.7a

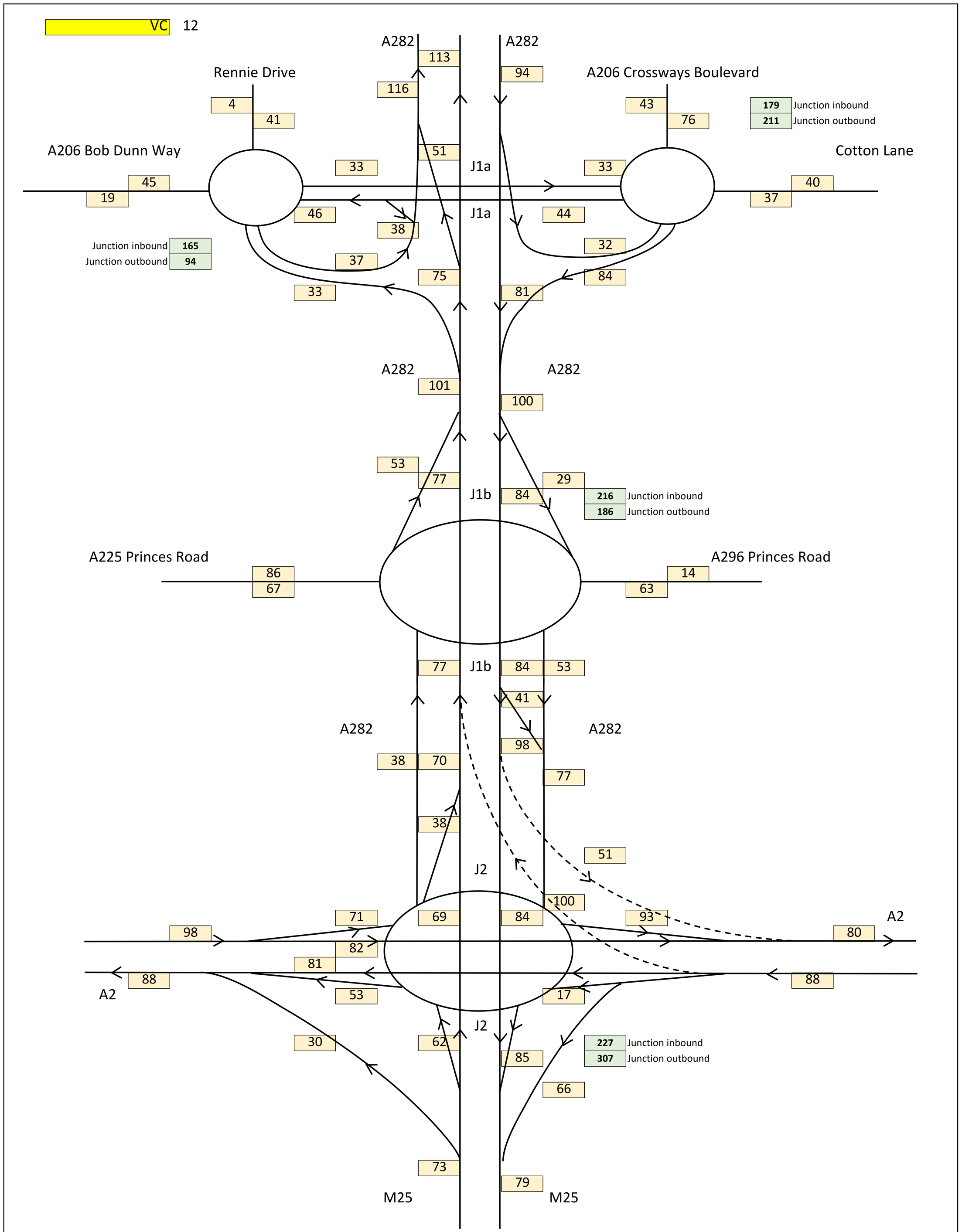


SENSITIVITY ASSESSMENT

2038 Local Plan - No LTC (1700-1800)

Link Delay (seconds)

Figure G.8a

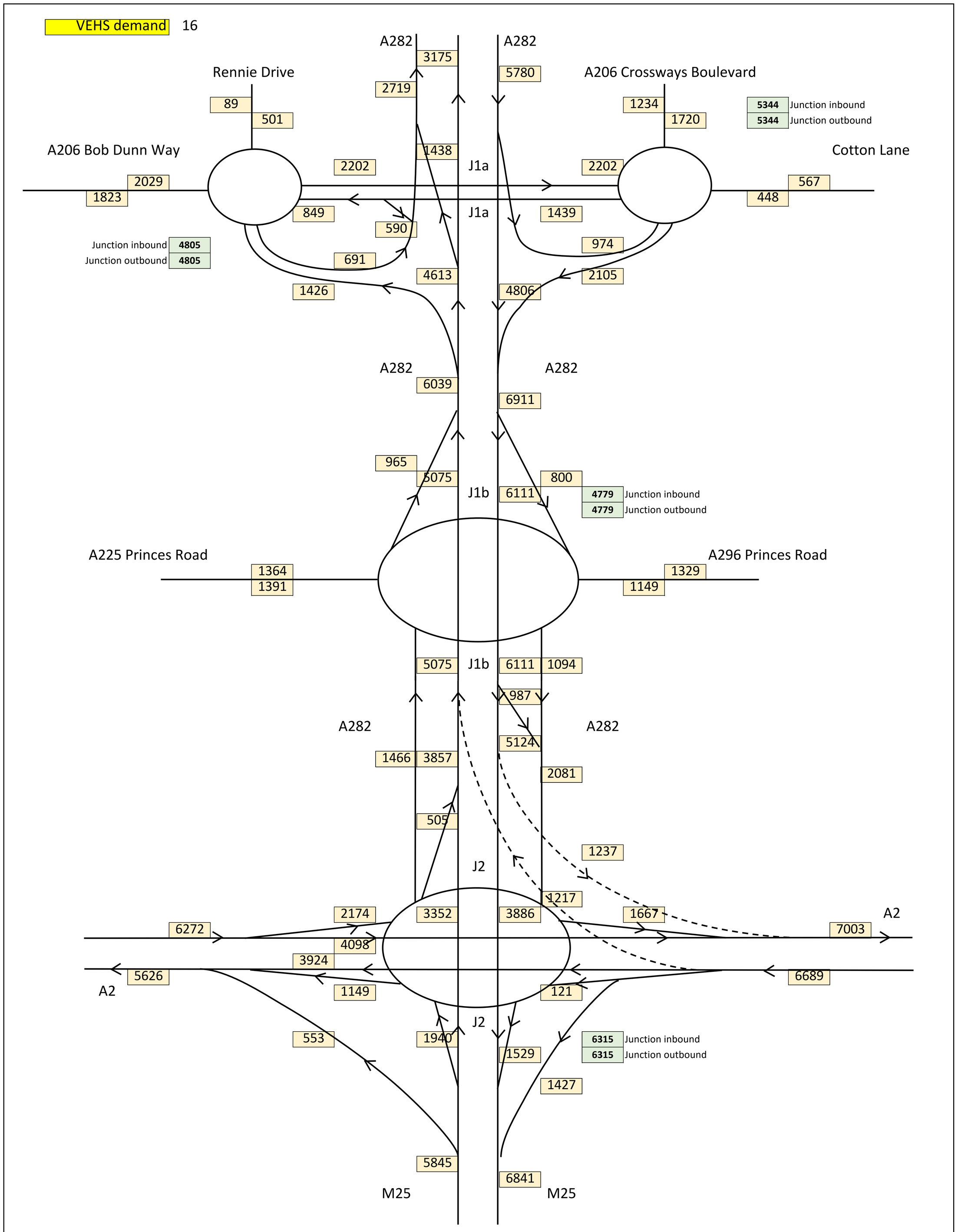


SENSITIVITY ASSESSMENT

2038 Local Plan - No LTC (1700-1800)

Link V / C (%)

Figure G.9a

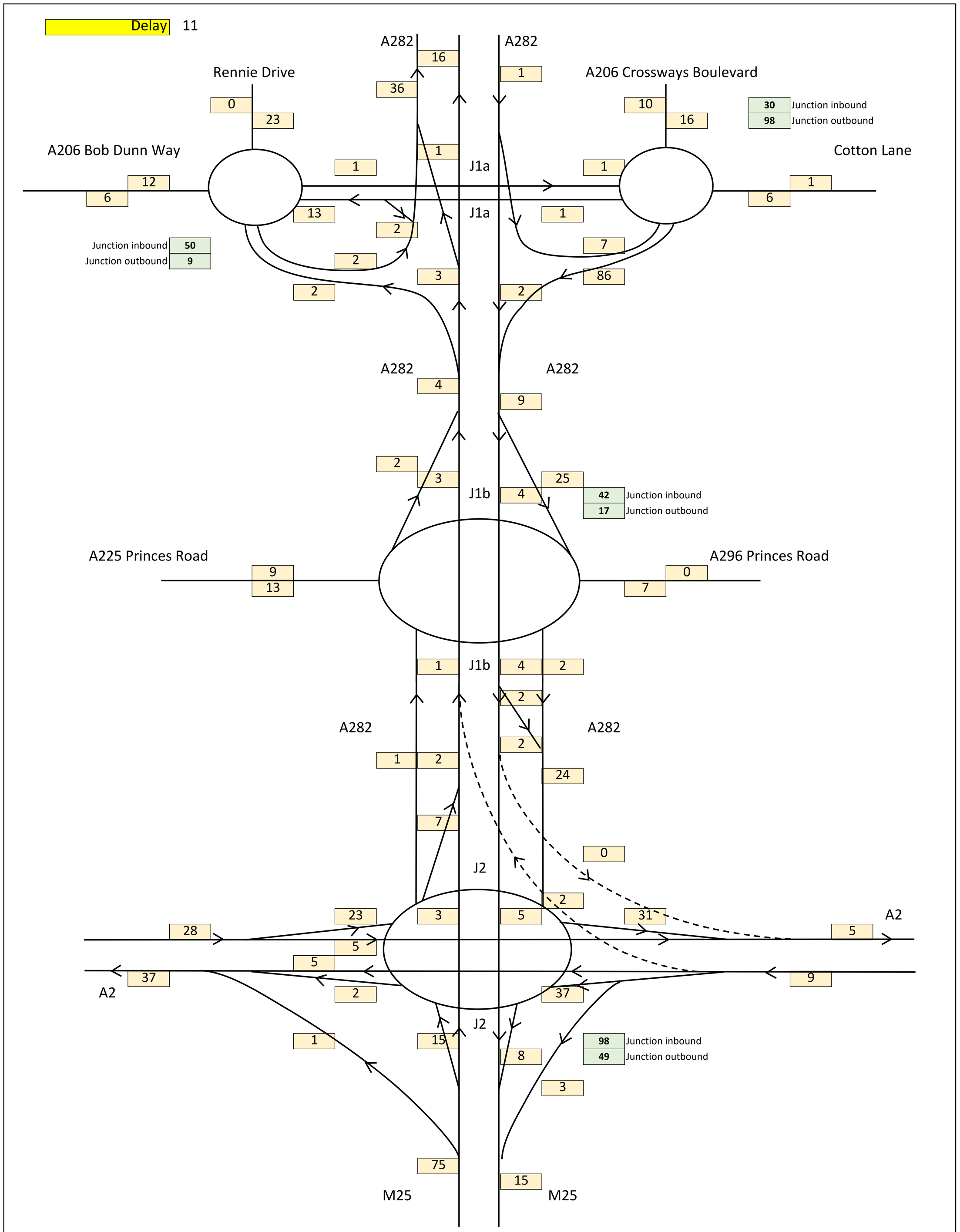


SENSITIVITY ASSESSMENT

2038 Local Plan - With LTC (1700-1800)

Demand flow (Vehicles)

Figure G.10a

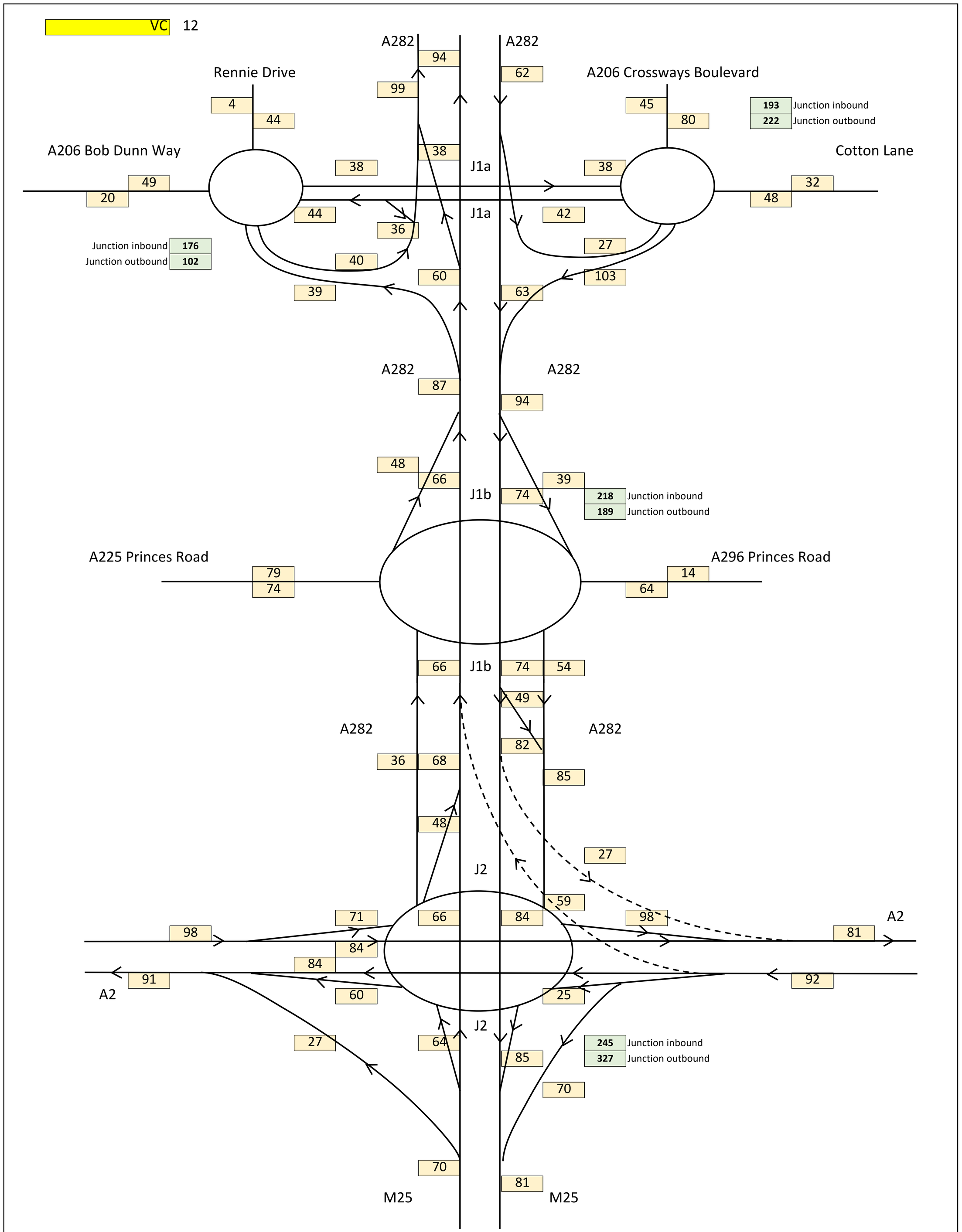


SENSITIVITY ASSESSMENT

2038 Local Plan - With LTC (1700-1800)

Link Delay (seconds)

Figure G.11a

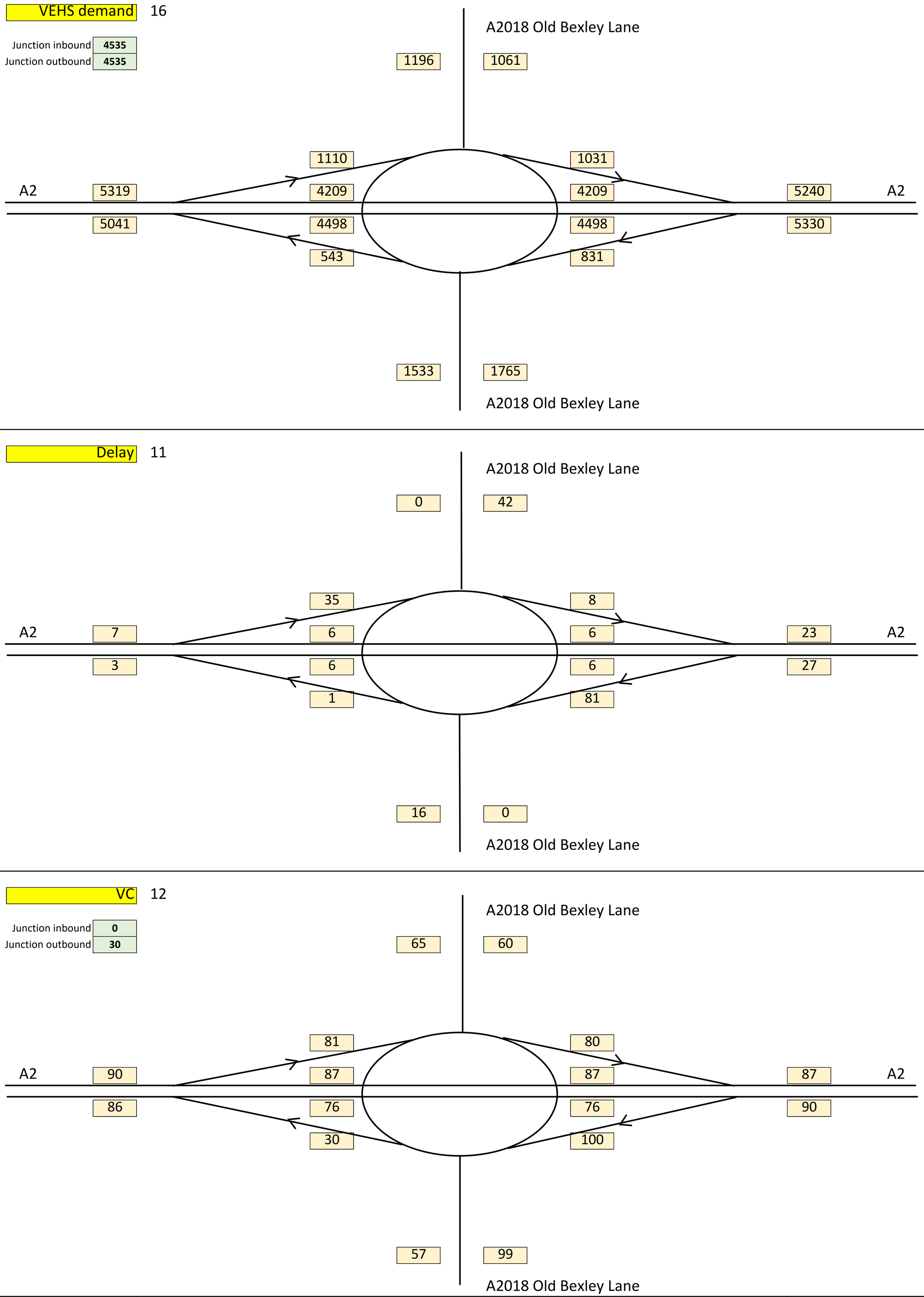


SENSITIVITY ASSESSMENT

2038 Local Plan - With LTC (1700-1800)

Link V / C (%)

Figure G.12a

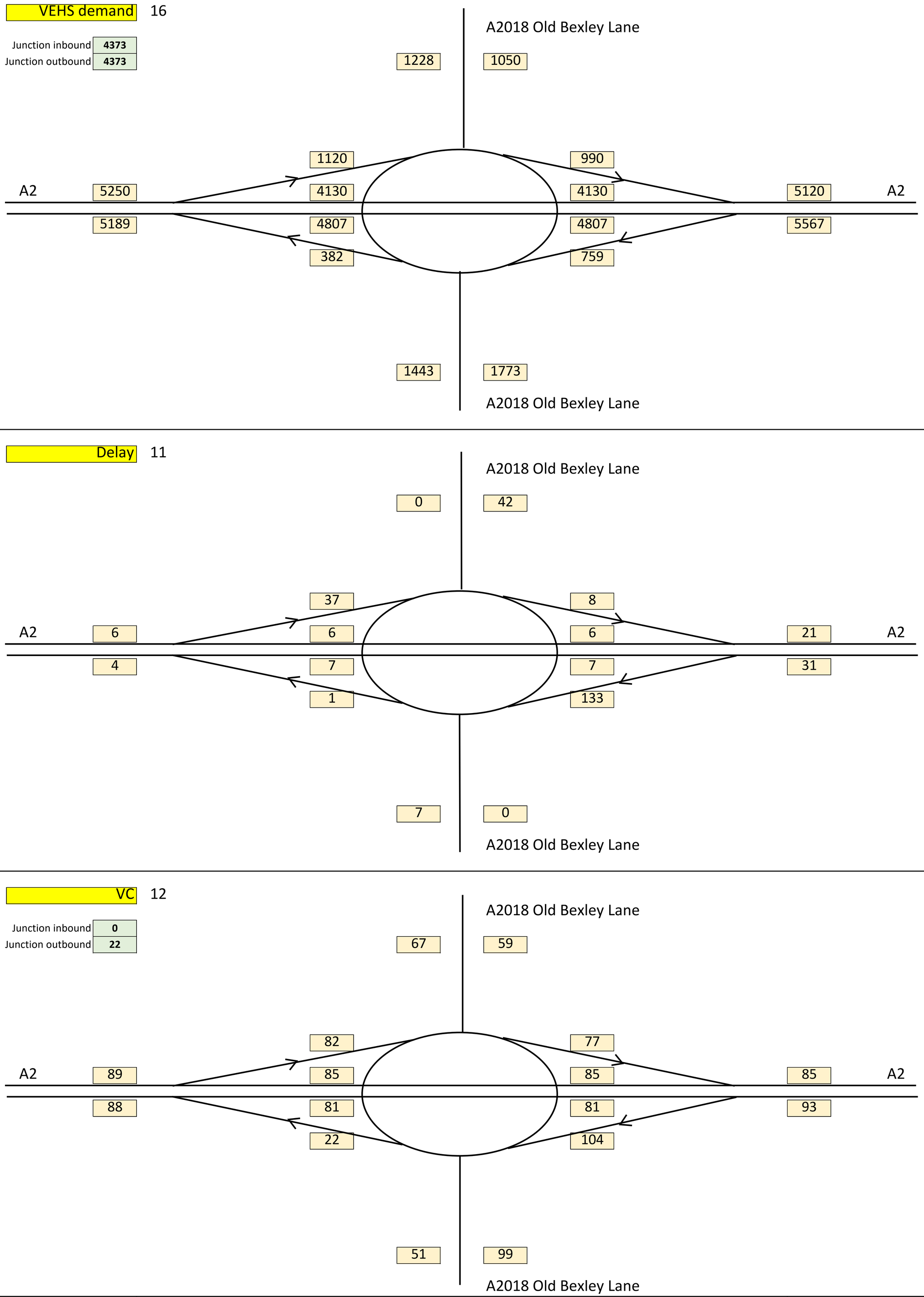


SENSITIVITY ASSESSMENT

2038 Local Plan Scenario - No LTC (0700-0800)

Demand flow (Vehicles) / Link Delay (seconds) / Link V over C (%)

Figure G.13a

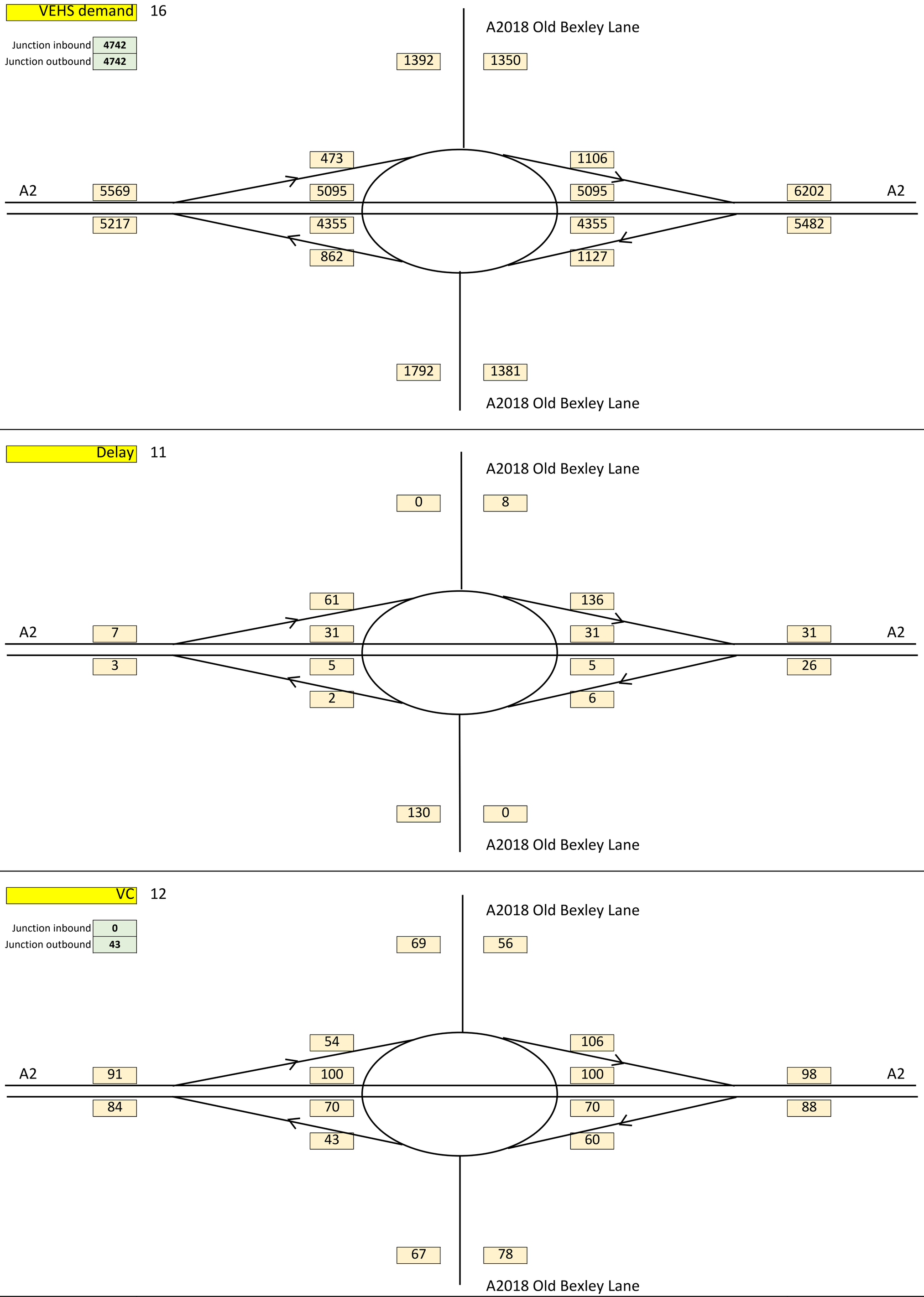


SENSITIVITY ASSESSMENT

2038 Local Plan Scenario - With LTC (0700-0800)

Demand flow (Vehicles) / Link Delay (seconds) / Link V over C (%)

Figure G.14a

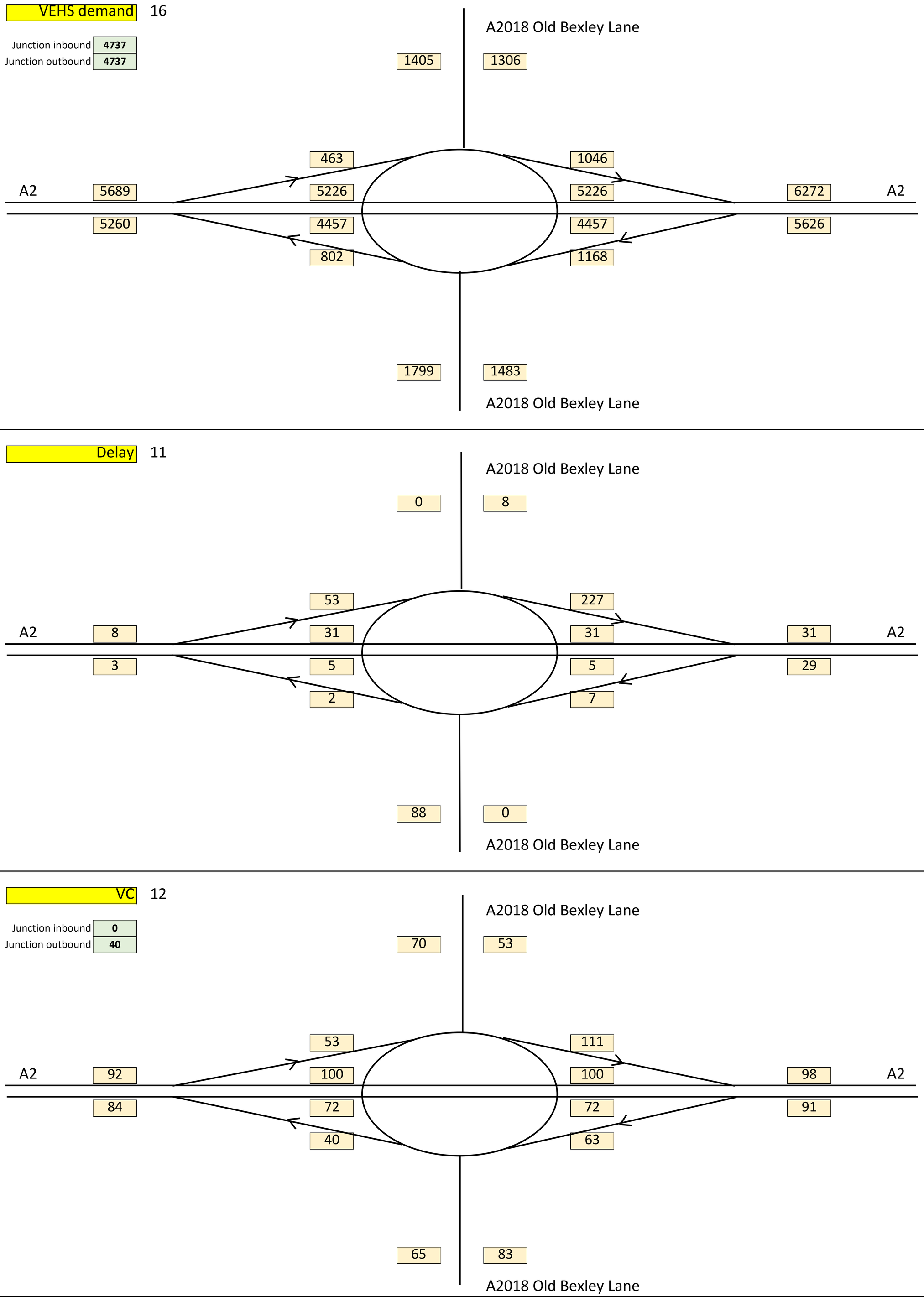


SENSITIVITY ASSESSMENT

2038 Local Plan Scenario - No LTC (1700-1800)

Demand flow (Vehicles) / Link Delay (seconds) / Link V over C (%)

Figure G.15a



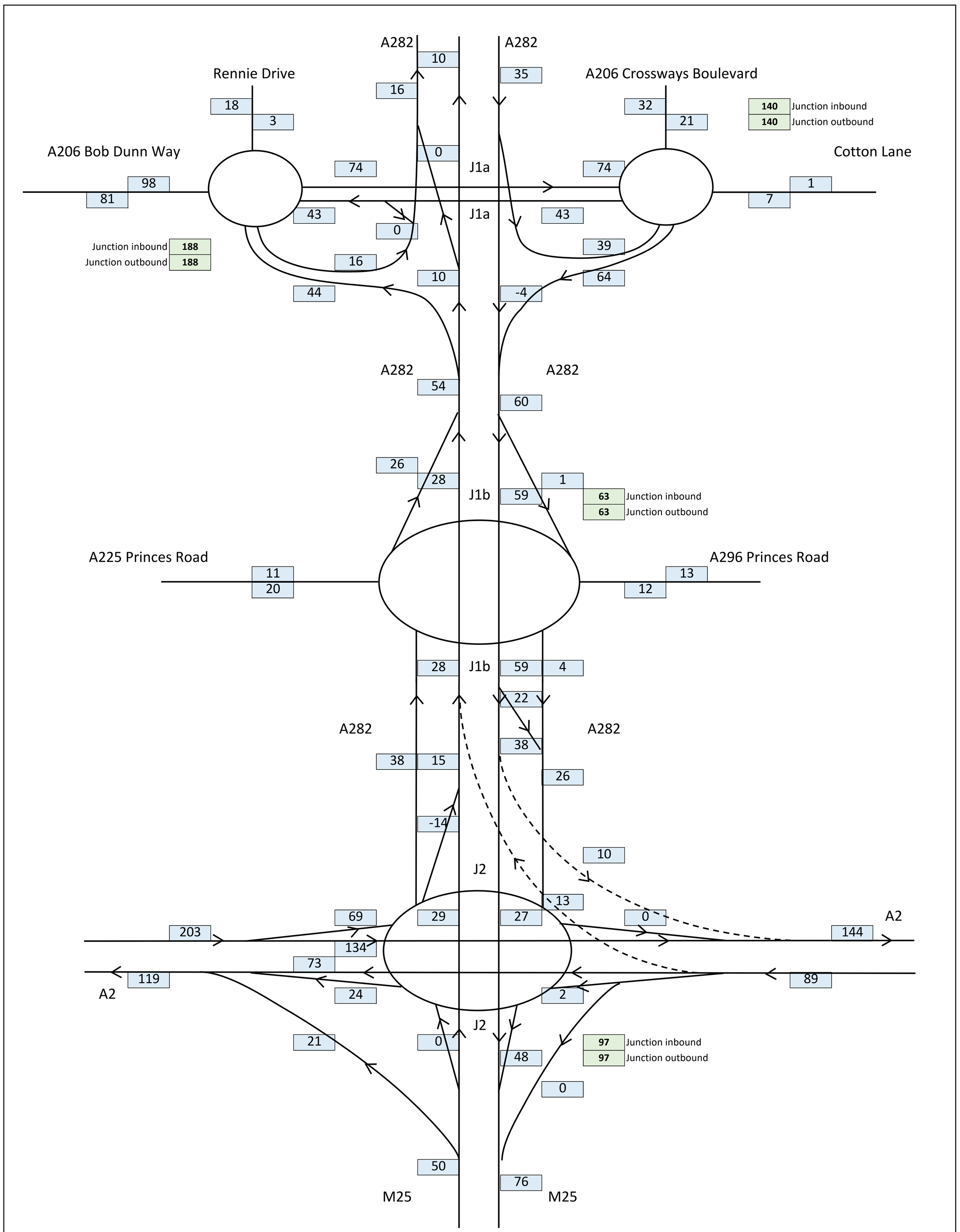
SENSITIVITY ASSESSMENT

2038 Local Plan Scenario - With LTC (1700-1800)

Demand flow (Vehicles) / Link Delay (seconds) / Link V over C (%)

Figure G.16a

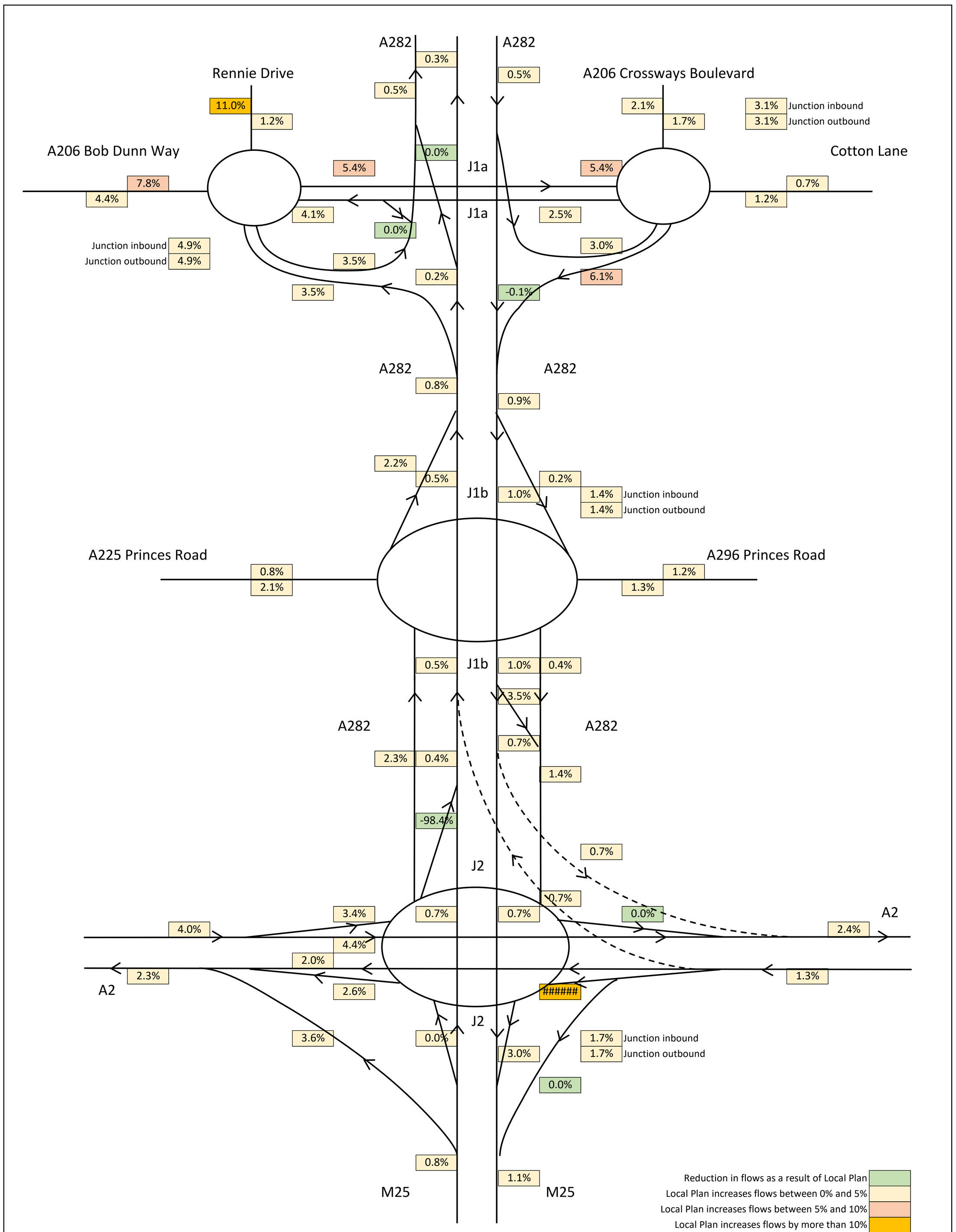
Appendix H
Reference Case vs Local Plan differences



2038 Reference Case / Local Plan - No LTC (0700-0800)

Difference in demand flow (Vehicles)

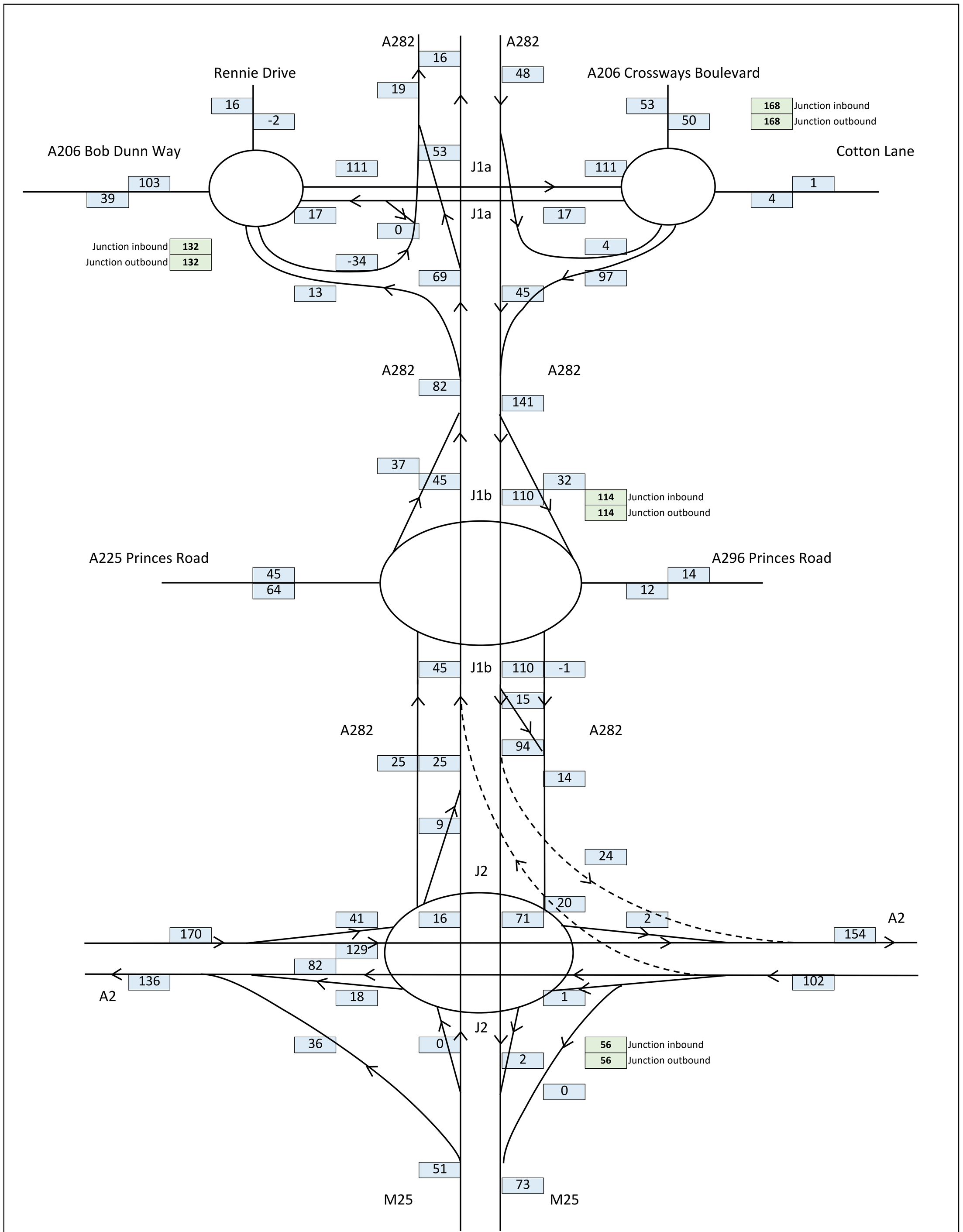
Figure H.1



2038 Reference Case / Local Plan - No LTC (0700-0800)

Difference in demand flow (% Vehicles)

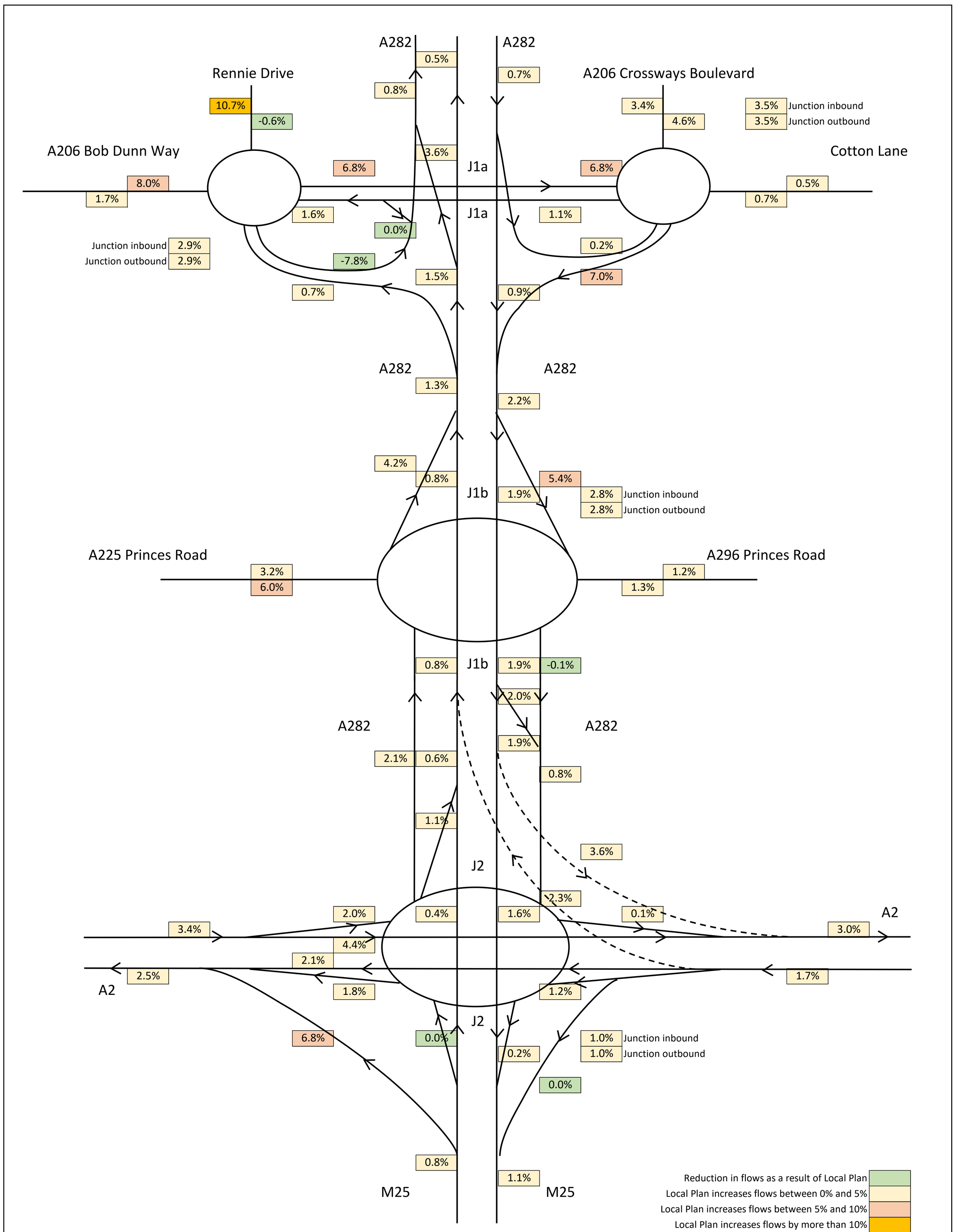
Figure H.2



2038 Reference Case / Local Plan - With LTC (0700-0800)

Difference in demand flow (Vehicles)

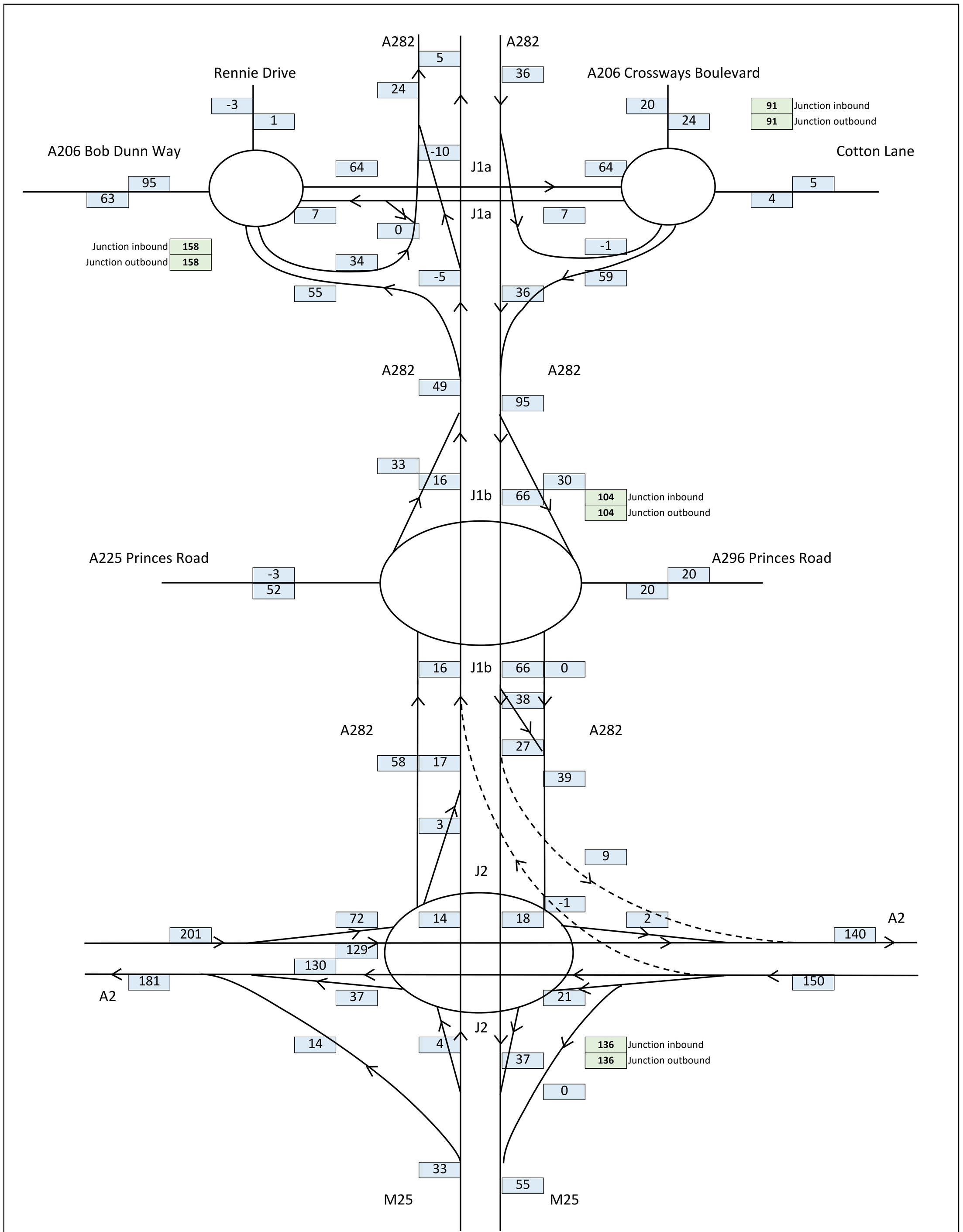
Figure H.3



2038 Reference Case / Local Plan - With LTC (0700-0800)

Difference in demand flow (% Vehicles)

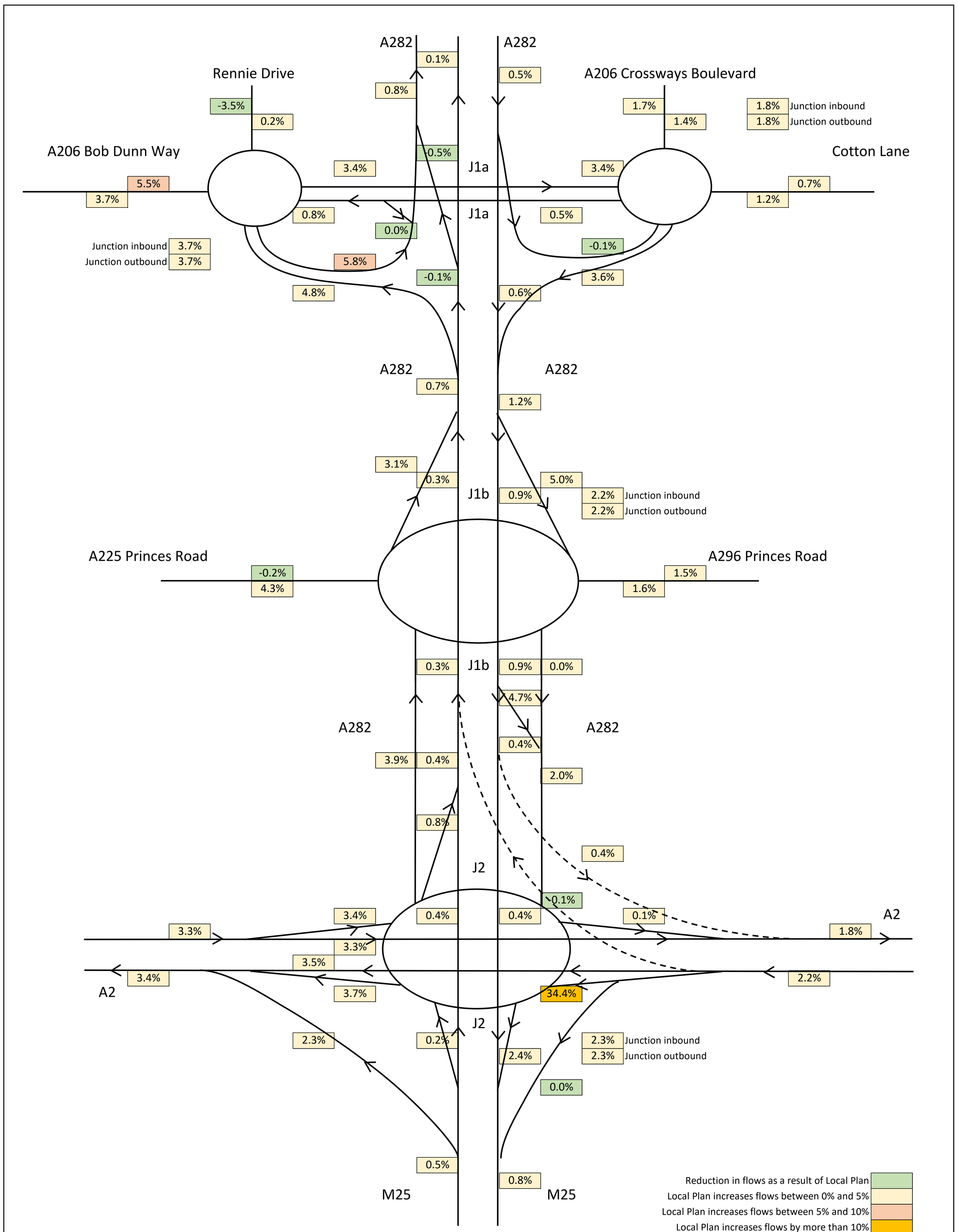
Figure H.4



2038 Reference Case / Local Plan - No LTC (1700-1800)

Difference in demand flow (Vehicles)

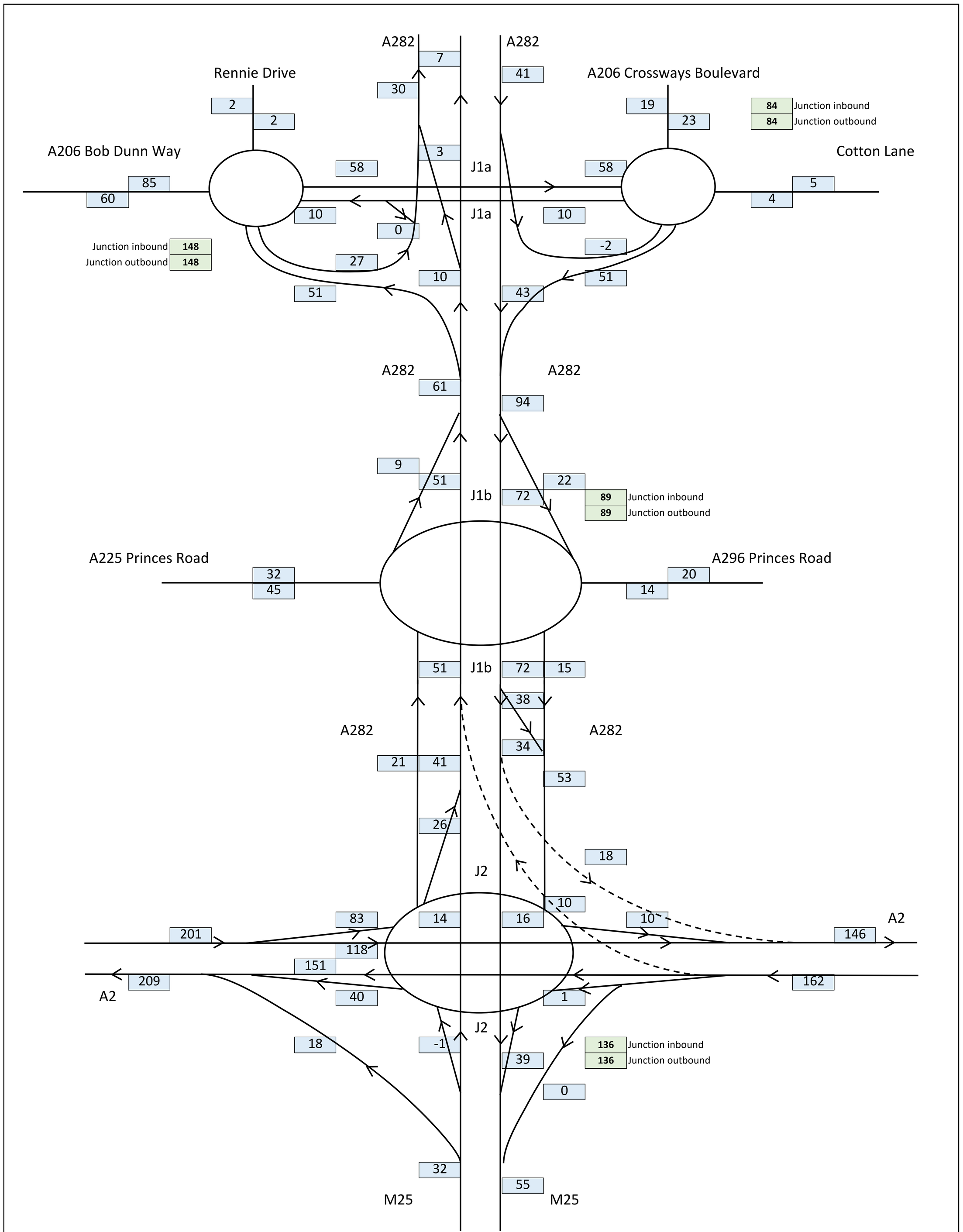
Figure H.5



2038 Reference Case / Local Plan - No LTC (1700-1800)

Difference in demand flow (% Vehicles)

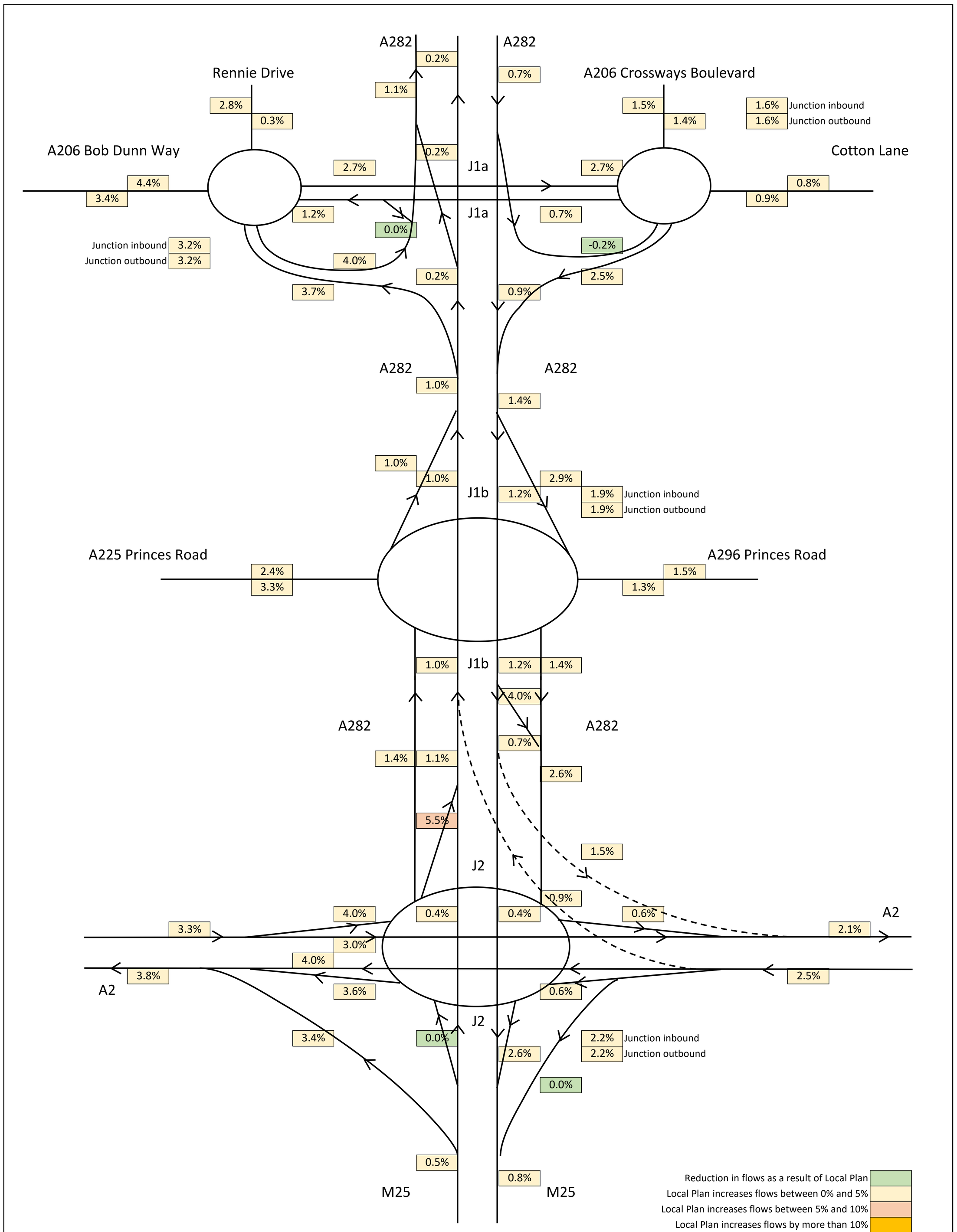
Figure H.6



2038 Reference Case / Local Plan - With LTC (1700-1800)

Difference in demand flow (Vehicles)

Figure H.7

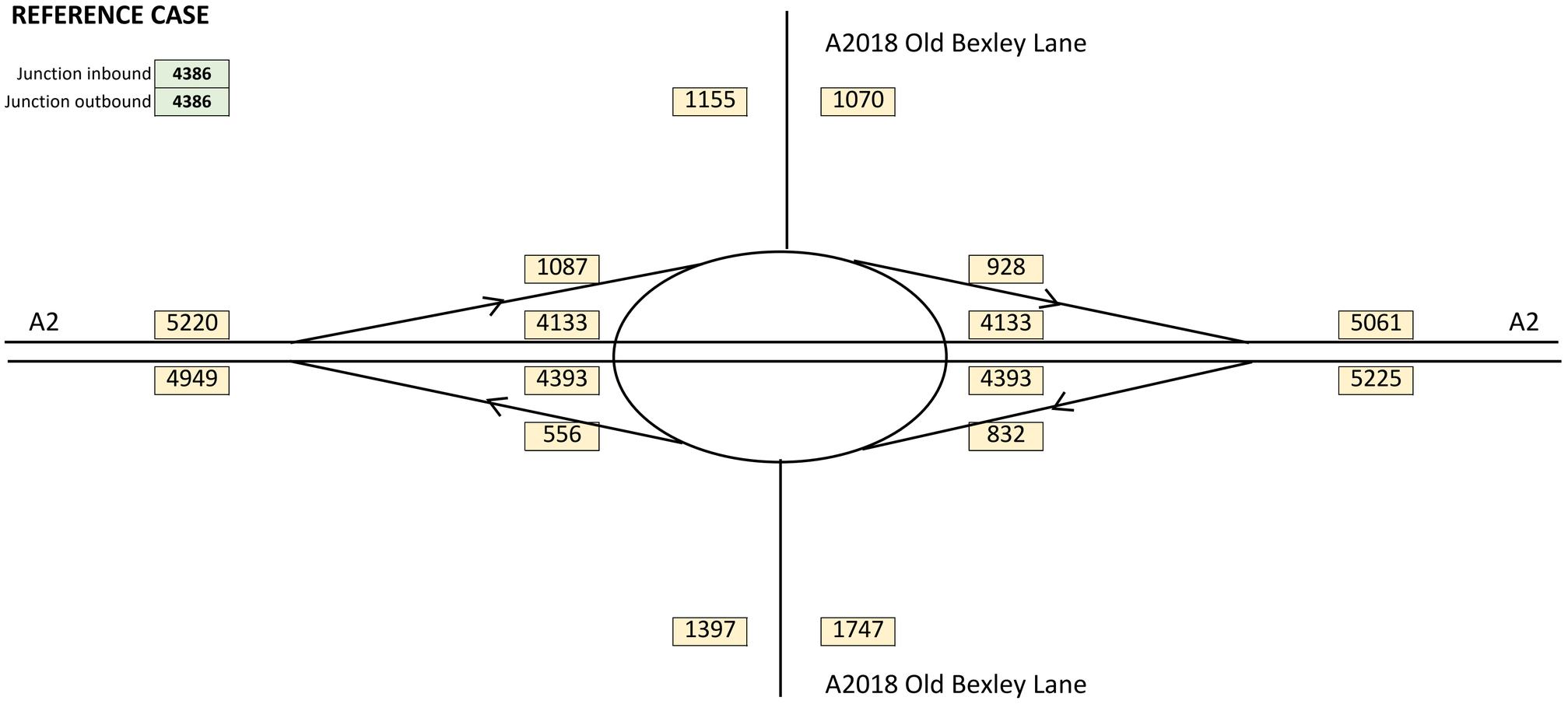


2038 Reference Case / Local Plan - With LTC (1700-1800)

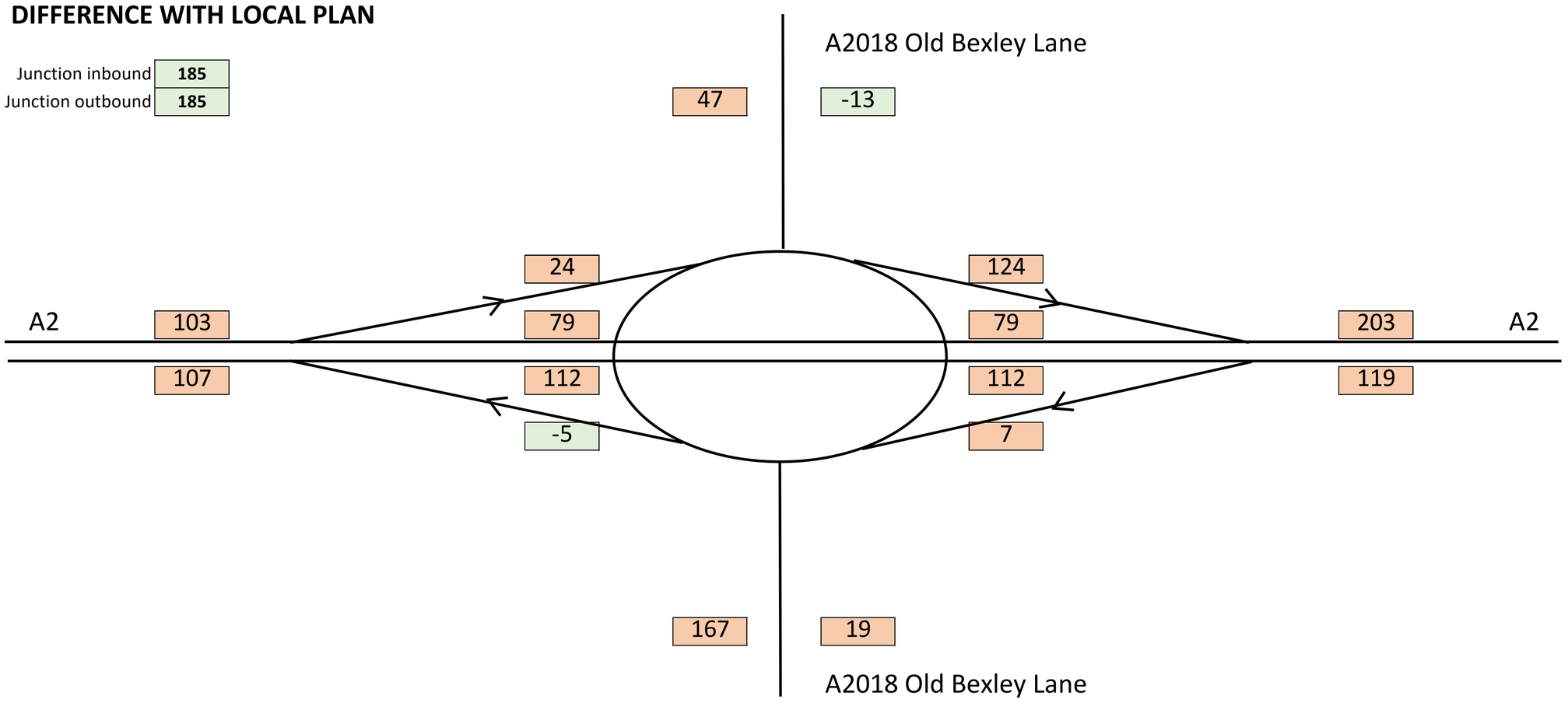
Difference in demand flow (% Vehicles)

Figure H.8

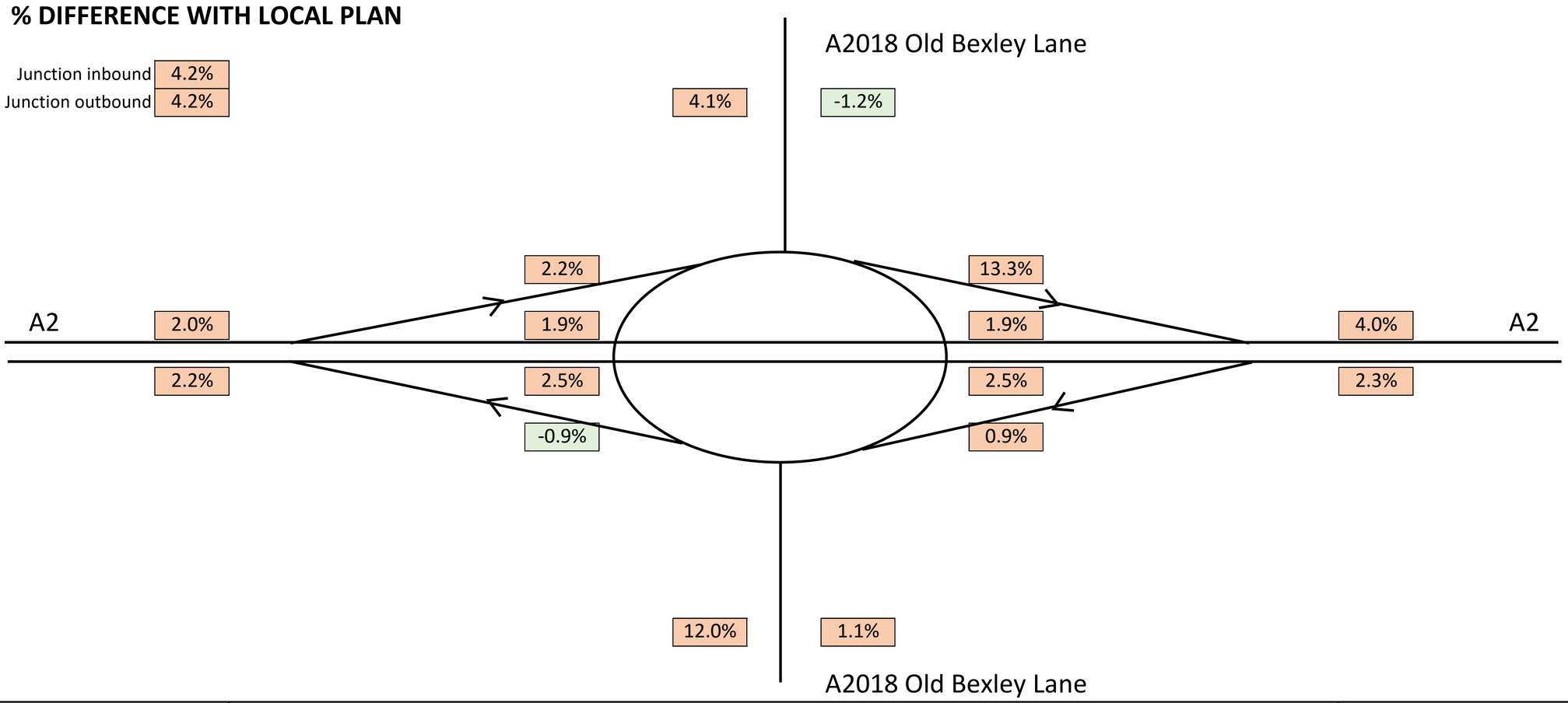
REFERENCE CASE



DIFFERENCE WITH LOCAL PLAN



% DIFFERENCE WITH LOCAL PLAN

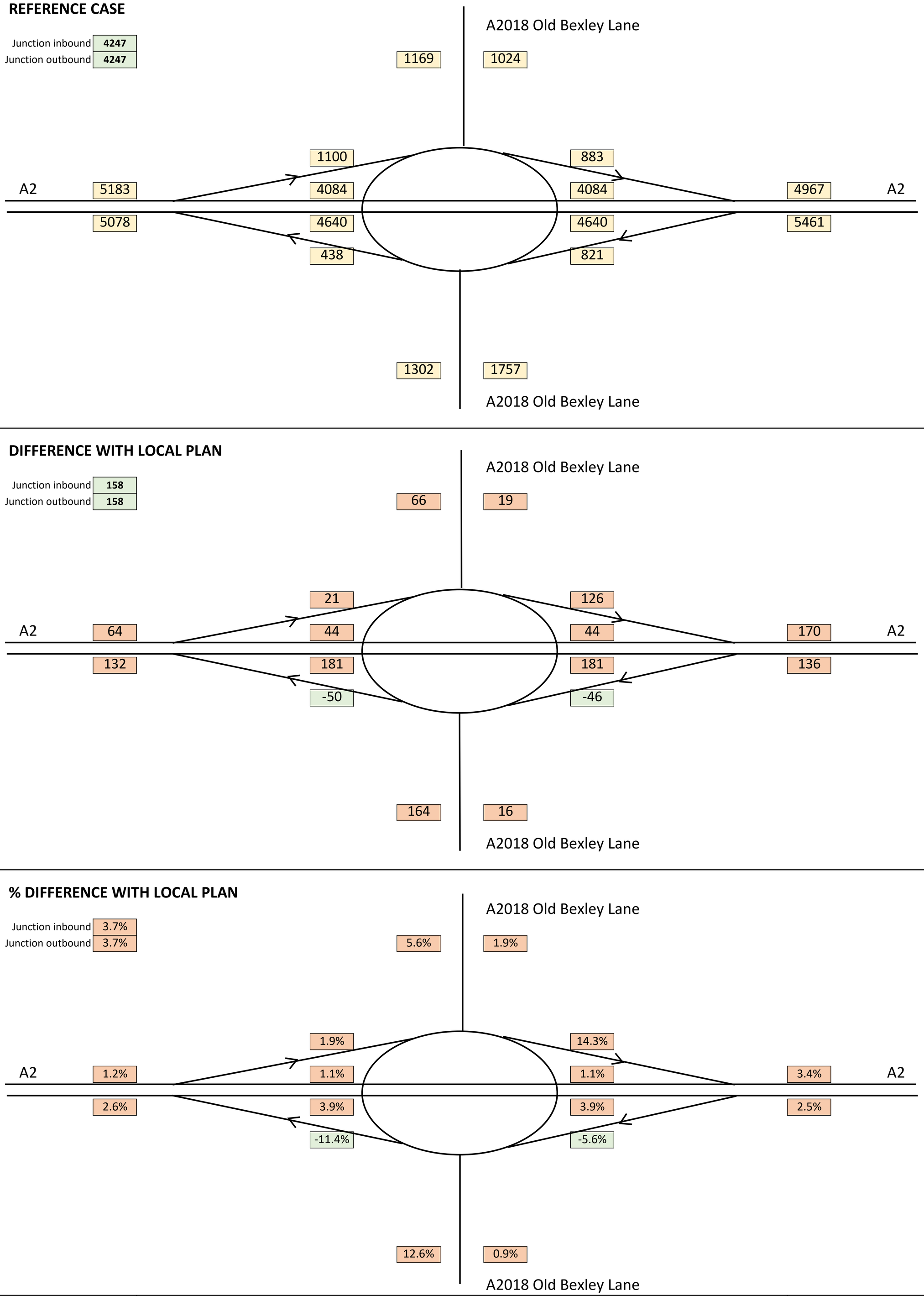


2038 Reference Case / Local Plan - No LTC (0700-0800)

Difference in demand flow (Vehicles)

Figure H.9

REFERENCE CASE



DIFFERENCE WITH LOCAL PLAN

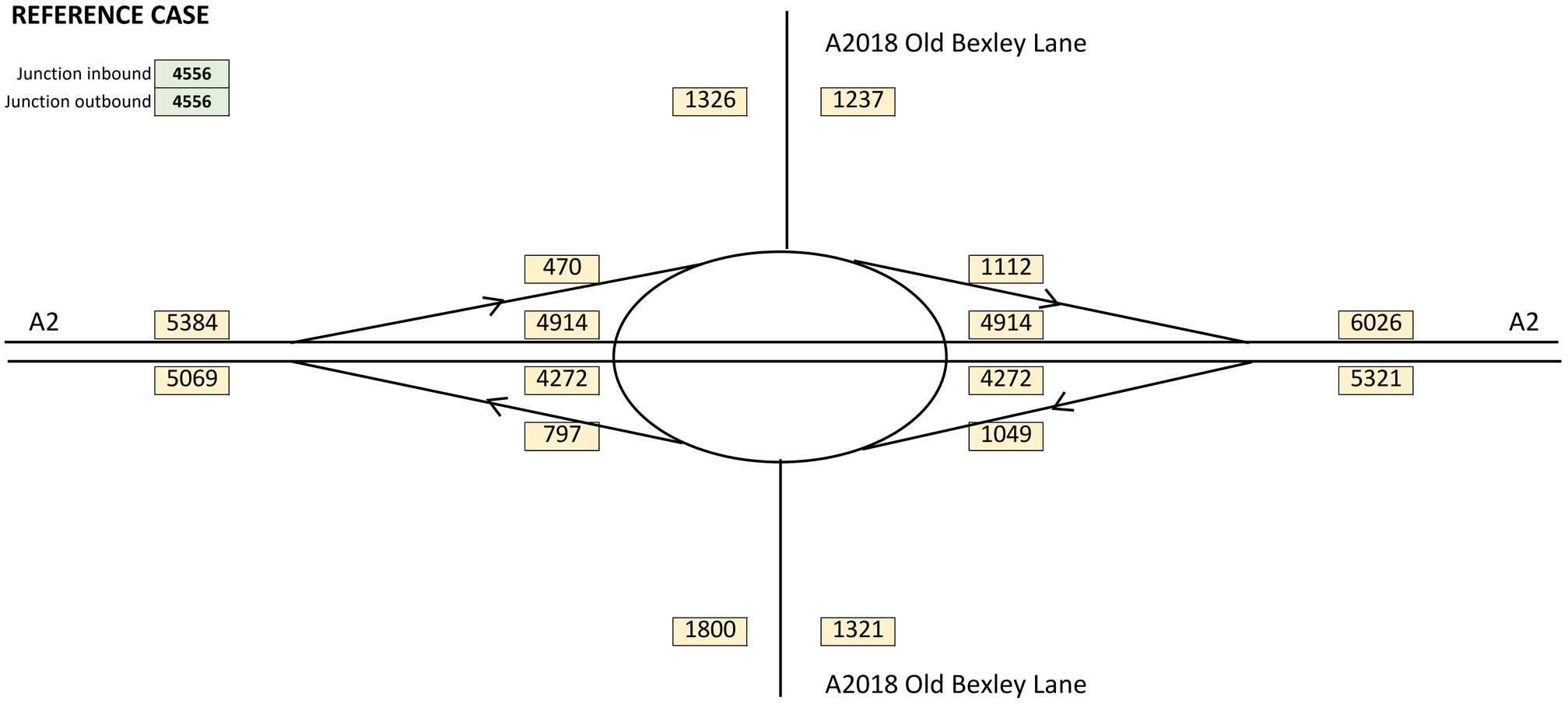
% DIFFERENCE WITH LOCAL PLAN

2038 Reference Case / Local Plan - With LTC (0700-0800)

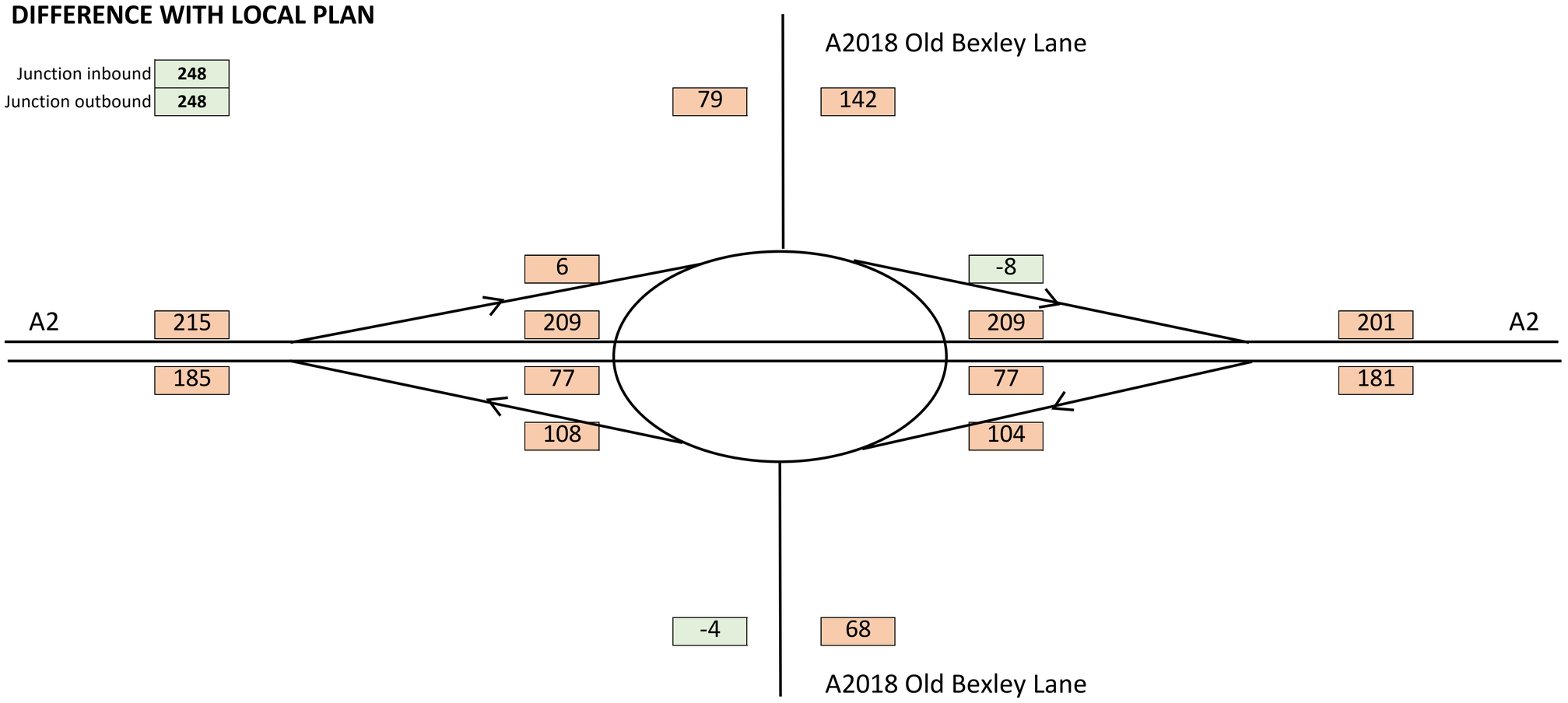
Difference in demand flow (Vehicles)

Figure H.10

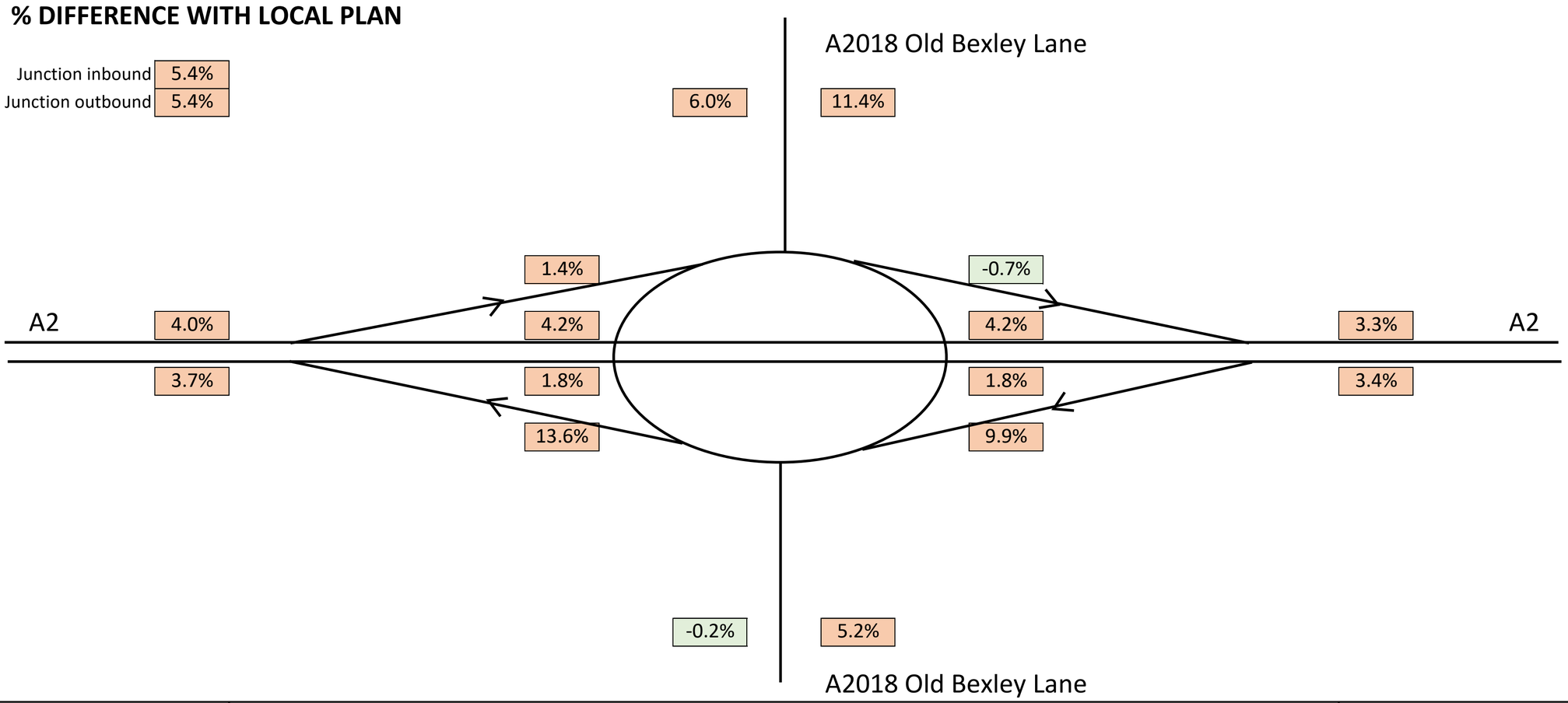
REFERENCE CASE



DIFFERENCE WITH LOCAL PLAN



% DIFFERENCE WITH LOCAL PLAN

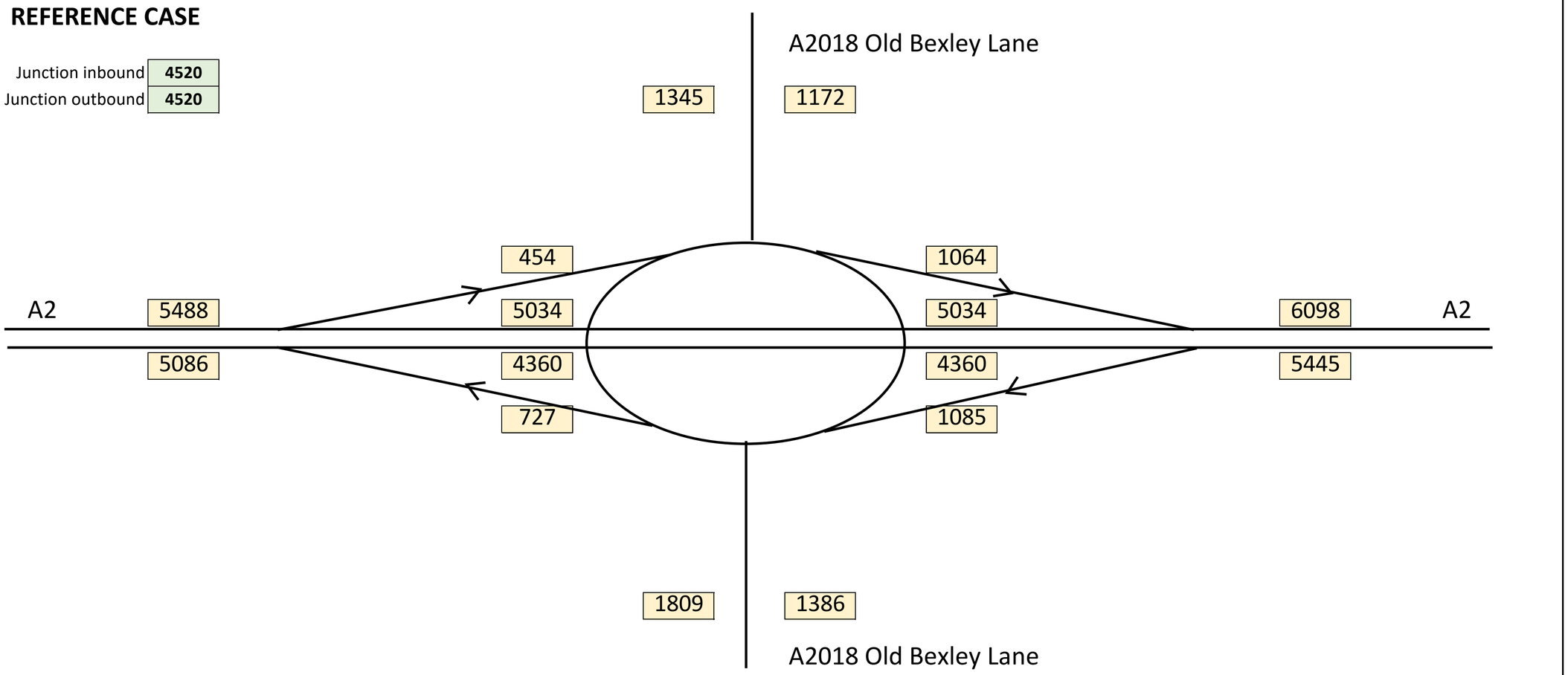


2038 Reference Case / Local Plan - No LTC (0700-0800)

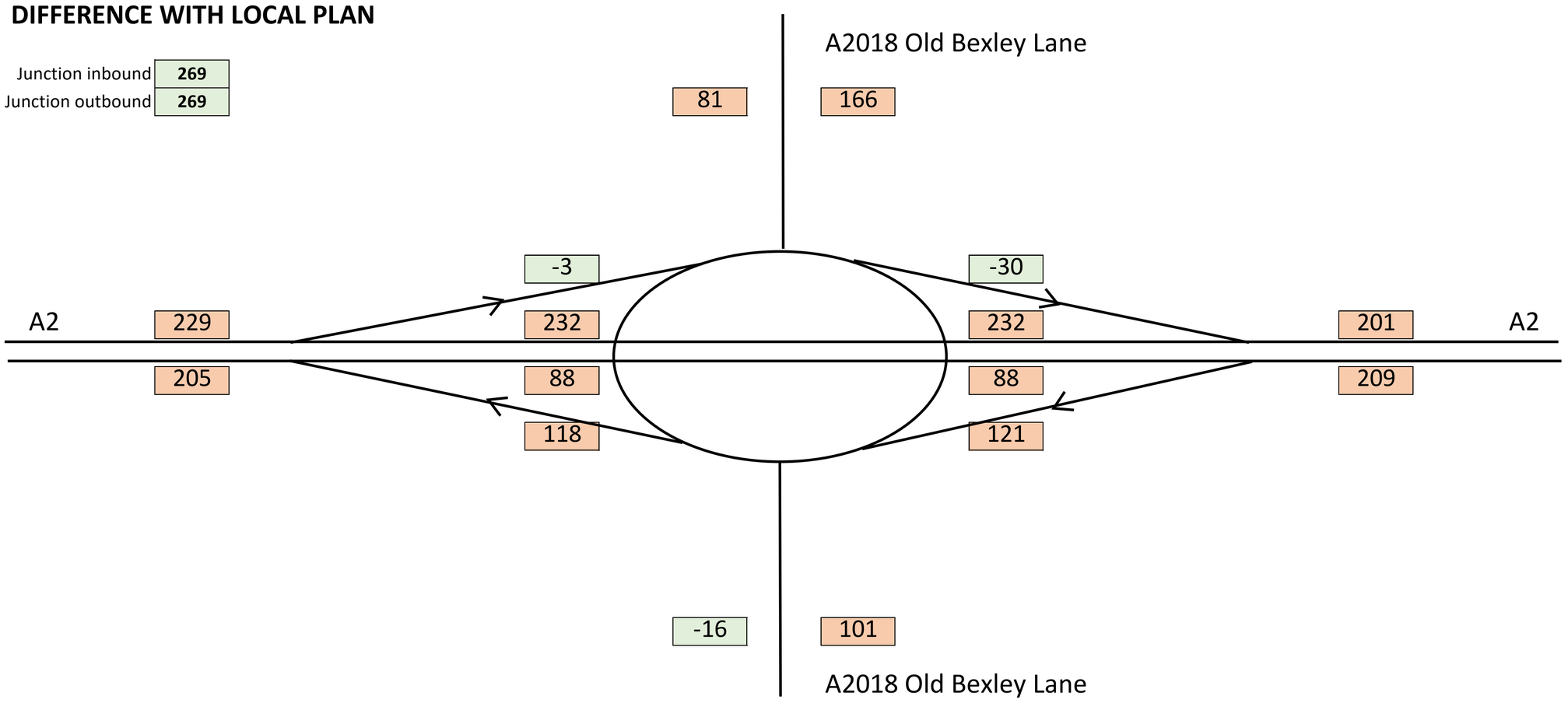
Difference in demand flow (Vehicles)

Figure H.11

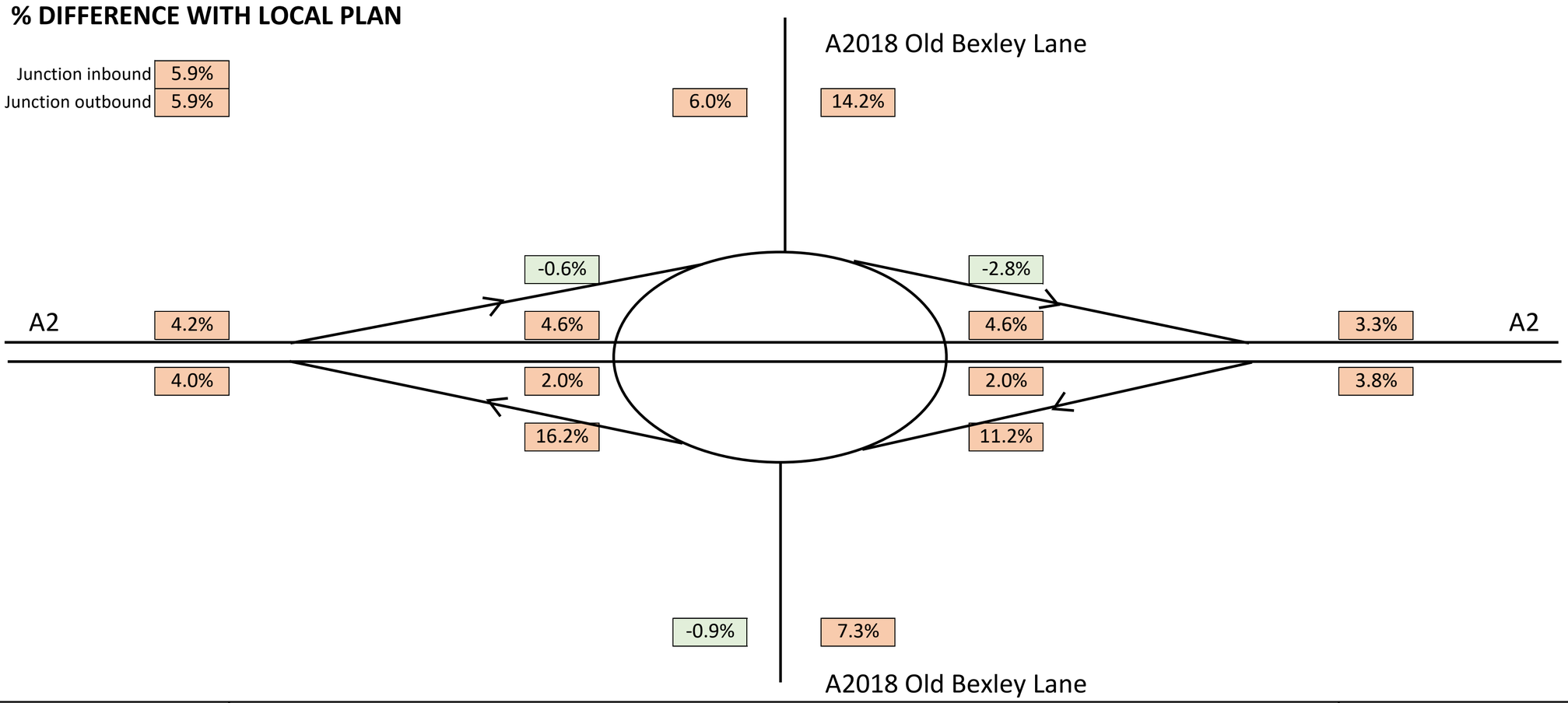
REFERENCE CASE



DIFFERENCE WITH LOCAL PLAN



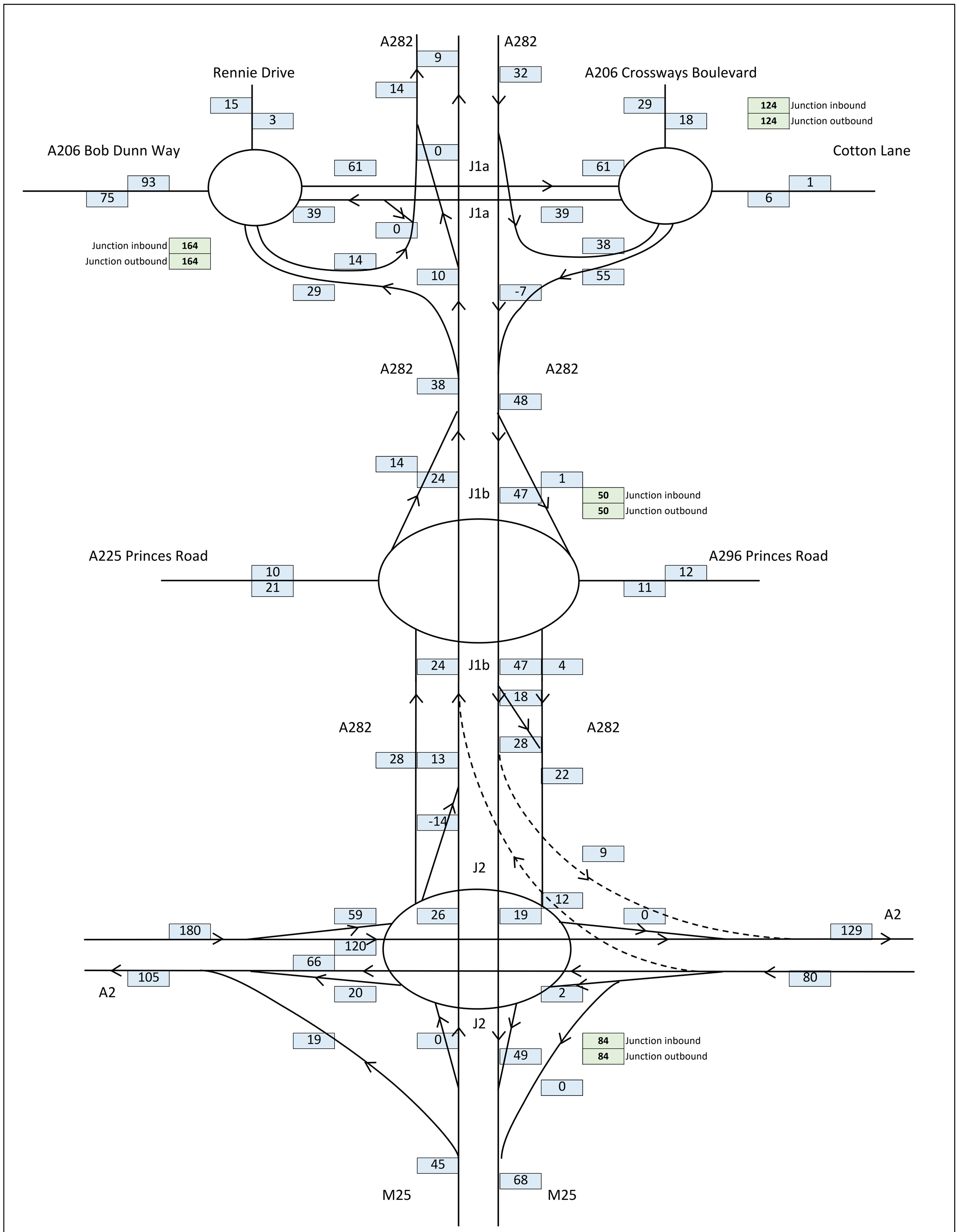
% DIFFERENCE WITH LOCAL PLAN



2038 Reference Case / Local Plan - With LTC (0700-0800)

Difference in demand flow (Vehicles)

Figure H.12

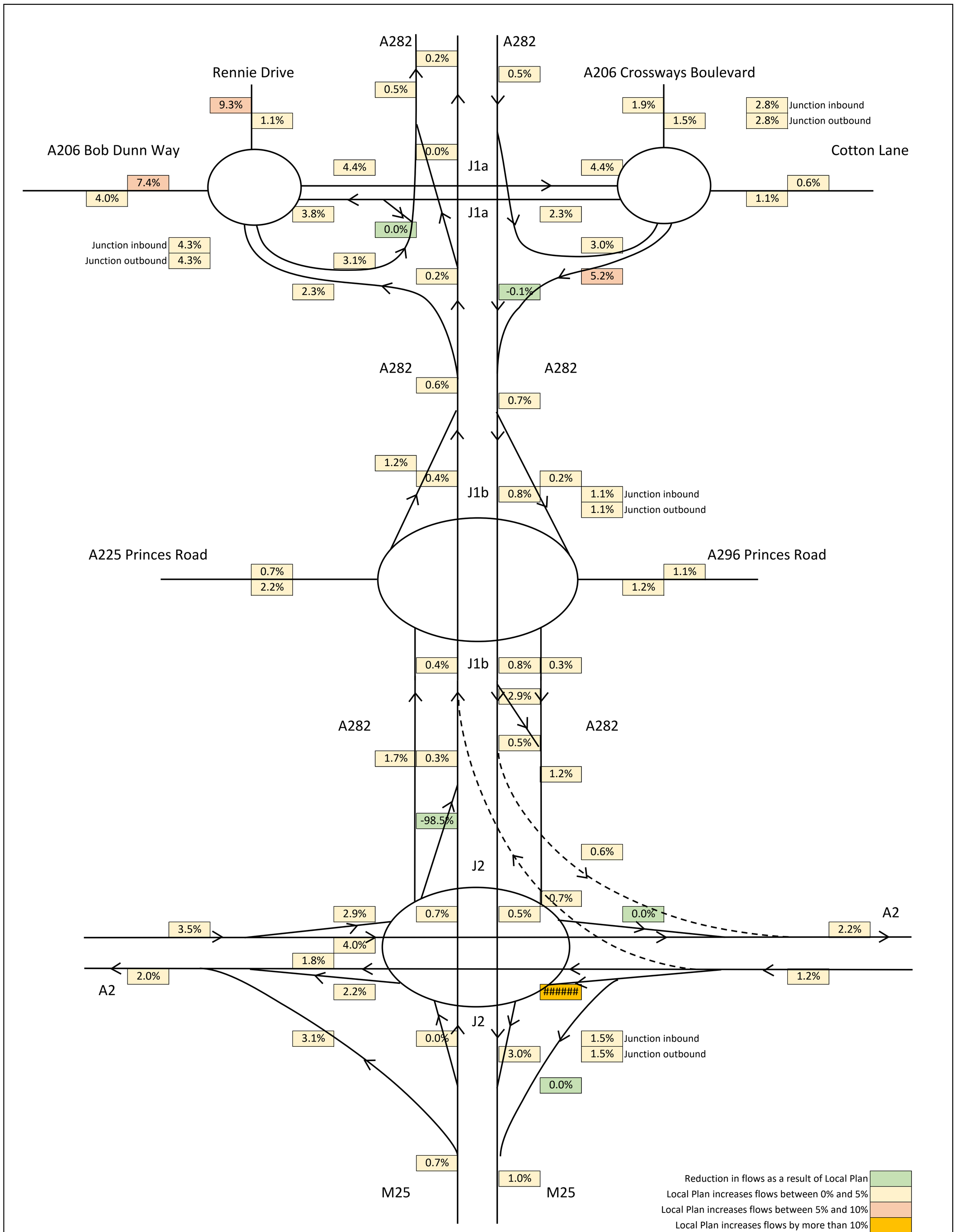


SENSITIVITY ASSESSMENT

2038 Reference Case / Local Plan - No LTC (0700-0800)

Difference in demand flow (Vehicles)

Figure H.1a

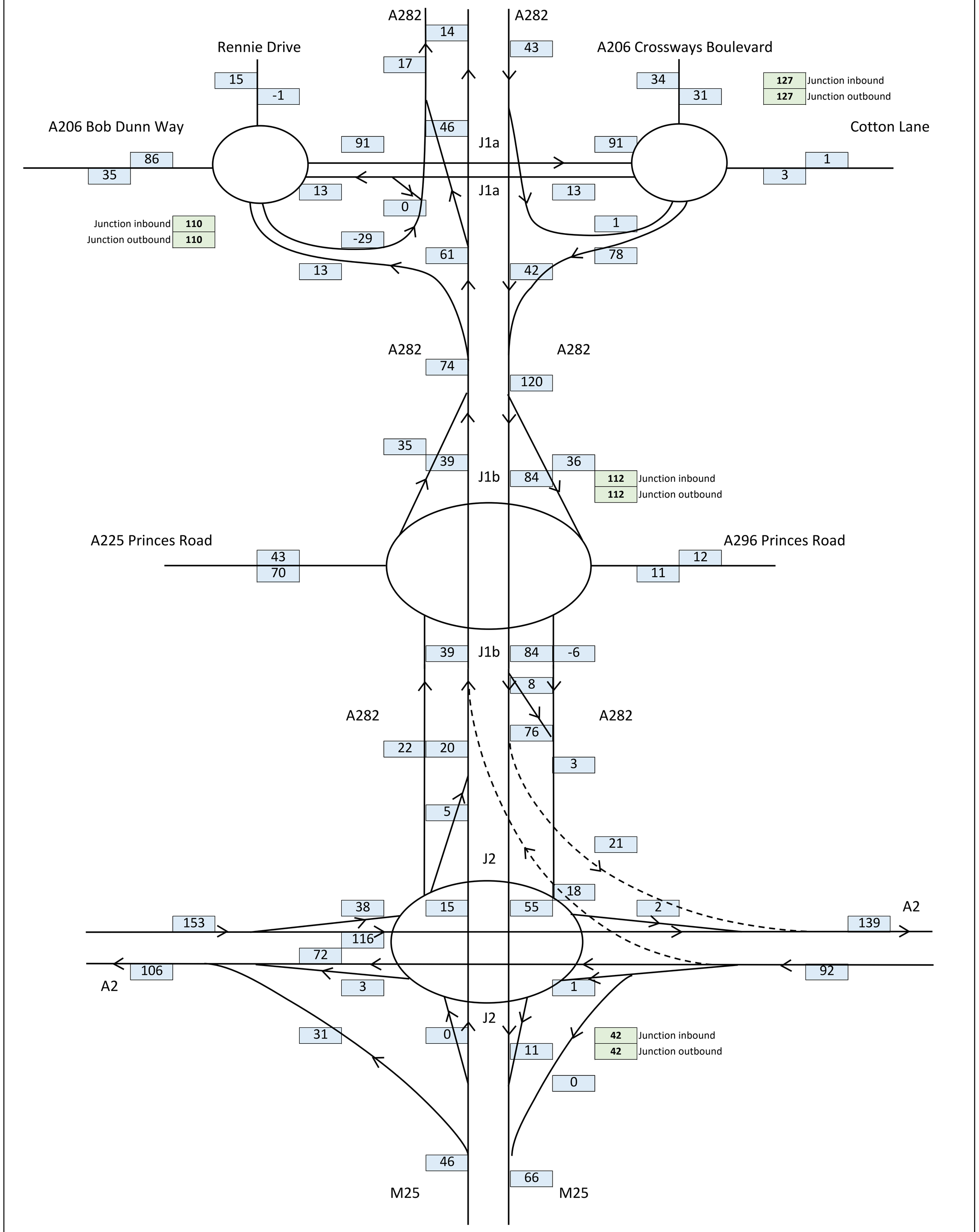


SENSITIVITY ASSESSMENT

2038 Reference Case / Local Plan - No LTC (0700-0800)

Difference in demand flow (% Vehicles)

Figure H.2a

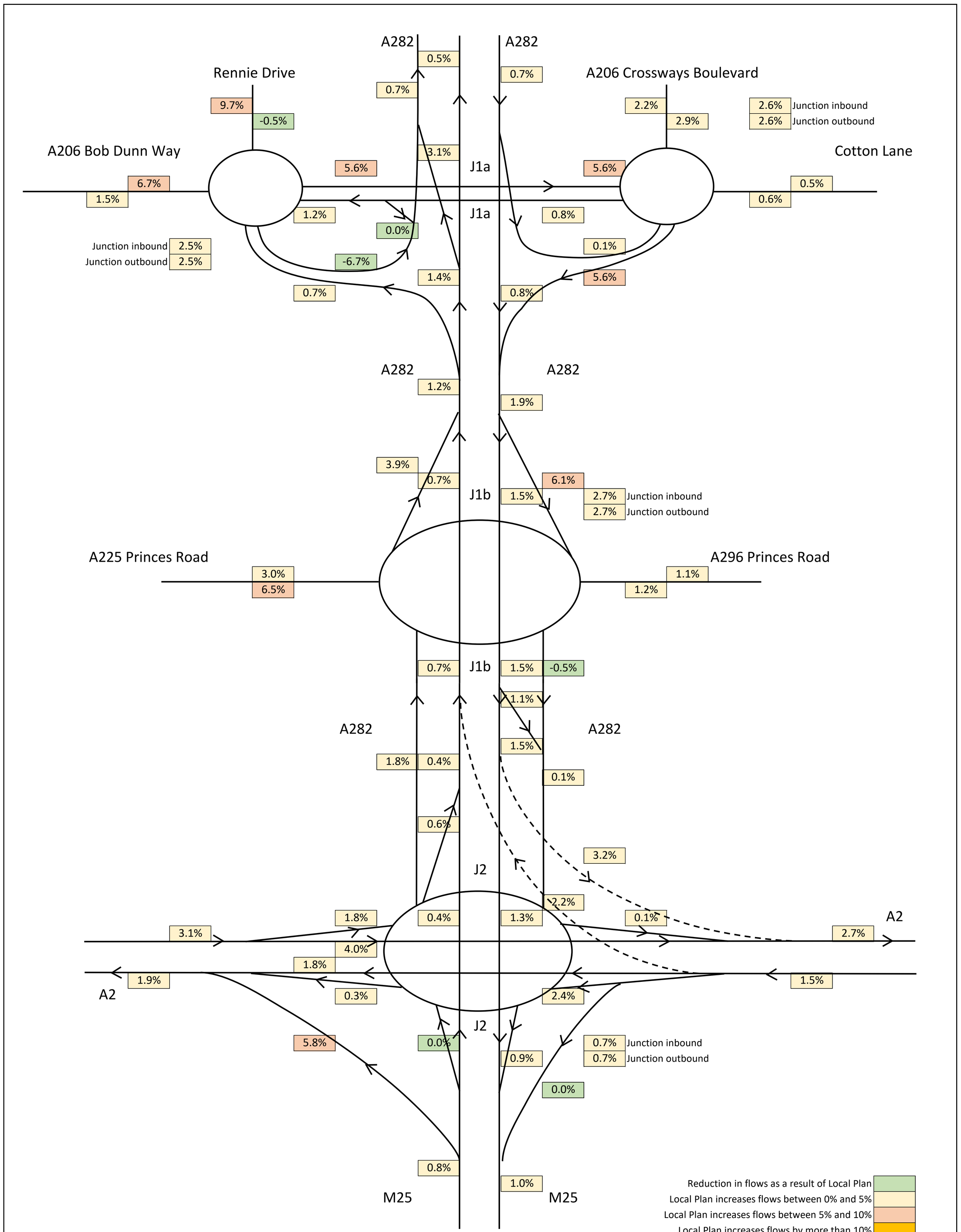


SENSITIVITY ASSESSMENT

2038 Reference Case / Local Plan - With LTC (0700-0800)

Difference in demand flow (Vehicles)

Figure H.3a

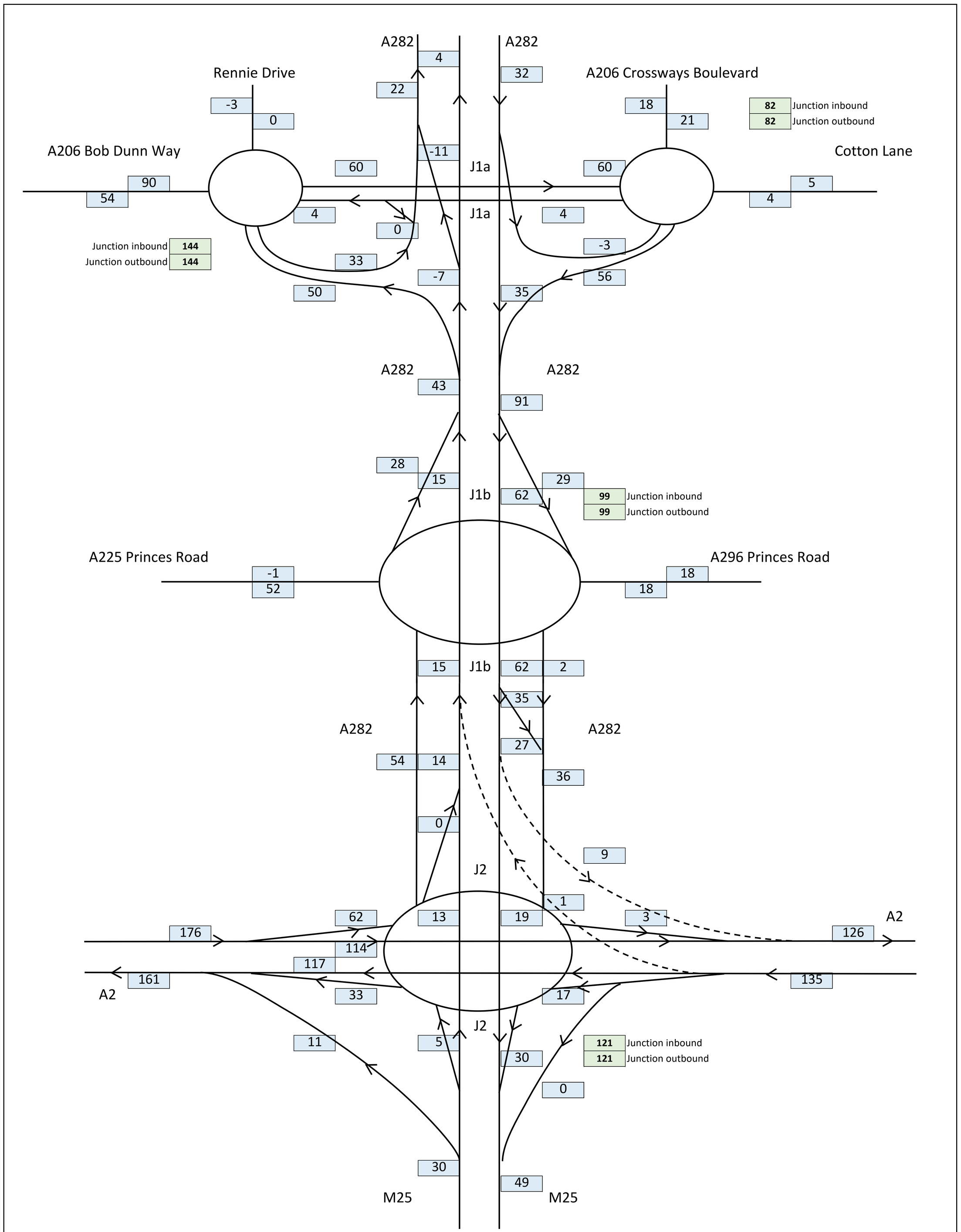


SENSITIVITY ASSESSMENT

2038 Reference Case / Local Plan - With LTC (0700-0800)

Difference in demand flow (% Vehicles)

Figure H.4a

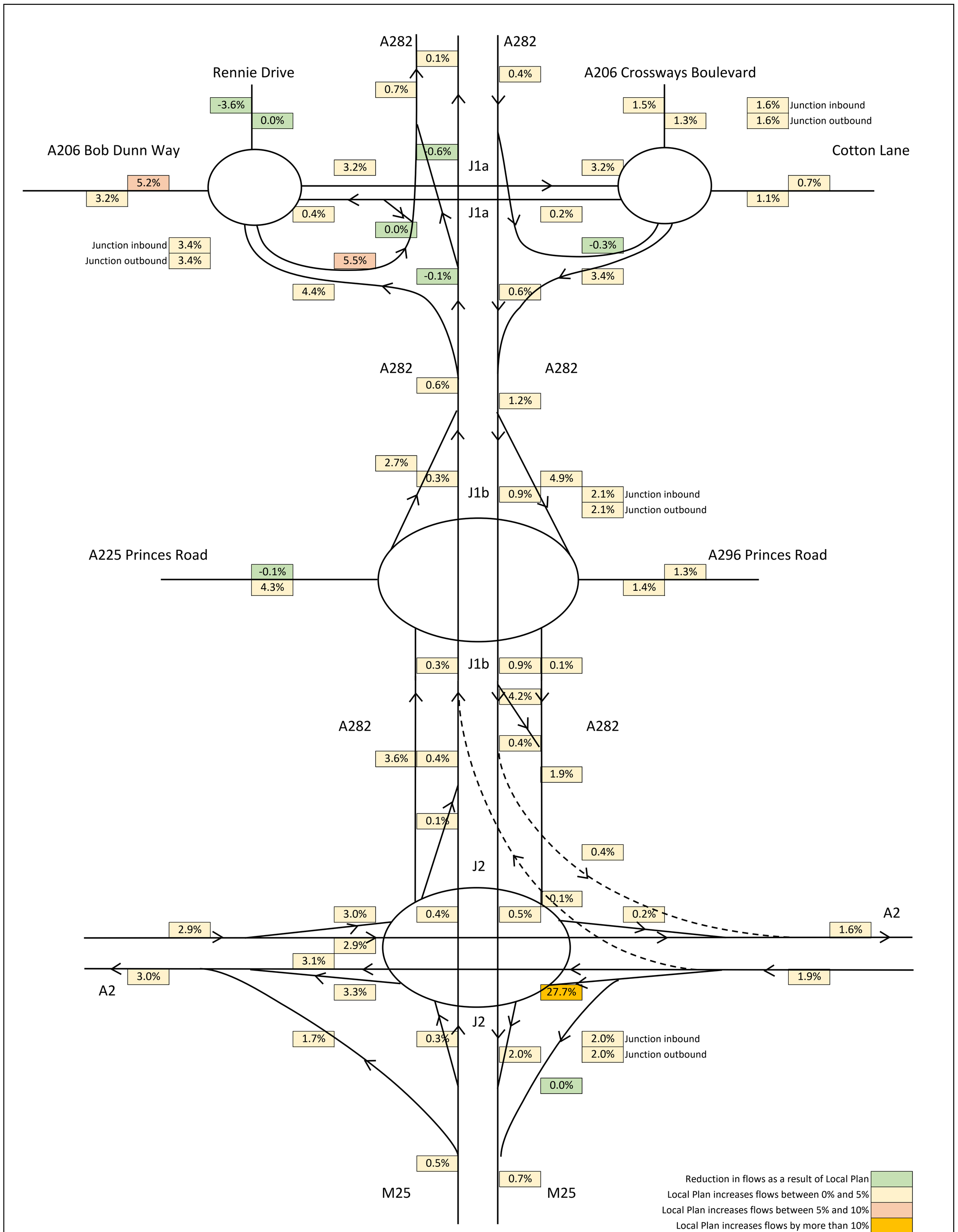


SENSITIVITY ASSESSMENT

2038 Reference Case / Local Plan - No LTC (1700-1800)

Difference in demand flow (Vehicles)

Figure H.5a

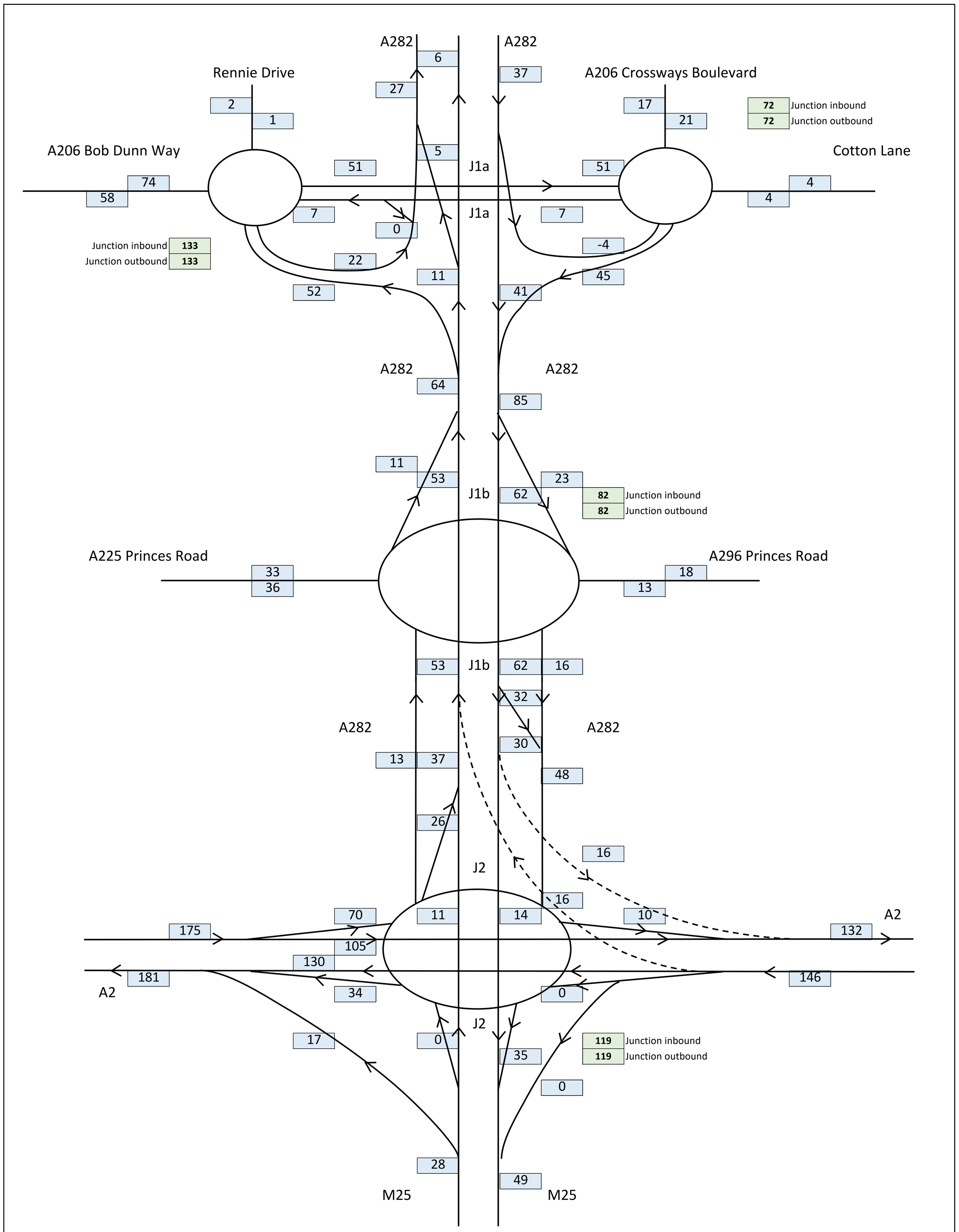


SENSITIVITY ASSESSMENT

2038 Reference Case / Local Plan - No LTC (1700-1800)

Difference in demand flow (% Vehicles)

Figure H.6a

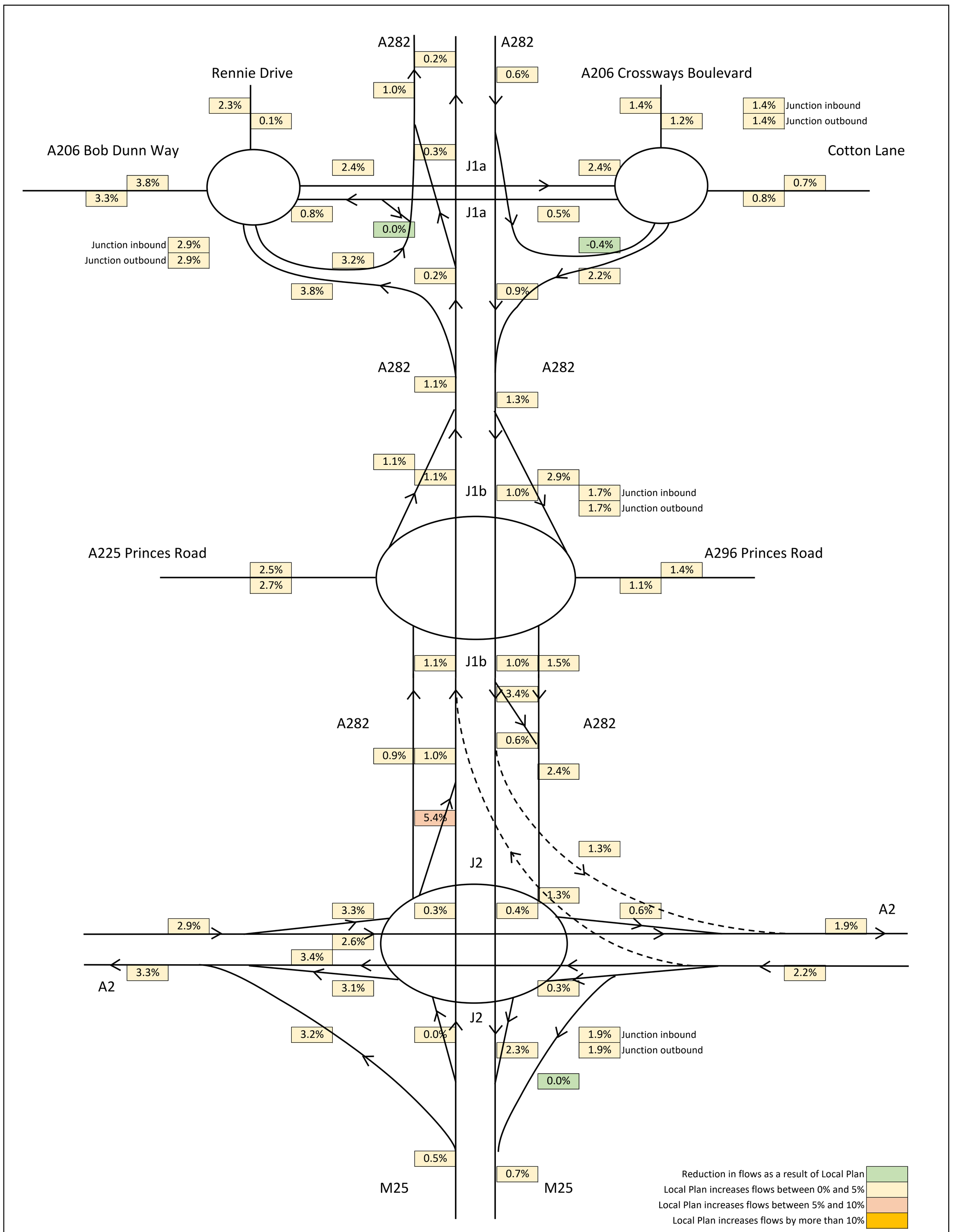


SENSITIVITY ASSESSMENT

2038 Reference Case / Local Plan - With LTC (1700-1800)

Difference in demand flow (Vehicles)

Figure H.7a



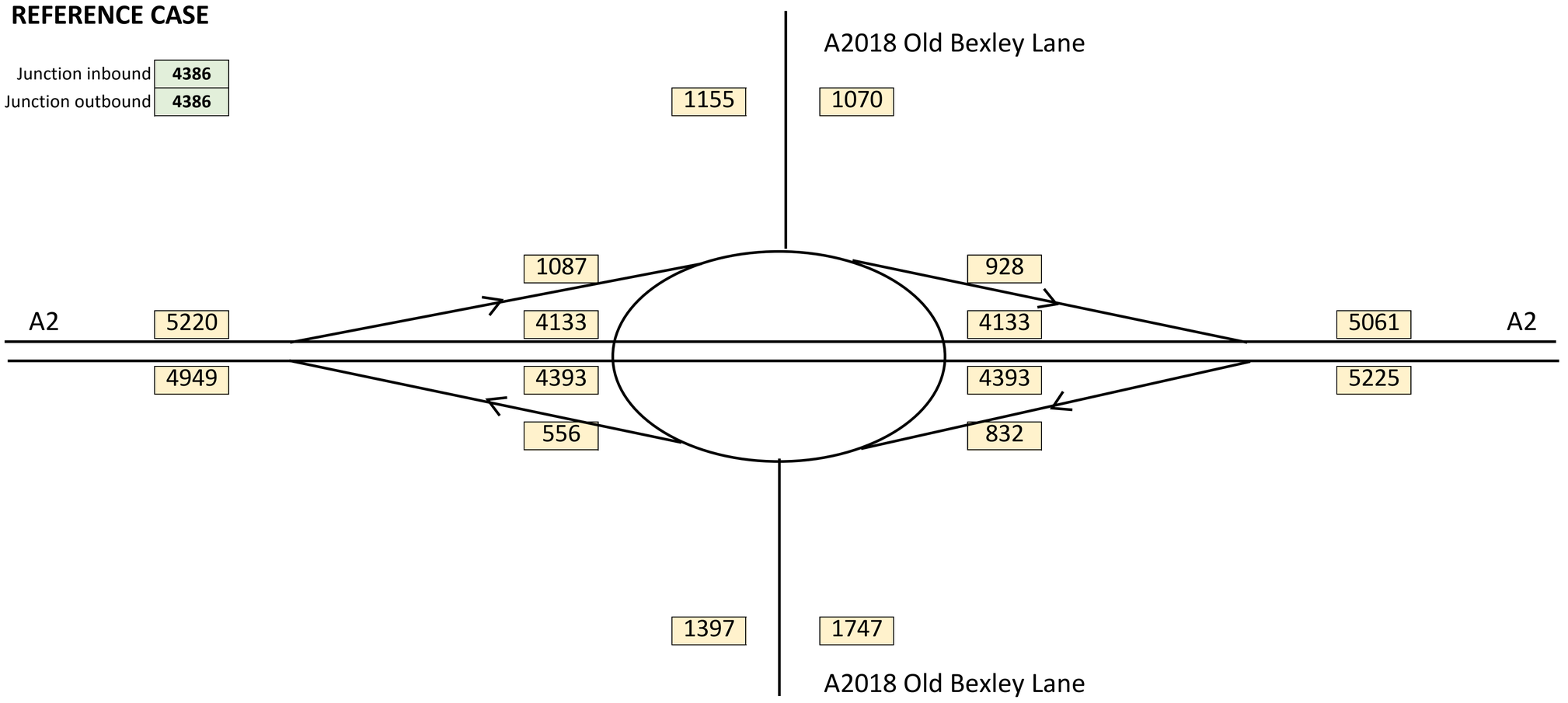
SENSITIVITY ASSESSMENT

2038 Reference Case / Local Plan - With LTC (1700-1800)

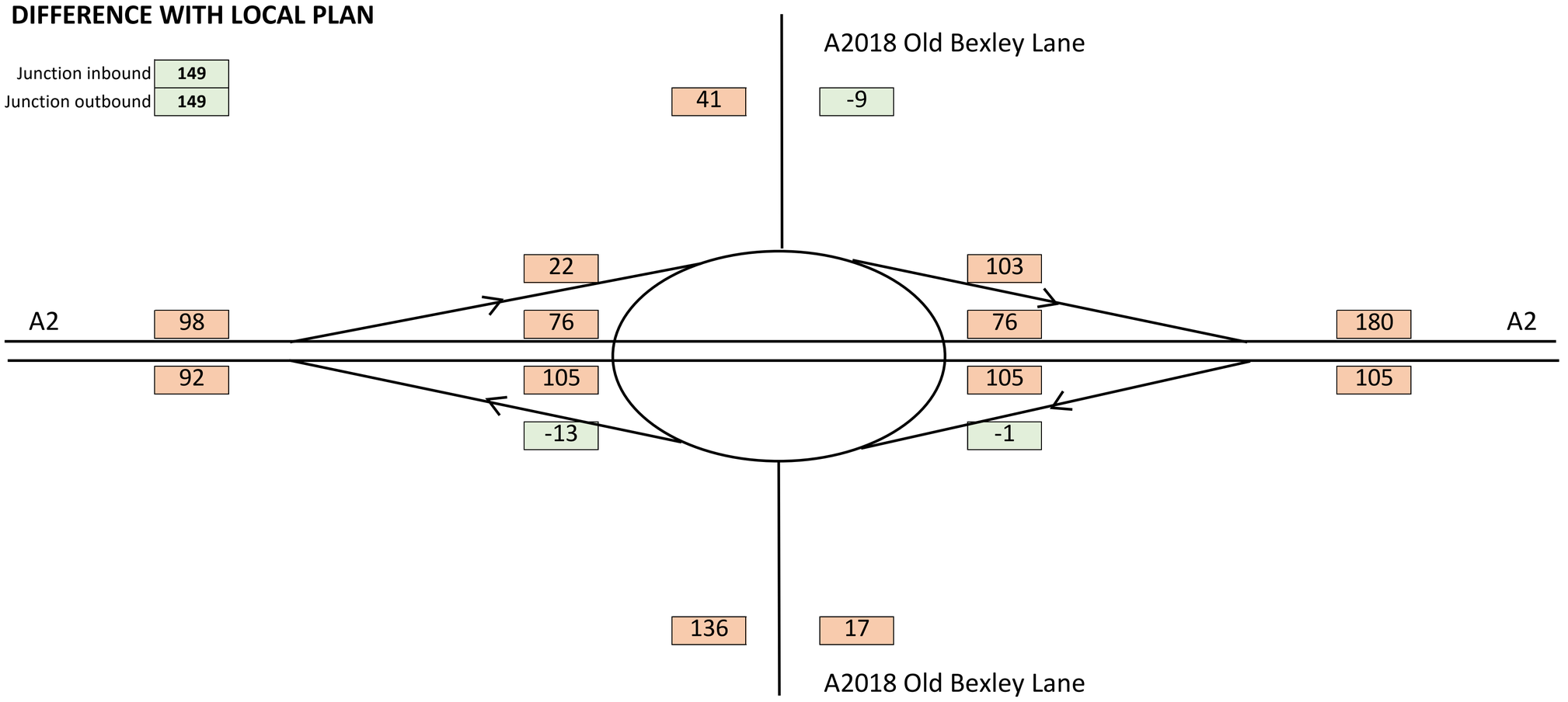
Difference in demand flow (% Vehicles)

Figure H.8a

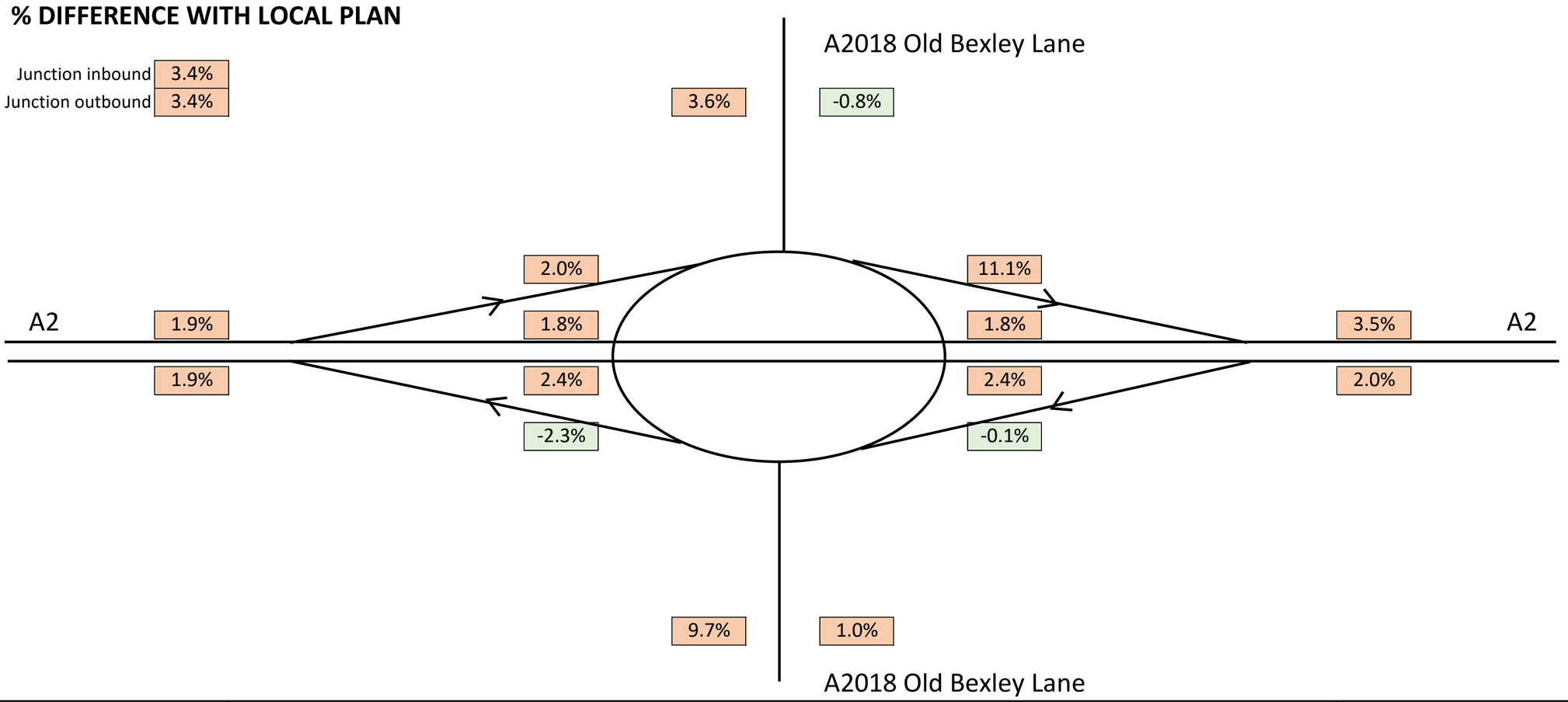
REFERENCE CASE



DIFFERENCE WITH LOCAL PLAN



% DIFFERENCE WITH LOCAL PLAN

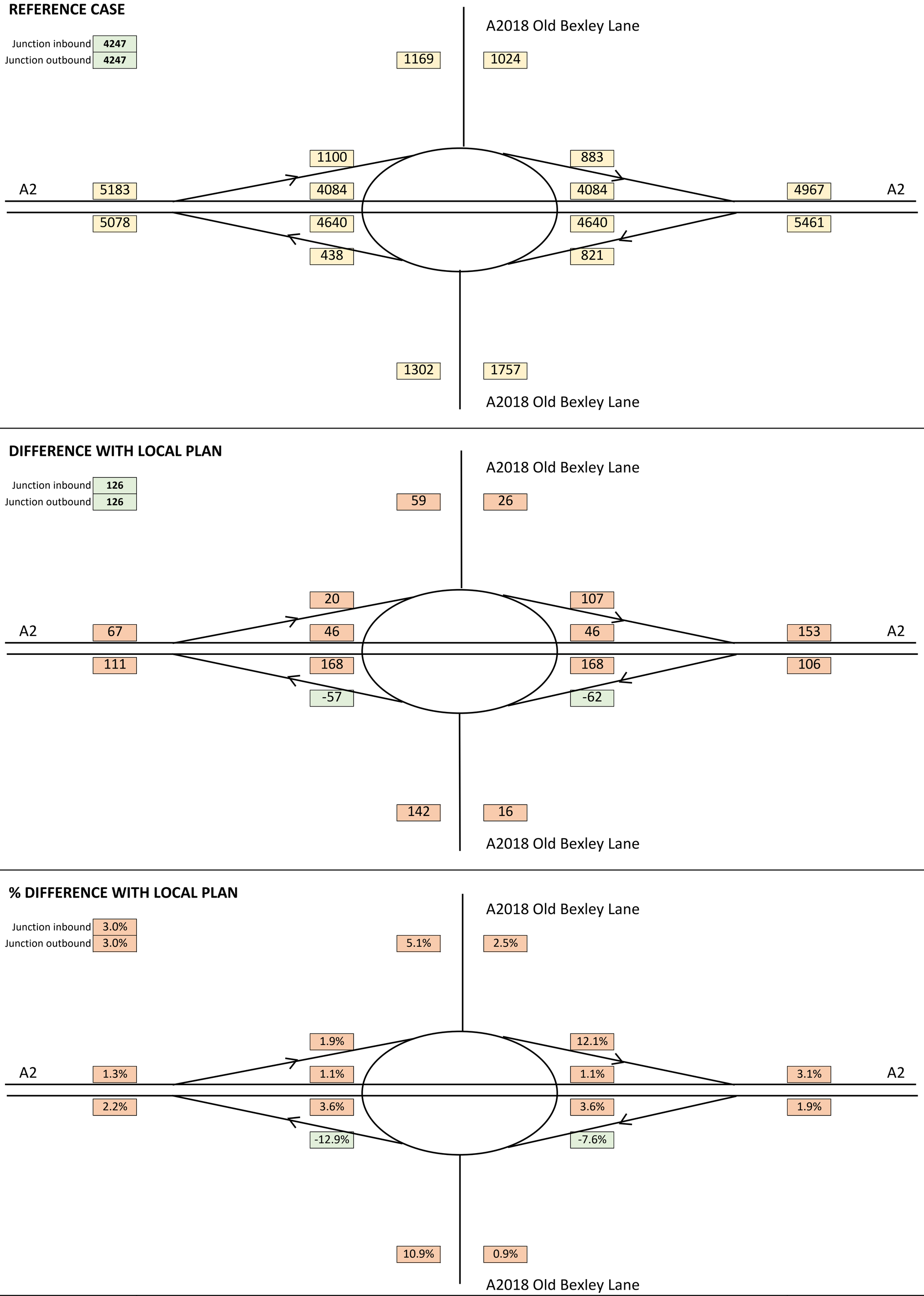


SENSITIVITY ASSESSMENT

2038 Reference Case / Local Plan - No LTC (0700-0800)

Difference in demand flow (Vehicles)

Figure H.9a



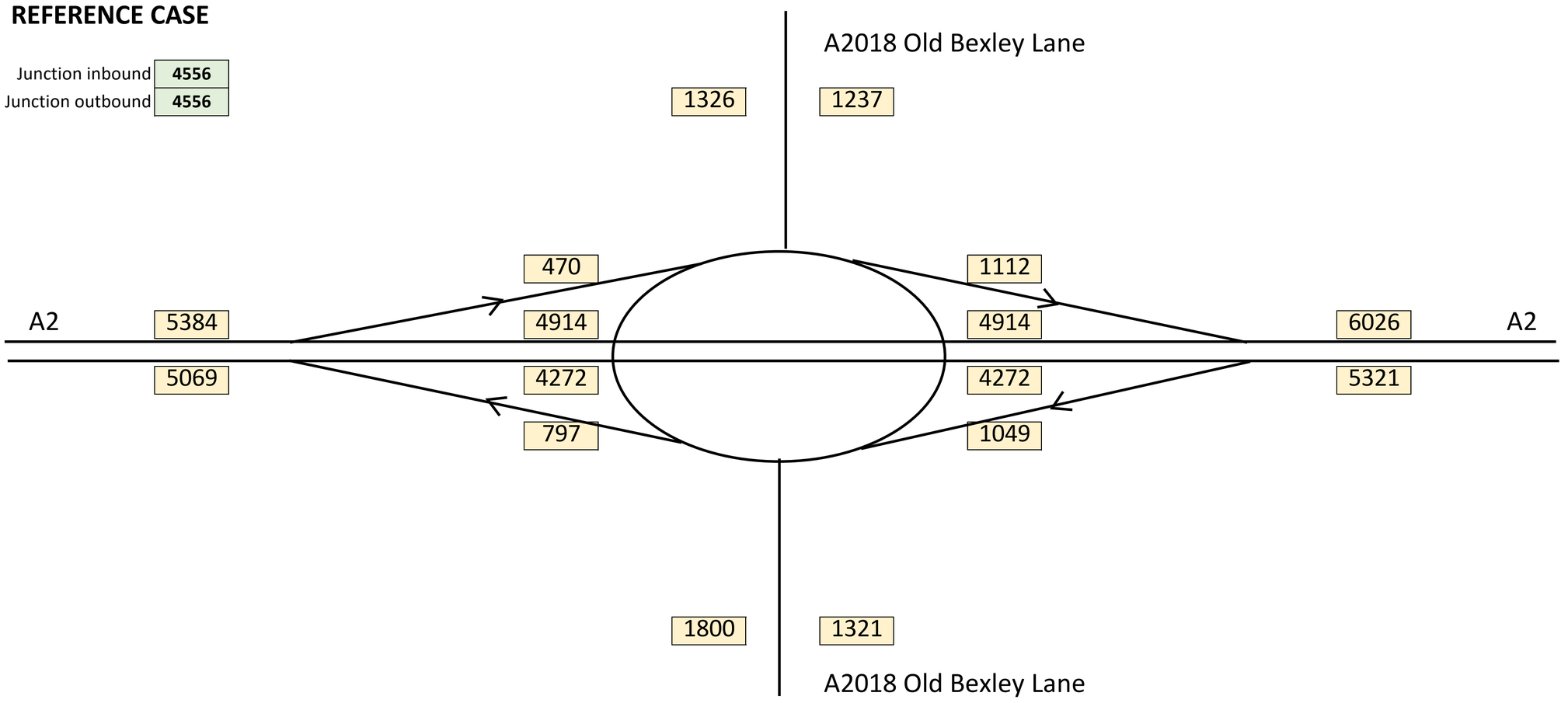
SENSITIVITY ASSESSMENT

2038 Reference Case / Local Plan - With LTC (0700-0800)

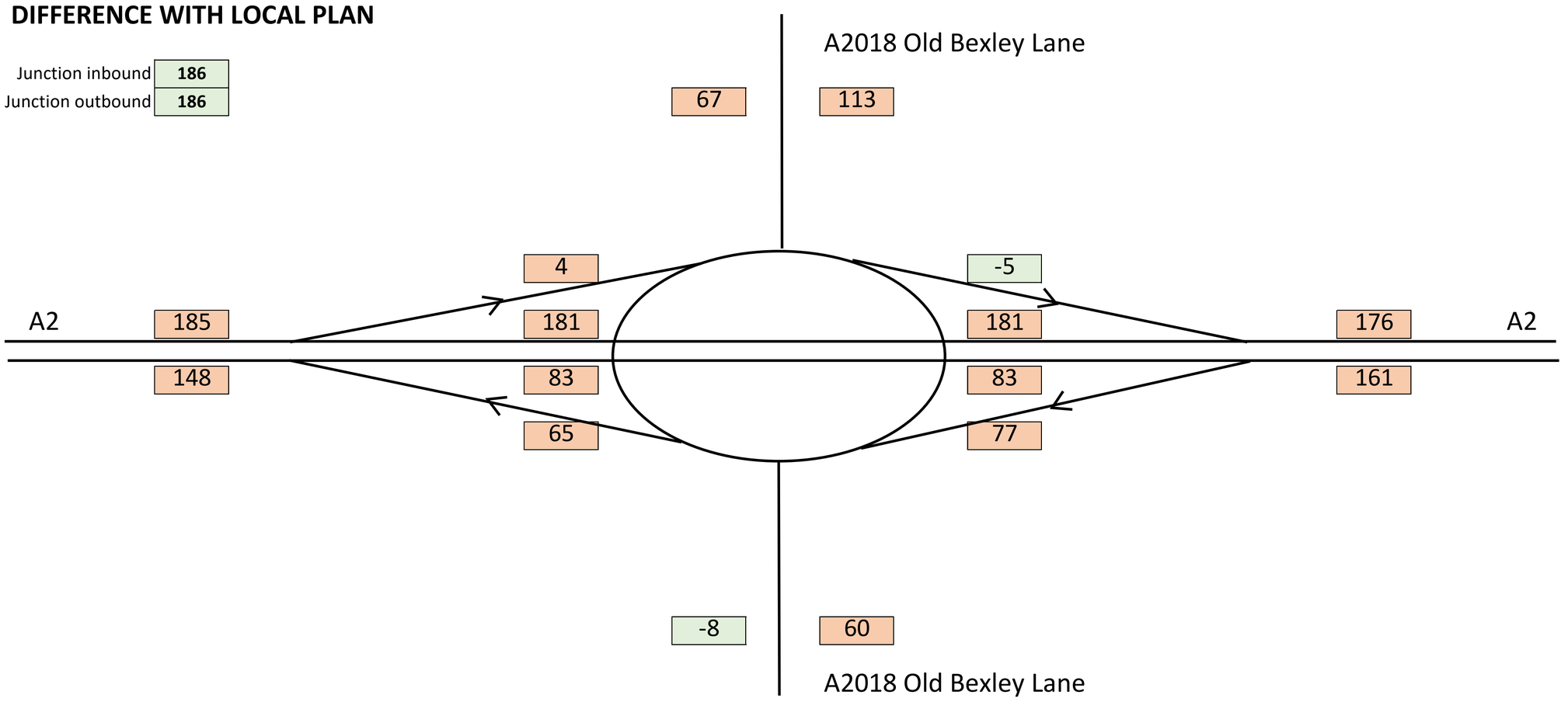
Difference in demand flow (Vehicles)

Figure H.10a

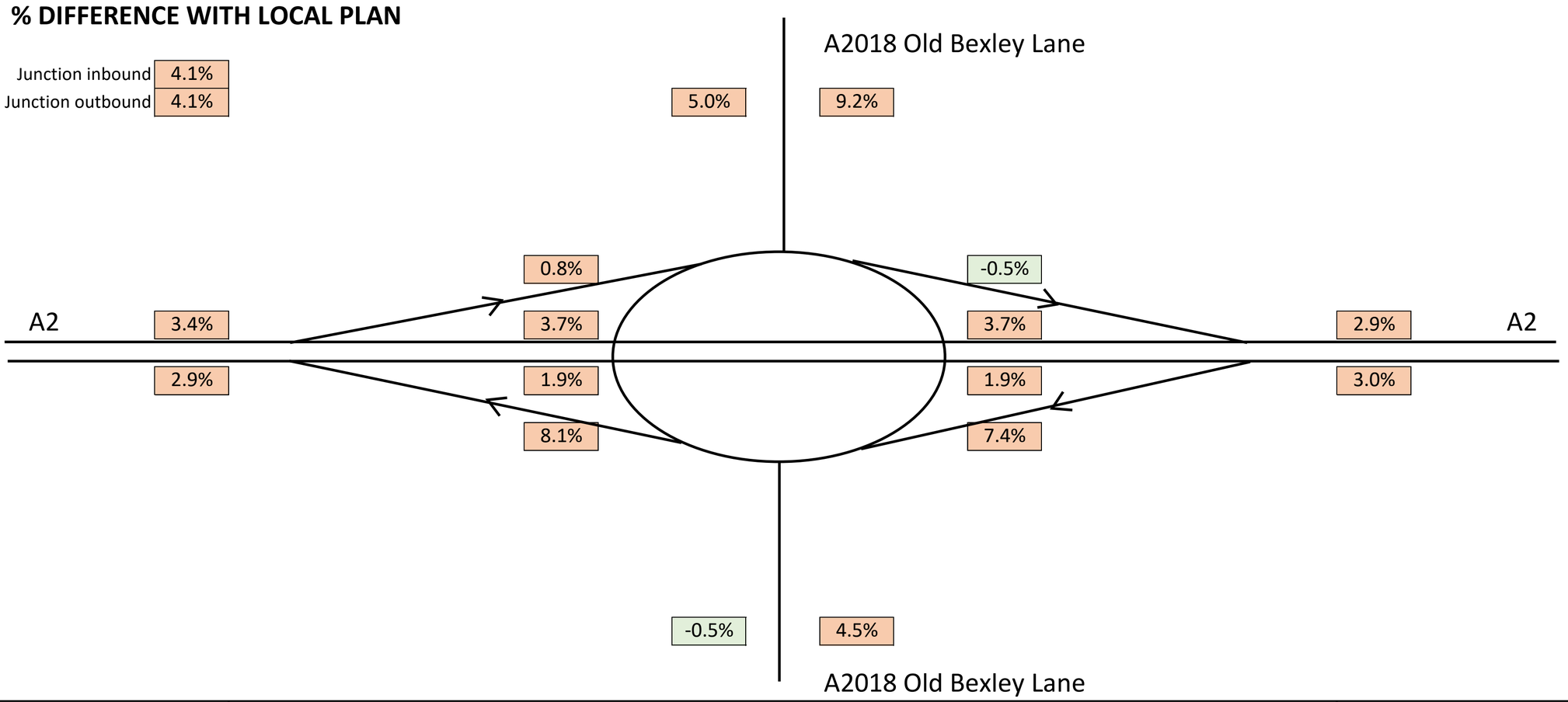
REFERENCE CASE



DIFFERENCE WITH LOCAL PLAN



% DIFFERENCE WITH LOCAL PLAN

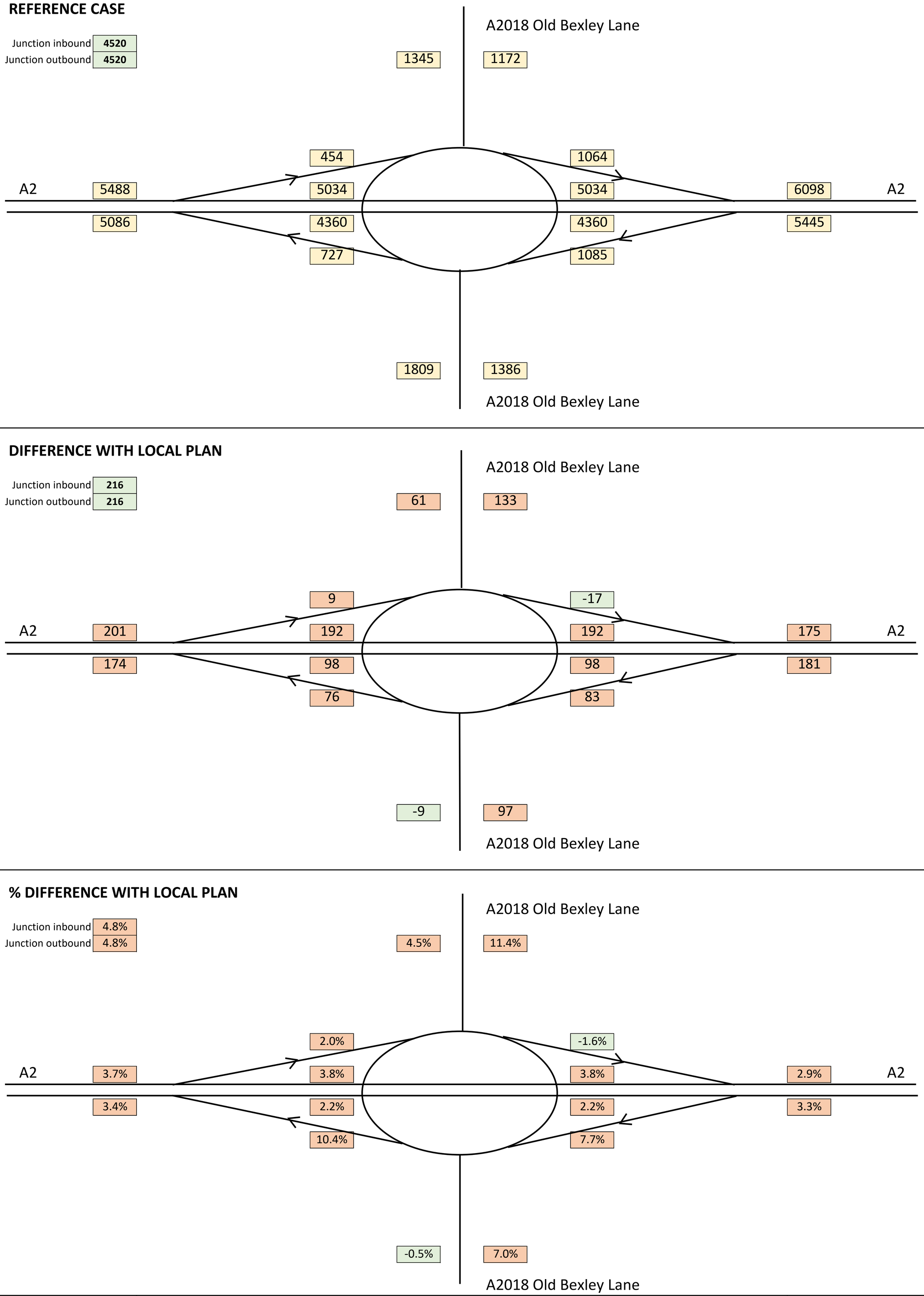


SENSITIVITY ASSESSMENT

2038 Reference Case / Local Plan - No LTC (0700-0800)

Difference in demand flow (Vehicles)

Figure H.11a



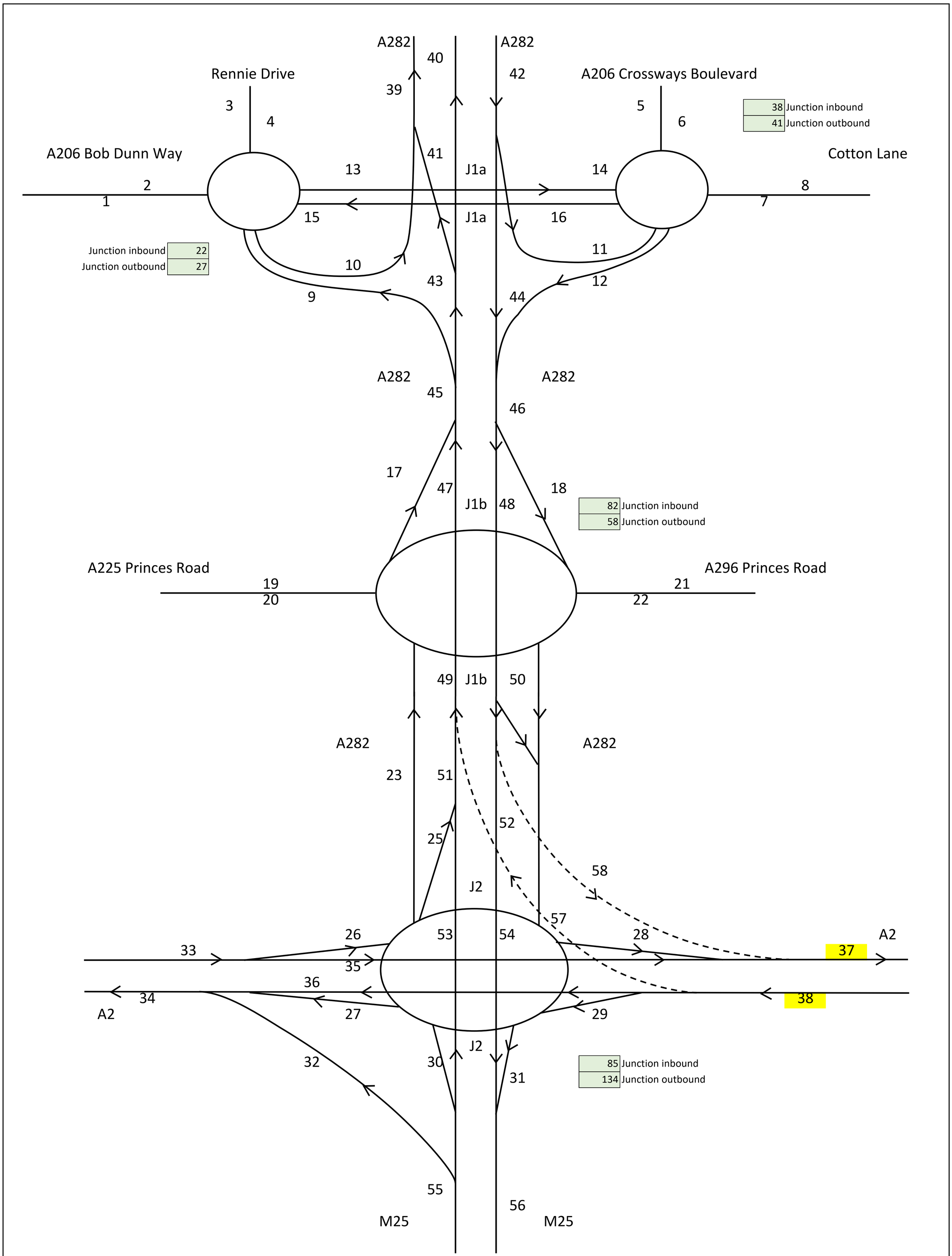
SENSITIVITY ASSESSMENT

2038 Reference Case / Local Plan - With LTC (0700-0800)

Difference in demand flow (Vehicles)

Figure H.12a

Appendix I
Link references and tabulated data



Link reference numbers

Figure I.1

2038 demand flows (vehicles)

SENSITIVITY ASSESSMENT

Ref = Reference Case

LP = Local Plan

Reduction in flows as a result of Local Plan

Local Plan increases flows between 0% and 5%

Local Plan increases flows between 5% and 10%

Local Plan increases flows by more than 10%

		No LTC								With LTC							
		0700-0800				1700-1800				0700-0800				1700-1800			
Link ID	Link Description	Ref	LP	Diff	% Diff	Ref	LP	Diff	% Diff	Ref	LP	Diff	% Diff	Ref	LP	Diff	% Diff
J1a																	
1	A206 Bob Dunn Way WB	1845	1920	75	4.0%	1687	1741	54	3.2%	2268	2302	35	1.5%	1765	1823	58	3.3%
2	A206 Bob Dunn Way EB	1255	1348	93	7.4%	1735	1826	90	5.2%	1283	1369	86	6.7%	1956	2029	74	3.8%
3	Rennie Drive NB	160	174	15	9.3%	96	92	-3	-3.6%	150	164	15	9.7%	87	89	2	2.3%
4	Rennie Drive SB	278	281	3	1.1%	466	466	0	0.0%	283	282	-1	-0.5%	500	501	1	0.1%
5	Crossways Boulevard NB	1521	1550	29	1.9%	1164	1181	18	1.5%	1565	1599	34	2.2%	1217	1234	17	1.4%
6	Crossways Boulevard SB	1208	1227	18	1.5%	1656	1677	21	1.3%	1083	1114	31	2.9%	1699	1720	21	1.2%
7	Cotton Lane WB	610	617	6	1.1%	343	347	4	1.1%	557	560	3	0.6%	445	448	4	0.8%
8	Cotton Lane EB	224	225	1	0.6%	692	697	5	0.7%	258	259	1	0.5%	562	567	4	0.7%
9	A282 NB Offslip to J1a	1276	1305	29	2.3%	1139	1189	50	4.4%	1819	1832	13	0.7%	1374	1426	52	3.8%
10	A282 NB Onslip from J1a	462	476	14	3.1%	593	626	33	5.5%	437	408	-29	-6.7%	670	691	22	3.2%
11	A282 SB Offslip to J1a	1301	1340	38	3.0%	1159	1156	-3	-0.3%	1524	1525	1	0.1%	977	974	-4	-0.4%
12	A282 SB Onslip from J1a	1059	1113	55	5.2%	1646	1702	56	3.4%	1393	1471	78	5.6%	2060	2105	45	2.2%
13	Bridge Link (west) EB	1374	1435	61	4.4%	1859	1919	60	3.2%	1625	1716	91	5.6%	2151	2202	51	2.4%
14	Bridge Link (east) EB	1374	1435	61	4.4%	1859	1919	60	3.2%	1625	1716	91	5.6%	2151	2202	51	2.4%
15	Bridge Link (west) WB	1032	1072	39	3.8%	895	898	4	0.4%	1095	1108	13	1.2%	842	849	7	0.8%
16	Bridge Link (east) WB	1690	1729	39	2.3%	1515	1519	4	0.2%	1574	1587	13	0.8%	1432	1439	7	0.5%
J1b																	
17	A282 NB Onslip from J1b	1210	1225	14	1.2%	1055	1083	28	2.7%	894	929	35	3.9%	954	965	11	1.1%
18	A282 SB Offslip to J1b	512	513	1	0.2%	595	624	29	4.9%	584	620	36	6.1%	777	800	23	2.9%
19	A225 Princes Road EB	1369	1379	10	0.7%	1291	1290	-1	-0.1%	1427	1470	43	3.0%	1331	1364	33	2.5%
20	A225 Princes Road WB	960	981	21	2.2%	1214	1267	52	4.3%	1072	1142	70	6.5%	1355	1391	36	2.7%
21	A296 Princes Road EB	1071	1082	12	1.1%	1318	1335	18	1.3%	1087	1099	12	1.1%	1311	1329	18	1.4%
22	A296 Princes Road WB	927	938	11	1.2%	1276	1294	18	1.4%	921	932	11	1.2%	1136	1149	13	1.1%
23	NB Link from J2	1647	1675	28	1.7%	1486	1540	54	3.6%	1170	1192	22	1.8%	1452	1466	13	0.9%
24	SB Link to J2	1213	1217	4	0.3%	1060	1062	2	0.1%	1049	1044	-6	-0.5%	1077	1094	16	1.5%
J2																	
25	M25 NB Onslip from J2	14	0	-14	-98.5%	312	313	0	0.1%	867	871	5	0.6%	479	505	26	5.4%
26	A2 EB Offslip to J2	2019	2078	59	2.9%	2086	2148	62	3.0%	2051	2089	38	1.8%	2104	2174	70	3.3%
27	A2 WB Onslip from J2	916	937	20	2.2%	987	1020	33	3.3%	1004	1006	3	0.3%	1114	1149	34	3.1%
28	A2 EB Onslip from J2	1494	1494	0	0.0%	1590	1593	3	0.2%	1511	1512	2	0.1%	1657	1667	10	0.6%
29	A2 WB Offslip to J2	0	2	2	5800.0%	61	78	17	27.7%	57	58	1	2.4%	120	121	0	0.3%
30	M25 NB Offslip to J2	1852	1852	0	0.0%	1880	1886	5	0.3%	1897	1897	0	0.0%	1939	1940	0	0.0%
31	M25 SB Onslip from J2	1641	1691	49	3.0%	1534	1565	30	2.0%	1273	1284	11	0.9%	1494	1529	35	2.3%
32	M25 NB bypass to A2 WB	594	612	19	3.1%	618	628	11	1.7%	527	558	31	5.8%	536	553	17	3.2%
A2 Corridor																	
33	A2 EB before J2	5061	5240	180	3.5%	6026	6202	176	2.9%	4967	5120	153	3.1%	6098	6272	175	2.9%
34	A2 WB after J2	5225	5330	105	2.0%	5321	5482	161	3.0%	5461	5567	106	1.9%	5445	5626	181	3.3%
35	A2 EB at J2	3042	3163	120	4.0%	3939	4053	114	2.9%	2916	3031	116	4.0%	3993	4098	105	2.6%
36	A2 WB at J2	3715	3781	66	1.8%	3716	3833	117	3.1%	3931	4003	72	1.8%	3794	3924	130	3.4%
37	A2 EB after J2	5966	6095	129	2.2%	7745	7871	126	1.6%	5093	5231	139	2.7%	6871	7003	132	1.9%
38	A2 WB before J2	6607	6687	80	1.2%	6978	7113	135	1.9%	6066	6158	92	1.5%	6543	6689	146	2.2%
M25/A282 Corridor																	
39	A282 NB Dart Charge West Tunnel	2965	2979	14	0.5%	3125	3147	22	0.7%	2398	2415	17	0.7%	2692	2719	27	1.0%
40	A282 NB Dart Charge East Tunnel	3874	3883	9	0.2%	3667	3672	4	0.1%	2971	2985	14	0.5%	3169	3175	6	0.2%
41	A282 NB Dart Charge West Tunnel befo	1845	1845	0	0.0%	1912	1901	-11	-0.6%	1482	1529	46	3.1%	1433	1438	5	0.3%
42	A282 SB North of J1a	6922	6953	32	0.5%	7154	7186	32	0.4%	6504	6547	43	0.7%	5743	5780	37	0.6%
43	A282 NB at J1a	5719	5728	10	0.2%	5579	5572	-7	-0.1%	4453	4514	61	1.4%	4602	4613	11	0.2%
44	A282 SB at J1a	5620	5613	-7	-0.1%	5995	6030	35	0.6%	4980	5022	42	0.8%	4765	4806	41	0.9%
45	A282 NB betwen J1a and J1b	6995	7033	38	0.6%	6719	6762	43	0.6%	6272	6346	74	1.2%	5976	6039	64	1.1%
46	A282 SB betwen J1a and J1b	6679	6727	48	0.7%	7640	7732	91	1.2%	6372	6493	120	1.9%	6826	6911	85	1.3%
47	A282 NB at J1b (North side)	5784	5809	24	0.4%	5663	5678	15	0.3%	5378	5416	39	0.7%	5022	5075	53	1.1%
48	A282 SB at J1b (North side)	6167	6213	47	0.8%	7046	7108	62	0.9%	5788	5873	84	1.5%	6048	6111	62	1.0%
49	A282 NB at J1b (South side)	5784	5809	24	0.4%	5663	5678	15	0.3%	5378	5416	39	0.7%	5022	5075	53	1.1%
50	A282 SB at J1b (South side)	6167	6213	47	0.8%	7046	7108	62	0.9%	5788	5873	84	1.5%	6048	6111	62	1.0%
51	A282 NB between J1b and J2	4027	4039	13	0.3%	3799	3813	14	0.4%	4526	4546	20	0.4%	3820	3857	37	1.0%
52	A282 SB between J1b and J2	5538	5566	28	0.5%	6224	6251	27	0.4%	5019	5095	76	1.5%	5093	5124	30	0.6%
53	A282 NB at J2	4013	4039	26	0.7%	3487	3501	13	0.4%	3660	3675	15	0.4%	3341	3352	11	0.3%
54	A282 SB at J2	4108	4127	19	0.5%	4008	4027	19	0.5%	4352	4407	55	1.3%	3872	3886	14	0.4%
55	M25 NB South of J2	6459	6504	45	0.7%	5985	6014	30	0.5%	6084	6130	46	0.8%	5816	5845	28	0.5%
56	M25 SB South of J2	6884	6952	68	1.0%	6879	6928	49	0.7%	6852	6918	66	1.0%	6792	6841	49	0.7%
A282 / A2 Link Roads																	
57	A2 WB to A282 NB	1758	1769	12	0.7%	1864	1865	1	0.1%	852	870	18	2.2%	1202	1217	16	1.3%
58	A282 SB to A2 EB	1430	1439	9	0.6%	2216	2224	9	0.4%	666	688	21	3.2%	1221	1237	16	1.3%

2038 link delay (seconds)

SENSITIVITY ASSESSMENT

Ref = Reference Case

LP = Local Plan

Reduction in delay as a result of Local Plan

Local Plan increases link delay between 0% and 5%

Local Plan increases link delay between 5% and 10%

Local Plan increases link delay by more than 10%

		No LTC								With LTC							
		0700-0800				1700-1800				0700-0800				1700-1800			
Link ID	Link Description	Ref	LP	Diff	% Diff	Ref	LP	Diff	% Diff	Ref	LP	Diff	% Diff	Ref	LP	Diff	% Diff
J1a																	
1	A206 Bob Dunn Way WB	6	6	0	6.4%	5	5	0	5.2%	9	10	0	1.5%	6	6	0	5.4%
2	A206 Bob Dunn Way EB	10	10	0	1.4%	12	12	0	1.5%	10	11	0	1.2%	12	12	0	0.2%
3	Rennie Drive NB	0	0	0	0.0%	0	0	0	0.0%	0	0	0	0.0%	0	0	0	0.0%
4	Rennie Drive SB	21	22	0	0.1%	23	23	0	0.0%	22	22	0	0.0%	23	23	0	0.0%
5	Crossways Boulevard NB	13	13	0	0.8%	10	10	0	0.2%	13	14	0	1.6%	10	10	0	-0.1%
6	Crossways Boulevard SB	10	10	0	1.1%	14	15	0	1.5%	9	9	0	1.6%	16	16	0	1.9%
7	Cotton Lane WB	10	10	0	1.5%	4	4	0	1.6%	9	9	0	0.8%	6	6	0	1.2%
8	Cotton Lane EB	0	0	0	0.0%	3	3	0	-1.5%	0	0	0	0.0%	1	1	0	-2.8%
9	A282 NB Offslip to J1a	2	2	0	2.9%	2	2	0	5.2%	3	3	0	2.4%	2	2	0	6.2%
10	A282 NB Onslip from J1a	1	1	0	0.8%	1	1	0	1.4%	1	1	0	-3.1%	2	2	0	0.0%
11	A282 SB Offslip to J1a	16	16	0	0.3%	8	8	0	-0.1%	16	16	0	0.0%	7	7	0	-0.1%
12	A282 SB Onslip from J1a	2	2	0	6.4%	4	5	1	**13.5%**	4	4	1	**15.0%**	60	86	26	**43.4%**
13	Bridge Link (west) EB	1	1	0	1.4%	1	1	0	0.0%	1	1	0	2.2%	1	1	0	0.0%
14	Bridge Link (east) EB	1	1	0	1.4%	1	1	0	0.0%	1	1	0	2.2%	1	1	0	0.0%
15	Bridge Link (west) WB	13	13	0	1.2%	13	13	0	0.1%	13	13	0	0.2%	13	13	0	0.1%
16	Bridge Link (east) WB	1	1	0	1.9%	1	1	0	0.0%	1	1	0	0.0%	1	1	0	0.0%
J1b																	
17	A282 NB Onslip from J1b	2	2	0	0.5%	2	2	0	1.1%	1	2	0	2.7%	2	2	0	-0.6%
18	A282 SB Offslip to J1b	26	26	0	0.0%	24	24	0	0.3%	26	26	0	1.2%	25	25	0	0.3%
19	A225 Princes Road EB	16	16	0	1.1%	12	12	0	0.1%	7	7	0	3.7%	9	9	0	-1.5%
20	A225 Princes Road WB	12	12	0	0.1%	12	13	0	1.1%	12	12	0	1.0%	13	13	0	1.0%
21	A296 Princes Road EB	0	0	0	0.0%	0	0	0	0.0%	0	0	0	0.0%	0	0	0	0.0%
22	A296 Princes Road WB	6	6	0	0.2%	6	6	0	1.4%	6	6	0	5.1%	7	7	0	2.4%
23	NB Link from J2	1	1	0	-0.7%	1	1	0	2.9%	1	1	0	0.0%	1	1	0	-3.1%
24	SB Link to J2	2	2	0	-0.4%	2	2	0	-0.6%	2	2	0	-0.5%	2	2	0	1.1%
J2																	
25	M25 NB Onslip from J2	9	10	0	2.8%	7	7	0	0.4%	8	8	0	0.3%	7	7	0	0.5%
26	A2 EB Offslip to J2	23	23	0	0.0%	23	23	0	0.0%	23	23	0	0.0%	23	23	0	0.0%
27	A2 WB Onslip from J2	2	2	0	0.6%	2	2	0	2.1%	2	2	0	-3.6%	2	2	0	2.8%
28	A2 EB Onslip from J2	17	15	-2	-9.5%	18	16	-2	-10.2%	21	19	-2	-7.9%	35	31	-4	-11.3%
29	A2 WB Offslip to J2	34	34	0	0.1%	35	36	0	0.9%	35	35	0	0.1%	37	37	0	0.0%
30	M25 NB Offslip to J2	13	13	0	-0.4%	14	14	0	-0.3%	13	13	0	-0.8%	15	15	0	-0.4%
31	M25 SB Onslip from J2	115	115	0	-0.1%	8	8	0	-1.0%	142	147	4	3.0%	8	8	0	0.3%
32	M25 NB bypass to A2 WB	1	1	0	0.8%	1	1	0	0.0%	1	1	0	1.6%	1	1	0	0.8%
A2 Corridor																	
33	A2 EB before J2	14	28	14	**97.2%**	25	26	1	2.6%	20	32	11	**55.1%**	25	28	3	**12.4%**
34	A2 WB after J2	31	34	3	**10.6%**	26	31	5	**20.8%**	39	41	2	5.6%	31	37	6	**19.6%**
35	A2 EB at J2	2	2	0	6.3%	4	4	0	-1.2%	2	2	0	7.9%	5	5	0	-1.5%
36	A2 WB at J2	5	5	0	7.0%	4	5	1	**11.6%**	6	7	0	7.0%	5	5	1	**14.3%**
37	A2 EB after J2	3	3	0	4.2%	4	4	0	-0.7%	3	3	0	5.5%	5	5	0	-0.9%
38	A2 WB before J2	7	7	0	5.2%	7	8	1	**10.4%**	10	11	1	9.2%	8	9	1	**12.8%**
M25/A282 Corridor																	
39	A282 NB Dart Charge West Tunnel	270	265	-5	-1.7%	340	337	-2	-0.7%	20	20	0	1.9%	36	36	0	0.4%
40	A282 NB Dart Charge East Tunnel	187	179	-9	-4.6%	286	276	-10	-3.4%	10	10	0	0.7%	16	16	0	-2.1%
41	A282 NB Dart Charge West Tunnel befo	2	2	0	-1.4%	2	2	0	-1.7%	2	2	0	3.7%	1	1	0	0.0%
42	A282 SB North of J1a	26	26	0	0.2%	6	7	1	**10.2%**	3	3	0	5.6%	1	1	0	1.9%
43	A282 NB at J1a	10	9	-1	-7.9%	14	12	-1	-10.7%	2	2	0	1.2%	3	3	0	-0.7%
44	A282 SB at J1a	4	4	0	-1.3%	4	4	0	1.6%	3	3	0	1.5%	2	2	0	1.4%
45	A282 NB betwen J1a and J1b	118	128	10	8.8%	11	16	5	**44.6%**	4	4	0	3.3%	4	4	0	1.0%
46	A282 SB betwen J1a and J1b	26	26	0	0.0%	26	26	0	0.1%	9	11	2	**21.9%**	8	9	0	5.1%
47	A282 NB at J1b (North side)	5	5	0	1.2%	5	5	0	0.4%	4	4	0	1.4%	3	3	0	2.1%
48	A282 SB at J1b (North side)	39	37	-3	-6.8%	16	13	-3	-18.1%	6	6	0	4.8%	4	4	0	0.7%
49	A282 NB at J1b (South side)	13	14	1	5.4%	7	7	0	4.6%	1	2	0	1.4%	1	1	0	2.6%
50	A282 SB at J1b (South side)	39	37	-3	-6.8%	16	13	-3	-18.1%	6	6	0	4.8%	4	4	0	0.7%
51	A282 NB between J1b and J2	2	2	0	0.8%	2	2	0	0.5%	3	3	0	0.6%	2	2	0	1.5%
52	A282 SB between J1b and J2	3	3	0	0.0%	3	3	0	-2.4%	2	2	0	2.6%	2	2	0	0.0%
53	A282 NB at J2	4	4	0	1.2%	3	3	0	1.0%	4	4	0	0.8%	3	3	0	1.2%
54	A282 SB at J2	30	30	0	0.0%	5	5	0	-2.6%	30	30	0	0.1%	5	5	0	-0.2%
55	M25 NB South of J2	73	78	5	7.2%	77	81	4	5.2%	70	79	9	**13.3%**	70	75	5	6.9%
56	M25 SB South of J2	30	30	0	0.0%	13	12	-1	-5.3%	33	33	0	0.2%	15	15	0	0.5%
A282 / A2 Link Roads																	
57	A2 WB to A282 NB	22	24	3	**11.5%**	35	36	1	1.5%	2	2	0	1.3%	2	2	0	1.5%
58	A282 SB to A2 EB	0	0	0	0.0%	0	0	0	0.0%	0	0	0	0.0%	0	0	0	0.0%

2038 V/C (percent)

SENSITIVITY ASSESSMENT

Link V/C is 85% or less
Link V/C is between 85% and 100%
Link V/C is greater than 100%

		No LTC				With LTC			
		0700-0800		1700-1800		0700-0800		1700-1800	
Link ID	Link Description	Ref	LP	Ref	LP	Ref	LP	Ref	LP
J1a									
1	A206 Bob Dunn Way WB	19.9	20.6	18.4	18.8	24.8	25.0	19.1	19.6
2	A206 Bob Dunn Way EB	33.8	35.4	43.7	44.8	34.5	36.0	49.2	49.4
3	Rennie Drive NB	7.3	7.8	4.5	4.2	6.8	7.4	4.1	4.1
4	Rennie Drive SB	26.6	26.8	41.2	41.2	27.0	26.9	43.7	43.8
5	Crossways Boulevard NB	56.9	57.4	43.3	43.4	58.4	59.3	44.8	44.7
6	Crossways Boulevard SB	63.9	64.6	75.3	76.2	57.7	58.9	78.6	79.6
7	Cotton Lane WB	69.2	69.9	37.1	37.5	63.5	63.9	48.1	48.4
8	Cotton Lane EB	13.9	13.9	40.3	40.1	16.0	16.0	32.5	32.2
9	A282 NB Offslip to J1a	34.3	34.8	31.7	32.9	50.9	50.8	37.9	39.1
10	A282 NB Onslip from J1a	30.0	30.4	36.0	37.1	29.3	27.6	40.0	40.3
11	A282 SB Offslip to J1a	50.3	51.3	32.2	32.1	57.7	57.8	27.4	27.3
12	A282 SB Onslip from J1a	61.1	63.6	81.2	83.5	77.5	80.5	101.2	102.6
13	Bridge Link (west) EB	25.1	25.9	32.9	33.4	29.9	31.1	38.0	38.1
14	Bridge Link (east) EB	25.1	25.9	32.9	33.4	29.9	31.1	38.0	38.1
15	Bridge Link (west) WB	51.2	52.8	46.1	46.2	54.5	54.8	43.7	43.8
16	Bridge Link (east) WB	54.0	54.9	44.4	44.4	49.9	50.0	42.1	42.1
J1b									
17	A282 NB Onslip from J1b	61.2	61.4	52.4	53.0	42.9	44.4	48.1	47.6
18	A282 SB Offslip to J1b	29.2	29.1	28.2	29.2	32.8	36.3	38.6	39.4
19	A225 Princes Road EB	92.3	92.5	86.7	86.4	67.6	70.1	79.4	78.9
20	A225 Princes Road WB	49.6	49.9	65.1	67.1	55.3	60.0	72.6	73.6
21	A296 Princes Road EB	11.3	11.3	13.6	13.5	11.4	11.5	13.7	13.7
22	A296 Princes Road WB	50.6	50.9	61.5	62.7	50.1	53.4	62.2	63.7
23	NB Link from J2	43.5	43.4	37.6	38.1	29.7	29.8	36.8	36.3
24	SB Link to J2	64.0	64.0	52.7	52.5	56.0	55.8	53.6	54.1
J2									
25	M25 NB Onslip from J2	2.8	0.1	38.1	37.8	72.8	72.6	46.6	47.6
26	A2 EB Offslip to J2	71.2	71.2	71.2	71.2	71.2	71.2	71.2	71.2
27	A2 WB Onslip from J2	48.9	49.4	51.6	52.8	53.0	51.3	58.4	59.5
28	A2 EB Onslip from J2	93.2	92.1	93.8	92.8	95.1	94.4	98.6	97.9
29	A2 WB Offslip to J2	0.0	0.5	13.0	16.6	12.0	12.3	25.4	25.4
30	M25 NB Offslip to J2	59.7	59.3	61.9	61.6	61.7	61.0	64.2	63.8
31	M25 SB Onslip from J2	105.1	105.1	85.6	85.4	106.3	106.5	85.2	85.4
32	M25 NB bypass to A2 WB	29.0	29.7	29.9	30.2	25.7	26.8	26.2	26.9
A2 Corridor									
33	A2 EB before J2	85.1	87.2	97.9	98.0	83.3	85.5	98.0	98.1
34	A2 WB after J2	88.1	89.5	85.9	88.3	91.8	92.7	88.2	90.8
35	A2 EB at J2	66.0	67.6	82.7	82.4	63.9	65.9	84.8	84.5
36	A2 WB at J2	81.6	83.3	78.4	81.3	86.3	87.5	81.0	84.3
37	A2 EB after J2	68.6	69.6	80.1	79.9	67.2	68.5	81.4	81.2
38	A2 WB before J2	86.3	87.5	85.8	88.0	92.4	93.7	89.6	91.7
M25/A282 Corridor									
39	A282 NB Dart Charge West Tunnel	112.5	112.2	116.3	116.1	95.1	95.2	98.8	98.8
40	A282 NB Dart Charge East Tunnel	108.2	107.7	113.5	113.0	84.1	84.3	93.9	93.6
41	A282 NB Dart Charge West Tunnel befor	49.4	49.1	51.7	51.1	41.7	42.7	37.9	37.8
42	A282 SB North of J1a	100.0	100.0	93.2	93.9	84.4	85.2	61.7	62.3
43	A282 NB at J1a	73.3	72.9	75.1	74.6	58.6	59.2	59.7	59.6
44	A282 SB at J1a	82.0	81.6	80.7	81.2	70.8	71.3	62.9	63.4
45	A282 NB betwen J1a and J1b	106.3	106.8	100.3	100.6	89.2	90.4	86.7	87.0
46	A282 SB betwen J1a and J1b	100.0	100.0	100.0	100.0	94.5	96.3	92.9	93.6
47	A282 NB at J1b (North side)	79.8	80.1	77.3	77.5	71.4	71.7	65.4	65.9
48	A282 SB at J1b (North side)	84.9	84.9	84.8	84.4	78.4	78.8	74.1	74.4
49	A282 NB at J1b (South side)	79.8	80.1	77.3	77.5	71.4	71.7	65.4	65.9
50	A282 SB at J1b (South side)	84.9	84.9	84.8	84.4	78.4	78.8	74.1	74.4
51	A282 NB between J1b and J2	73.6	73.8	69.5	69.7	80.1	80.2	67.4	67.8
52	A282 SB between J1b and J2	100.0	100.0	98.7	97.8	90.2	91.2	82.2	82.2
53	A282 NB at J2	73.6	73.8	68.6	68.8	79.6	79.7	65.7	66.1
54	A282 SB at J2	100.0	100.0	84.4	83.9	100.0	100.0	84.2	84.3
55	M25 NB South of J2	79.3	80.0	73.0	73.4	73.6	74.4	69.3	69.7
56	M25 SB South of J2	87.1	87.1	79.8	79.5	88.5	88.5	80.7	80.7
A282 / A2 Link Roads									
57	A2 WB to A282 NB	97.3	97.8	99.6	99.6	44.9	45.7	58.7	59.4
58	A282 SB to A2 EB	38.4	38.5	51.5	51.1	15.9	16.3	27.0	27.2

2038 demand flows (vehicles)

Ref = Reference Case
LP = Local Plan

Reduction in flows as a result of Local Plan
Local Plan increases flows between 0% and 5%
Local Plan increases flows between 5% and 10%
Local Plan increases flows by more than 10%

		No LTC								With LTC							
		0700-0800				1700-1800				0700-0800				1700-1800			
Link ID	Link Description	Ref	LP	Diff	% Diff	Ref	LP	Diff	% Diff	Ref	LP	Diff	% Diff	Ref	LP	Diff	% Diff
J1a																	
1	A206 Bob Dunn Way WB	1845	1926	81	4.4%	1687	1750	63	3.7%	2268	2306	39	1.7%	1765	1825	60	3.4%
2	A206 Bob Dunn Way EB	1255	1353	98	7.8%	1735	1830	95	5.5%	1283	1386	103	8.0%	1956	2041	85	4.4%
3	Rennie Drive NB	160	177	18	**11.0%**	96	92	-3	-3.5%	150	166	16	**10.7%**	87	89	2	2.8%
4	Rennie Drive SB	278	281	3	1.2%	466	467	1	0.2%	283	282	-2	-0.6%	500	502	2	0.3%
5	Crossways Boulevard NB	1521	1553	32	2.1%	1164	1183	20	1.7%	1565	1618	53	3.4%	1217	1236	19	1.5%
6	Crossways Boulevard SB	1208	1229	21	1.7%	1656	1679	24	1.4%	1083	1133	50	4.6%	1699	1723	23	1.4%
7	Cotton Lane WB	610	618	7	1.2%	343	347	4	1.2%	557	561	4	0.7%	445	449	4	0.9%
8	Cotton Lane EB	224	226	1	0.7%	692	697	5	0.7%	258	259	1	0.5%	562	567	5	0.8%
9	A282 NB Offslip to J1a	1276	1320	44	3.5%	1139	1194	55	4.8%	1819	1832	13	0.7%	1374	1425	51	3.7%
10	A282 NB Onslip from J1a	462	478	16	3.5%	593	628	34	5.8%	437	403	-34	-7.8%	670	696	27	4.0%
11	A282 SB Offslip to J1a	1301	1340	39	3.0%	1159	1158	-1	-0.1%	1524	1528	4	0.2%	977	976	-2	-0.2%
12	A282 SB Onslip from J1a	1059	1123	64	6.1%	1646	1704	59	3.6%	1393	1489	97	7.0%	2060	2111	51	2.5%
13	Bridge Link (west) EB	1374	1447	74	5.4%	1859	1923	64	3.4%	1625	1736	111	6.8%	2151	2209	58	2.7%
14	Bridge Link (east) EB	1374	1447	74	5.4%	1859	1923	64	3.4%	1625	1736	111	6.8%	2151	2209	58	2.7%
15	Bridge Link (west) WB	1032	1075	43	4.1%	895	902	7	0.8%	1095	1112	17	1.6%	842	852	10	1.2%
16	Bridge Link (east) WB	1690	1733	43	2.5%	1515	1522	7	0.5%	1574	1591	17	1.1%	1432	1442	10	0.7%
J1b																	
17	A282 NB Onslip from J1b	1210	1237	26	2.2%	1055	1088	33	3.1%	894	932	37	4.2%	954	963	9	1.0%
18	A282 SB Offslip to J1b	512	513	1	0.2%	595	625	30	5.0%	584	616	32	5.4%	777	800	22	2.9%
19	A225 Princes Road EB	1369	1380	11	0.8%	1291	1288	-3	-0.2%	1427	1472	45	3.2%	1331	1364	32	2.4%
20	A225 Princes Road WB	960	980	20	2.1%	1214	1266	52	4.3%	1072	1136	64	6.0%	1355	1400	45	3.3%
21	A296 Princes Road EB	1071	1084	13	1.2%	1318	1337	20	1.5%	1087	1101	14	1.2%	1311	1331	20	1.5%
22	A296 Princes Road WB	927	939	12	1.3%	1276	1296	20	1.6%	921	933	12	1.3%	1136	1150	14	1.3%
23	NB Link from J2	1647	1685	38	2.3%	1486	1544	58	3.9%	1170	1195	25	2.1%	1452	1473	21	1.4%
24	SB Link to J2	1213	1218	4	0.4%	1060	1061	0	0.0%	1049	1049	-1	-0.1%	1077	1092	15	1.4%
J2																	
25	M25 NB Onslip from J2	14	0	-14	-98.4%	312	315	3	0.8%	867	876	9	1.1%	479	506	26	5.5%
26	A2 EB Offslip to J2	2019	2087	69	3.4%	2086	2158	72	3.4%	2051	2092	41	2.0%	2104	2188	83	4.0%
27	A2 WB Onslip from J2	916	941	24	2.6%	987	1024	37	3.7%	1004	1022	18	1.8%	1114	1154	40	3.6%
28	A2 EB Onslip from J2	1494	1494	0	0.0%	1590	1592	2	0.1%	1511	1512	2	0.1%	1657	1667	10	0.6%
29	A2 WB Offslip to J2	0	2	2	**5525.0%**	61	83	21	**34.4%**	57	57	1	1.2%	120	121	1	0.6%
30	M25 NB Offslip to J2	1852	1852	0	0.0%	1880	1884	4	0.2%	1897	1897	0	0.0%	1939	1939	-1	0.0%
31	M25 SB Onslip from J2	1641	1690	48	3.0%	1534	1572	37	2.4%	1273	1275	2	0.2%	1494	1533	39	2.6%
32	M25 NB bypass to A2 WB	594	615	21	3.6%	618	632	14	2.3%	527	562	36	6.8%	536	554	18	3.4%
A2 Corridor																	
33	A2 EB before J2	5061	5263	203	4.0%	6026	6226	201	3.3%	4967	5137	170	3.4%	6098	6299	201	3.3%
34	A2 WB after J2	5225	5344	119	2.3%	5321	5502	181	3.4%	5461	5597	136	2.5%	5445	5653	209	3.8%
35	A2 EB at J2	3042	3176	134	4.4%	3939	4068	129	3.3%	2916	3044	129	4.4%	3993	4111	118	3.0%
36	A2 WB at J2	3715	3788	73	2.0%	3716	3847	130	3.5%	3931	4013	82	2.1%	3794	3945	151	4.0%
37	A2 EB after J2	5966	6110	144	2.4%	7745	7885	140	1.8%	5093	5247	154	3.0%	6871	7017	146	2.1%
38	A2 WB before J2	6607	6696	89	1.3%	6978	7128	150	2.2%	6066	6168	102	1.7%	6543	6705	162	2.5%
M25/A282 Corridor																	
39	A282 NB Dart Charge West Tunnel	2965	2981	16	0.5%	3125	3150	24	0.8%	2398	2417	19	0.8%	2692	2722	30	1.1%
40	A282 NB Dart Charge East Tunnel	3874	3884	10	0.3%	3667	3672	5	0.1%	2971	2987	16	0.5%	3169	3176	7	0.2%
41	A282 NB Dart Charge West Tunnel befo	1845	1845	0	0.0%	1912	1902	-10	-0.5%	1482	1535	53	3.6%	1433	1435	3	0.2%
42	A282 SB North of J1a	6922	6957	35	0.5%	7154	7189	36	0.5%	6504	6552	48	0.7%	5743	5784	41	0.7%
43	A282 NB at J1a	5719	5729	10	0.2%	5579	5574	-5	-0.1%	4453	4522	69	1.5%	4602	4612	10	0.2%
44	A282 SB at J1a	5620	5616	-4	-0.1%	5995	6031	36	0.6%	4980	5024	45	0.9%	4765	4809	43	0.9%
45	A282 NB betwen J1a and J1b	6995	7049	54	0.8%	6719	6768	49	0.7%	6272	6354	82	1.3%	5976	6036	61	1.0%
46	A282 SB betwen J1a and J1b	6679	6739	60	0.9%	7640	7736	95	1.2%	6372	6514	141	2.2%	6826	6920	94	1.4%
47	A282 NB at J1b (North side)	5784	5813	28	0.5%	5663	5679	16	0.3%	5378	5422	45	0.8%	5022	5073	51	1.0%
48	A282 SB at J1b (North side)	6167	6226	59	1.0%	7046	7111	66	0.9%	5788	5898	110	1.9%	6048	6120	72	1.2%
49	A282 NB at J1b (South side)	5784	5813	28	0.5%	5663	5679	16	0.3%	5378	5422	45	0.8%	5022	5073	51	1.0%
50	A282 SB at J1b (South side)	6167	6226	59	1.0%	7046	7111	66	0.9%	5788	5898	110	1.9%	6048	6120	72	1.2%
51	A282 NB between J1b and J2	4027	4042	15	0.4%	3799	3816	17	0.4%	4526	4551	25	0.6%	3820	3861	41	1.1%
52	A282 SB between J1b and J2	5538	5575	38	0.7%	6224	6251	27	0.4%	5019	5113	94	1.9%	5093	5127	34	0.7%
53	A282 NB at J2	4013	4042	29	0.7%	3487	3502	14	0.4%	3660	3676	16	0.4%	3341	3355	14	0.4%
54	A282 SB at J2	4108	4135	27	0.7%	4008	4026	18	0.4%	4352	4423	71	1.6%	3872	3888	16	0.4%
55	M25 NB South of J2	6459	6509	50	0.8%	5985	6018	33	0.5%	6084	6135	51	0.8%	5816	5848	32	0.5%
56	M25 SB South of J2	6884	6960	76	1.1%	6879	6934	55	0.8%	6852	6925	73	1.1%	6792	6847	55	0.8%
A282 / A2 Link Roads																	
57	A2 WB to A282 NB	1758	1771	13	0.7%	1864	1863	-1	-0.1%	852	871	20	2.3%	1202	1212	10	0.9%
58	A282 SB to A2 EB	1430	1440	10	0.7%	2216	2225	9	0.4%	666	690	24	3.6%	1221	1239	18	1.5%

2038 link delay (seconds)

Ref = Reference Case
LP = Local Plan

Reduction in delay as a result of Local Plan
Local Plan increases link delay between 0% and 5%
Local Plan increases link delay between 5% and 10%
Local Plan increases link delay by more than 10%

		No LTC								With LTC							
		0700-0800				1700-1800				0700-0800				1700-1800			
Link ID	Link Description	Ref	LP	Diff	% Diff	Ref	LP	Diff	% Diff	Ref	LP	Diff	% Diff	Ref	LP	Diff	% Diff
J1a																	
1	A206 Bob Dunn Way WB	6	6	0	6.9%	5	5	0	6.2%	9	10	0	1.6%	6	6	0	5.4%
2	A206 Bob Dunn Way EB	10	10	0	1.3%	12	12	0	1.5%	10	11	0	1.3%	12	12	0	0.4%
3	Rennie Drive NB	0	0	0	0.0%	0	0	0	0.0%	0	0	0	0.0%	0	0	0	0.0%
4	Rennie Drive SB	21	22	0	0.1%	23	23	0	0.0%	22	22	0	0.0%	23	23	0	0.0%
5	Crossways Boulevard NB	13	13	0	0.8%	10	10	0	0.2%	13	14	0	2.7%	10	10	0	-0.1%
6	Crossways Boulevard SB	10	10	0	1.2%	14	15	0	1.7%	9	10	0	2.6%	16	16	0	2.1%
7	Cotton Lane WB	10	10	0	1.7%	4	4	0	1.8%	9	9	0	0.9%	6	6	0	1.4%
8	Cotton Lane EB	0	0	0	0.0%	3	3	0	-1.8%	0	0	0	0.0%	1	1	0	-3.4%
9	A282 NB Offslip to J1a	2	2	0	2.9%	2	2	0	5.8%	3	3	0	2.1%	2	2	0	6.2%
10	A282 NB Onslip from J1a	1	1	0	0.8%	1	1	0	1.4%	1	1	0	-3.1%	2	2	0	0.7%
11	A282 SB Offslip to J1a	16	16	0	0.3%	8	8	0	-0.1%	16	16	0	0.1%	7	7	0	-0.1%
12	A282 SB Onslip from J1a	2	2	0	7.8%	4	5	1	**14.1%**	4	4	1	**19.8%**	60	90	30	**50.1%**
13	Bridge Link (west) EB	1	1	0	1.4%	1	1	0	0.0%	1	1	0	4.3%	1	1	0	0.0%
14	Bridge Link (east) EB	1	1	0	1.4%	1	1	0	0.0%	1	1	0	4.3%	1	1	0	0.0%
15	Bridge Link (west) WB	13	13	0	1.3%	13	13	0	0.2%	13	13	0	0.4%	13	13	0	0.2%
16	Bridge Link (east) WB	1	1	0	1.9%	1	1	0	0.0%	1	1	0	0.0%	1	1	0	0.0%
J1b																	
17	A282 NB Onslip from J1b	2	2	0	1.8%	2	2	0	1.1%	1	2	0	3.4%	2	2	0	-1.2%
18	A282 SB Offslip to J1b	26	26	0	0.0%	24	24	0	0.3%	26	26	0	1.1%	25	25	0	0.3%
19	A225 Princes Road EB	16	17	1	5.4%	12	12	0	0.2%	7	7	0	4.4%	9	9	0	-2.7%
20	A225 Princes Road WB	12	12	0	0.1%	12	13	0	1.1%	12	12	0	0.9%	13	13	0	1.2%
21	A296 Princes Road EB	0	0	0	0.0%	0	0	0	0.0%	0	0	0	0.0%	0	0	0	0.0%
22	A296 Princes Road WB	6	6	0	0.2%	6	6	0	1.4%	6	6	0	4.7%	7	7	0	2.1%
23	NB Link from J2	1	1	0	0.0%	1	1	0	2.9%	1	1	0	0.0%	1	1	0	-3.1%
24	SB Link to J2	2	2	0	-0.4%	2	2	0	-0.6%	2	2	0	0.0%	2	2	0	1.1%
J2																	
25	M25 NB Onslip from J2	9	10	0	3.0%	7	7	0	0.4%	8	8	0	0.4%	7	7	0	0.5%
26	A2 EB Offslip to J2	23	23	0	0.0%	23	23	0	0.0%	23	23	0	0.0%	23	23	0	0.0%
27	A2 WB Onslip from J2	2	2	0	1.1%	2	2	0	2.7%	2	2	0	-2.1%	2	2	0	3.7%
28	A2 EB Onslip from J2	17	15	-2	-10.9%	18	16	-2	-12.2%	21	19	-2	-8.6%	35	30	-5	-14.5%
29	A2 WB Offslip to J2	34	34	0	0.1%	35	36	0	1.2%	35	35	0	0.0%	37	37	0	0.1%
30	M25 NB Offslip to J2	13	13	0	-0.5%	14	14	0	-0.3%	13	13	0	-0.9%	15	15	0	-0.5%
31	M25 SB Onslip from J2	115	115	0	0.0%	8	8	0	-0.9%	142	148	6	4.1%	8	8	0	0.1%
32	M25 NB bypass to A2 WB	1	1	0	0.8%	1	1	0	0.8%	1	1	0	2.5%	1	1	0	0.8%
A2 Corridor																	
33	A2 EB before J2	14	29	15	**105.5%**	25	26	1	4.2%	20	32	12	**57.2%**	25	29	4	**17.9%**
34	A2 WB after J2	31	34	4	**12.0%**	26	32	6	**23.5%**	39	42	3	8.1%	31	38	7	**22.7%**
35	A2 EB at J2	2	2	0	6.3%	4	4	0	-1.4%	2	2	0	8.4%	5	5	0	-2.2%
36	A2 WB at J2	5	5	0	7.8%	4	5	1	**13.2%**	6	7	1	9.3%	5	6	1	**17.1%**
37	A2 EB after J2	3	3	0	4.2%	4	4	0	-0.9%	3	3	0	6.3%	5	5	0	-1.1%
38	A2 WB before J2	7	8	0	5.8%	7	8	1	**11.8%**	10	11	1	**10.5%**	8	10	1	**15.3%**
M25/A282 Corridor																	
39	A282 NB Dart Charge West Tunnel	270	263	-7	-2.5%	340	337	-3	-0.8%	20	20	0	2.1%	36	36	0	0.4%
40	A282 NB Dart Charge East Tunnel	187	176	-12	-6.3%	286	274	-11	-3.9%	10	10	0	0.7%	16	16	0	-2.5%
41	A282 NB Dart Charge West Tunnel befo	2	2	0	-1.4%	2	2	0	-2.1%	2	2	0	4.9%	1	1	0	-0.7%
42	A282 SB North of J1a	26	26	0	0.2%	6	7	1	**11.3%**	3	3	0	6.3%	1	1	0	1.9%
43	A282 NB at J1a	10	9	-1	-10.3%	14	12	-2	-12.1%	2	2	0	1.7%	3	3	0	-1.0%
44	A282 SB at J1a	4	4	0	-1.3%	4	4	0	1.6%	3	3	0	1.8%	2	2	0	1.4%
45	A282 NB betwen J1a and J1b	118	131	13	**11.3%**	11	17	6	**50.0%**	4	4	0	4.2%	4	4	0	0.8%
46	A282 SB betwen J1a and J1b	26	26	0	0.0%	26	26	0	0.0%	9	12	2	**24.8%**	8	9	0	5.2%
47	A282 NB at J1b (North side)	5	5	0	1.4%	5	5	0	0.4%	4	4	0	1.4%	3	3	0	1.7%
48	A282 SB at J1b (North side)	39	37	-3	-7.3%	16	13	-3	-18.9%	6	6	0	6.7%	4	4	0	0.7%
49	A282 NB at J1b (South side)	13	14	1	6.2%	7	7	0	4.5%	1	2	0	1.4%	1	1	0	2.6%
50	A282 SB at J1b (South side)	39	37	-3	-7.3%	16	13	-3	-18.9%	6	6	0	6.7%	4	4	0	0.7%
51	A282 NB between J1b and J2	2	3	0	1.2%	2	2	0	0.9%	3	3	0	0.9%	2	2	0	1.5%
52	A282 SB between J1b and J2	3	3	0	0.0%	3	3	0	-2.4%	2	2	0	3.5%	2	2	0	0.0%
53	A282 NB at J2	4	4	0	1.5%	3	3	0	1.3%	4	4	0	0.8%	3	3	0	1.2%
54	A282 SB at J2	30	30	0	0.0%	5	5	0	-2.6%	30	30	0	0.1%	5	5	0	-0.4%
55	M25 NB South of J2	73	79	6	8.3%	77	82	5	6.1%	70	80	11	**15.3%**	70	75	5	6.5%
56	M25 SB South of J2	30	30	0	0.0%	13	12	-1	-5.1%	33	33	0	0.3%	15	15	0	0.3%
A282 / A2 Link Roads																	
57	A2 WB to A282 NB	22	25	3	**13.4%**	35	35	0	-1.0%	2	2	0	1.3%	2	2	0	1.0%
58	A282 SB to A2 EB	0	0	0	0.0%	0	0	0	0.0%	0	0	0	0.0%	0	0	0	0.0%

2038 V/C (percent)

Link V/C is 85% or less
Link V/C is between 85% and 100%
Link V/C is greater than 100%

		No LTC				With LTC			
		0700-0800		1700-1800		0700-0800		1700-1800	
Link ID	Link Description	Ref	LP	Ref	LP	Ref	LP	Ref	LP
J1a									
1	A206 Bob Dunn Way WB	19.9	20.6	18.4	18.9	24.8	25.0	19.1	19.6
2	A206 Bob Dunn Way EB	33.8	35.5	43.7	44.8	34.5	36.3	49.2	49.5
3	Rennie Drive NB	7.3	7.9	4.5	4.2	6.8	7.4	4.1	4.1
4	Rennie Drive SB	26.6	26.8	41.2	41.3	27.0	26.9	43.7	43.9
5	Crossways Boulevard NB	56.9	57.4	43.3	43.5	58.4	59.9	44.8	44.7
6	Crossways Boulevard SB	63.9	64.7	75.3	76.3	57.7	59.7	78.6	79.7
7	Cotton Lane WB	69.2	70.0	37.1	37.5	63.5	63.9	48.1	48.5
8	Cotton Lane EB	13.9	13.8	40.3	40.0	16.0	16.0	32.5	32.2
9	A282 NB Offslip to J1a	34.3	35.1	31.7	32.9	50.9	50.7	37.9	39.0
10	A282 NB Onslip from J1a	30.0	30.5	36.0	37.1	29.3	27.0	40.0	40.5
11	A282 SB Offslip to J1a	50.3	51.3	32.2	32.1	57.7	57.8	27.4	27.4
12	A282 SB Onslip from J1a	61.1	64.0	81.2	83.6	77.5	81.3	101.2	102.8
13	Bridge Link (west) EB	25.1	26.1	32.9	33.4	29.9	31.4	38.0	38.1
14	Bridge Link (east) EB	25.1	26.1	32.9	33.4	29.9	31.4	38.0	38.1
15	Bridge Link (west) WB	51.2	53.0	46.1	46.3	54.5	55.0	43.7	43.9
16	Bridge Link (east) WB	54.0	54.9	44.4	44.4	49.9	50.1	42.1	42.2
J1b									
17	A282 NB Onslip from J1b	61.2	61.9	52.4	53.1	42.9	44.7	48.1	47.4
18	A282 SB Offslip to J1b	29.2	29.0	28.2	29.2	32.8	36.0	38.6	39.4
19	A225 Princes Road EB	92.3	93.1	86.7	86.3	67.6	70.5	79.4	78.4
20	A225 Princes Road WB	49.6	49.7	65.1	67.0	55.3	59.6	72.6	73.8
21	A296 Princes Road EB	11.3	11.3	13.6	13.5	11.4	11.5	13.7	13.7
22	A296 Princes Road WB	50.6	51.0	61.5	62.7	50.1	53.2	62.2	63.6
23	NB Link from J2	43.5	43.5	37.6	38.1	29.7	29.8	36.8	36.3
24	SB Link to J2	64.0	64.0	52.7	52.4	56.0	56.0	53.6	53.9
J2									
25	M25 NB Onslip from J2	2.8	0.1	38.1	37.9	72.8	72.8	46.6	47.6
26	A2 EB Offslip to J2	71.2	71.2	71.2	71.2	71.2	71.2	71.2	71.2
27	A2 WB Onslip from J2	48.9	49.5	51.6	52.9	53.0	51.9	58.4	59.8
28	A2 EB Onslip from J2	93.2	92.0	93.8	92.5	95.1	94.3	98.6	97.7
29	A2 WB Offslip to J2	0.0	0.5	13.0	17.4	12.0	12.1	25.4	25.5
30	M25 NB Offslip to J2	59.7	59.2	61.9	61.6	61.7	60.9	64.2	63.8
31	M25 SB Onslip from J2	105.1	105.1	85.6	85.4	106.3	106.5	85.2	85.4
32	M25 NB bypass to A2 WB	29.0	29.8	29.9	30.4	25.7	27.0	26.2	26.9
A2 Corridor									
33	A2 EB before J2	85.1	87.3	97.9	98.0	83.3	85.7	98.0	98.1
34	A2 WB after J2	88.1	89.7	85.9	88.5	91.8	93.2	88.2	91.2
35	A2 EB at J2	66.0	67.6	82.7	82.3	63.9	66.1	84.8	84.3
36	A2 WB at J2	81.6	83.6	78.4	81.6	86.3	88.0	81.0	84.8
37	A2 EB after J2	68.6	69.6	80.1	79.8	67.2	68.6	81.4	81.1
38	A2 WB before J2	86.3	87.6	85.8	88.3	92.4	93.8	89.6	92.1
M25/A282 Corridor									
39	A282 NB Dart Charge West Tunnel	112.5	112.1	116.3	116.1	95.1	95.3	98.8	98.8
40	A282 NB Dart Charge East Tunnel	108.2	107.6	113.5	112.9	84.1	84.3	93.9	93.6
41	A282 NB Dart Charge West Tunnel befor	49.4	49.0	51.7	51.1	41.7	42.9	37.9	37.8
42	A282 SB North of J1a	100.0	100.0	93.2	94.0	84.4	85.3	61.7	62.4
43	A282 NB at J1a	73.3	72.8	75.1	74.6	58.6	59.3	59.7	59.5
44	A282 SB at J1a	82.0	81.6	80.7	81.2	70.8	71.3	62.9	63.4
45	A282 NB betwen J1a and J1b	106.3	107.0	100.3	100.6	89.2	90.7	86.7	86.9
46	A282 SB betwen J1a and J1b	100.0	100.0	100.0	100.0	94.5	96.5	92.9	93.6
47	A282 NB at J1b (North side)	79.8	80.2	77.3	77.5	71.4	71.8	65.4	65.9
48	A282 SB at J1b (North side)	84.9	84.9	84.8	84.4	78.4	79.1	74.1	74.4
49	A282 NB at J1b (South side)	79.8	80.2	77.3	77.5	71.4	71.8	65.4	65.9
50	A282 SB at J1b (South side)	84.9	84.9	84.8	84.4	78.4	79.1	74.1	74.4
51	A282 NB between J1b and J2	73.6	73.8	69.5	69.7	80.1	80.3	67.4	67.9
52	A282 SB between J1b and J2	100.0	100.0	98.7	97.8	90.2	91.4	82.2	82.2
53	A282 NB at J2	73.6	73.8	68.6	68.8	79.6	79.8	65.7	66.2
54	A282 SB at J2	100.0	100.0	84.4	83.9	100.0	100.0	84.2	84.2
55	M25 NB South of J2	79.3	80.0	73.0	73.4	73.6	74.5	69.3	69.7
56	M25 SB South of J2	87.1	87.1	79.8	79.5	88.5	88.6	80.7	80.7
A282 / A2 Link Roads									
57	A2 WB to A282 NB	97.3	97.9	99.6	99.5	44.9	45.8	58.7	59.1
58	A282 SB to A2 EB	38.4	38.4	51.5	51.1	15.9	16.3	27.0	27.2

Appendix J

CD122 figures

Figure 3.12a All-purpose road merging diagram

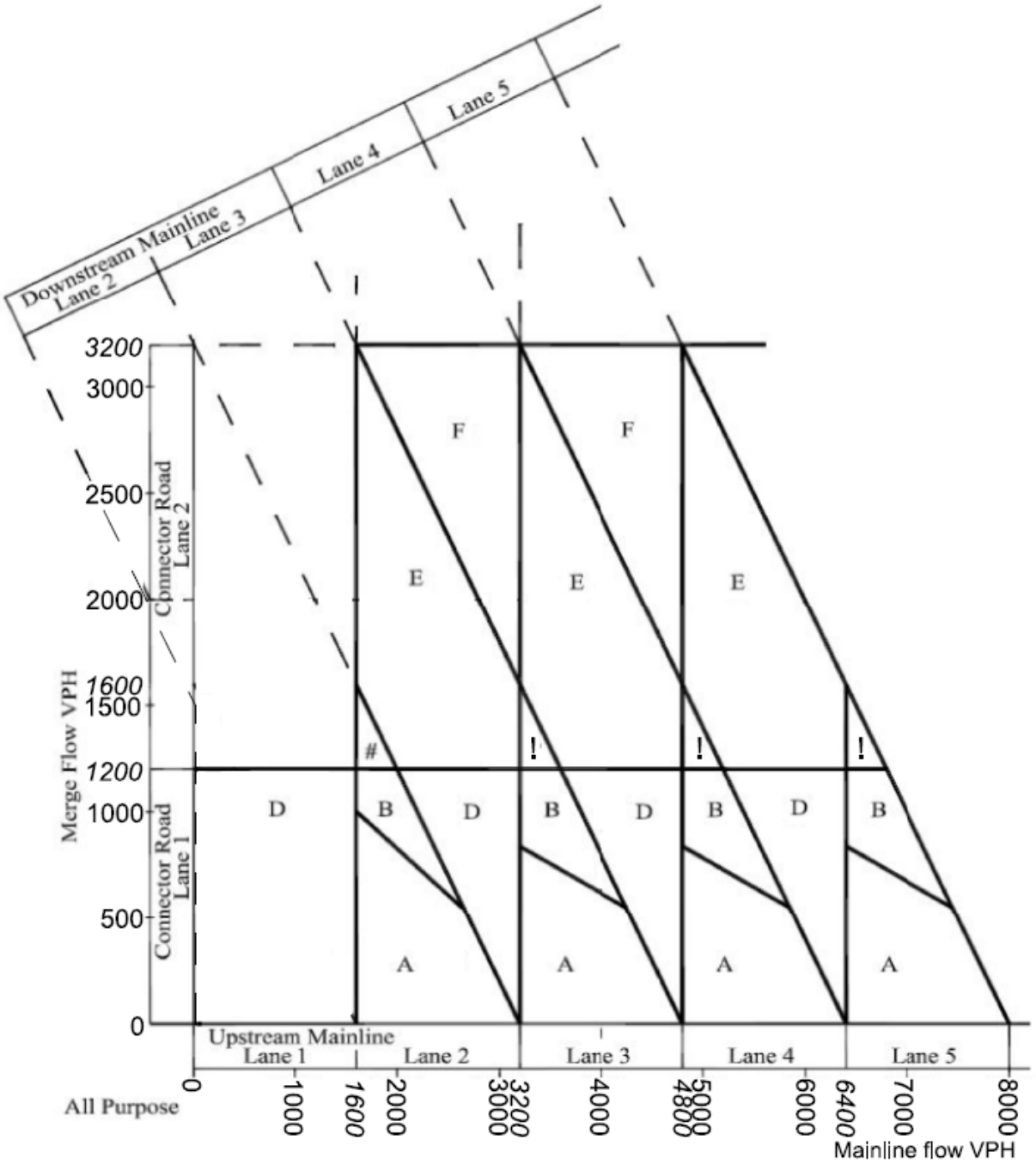
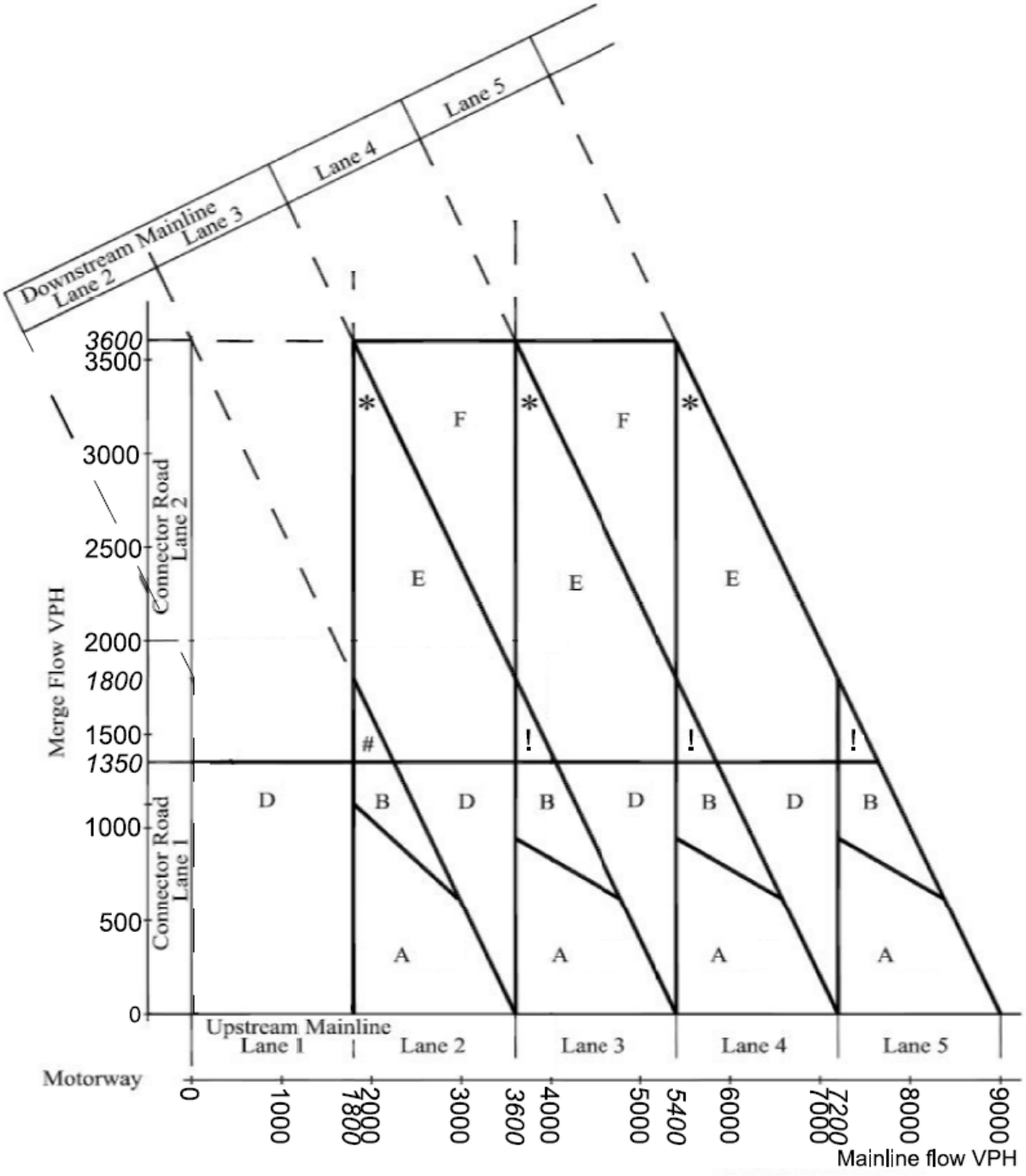


Figure 3.12b Motorway merging diagram



NOTE 1 *As an example of how to use Figures 3.12a and 3.12b, if the merge flow is 2000vph and the upstream mainline flow is 4000vph, this would give a Type E layout with 3 lanes upstream and 4 lanes downstream.*

NOTE 2 *On Figures 3.12a and 3.12b, the # symbol indicates areas of uncertainty and the choice depends on the upstream and downstream provision and the ability for the mainline to accept the flows from the merge.*

NOTE 3 *On Figures 3.12a and 3.12b, the ! symbol indicates that the minimum layout to be provided is:*

1) Layout C for rural roads;

2) Layout A Option 2 for urban roads.

Figure 3.26a All-purpose road diverging diagram

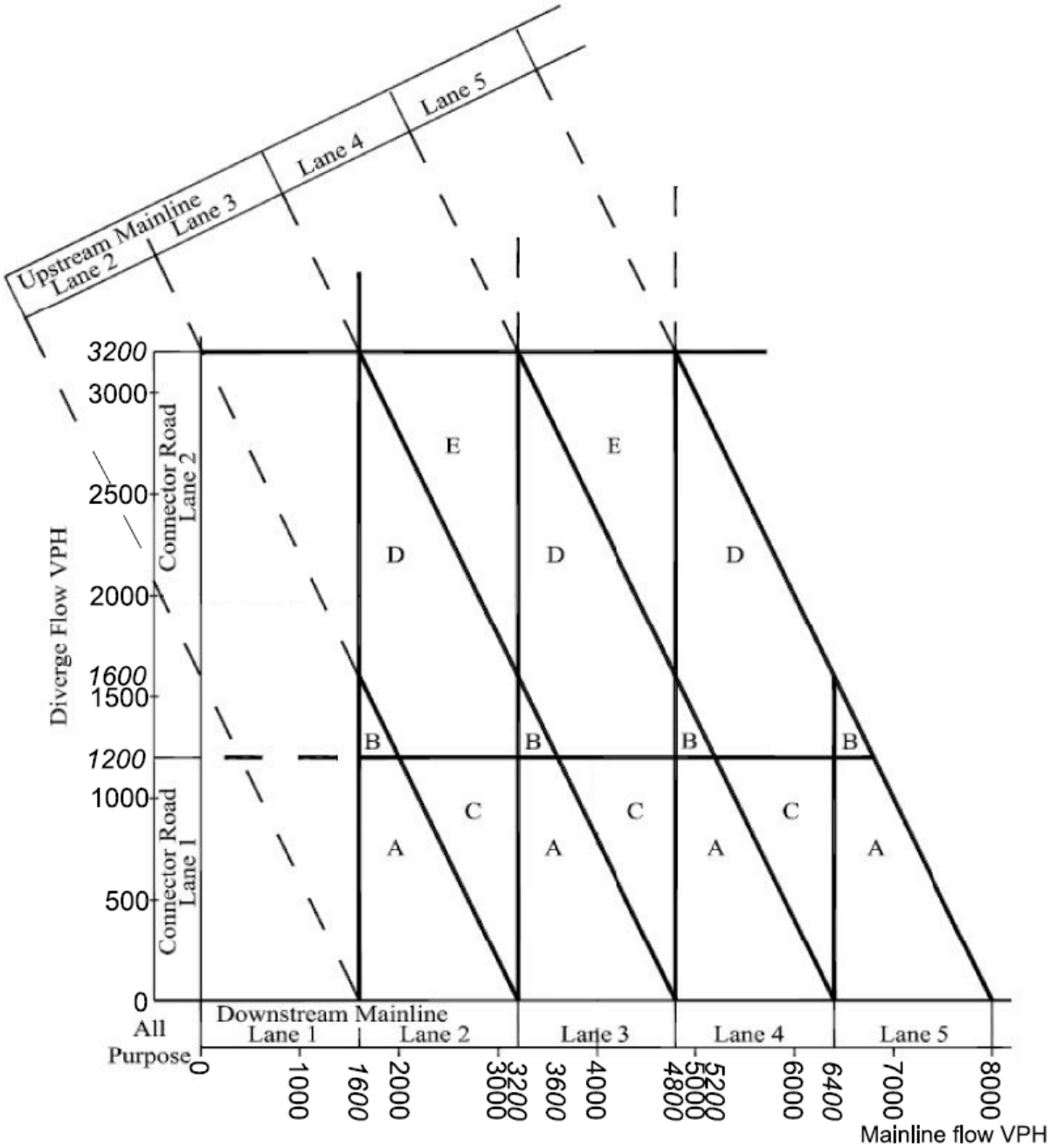
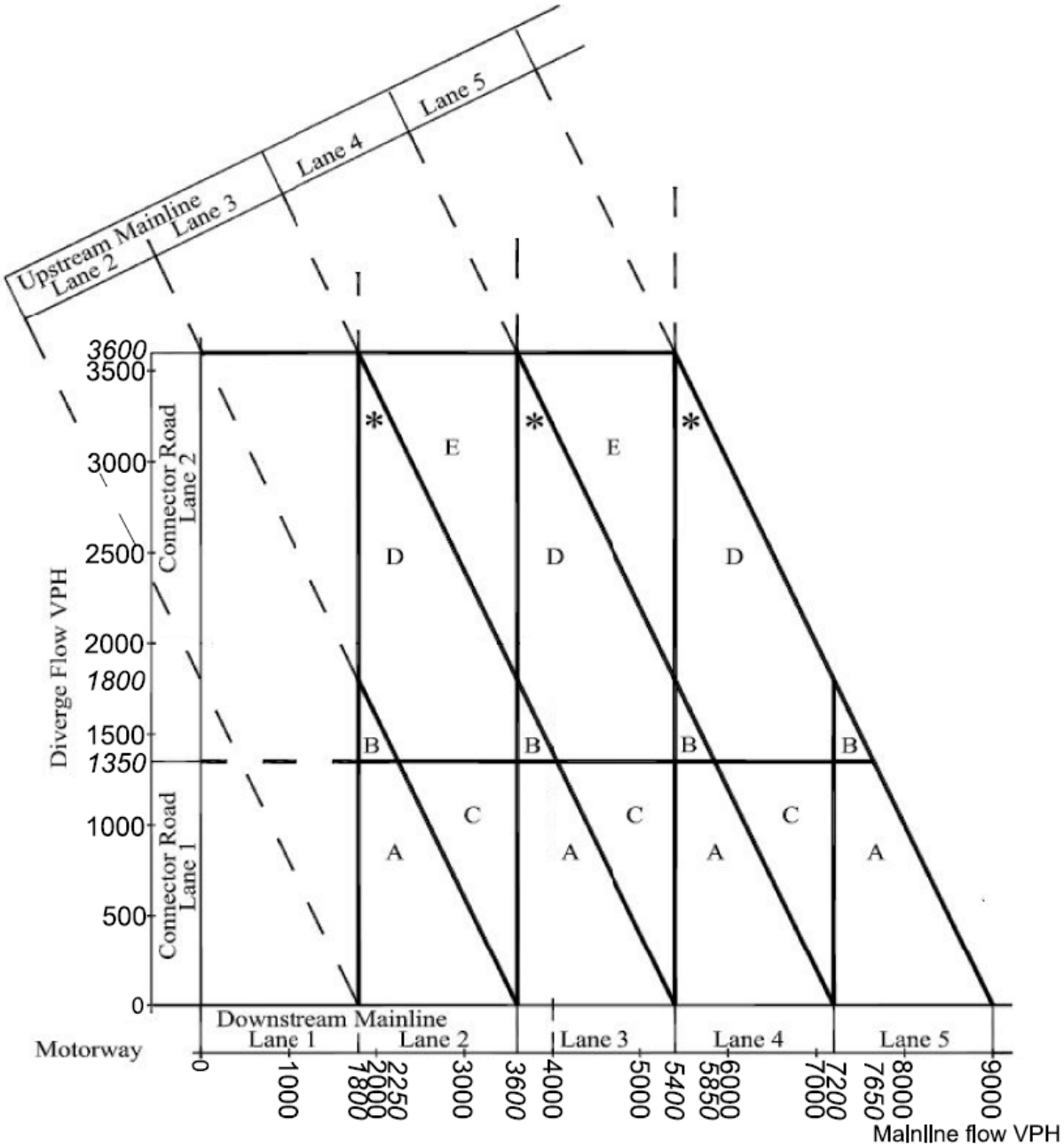


Figure 3.26b Motorway diverging diagram



NOTE *As an example of how to use Figures 3.24a and 3.24b, if the diverge flow is 2000vph and the downstream mainline flow is 4000vph, this would give a Type D layout with 3 lanes downstream and 4 lanes upstream.*

3.26.1 Where the flows are in the region indicated by the * symbol in Figures 3.25b and Layout D option 2 is to be used, an extended auxiliary lane should be provided instead of a taper diverge.

3.26.2 A diverge layout that offers a higher level of capacity than the worst case peak flow may be provided, e.g. Layout C instead of Layout A.

NOTE *A diverge layout that offers less capacity than the worst case peak flow cannot be used e.g. a Layout C instead of Layout E.*

3.27 For situations where 3 lanes on the diverge connector road are needed, Layout F shall be used.

Figure 3.14a Layout A option 1 - taper merge

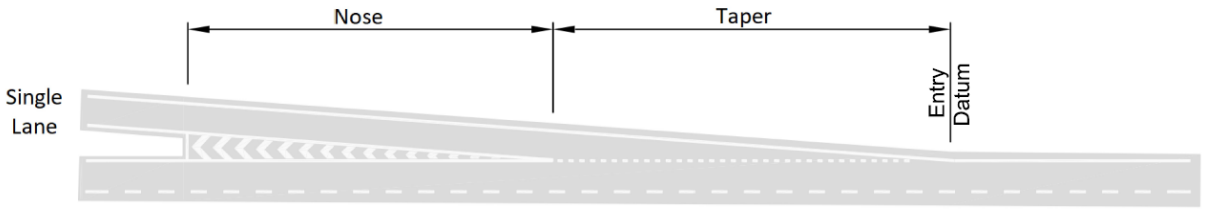


Figure 3.14b Layout A option 2 - 2 lane taper merge

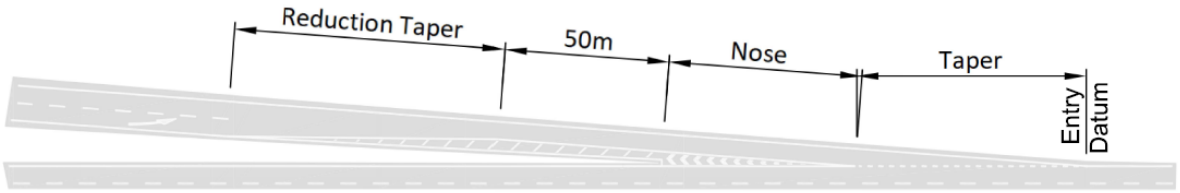


Figure 3.14c Layout B - parallel merge

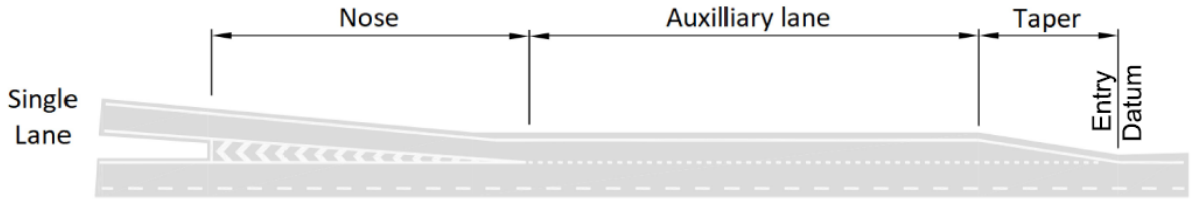


Figure 3.14d Layout C - ghost island merge

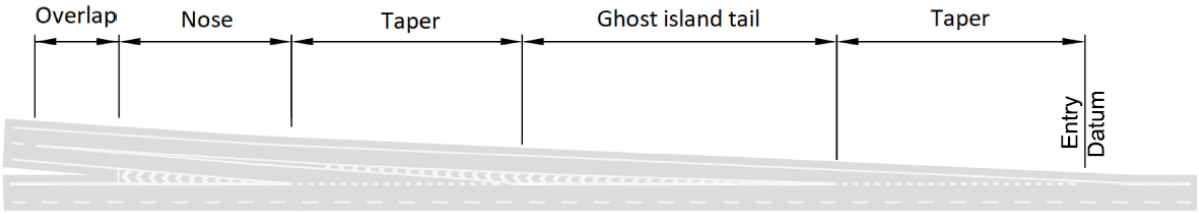


Figure 3.14e Layout D - lane gain

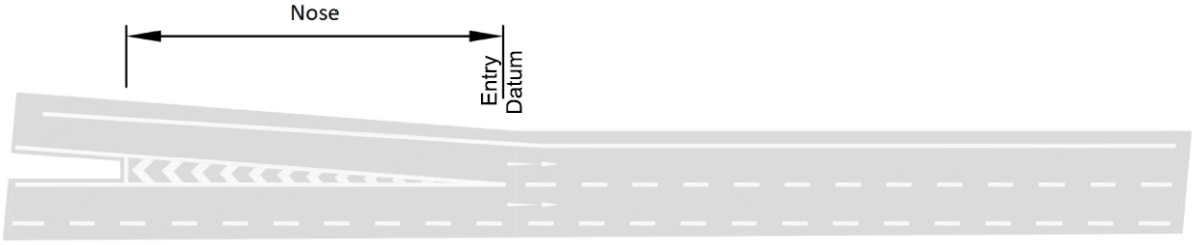


Figure 3.14f Layout E Option 1 - lane gain with ghost island offside merge

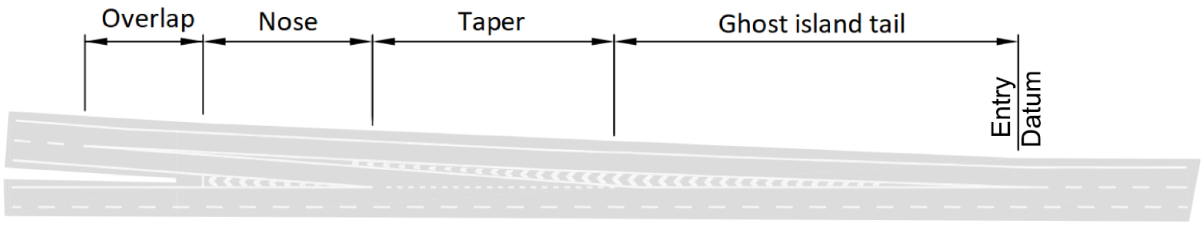


Figure 3.14g Layout E Option 2 - lane gain with ghost island nearside merge

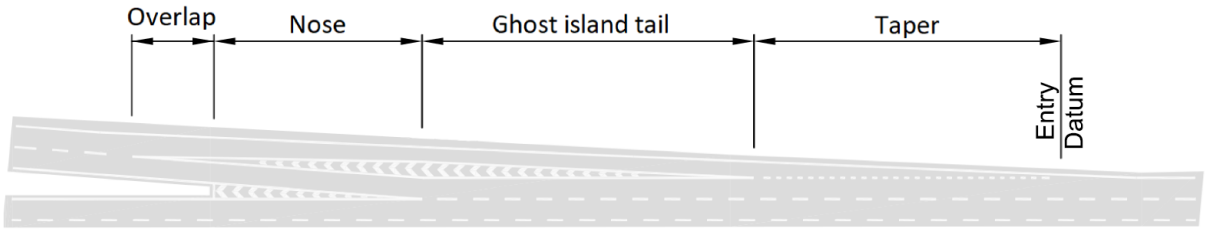


Figure 3.14h Layout F - 2 lane gain with ghost island

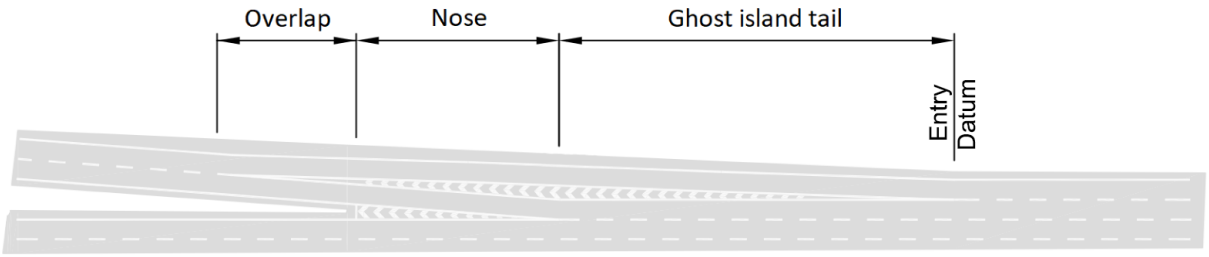


Figure 3.14i Layout G Option 1 - mainline lane gain and double ghost island merge

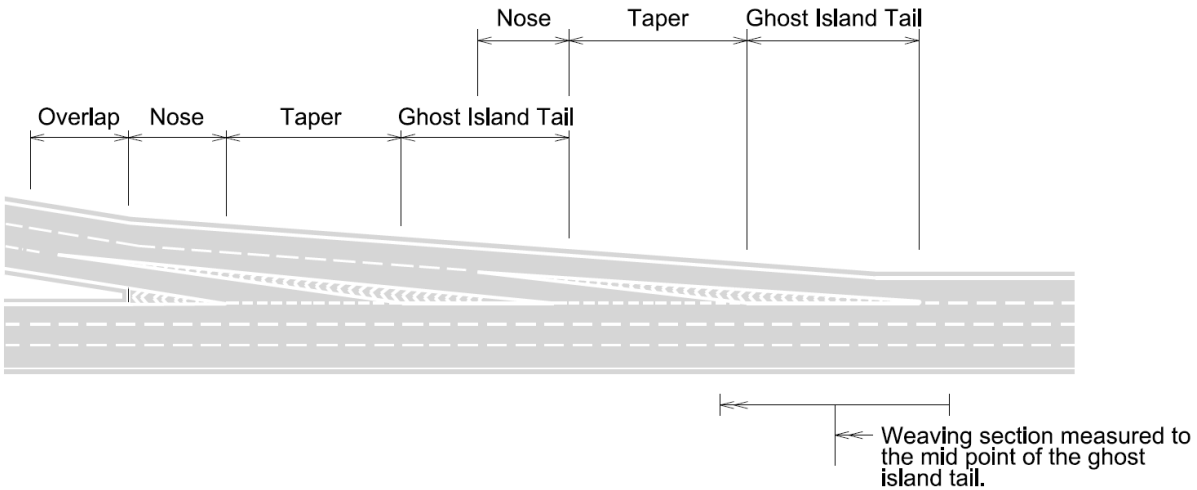


Figure 3.14j Layout G Option 2 - mainline lane gain and single ghost island merge

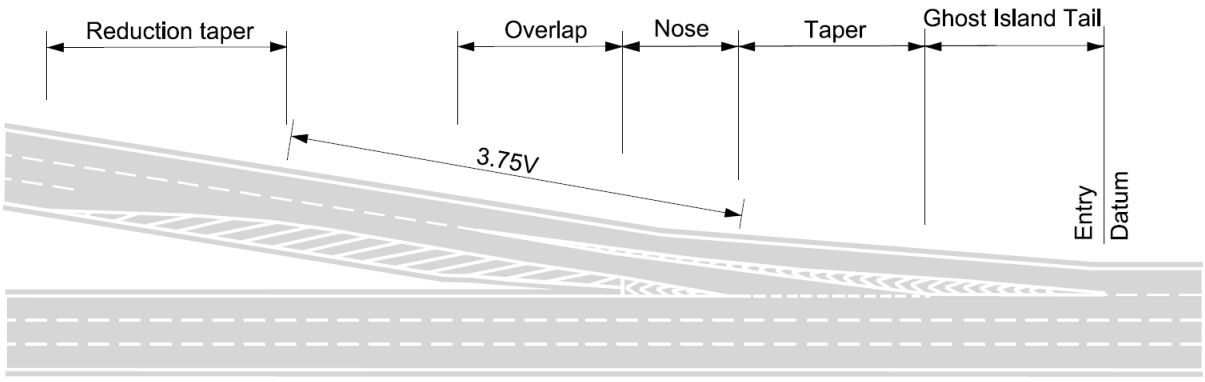


Figure 3.14k Layout H - mainline 2 lane gain and ghost island merge

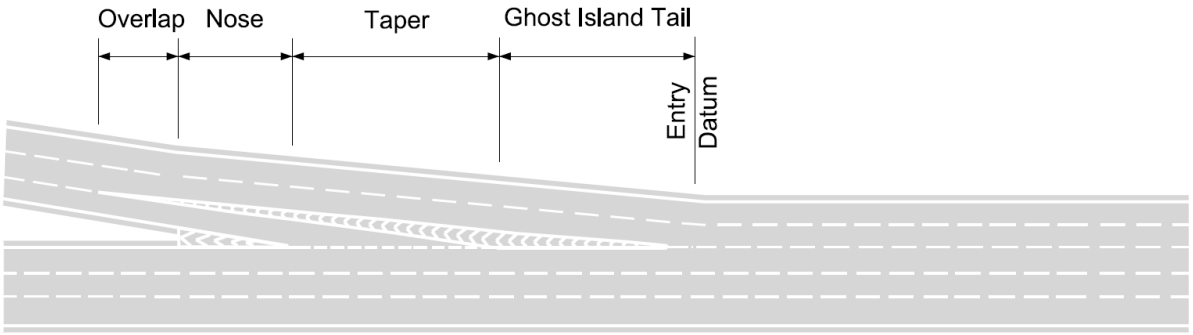


Figure 3.30a Layout A option 1 - taper diverge

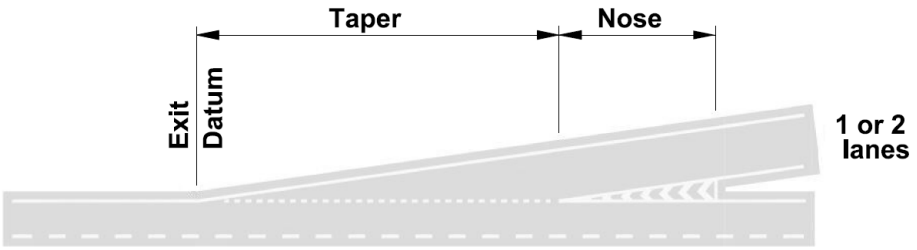


Figure 3.30b Layout A option 2 - Single lane auxillary diverge

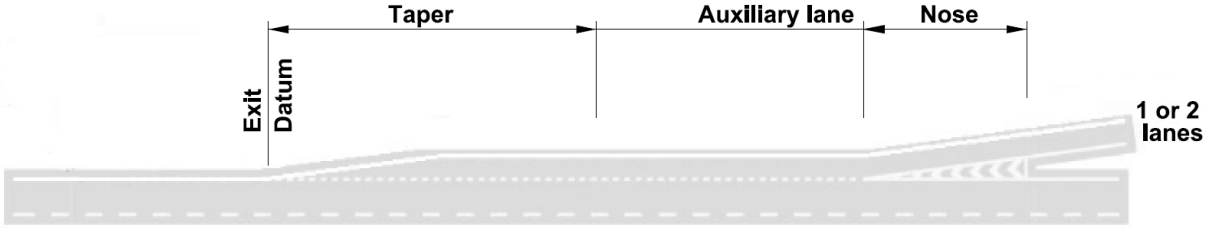


Figure 3.30c Layout B option 1 - ghost island diverge

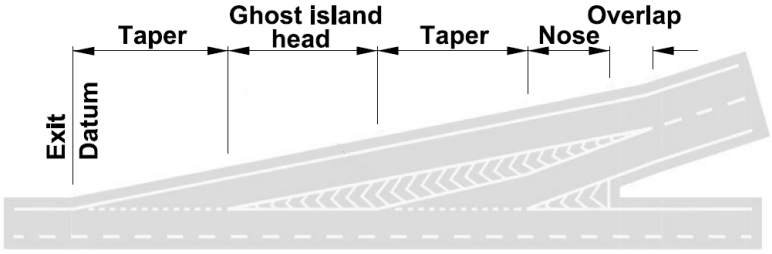


Figure 3.30d Layout B option 2 - Two lane auxillary diverge

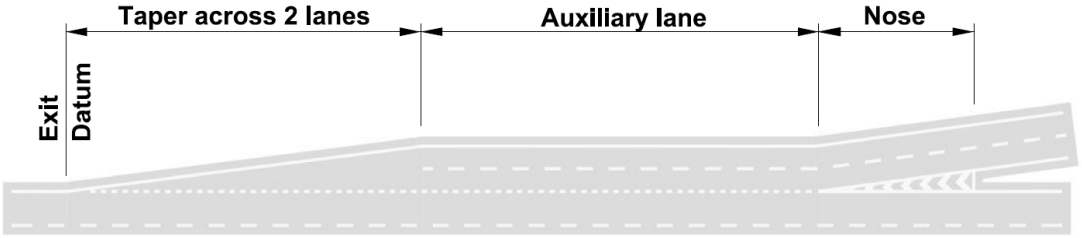


Figure 3.30e Layout C - lane drop

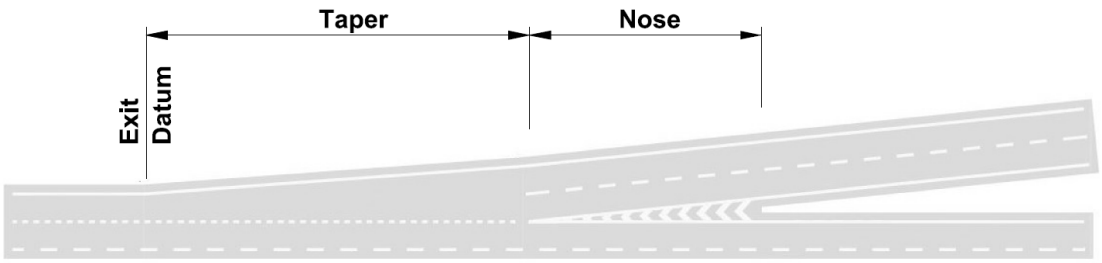


Figure 3.30f Layout D option 1 - ghost island lane drop

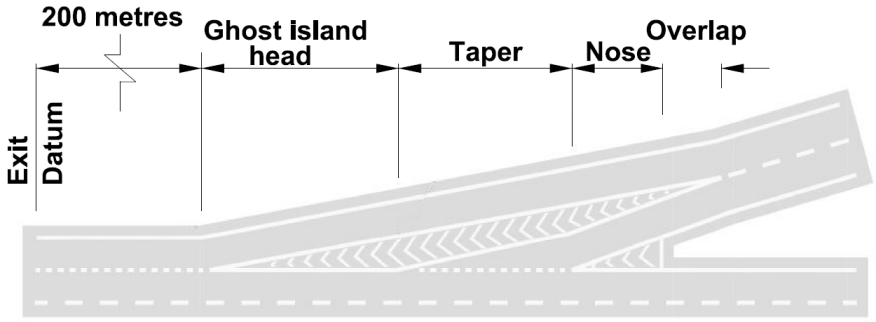


Figure 3.30g Layout D option 2 - auxilliary lane lane drop

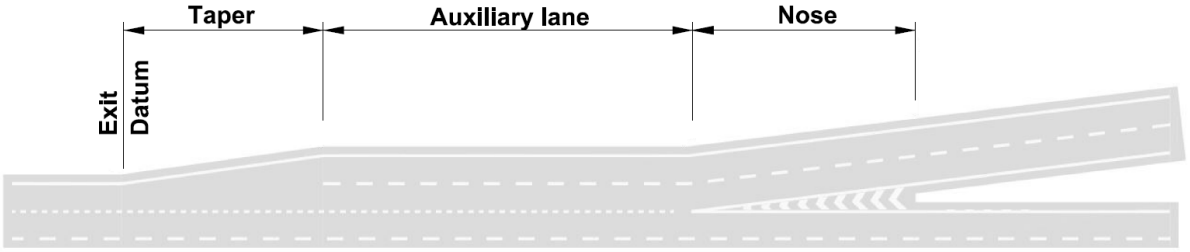


Figure 3.30h Layout E - 2 lane drop

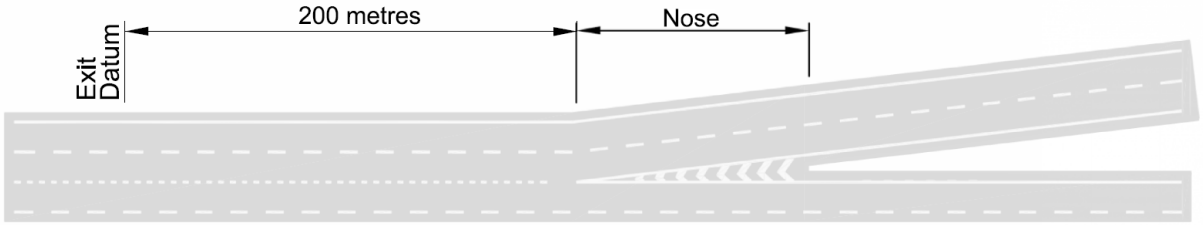
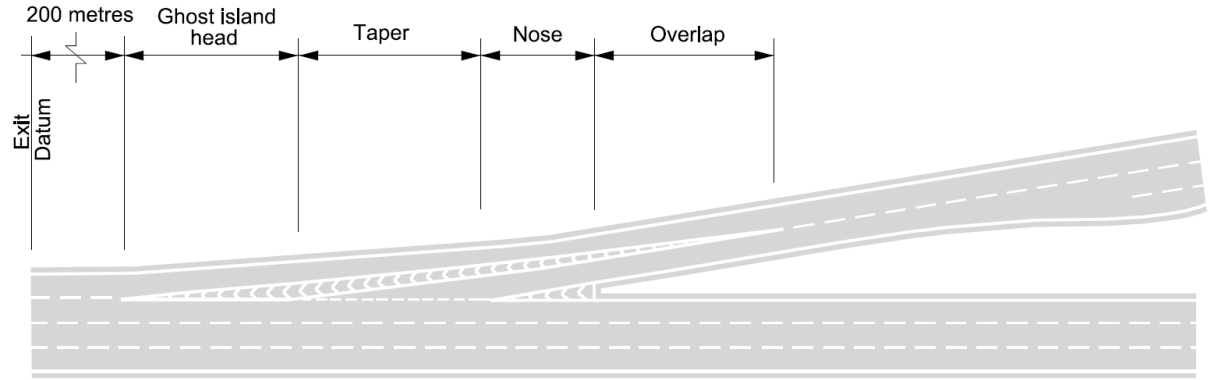


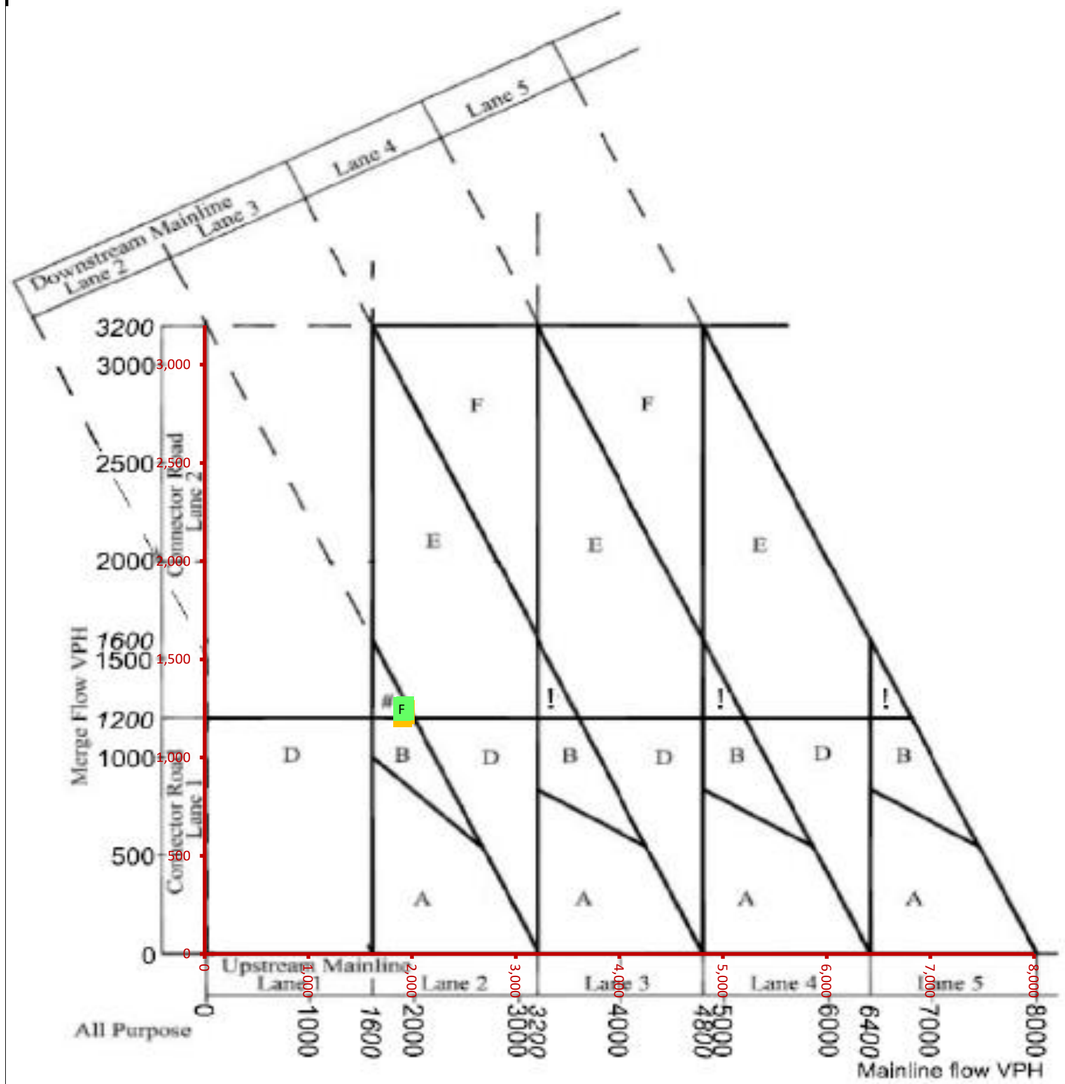
Figure 3.30i Layout F - mainline lane drop and ghost island diverge



Appendix K

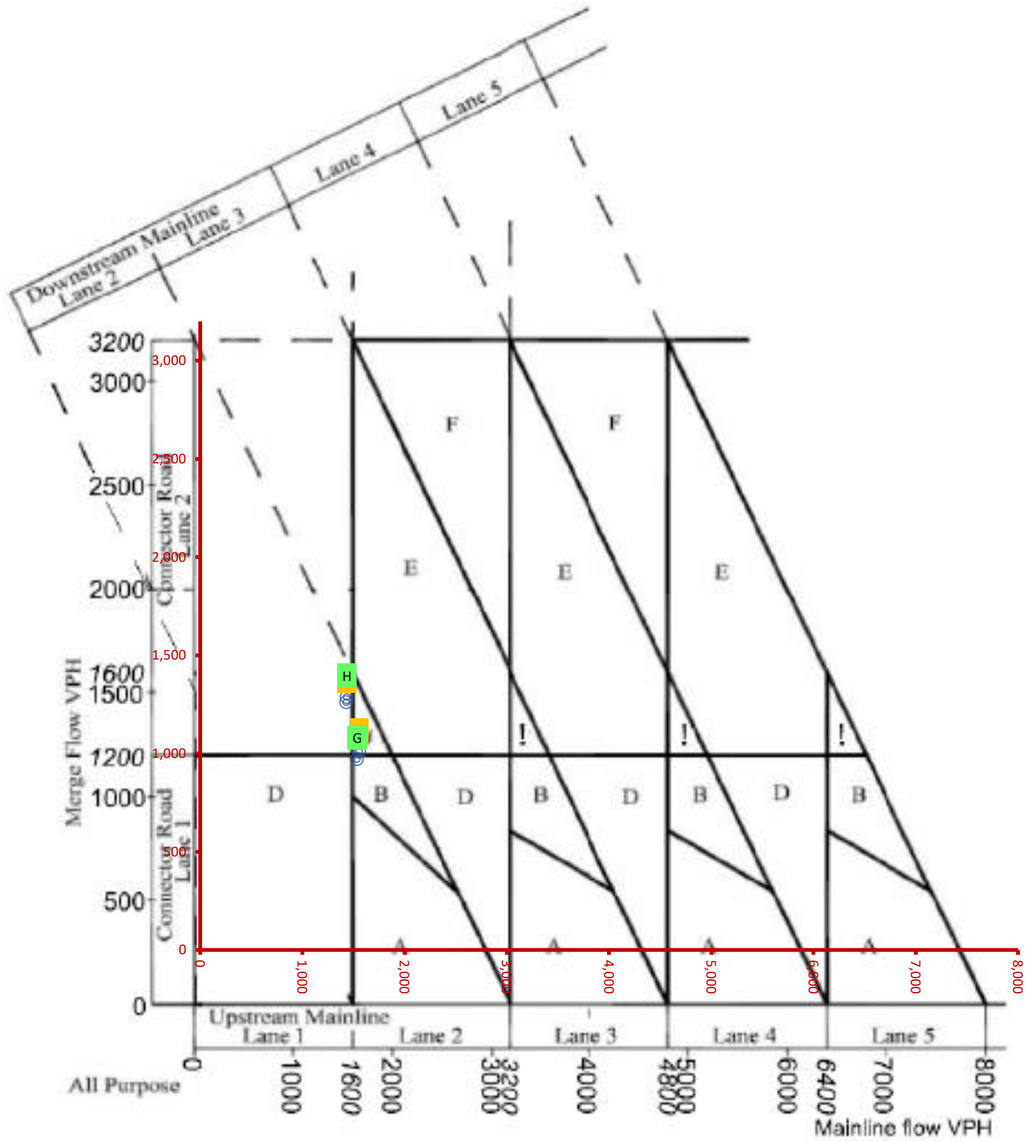
Merge / Diverge figures

J1a northbound merge - no LTC (DEMAND)



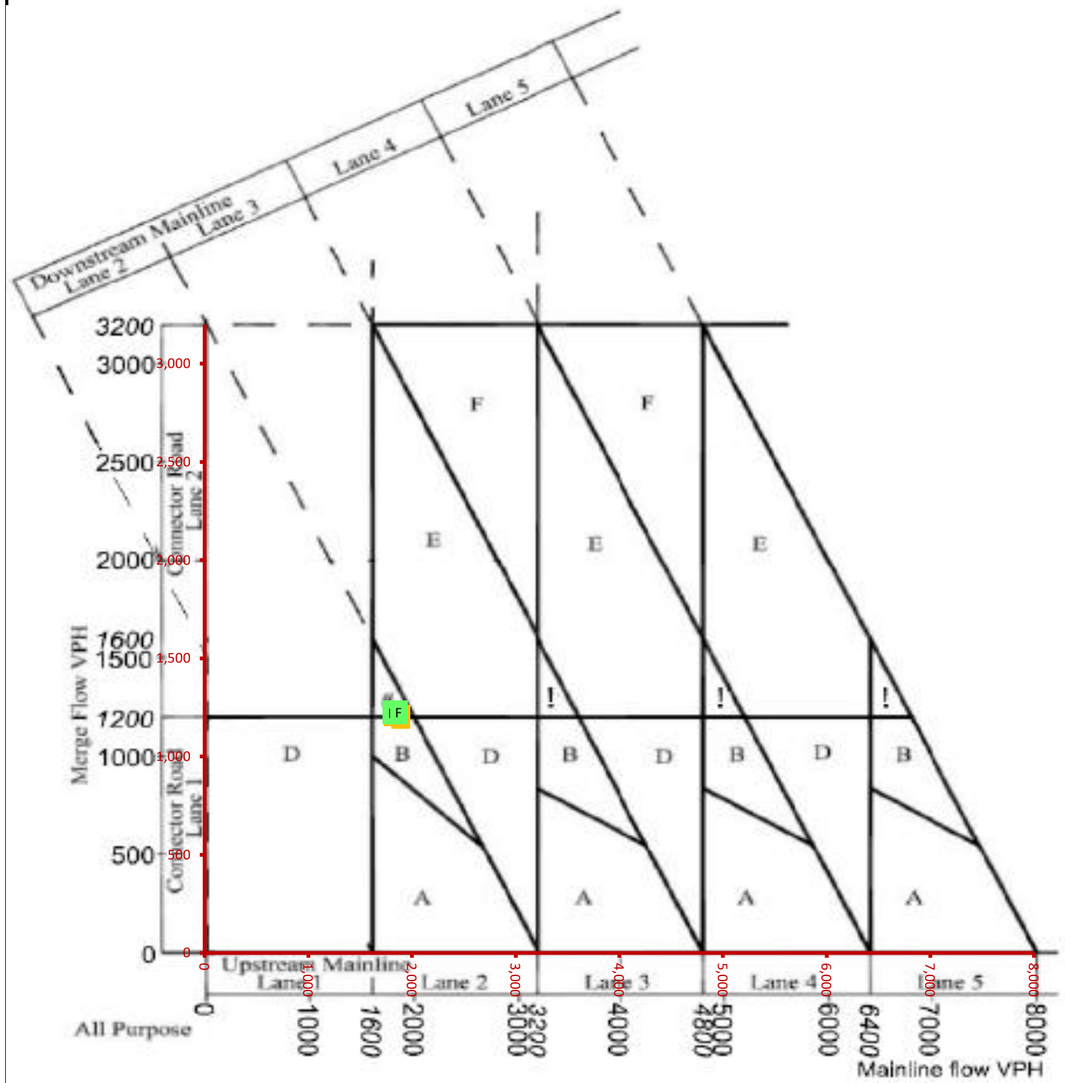
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	1,937	1,232	1,845	1.05	1,120	1.10
B	Ref no LTC PM	1,912	1,214	1,912	1.00	1,214	1.00
C	Ref with LTC AM			1,482	1.05	916	1.10
D	Ref with LTC PM			1,433	1.00	1,259	1.00
E	LP Scenario no LTC AM	1,937	1,250	1,845	1.05	1,136	1.10
F	LP Scenario no LTC PM	1,902	1,248	1,902	1.00	1,248	1.00
G	LP Scenario with LTC AM			1,535	1.00	881	1.10
H	LP Scenario with LTC PM			1,435	1.00	1,286	1.00

J1a northbound merge - with LTC (DEMAND)



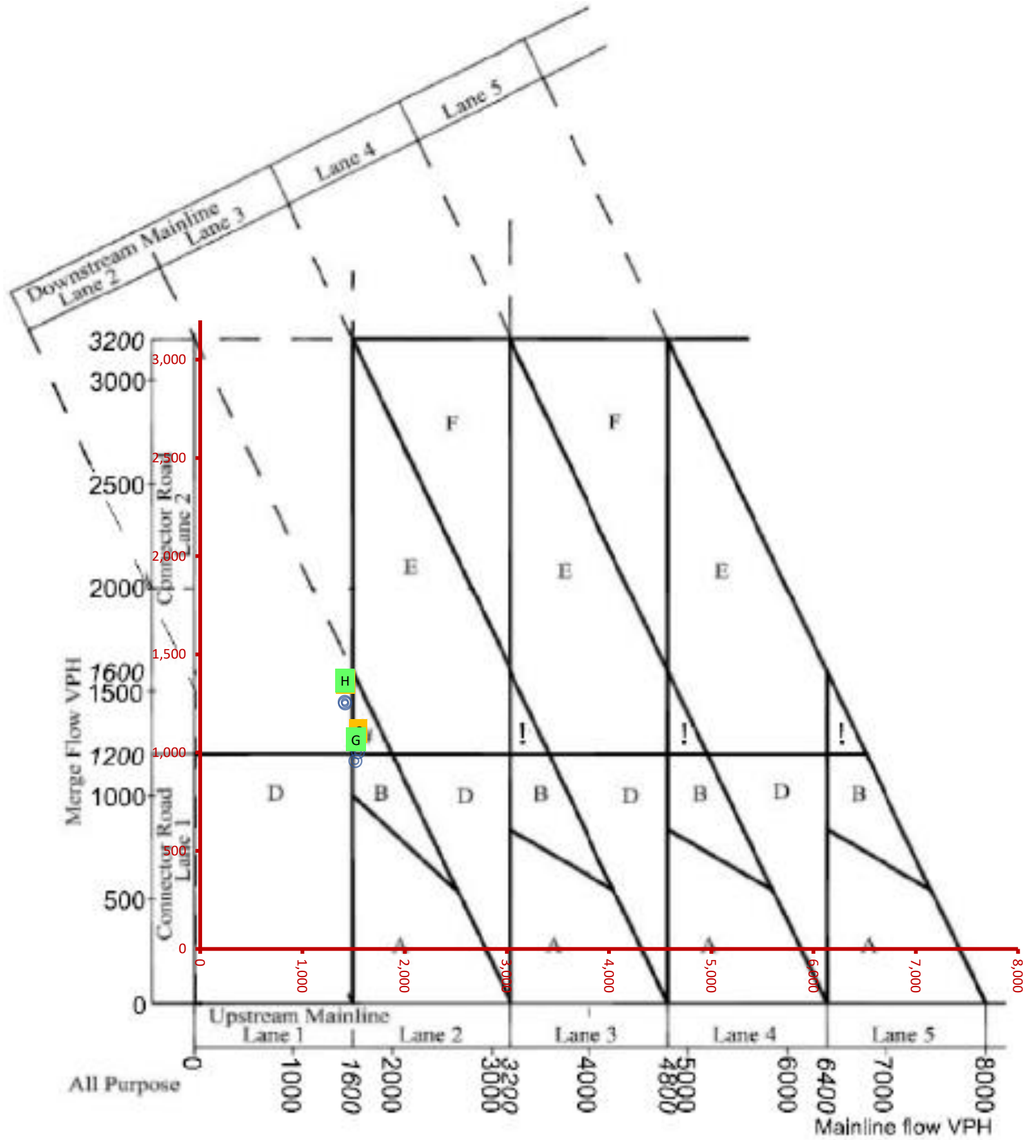
A	Ref no LTC AM			1,845	1.05	1,120	1.10
B	Ref no LTC PM			1,912	1.00	1,214	1.00
C	Ref with LTC AM	1,557	1,007	1,482	1.05	916	1.10
D	Ref with LTC PM	1,433	1,259	1,433	1.00	1,259	1.00
E	LP Scenario no LTC AM			1,845	1.05	1,136	1.10
F	LP Scenario no LTC PM			1,902	1.00	1,248	1.00
G	LP Scenario with LTC AM	1,535	970	1,535	1.00	881	1.10
H	LP Scenario with LTC PM	1,435	1,286	1,435	1.00	1,286	1.00

J1a northbound merge - no LTC (ACTUAL)



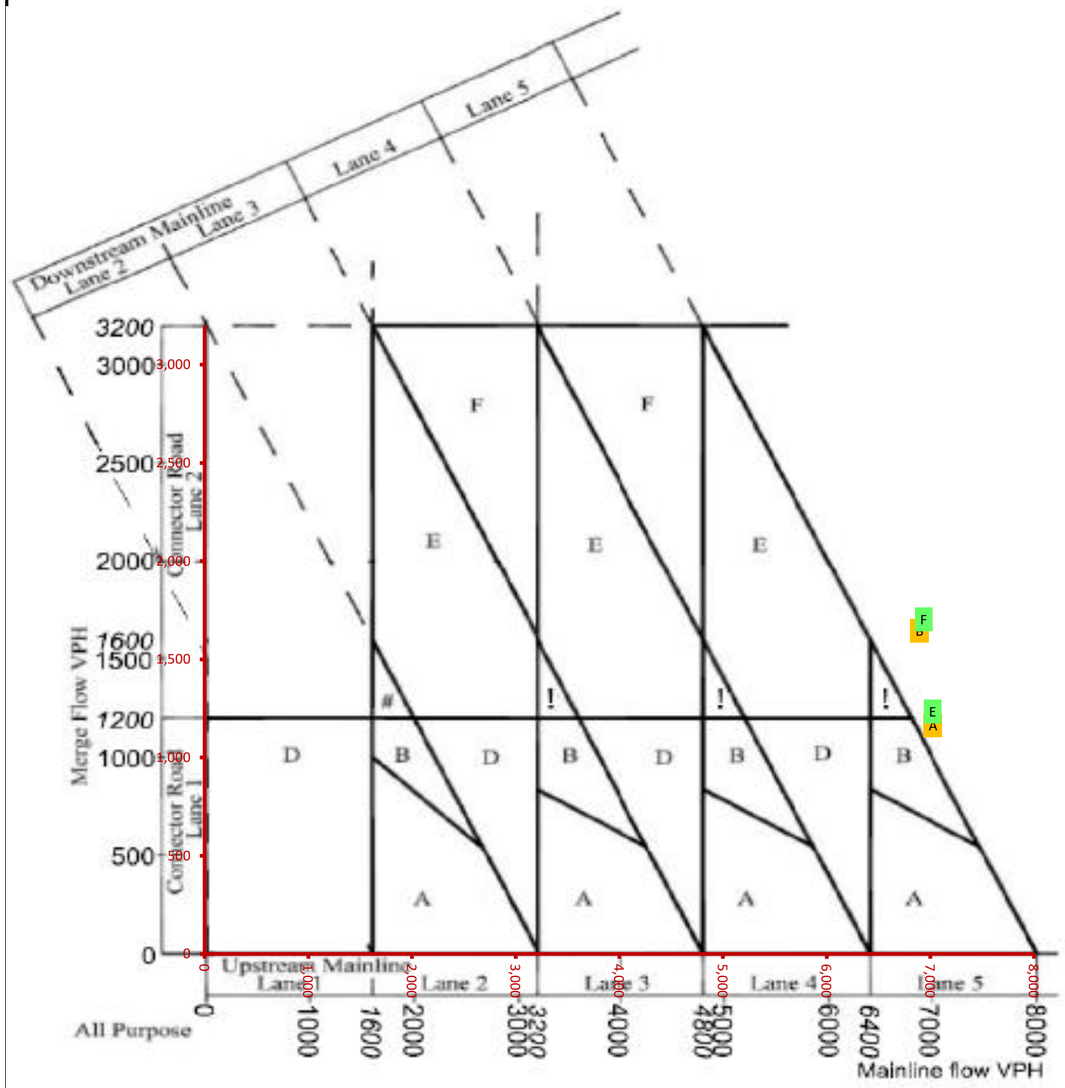
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	1,819	1,215	1,733	1.05	1,104	1.10
B	Ref no LTC PM	1,893	1,204	1,893	1.00	1,204	1.00
C	Ref with LTC AM			1,473	1.05	908	1.10
D	Ref with LTC PM			1,421	1.00	1,248	1.00
E	LP Scenario no LTC AM	1,804	1,224	1,718	1.05	1,113	1.10
F	LP Scenario no LTC PM	1,871	1,225	1,871	1.00	1,225	1.00
G	LP Scenario with LTC AM			1,522	1.00	869	1.10
H	LP Scenario with LTC PM			1,416	1.00	1,256	1.00

J1a northbound merge - with LTC (ACTUAL)



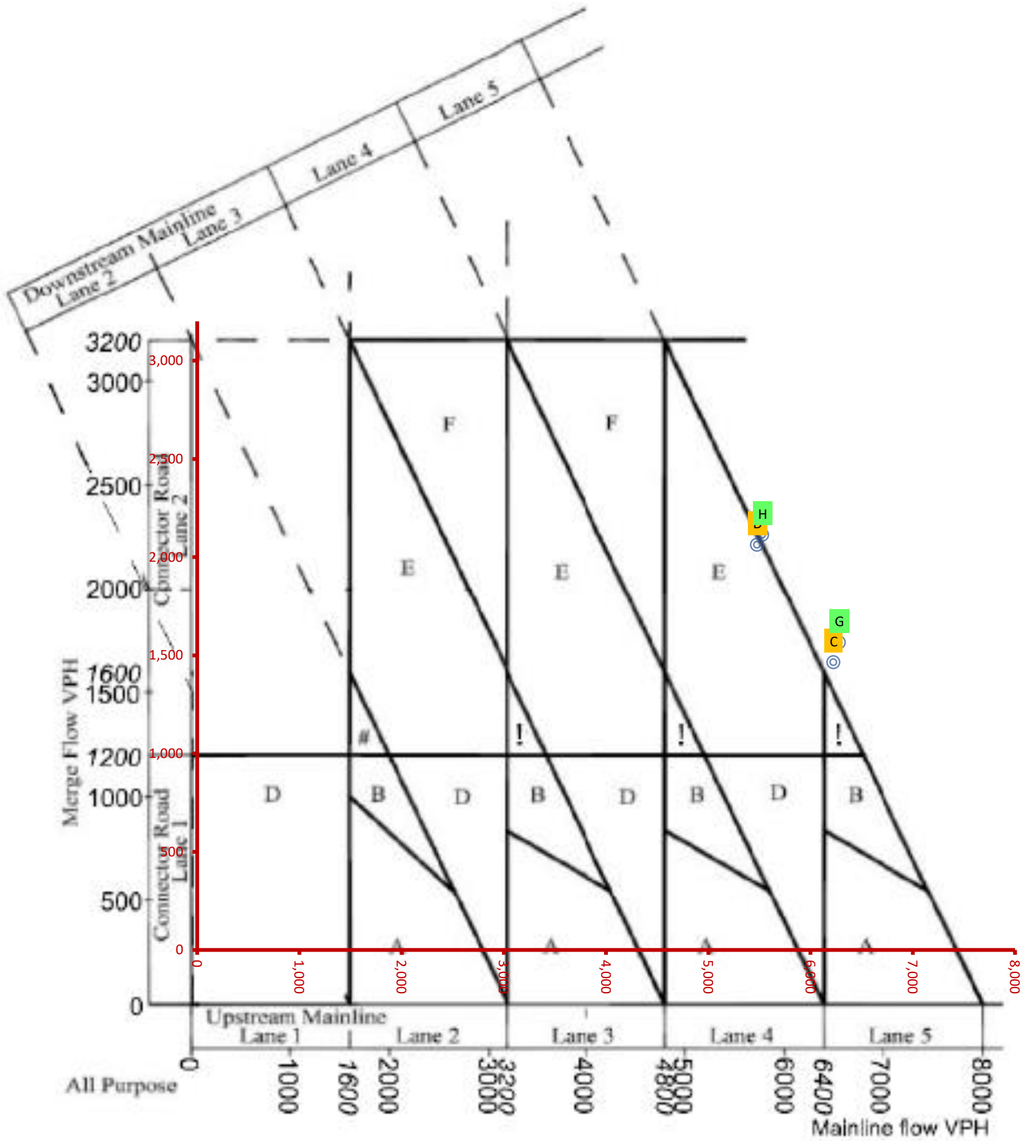
A	Ref no LTC AM			1,733	1.05	1,104	1.10
B	Ref no LTC PM			1,893	1.00	1,204	1.00
C	Ref with LTC AM	1,547	999	1,473	1.05	908	1.10
D	Ref with LTC PM	1,421	1,248	1,421	1.00	1,248	1.00
E	LP Scenario no LTC AM			1,718	1.05	1,113	1.10
F	LP Scenario no LTC PM			1,871	1.00	1,225	1.00
G	LP Scenario with LTC AM	1,522	955	1,522	1.00	869	1.10
H	LP Scenario with LTC PM	1,416	1,256	1,416	1.00	1,256	1.00

J1a southbound merge - no LTC (DEMAND)



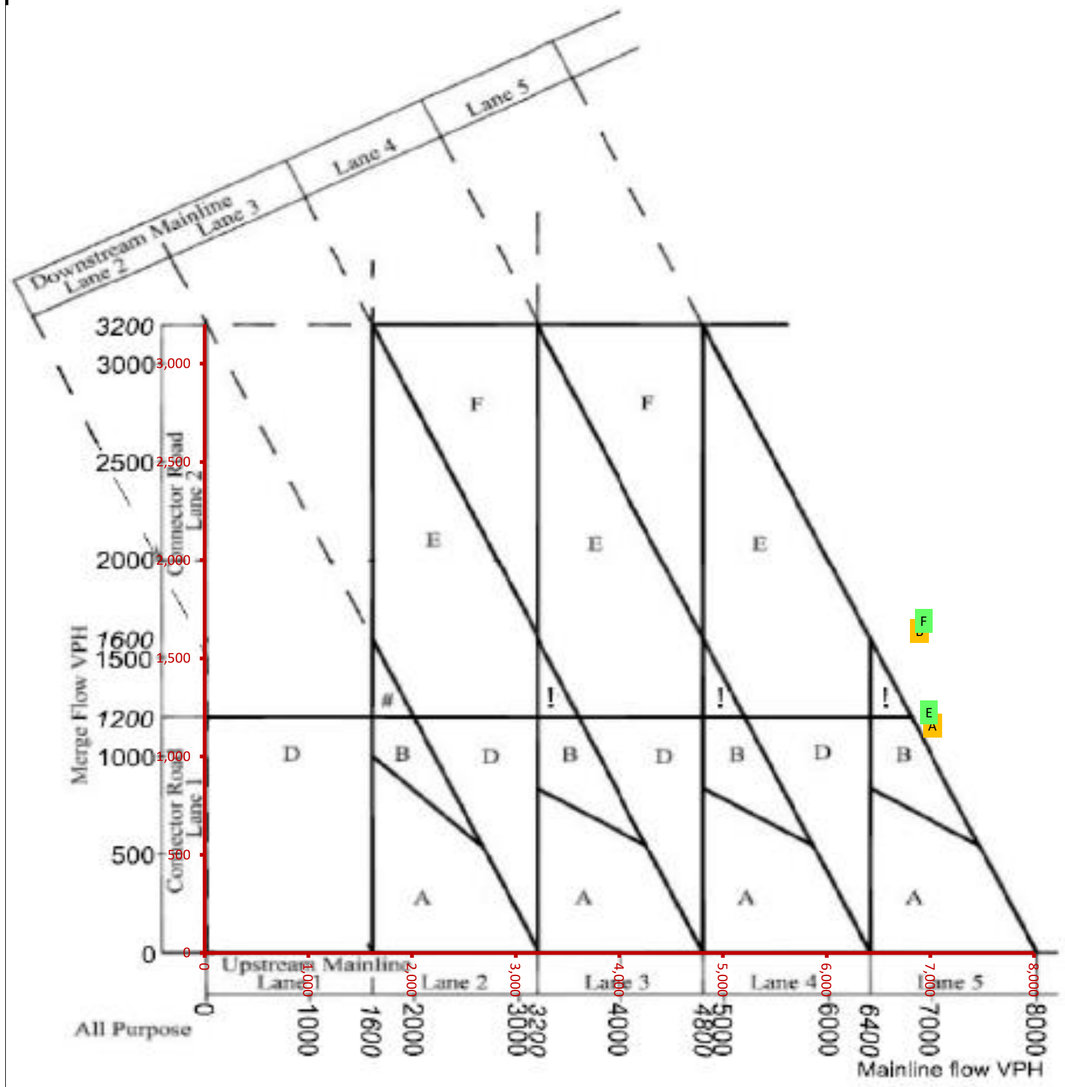
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	7,025	1,164	5,620	1.25	1,059	1.10
B	Ref no LTC PM	6,894	1,646	5,995	1.15	1,646	1.00
C	Ref with LTC AM			4,980	1.25	1,393	1.05
D	Ref with LTC PM			4,765	1.15	2,060	1.00
E	LP Scenario no LTC AM	7,021	1,235	5,616	1.25	1,123	1.10
F	LP Scenario no LTC PM	6,936	1,704	6,031	1.15	1,704	1.00
G	LP Scenario with LTC AM			5,024	1.25	1,489	1.05
H	LP Scenario with LTC PM			4,809	1.15	2,111	1.00

J1a southbound merge - with LTC (DEMAND)



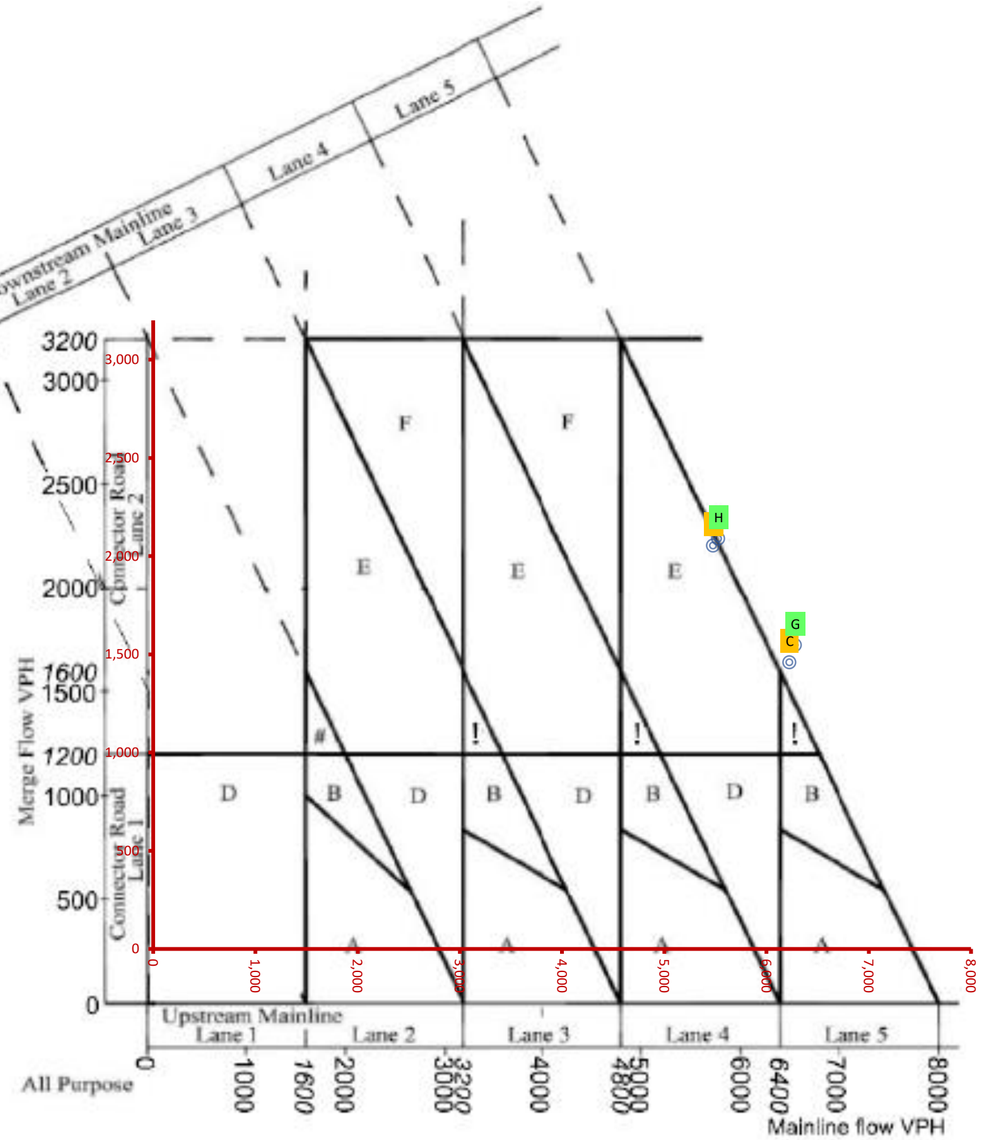
A	Ref no LTC AM			5,620	1.25	1,059	1.10
B	Ref no LTC PM			5,995	1.15	1,646	1.00
C	Ref with LTC AM	6,225	1,462	4,980	1.25	1,393	1.05
D	Ref with LTC PM	5,480	2,060	4,765	1.15	2,060	1.00
E	LP Scenario no LTC AM			5,616	1.25	1,123	1.10
F	LP Scenario no LTC PM			6,031	1.15	1,704	1.00
G	LP Scenario with LTC AM	6,281	1,564	5,024	1.25	1,489	1.05
H	LP Scenario with LTC PM	5,530	2,111	4,809	1.15	2,111	1.00

J1a southbound merge - no LTC (ACTUAL)



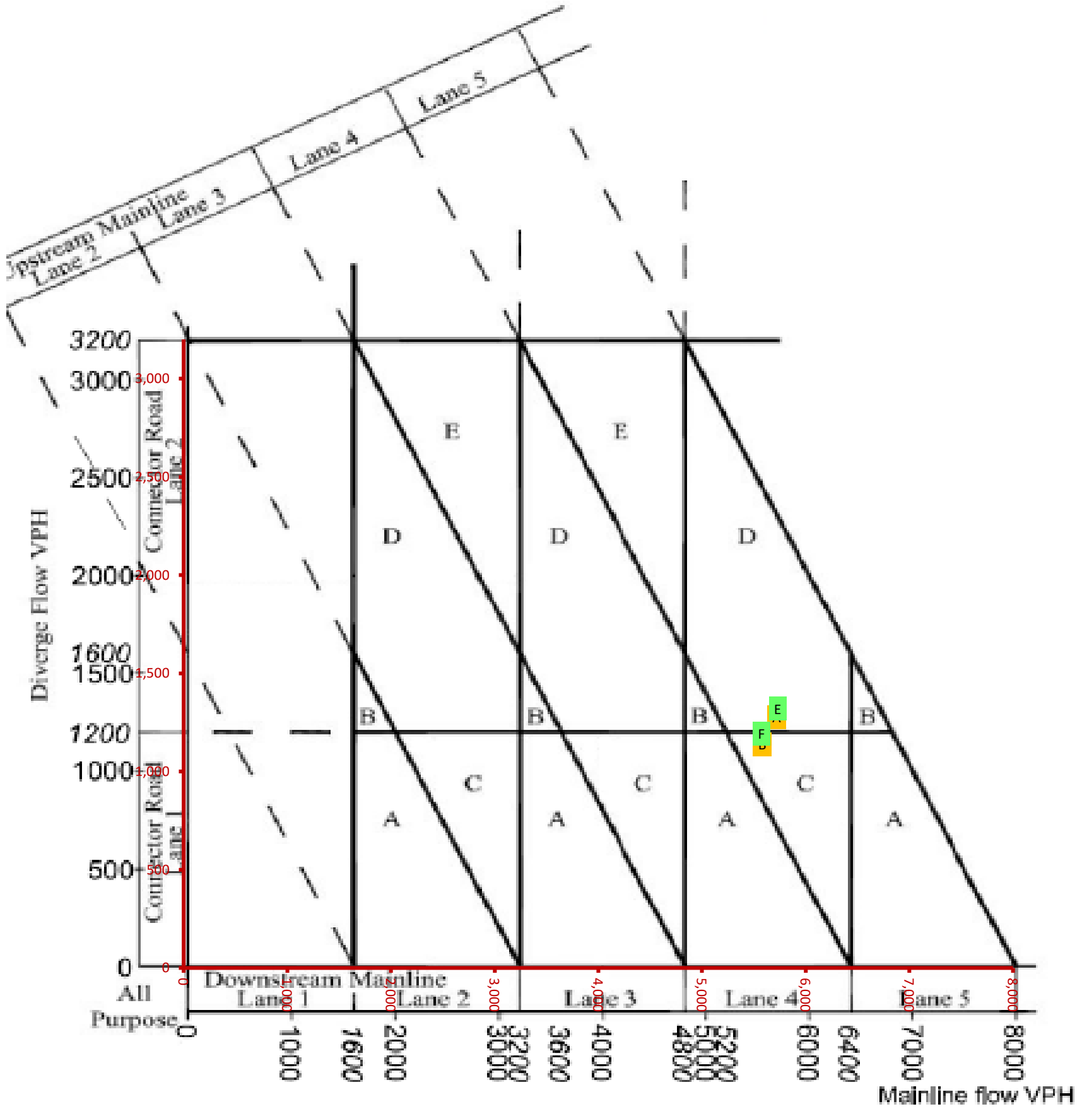
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	7,020	1,159	5,616	1.25	1,054	1.10
B	Ref no LTC PM	6,894	1,639	5,995	1.15	1,639	1.00
C	Ref with LTC AM			4,980	1.25	1,387	1.05
D	Ref with LTC PM			4,765	1.15	2,051	1.00
E	LP Scenario no LTC AM	6,987	1,226	5,589	1.25	1,115	1.10
F	LP Scenario no LTC PM	6,936	1,690	6,031	1.15	1,690	1.00
G	LP Scenario with LTC AM			5,024	1.25	1,472	1.05
H	LP Scenario with LTC PM			4,809	1.15	2,087	1.00

J1a southbound merge - with LTC (ACTUAL)



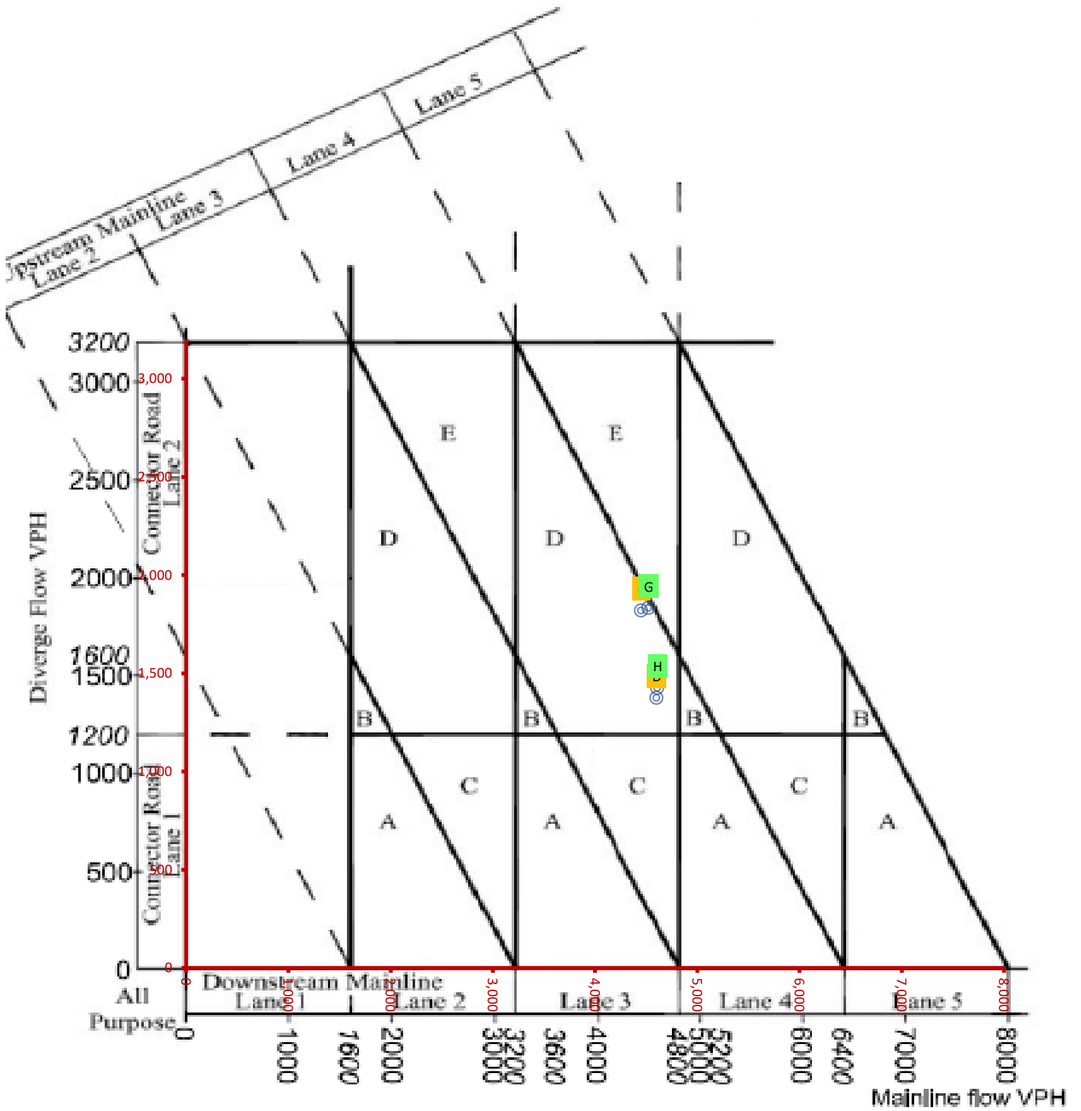
A	Ref no LTC AM			5,616	1.25	1,054	1.10
B	Ref no LTC PM			5,995	1.15	1,639	1.00
C	Ref with LTC AM	6,225	1,457	4,980	1.25	1,387	1.05
D	Ref with LTC PM	5,480	2,051	4,765	1.15	2,051	1.00
E	LP Scenario no LTC AM			5,589	1.25	1,115	1.10
F	LP Scenario no LTC PM			6,031	1.15	1,690	1.00
G	LP Scenario with LTC AM	6,281	1,545	5,024	1.25	1,472	1.05
H	LP Scenario with LTC PM	5,530	2,087	4,809	1.15	2,087	1.00

J1a northbound diverge - no LTC (DEMAND)



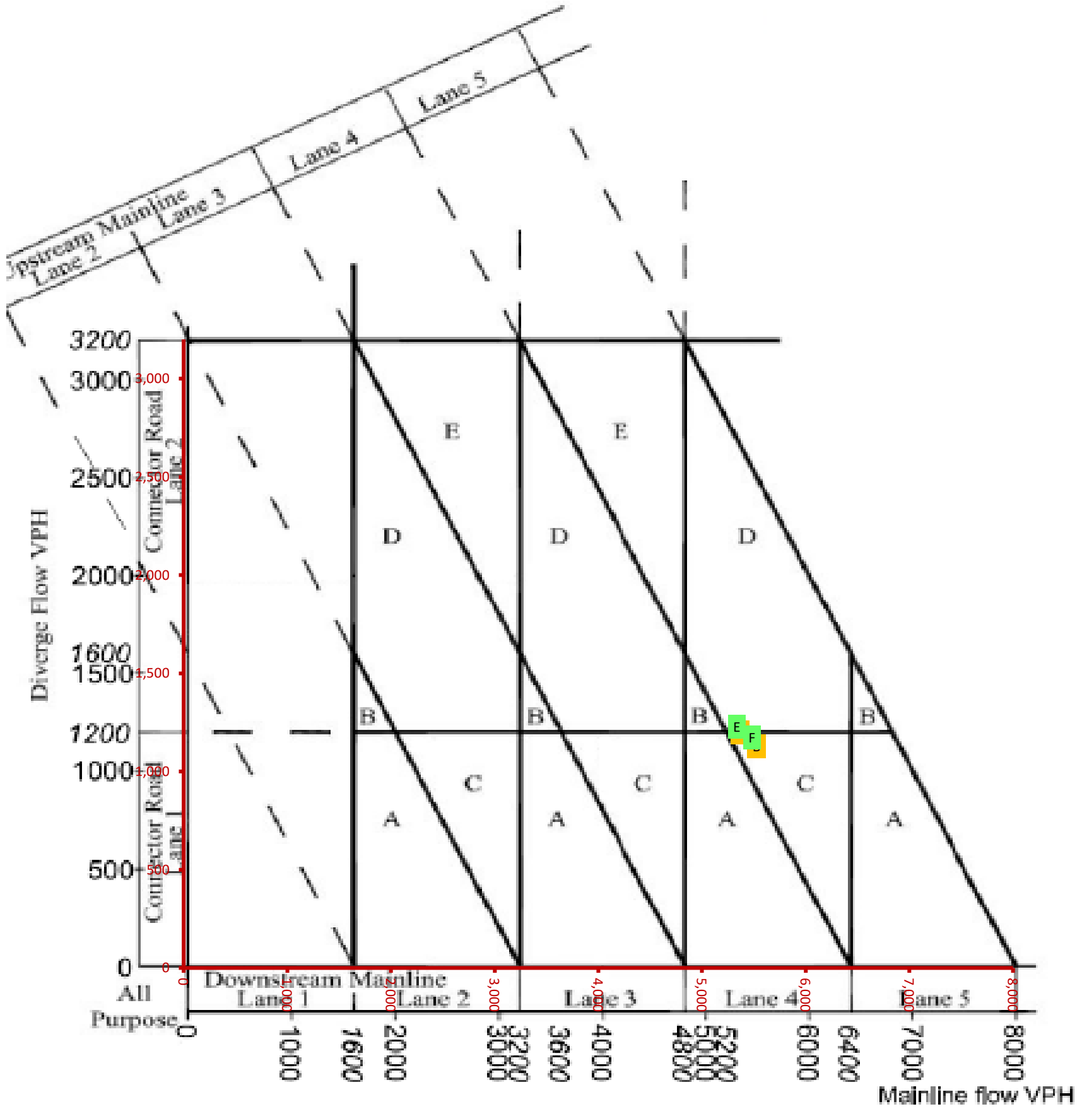
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,719	1,276	5,719	1.00	1,276	1.00
B	Ref no LTC PM	5,579	1,139	5,579	1.00	1,139	1.00
C	Ref with LTC AM			4,453	1.00	1,819	1.00
D	Ref with LTC PM			4,602	1.00	1,374	1.00
E	LP Scenario no LTC AM	5,729	1,320	5,729	1.00	1,320	1.00
F	LP Scenario no LTC PM	5,574	1,194	5,574	1.00	1,194	1.00
G	LP Scenario with LTC AM			4,522	1.00	1,832	1.00
H	LP Scenario with LTC PM			4,612	1.00	1,425	1.00

J1a northbound diverge - with LTC (DEMAND)



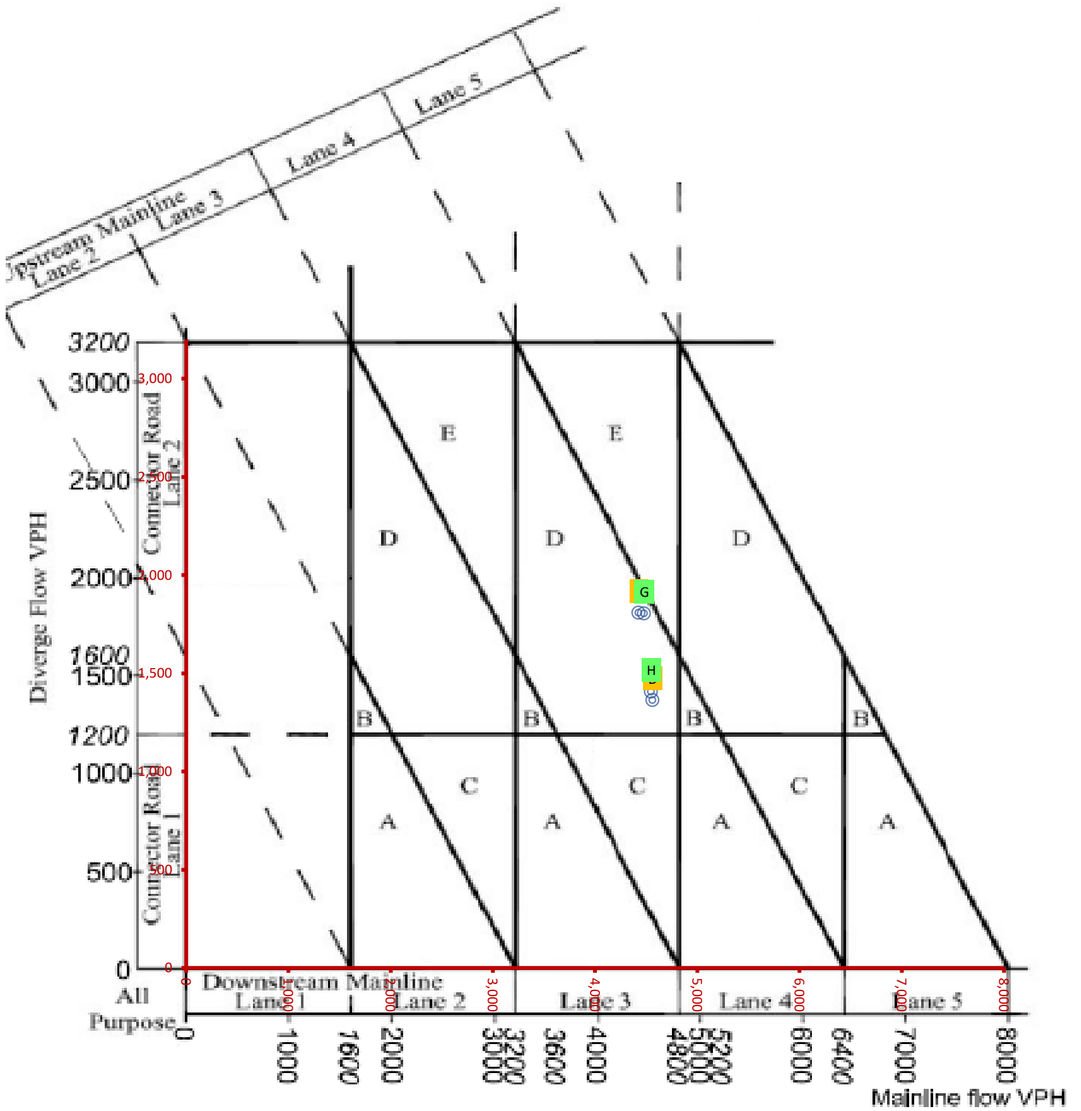
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,719	1.00	1,276	1.00
B	Ref no LTC PM			5,579	1.00	1,139	1.00
C	Ref with LTC AM	4,453	1,819	4,453	1.00	1,819	1.00
D	Ref with LTC PM	4,602	1,374	4,602	1.00	1,374	1.00
E	LP Scenario no LTC AM			5,729	1.00	1,320	1.00
F	LP Scenario no LTC PM			5,574	1.00	1,194	1.00
G	LP Scenario with LTC AM	4,522	1,832	4,522	1.00	1,832	1.00
H	LP Scenario with LTC PM	4,612	1,425	4,612	1.00	1,425	1.00

J1a northbound diverge - no LTC (ACTUAL)



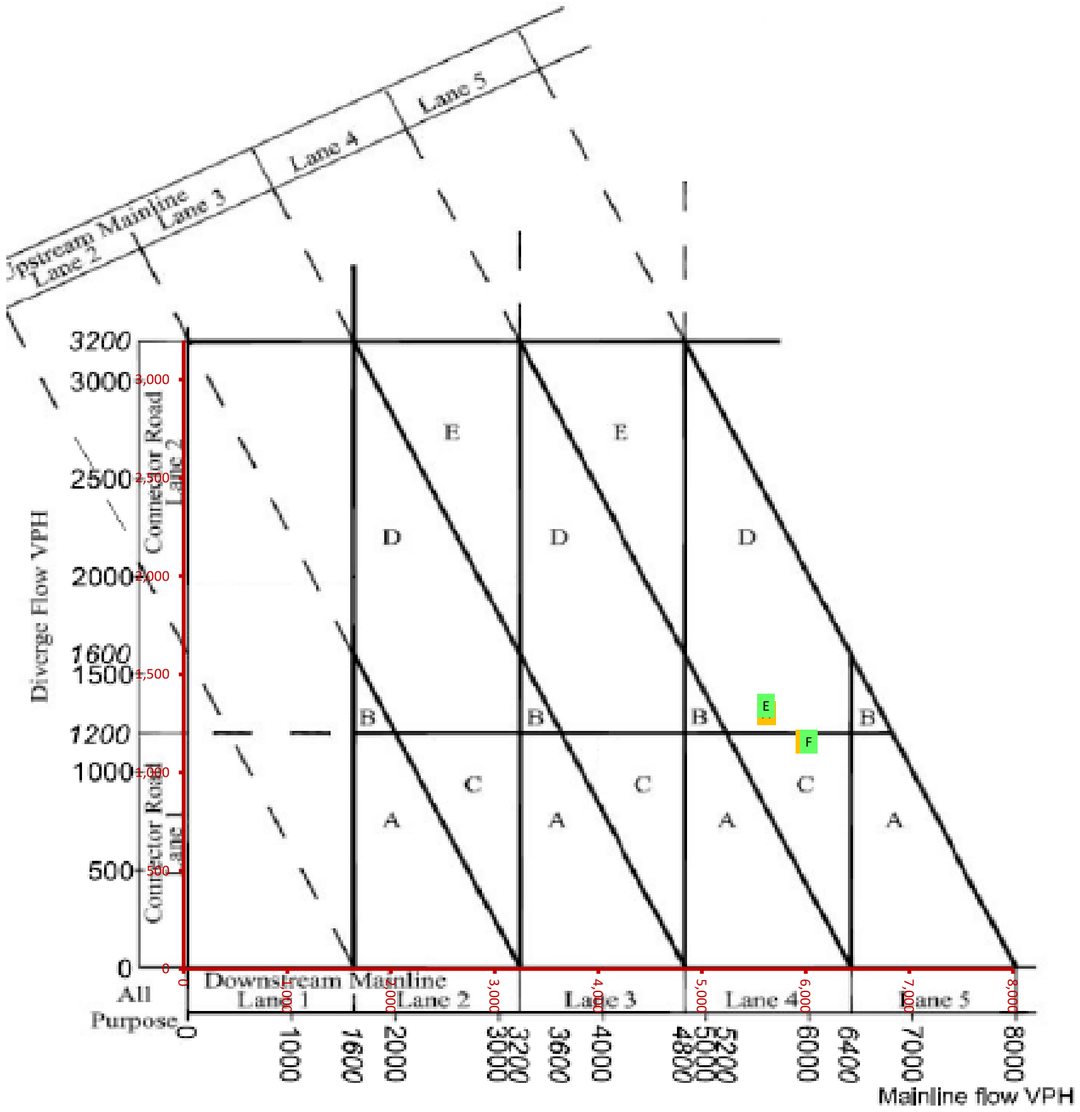
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,370	1,198	5,370	1.00	1,198	1.00
B	Ref no LTC PM	5,525	1,128	5,525	1.00	1,128	1.00
C	Ref with LTC AM			4,425	1.00	1,807	1.00
D	Ref with LTC PM			4,564	1.00	1,363	1.00
E	LP Scenario no LTC AM	5,334	1,229	5,334	1.00	1,229	1.00
F	LP Scenario no LTC PM	5,484	1,175	5,484	1.00	1,175	1.00
G	LP Scenario with LTC AM			4,482	1.00	1,804	1.00
H	LP Scenario with LTC PM			4,550	1.00	1,405	1.00

J1a northbound diverge - with LTC (ACTUAL)



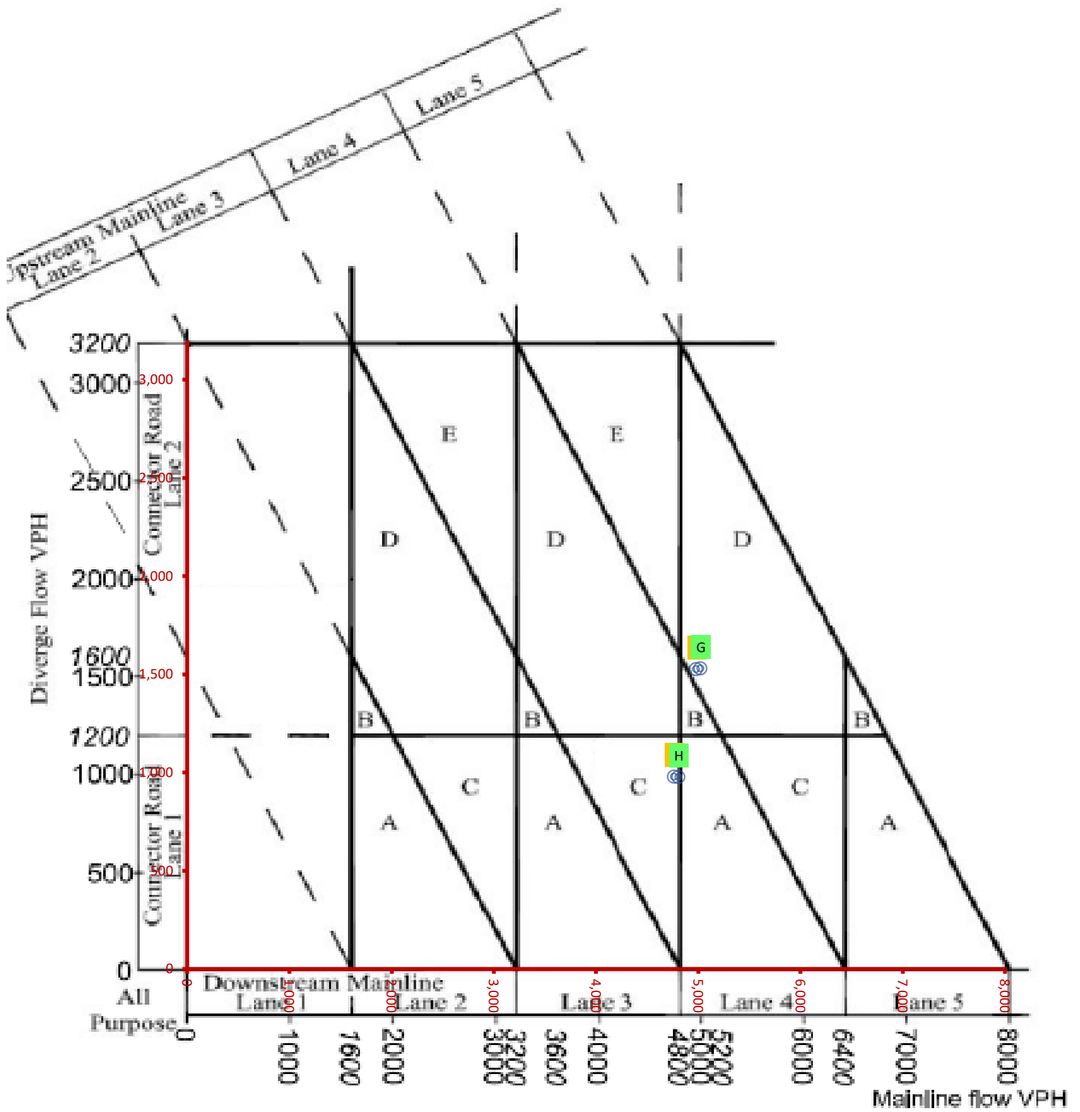
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,370	1.00	1,198	1.00
B	Ref no LTC PM			5,525	1.00	1,128	1.00
C	Ref with LTC AM	4,425	1,807	4,425	1.00	1,807	1.00
D	Ref with LTC PM	4,564	1,363	4,564	1.00	1,363	1.00
E	LP Scenario no LTC AM			5,334	1.00	1,229	1.00
F	LP Scenario no LTC PM			5,484	1.00	1,175	1.00
G	LP Scenario with LTC AM	4,482	1,804	4,482	1.00	1,804	1.00
H	LP Scenario with LTC PM	4,550	1,405	4,550	1.00	1,405	1.00

J1a southbound diverge - no LTC (DEMAND)



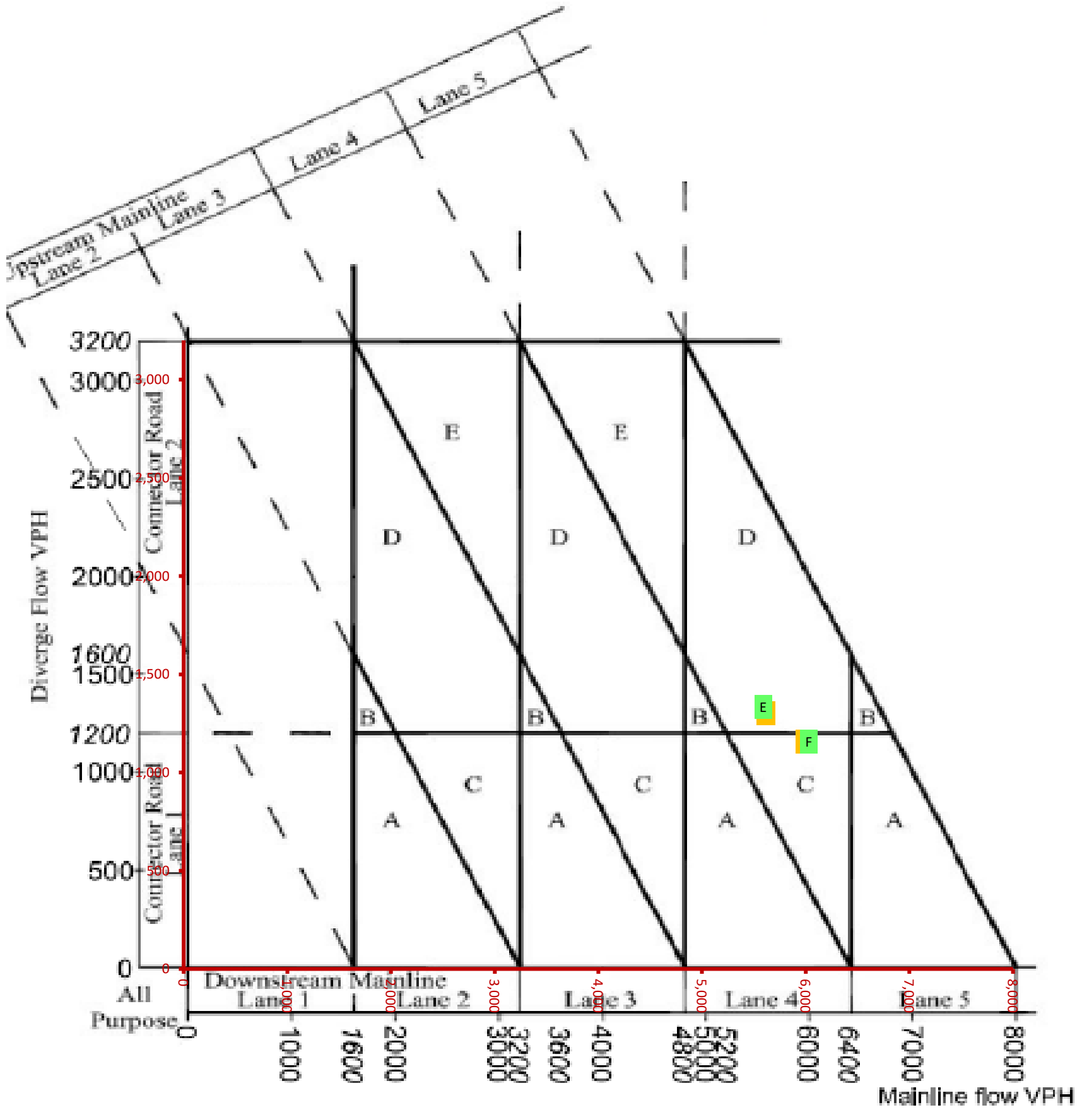
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,620	1,301	5,620	1.00	1,301	1.00
B	Ref no LTC PM	5,995	1,159	5,995	1.00	1,159	1.00
C	Ref with LTC AM			4,980	1.00	1,524	1.00
D	Ref with LTC PM			4,765	1.00	977	1.00
E	LP Scenario no LTC AM	5,616	1,340	5,616	1.00	1,340	1.00
F	LP Scenario no LTC PM	6,031	1,158	6,031	1.00	1,158	1.00
G	LP Scenario with LTC AM			5,024	1.00	1,528	1.00
H	LP Scenario with LTC PM			4,809	1.00	976	1.00

J1a southbound diverge - with LTC (DEMAND)



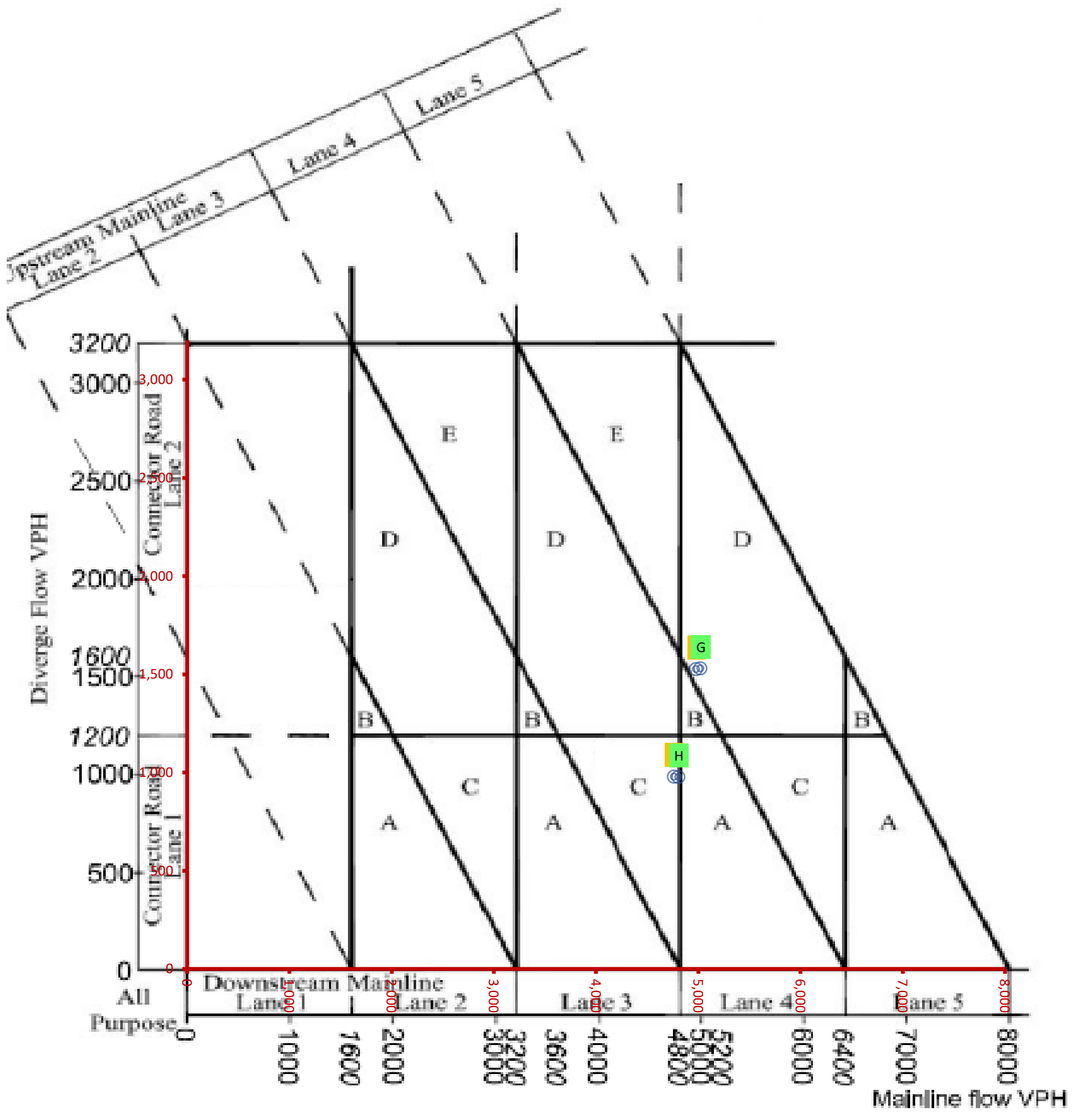
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,620	1.00	1,301	1.00
B	Ref no LTC PM			5,995	1.00	1,159	1.00
C	Ref with LTC AM	4,980	1,524	4,980	1.00	1,524	1.00
D	Ref with LTC PM	4,765	977	4,765	1.00	977	1.00
E	LP Scenario no LTC AM			5,616	1.00	1,340	1.00
F	LP Scenario no LTC PM			6,031	1.00	1,158	1.00
G	LP Scenario with LTC AM	5,024	1,528	5,024	1.00	1,528	1.00
H	LP Scenario with LTC PM	4,809	976	4,809	1.00	976	1.00

J1a southbound diverge - no LTC (ACTUAL)



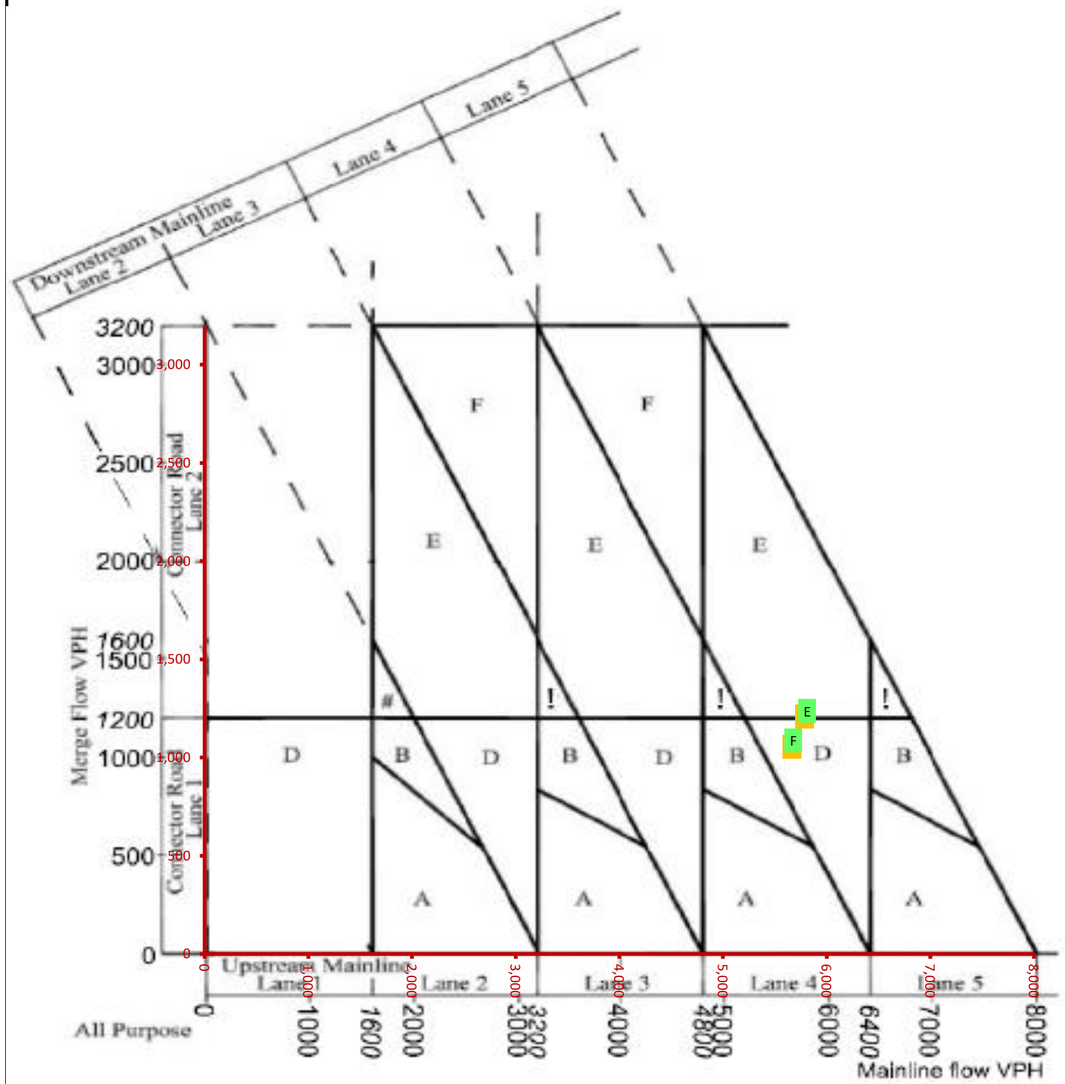
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,616	1,301	5,616	1.00	1,301	1.00
B	Ref no LTC PM	5,995	1,159	5,995	1.00	1,159	1.00
C	Ref with LTC AM			4,980	1.00	1,524	1.00
D	Ref with LTC PM			4,765	1.00	977	1.00
E	LP Scenario no LTC AM	5,589	1,334	5,589	1.00	1,334	1.00
F	LP Scenario no LTC PM	6,031	1,158	6,031	1.00	1,158	1.00
G	LP Scenario with LTC AM			5,024	1.00	1,528	1.00
H	LP Scenario with LTC PM			4,809	1.00	976	1.00

J1a southbound diverge - with LTC (ACTUAL)



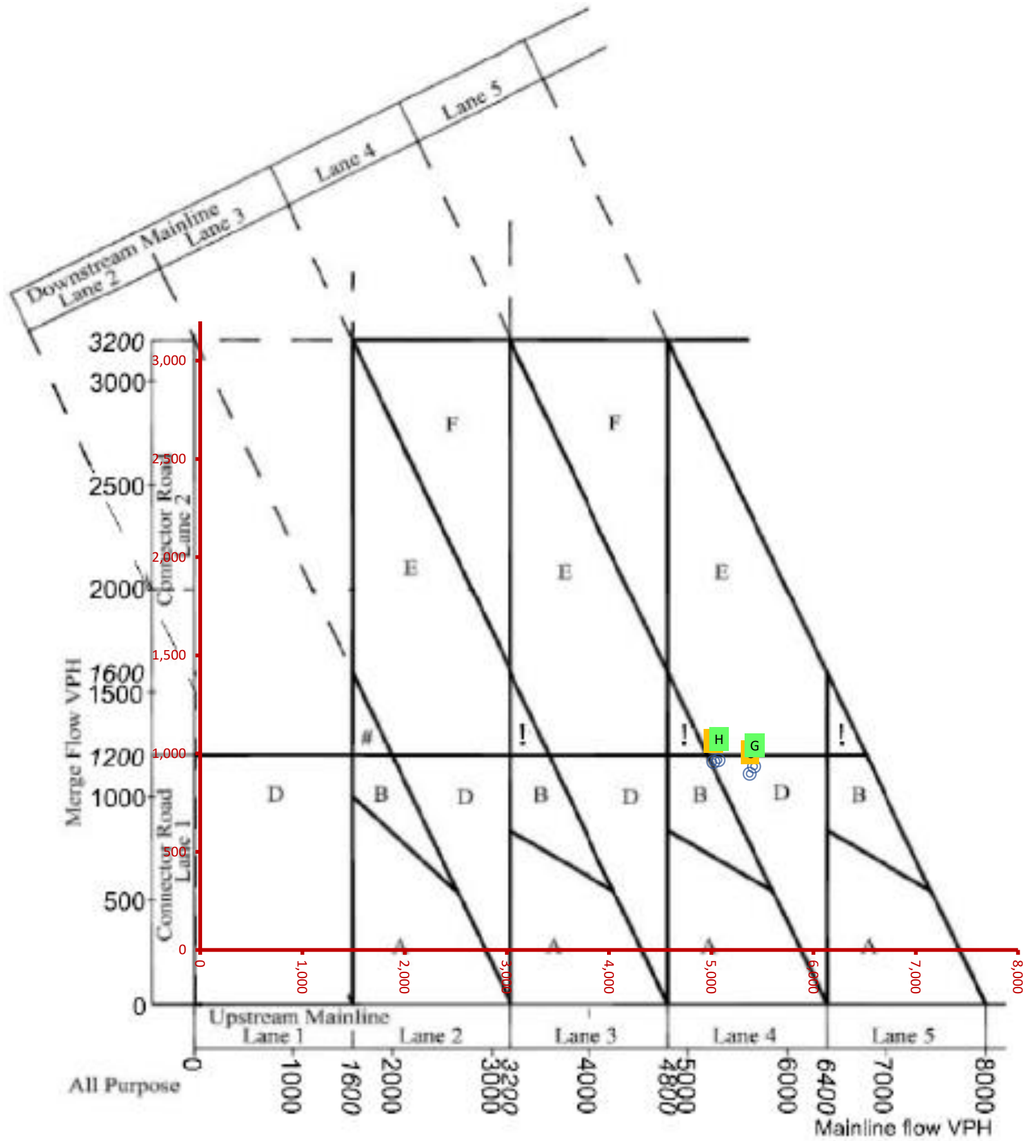
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,616	1.00	1,301	1.00
B	Ref no LTC PM			5,995	1.00	1,159	1.00
C	Ref with LTC AM	4,980	1,524	4,980	1.00	1,524	1.00
D	Ref with LTC PM	4,765	977	4,765	1.00	977	1.00
E	LP Scenario no LTC AM			5,589	1.00	1,334	1.00
F	LP Scenario no LTC PM			6,031	1.00	1,158	1.00
G	LP Scenario with LTC AM	5,024	1,528	5,024	1.00	1,528	1.00
H	LP Scenario with LTC PM	4,809	976	4,809	1.00	976	1.00

J1b northbound merge - no LTC (DEMAND)



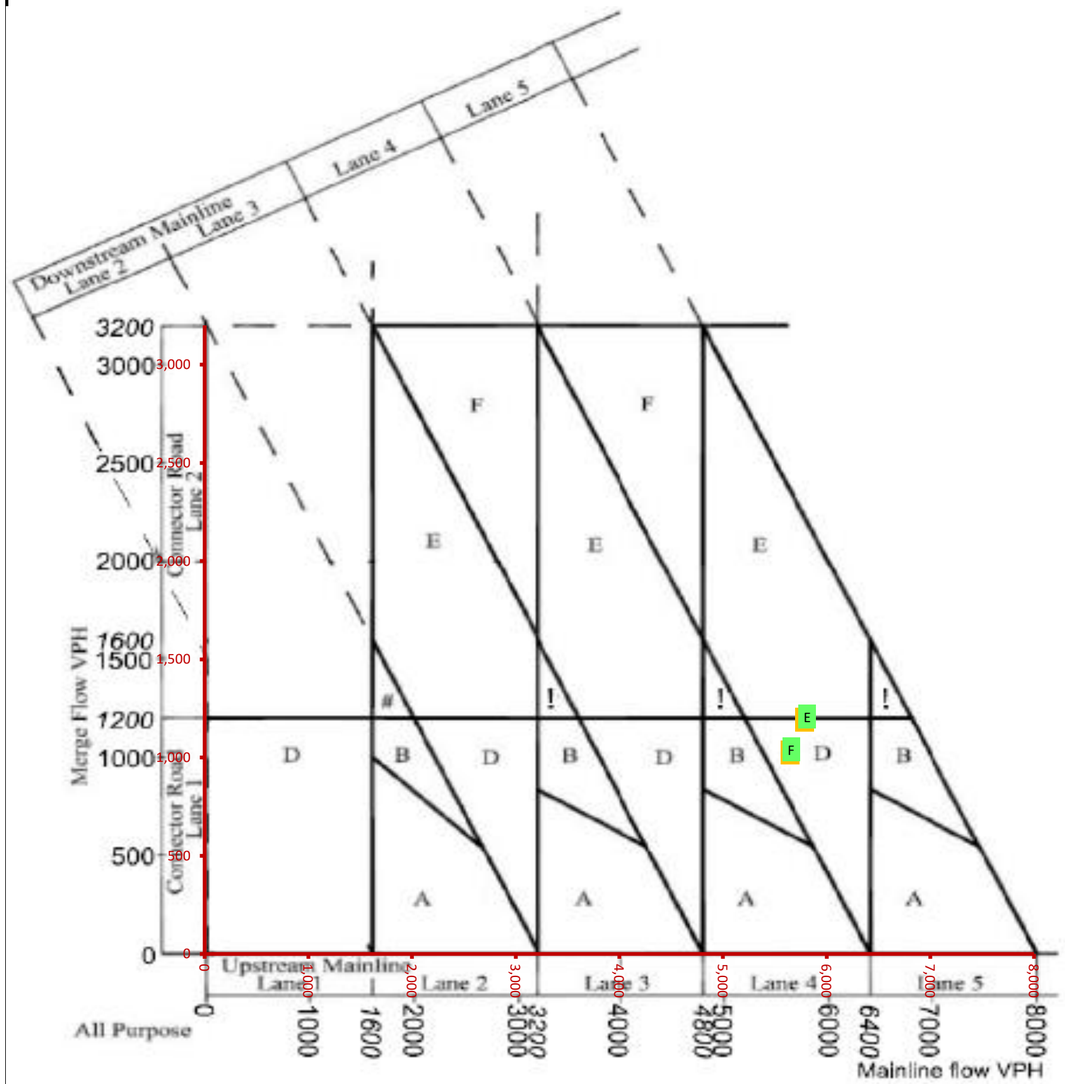
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,784	1,210	5,784	1.00	1,210	1.00
B	Ref no LTC PM	5,663	1,055	5,663	1.00	1,055	1.00
C	Ref with LTC AM			5,378	1.00	894	1.00
D	Ref with LTC PM			5,022	1.00	954	1.00
E	LP Scenario no LTC AM	5,813	1,237	5,813	1.00	1,237	1.00
F	LP Scenario no LTC PM	5,679	1,088	5,679	1.00	1,088	1.00
G	LP Scenario with LTC AM			5,422	1.00	932	1.00
H	LP Scenario with LTC PM			5,073	1.00	963	1.00

J1b northbound merge - with LTC (DEMAND)



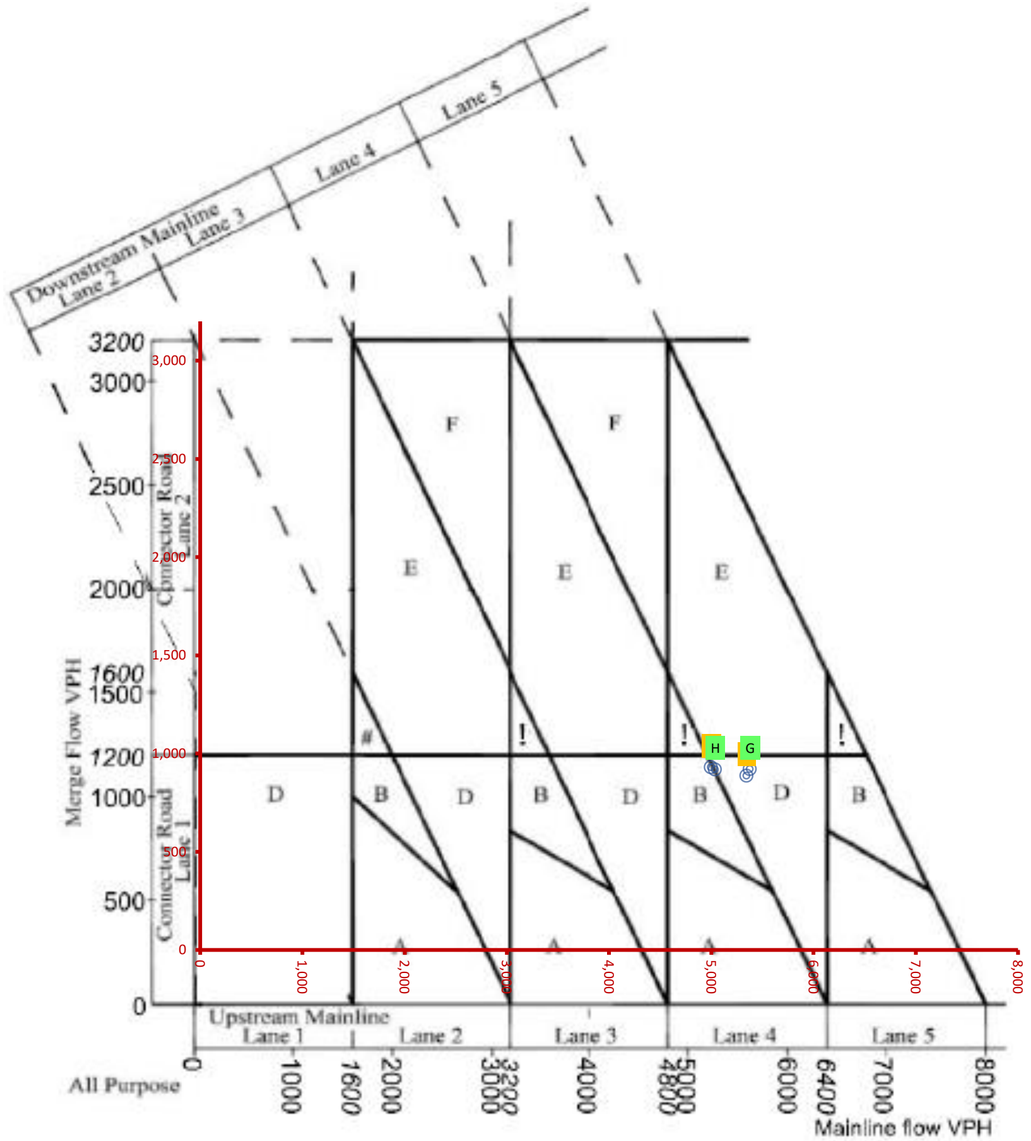
A	Ref no LTC AM			5,784	1.00	1,210	1.00
B	Ref no LTC PM			5,663	1.00	1,055	1.00
C	Ref with LTC AM	5,378	894	5,378	1.00	894	1.00
D	Ref with LTC PM	5,022	954	5,022	1.00	954	1.00
E	LP Scenario no LTC AM			5,813	1.00	1,237	1.00
F	LP Scenario no LTC PM			5,679	1.00	1,088	1.00
G	LP Scenario with LTC AM	5,422	932	5,422	1.00	932	1.00
H	LP Scenario with LTC PM	5,073	963	5,073	1.00	963	1.00

J1b northbound merge - no LTC (ACTUAL)



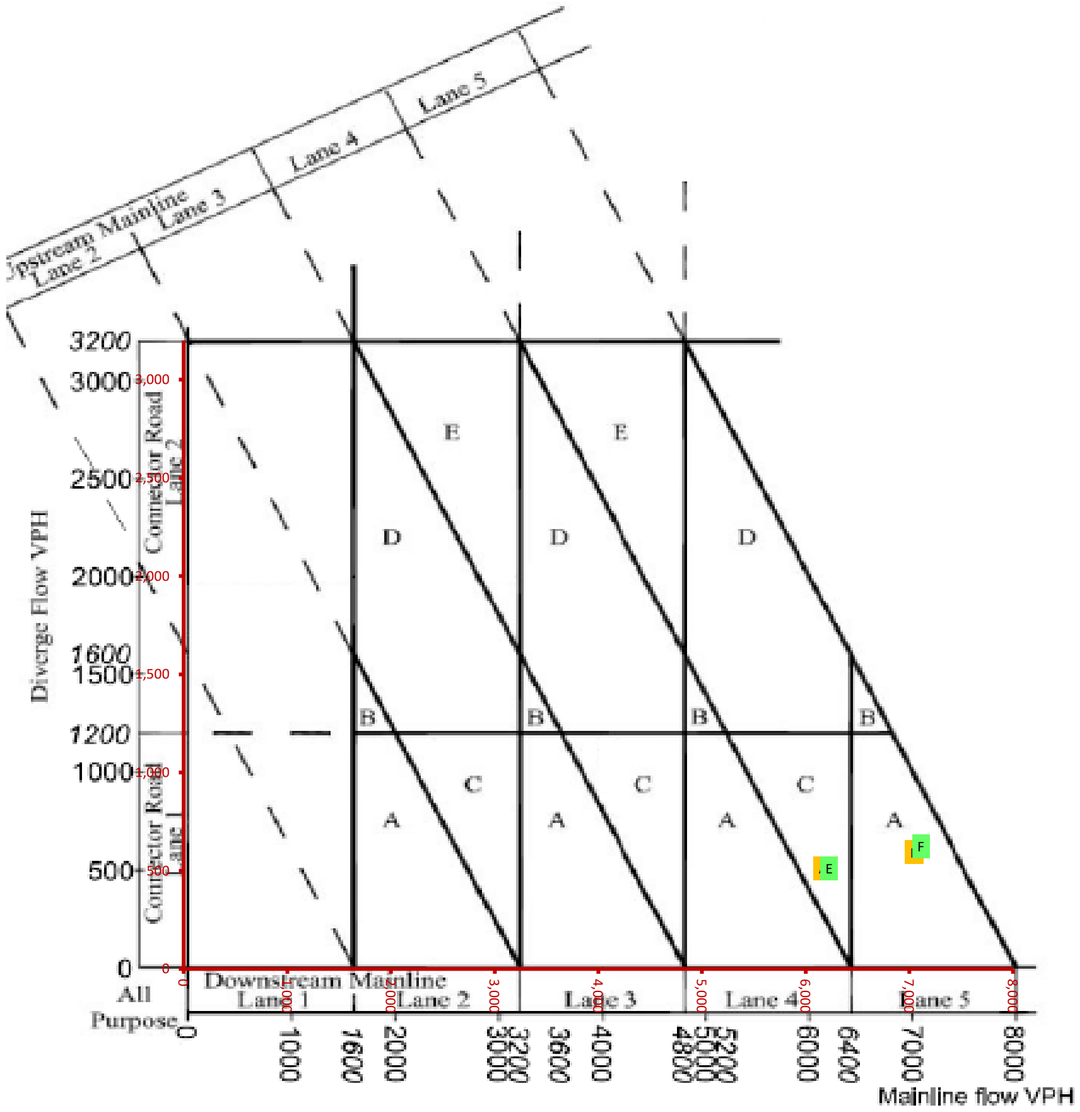
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,784	1,193	5,784	1.00	1,193	1.00
B	Ref no LTC PM	5,648	1,026	5,648	1.00	1,026	1.00
C	Ref with LTC AM			5,347	1.00	885	1.00
D	Ref with LTC PM			4,999	1.00	928	1.00
E	LP Scenario no LTC AM	5,813	1,208	5,813	1.00	1,208	1.00
F	LP Scenario no LTC PM	5,658	1,041	5,658	1.00	1,041	1.00
G	LP Scenario with LTC AM			5,378	1.00	918	1.00
H	LP Scenario with LTC PM			5,038	1.00	917	1.00

J1b northbound merge - with LTC (ACTUAL)



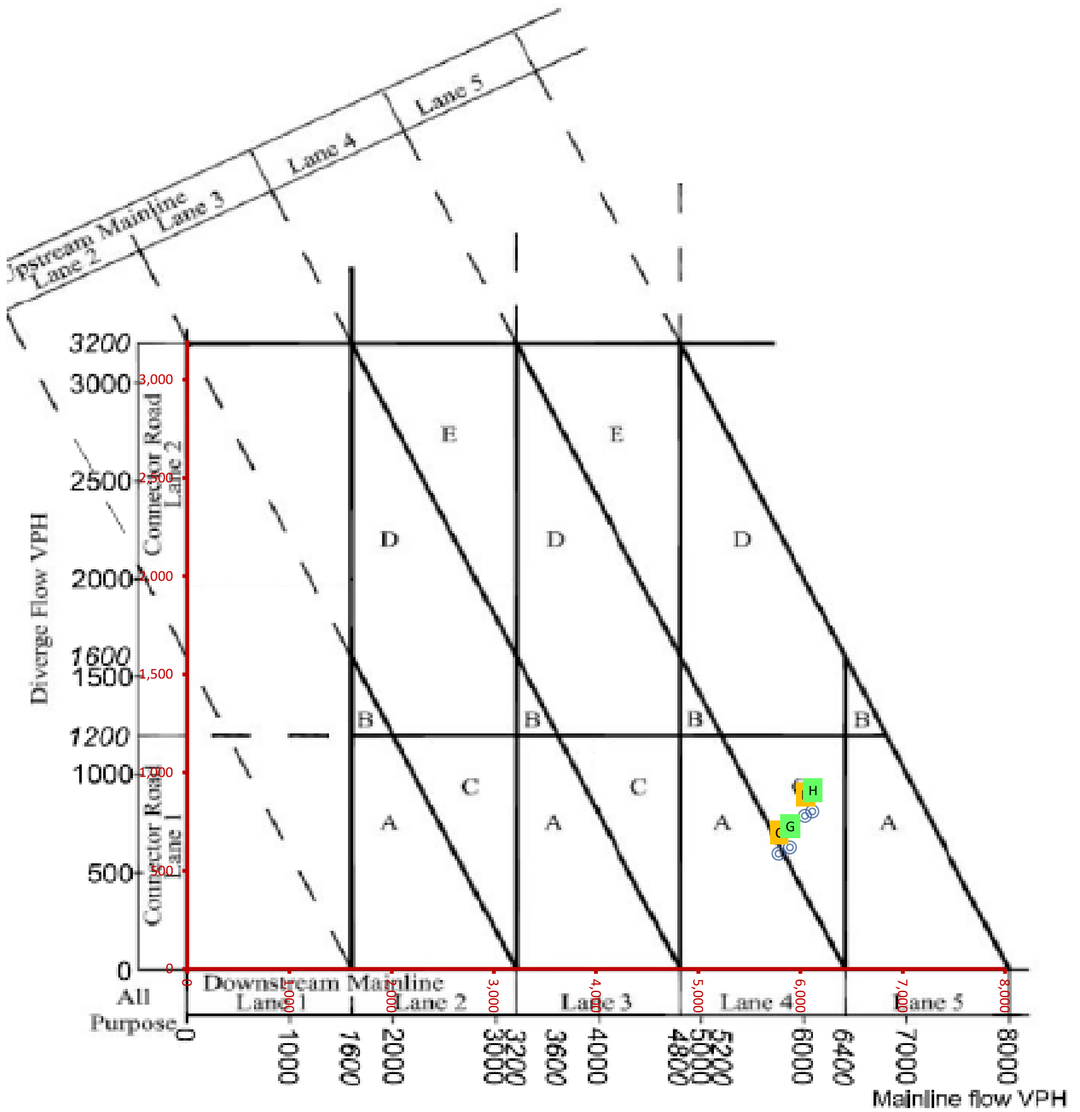
A	Ref no LTC AM			5,784	1.00	1,193	1.00
B	Ref no LTC PM			5,648	1.00	1,026	1.00
C	Ref with LTC AM	5,347	885	5,347	1.00	885	1.00
D	Ref with LTC PM	4,999	928	4,999	1.00	928	1.00
E	LP Scenario no LTC AM			5,813	1.00	1,208	1.00
F	LP Scenario no LTC PM			5,658	1.00	1,041	1.00
G	LP Scenario with LTC AM	5,378	918	5,378	1.00	918	1.00
H	LP Scenario with LTC PM	5,038	917	5,038	1.00	917	1.00

J1b southbound diverge - no LTC (DEMAND)



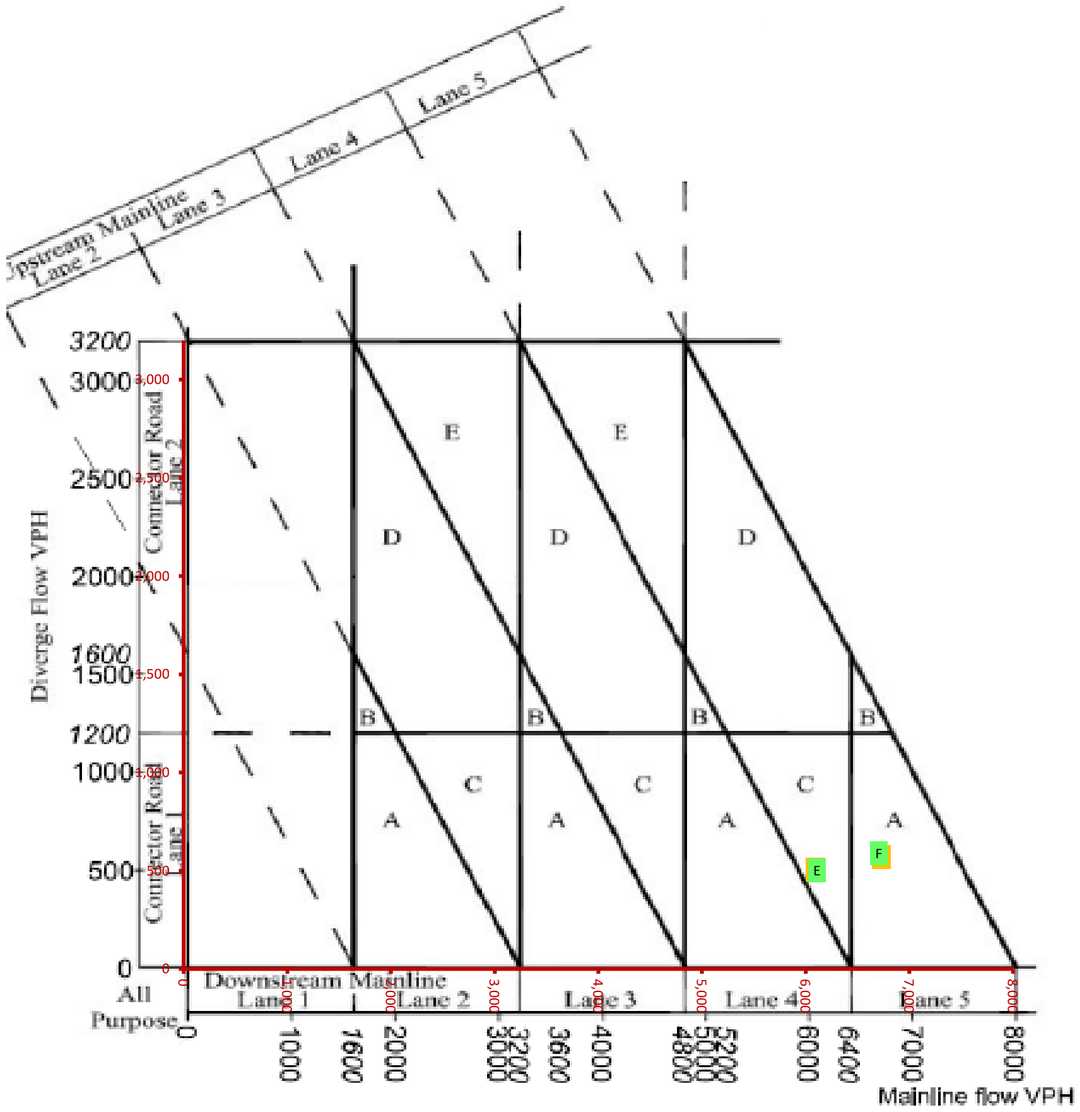
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	6,167	512	6,167	1.00	512	1.00
B	Ref no LTC PM	7,046	595	7,046	1.00	595	1.00
C	Ref with LTC AM			5,788	1.00	584	1.00
D	Ref with LTC PM			6,048	1.00	777	1.00
E	LP Scenario no LTC AM	6,226	513	6,226	1.00	513	1.00
F	LP Scenario no LTC PM	7,111	625	7,111	1.00	625	1.00
G	LP Scenario with LTC AM			5,898	1.00	616	1.00
H	LP Scenario with LTC PM			6,120	1.00	800	1.00

J1b southbound diverge - with LTC (DEMAND)



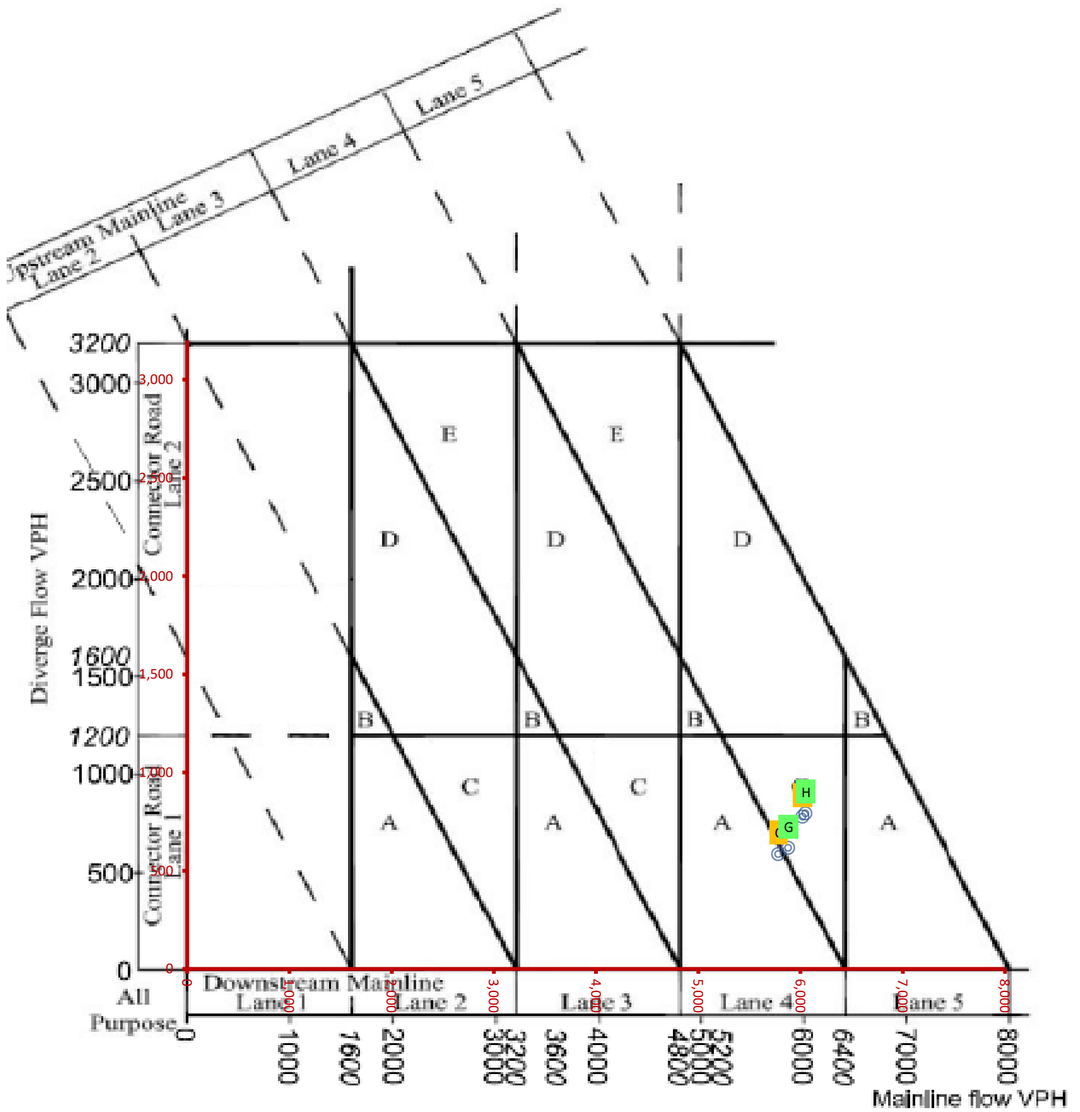
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			6,167	1.00	512	1.00
B	Ref no LTC PM			7,046	1.00	595	1.00
C	Ref with LTC AM	5,788	584	5,788	1.00	584	1.00
D	Ref with LTC PM	6,048	777	6,048	1.00	777	1.00
E	LP Scenario no LTC AM			6,226	1.00	513	1.00
F	LP Scenario no LTC PM			7,111	1.00	625	1.00
G	LP Scenario with LTC AM	5,898	616	5,898	1.00	616	1.00
H	LP Scenario with LTC PM	6,120	800	6,120	1.00	800	1.00

J1b southbound diverge - no LTC (ACTUAL)



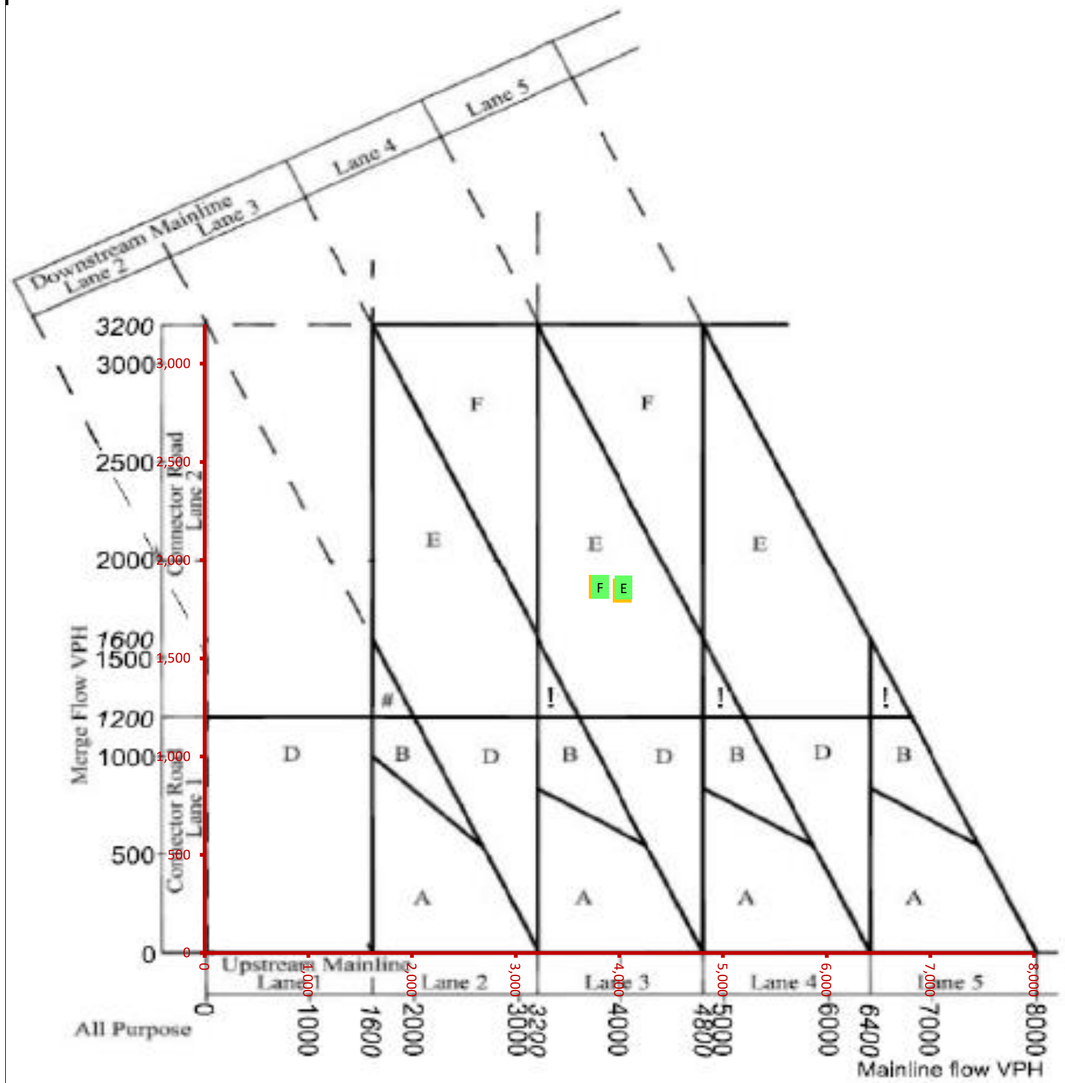
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	6,093	506	6,093	1.00	506	1.00
B	Ref no LTC PM	6,730	568	6,730	1.00	568	1.00
C	Ref with LTC AM			5,784	1.00	584	1.00
D	Ref with LTC PM			6,021	1.00	774	1.00
E	LP Scenario no LTC AM	6,109	504	6,109	1.00	504	1.00
F	LP Scenario no LTC PM	6,707	589	6,707	1.00	589	1.00
G	LP Scenario with LTC AM			5,883	1.00	614	1.00
H	LP Scenario with LTC PM			6,052	1.00	791	1.00

J1b southbound diverge - with LTC (ACTUAL)



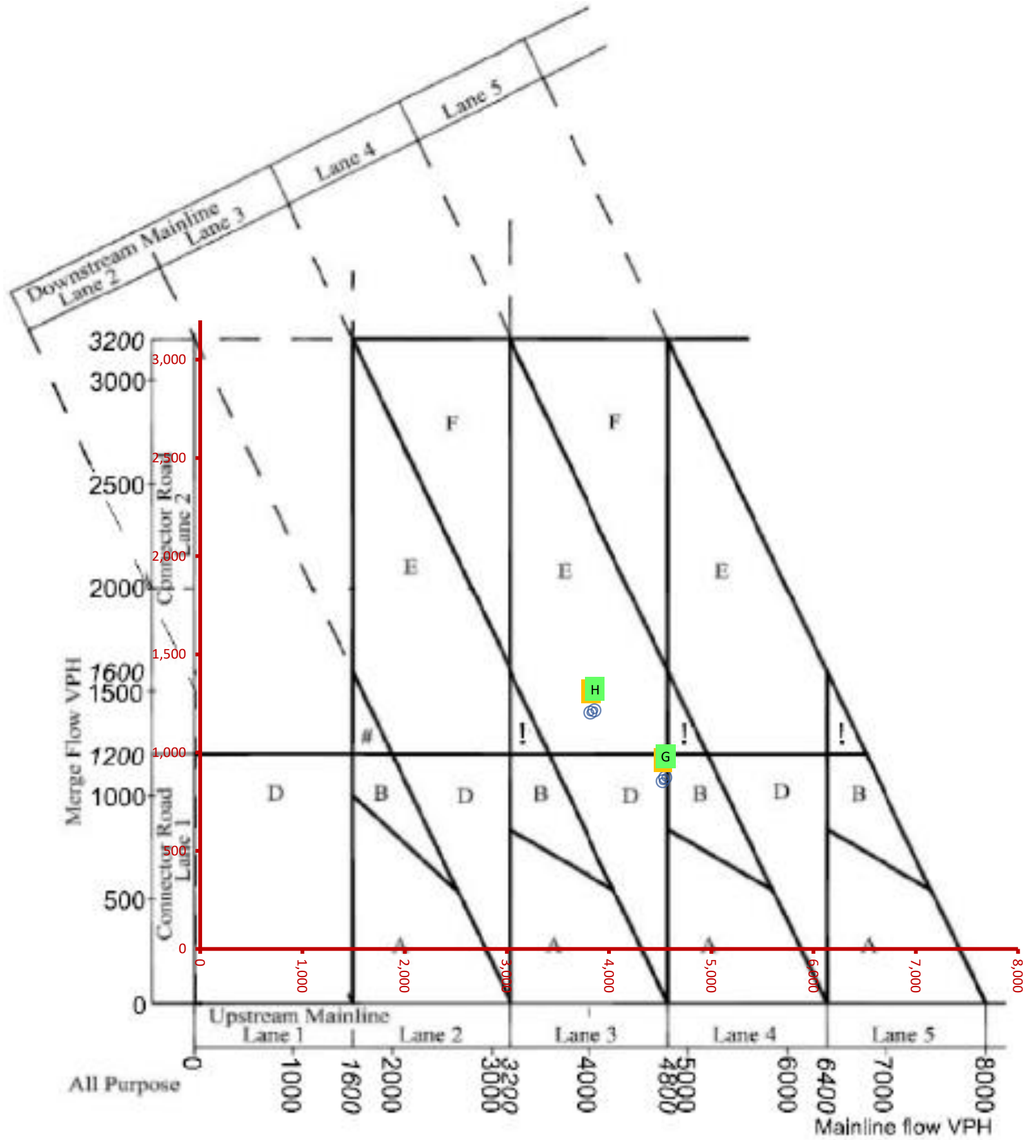
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			6,093	1.00	506	1.00
B	Ref no LTC PM			6,730	1.00	568	1.00
C	Ref with LTC AM	5,784	584	5,784	1.00	584	1.00
D	Ref with LTC PM	6,021	774	6,021	1.00	774	1.00
E	LP Scenario no LTC AM			6,109	1.00	504	1.00
F	LP Scenario no LTC PM			6,707	1.00	589	1.00
G	LP Scenario with LTC AM	5,883	614	5,883	1.00	614	1.00
H	LP Scenario with LTC PM	6,052	791	6,052	1.00	791	1.00

M25-A2 interchange northbound merge - no LTC (DEMAND)



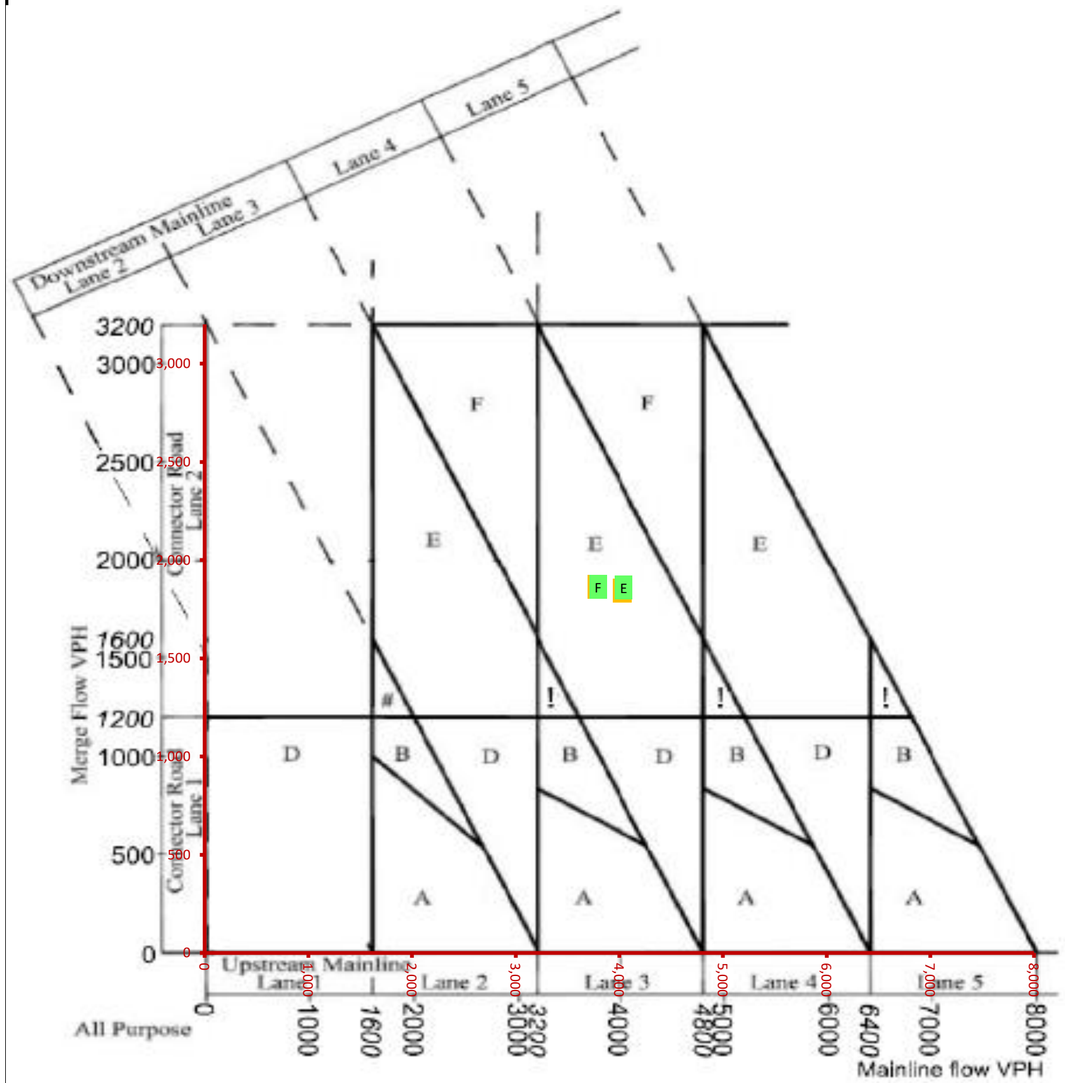
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,027	1,846	4,027	1.00	1,758	1.05
B	Ref no LTC PM	3,799	1,864	3,799	1.00	1,864	1.00
C	Ref with LTC AM			4,526	1.00	852	1.00
D	Ref with LTC PM			3,820	1.00	1,202	1.00
E	LP Scenario no LTC AM	4,042	1,859	4,042	1.00	1,771	1.05
F	LP Scenario no LTC PM	3,816	1,863	3,816	1.00	1,863	1.00
G	LP Scenario with LTC AM			4,551	1.00	871	1.00
H	LP Scenario with LTC PM			3,861	1.00	1,212	1.00

M25-A2 interchange northbound merge - with LTC (DEMAND)



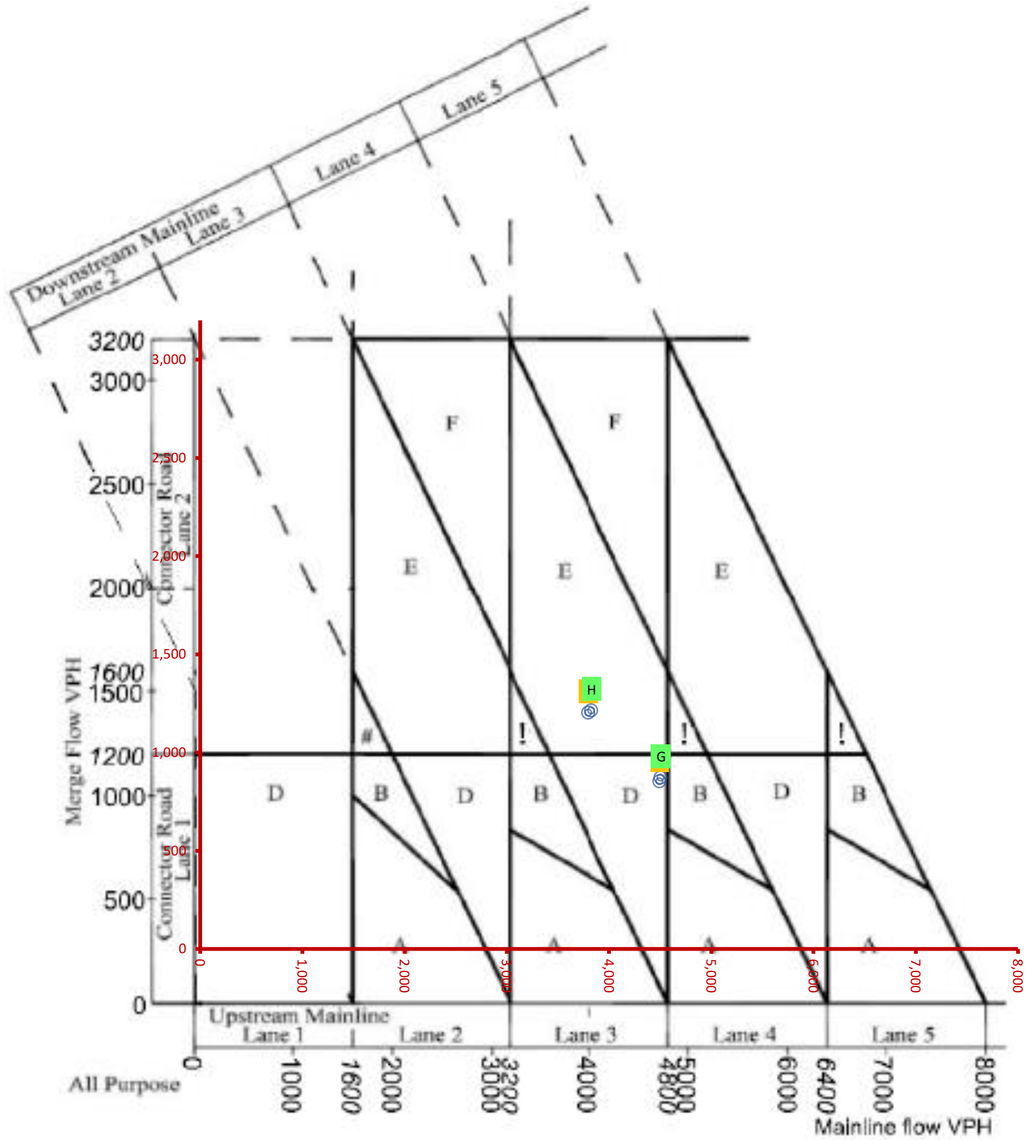
A	Ref no LTC AM			4,027	1.00	1,758	1.05
B	Ref no LTC PM			3,799	1.00	1,864	1.00
C	Ref with LTC AM	4,526	852	4,526	1.00	852	1.00
D	Ref with LTC PM	3,820	1,202	3,820	1.00	1,202	1.00
E	LP Scenario no LTC AM			4,042	1.00	1,771	1.05
F	LP Scenario no LTC PM			3,816	1.00	1,863	1.00
G	LP Scenario with LTC AM	4,551	871	4,551	1.00	871	1.00
H	LP Scenario with LTC PM	3,861	1,212	3,861	1.00	1,212	1.00

M25-A2 interchange northbound merge - no LTC (ACTUAL)



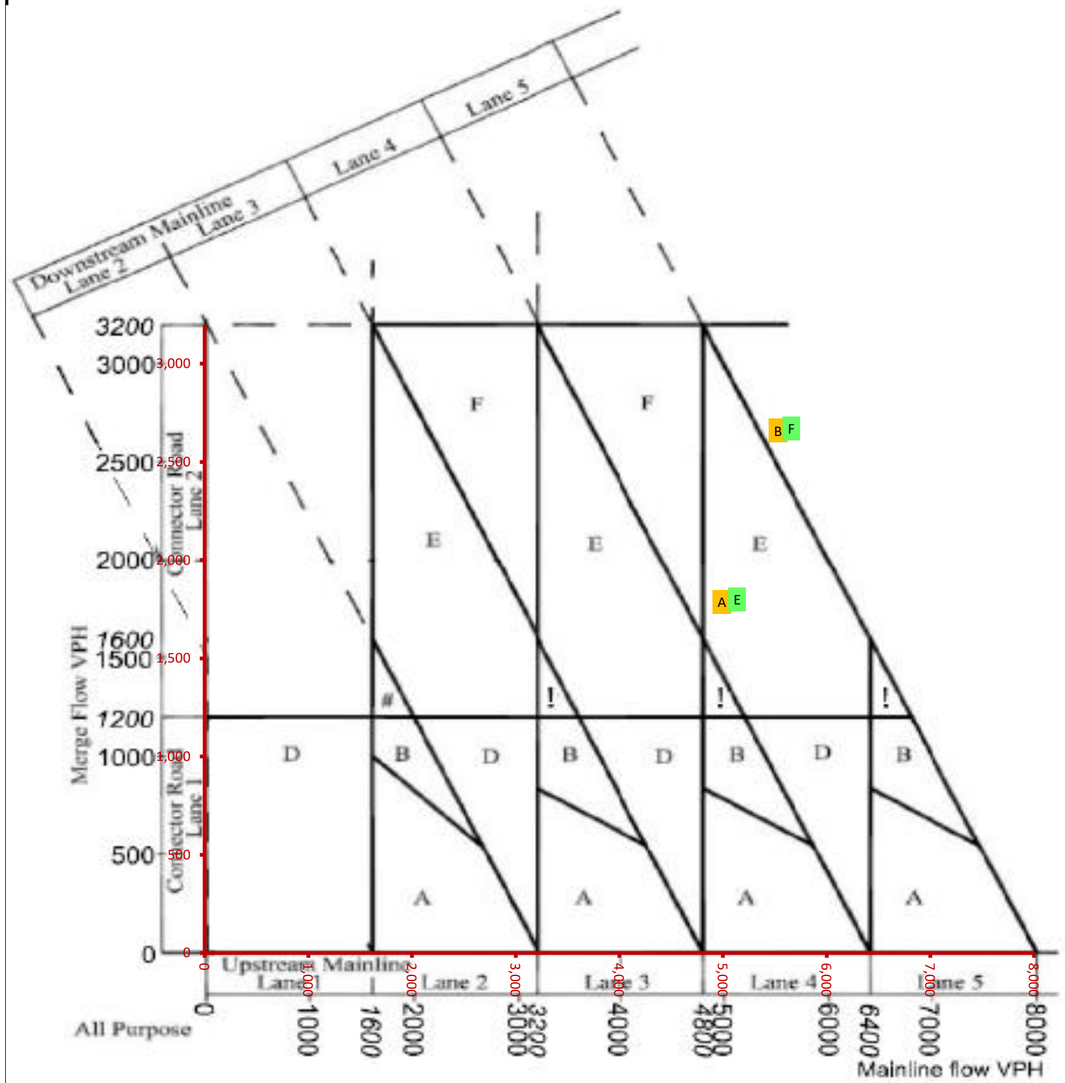
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,026	1,846	4,026	1.00	1,758	1.05
B	Ref no LTC PM	3,785	1,864	3,785	1.00	1,864	1.00
C	Ref with LTC AM			4,495	1.00	852	1.00
D	Ref with LTC PM			3,798	1.00	1,202	1.00
E	LP Scenario no LTC AM	4,042	1,859	4,042	1.00	1,771	1.05
F	LP Scenario no LTC PM	3,795	1,863	3,795	1.00	1,863	1.00
G	LP Scenario with LTC AM			4,507	1.00	871	1.00
H	LP Scenario with LTC PM			3,826	1.00	1,212	1.00

M25-A2 interchange northbound merge - with LTC (ACTUAL)



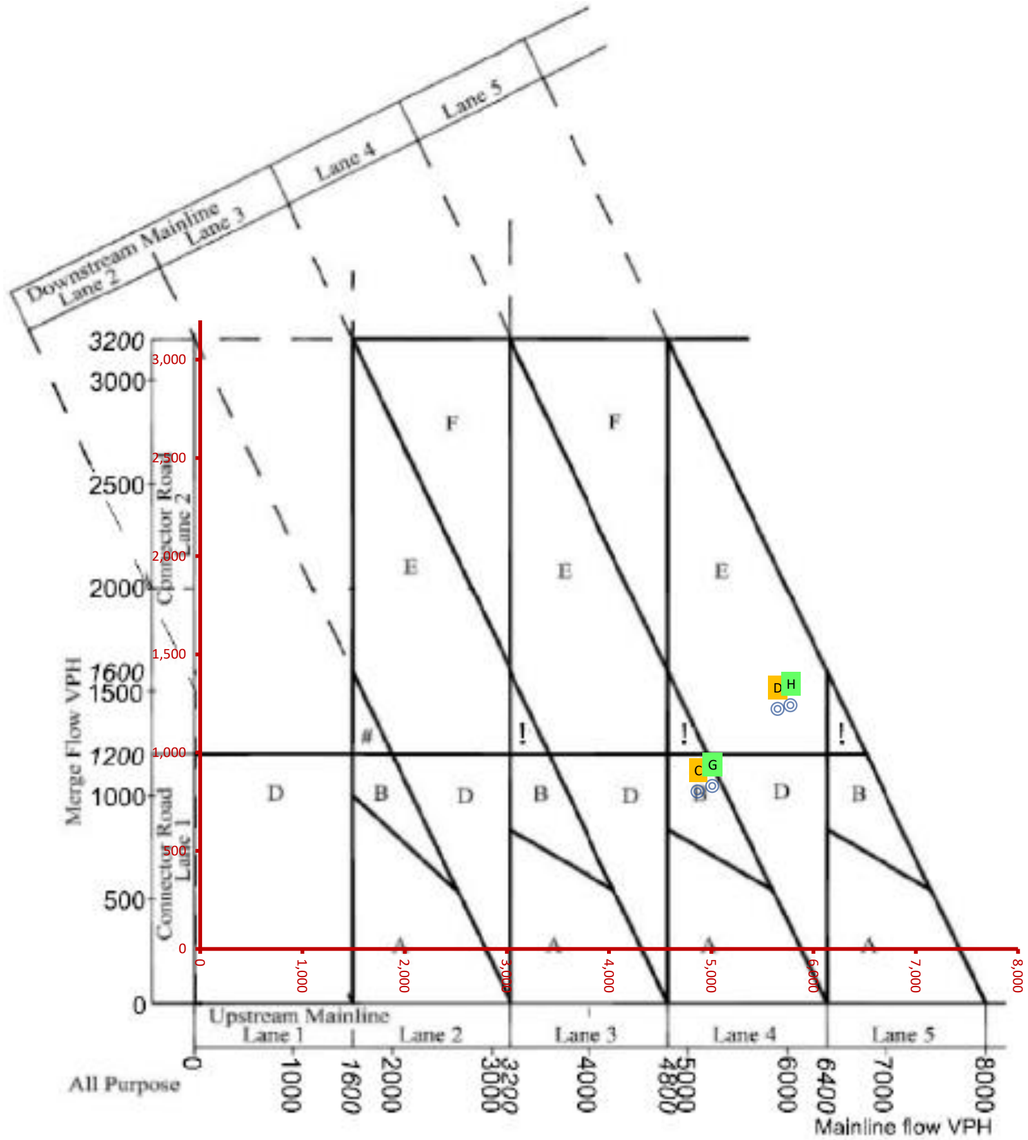
A	Ref no LTC AM			4,026	1.00	1,758	1.05
B	Ref no LTC PM			3,785	1.00	1,864	1.00
C	Ref with LTC AM	4,495	852	4,495	1.00	852	1.00
D	Ref with LTC PM	3,798	1,202	3,798	1.00	1,202	1.00
E	LP Scenario no LTC AM			4,042	1.00	1,771	1.05
F	LP Scenario no LTC PM			3,795	1.00	1,863	1.00
G	LP Scenario with LTC AM	4,507	871	4,507	1.00	871	1.00
H	LP Scenario with LTC PM	3,826	1,212	3,826	1.00	1,212	1.00

M25-A2 interchange eastbound merge - no LTC (DEMAND)



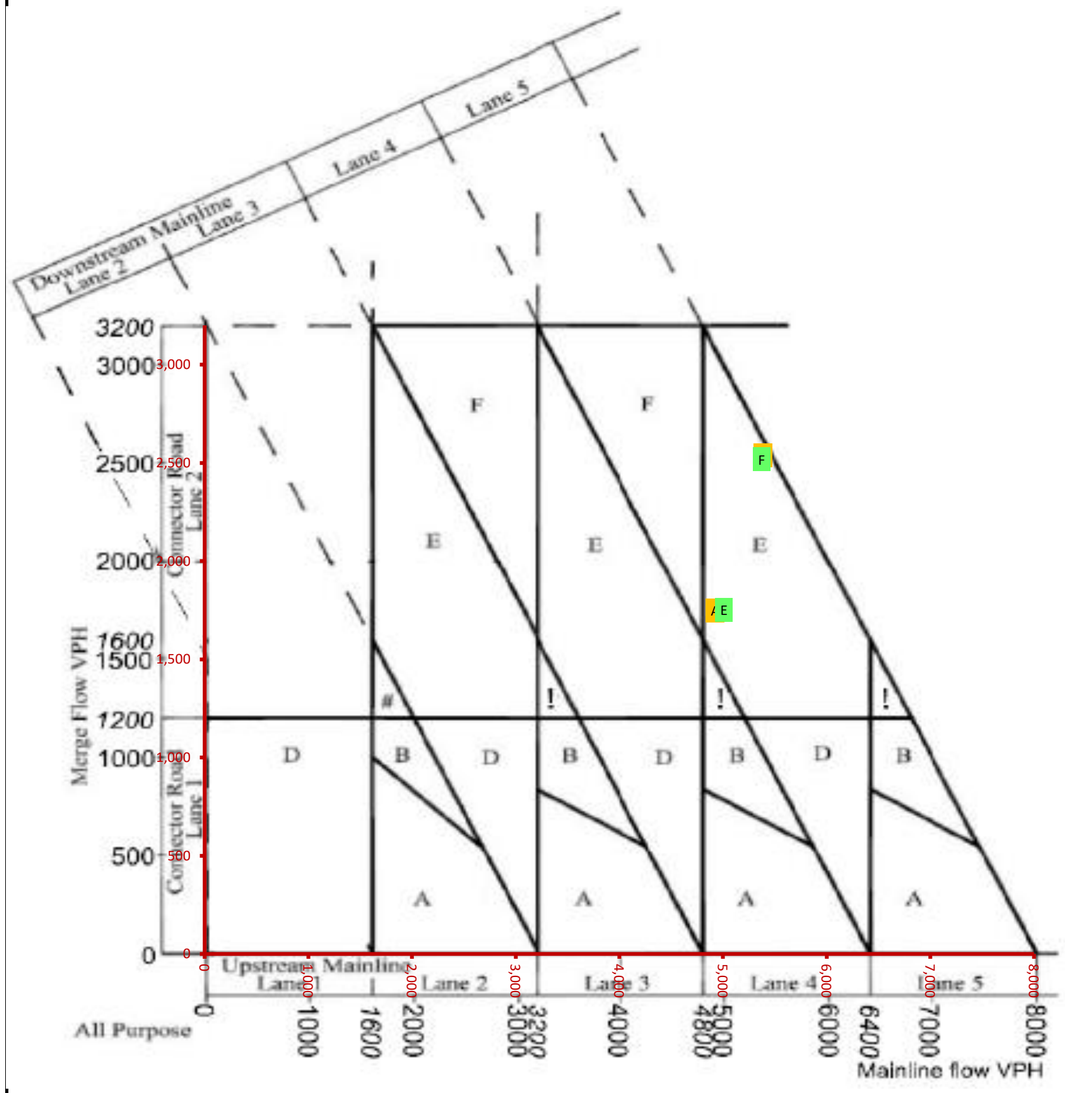
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,990	1,787	4,536	1.10	1,430	1.25
B	Ref no LTC PM	5,529	2,659	5,529	1.00	2,216	1.20
C	Ref with LTC AM			4,426	1.10	666	1.20
D	Ref with LTC PM			5,650	1.00	1,221	1.00
E	LP Scenario no LTC AM	5,137	1,800	4,670	1.10	1,440	1.25
F	LP Scenario no LTC PM	5,660	2,670	5,660	1.00	2,225	1.20
G	LP Scenario with LTC AM			4,557	1.10	690	1.20
H	LP Scenario with LTC PM			5,778	1.00	1,239	1.00

M25-A2 interchange eastbound merge - with LTC (DEMAND)



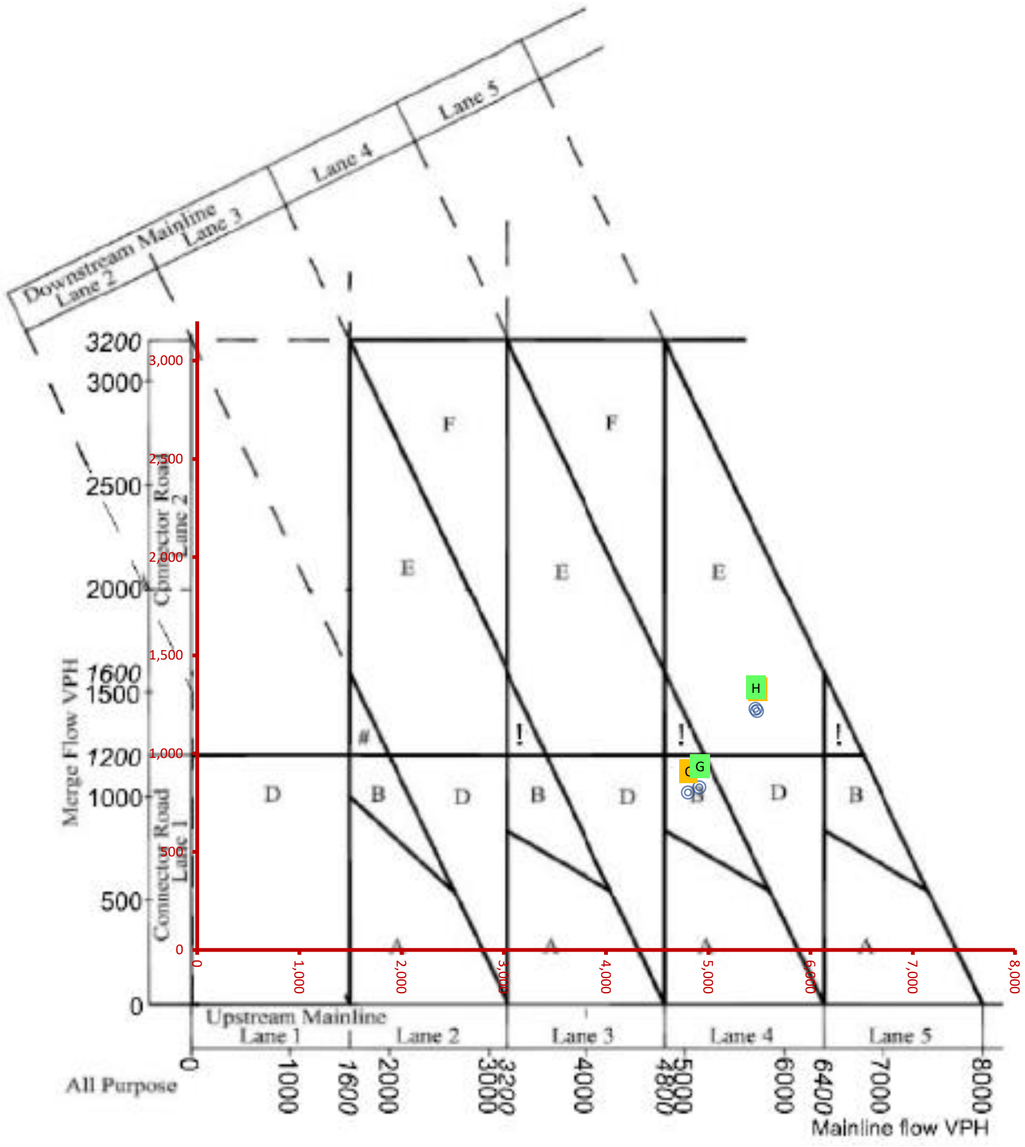
A	Ref no LTC AM			4,536	1.10	1,430	1.25
B	Ref no LTC PM			5,529	1.00	2,216	1.20
C	Ref with LTC AM	4,869	800	4,426	1.10	666	1.20
D	Ref with LTC PM	5,650	1,221	5,650	1.00	1,221	1.00
E	LP Scenario no LTC AM			4,670	1.10	1,440	1.25
F	LP Scenario no LTC PM			5,660	1.00	2,225	1.20
G	LP Scenario with LTC AM	5,012	828	4,557	1.10	690	1.20
H	LP Scenario with LTC PM	5,778	1,239	5,778	1.00	1,239	1.00

M25-A2 interchange eastbound merge - no LTC (ACTUAL)



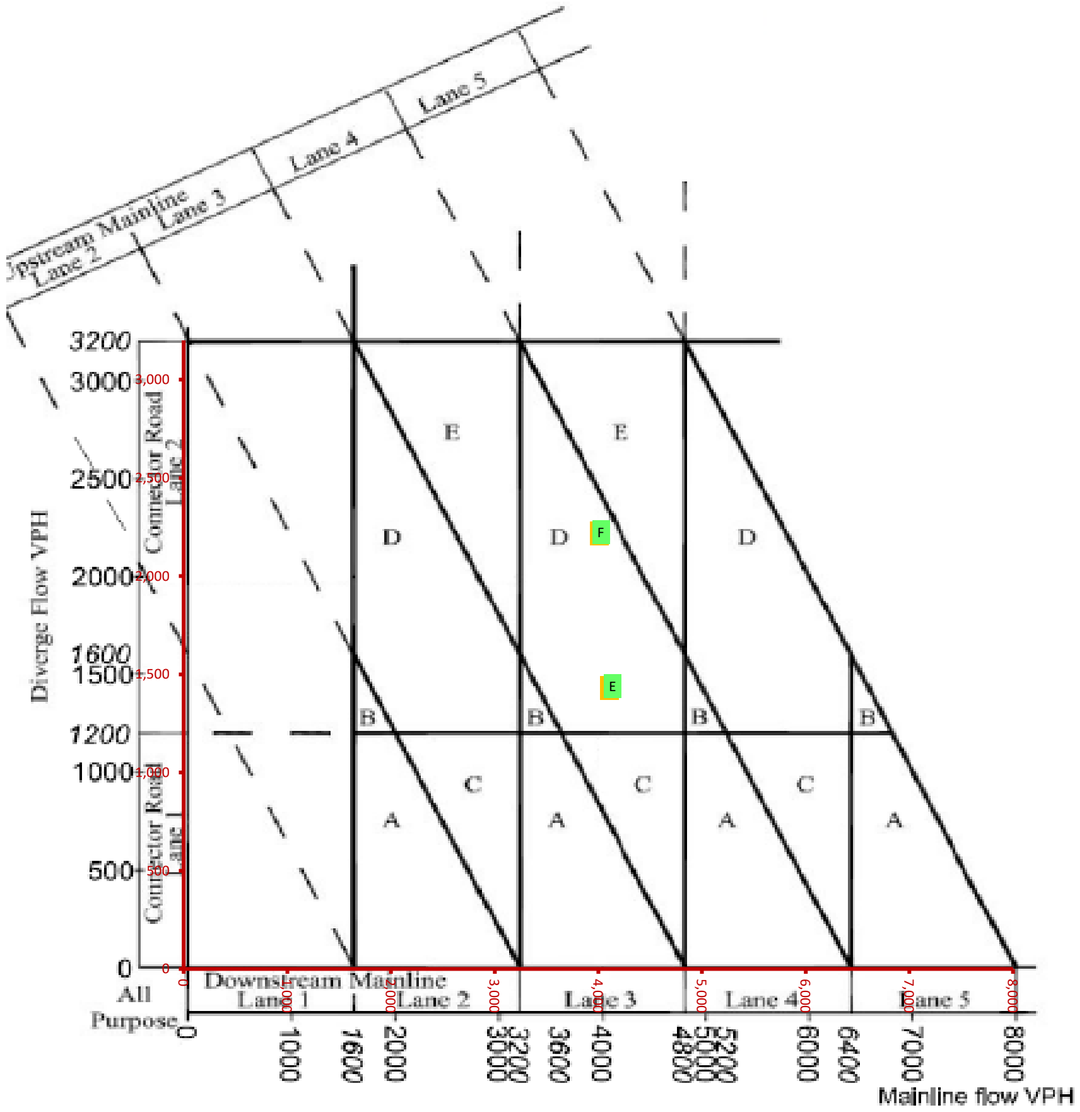
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,923	1,749	4,476	1.10	1,399	1.25
B	Ref no LTC PM	5,388	2,539	5,388	1.00	2,116	1.20
C	Ref with LTC AM			4,367	1.10	666	1.20
D	Ref with LTC PM			5,481	1.00	1,215	1.00
E	LP Scenario no LTC AM	5,008	1,752	4,553	1.10	1,402	1.25
F	LP Scenario no LTC PM	5,373	2,518	5,373	1.00	2,099	1.20
G	LP Scenario with LTC AM			4,469	1.10	688	1.20
H	LP Scenario with LTC PM			5,464	1.00	1,225	1.00

M25-A2 interchange eastbound merge - with LTC (ACTUAL)



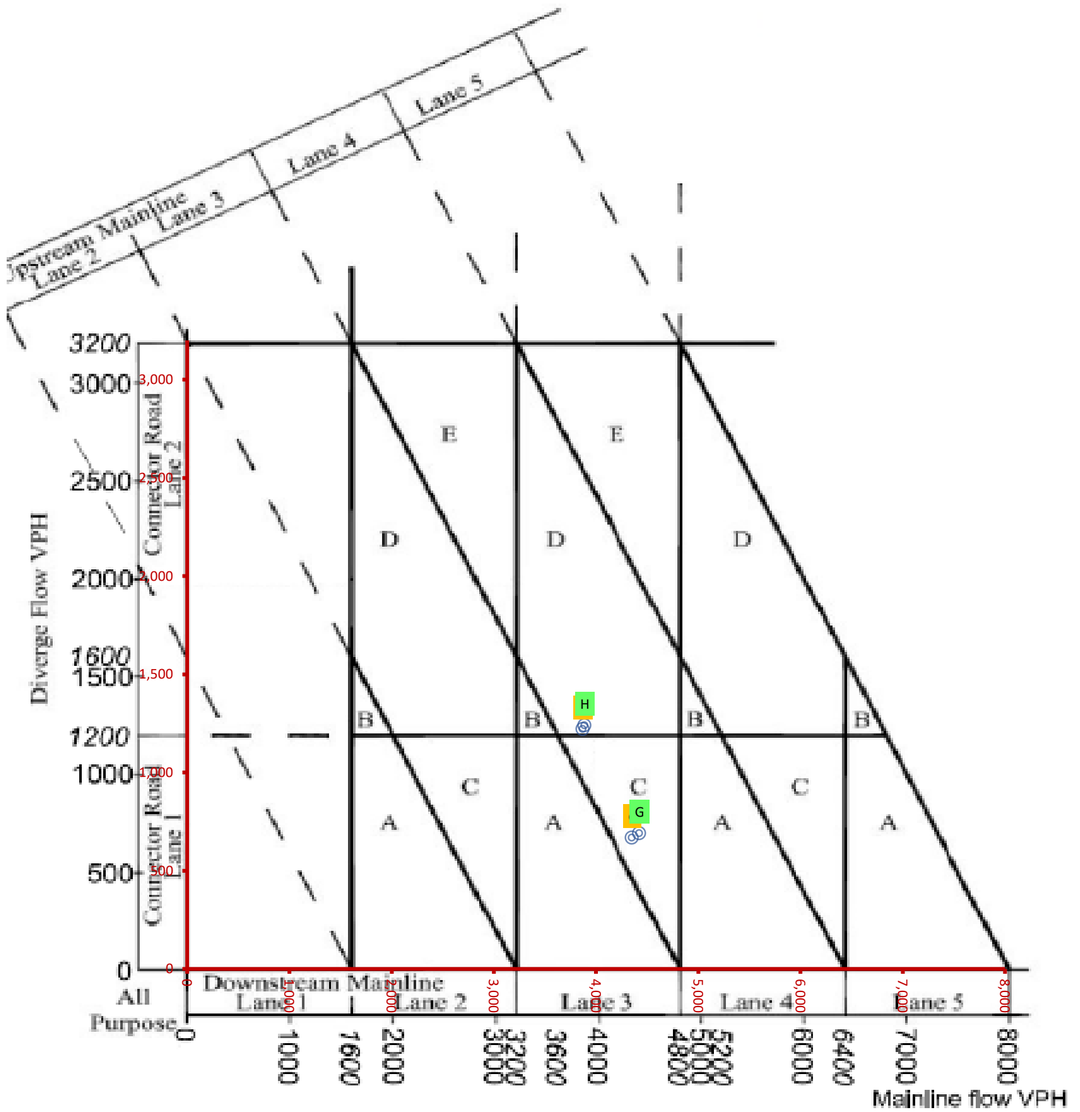
A	Ref no LTC AM			4,476	1.10	1,399	1.25
B	Ref no LTC PM			5,388	1.00	2,116	1.20
C	Ref with LTC AM	4,804	799	4,367	1.10	666	1.20
D	Ref with LTC PM	5,481	1,215	5,481	1.00	1,215	1.00
E	LP Scenario no LTC AM			4,553	1.10	1,402	1.25
F	LP Scenario no LTC PM			5,373	1.00	2,099	1.20
G	LP Scenario with LTC AM	4,916	826	4,469	1.10	688	1.20
H	LP Scenario with LTC PM	5,464	1,225	5,464	1.00	1,225	1.00

M25-A2 interchange southbound diverge - no LTC (DEMAND)



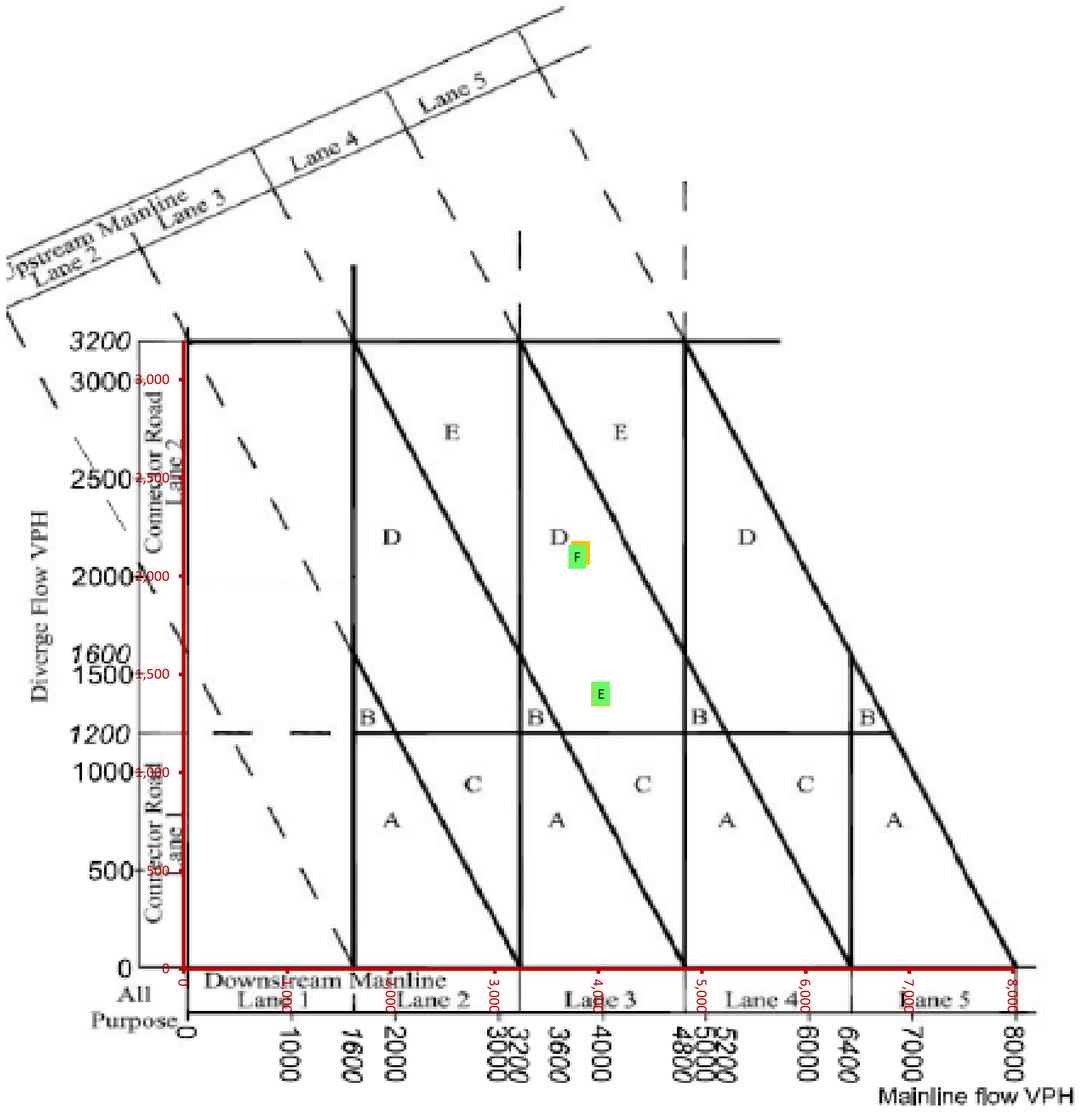
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,108	1,430	4,108	1.00	1,430	1.00
B	Ref no LTC PM	4,008	2,216	4,008	1.00	2,216	1.00
C	Ref with LTC AM			4,352	1.00	666	1.00
D	Ref with LTC PM			3,872	1.00	1,221	1.00
E	LP Scenario no LTC AM	4,135	1,440	4,135	1.00	1,440	1.00
F	LP Scenario no LTC PM	4,026	2,225	4,026	1.00	2,225	1.00
G	LP Scenario with LTC AM			4,423	1.00	690	1.00
H	LP Scenario with LTC PM			3,888	1.00	1,239	1.00

M25-A2 interchange southbound diverge - with LTC (DEMAND)



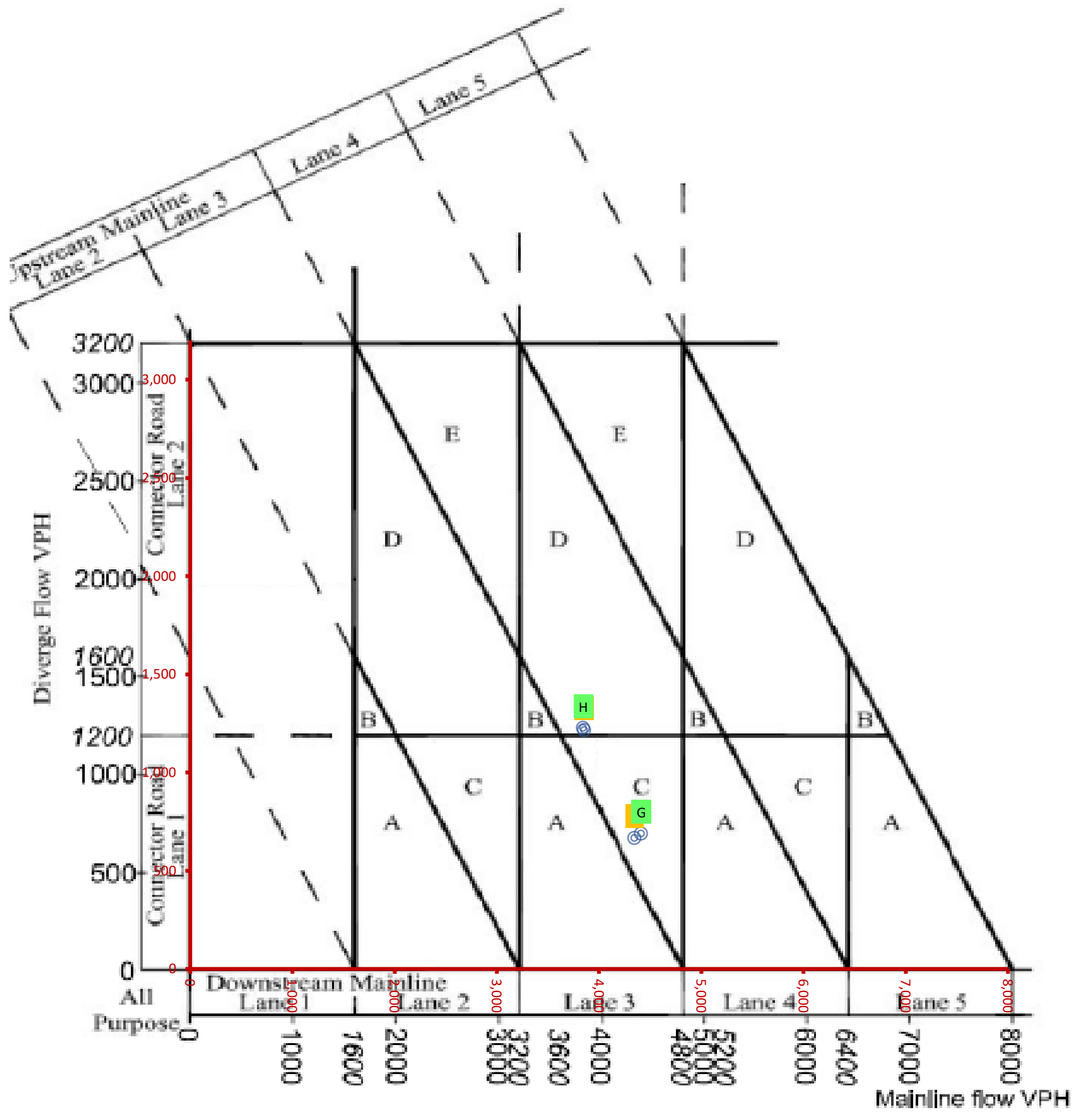
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,108	1.00	1,430	1.00
B	Ref no LTC PM			4,008	1.00	2,216	1.00
C	Ref with LTC AM	4,352	666	4,352	1.00	666	1.00
D	Ref with LTC PM	3,872	1,221	3,872	1.00	1,221	1.00
E	LP Scenario no LTC AM			4,135	1.00	1,440	1.00
F	LP Scenario no LTC PM			4,026	1.00	2,225	1.00
G	LP Scenario with LTC AM	4,423	690	4,423	1.00	690	1.00
H	LP Scenario with LTC PM	3,888	1,239	3,888	1.00	1,239	1.00

M25-A2 interchange southbound diverge - no LTC (ACTUAL)



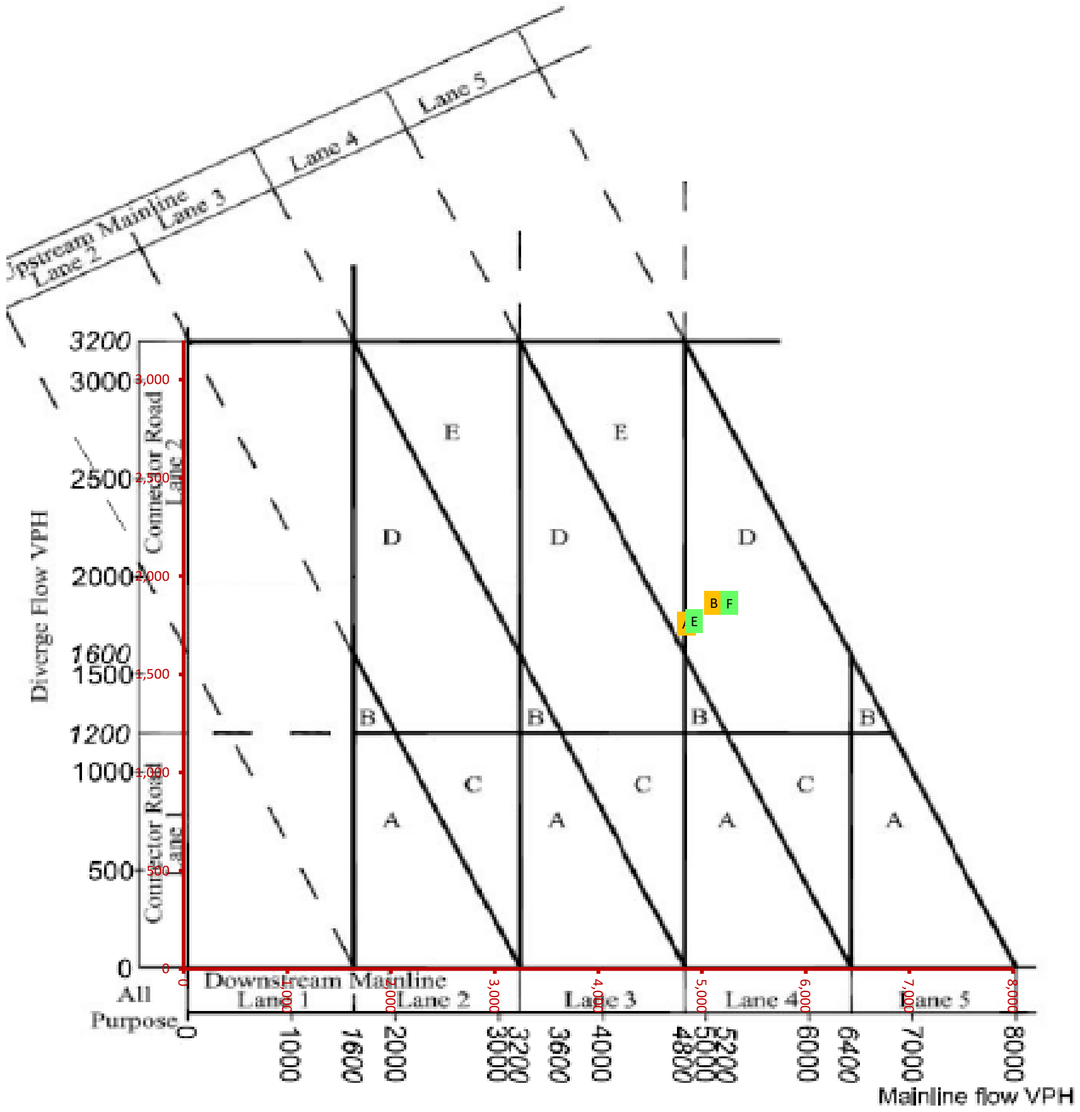
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,021	1,399	4,021	1.00	1,399	1.00
B	Ref no LTC PM	3,828	2,116	3,828	1.00	2,116	1.00
C	Ref with LTC AM			4,349	1.00	666	1.00
D	Ref with LTC PM			3,854	1.00	1,215	1.00
E	LP Scenario no LTC AM	4,026	1,402	4,026	1.00	1,402	1.00
F	LP Scenario no LTC PM	3,797	2,099	3,797	1.00	2,099	1.00
G	LP Scenario with LTC AM			4,412	1.00	688	1.00
H	LP Scenario with LTC PM			3,844	1.00	1,225	1.00

M25-A2 interchange southbound diverge - with LTC (ACTUAL)



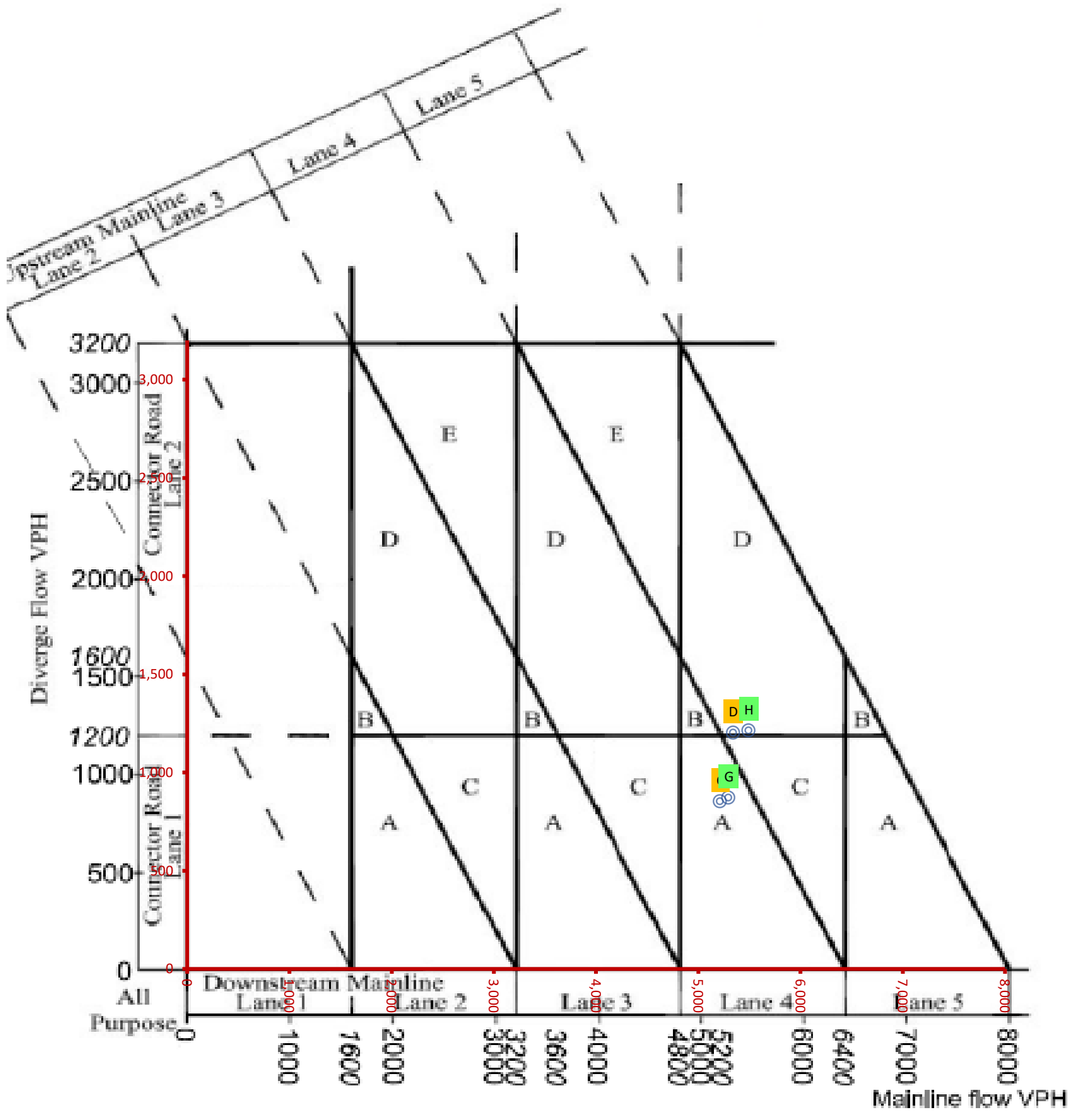
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,021	1.00	1,399	1.00
B	Ref no LTC PM			3,828	1.00	2,116	1.00
C	Ref with LTC AM	4,349	666	4,349	1.00	666	1.00
D	Ref with LTC PM	3,854	1,215	3,854	1.00	1,215	1.00
E	LP Scenario no LTC AM			4,026	1.00	1,402	1.00
F	LP Scenario no LTC PM			3,797	1.00	2,099	1.00
G	LP Scenario with LTC AM	4,412	688	4,412	1.00	688	1.00
H	LP Scenario with LTC PM	3,844	1,225	3,844	1.00	1,225	1.00

M25-A2 interchange westbound diverge - no LTC (DEMAND)



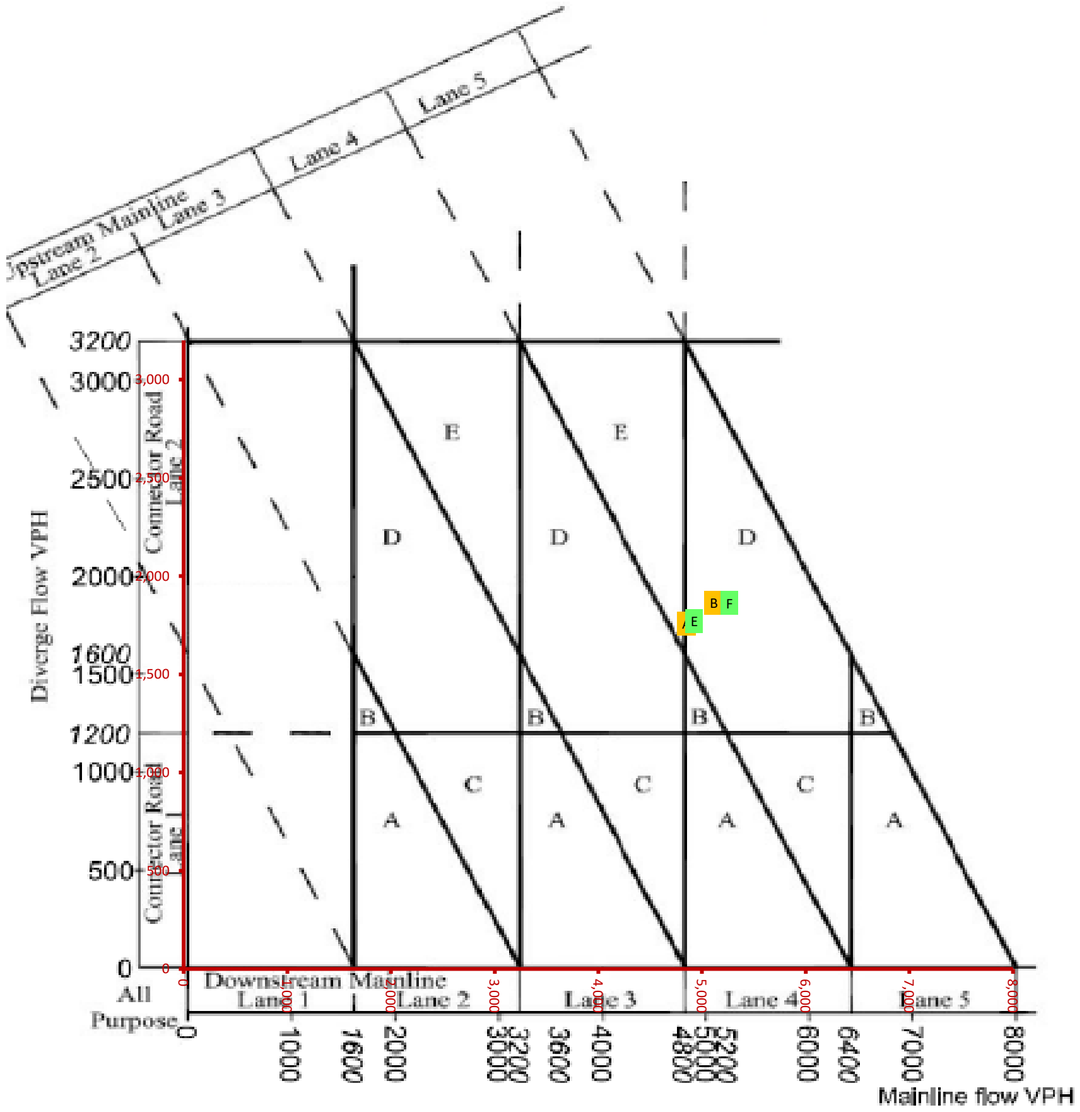
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,850	1,758	4,850	1.00	1,758	1.00
B	Ref no LTC PM	5,114	1,864	5,114	1.00	1,864	1.00
C	Ref with LTC AM			5,214	1.00	852	1.00
D	Ref with LTC PM			5,341	1.00	1,202	1.00
E	LP Scenario no LTC AM	4,925	1,771	4,925	1.00	1,771	1.00
F	LP Scenario no LTC PM	5,266	1,863	5,266	1.00	1,863	1.00
G	LP Scenario with LTC AM			5,297	1.00	871	1.00
H	LP Scenario with LTC PM			5,493	1.00	1,212	1.00

M25-A2 interchange westbound diverge - with LTC (DEMAND)



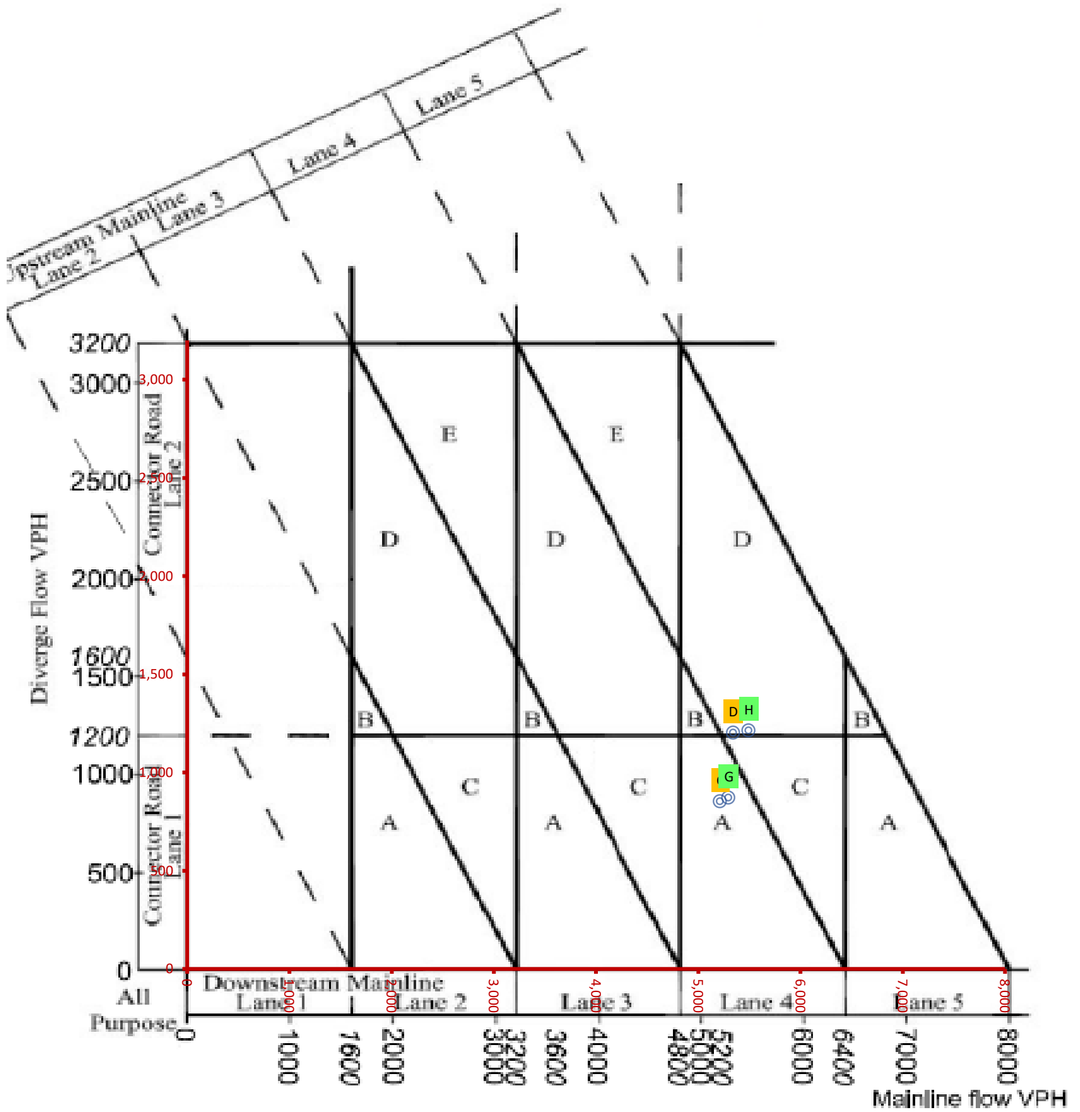
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,850	1.00	1,758	1.00
B	Ref no LTC PM			5,114	1.00	1,864	1.00
C	Ref with LTC AM	5,214	852	5,214	1.00	852	1.00
D	Ref with LTC PM	5,341	1,202	5,341	1.00	1,202	1.00
E	LP Scenario no LTC AM			4,925	1.00	1,771	1.00
F	LP Scenario no LTC PM			5,266	1.00	1,863	1.00
G	LP Scenario with LTC AM	5,297	871	5,297	1.00	871	1.00
H	LP Scenario with LTC PM	5,493	1,212	5,493	1.00	1,212	1.00

M25-A2 interchange westbound diverge - no LTC (ACTUAL)



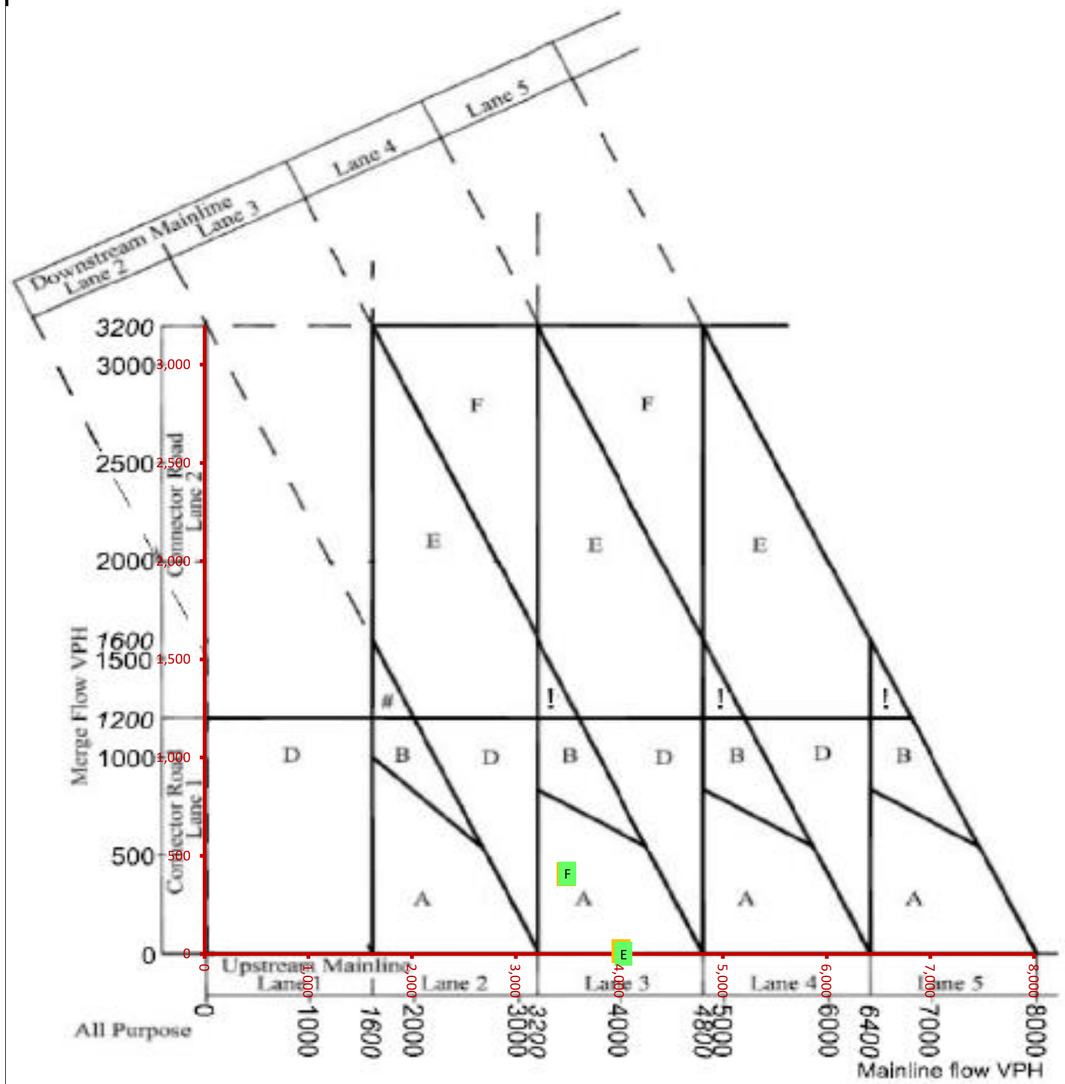
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,850	1,758	4,850	1.00	1,758	1.00
B	Ref no LTC PM	5,114	1,864	5,114	1.00	1,864	1.00
C	Ref with LTC AM			5,214	1.00	852	1.00
D	Ref with LTC PM			5,341	1.00	1,202	1.00
E	LP Scenario no LTC AM	4,925	1,771	4,925	1.00	1,771	1.00
F	LP Scenario no LTC PM	5,266	1,863	5,266	1.00	1,863	1.00
G	LP Scenario with LTC AM			5,297	1.00	871	1.00
H	LP Scenario with LTC PM			5,493	1.00	1,212	1.00

M25-A2 interchange westbound diverge - with LTC (ACTUAL)



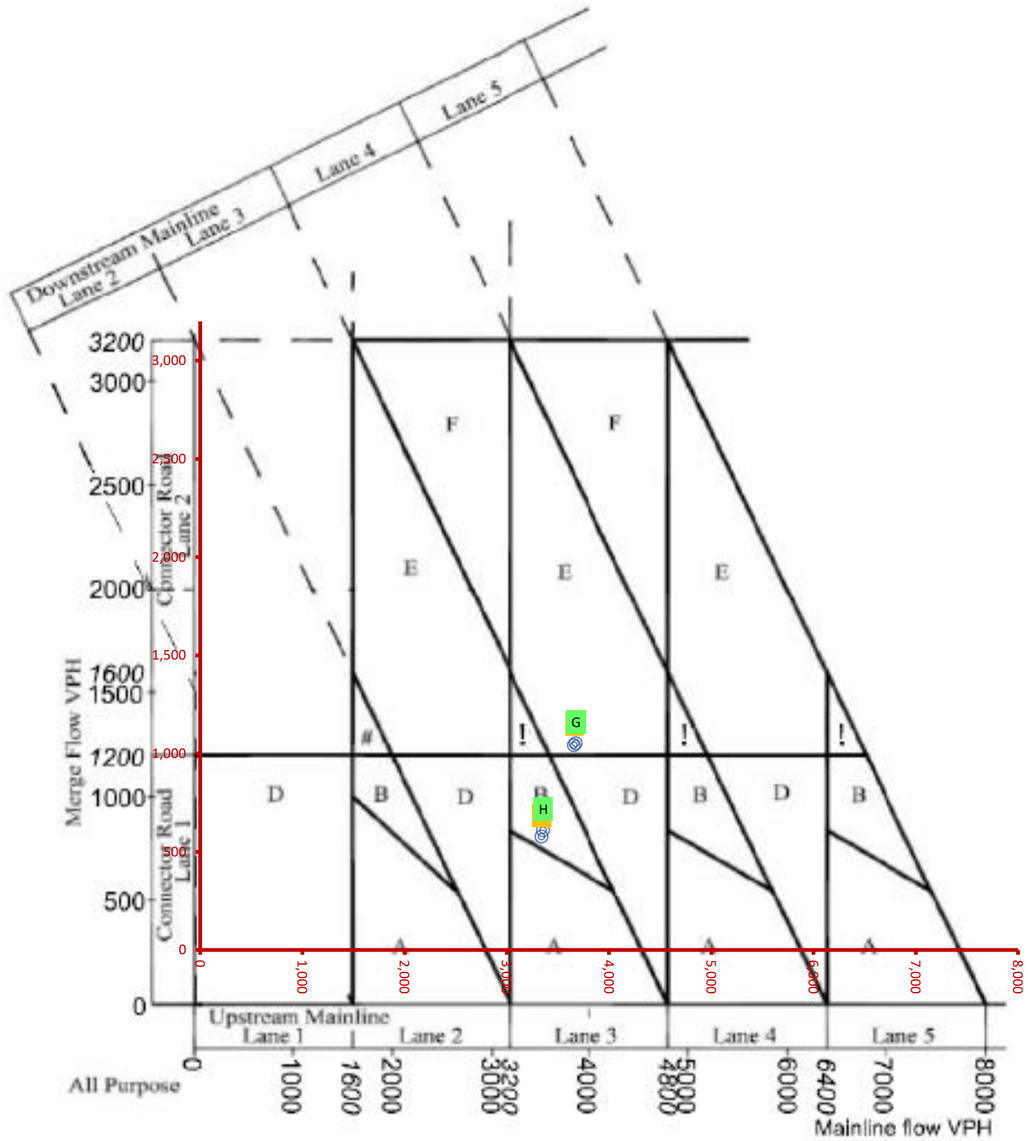
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,850	1.00	1,758	1.00
B	Ref no LTC PM			5,114	1.00	1,864	1.00
C	Ref with LTC AM	5,214	852	5,214	1.00	852	1.00
D	Ref with LTC PM	5,341	1,202	5,341	1.00	1,202	1.00
E	LP Scenario no LTC AM			4,925	1.00	1,771	1.00
F	LP Scenario no LTC PM			5,266	1.00	1,863	1.00
G	LP Scenario with LTC AM	5,297	871	5,297	1.00	871	1.00
H	LP Scenario with LTC PM	5,493	1,212	5,493	1.00	1,212	1.00

J2 northbound merge - no LTC (DEMAND)



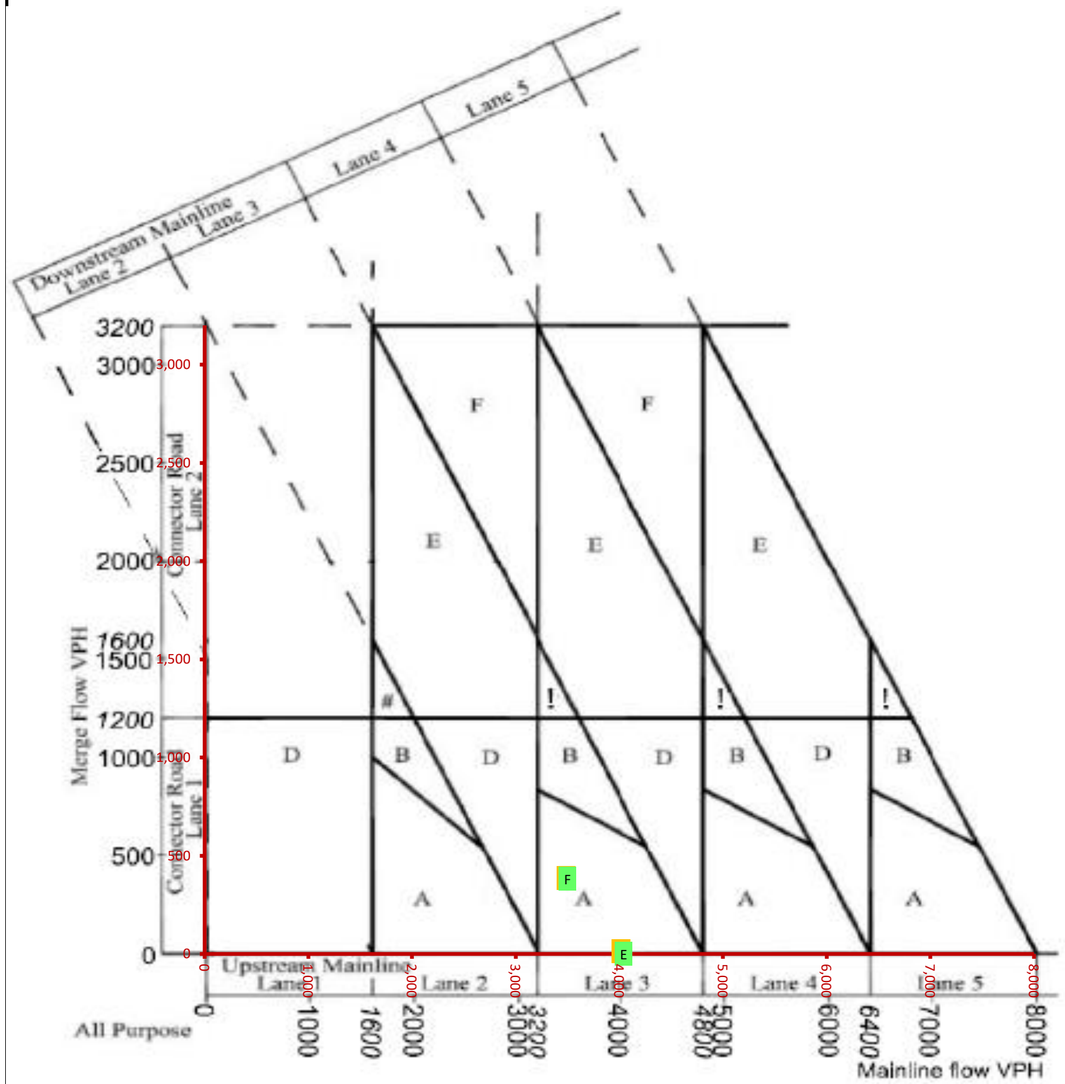
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,013	14	4,013	1.00	14	1.00
B	Ref no LTC PM	3,487	406	3,487	1.00	312	1.30
C	Ref with LTC AM			3,660	1.00	867	1.20
D	Ref with LTC PM			3,341	1.00	479	1.20
E	LP Scenario no LTC AM	4,042	0	4,042	1.00	0	1.15
F	LP Scenario no LTC PM	3,502	409	3,502	1.00	315	1.30
G	LP Scenario with LTC AM			3,676	1.00	876	1.20
H	LP Scenario with LTC PM			3,355	1.00	506	1.20

J2 northbound merge - with LTC (DEMAND)



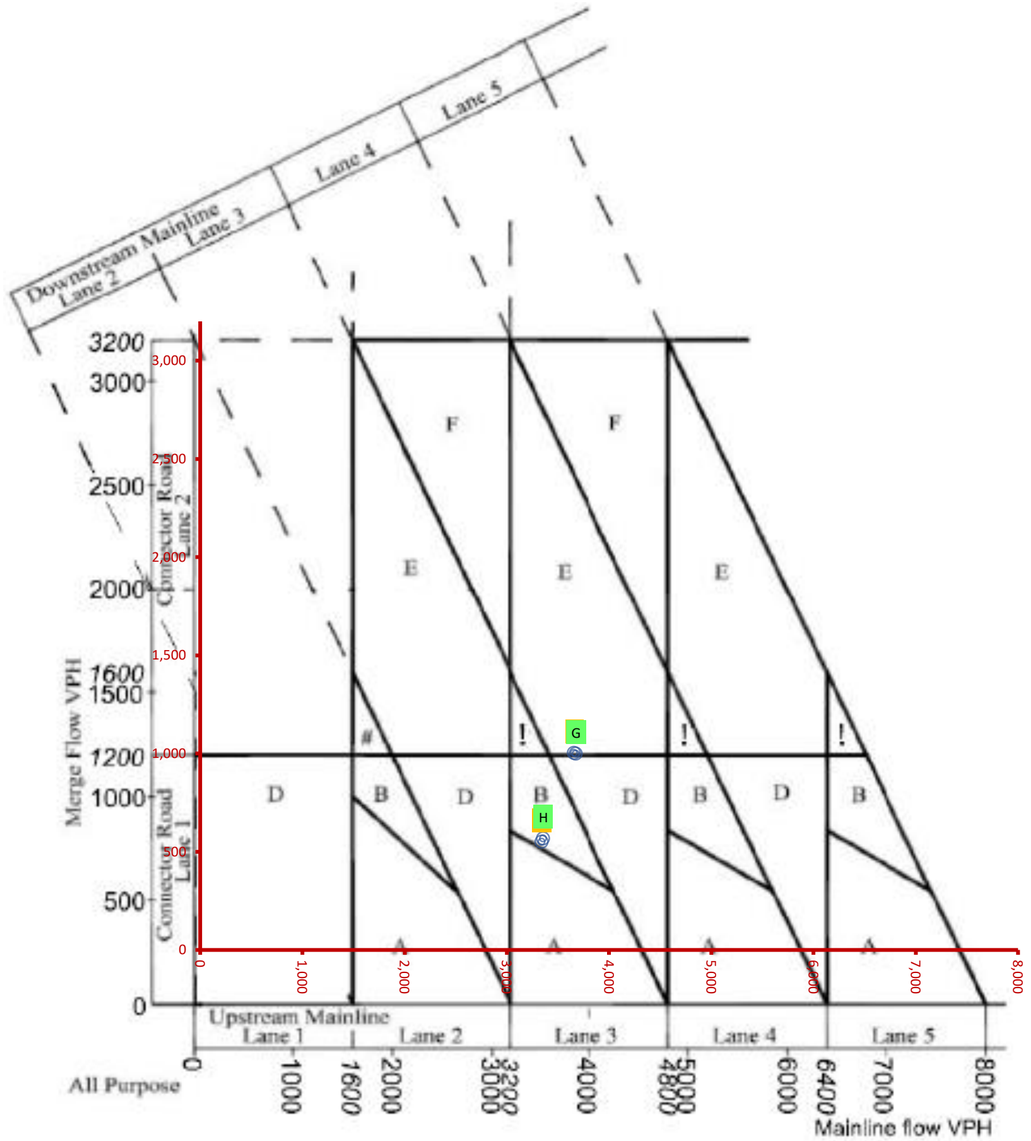
A	Ref no LTC AM			4,013	1.00	14	1.00
B	Ref no LTC PM			3,487	1.00	312	1.30
C	Ref with LTC AM	3,660	1,040	3,660	1.00	867	1.20
D	Ref with LTC PM	3,341	575	3,341	1.00	479	1.20
E	LP Scenario no LTC AM			4,042	1.00	0	1.15
F	LP Scenario no LTC PM			3,502	1.00	315	1.30
G	LP Scenario with LTC AM	3,676	1,051	3,676	1.00	876	1.20
H	LP Scenario with LTC PM	3,355	607	3,355	1.00	506	1.20

J2 northbound merge - no LTC (ACTUAL)



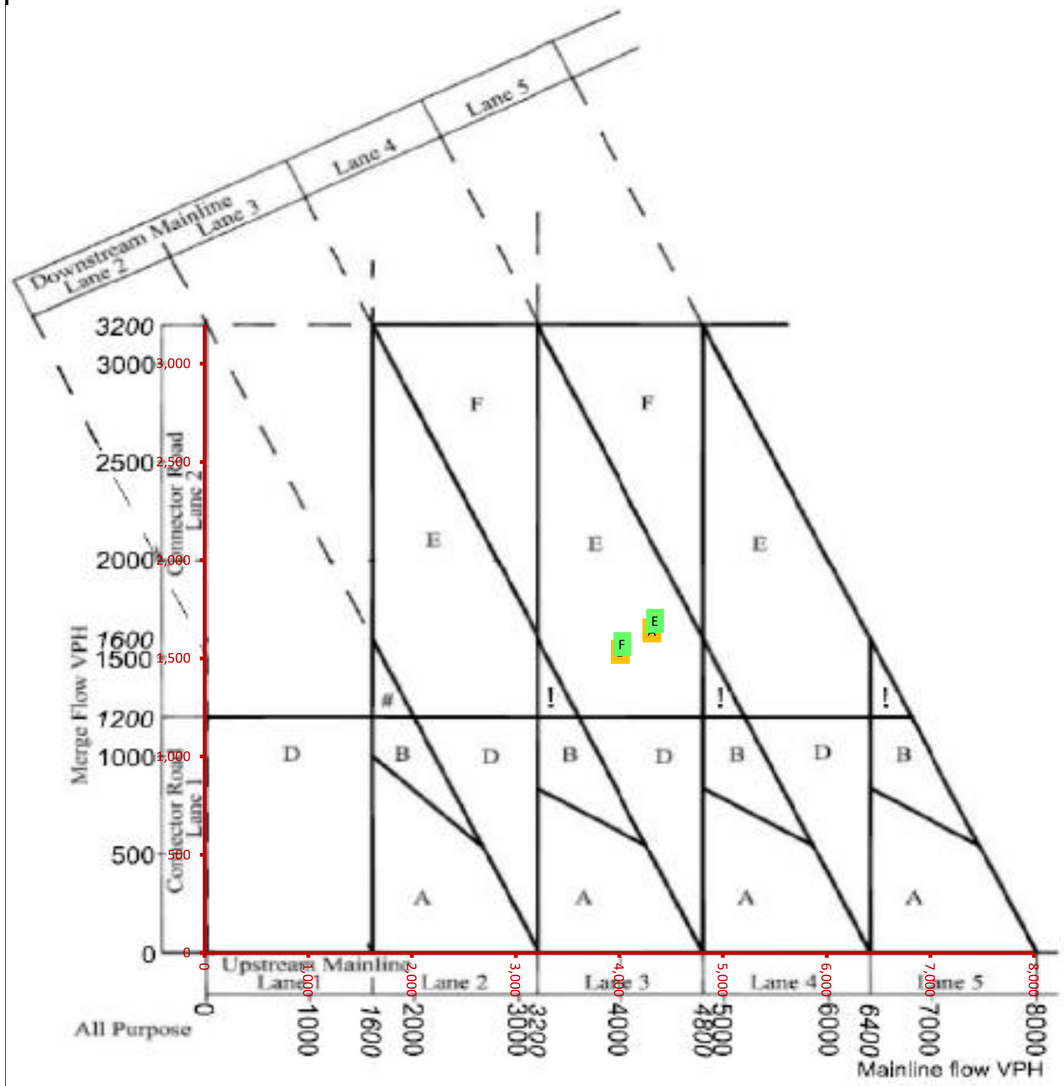
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,013	13	4,013	1.00	13	1.00
B	Ref no LTC PM	3,487	388	3,487	1.00	298	1.30
C	Ref with LTC AM			3,660	1.00	835	1.20
D	Ref with LTC PM			3,341	1.00	457	1.20
E	LP Scenario no LTC AM	4,042	0	4,042	1.00	0	1.00
F	LP Scenario no LTC PM	3,502	383	3,502	1.00	294	1.30
G	LP Scenario with LTC AM			3,676	1.00	831	1.20
H	LP Scenario with LTC PM			3,355	1.00	472	1.20

J2 northbound merge - with LTC (ACTUAL)



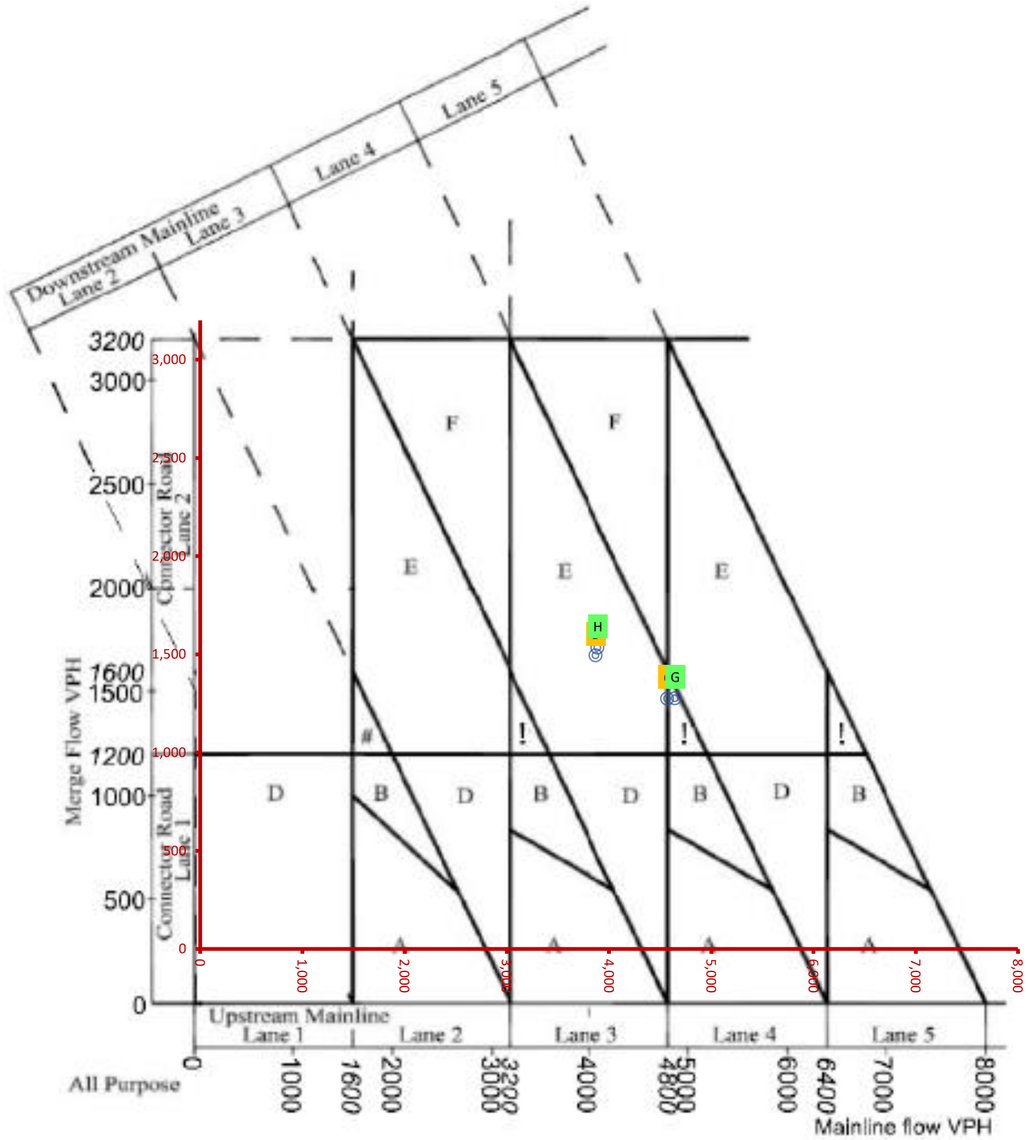
A	Ref no LTC AM			4,013	1.00	13	1.00
B	Ref no LTC PM			3,487	1.00	298	1.30
C	Ref with LTC AM	3,660	1,002	3,660	1.00	835	1.20
D	Ref with LTC PM	3,341	549	3,341	1.00	457	1.20
E	LP Scenario no LTC AM			4,042	1.00	0	1.00
F	LP Scenario no LTC PM			3,502	1.00	294	1.30
G	LP Scenario with LTC AM	3,676	997	3,676	1.00	831	1.20
H	LP Scenario with LTC PM	3,355	566	3,355	1.00	472	1.20

J2 southbound merge - no LTC (DEMAND)



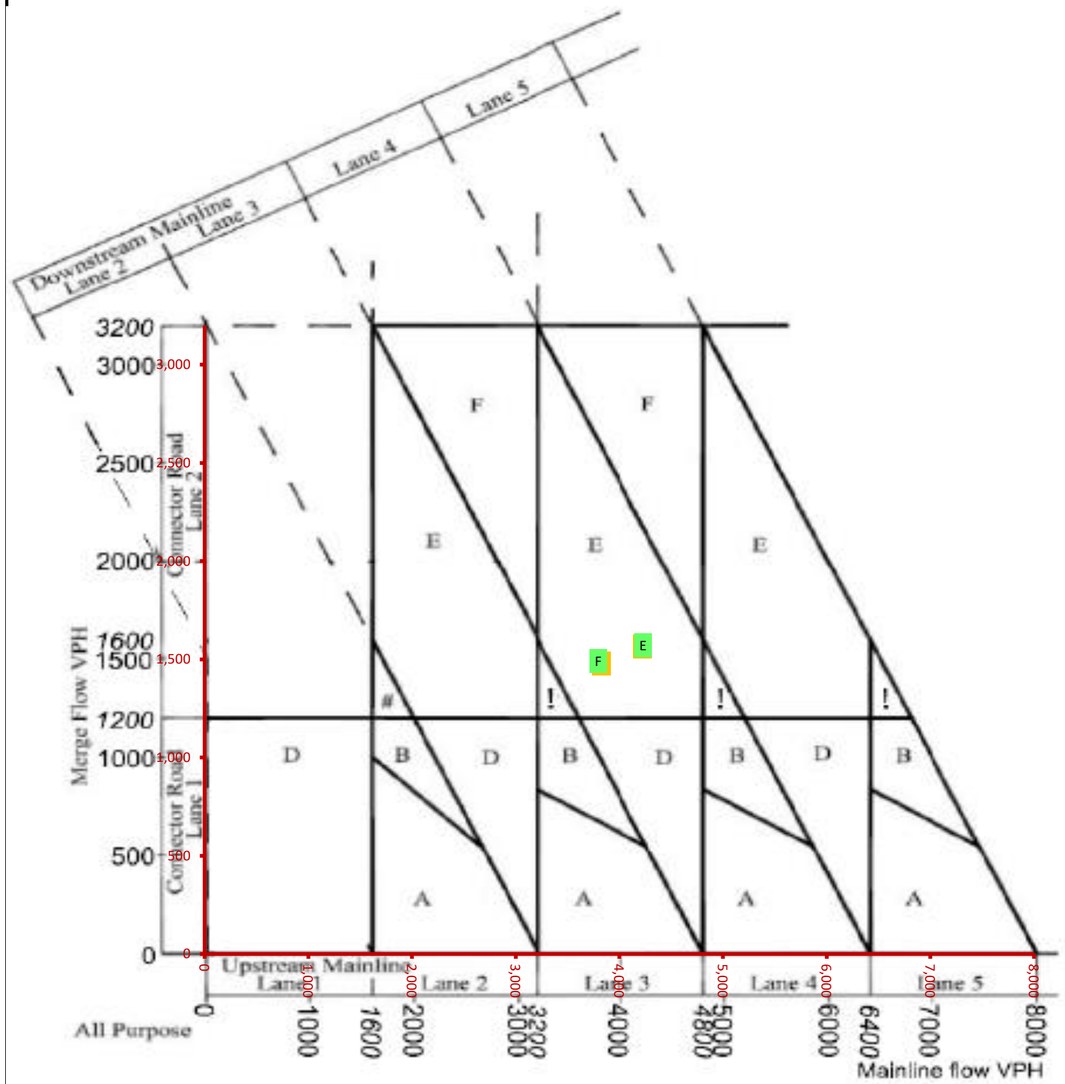
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,313	1,641	4,108	1.05	1,641	1.00
B	Ref no LTC PM	4,008	1,534	4,008	1.00	1,534	1.00
C	Ref with LTC AM			4,352	1.05	1,273	1.00
D	Ref with LTC PM			3,872	1.00	1,494	1.00
E	LP Scenario no LTC AM	4,342	1,690	4,135	1.05	1,690	1.00
F	LP Scenario no LTC PM	4,026	1,572	4,026	1.00	1,572	1.00
G	LP Scenario with LTC AM			4,423	1.05	1,275	1.00
H	LP Scenario with LTC PM			3,888	1.00	1,533	1.00

J2 southbound merge - with LTC (DEMAND)



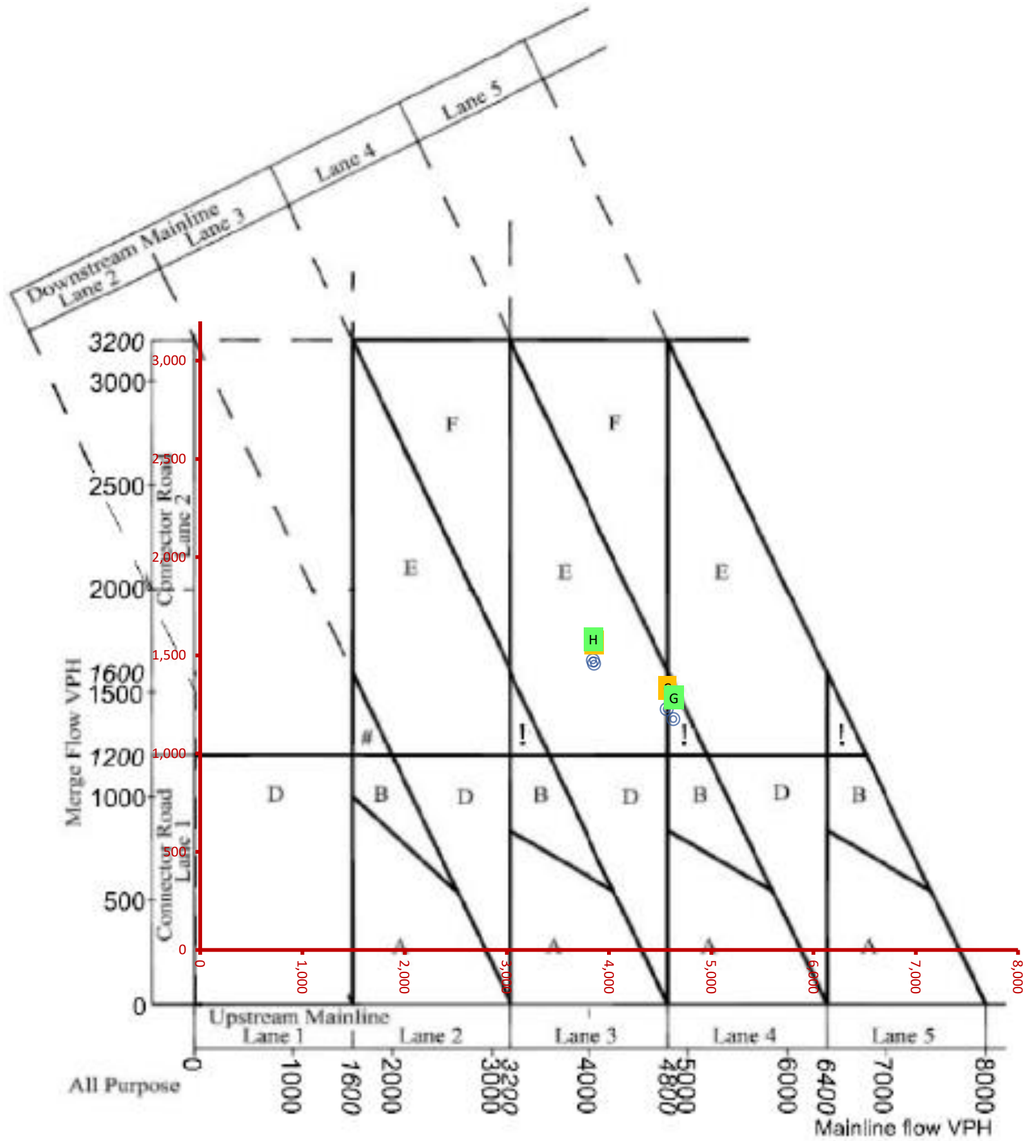
A	Ref no LTC AM			4,108	1.05	1,641	1.00
B	Ref no LTC PM			4,008	1.00	1,534	1.00
C	Ref with LTC AM	4,570	1,273	4,352	1.05	1,273	1.00
D	Ref with LTC PM	3,872	1,494	3,872	1.00	1,494	1.00
E	LP Scenario no LTC AM			4,135	1.05	1,690	1.00
F	LP Scenario no LTC PM			4,026	1.00	1,572	1.00
G	LP Scenario with LTC AM	4,644	1,275	4,423	1.05	1,275	1.00
H	LP Scenario with LTC PM	3,888	1,533	3,888	1.00	1,533	1.00

J2 southbound merge - no LTC (ACTUAL)



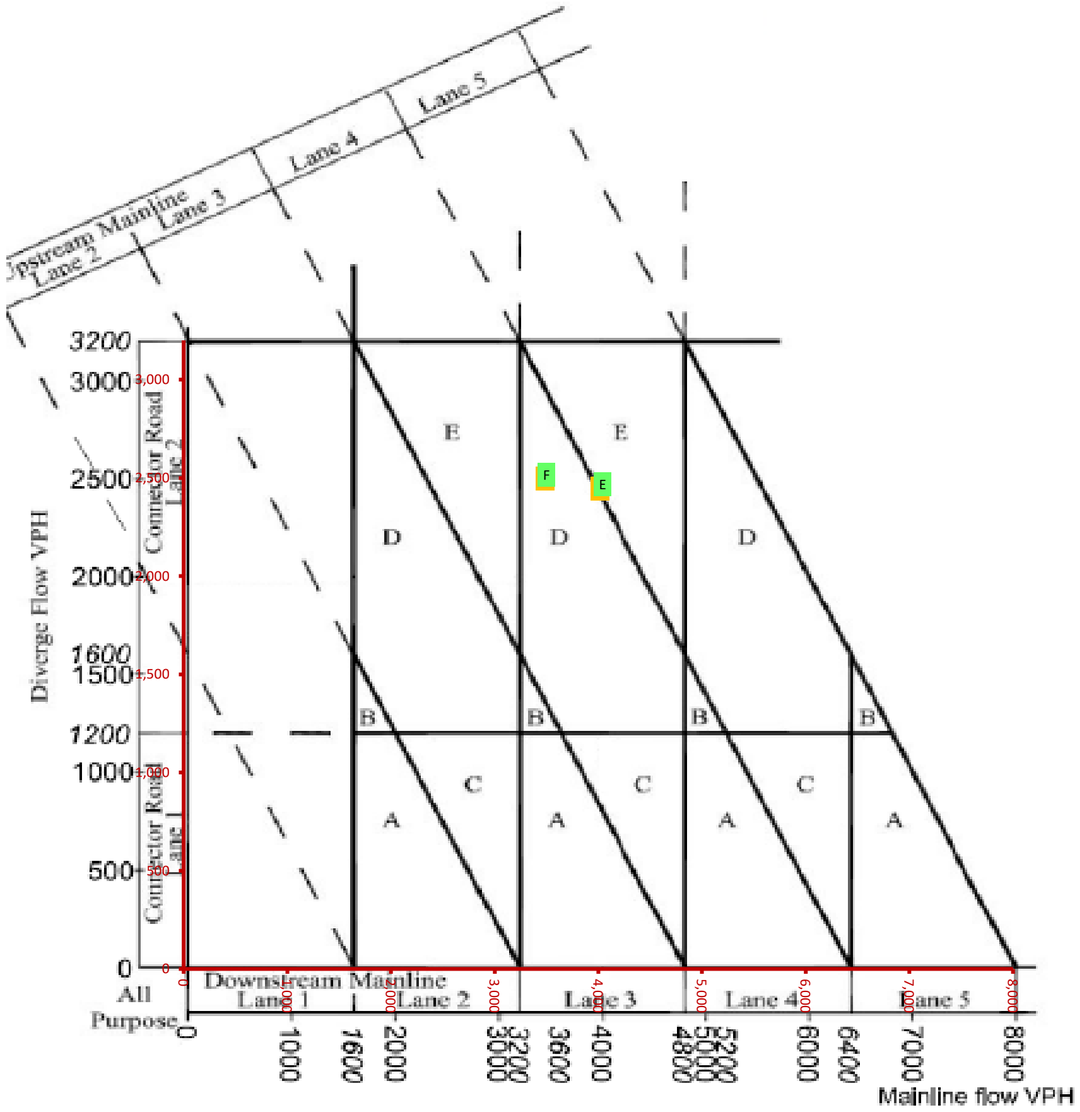
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,222	1,566	4,021	1.05	1,566	1.00
B	Ref no LTC PM	3,828	1,479	3,828	1.00	1,479	1.00
C	Ref with LTC AM			4,349	1.05	1,223	1.00
D	Ref with LTC PM			3,854	1.00	1,455	1.00
E	LP Scenario no LTC AM	4,228	1,571	4,026	1.05	1,571	1.00
F	LP Scenario no LTC PM	3,797	1,493	3,797	1.00	1,493	1.00
G	LP Scenario with LTC AM			4,412	1.05	1,174	1.00
H	LP Scenario with LTC PM			3,844	1.00	1,472	1.00

J2 southbound merge - with LTC (ACTUAL)



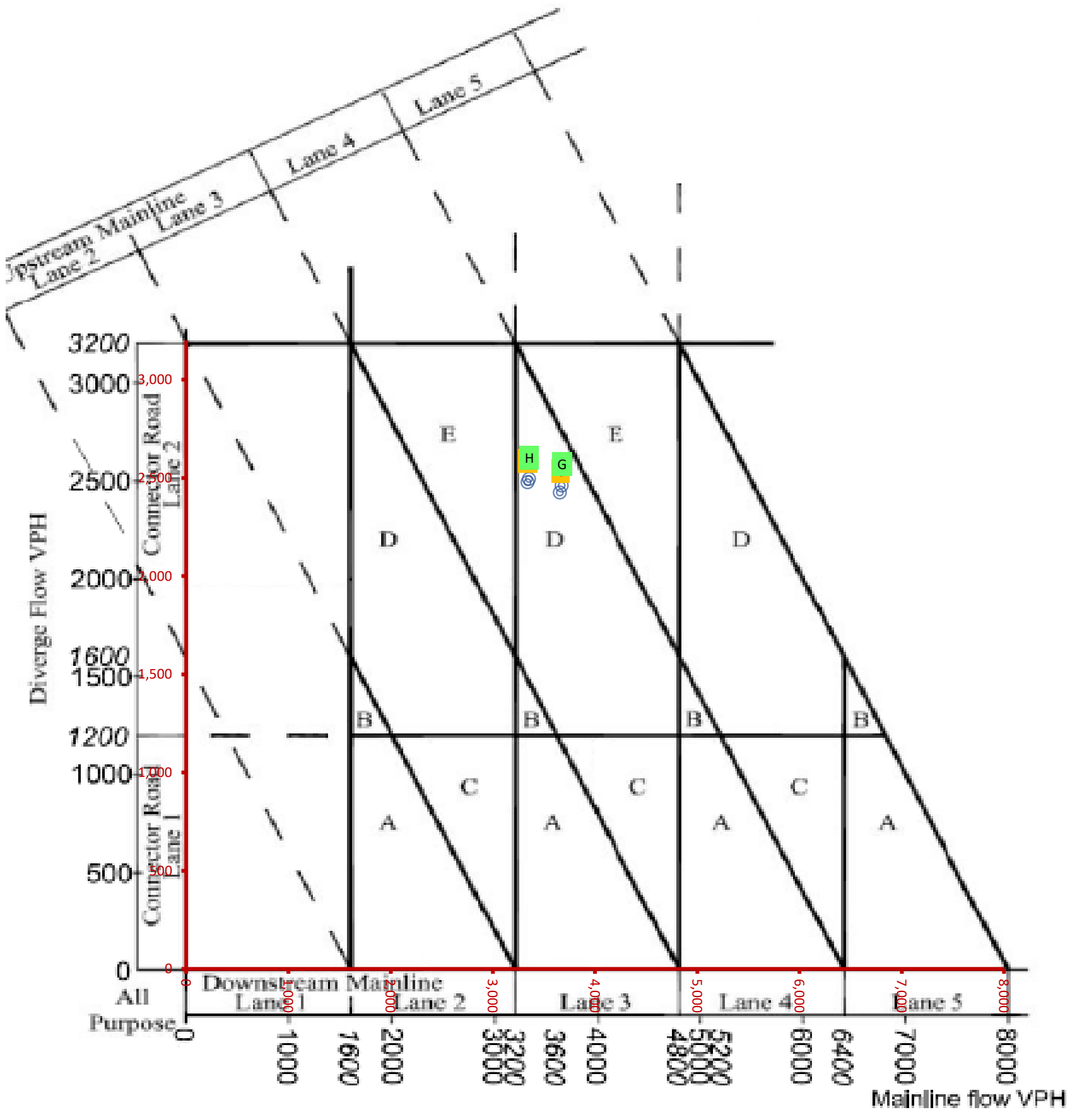
A	Ref no LTC AM			4,021	1.05	1,566	1.00
B	Ref no LTC PM			3,828	1.00	1,479	1.00
C	Ref with LTC AM	4,566	1,223	4,349	1.05	1,223	1.00
D	Ref with LTC PM	3,854	1,455	3,854	1.00	1,455	1.00
E	LP Scenario no LTC AM			4,026	1.05	1,571	1.00
F	LP Scenario no LTC PM			3,797	1.00	1,493	1.00
G	LP Scenario with LTC AM	4,632	1,174	4,412	1.05	1,174	1.00
H	LP Scenario with LTC PM	3,844	1,472	3,844	1.00	1,472	1.00

J2 northbound diverge - no LTC (DEMAND)



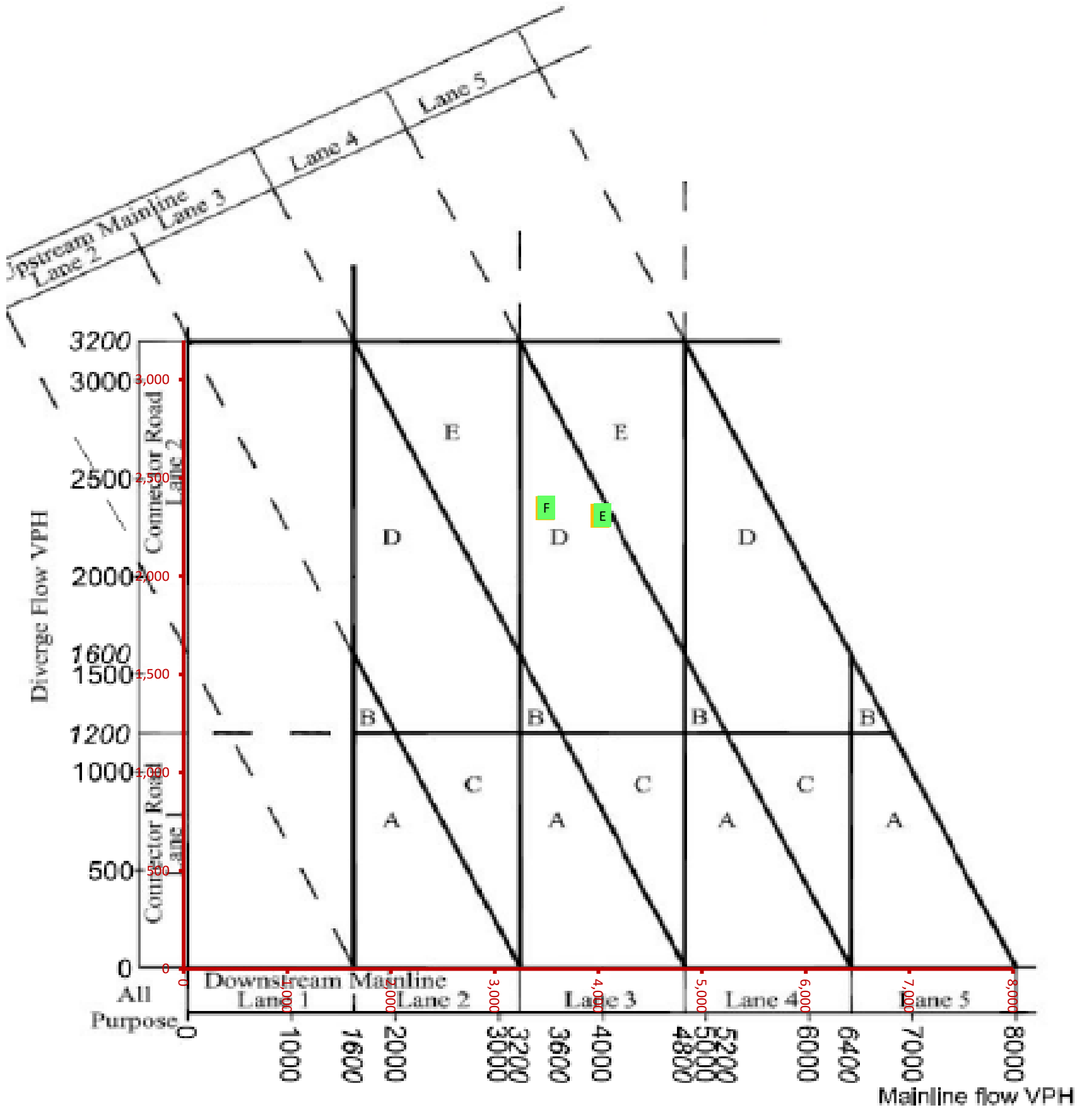
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,013	2,446	4,013	1.00	2,446	1.00
B	Ref no LTC PM	3,487	2,498	3,487	1.00	2,498	1.00
C	Ref with LTC AM			3,660	1.00	2,424	1.00
D	Ref with LTC PM			3,341	1.00	2,475	1.00
E	LP Scenario no LTC AM	4,042	2,467	4,042	1.00	2,467	1.00
F	LP Scenario no LTC PM	3,502	2,516	3,502	1.00	2,516	1.00
G	LP Scenario with LTC AM			3,676	1.00	2,459	1.00
H	LP Scenario with LTC PM			3,355	1.00	2,493	1.00

J2 northbound diverge - with LTC (DEMAND)



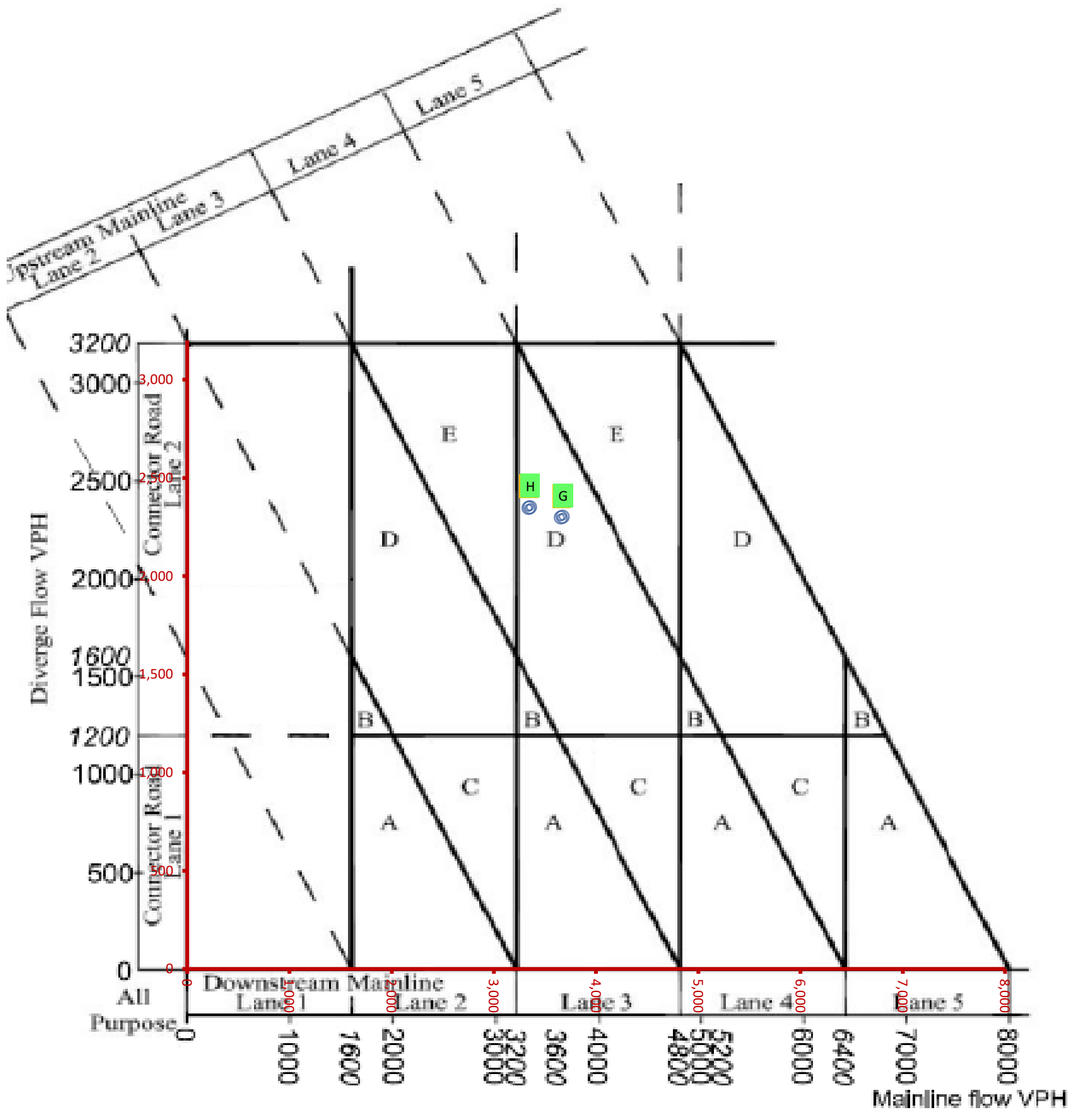
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,013	1.00	2,446	1.00
B	Ref no LTC PM			3,487	1.00	2,498	1.00
C	Ref with LTC AM	3,660	2,424	3,660	1.00	2,424	1.00
D	Ref with LTC PM	3,341	2,475	3,341	1.00	2,475	1.00
E	LP Scenario no LTC AM			4,042	1.00	2,467	1.00
F	LP Scenario no LTC PM			3,502	1.00	2,516	1.00
G	LP Scenario with LTC AM	3,676	2,459	3,676	1.00	2,459	1.00
H	LP Scenario with LTC PM	3,355	2,493	3,355	1.00	2,493	1.00

J2 northbound diverge - no LTC (ACTUAL)



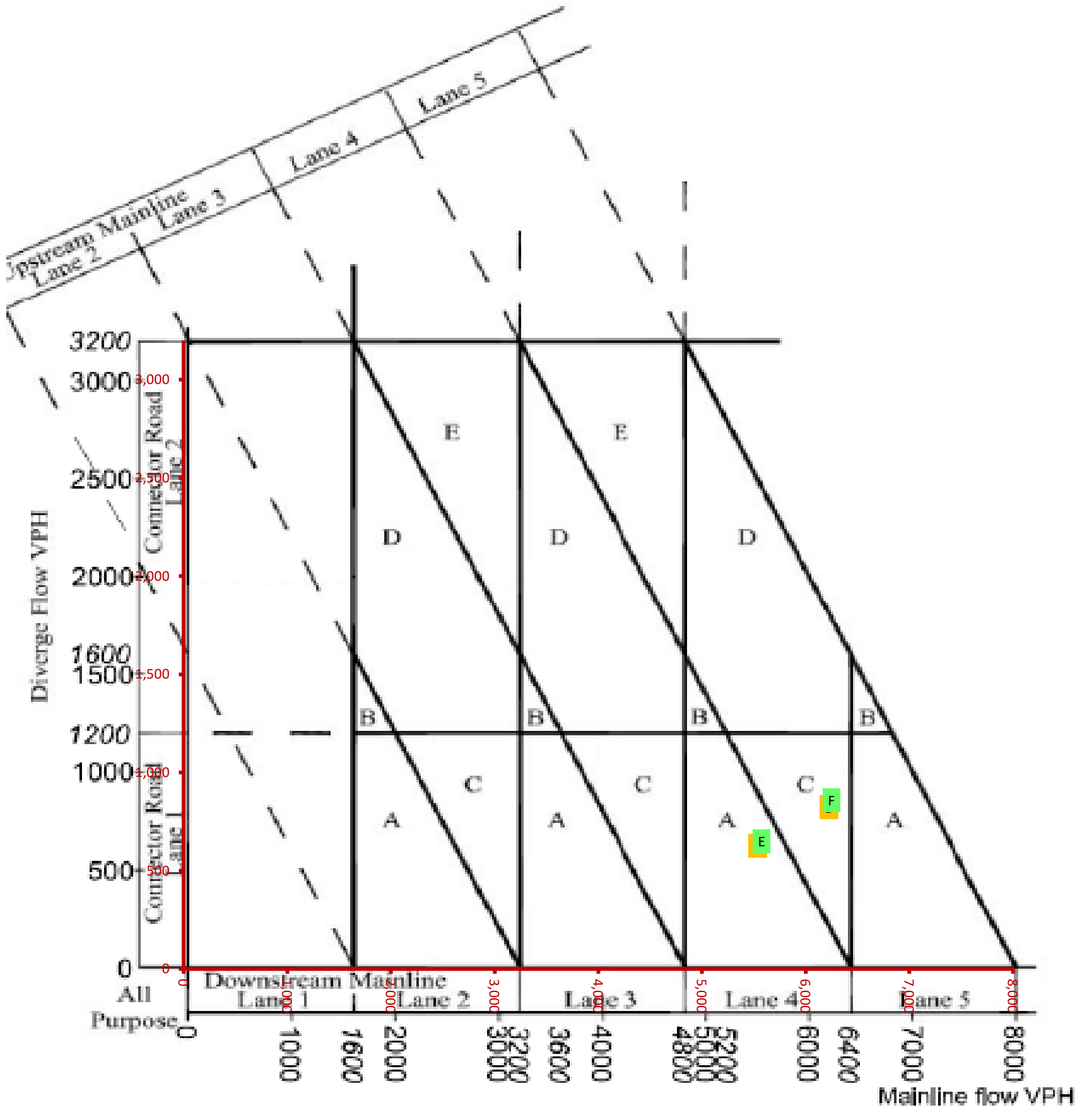
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,013	2,307	4,013	1.00	2,307	1.00
B	Ref no LTC PM	3,487	2,346	3,487	1.00	2,346	1.00
C	Ref with LTC AM			3,660	1.00	2,297	1.00
D	Ref with LTC PM			3,341	1.00	2,345	1.00
E	LP Scenario no LTC AM	4,042	2,309	4,042	1.00	2,309	1.00
F	LP Scenario no LTC PM	3,502	2,350	3,502	1.00	2,350	1.00
G	LP Scenario with LTC AM			3,676	1.00	2,299	1.00
H	LP Scenario with LTC PM			3,355	1.00	2,349	1.00

J2 northbound diverge - with LTC (ACTUAL)



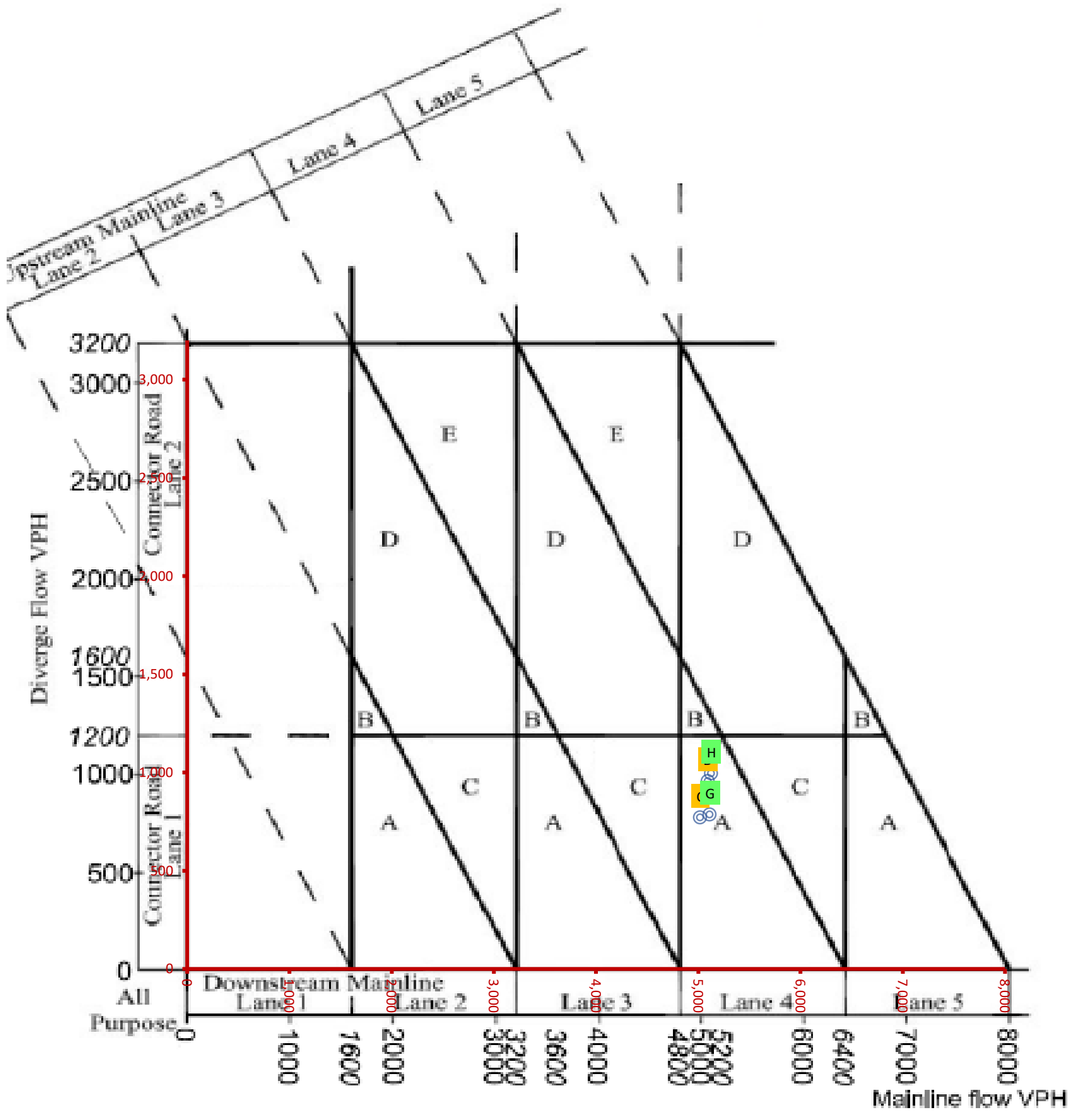
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,013	1.00	2,307	1.00
B	Ref no LTC PM			3,487	1.00	2,346	1.00
C	Ref with LTC AM	3,660	2,297	3,660	1.00	2,297	1.00
D	Ref with LTC PM	3,341	2,345	3,341	1.00	2,345	1.00
E	LP Scenario no LTC AM			4,042	1.00	2,309	1.00
F	LP Scenario no LTC PM			3,502	1.00	2,350	1.00
G	LP Scenario with LTC AM	3,676	2,299	3,676	1.00	2,299	1.00
H	LP Scenario with LTC PM	3,355	2,349	3,355	1.00	2,349	1.00

J2 southbound diverge - no LTC (DEMAND)



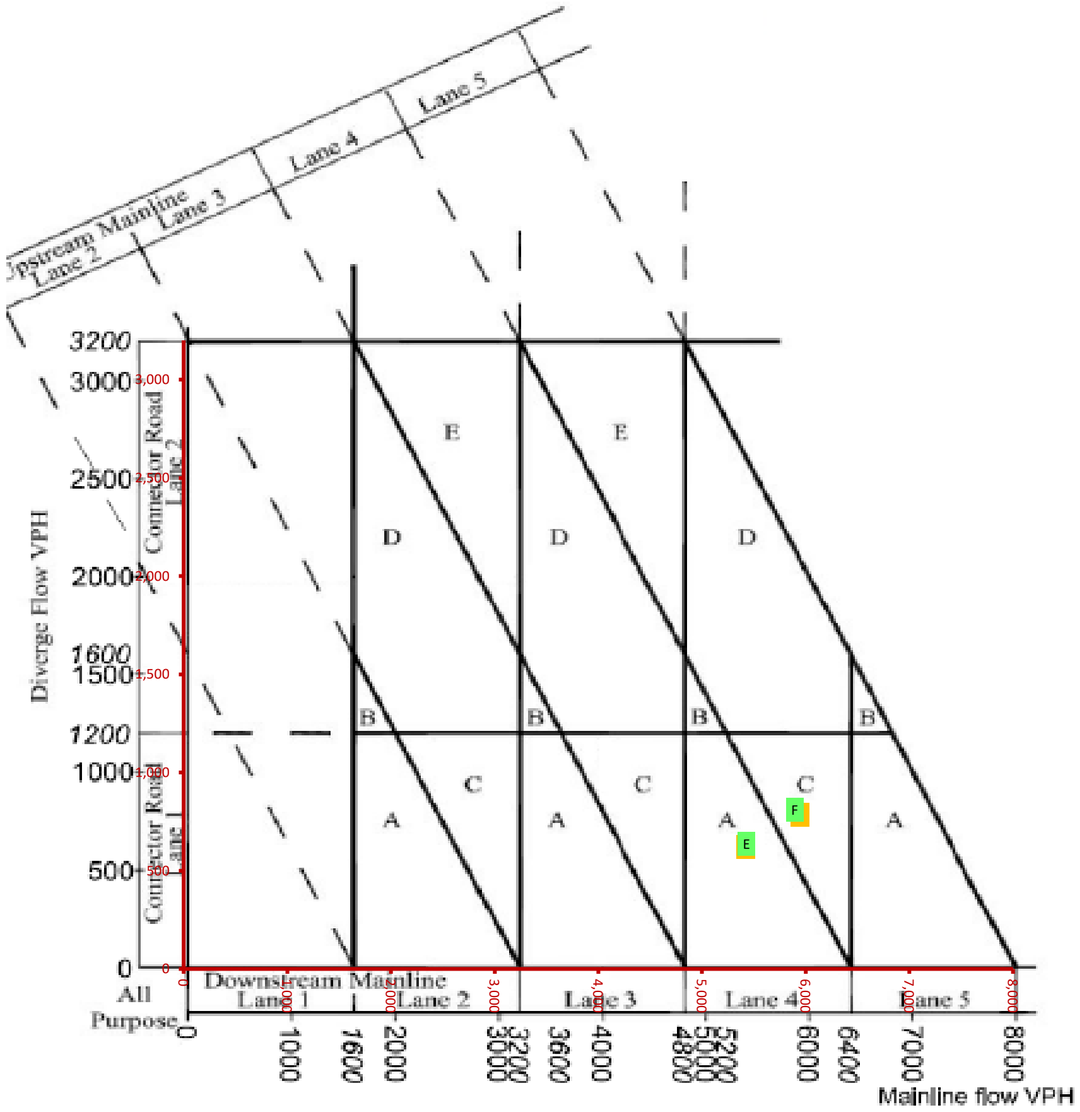
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,538	629	5,538	1.00	629	1.00
B	Ref no LTC PM	6,224	822	6,224	1.00	822	1.00
C	Ref with LTC AM			5,019	1.00	769	1.00
D	Ref with LTC PM			5,093	1.00	955	1.00
E	LP Scenario no LTC AM	5,575	651	5,575	1.00	651	1.00
F	LP Scenario no LTC PM	6,251	860	6,251	1.00	860	1.00
G	LP Scenario with LTC AM			5,113	1.00	785	1.00
H	LP Scenario with LTC PM			5,127	1.00	993	1.00

J2 southbound diverge - with LTC (DEMAND)



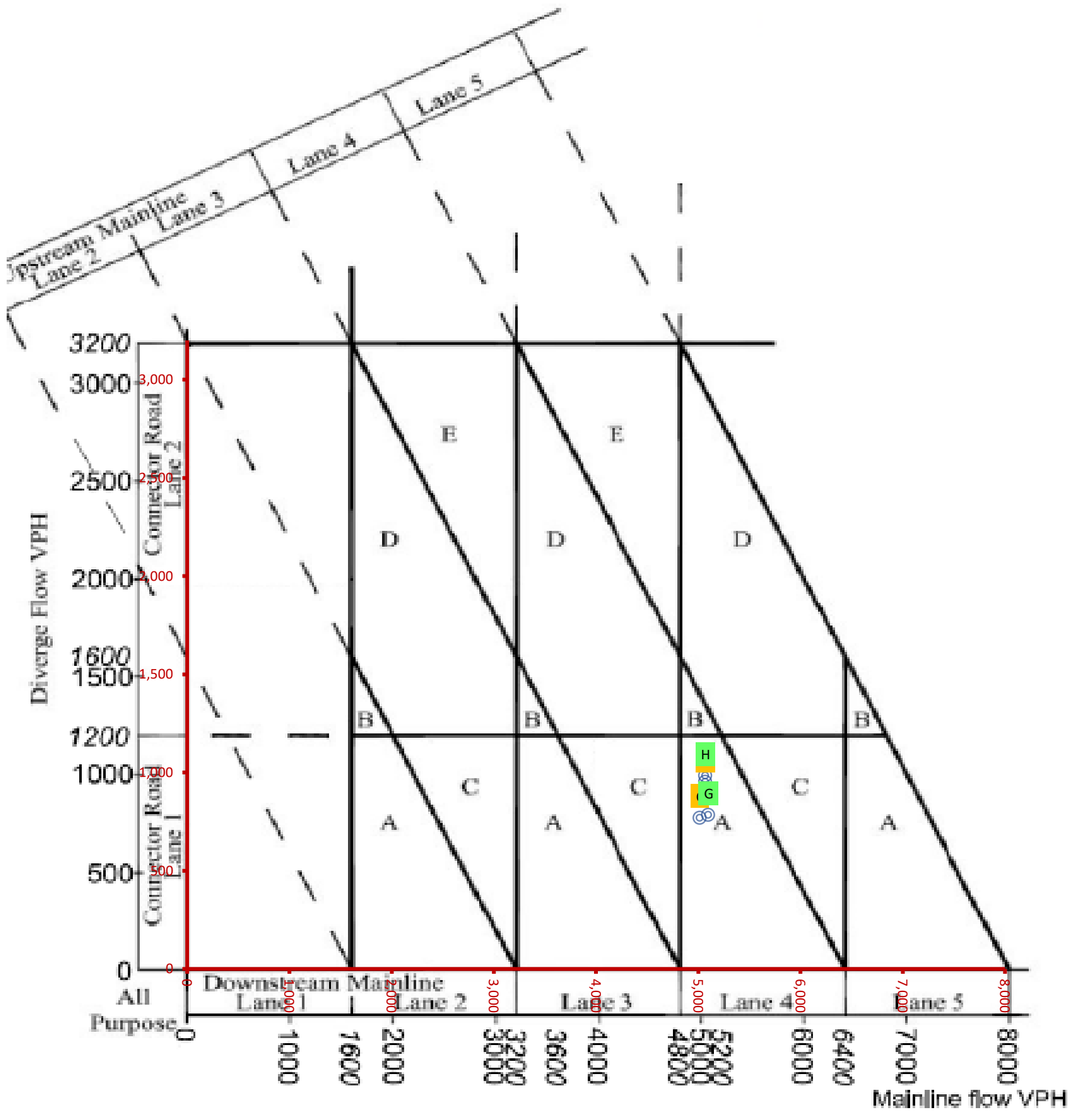
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,538	1.00	629	1.00
B	Ref no LTC PM			6,224	1.00	822	1.00
C	Ref with LTC AM	5,019	769	5,019	1.00	769	1.00
D	Ref with LTC PM	5,093	955	5,093	1.00	955	1.00
E	LP Scenario no LTC AM			5,575	1.00	651	1.00
F	LP Scenario no LTC PM			6,251	1.00	860	1.00
G	LP Scenario with LTC AM	5,113	785	5,113	1.00	785	1.00
H	LP Scenario with LTC PM	5,127	993	5,127	1.00	993	1.00

J2 southbound diverge - no LTC (ACTUAL)



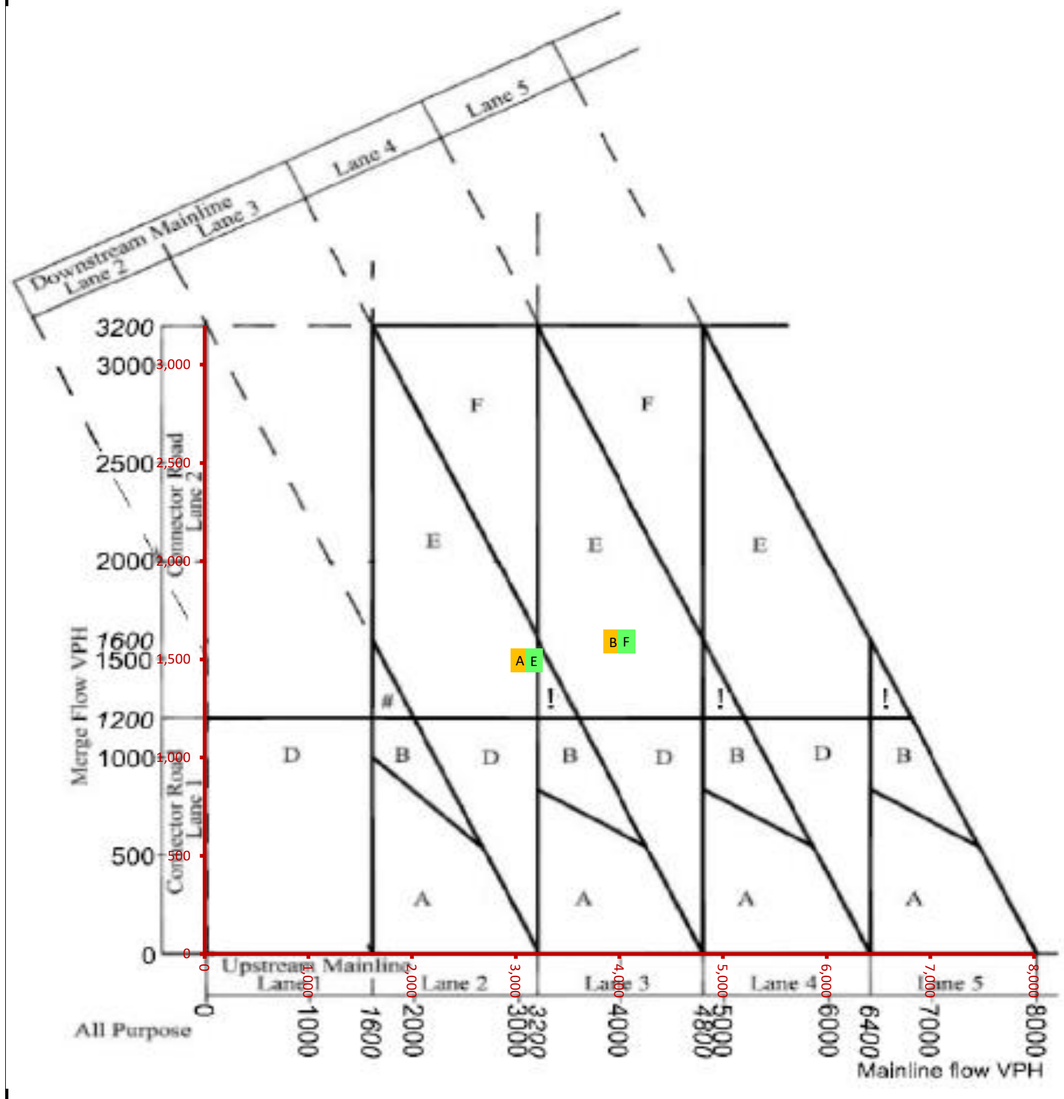
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,421	622	5,421	1.00	622	1.00
B	Ref no LTC PM	5,945	785	5,945	1.00	785	1.00
C	Ref with LTC AM			5,015	1.00	769	1.00
D	Ref with LTC PM			5,070	1.00	951	1.00
E	LP Scenario no LTC AM	5,428	638	5,428	1.00	638	1.00
F	LP Scenario no LTC PM	5,895	811	5,895	1.00	811	1.00
G	LP Scenario with LTC AM			5,100	1.00	783	1.00
H	LP Scenario with LTC PM			5,069	1.00	982	1.00

J2 southbound diverge - with LTC (ACTUAL)



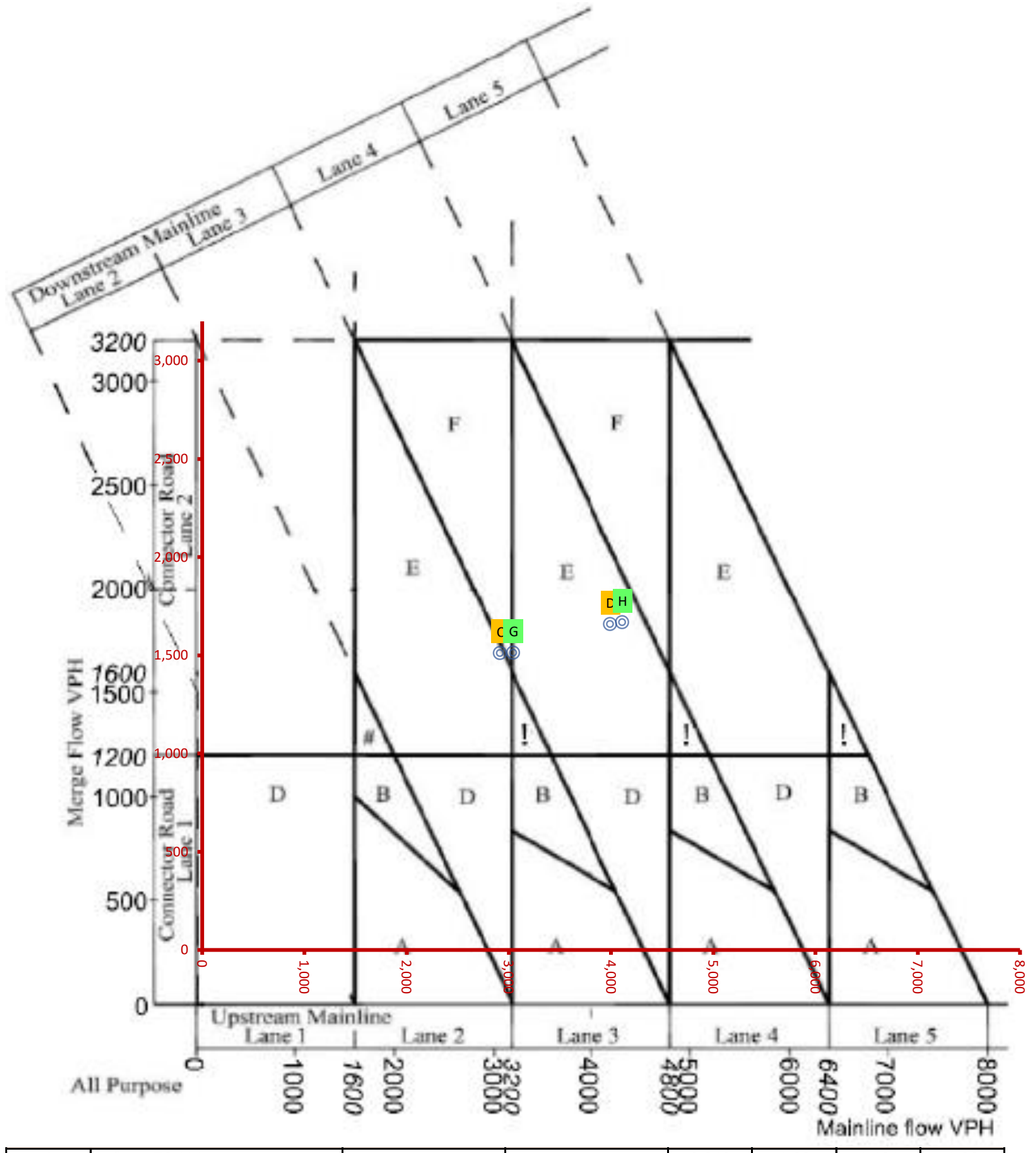
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,421	1.00	622	1.00
B	Ref no LTC PM			5,945	1.00	785	1.00
C	Ref with LTC AM	5,015	769	5,015	1.00	769	1.00
D	Ref with LTC PM	5,070	951	5,070	1.00	951	1.00
E	LP Scenario no LTC AM			5,428	1.00	638	1.00
F	LP Scenario no LTC PM			5,895	1.00	811	1.00
G	LP Scenario with LTC AM	5,100	783	5,100	1.00	783	1.00
H	LP Scenario with LTC PM	5,069	982	5,069	1.00	982	1.00

J2 eastbound merge - no LTC (DEMAND)



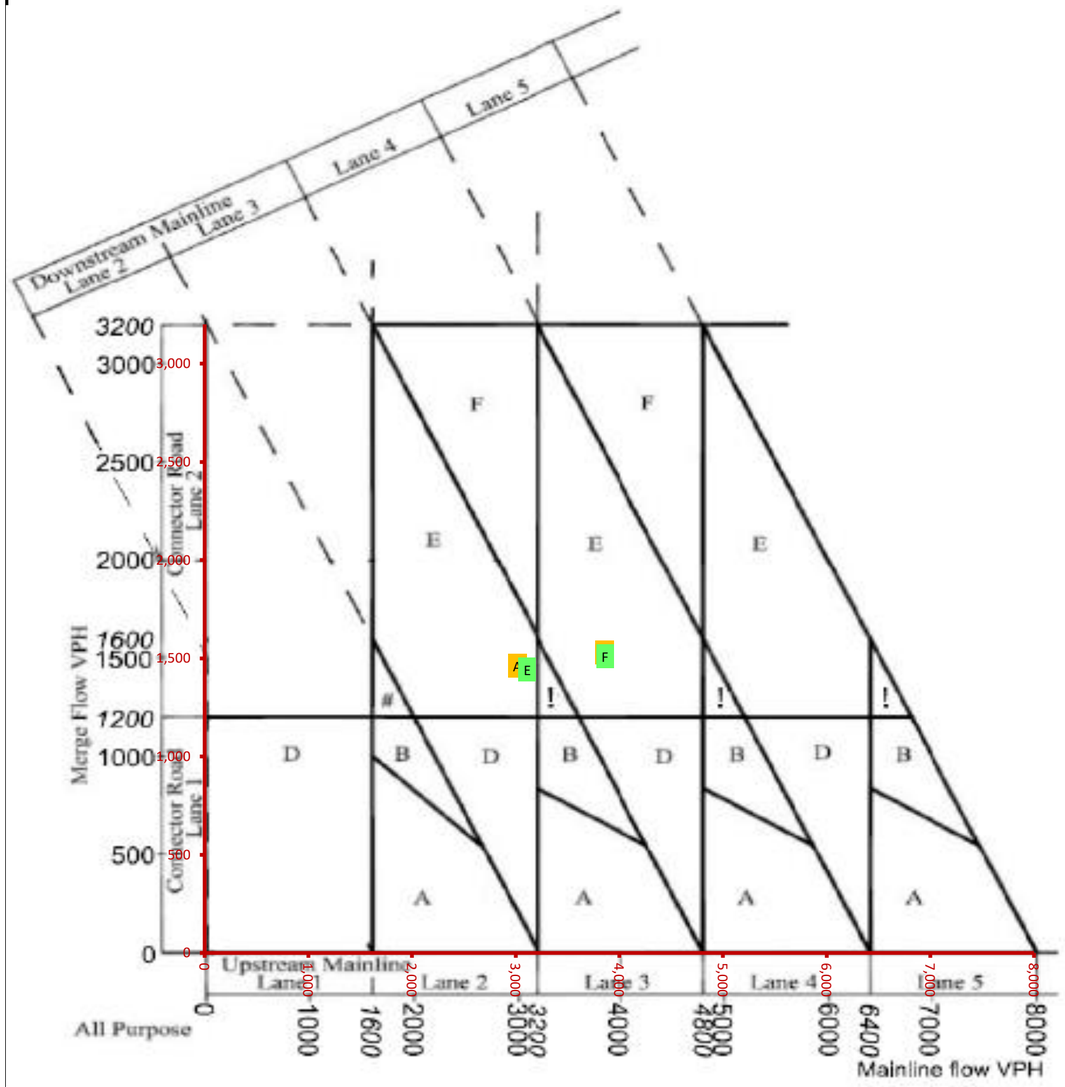
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	3,042	1,494	3,042	1.00	1,494	1.00
B	Ref no LTC PM	3,939	1,590	3,939	1.00	1,590	1.00
C	Ref with LTC AM			2,916	1.00	1,511	1.00
D	Ref with LTC PM			3,993	1.00	1,657	1.00
E	LP Scenario no LTC AM	3,176	1,494	3,176	1.00	1,494	1.00
F	LP Scenario no LTC PM	4,068	1,592	4,068	1.00	1,592	1.00
G	LP Scenario with LTC AM			3,044	1.00	1,512	1.00
H	LP Scenario with LTC PM			4,111	1.00	1,667	1.00

J2 eastbound merge - with LTC (DEMAND)



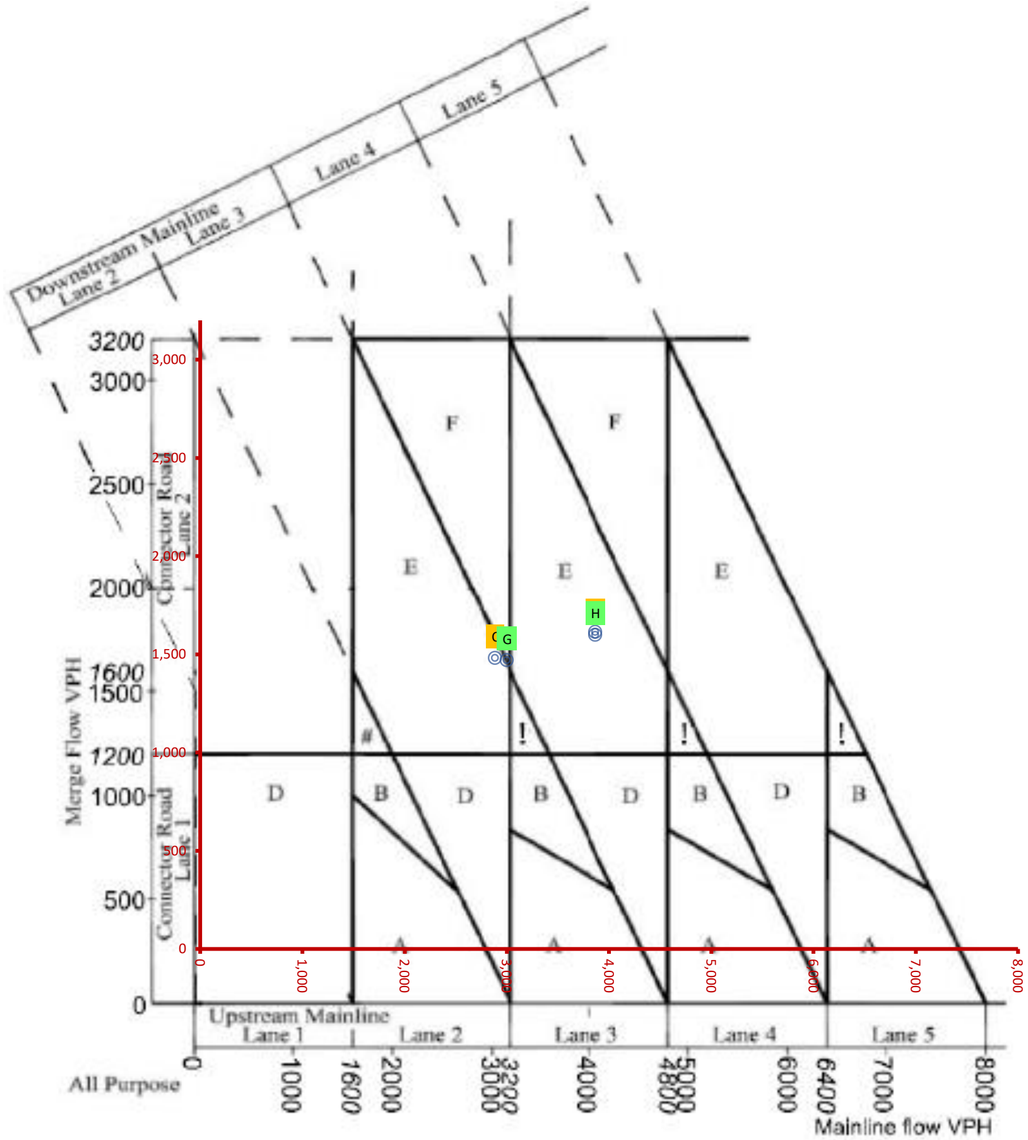
A	Ref no LTC AM			3,042	1.00	1,494	1.00
B	Ref no LTC PM			3,939	1.00	1,590	1.00
C	Ref with LTC AM	2,916	1,511	2,916	1.00	1,511	1.00
D	Ref with LTC PM	3,993	1,657	3,993	1.00	1,657	1.00
E	LP Scenario no LTC AM			3,176	1.00	1,494	1.00
F	LP Scenario no LTC PM			4,068	1.00	1,592	1.00
G	LP Scenario with LTC AM	3,044	1,512	3,044	1.00	1,512	1.00
H	LP Scenario with LTC PM	4,111	1,667	4,111	1.00	1,667	1.00

J2 eastbound merge - no LTC (ACTUAL)



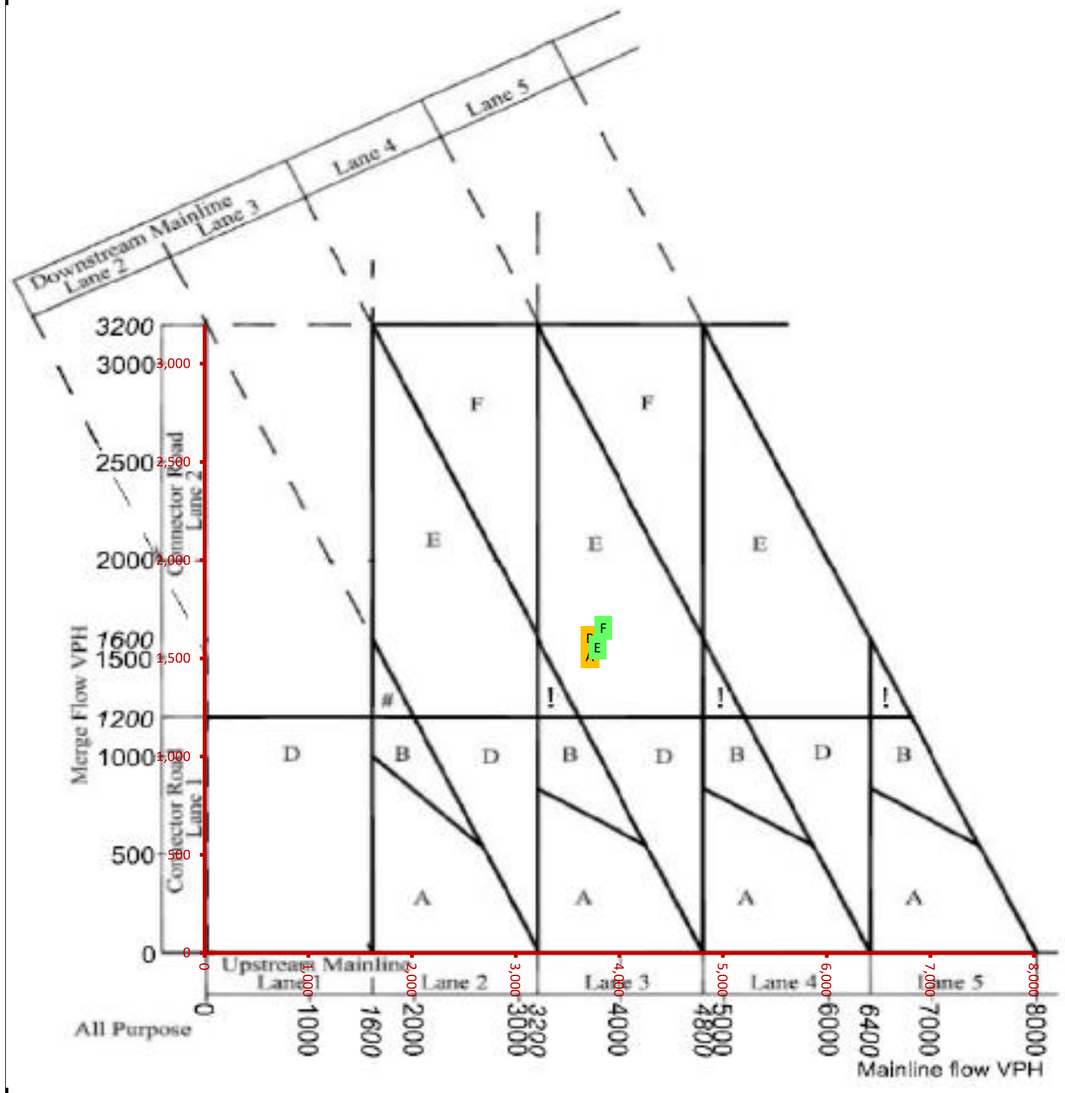
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	3,015	1,461	3,015	1.00	1,461	1.00
B	Ref no LTC PM	3,857	1,531	3,857	1.00	1,531	1.00
C	Ref with LTC AM			2,887	1.00	1,481	1.00
D	Ref with LTC PM			3,868	1.00	1,612	1.00
E	LP Scenario no LTC AM	3,112	1,442	3,112	1.00	1,442	1.00
F	LP Scenario no LTC PM	3,863	1,510	3,863	1.00	1,510	1.00
G	LP Scenario with LTC AM			3,001	1.00	1,469	1.00
H	LP Scenario with LTC PM			3,865	1.00	1,598	1.00

J2 eastbound merge - with LTC (ACTUAL)



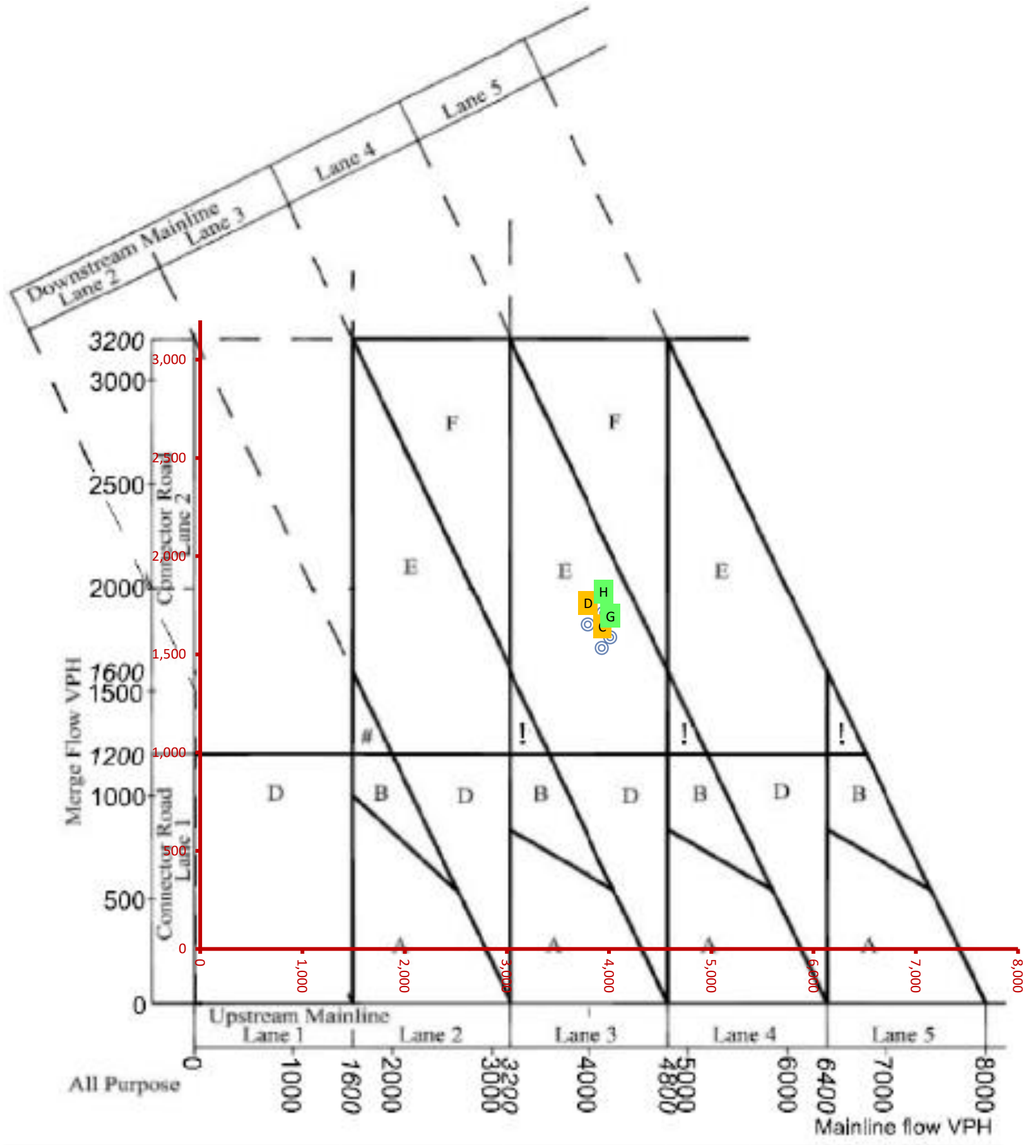
A	Ref no LTC AM			3,015	1.00	1,461	1.00
B	Ref no LTC PM			3,857	1.00	1,531	1.00
C	Ref with LTC AM	2,887	1,481	2,887	1.00	1,481	1.00
D	Ref with LTC PM	3,868	1,612	3,868	1.00	1,612	1.00
E	LP Scenario no LTC AM			3,112	1.00	1,442	1.00
F	LP Scenario no LTC PM			3,863	1.00	1,510	1.00
G	LP Scenario with LTC AM	3,001	1,469	3,001	1.00	1,469	1.00
H	LP Scenario with LTC PM	3,865	1,598	3,865	1.00	1,598	1.00

J2 westbound merge - no LTC (DEMAND)



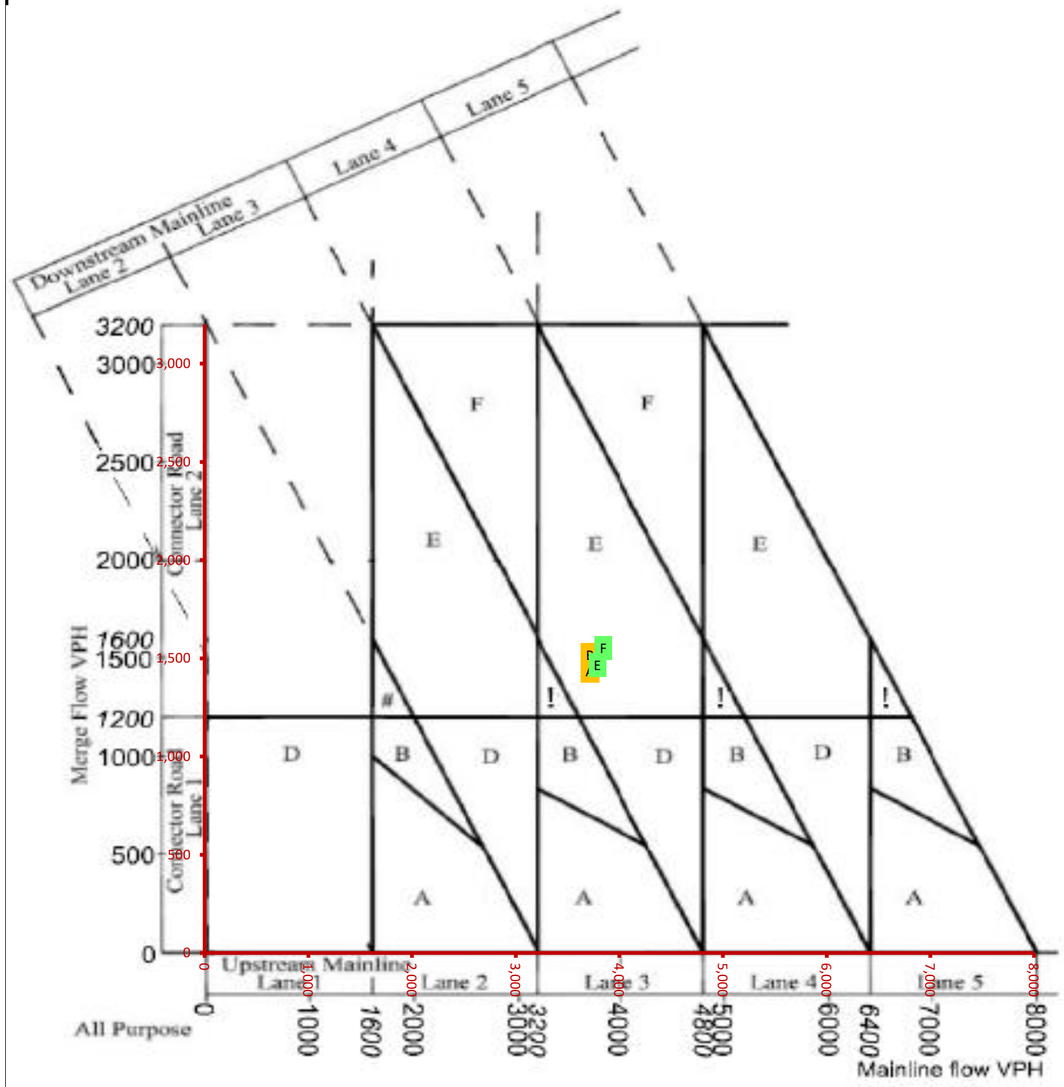
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	3,715	1,510	3,715	1.00	1,510	1.00
B	Ref no LTC PM	3,716	1,605	3,716	1.00	1,605	1.00
C	Ref with LTC AM			3,931	1.00	1,530	1.00
D	Ref with LTC PM			3,794	1.00	1,650	1.00
E	LP Scenario no LTC AM	3,788	1,556	3,788	1.00	1,556	1.00
F	LP Scenario no LTC PM	3,847	1,656	3,847	1.00	1,656	1.00
G	LP Scenario with LTC AM			4,013	1.00	1,584	1.00
H	LP Scenario with LTC PM			3,945	1.00	1,708	1.00

J2 westbound merge - with LTC (DEMAND)



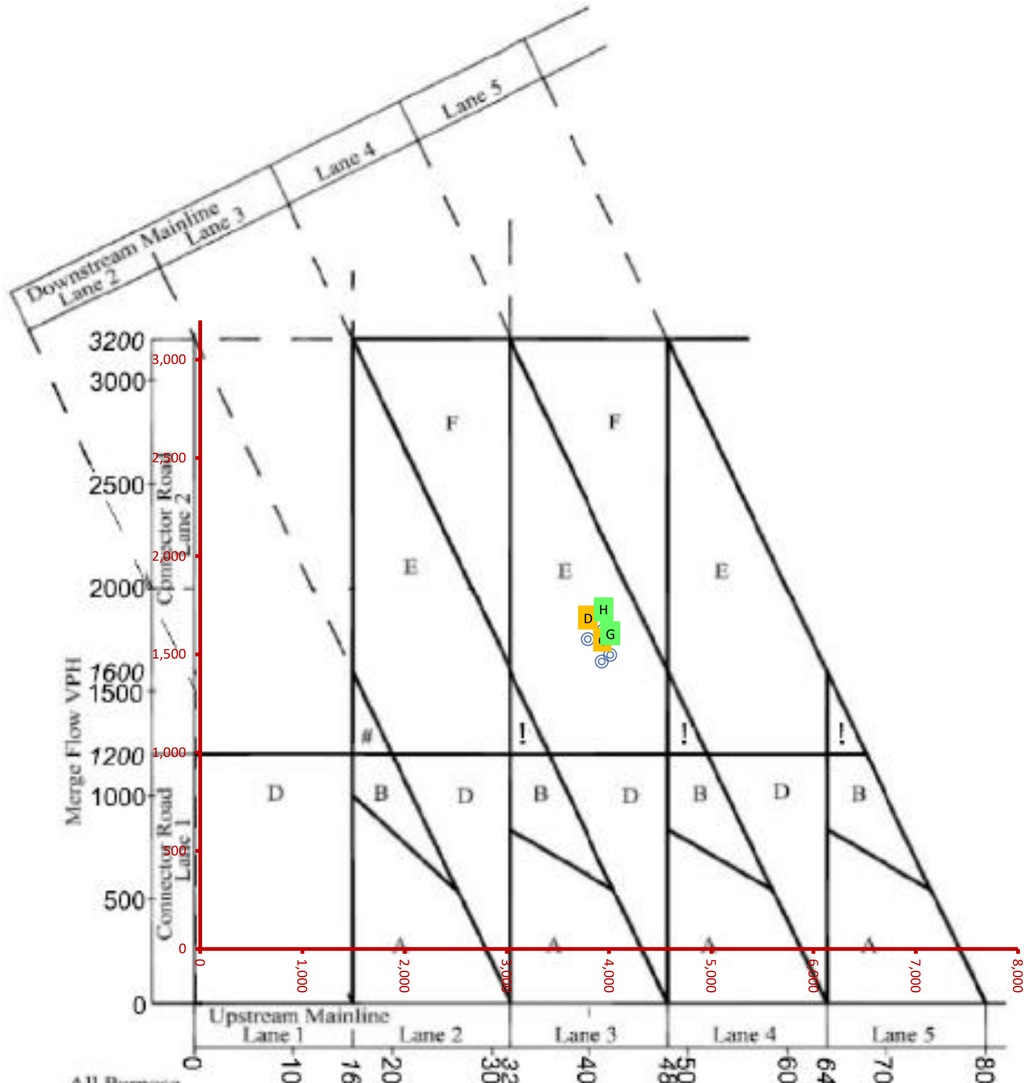
A	Ref no LTC AM			3,715	1.00	1,510	1.00
B	Ref no LTC PM			3,716	1.00	1,605	1.00
C	Ref with LTC AM	3,931	1,530	3,931	1.00	1,530	1.00
D	Ref with LTC PM	3,794	1,650	3,794	1.00	1,650	1.00
E	LP Scenario no LTC AM			3,788	1.00	1,556	1.00
F	LP Scenario no LTC PM			3,847	1.00	1,656	1.00
G	LP Scenario with LTC AM	4,013	1,584	4,013	1.00	1,584	1.00
H	LP Scenario with LTC PM	3,945	1,708	3,945	1.00	1,708	1.00

J2 westbound merge - no LTC (ACTUAL)



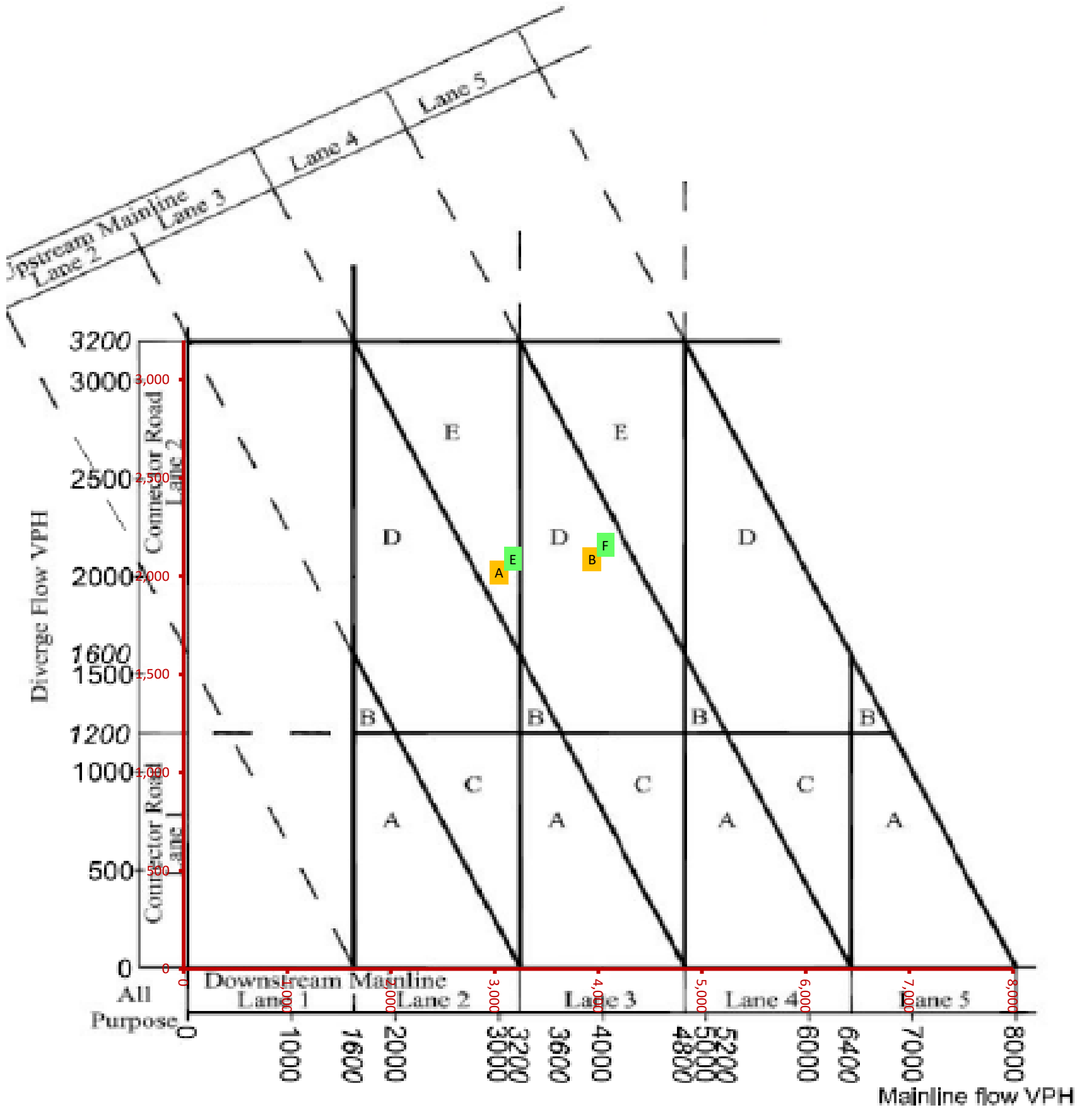
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	3,715	1,435	3,715	1.00	1,435	1.00
B	Ref no LTC PM	3,716	1,516	3,716	1.00	1,516	1.00
C	Ref with LTC AM			3,931	1.00	1,462	1.00
D	Ref with LTC PM			3,794	1.00	1,575	1.00
E	LP Scenario no LTC AM	3,788	1,465	3,788	1.00	1,465	1.00
F	LP Scenario no LTC PM	3,847	1,552	3,847	1.00	1,552	1.00
G	LP Scenario with LTC AM			4,013	1.00	1,495	1.00
H	LP Scenario with LTC PM			3,945	1.00	1,618	1.00

J2 westbound merge - with LTC (ACTUAL)



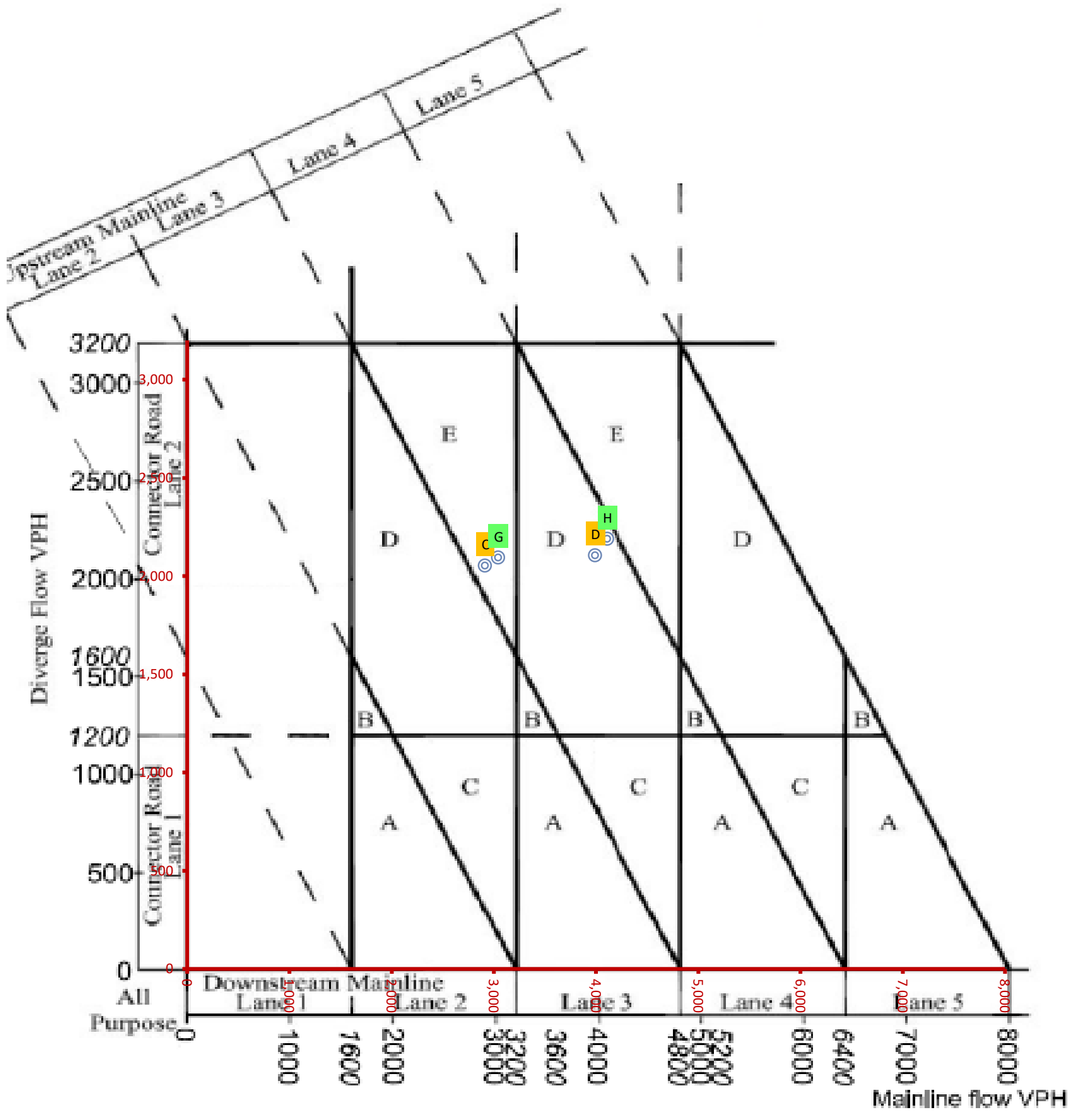
A	Ref no LTC AM			3,715	1.00	1,435	1.00
B	Ref no LTC PM			3,716	1.00	1,516	1.00
C	Ref with LTC AM	3,931	1,462	3,931	1.00	1,462	1.00
D	Ref with LTC PM	3,794	1,575	3,794	1.00	1,575	1.00
E	LP Scenario no LTC AM			3,788	1.00	1,465	1.00
F	LP Scenario no LTC PM			3,847	1.00	1,552	1.00
G	LP Scenario with LTC AM	4,013	1,495	4,013	1.00	1,495	1.00
H	LP Scenario with LTC PM	3,945	1,618	3,945	1.00	1,618	1.00

J2 eastbound diverge - no LTC (DEMAND)



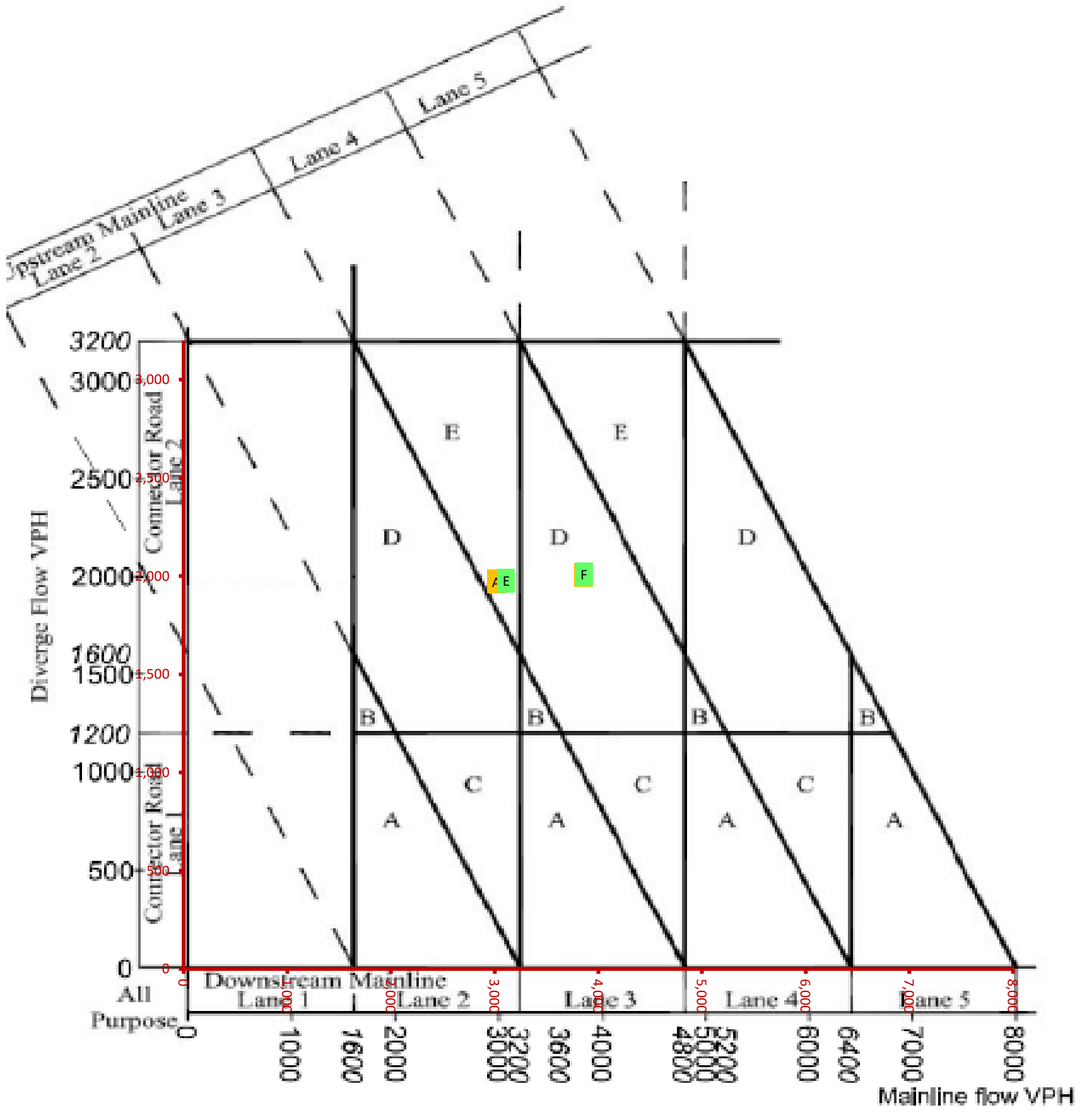
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	3,042	2,019	3,042	1.00	2,019	1.00
B	Ref no LTC PM	3,939	2,086	3,939	1.00	2,086	1.00
C	Ref with LTC AM			2,916	1.00	2,051	1.00
D	Ref with LTC PM			3,993	1.00	2,104	1.00
E	LP Scenario no LTC AM	3,176	2,087	3,176	1.00	2,087	1.00
F	LP Scenario no LTC PM	4,068	2,158	4,068	1.00	2,158	1.00
G	LP Scenario with LTC AM			3,044	1.00	2,092	1.00
H	LP Scenario with LTC PM			4,111	1.00	2,188	1.00

J2 eastbound diverge - with LTC (DEMAND)



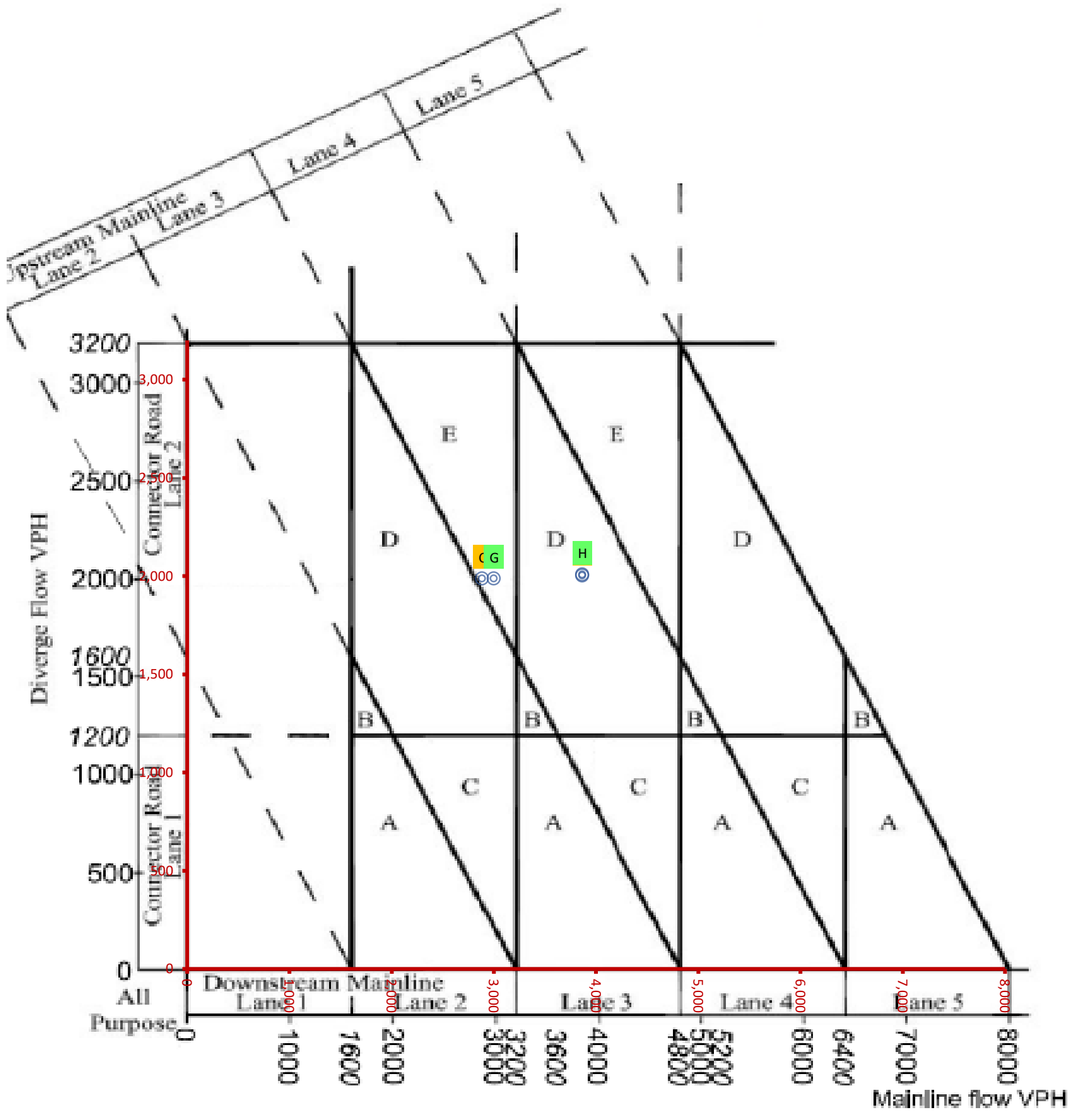
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			3,042	1.00	2,019	1.00
B	Ref no LTC PM			3,939	1.00	2,086	1.00
C	Ref with LTC AM	2,916	2,051	2,916	1.00	2,051	1.00
D	Ref with LTC PM	3,993	2,104	3,993	1.00	2,104	1.00
E	LP Scenario no LTC AM			3,176	1.00	2,087	1.00
F	LP Scenario no LTC PM			4,068	1.00	2,158	1.00
G	LP Scenario with LTC AM	3,044	2,092	3,044	1.00	2,092	1.00
H	LP Scenario with LTC PM	4,111	2,188	4,111	1.00	2,188	1.00

J2 eastbound diverge - no LTC (ACTUAL)



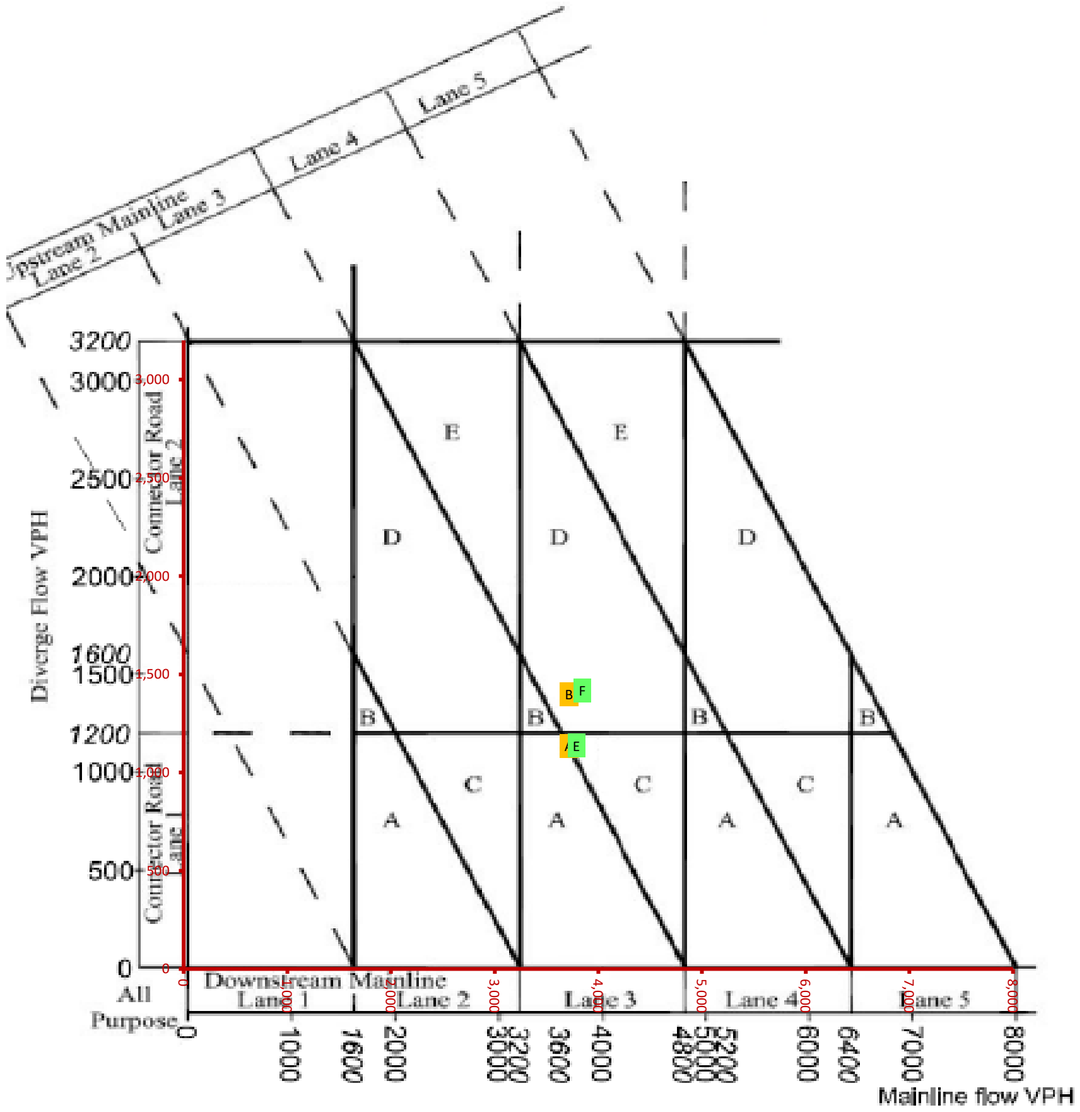
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	3,015	1,972	3,015	1.00	1,972	1.00
B	Ref no LTC PM	3,857	2,004	3,857	1.00	2,004	1.00
C	Ref with LTC AM			2,887	1.00	1,986	1.00
D	Ref with LTC PM			3,868	1.00	2,002	1.00
E	LP Scenario no LTC AM	3,112	1,977	3,112	1.00	1,977	1.00
F	LP Scenario no LTC PM	3,863	2,008	3,863	1.00	2,008	1.00
G	LP Scenario with LTC AM			3,001	1.00	1,986	1.00
H	LP Scenario with LTC PM			3,865	1.00	2,007	1.00

J2 eastbound diverge - with LTC (ACTUAL)



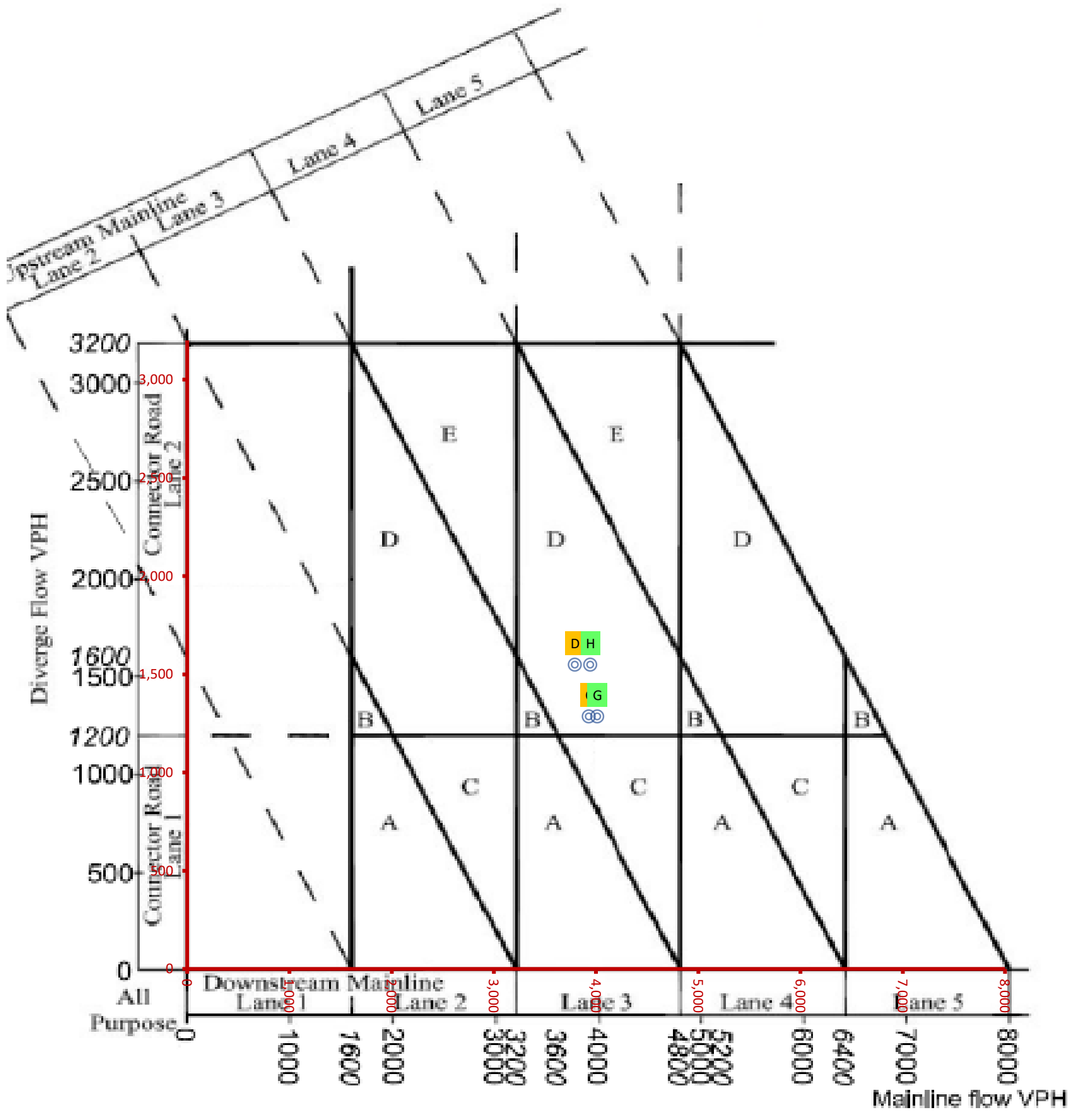
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			3,015	1.00	1,972	1.00
B	Ref no LTC PM			3,857	1.00	2,004	1.00
C	Ref with LTC AM	2,887	1,986	2,887	1.00	1,986	1.00
D	Ref with LTC PM	3,868	2,002	3,868	1.00	2,002	1.00
E	LP Scenario no LTC AM			3,112	1.00	1,977	1.00
F	LP Scenario no LTC PM			3,863	1.00	2,008	1.00
G	LP Scenario with LTC AM	3,001	1,986	3,001	1.00	1,986	1.00
H	LP Scenario with LTC PM	3,865	2,007	3,865	1.00	2,007	1.00

J2 westbound diverge - no LTC (DEMAND)



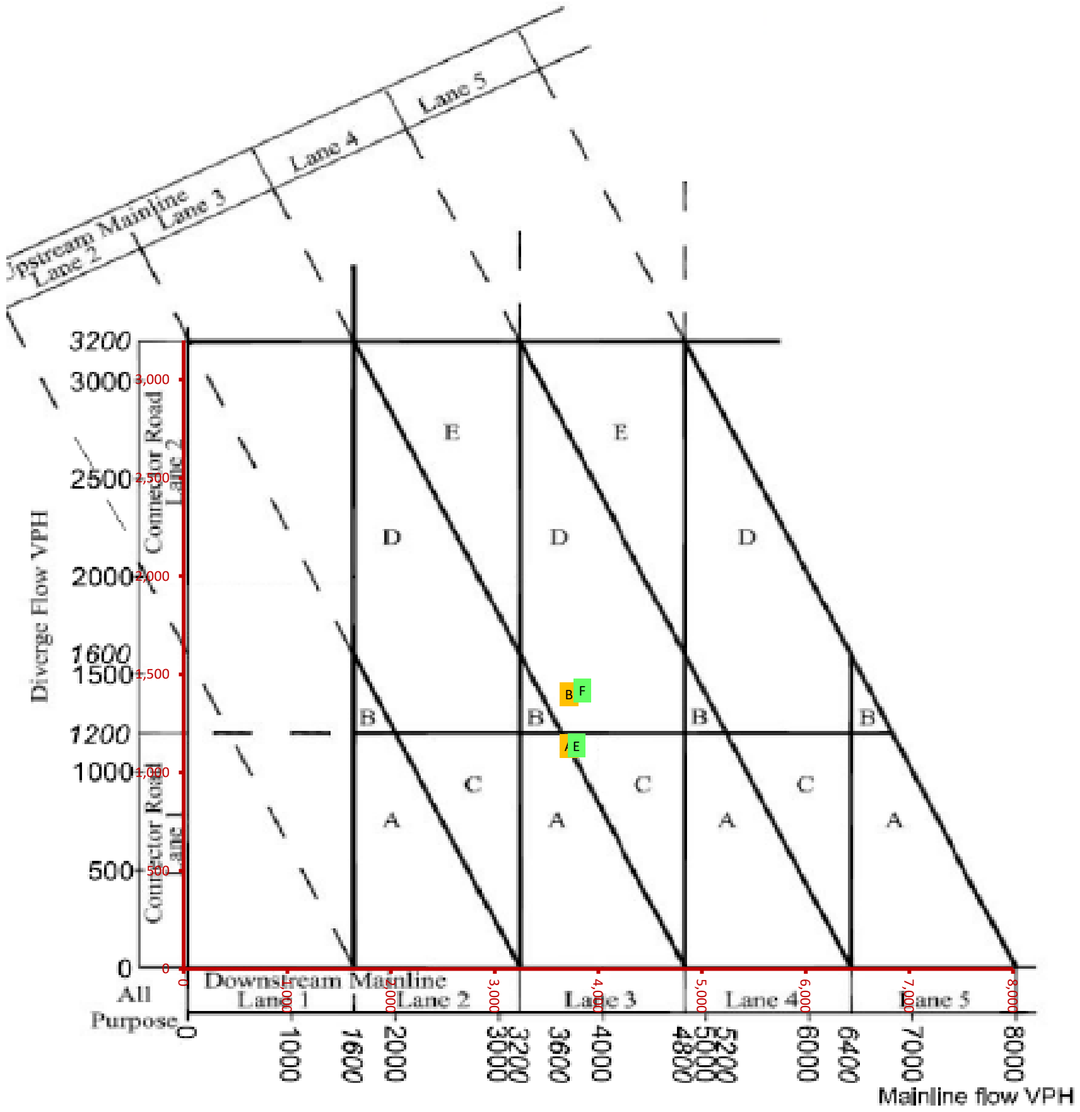
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	3,715	1,135	3,715	1.00	1,135	1.00
B	Ref no LTC PM	3,716	1,398	3,716	1.00	1,398	1.00
C	Ref with LTC AM			3,931	1.00	1,284	1.00
D	Ref with LTC PM			3,794	1.00	1,547	1.00
E	LP Scenario no LTC AM	3,788	1,137	3,788	1.00	1,137	1.00
F	LP Scenario no LTC PM	3,847	1,419	3,847	1.00	1,419	1.00
G	LP Scenario with LTC AM			4,013	1.00	1,285	1.00
H	LP Scenario with LTC PM			3,945	1.00	1,547	1.00

J2 westbound diverge - with LTC (DEMAND)



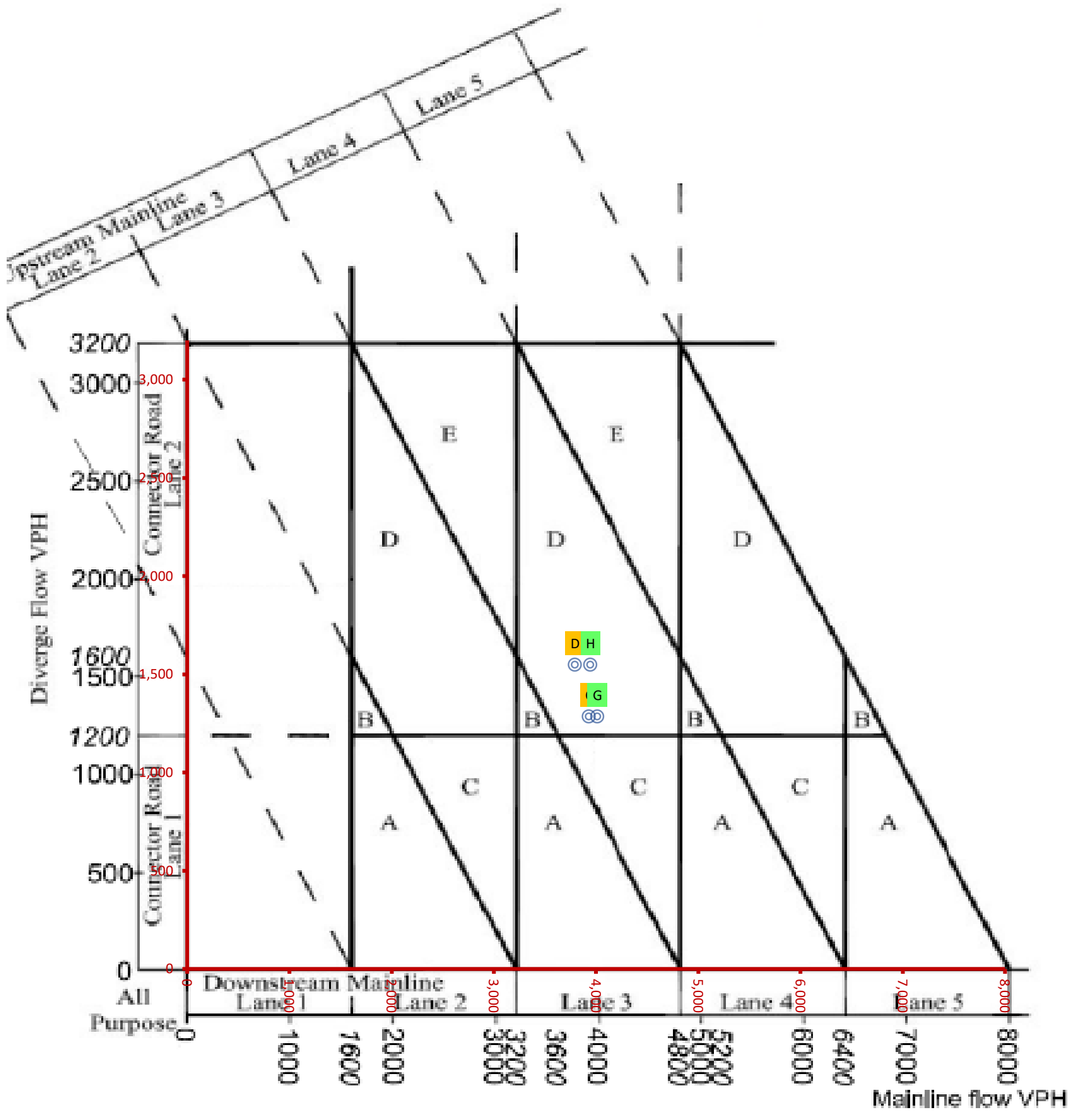
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			3,715	1.00	1,135	1.00
B	Ref no LTC PM			3,716	1.00	1,398	1.00
C	Ref with LTC AM	3,931	1,284	3,931	1.00	1,284	1.00
D	Ref with LTC PM	3,794	1,547	3,794	1.00	1,547	1.00
E	LP Scenario no LTC AM			3,788	1.00	1,137	1.00
F	LP Scenario no LTC PM			3,847	1.00	1,419	1.00
G	LP Scenario with LTC AM	4,013	1,285	4,013	1.00	1,285	1.00
H	LP Scenario with LTC PM	3,945	1,547	3,945	1.00	1,547	1.00

J2 westbound diverge - no LTC (ACTUAL)



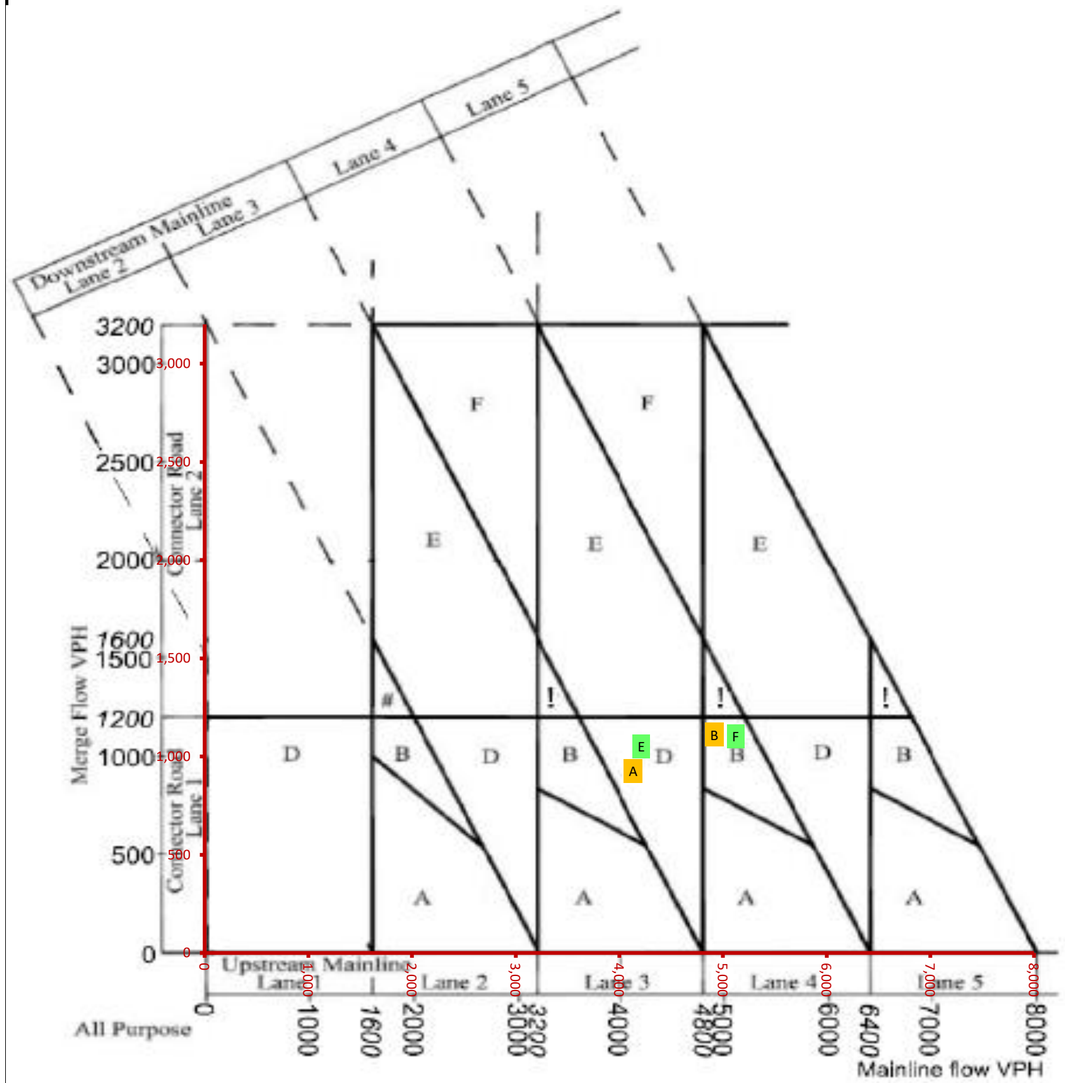
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	3,715	1,135	3,715	1.00	1,135	1.00
B	Ref no LTC PM	3,716	1,398	3,716	1.00	1,398	1.00
C	Ref with LTC AM			3,931	1.00	1,284	1.00
D	Ref with LTC PM			3,794	1.00	1,547	1.00
E	LP Scenario no LTC AM	3,788	1,137	3,788	1.00	1,137	1.00
F	LP Scenario no LTC PM	3,847	1,419	3,847	1.00	1,419	1.00
G	LP Scenario with LTC AM			4,013	1.00	1,285	1.00
H	LP Scenario with LTC PM			3,945	1.00	1,547	1.00

J2 westbound diverge - with LTC (ACTUAL)



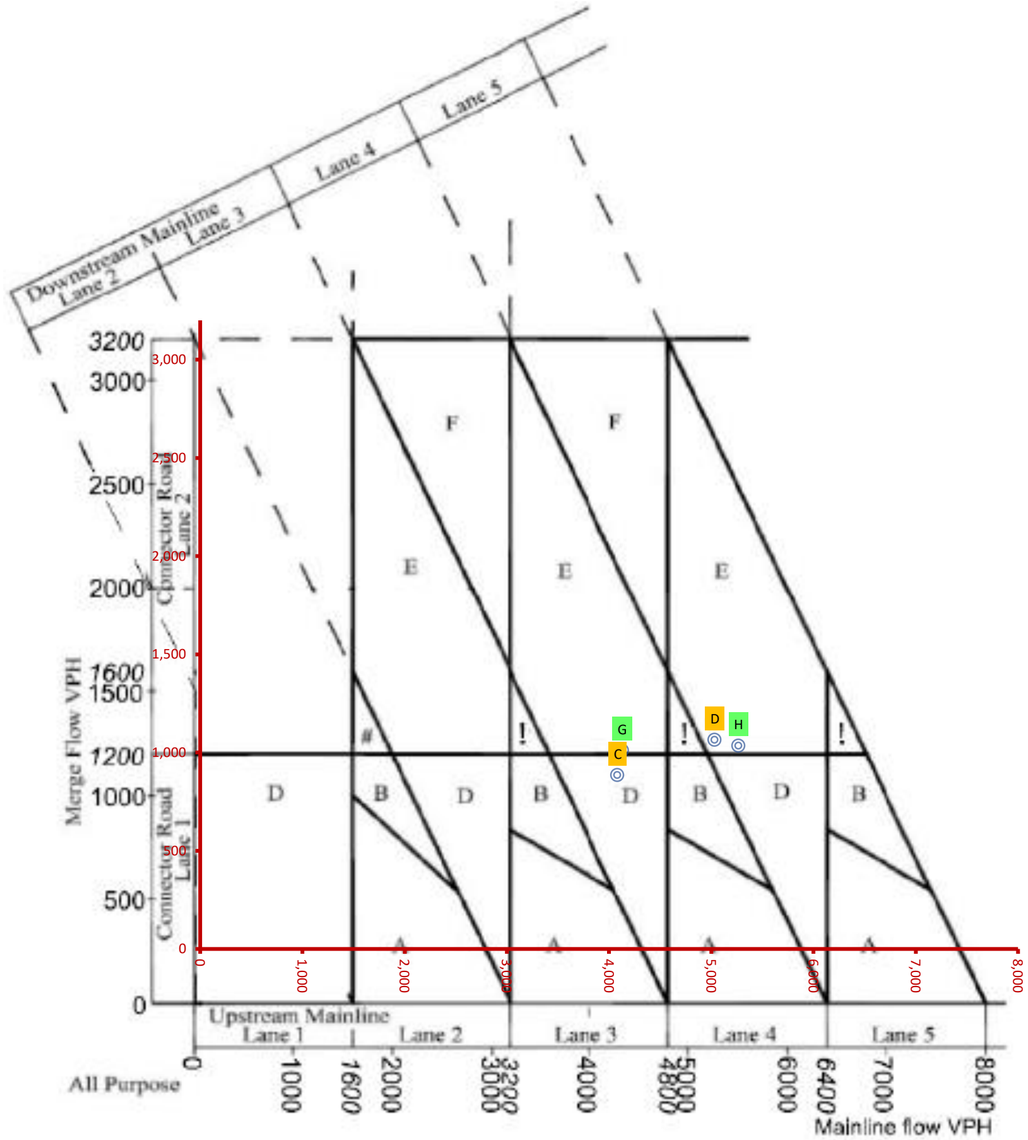
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			3,715	1.00	1,135	1.00
B	Ref no LTC PM			3,716	1.00	1,398	1.00
C	Ref with LTC AM	3,931	1,284	3,931	1.00	1,284	1.00
D	Ref with LTC PM	3,794	1,547	3,794	1.00	1,547	1.00
E	LP Scenario no LTC AM			3,788	1.00	1,137	1.00
F	LP Scenario no LTC PM			3,847	1.00	1,419	1.00
G	LP Scenario with LTC AM	4,013	1,285	4,013	1.00	1,285	1.00
H	LP Scenario with LTC PM	3,945	1,547	3,945	1.00	1,547	1.00

A2 / A2018 eastbound merge - no LTC (DEMAND)



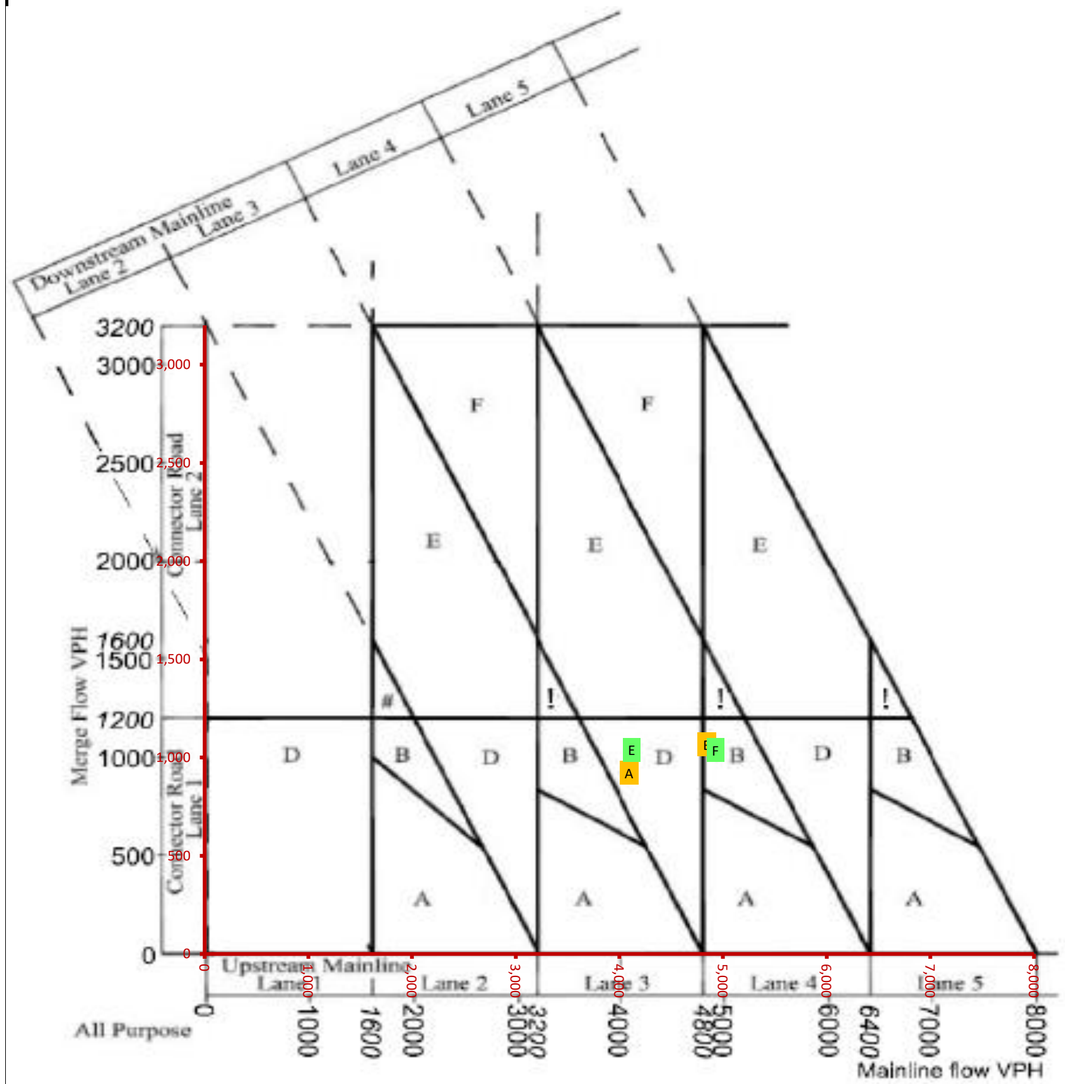
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,133	928	4,133	1.00	928	1.00
B	Ref no LTC PM	4,914	1,112	4,914	1.00	1,112	1.00
C	Ref with LTC AM			4,084	1.00	883	1.00
D	Ref with LTC PM			5,034	1.00	1,064	1.00
E	LP Scenario no LTC AM	4,212	1,052	4,212	1.00	1,052	1.00
F	LP Scenario no LTC PM	5,123	1,104	5,123	1.00	1,104	1.00
G	LP Scenario with LTC AM			4,127	1.00	1,009	1.00
H	LP Scenario with LTC PM			5,266	1.00	1,033	1.00

A2 / A2018 eastbound merge - with LTC (DEMAND)



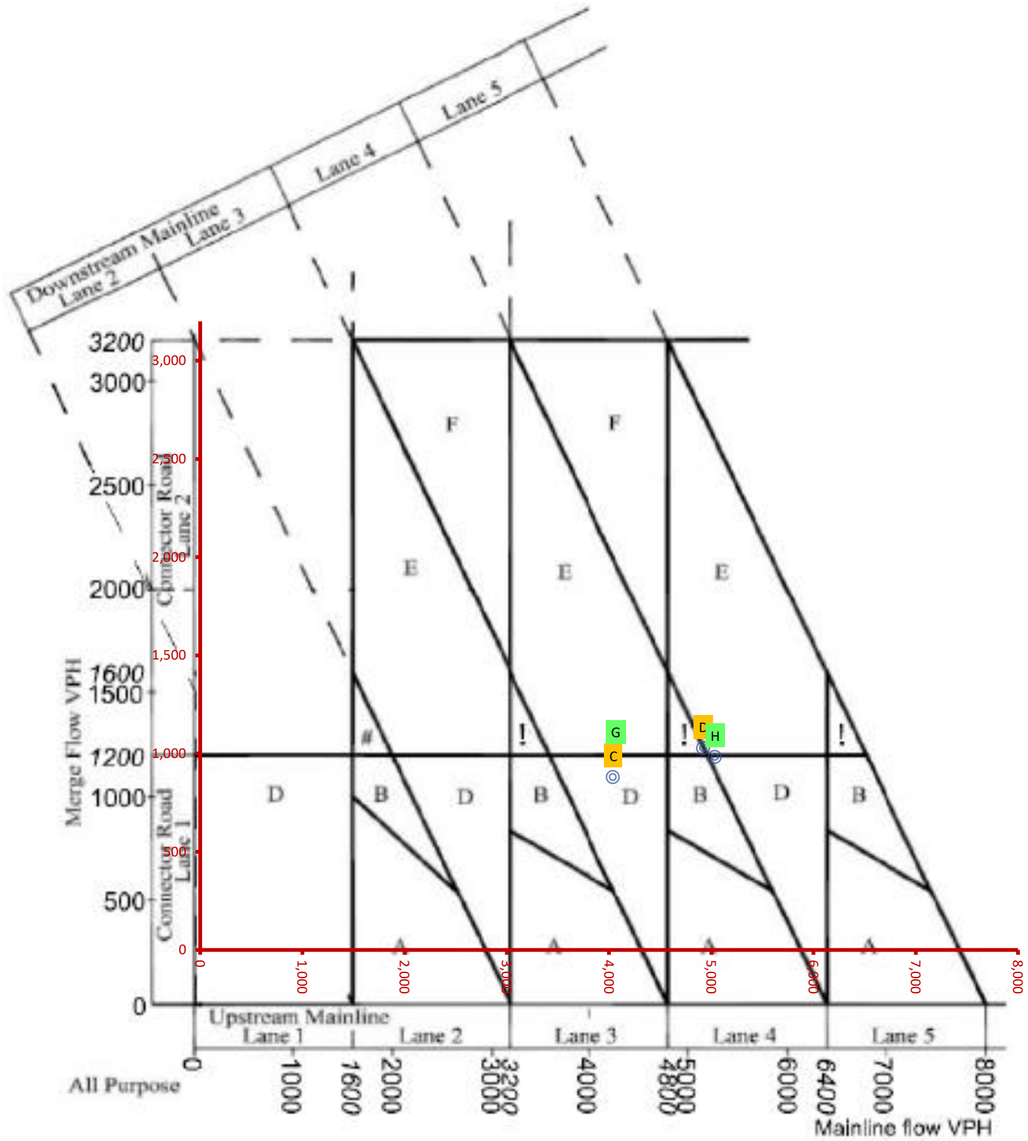
A	Ref no LTC AM			4,133	1.00	928	1.00
B	Ref no LTC PM			4,914	1.00	1,112	1.00
C	Ref with LTC AM	4,084	883	4,084	1.00	883	1.00
D	Ref with LTC PM	5,034	1,064	5,034	1.00	1,064	1.00
E	LP Scenario no LTC AM			4,212	1.00	1,052	1.00
F	LP Scenario no LTC PM			5,123	1.00	1,104	1.00
G	LP Scenario with LTC AM	4,127	1,009	4,127	1.00	1,009	1.00
H	LP Scenario with LTC PM	5,266	1,033	5,266	1.00	1,033	1.00

A2 / A2018 eastbound merge - no LTC (ACTUAL)



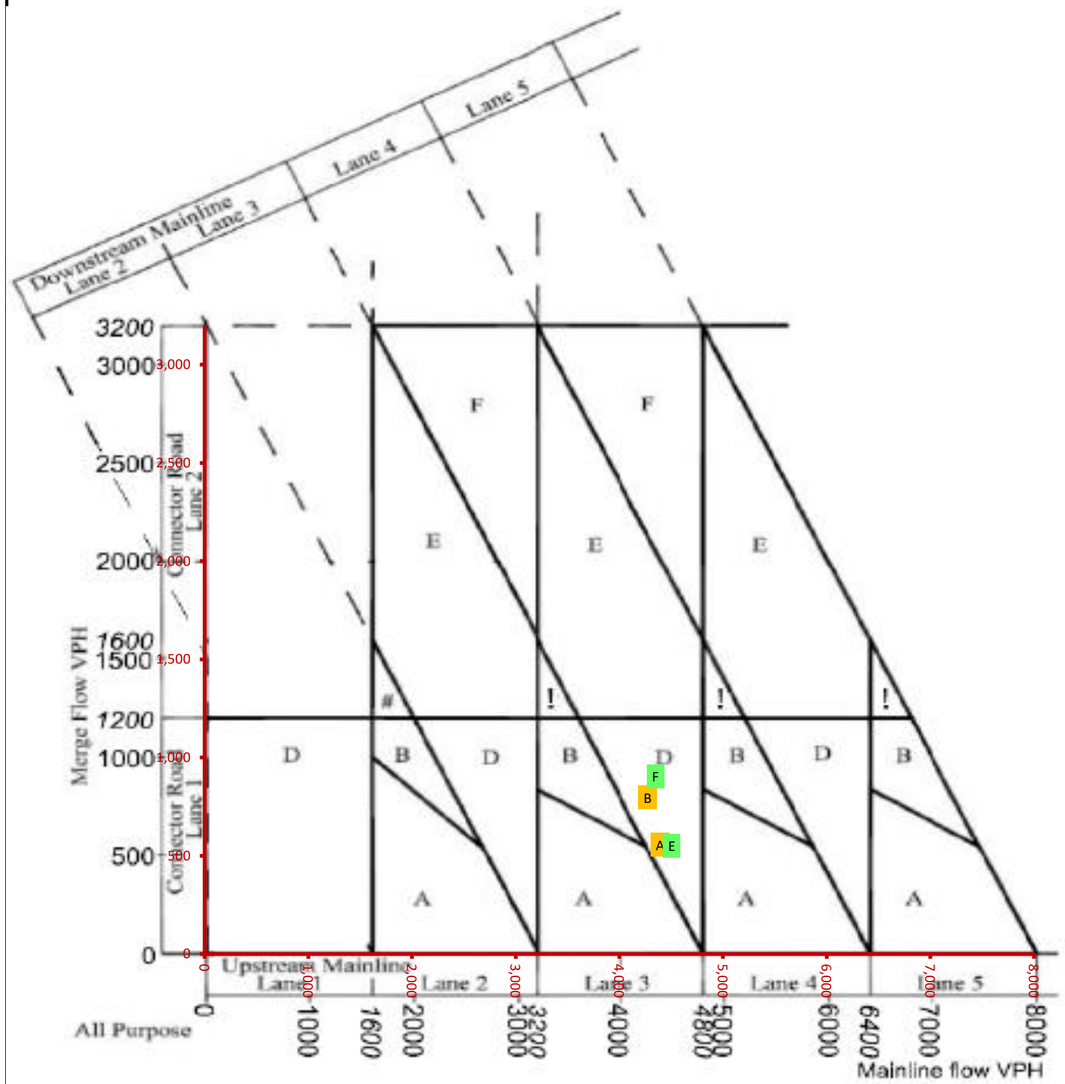
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,093	922	4,093	1.00	922	1.00
B	Ref no LTC PM	4,845	1,066	4,845	1.00	1,066	1.00
C	Ref with LTC AM			4,040	1.00	878	1.00
D	Ref with LTC PM			4,921	1.00	1,025	1.00
E	LP Scenario no LTC AM	4,118	1,040	4,118	1.00	1,040	1.00
F	LP Scenario no LTC PM	4,928	1,038	4,928	1.00	1,038	1.00
G	LP Scenario with LTC AM			4,064	1.00	1,000	1.00
H	LP Scenario with LTC PM			5,037	1.00	980	1.00

A2 / A2018 eastbound merge - with LTC (ACTUAL)



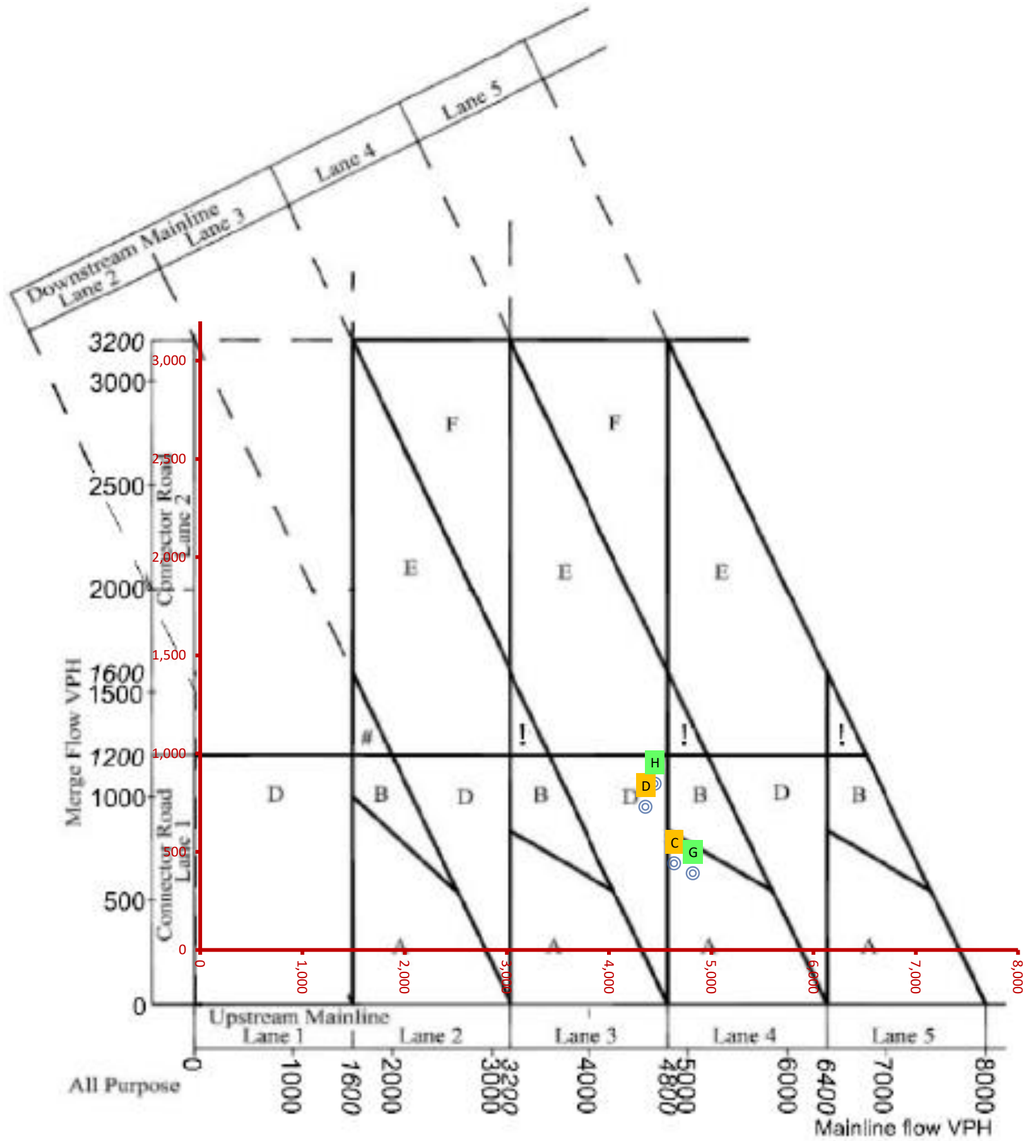
A	Ref no LTC AM			4,093	1.00	922	1.00
B	Ref no LTC PM			4,845	1.00	1,066	1.00
C	Ref with LTC AM	4,040	878	4,040	1.00	878	1.00
D	Ref with LTC PM	4,921	1,025	4,921	1.00	1,025	1.00
E	LP Scenario no LTC AM			4,118	1.00	1,040	1.00
F	LP Scenario no LTC PM			4,928	1.00	1,038	1.00
G	LP Scenario with LTC AM	4,064	1,000	4,064	1.00	1,000	1.00
H	LP Scenario with LTC PM	5,037	980	5,037	1.00	980	1.00

A2 / A2018 westbound merge - no LTC (DEMAND)



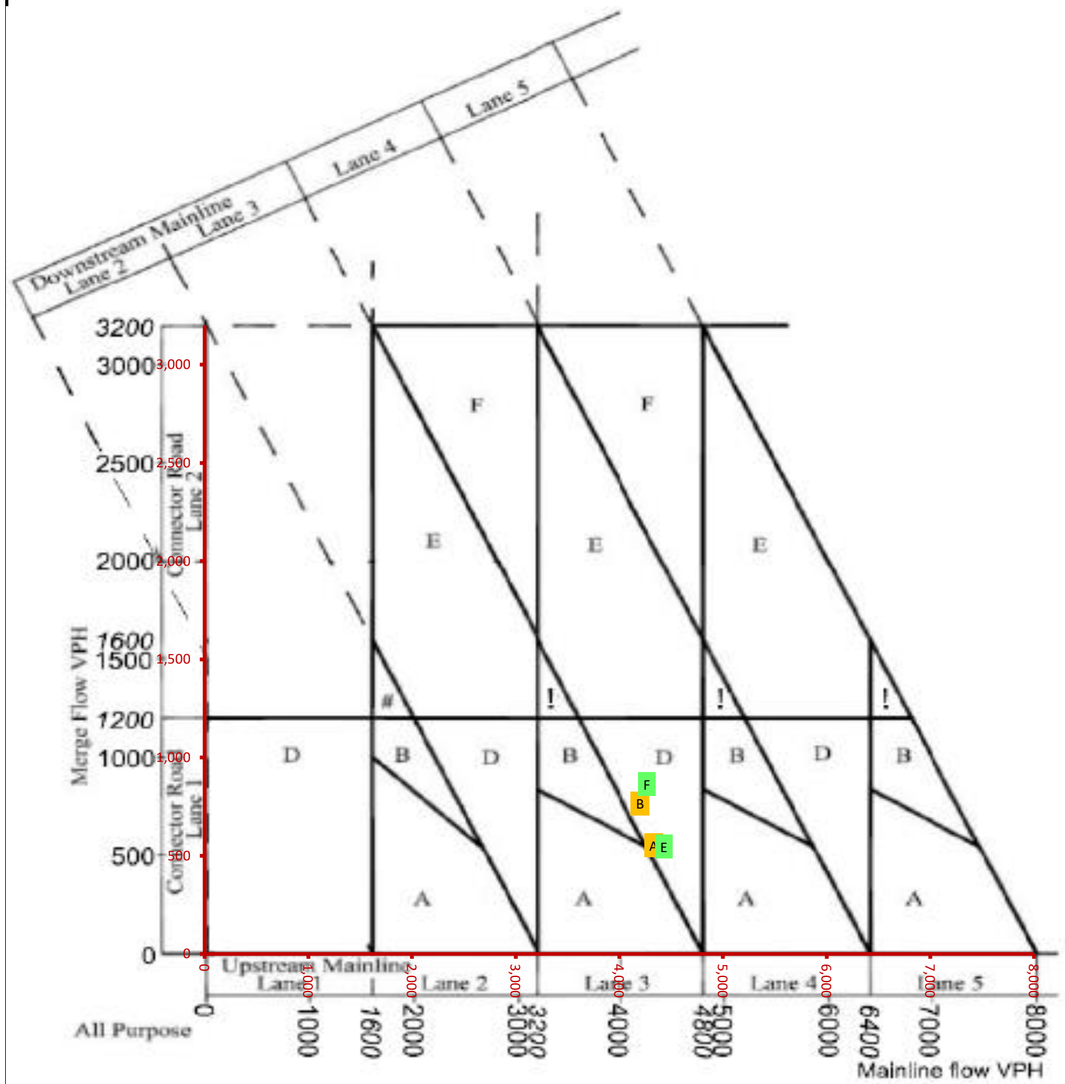
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,393	556	4,393	1.00	556	1.00
B	Ref no LTC PM	4,272	797	4,272	1.00	797	1.00
C	Ref with LTC AM			4,640	1.00	438	1.00
D	Ref with LTC PM			4,360	1.00	727	1.00
E	LP Scenario no LTC AM	4,505	551	4,505	1.00	551	1.00
F	LP Scenario no LTC PM	4,350	905	4,350	1.00	905	1.00
G	LP Scenario with LTC AM			4,821	1.00	388	1.00
H	LP Scenario with LTC PM			4,447	1.00	845	1.00

A2 / A2018 westbound merge - with LTC (DEMAND)



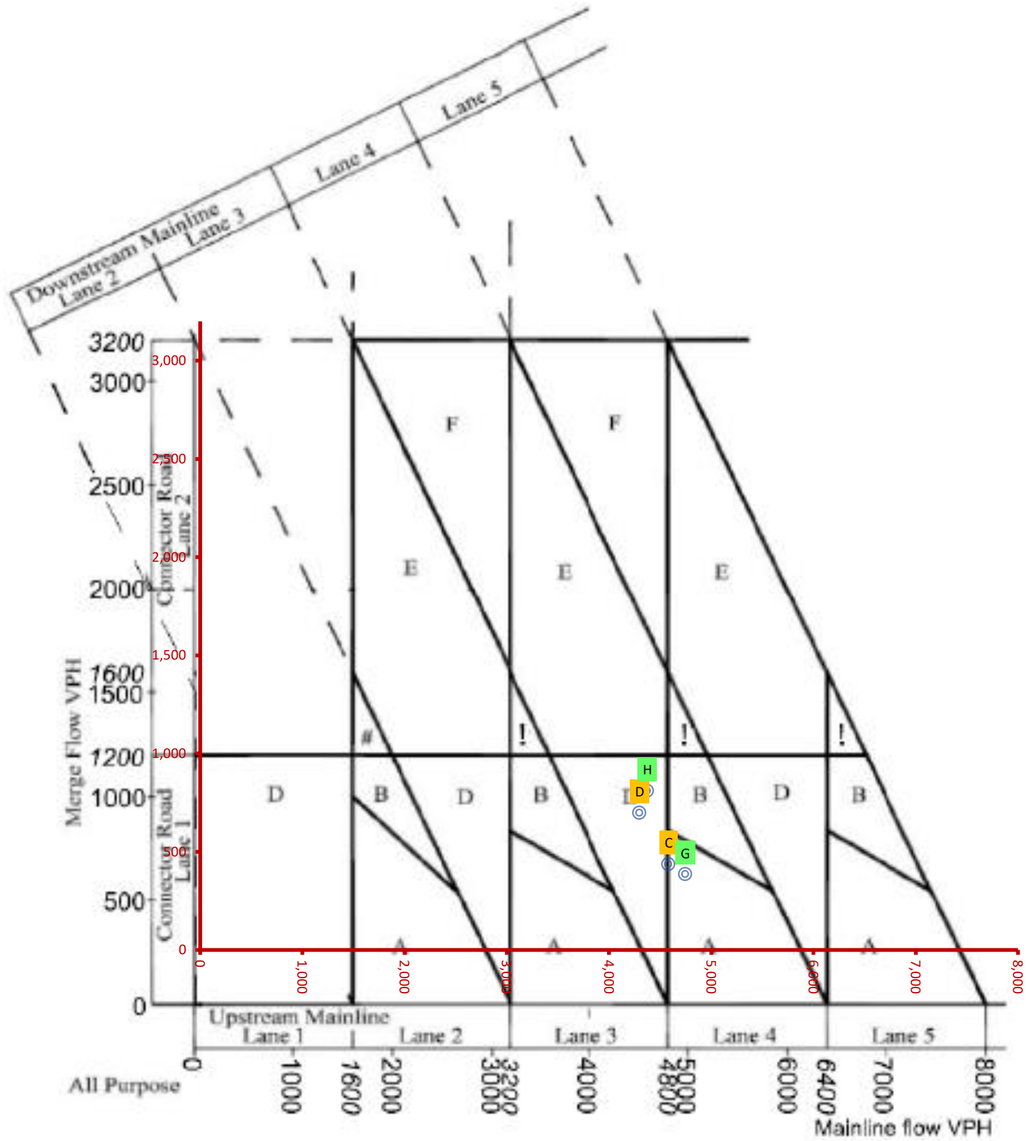
A	Ref no LTC AM			4,393	1.00	556	1.00
B	Ref no LTC PM			4,272	1.00	797	1.00
C	Ref with LTC AM	4,640	438	4,640	1.00	438	1.00
D	Ref with LTC PM	4,360	727	4,360	1.00	727	1.00
E	LP Scenario no LTC AM			4,505	1.00	551	1.00
F	LP Scenario no LTC PM			4,350	1.00	905	1.00
G	LP Scenario with LTC AM	4,821	388	4,821	1.00	388	1.00
H	LP Scenario with LTC PM	4,447	845	4,447	1.00	845	1.00

A2 / A2018 westbound merge - no LTC (ACTUAL)



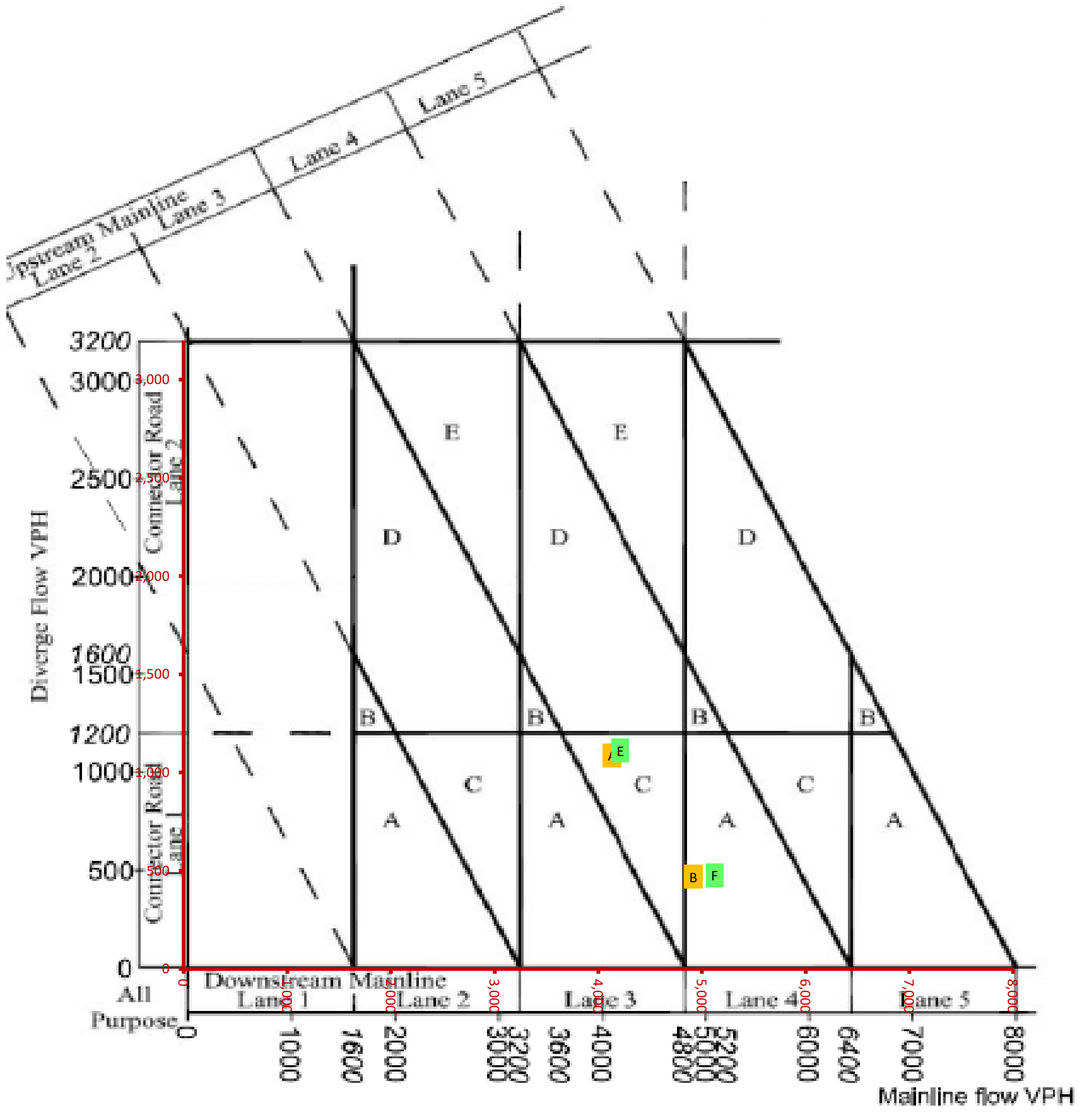
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,330	552	4,330	1.00	552	1.00
B	Ref no LTC PM	4,199	766	4,199	1.00	766	1.00
C	Ref with LTC AM			4,582	1.00	436	1.00
D	Ref with LTC PM			4,298	1.00	697	1.00
E	LP Scenario no LTC AM	4,429	546	4,429	1.00	546	1.00
F	LP Scenario no LTC PM	4,266	864	4,266	1.00	864	1.00
G	LP Scenario with LTC AM			4,745	1.00	384	1.00
H	LP Scenario with LTC PM			4,374	1.00	808	1.00

A2 / A2018 westbound merge - with LTC (ACTUAL)



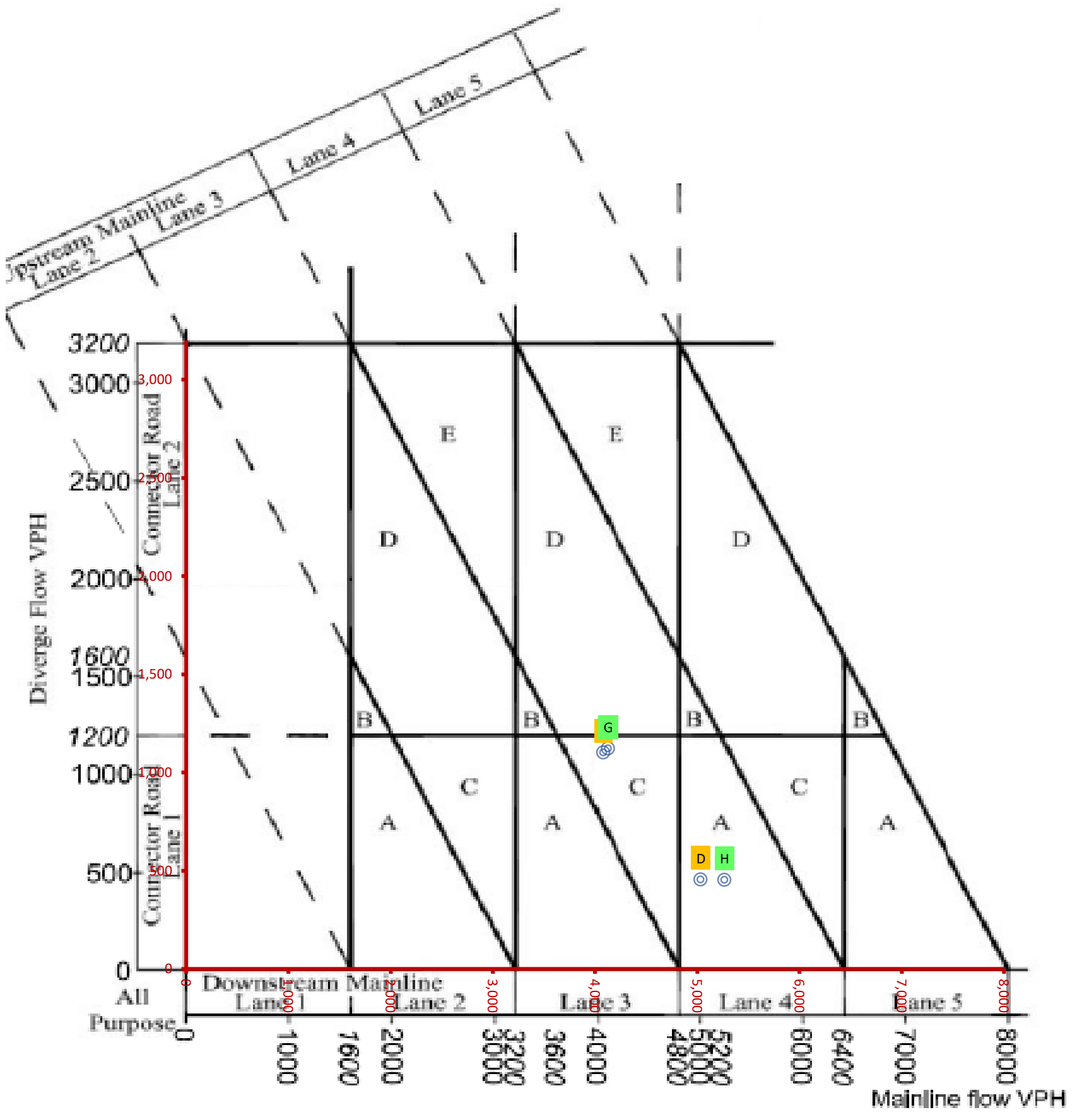
A	Ref no LTC AM			4,330	1.00	552	1.00
B	Ref no LTC PM			4,199	1.00	766	1.00
C	Ref with LTC AM	4,582	436	4,582	1.00	436	1.00
D	Ref with LTC PM	4,298	697	4,298	1.00	697	1.00
E	LP Scenario no LTC AM			4,429	1.00	546	1.00
F	LP Scenario no LTC PM			4,266	1.00	864	1.00
G	LP Scenario with LTC AM	4,745	384	4,745	1.00	384	1.00
H	LP Scenario with LTC PM	4,374	808	4,374	1.00	808	1.00

A2 / A2018 eastbound diverge - no LTC (DEMAND)



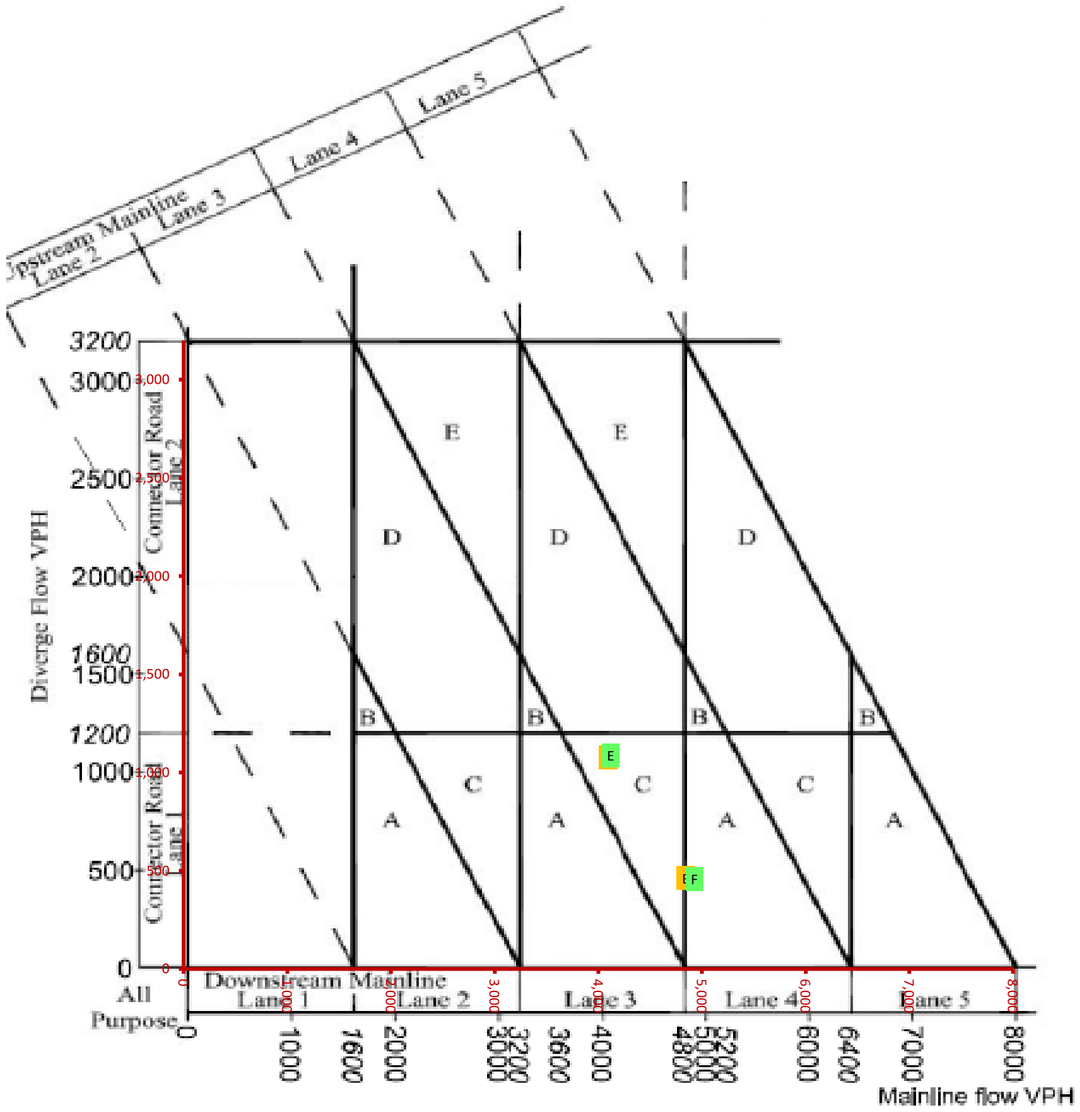
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,133	1,087	4,133	1.00	1,087	1.00
B	Ref no LTC PM	4,914	470	4,914	1.00	470	1.00
C	Ref with LTC AM			4,084	1.00	1,100	1.00
D	Ref with LTC PM			5,034	1.00	454	1.00
E	LP Scenario no LTC AM	4,212	1,111	4,212	1.00	1,111	1.00
F	LP Scenario no LTC PM	5,123	476	5,123	1.00	476	1.00
G	LP Scenario with LTC AM			4,127	1.00	1,120	1.00
H	LP Scenario with LTC PM			5,266	1.00	452	1.00

A2 / A2018 eastbound diverge - with LTC (DEMAND)



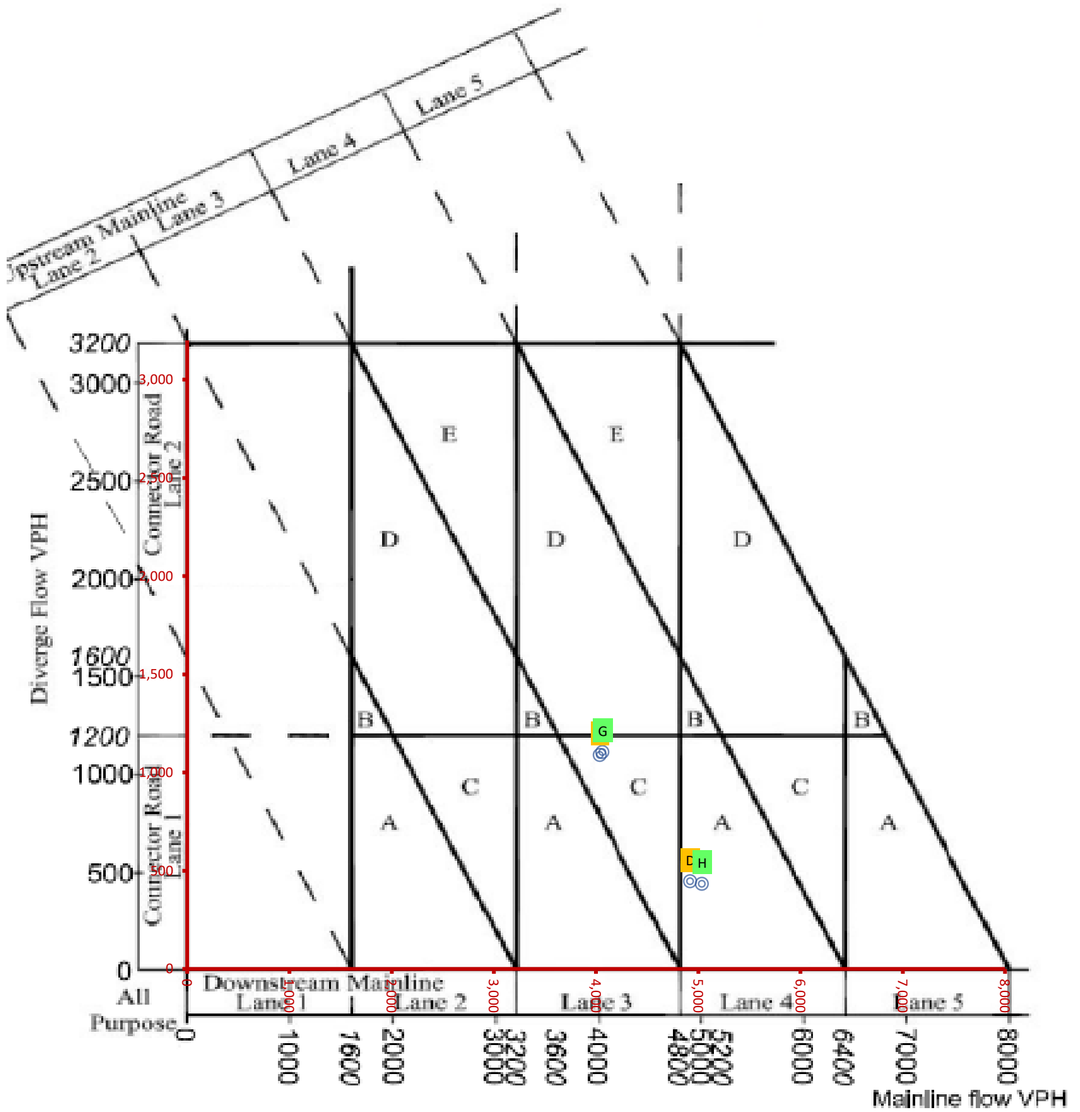
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,133	1.00	1,087	1.00
B	Ref no LTC PM			4,914	1.00	470	1.00
C	Ref with LTC AM	4,084	1,100	4,084	1.00	1,100	1.00
D	Ref with LTC PM	5,034	454	5,034	1.00	454	1.00
E	LP Scenario no LTC AM			4,212	1.00	1,111	1.00
F	LP Scenario no LTC PM			5,123	1.00	476	1.00
G	LP Scenario with LTC AM	4,127	1,120	4,127	1.00	1,120	1.00
H	LP Scenario with LTC PM	5,266	452	5,266	1.00	452	1.00

A2 / A2018 eastbound diverge - no LTC (ACTUAL)



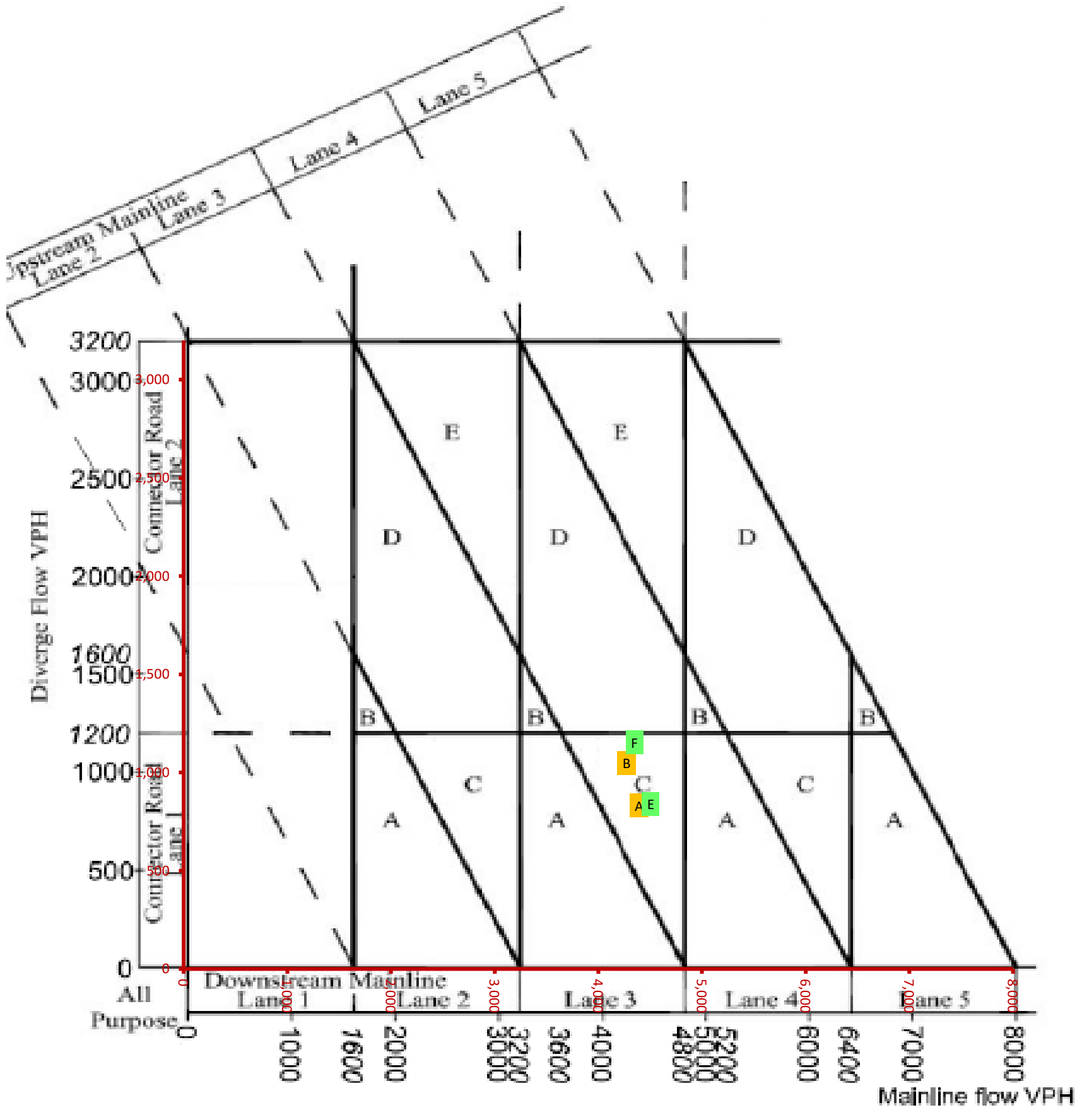
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,093	1,077	4,093	1.00	1,077	1.00
B	Ref no LTC PM	4,845	463	4,845	1.00	463	1.00
C	Ref with LTC AM			4,040	1.00	1,088	1.00
D	Ref with LTC PM			4,921	1.00	444	1.00
E	LP Scenario no LTC AM	4,118	1,087	4,118	1.00	1,087	1.00
F	LP Scenario no LTC PM	4,928	458	4,928	1.00	458	1.00
G	LP Scenario with LTC AM			4,064	1.00	1,103	1.00
H	LP Scenario with LTC PM			5,037	1.00	432	1.00

A2 / A2018 eastbound diverge - with LTC (ACTUAL)



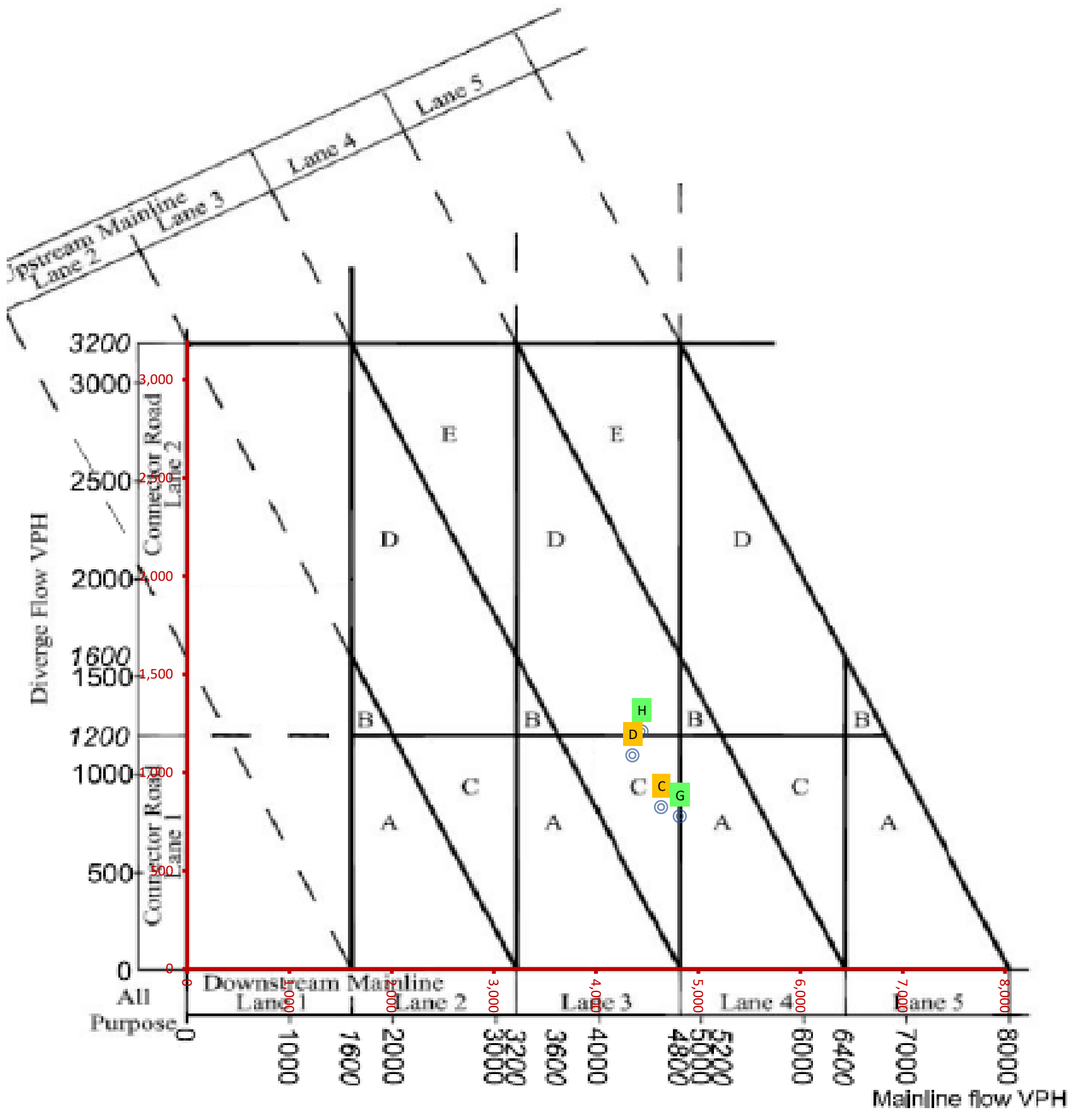
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,093	1.00	1,077	1.00
B	Ref no LTC PM			4,845	1.00	463	1.00
C	Ref with LTC AM	4,040	1,088	4,040	1.00	1,088	1.00
D	Ref with LTC PM	4,921	444	4,921	1.00	444	1.00
E	LP Scenario no LTC AM			4,118	1.00	1,087	1.00
F	LP Scenario no LTC PM			4,928	1.00	458	1.00
G	LP Scenario with LTC AM	4,064	1,103	4,064	1.00	1,103	1.00
H	LP Scenario with LTC PM	5,037	432	5,037	1.00	432	1.00

A2 / A2018 westbound diverge - no LTC (DEMAND)



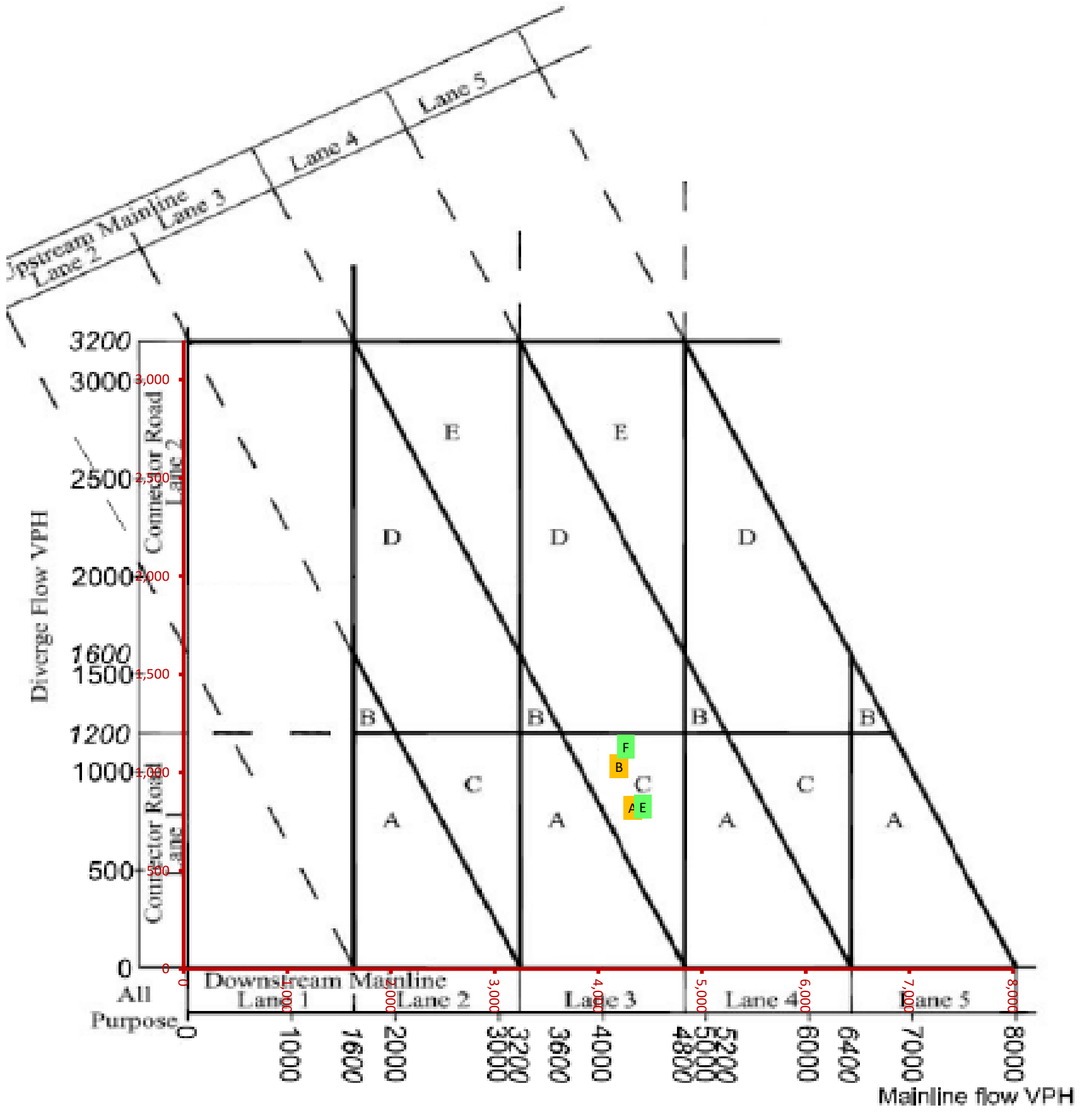
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,393	832	4,393	1.00	832	1.00
B	Ref no LTC PM	4,272	1,049	4,272	1.00	1,049	1.00
C	Ref with LTC AM			4,640	1.00	821	1.00
D	Ref with LTC PM			4,360	1.00	1,085	1.00
E	LP Scenario no LTC AM	4,505	839	4,505	1.00	839	1.00
F	LP Scenario no LTC PM	4,350	1,153	4,350	1.00	1,153	1.00
G	LP Scenario with LTC AM			4,821	1.00	776	1.00
H	LP Scenario with LTC PM			4,447	1.00	1,206	1.00

A2 / A2018 westbound diverge - with LTC (DEMAND)



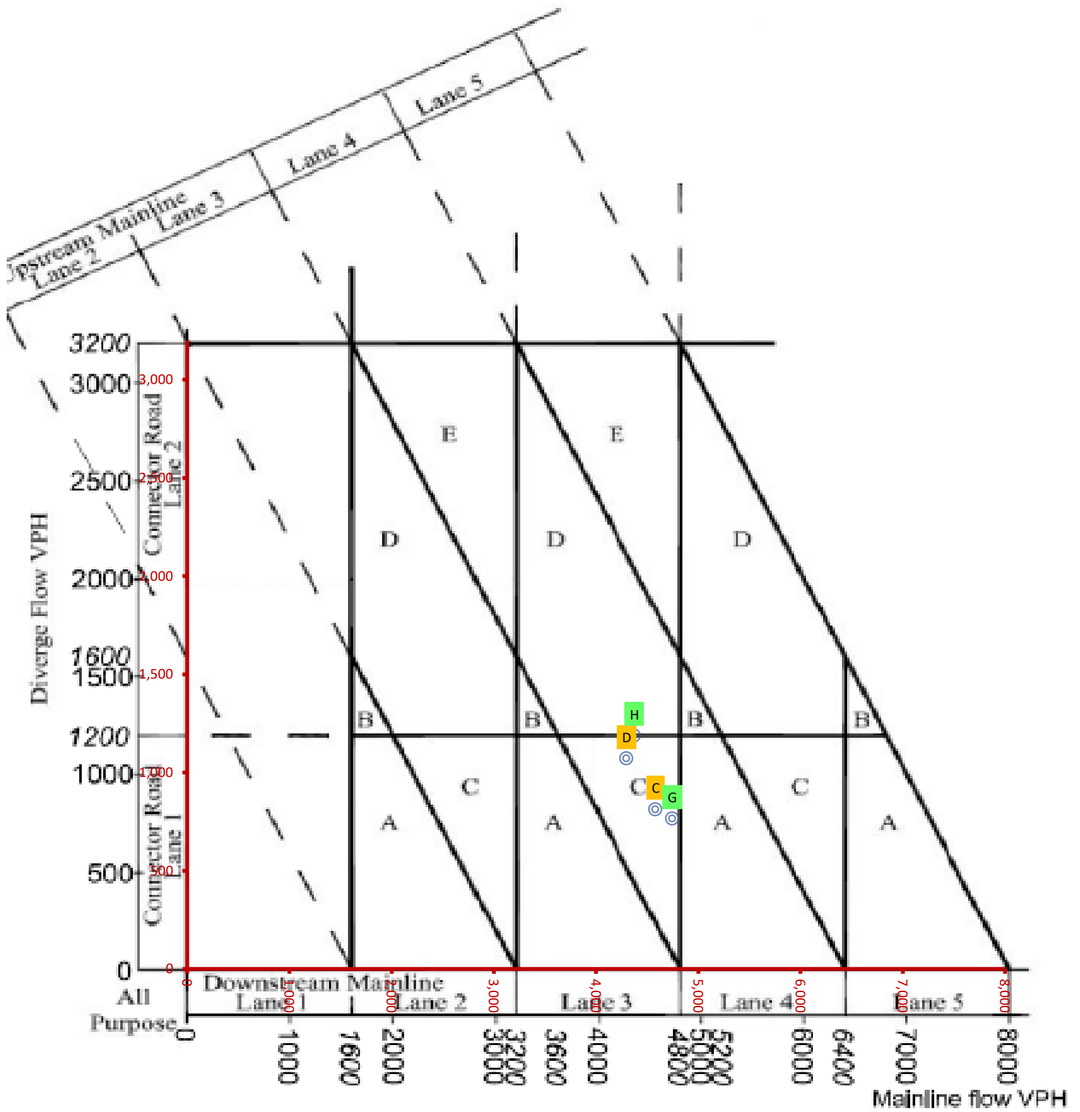
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,393	1.00	832	1.00
B	Ref no LTC PM			4,272	1.00	1,049	1.00
C	Ref with LTC AM	4,640	821	4,640	1.00	821	1.00
D	Ref with LTC PM	4,360	1,085	4,360	1.00	1,085	1.00
E	LP Scenario no LTC AM			4,505	1.00	839	1.00
F	LP Scenario no LTC PM			4,350	1.00	1,153	1.00
G	LP Scenario with LTC AM	4,821	776	4,821	1.00	776	1.00
H	LP Scenario with LTC PM	4,447	1,206	4,447	1.00	1,206	1.00

A2 / A2018 westbound diverge - no LTC (ACTUAL)



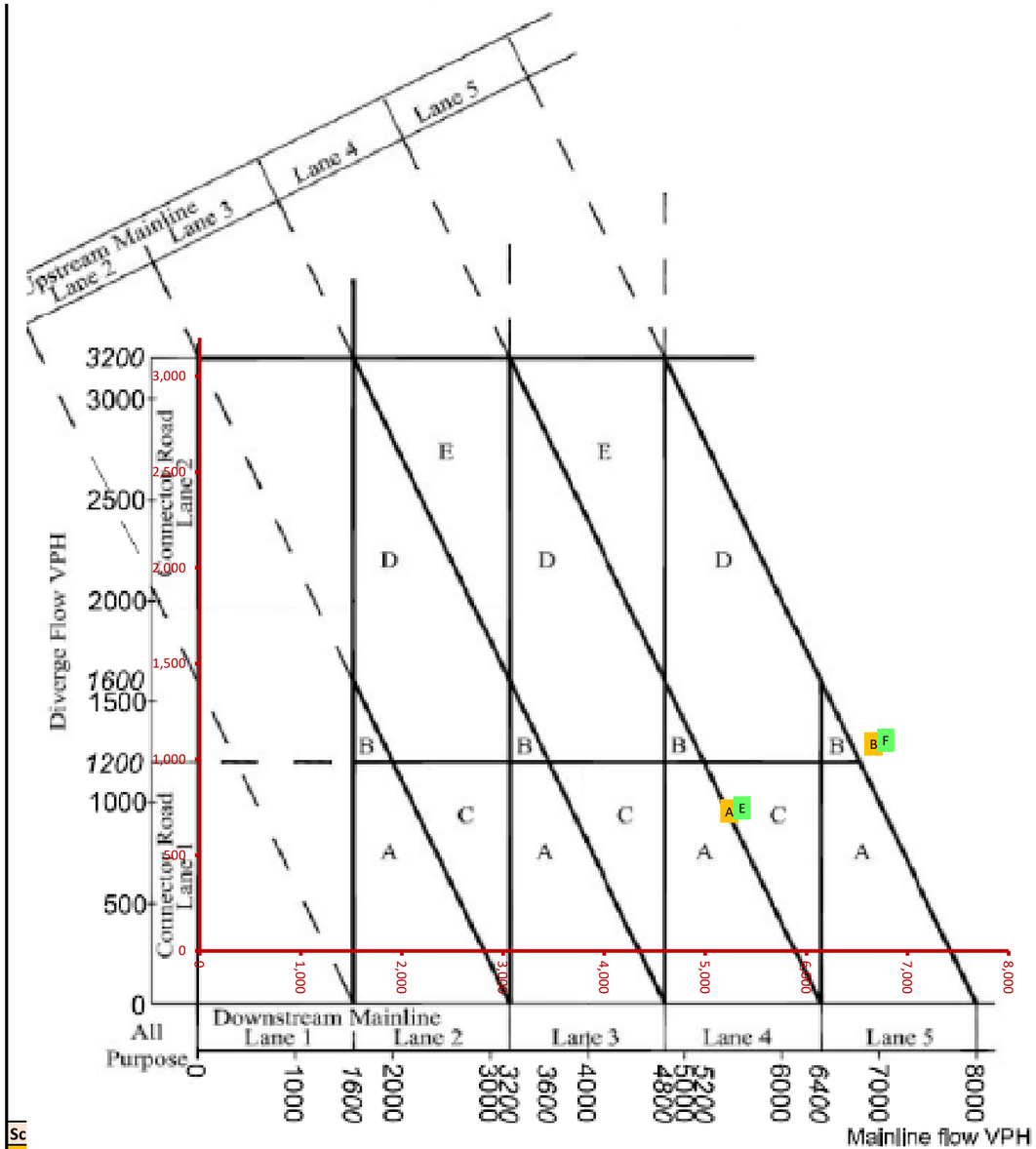
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,330	820	4,330	1.00	820	1.00
B	Ref no LTC PM	4,199	1,031	4,199	1.00	1,031	1.00
C	Ref with LTC AM			4,582	1.00	811	1.00
D	Ref with LTC PM			4,298	1.00	1,070	1.00
E	LP Scenario no LTC AM	4,429	825	4,429	1.00	825	1.00
F	LP Scenario no LTC PM	4,266	1,130	4,266	1.00	1,130	1.00
G	LP Scenario with LTC AM			4,745	1.00	764	1.00
H	LP Scenario with LTC PM			4,374	1.00	1,187	1.00

A2 / A2018 westbound diverge - with LTC (ACTUAL)



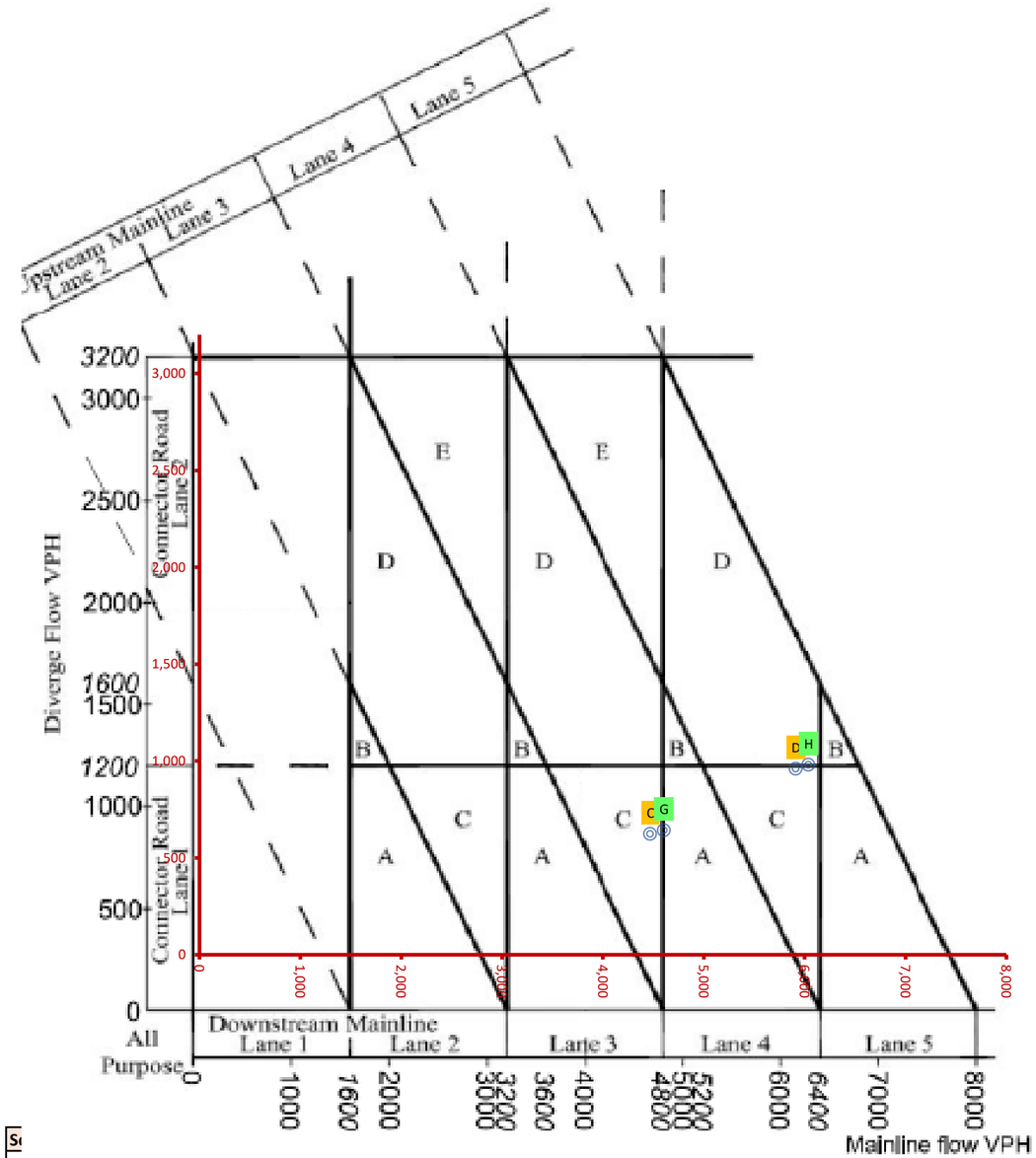
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,330	1.00	820	1.00
B	Ref no LTC PM			4,199	1.00	1,031	1.00
C	Ref with LTC AM	4,582	811	4,582	1.00	811	1.00
D	Ref with LTC PM	4,298	1,070	4,298	1.00	1,070	1.00
E	LP Scenario no LTC AM			4,429	1.00	825	1.00
F	LP Scenario no LTC PM			4,266	1.00	1,130	1.00
G	LP Scenario with LTC AM	4,745	764	4,745	1.00	764	1.00
H	LP Scenario with LTC PM	4,374	1,187	4,374	1.00	1,187	1.00

A2 Bean eastbound diverge - no LTC (DEMAND)



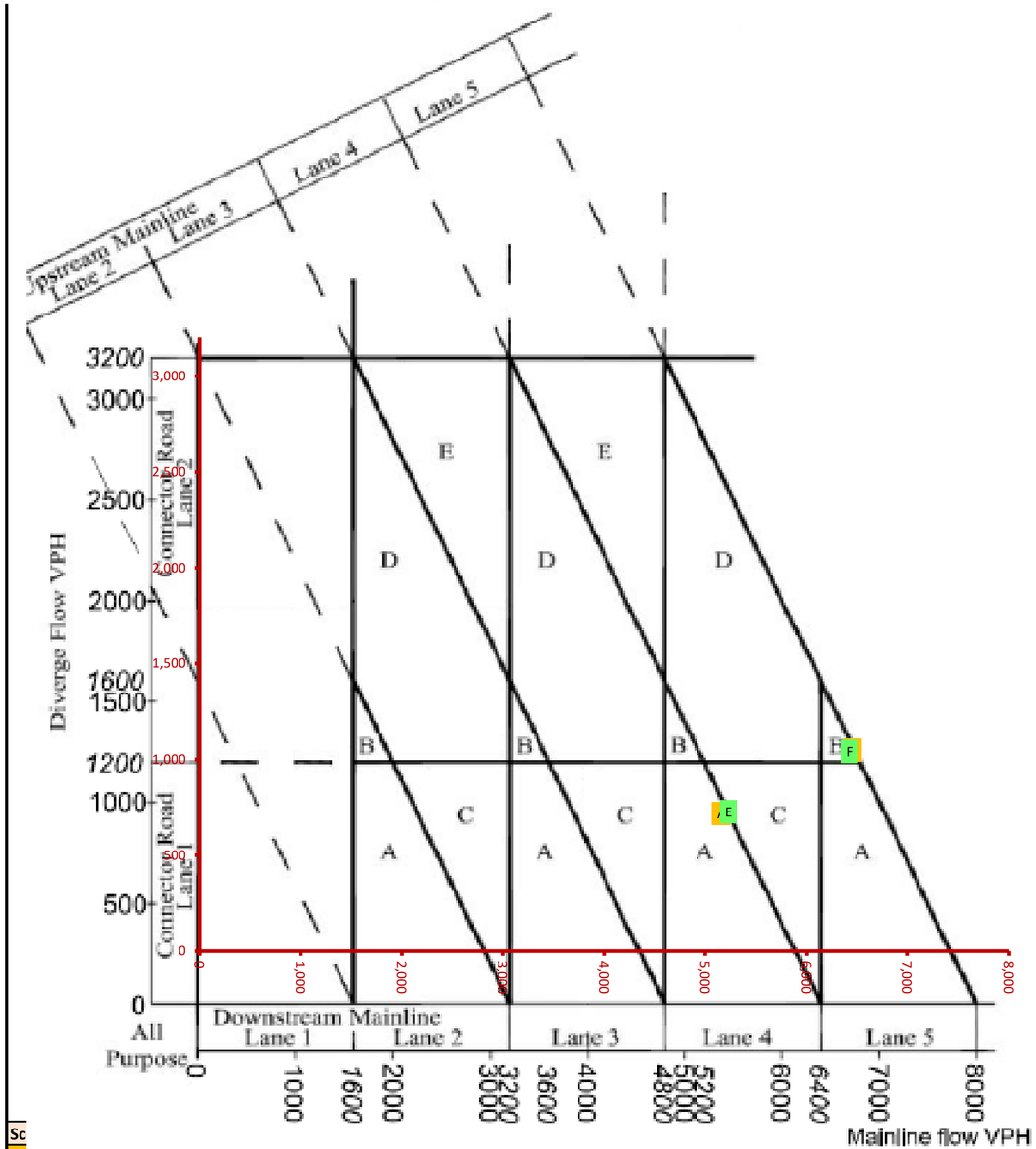
Sc							
A	Ref no LTC AM	5,237	729	5,237	1.00	729	1.00
B	Ref no LTC PM	6,664	1,081	6,664	1.00	1,081	1.00
C	Ref with LTC AM			4,470	1.00	623	1.00
D	Ref with LTC PM			5,912	1.00	959	1.00
E	LP Scenario no LTC AM	5,363	747	5,363	1.00	747	1.00
F	LP Scenario no LTC PM	6,784	1,101	6,784	1.00	1,101	1.00
G	LP Scenario with LTC AM			4,605	1.00	641	1.00
H	LP Scenario with LTC PM			6,038	1.00	980	1.00

A2 Bean eastbound diverge - with LTC (DEMAND)



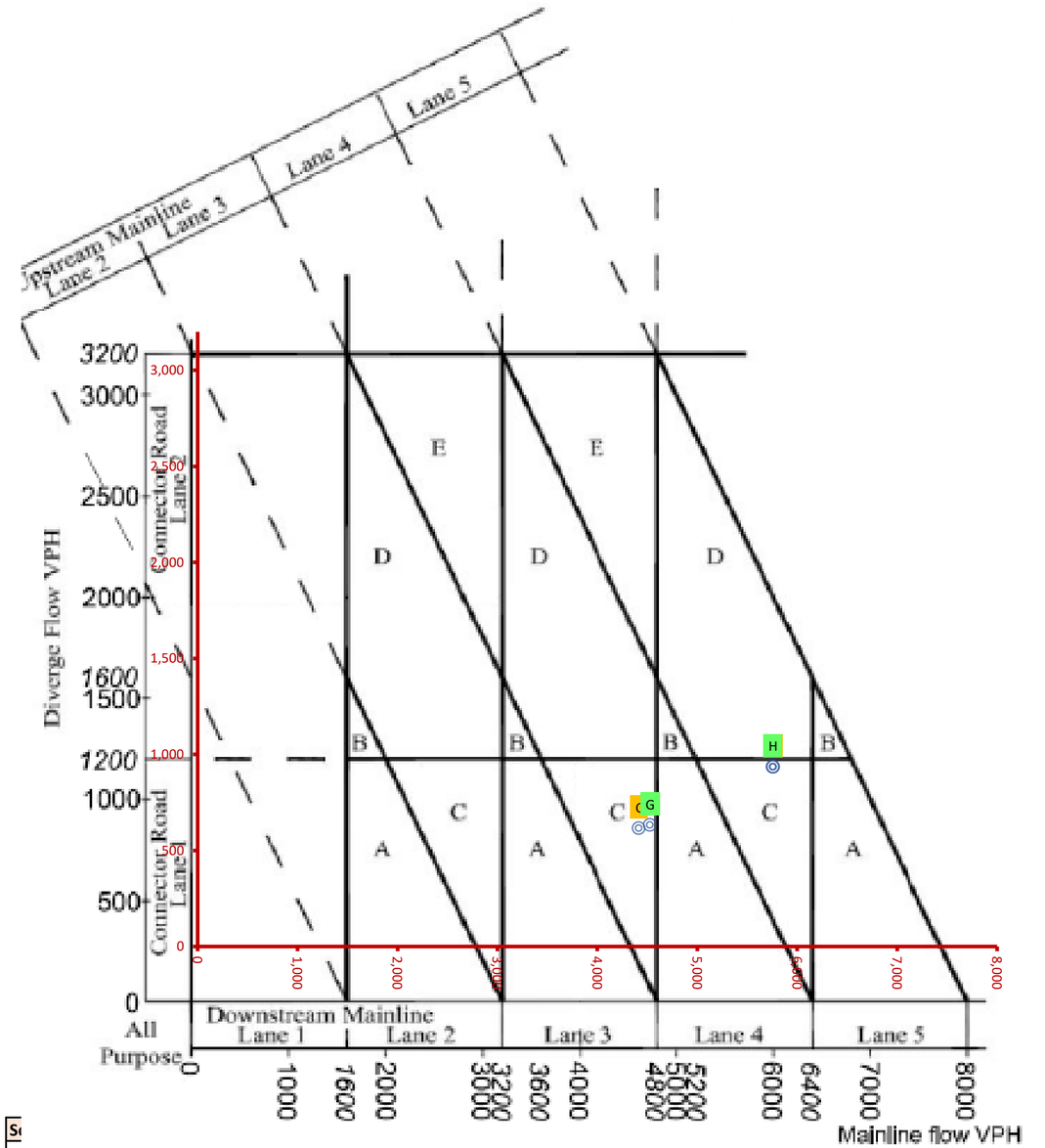
Sc							
A	Ref no LTC AM			5,237	1.00	729	1.00
B	Ref no LTC PM			6,664	1.00	1,081	1.00
C	Ref with LTC AM	4,470	623	4,470	1.00	623	1.00
D	Ref with LTC PM	5,912	959	5,912	1.00	959	1.00
E	LP Scenario no LTC AM			5,363	1.00	747	1.00
F	LP Scenario no LTC PM			6,784	1.00	1,101	1.00
G	LP Scenario with LTC AM	4,605	641	4,605	1.00	641	1.00
H	LP Scenario with LTC PM	6,038	980	6,038	1.00	980	1.00

A2 Bean eastbound diverge - no LTC (ACTUAL)



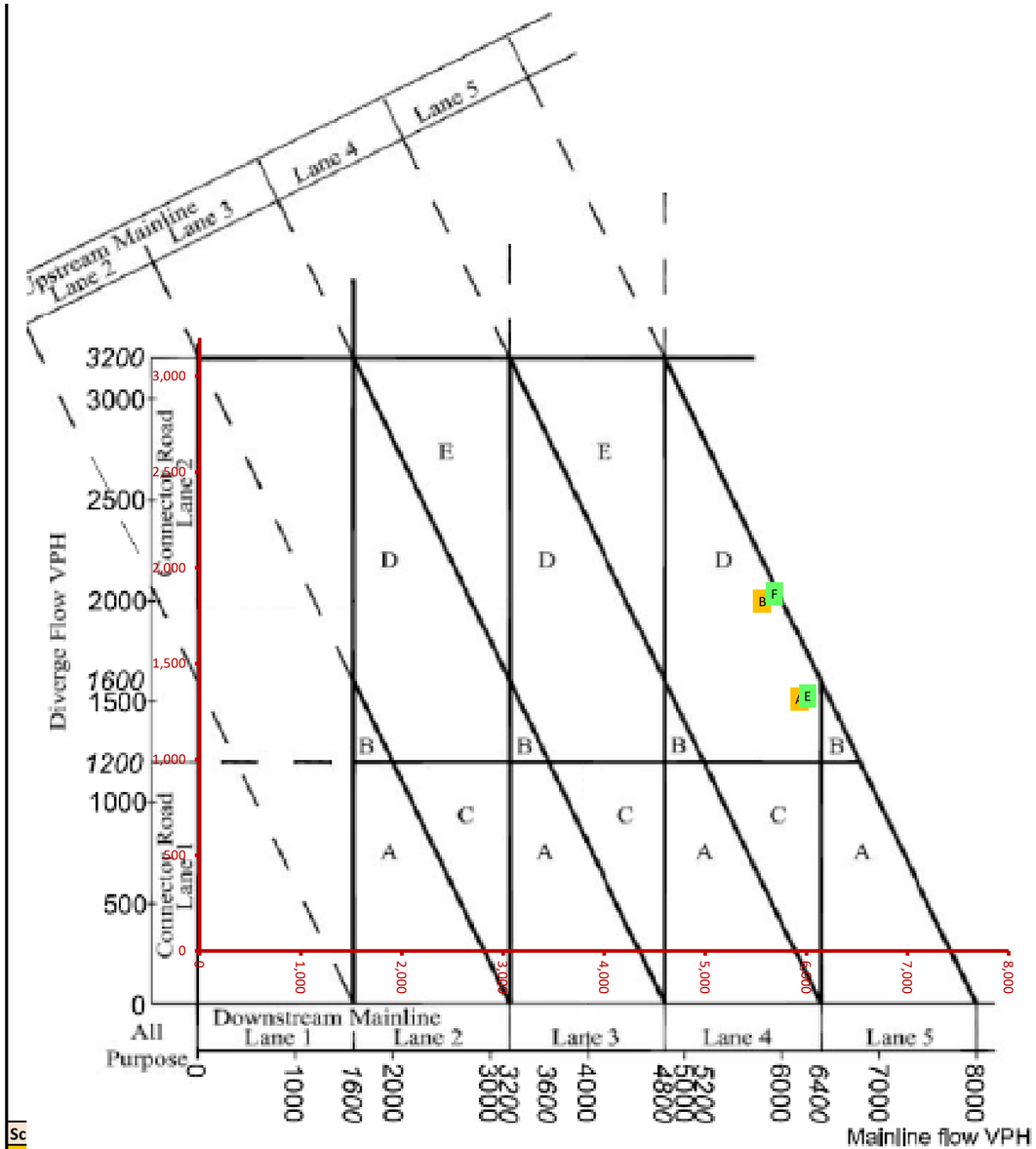
Sc							
A	Ref no LTC AM	5,157	718	5,157	1.00	718	1.00
B	Ref no LTC PM	6,456	1,047	6,456	1.00	1,047	1.00
C	Ref with LTC AM			4,418	1.00	615	1.00
D	Ref with LTC PM			5,761	1.00	935	1.00
E	LP Scenario no LTC AM	5,227	728	5,227	1.00	728	1.00
F	LP Scenario no LTC PM	6,428	1,043	6,428	1.00	1,043	1.00
G	LP Scenario with LTC AM			4,527	1.00	631	1.00
H	LP Scenario with LTC PM			5,756	1.00	934	1.00

A2 Bean eastbound diverge - with LTC (ACTUAL)



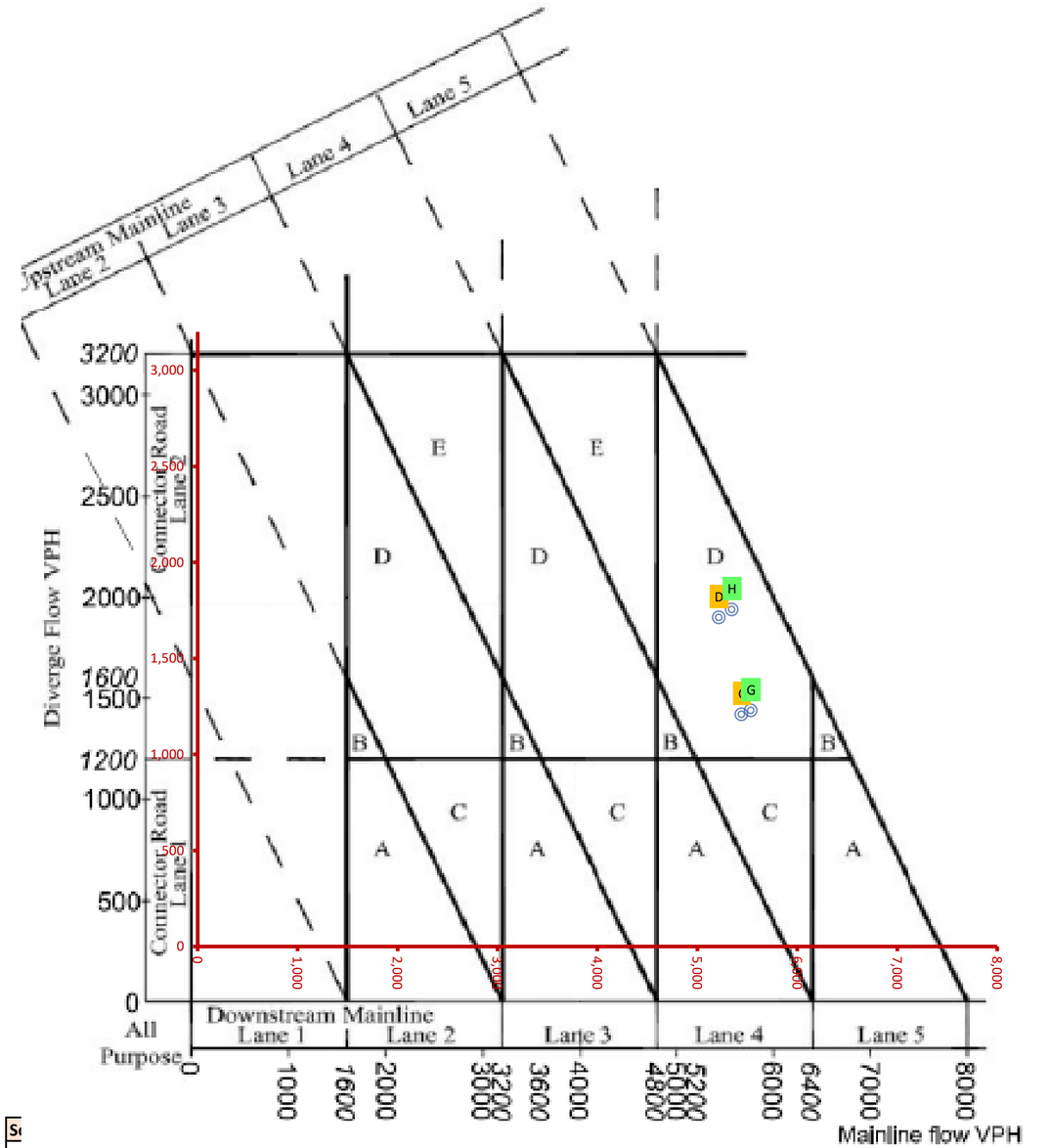
Sc							
A	Ref no LTC AM			5,157	1.00	718	1.00
B	Ref no LTC PM			6,456	1.00	1,047	1.00
C	Ref with LTC AM	4,418	615	4,418	1.00	615	1.00
D	Ref with LTC PM	5,761	935	5,761	1.00	935	1.00
E	LP Scenario no LTC AM			5,227	1.00	728	1.00
F	LP Scenario no LTC PM			6,428	1.00	1,043	1.00
G	LP Scenario with LTC AM	4,527	631	4,527	1.00	631	1.00
H	LP Scenario with LTC PM	5,756	934	5,756	1.00	934	1.00

A2 Bean westbound diverge - no LTC (DEMAND)



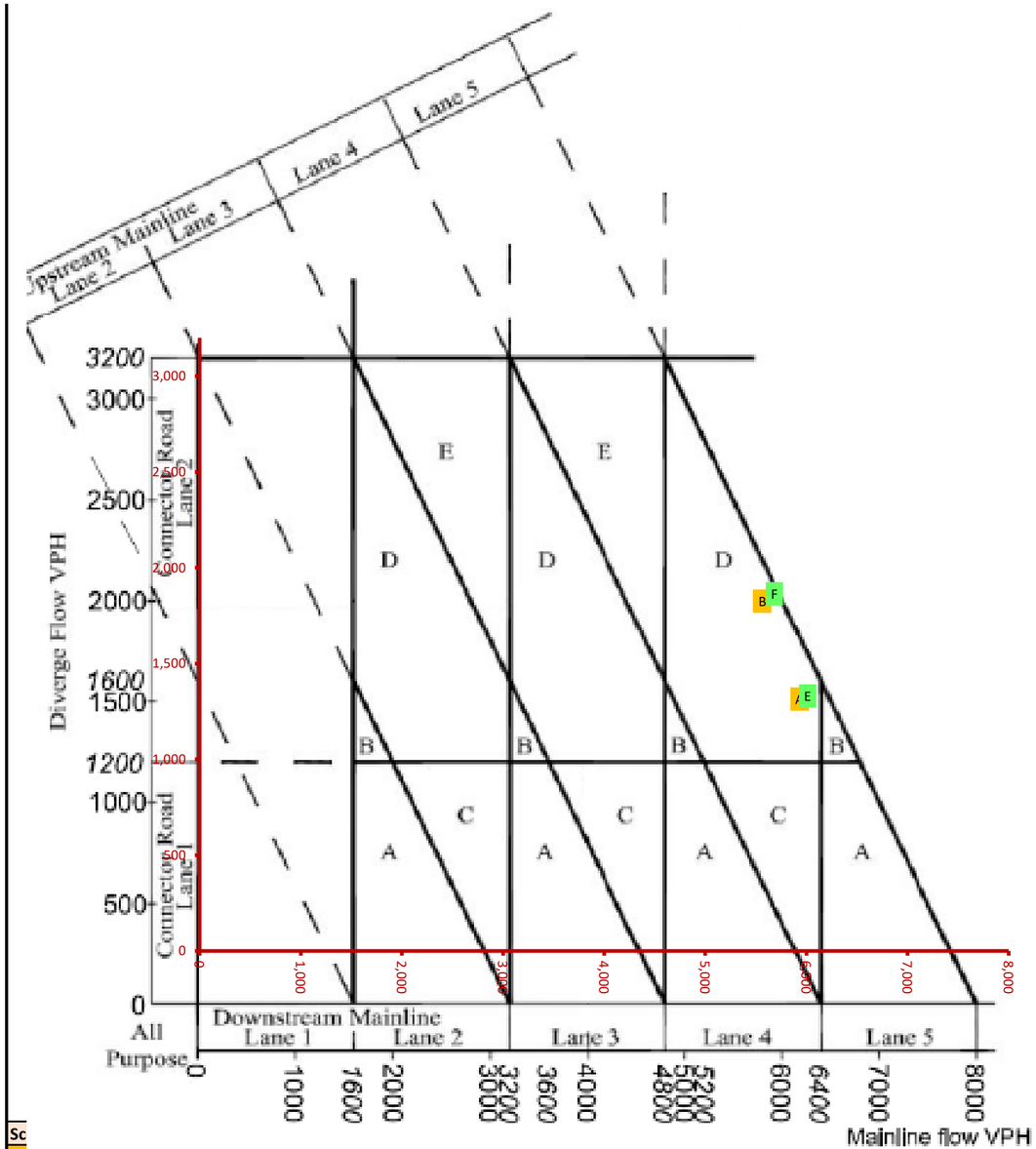
Sc							
A	Ref no LTC AM	5,931	1,315	5,931	1.00	1,315	1.00
B	Ref no LTC PM	5,563	1,825	5,563	1.00	1,825	1.00
C	Ref with LTC AM			5,445	1.00	1,207	1.00
D	Ref with LTC PM			5,216	1.00	1,711	1.00
E	LP Scenario no LTC AM	6,011	1,332	6,011	1.00	1,332	1.00
F	LP Scenario no LTC PM	5,683	1,864	5,683	1.00	1,864	1.00
G	LP Scenario with LTC AM			5,537	1.00	1,227	1.00
H	LP Scenario with LTC PM			5,346	1.00	1,753	1.00

A2 Bean westbound diverge - with LTC (DEMAND)



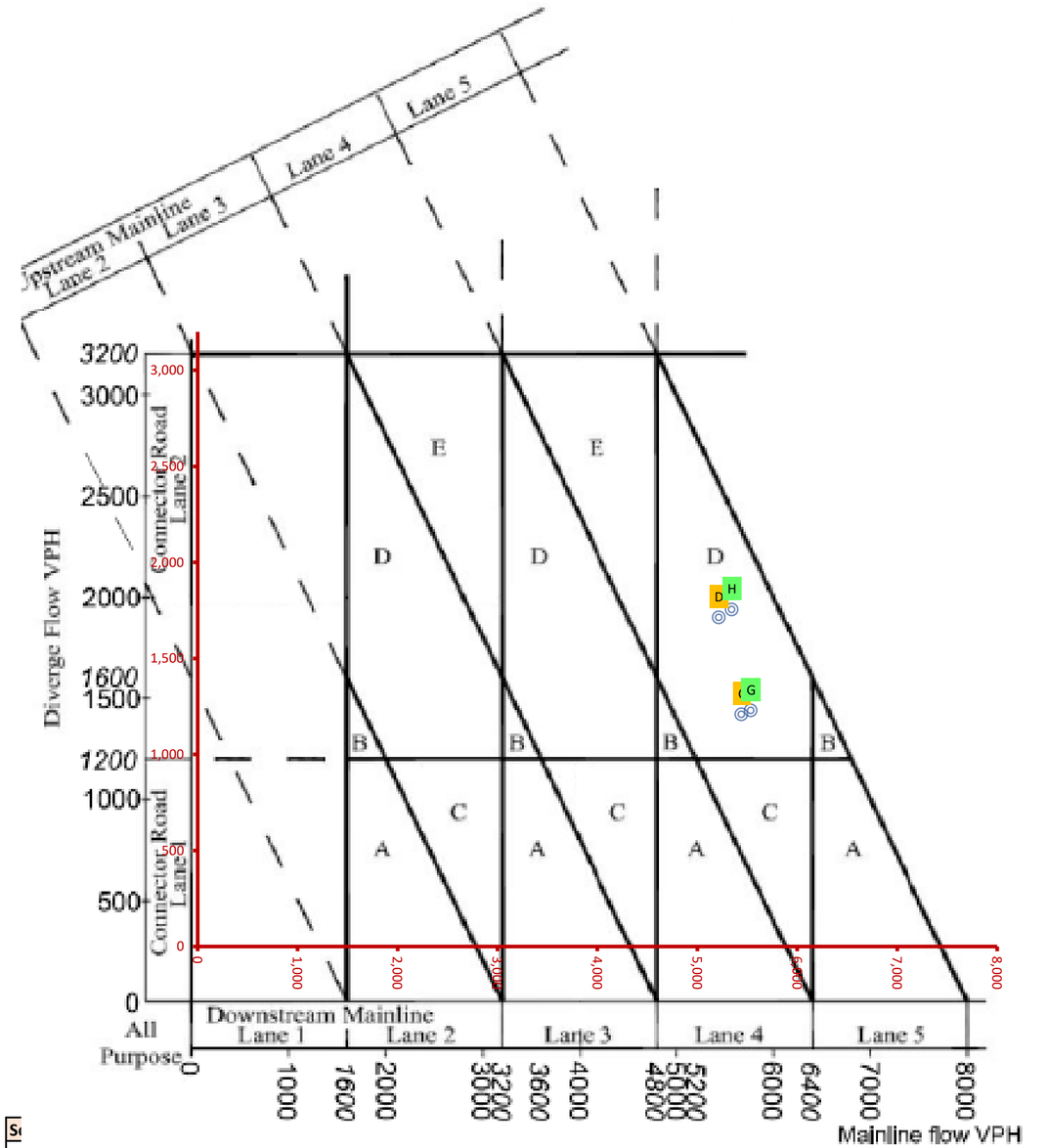
Sc							
B	Ref no LTC PM			5,563	1.00	1,825	1.00
C	Ref with LTC AM	5,445	1,207	5,445	1.00	1,207	1.00
D	Ref with LTC PM	5,216	1,711	5,216	1.00	1,711	1.00
E	LP Scenario no LTC AM			6,011	1.00	1,332	1.00
F	LP Scenario no LTC PM			5,683	1.00	1,864	1.00
G	LP Scenario with LTC AM	5,537	1,227	5,537	1.00	1,227	1.00
H	LP Scenario with LTC PM	5,346	1,753	5,346	1.00	1,753	1.00

A2 Bean westbound diverge - no LTC (ACTUAL)



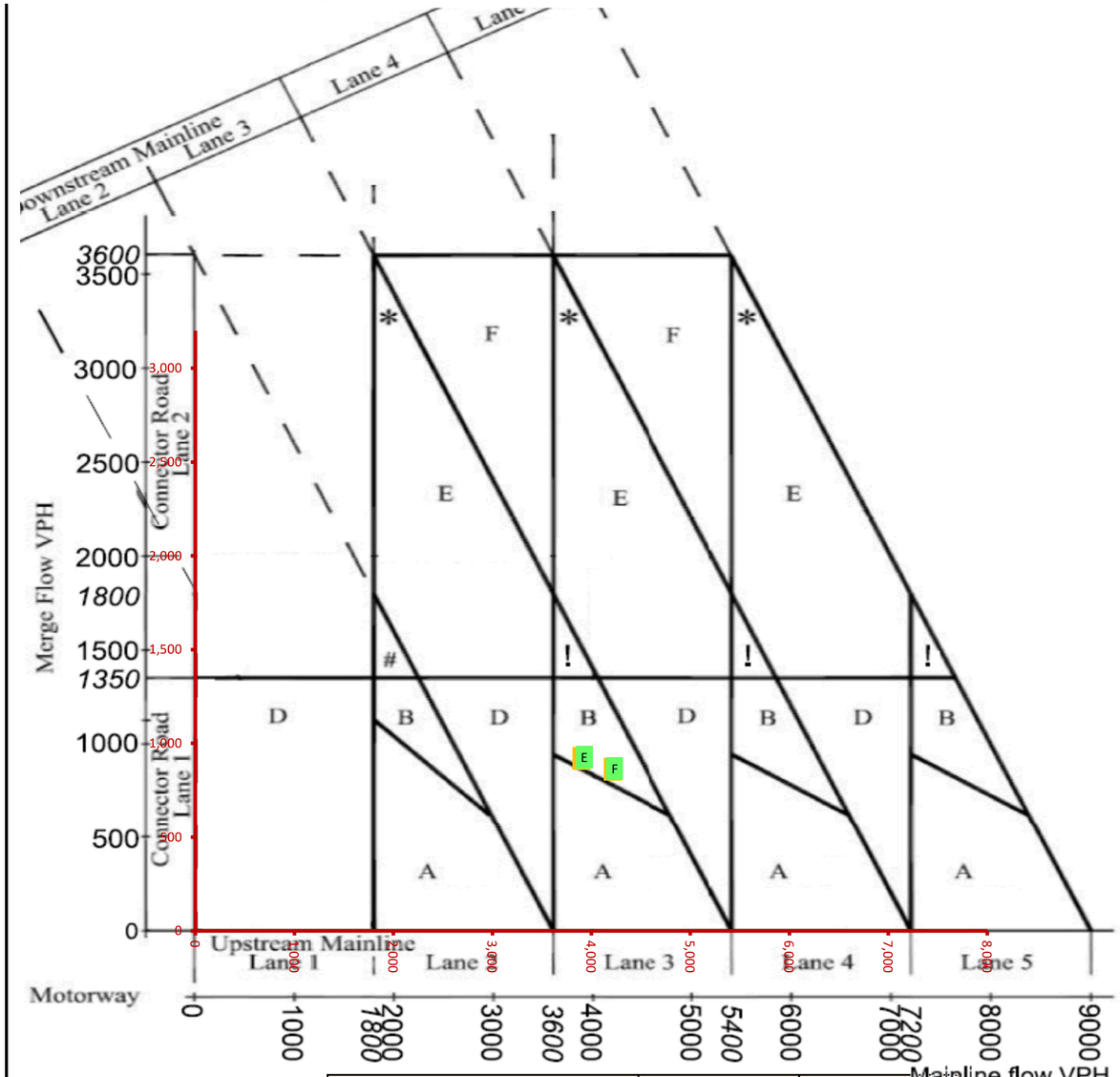
Sc							
A	Ref no LTC AM	5,931	1,315	5,931	1.00	1,315	1.00
B	Ref no LTC PM	5,563	1,825	5,563	1.00	1,825	1.00
C	Ref with LTC AM			5,445	1.00	1,207	1.00
D	Ref with LTC PM			5,216	1.00	1,711	1.00
E	LP Scenario no LTC AM	6,011	1,332	6,011	1.00	1,332	1.00
F	LP Scenario no LTC PM	5,683	1,864	5,683	1.00	1,864	1.00
G	LP Scenario with LTC AM			5,537	1.00	1,227	1.00
H	LP Scenario with LTC PM			5,346	1.00	1,753	1.00

A2 Bean westbound diverge - with LTC (ACTUAL)



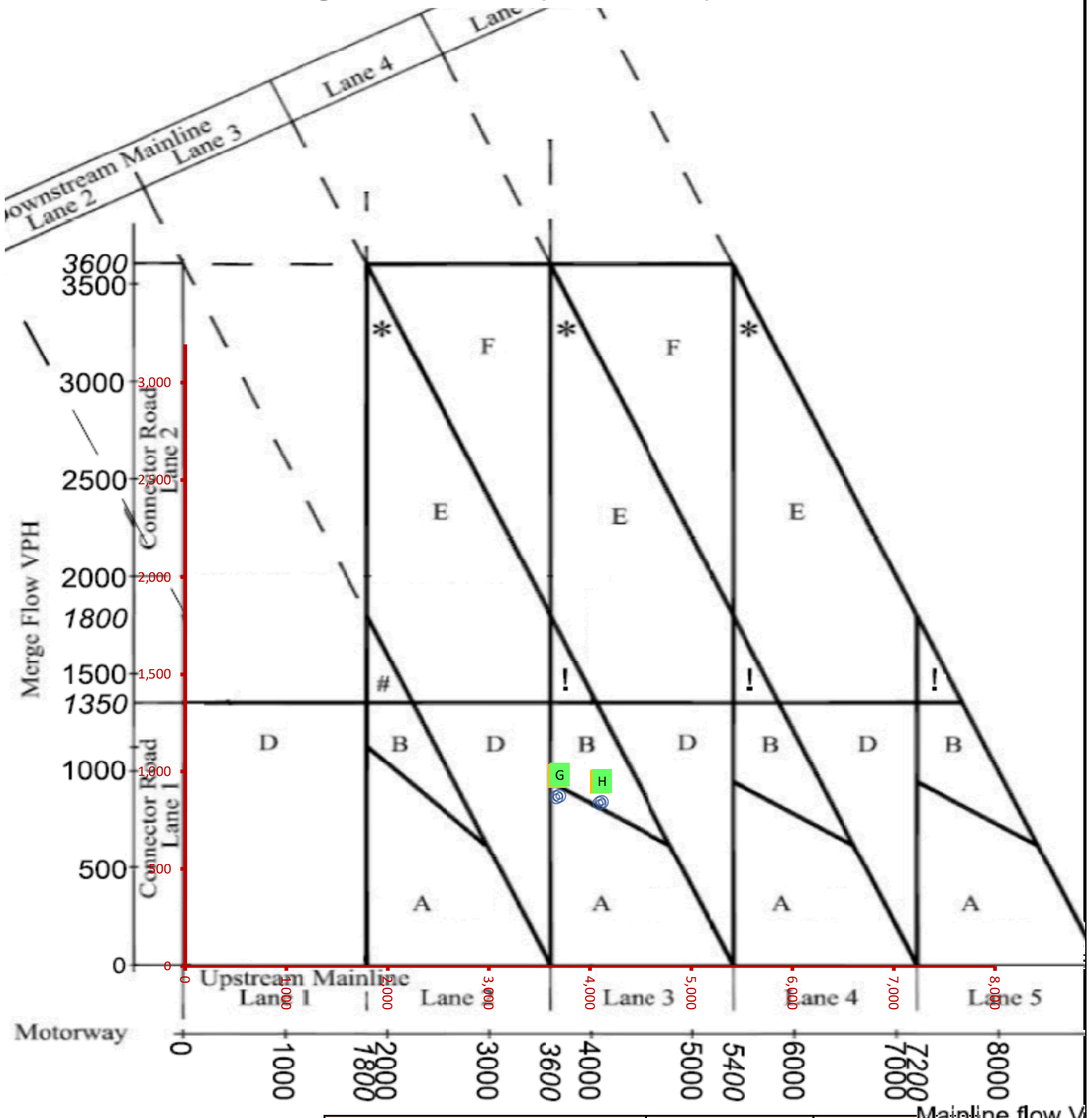
Sc							
A	Ref no LTC AM			5,931	1.00	1,315	1.00
B	Ref no LTC PM			5,563	1.00	1,825	1.00
C	Ref with LTC AM	5,445	1,207	5,445	1.00	1,207	1.00
D	Ref with LTC PM	5,216	1,711	5,216	1.00	1,711	1.00
E	LP Scenario no LTC AM			6,011	1.00	1,332	1.00
F	LP Scenario no LTC PM			5,683	1.00	1,864	1.00
G	LP Scenario with LTC AM	5,537	1,227	5,537	1.00	1,227	1.00
H	LP Scenario with LTC PM	5,346	1,753	5,346	1.00	1,753	1.00

J3 northbound merge - no LTC (DEMAND)



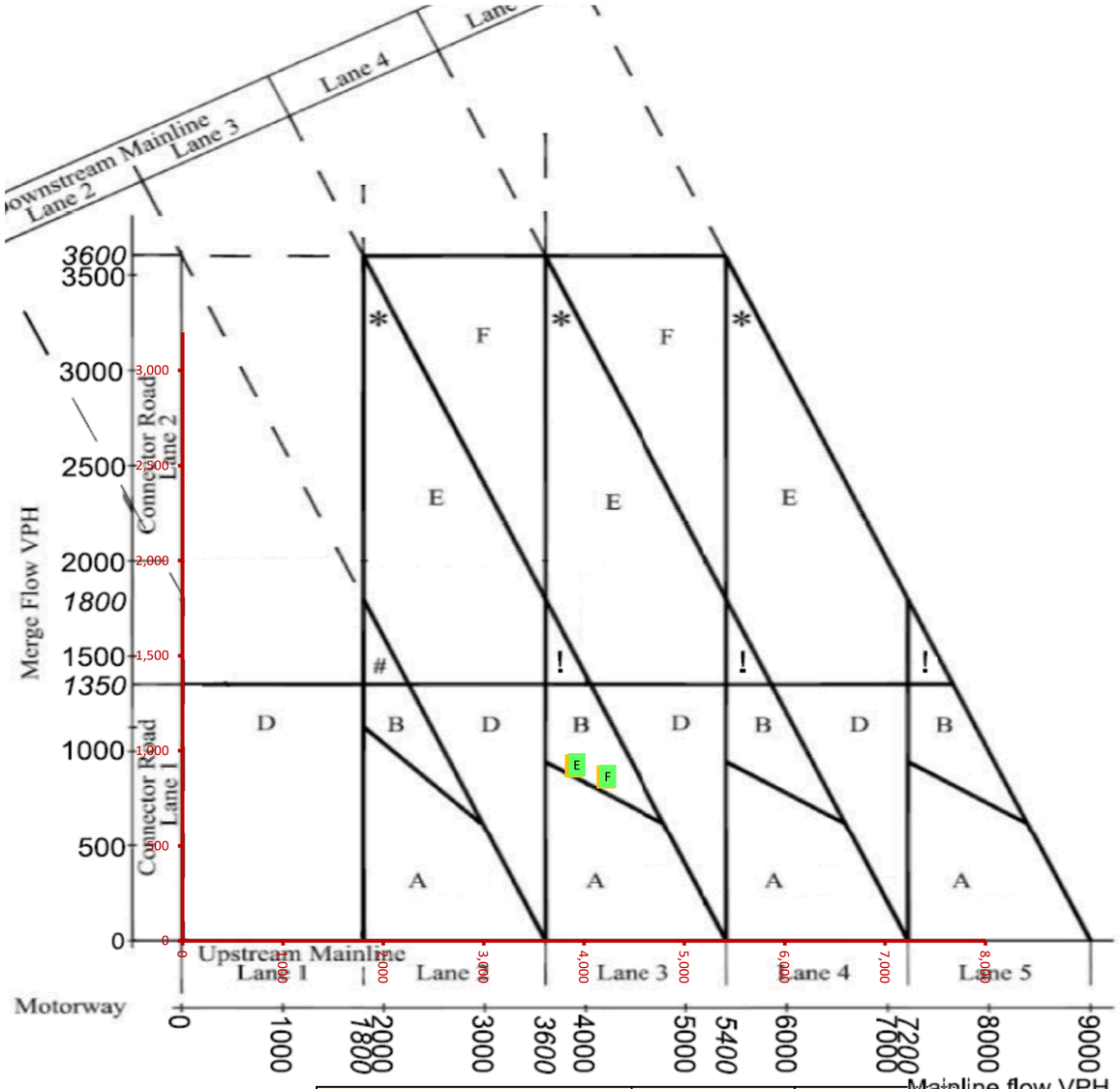
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	3,898	920	3,898	1.00	920	1.00
B	Ref no LTC PM	4,214	862	4,214	1.00	862	1.00
C	Ref with LTC AM			3,671	1.00	867	1.00
D	Ref with LTC PM			4,095	1.00	838	1.00
E	LP Scenario no LTC AM	3,928	928	3,928	1.00	928	1.00
F	LP Scenario no LTC PM	4,237	867	4,237	1.00	867	1.00
G	LP Scenario with LTC AM			3,702	1.00	874	1.00
H	LP Scenario with LTC PM			4,118	1.00	842	1.00

J3 northbound merge - with LTC (DEMAND)



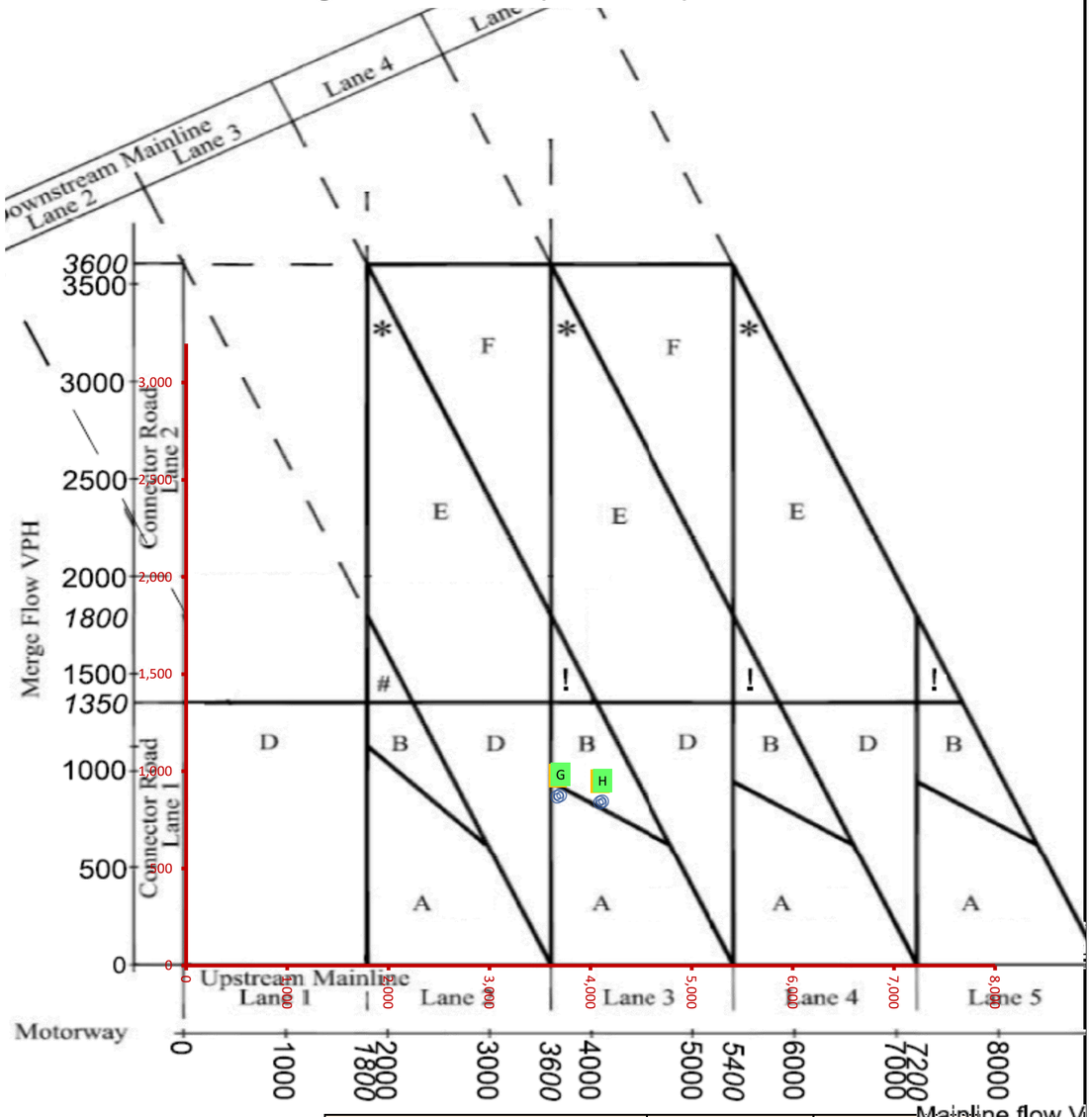
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			3,898	1.00	920	1.00
B	Ref no LTC PM			4,214	1.00	862	1.00
C	Ref with LTC AM	3,671	867	3,671	1.00	867	1.00
D	Ref with LTC PM	4,095	838	4,095	1.00	838	1.00
E	LP Scenario no LTC AM			3,928	1.00	928	1.00
F	LP Scenario no LTC PM			4,237	1.00	867	1.00
G	LP Scenario with LTC AM	3,702	874	3,702	1.00	874	1.00
H	LP Scenario with LTC PM	4,118	842	4,118	1.00	842	1.00

J3 northbound merge - no LTC (ACTUAL)



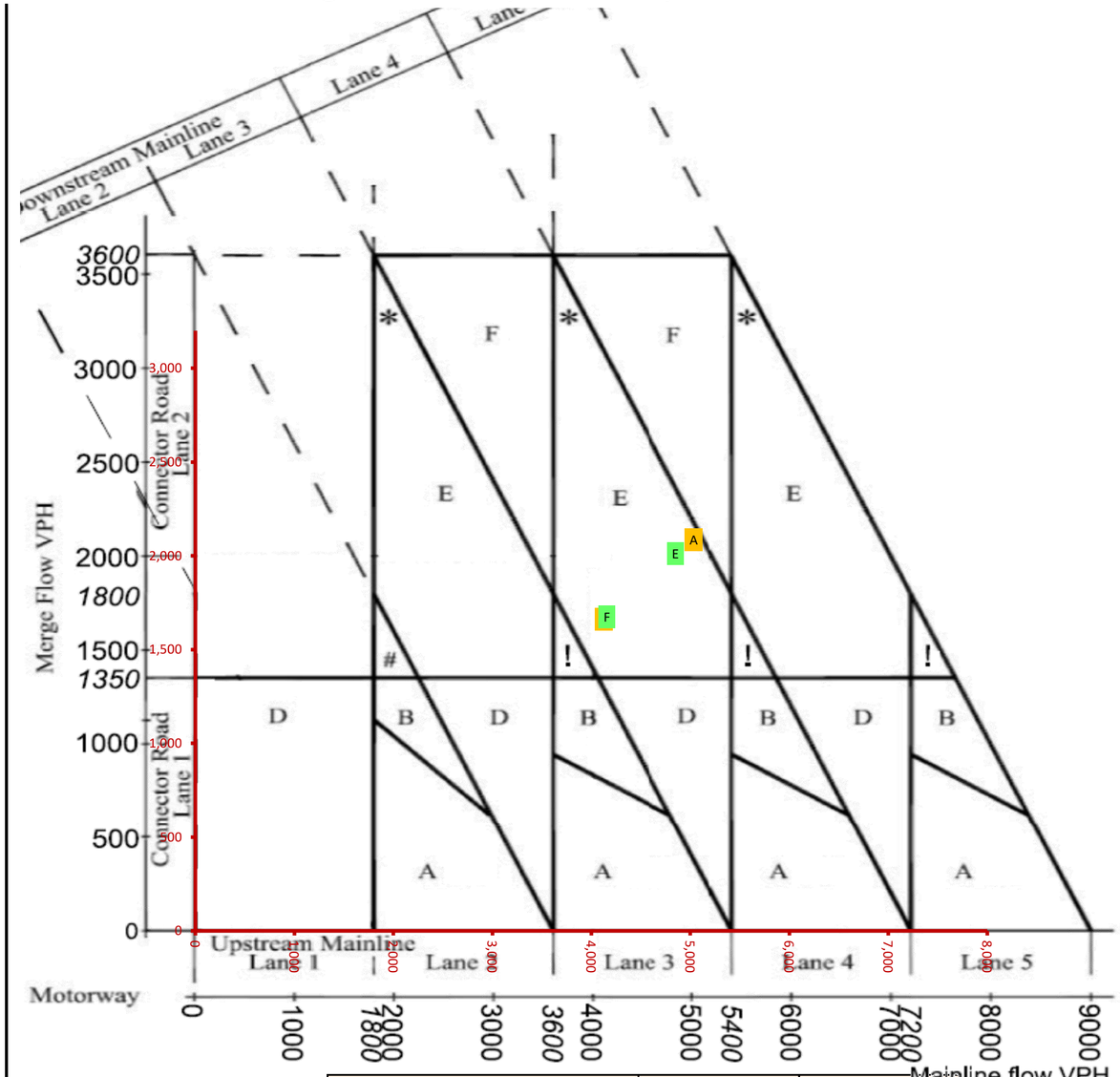
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	3,898	920	3,898	1.00	920	1.00
B	Ref no LTC PM	4,214	862	4,214	1.00	862	1.00
C	Ref with LTC AM			3,671	1.00	867	1.00
D	Ref with LTC PM			4,095	1.00	838	1.00
E	LP Scenario no LTC AM	3,928	928	3,928	1.00	928	1.00
F	LP Scenario no LTC PM	4,237	867	4,237	1.00	867	1.00
G	LP Scenario with LTC AM			3,702	1.00	874	1.00
H	LP Scenario with LTC PM			4,118	1.00	842	1.00

J3 northbound merge - with LTC (ACTUAL)



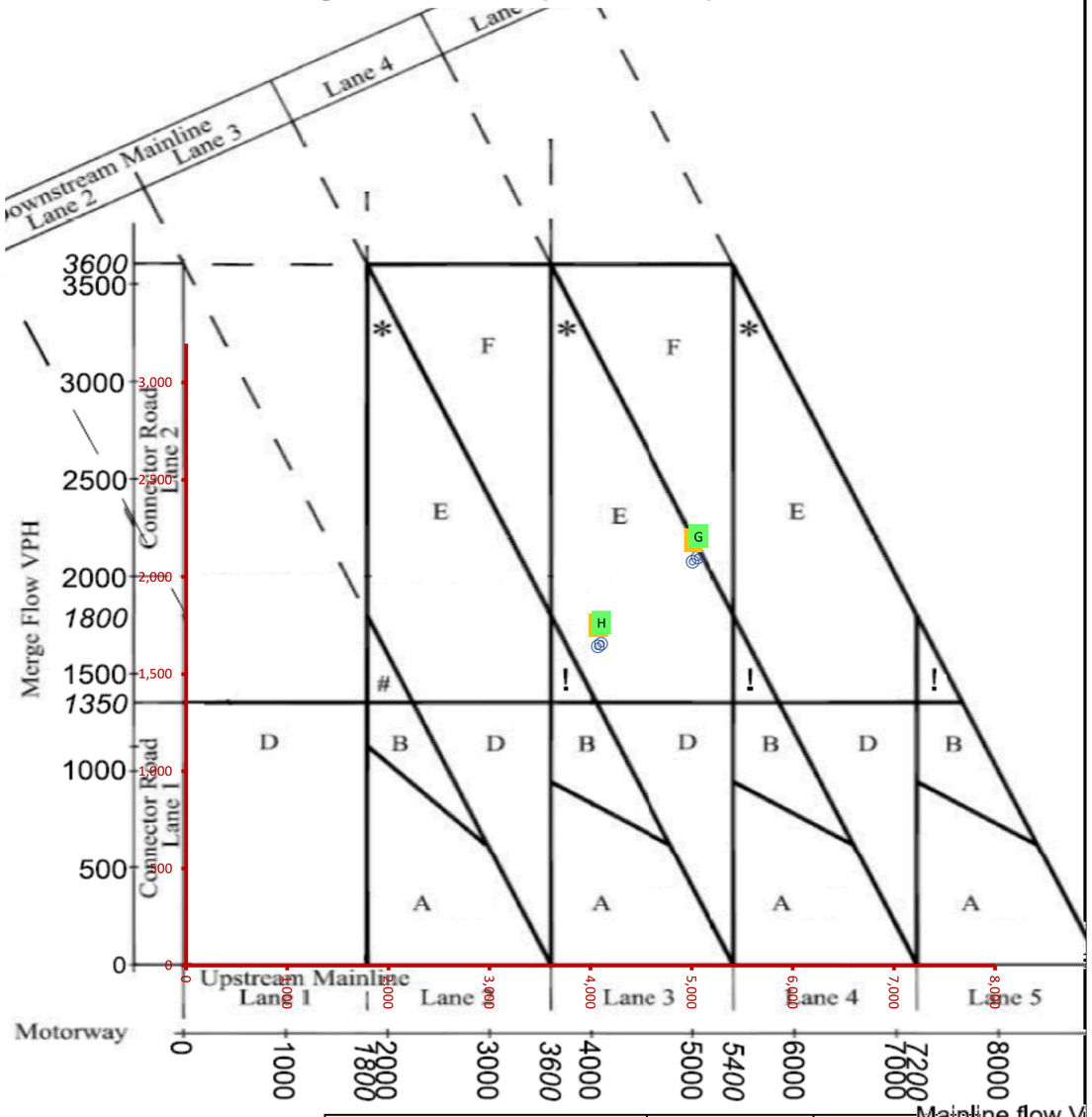
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			3,898	1.00	920	1.00
B	Ref no LTC PM			4,214	1.00	862	1.00
C	Ref with LTC AM	3,671	867	3,671	1.00	867	1.00
D	Ref with LTC PM	4,095	838	4,095	1.00	838	1.00
E	LP Scenario no LTC AM			3,928	1.00	928	1.00
F	LP Scenario no LTC PM			4,237	1.00	867	1.00
G	LP Scenario with LTC AM	3,702	874	3,702	1.00	874	1.00
H	LP Scenario with LTC PM	4,118	842	4,118	1.00	842	1.00

J3 southbound merge - no LTC (DEMAND)



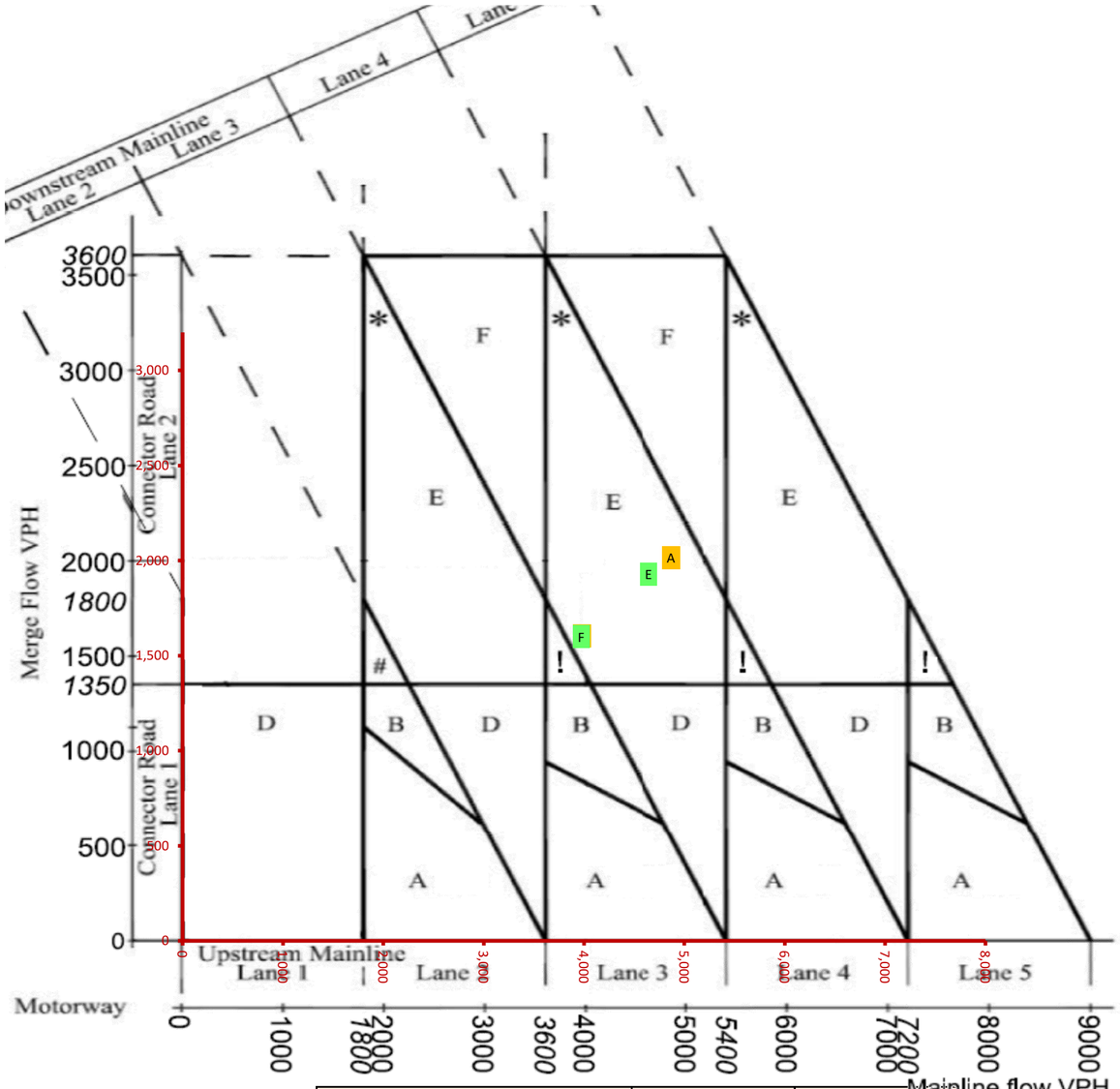
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,034	2,086	4,795	1.05	1,896	1.10
B	Ref no LTC PM	4,126	1,661	4,126	1.00	1,661	1.00
C	Ref with LTC AM			4,772	1.05	1,887	1.10
D	Ref with LTC PM			4,074	1.00	1,641	1.00
E	LP Scenario no LTC AM	4,847	2,013	4,847	1.00	1,917	1.05
F	LP Scenario no LTC PM	4,158	1,675	4,158	1.00	1,675	1.00
G	LP Scenario with LTC AM			4,823	1.05	1,907	1.10
H	LP Scenario with LTC PM			4,106	1.00	1,654	1.00

J3 southbound merge - with LTC (DEMAND)



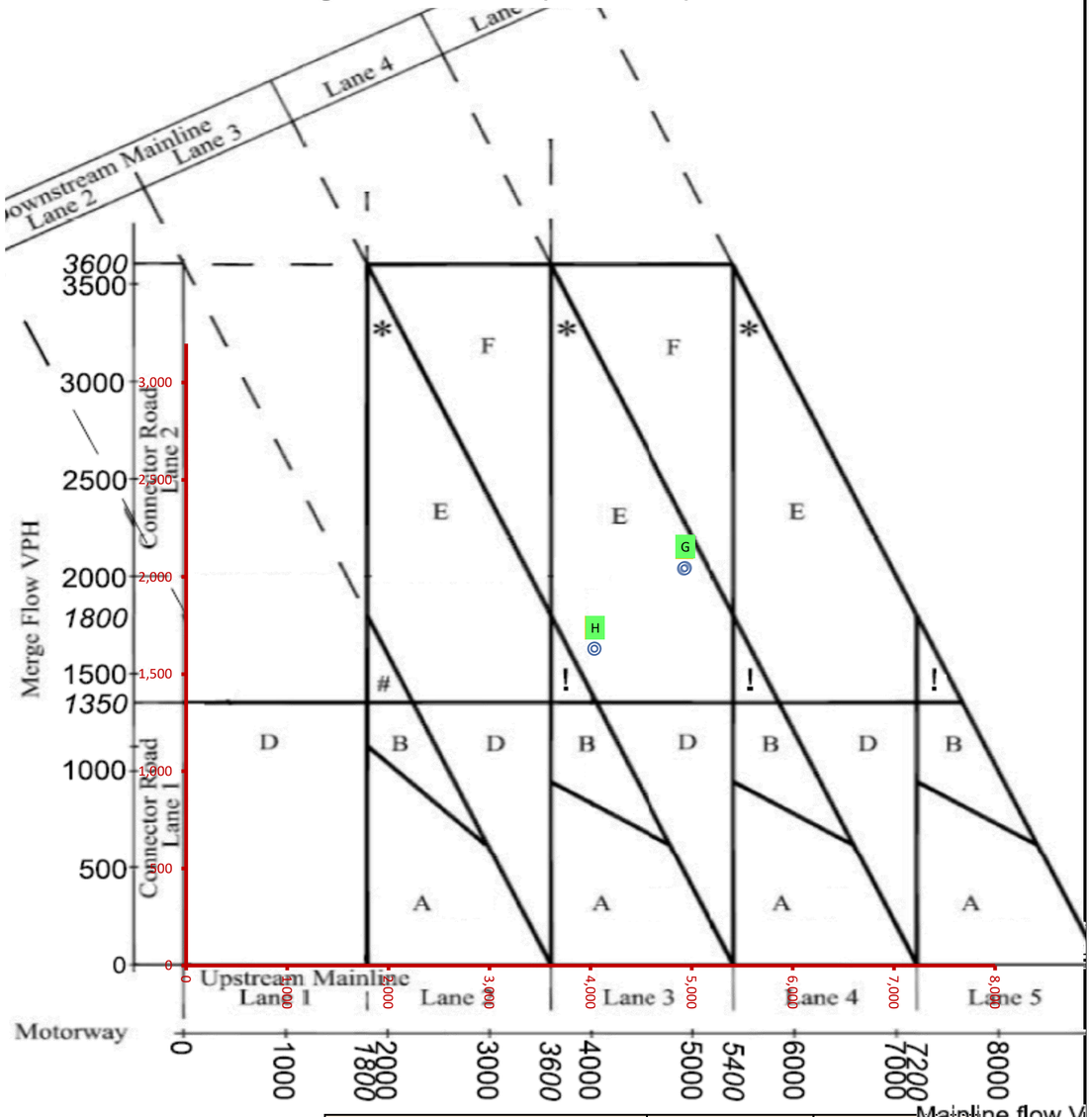
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,795	1.05	1,896	1.10
B	Ref no LTC PM			4,126	1.00	1,661	1.00
C	Ref with LTC AM	5,011	2,076	4,772	1.05	1,887	1.10
D	Ref with LTC PM	4,074	1,641	4,074	1.00	1,641	1.00
E	LP Scenario no LTC AM			4,847	1.00	1,917	1.05
F	LP Scenario no LTC PM			4,158	1.00	1,675	1.00
G	LP Scenario with LTC AM	5,064	2,098	4,823	1.05	1,907	1.10
H	LP Scenario with LTC PM	4,106	1,654	4,106	1.00	1,654	1.00

J3 southbound merge - no LTC (ACTUAL)



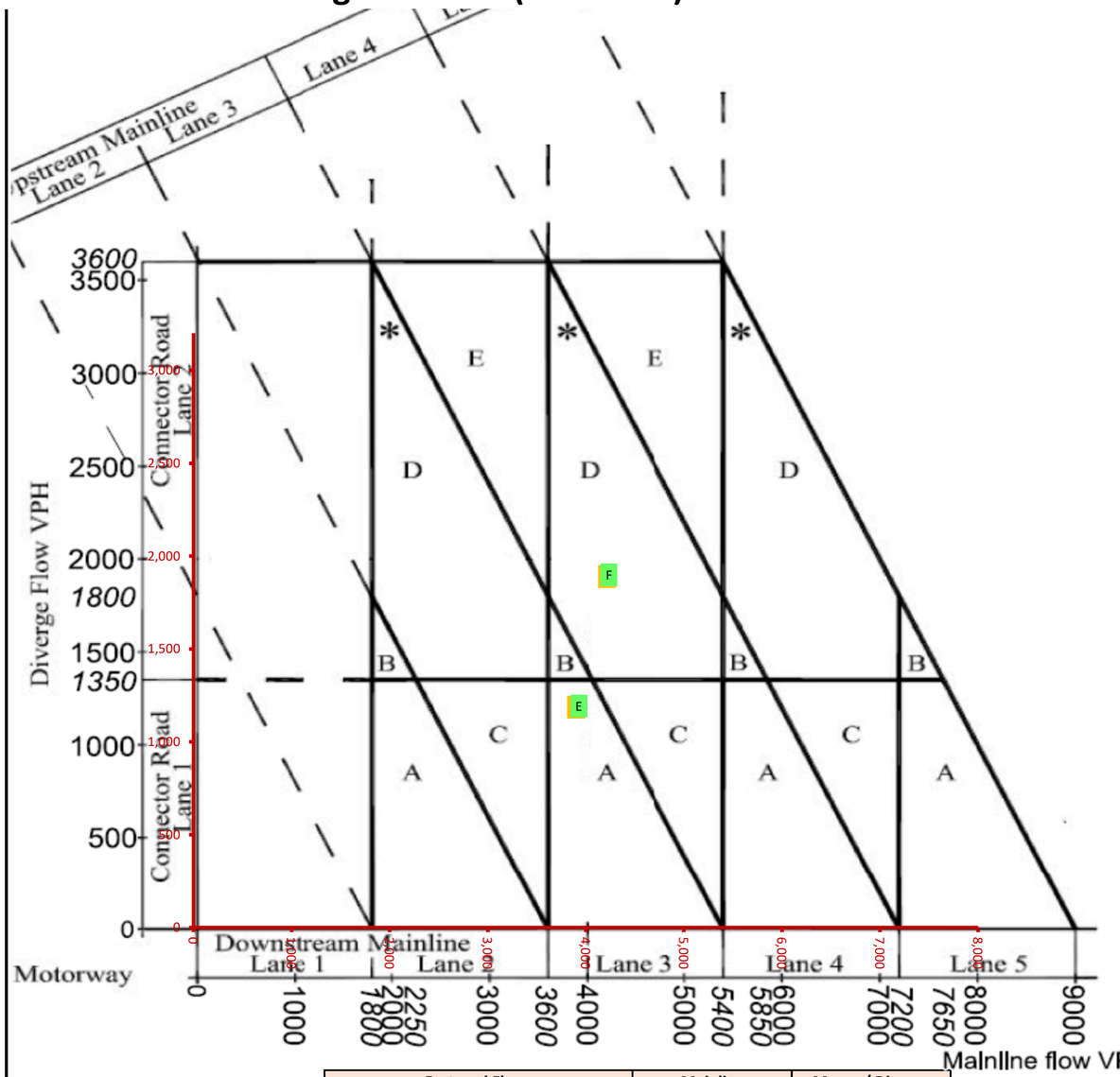
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,865	2,016	4,633	1.05	1,832	1.10
B	Ref no LTC PM	3,982	1,604	3,982	1.00	1,604	1.00
C	Ref with LTC AM			4,690	1.05	1,855	1.10
D	Ref with LTC PM			4,040	1.00	1,627	1.00
E	LP Scenario no LTC AM	4,642	1,927	4,642	1.00	1,836	1.05
F	LP Scenario no LTC PM	3,971	1,599	3,971	1.00	1,599	1.00
G	LP Scenario with LTC AM			4,701	1.05	1,859	1.10
H	LP Scenario with LTC PM			4,044	1.00	1,629	1.00

J3 southbound merge - with LTC (ACTUAL)



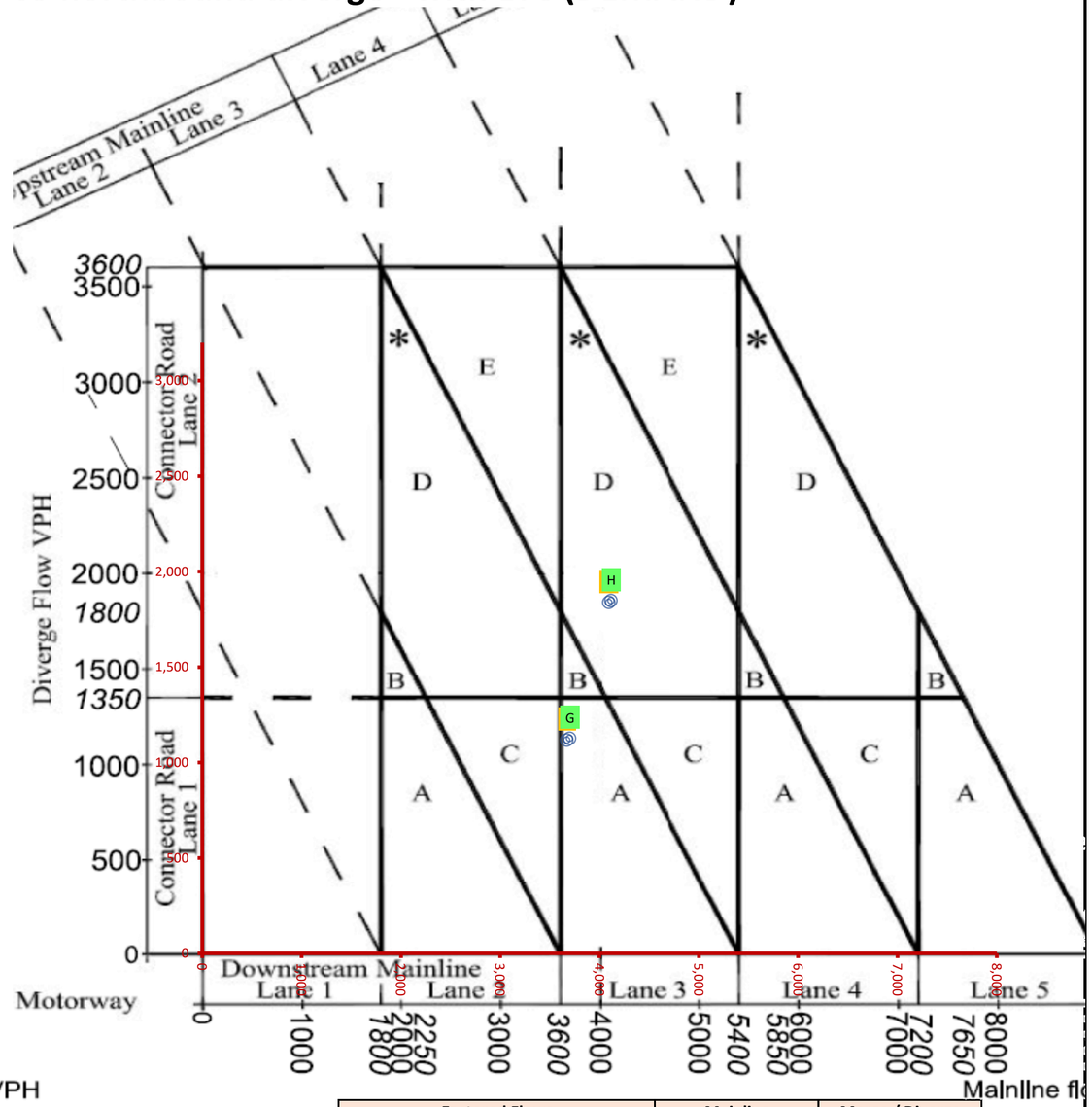
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,633	1.05	1,832	1.10
B	Ref no LTC PM			3,982	1.00	1,604	1.00
C	Ref with LTC AM	4,924	2,040	4,690	1.05	1,855	1.10
D	Ref with LTC PM	4,040	1,627	4,040	1.00	1,627	1.00
E	LP Scenario no LTC AM			4,642	1.00	1,836	1.05
F	LP Scenario no LTC PM			3,971	1.00	1,599	1.00
G	LP Scenario with LTC AM	4,936	2,045	4,701	1.05	1,859	1.10
H	LP Scenario with LTC PM	4,044	1,629	4,044	1.00	1,629	1.00

J3 northbound diverge - no LTC (DEMAND)



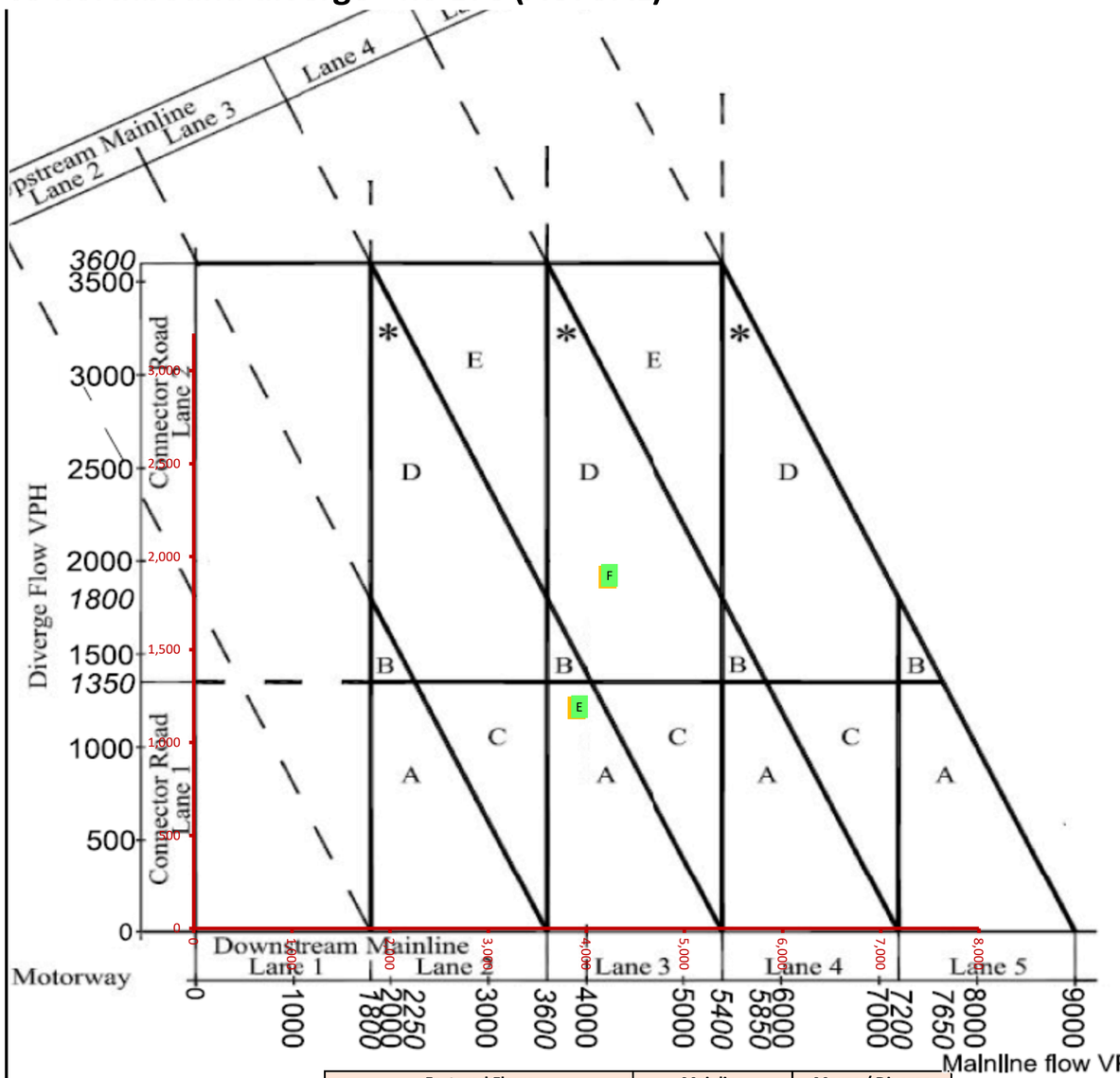
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	3,898	1,185	3,898	1.00	1,185	1.00
B	Ref no LTC PM	4,214	1,889	4,214	1.00	1,889	1.00
C	Ref with LTC AM			3,671	1.00	1,116	1.00
D	Ref with LTC PM			4,095	1.00	1,836	1.00
E	LP Scenario no LTC AM	3,928	1,194	3,928	1.00	1,194	1.00
F	LP Scenario no LTC PM	4,237	1,899	4,237	1.00	1,899	1.00
G	LP Scenario with LTC AM			3,702	1.00	1,126	1.00
H	LP Scenario with LTC PM			4,118	1.00	1,846	1.00

J3 northbound diverge - with LTC (DEMAND)



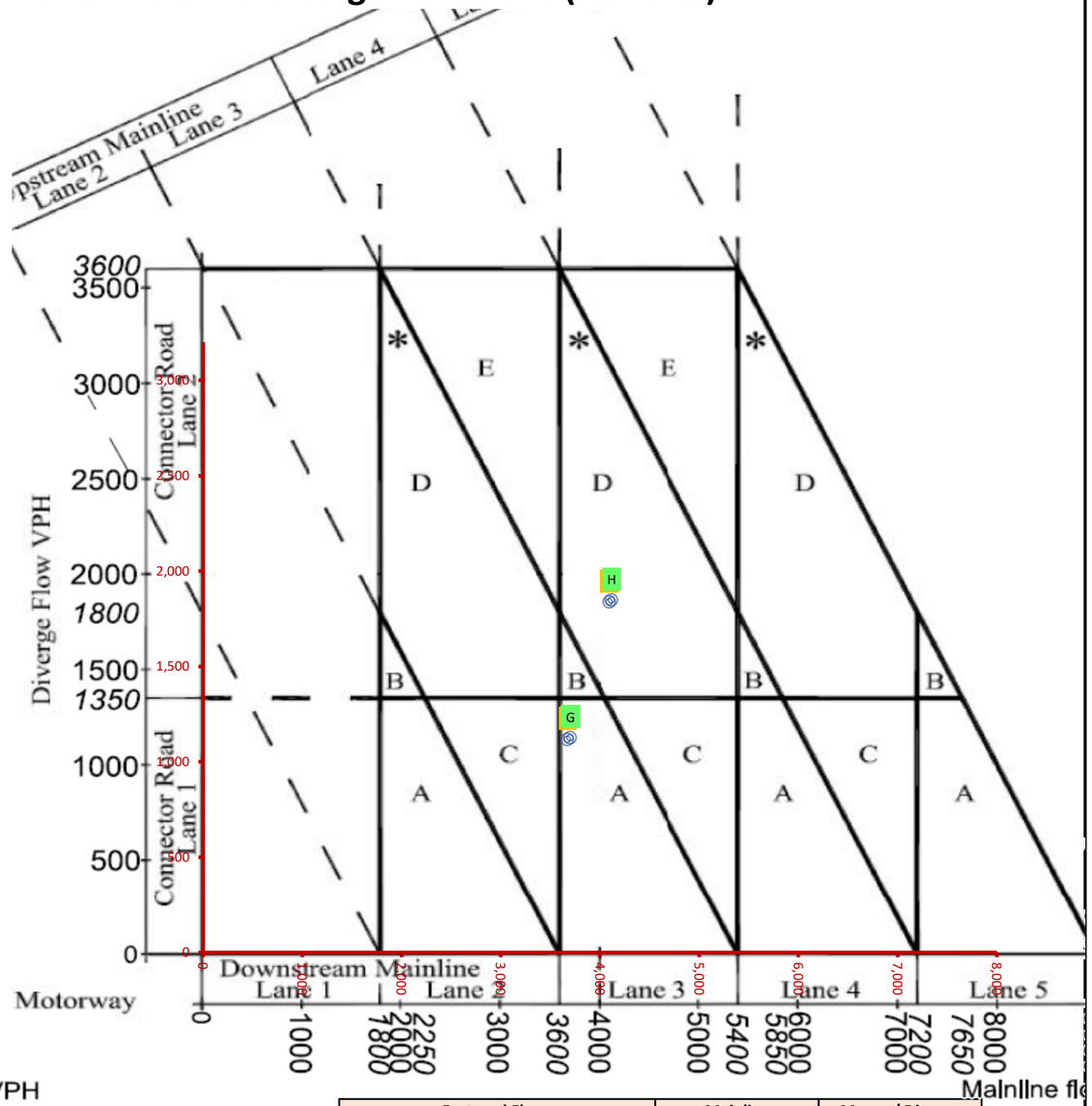
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			3,898	1.00	1,185	1.00
B	Ref no LTC PM			4,214	1.00	1,889	1.00
C	Ref with LTC AM	3,671	1,116	3,671	1.00	1,116	1.00
D	Ref with LTC PM	4,095	1,836	4,095	1.00	1,836	1.00
E	LP Scenario no LTC AM			3,928	1.00	1,194	1.00
F	LP Scenario no LTC PM			4,237	1.00	1,899	1.00
G	LP Scenario with LTC AM	3,702	1,126	3,702	1.00	1,126	1.00
H	LP Scenario with LTC PM	4,118	1,846	4,118	1.00	1,846	1.00

J3 northbound diverge - no LTC (ACTUAL)



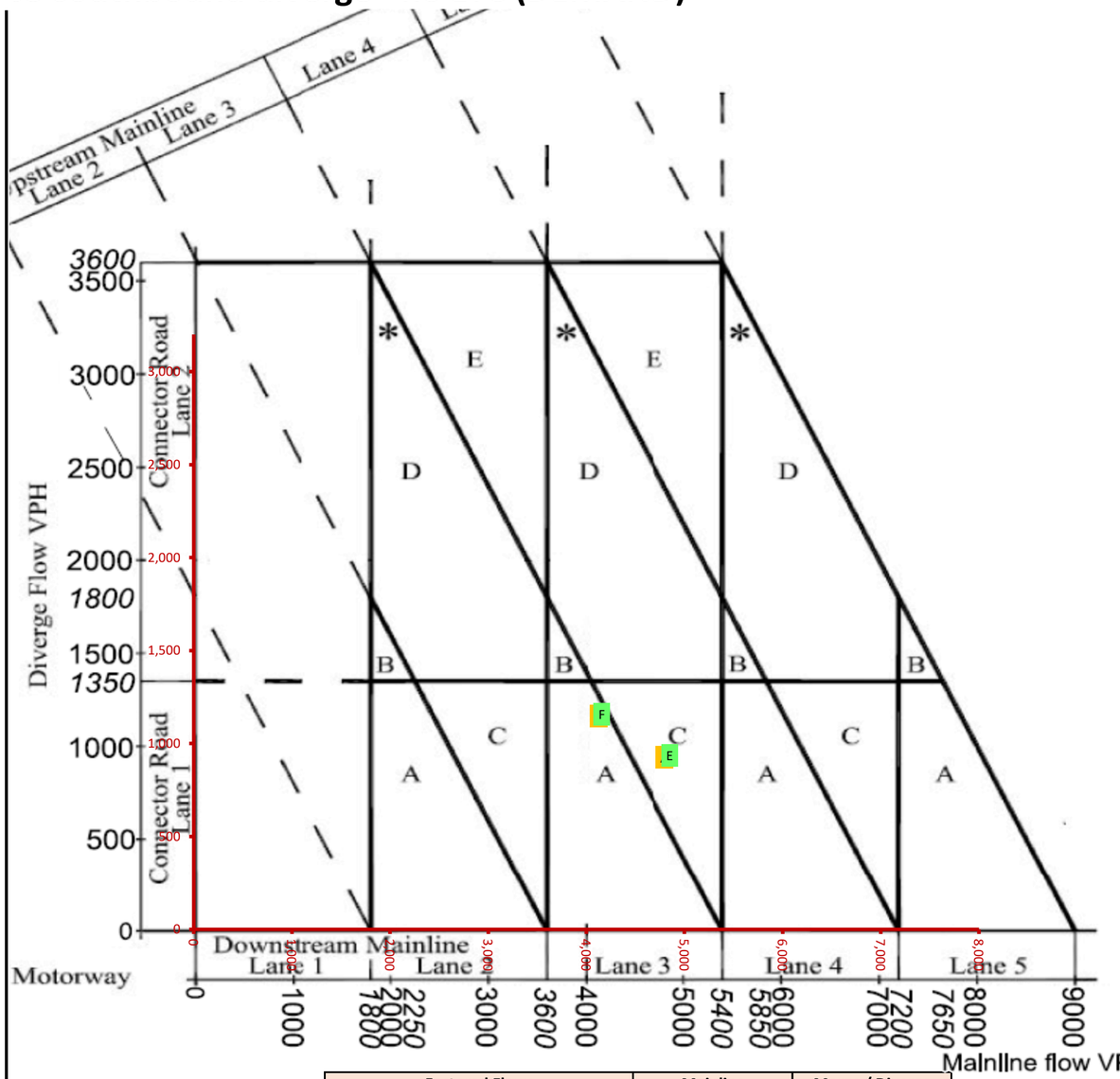
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	3,898	1,185	3,898	1.00	1,185	1.00
B	Ref no LTC PM	4,214	1,889	4,214	1.00	1,889	1.00
C	Ref with LTC AM			3,671	1.00	1,116	1.00
D	Ref with LTC PM			4,095	1.00	1,836	1.00
E	LP Scenario no LTC AM	3,928	1,194	3,928	1.00	1,194	1.00
F	LP Scenario no LTC PM	4,237	1,899	4,237	1.00	1,899	1.00
G	LP Scenario with LTC AM			3,702	1.00	1,126	1.00
H	LP Scenario with LTC PM			4,118	1.00	1,846	1.00

J3 northbound diverge - with LTC (ACTUAL)



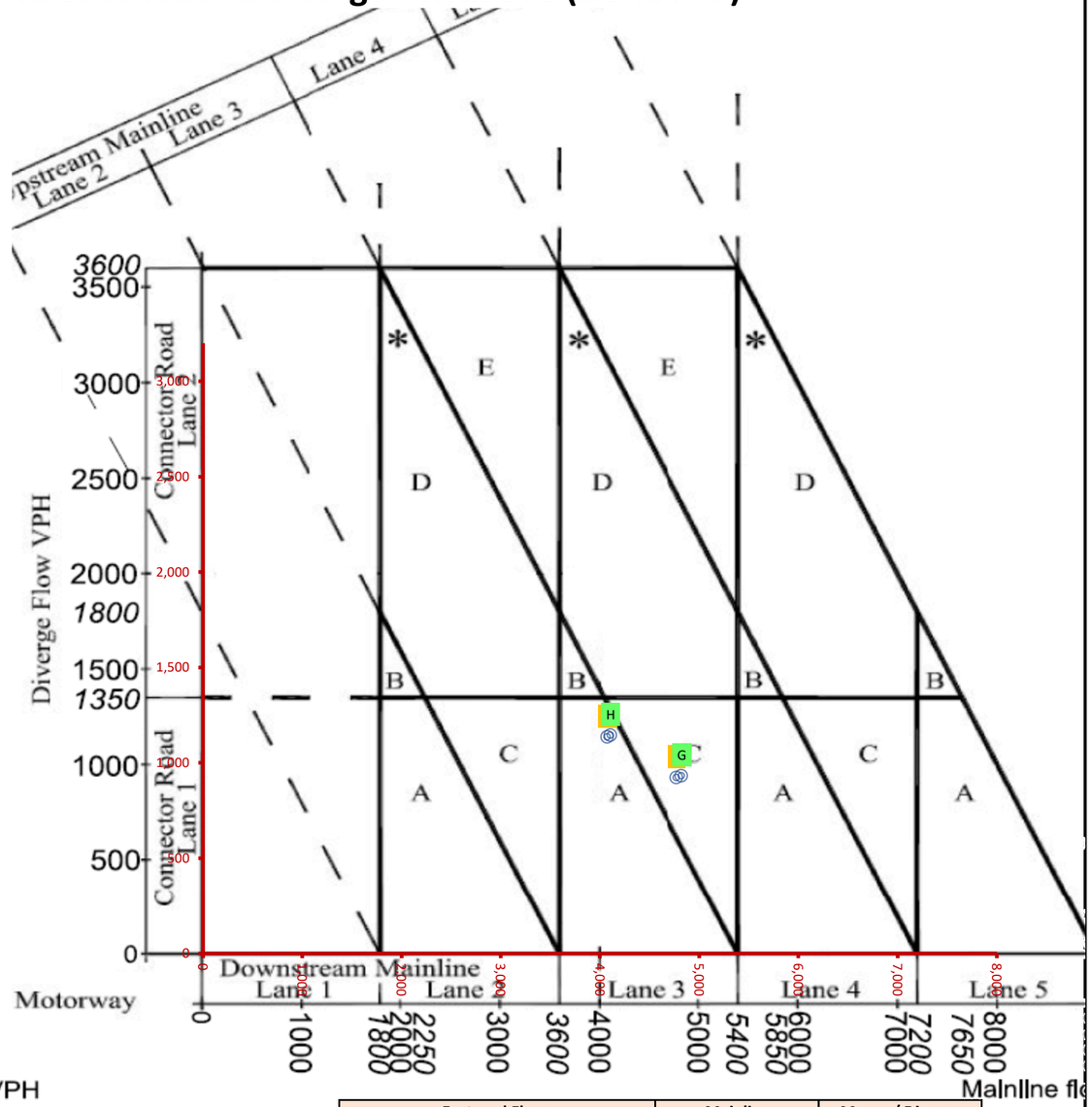
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			3,898	1.00	1,185	1.00
B	Ref no LTC PM			4,214	1.00	1,889	1.00
C	Ref with LTC AM	3,671	1,116	3,671	1.00	1,116	1.00
D	Ref with LTC PM	4,095	1,836	4,095	1.00	1,836	1.00
E	LP Scenario no LTC AM			3,928	1.00	1,194	1.00
F	LP Scenario no LTC PM			4,237	1.00	1,899	1.00
G	LP Scenario with LTC AM	3,702	1,126	3,702	1.00	1,126	1.00
H	LP Scenario with LTC PM	4,118	1,846	4,118	1.00	1,846	1.00

J3 southbound diverge - no LTC (DEMAND)



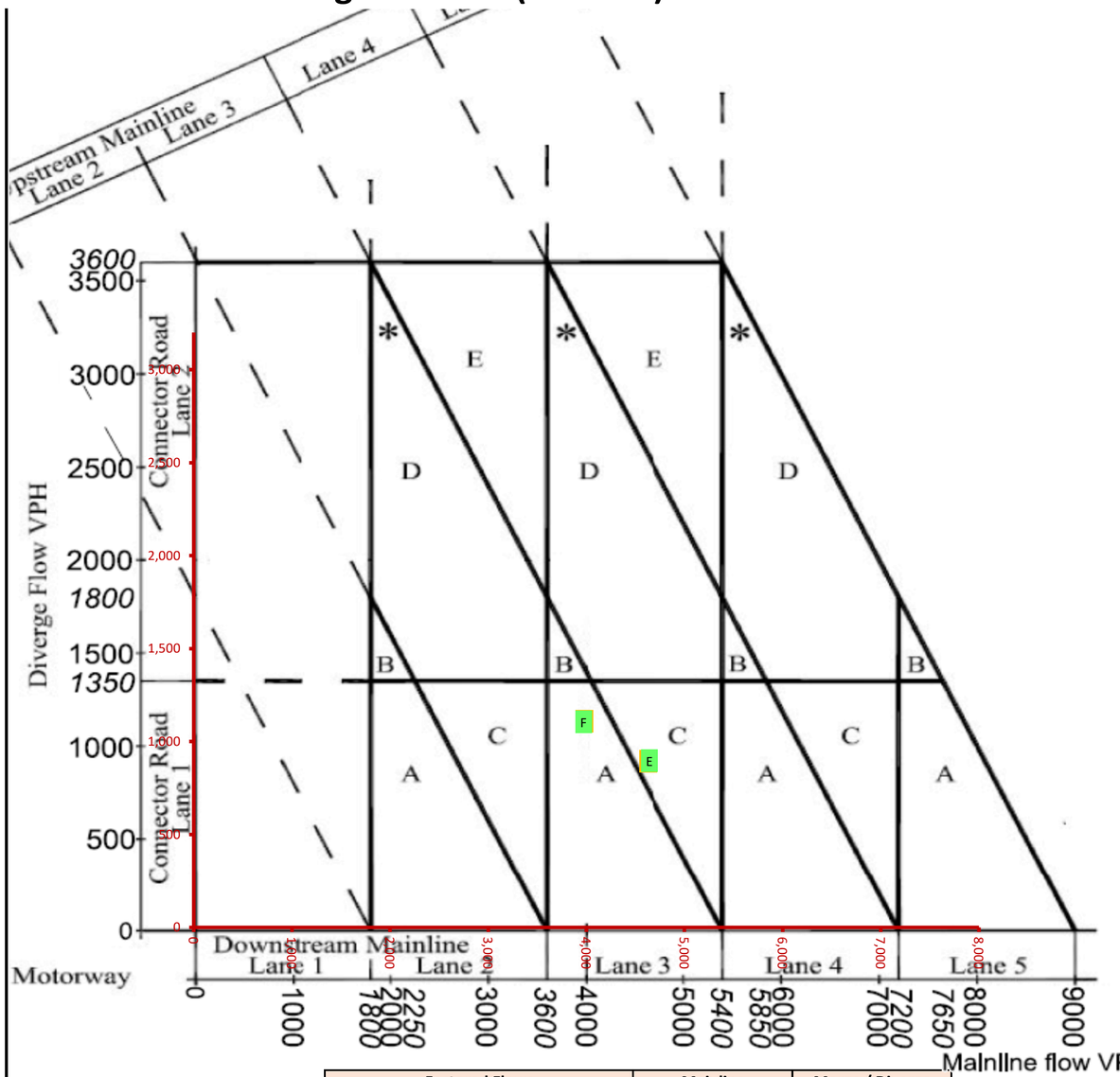
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,795	926	4,795	1.00	926	1.00
B	Ref no LTC PM	4,126	1,148	4,126	1.00	1,148	1.00
C	Ref with LTC AM			4,772	1.00	921	1.00
D	Ref with LTC PM			4,074	1.00	1,133	1.00
E	LP Scenario no LTC AM	4,847	936	4,847	1.00	936	1.00
F	LP Scenario no LTC PM	4,158	1,157	4,158	1.00	1,157	1.00
G	LP Scenario with LTC AM			4,823	1.00	931	1.00
H	LP Scenario with LTC PM			4,106	1.00	1,143	1.00

J3 southbound diverge - with LTC (DEMAND)



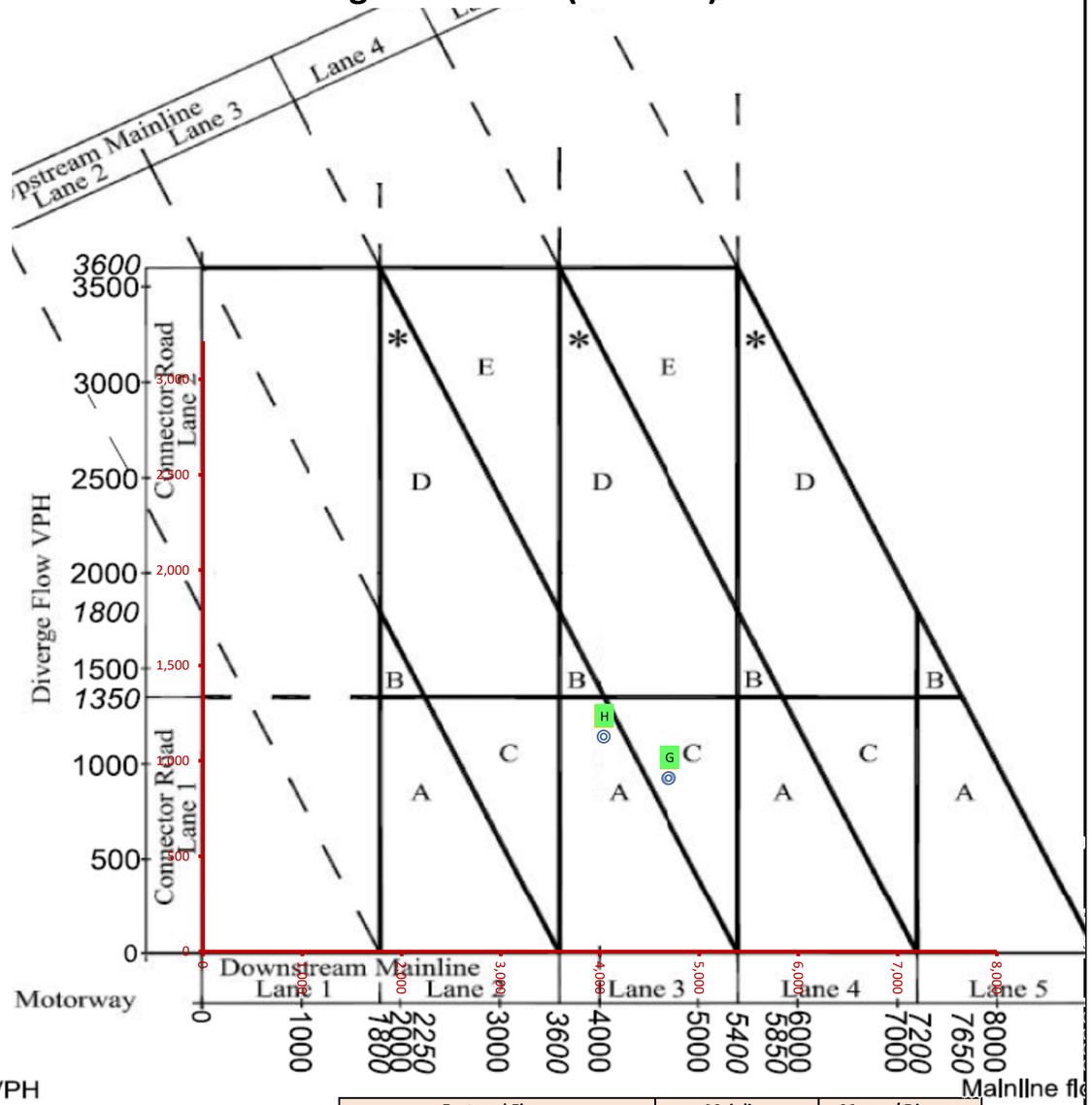
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,795	1.00	926	1.00
B	Ref no LTC PM			4,126	1.00	1,148	1.00
C	Ref with LTC AM	4,772	921	4,772	1.00	921	1.00
D	Ref with LTC PM	4,074	1,133	4,074	1.00	1,133	1.00
E	LP Scenario no LTC AM			4,847	1.00	936	1.00
F	LP Scenario no LTC PM			4,158	1.00	1,157	1.00
G	LP Scenario with LTC AM	4,823	931	4,823	1.00	931	1.00
H	LP Scenario with LTC PM	4,106	1,143	4,106	1.00	1,143	1.00

J3 southbound diverge - no LTC (ACTUAL)



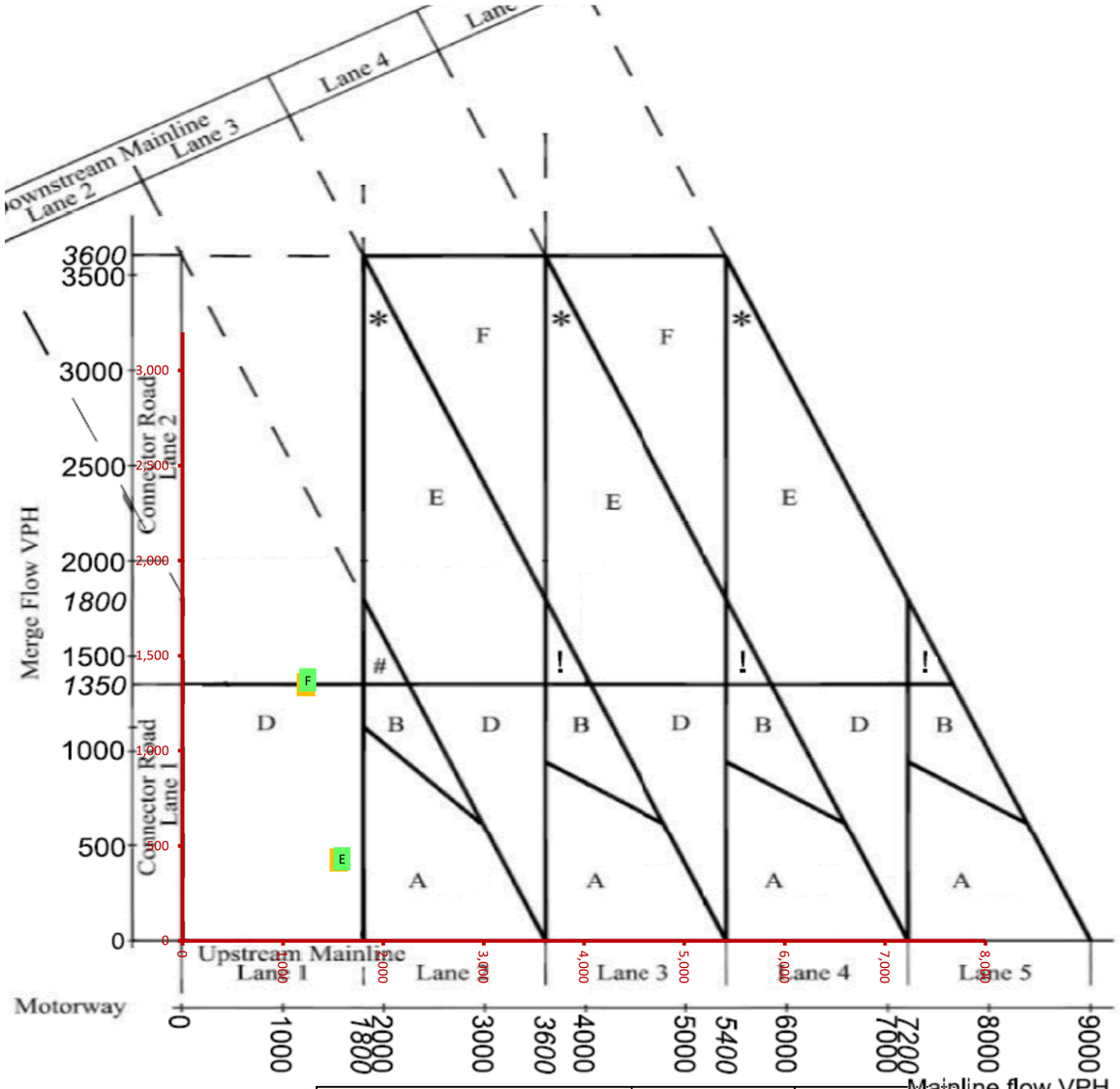
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,633	894	4,633	1.00	894	1.00
B	Ref no LTC PM	3,982	1,108	3,982	1.00	1,108	1.00
C	Ref with LTC AM			4,690	1.00	905	1.00
D	Ref with LTC PM			4,040	1.00	1,124	1.00
E	LP Scenario no LTC AM	4,642	896	4,642	1.00	896	1.00
F	LP Scenario no LTC PM	3,971	1,105	3,971	1.00	1,105	1.00
G	LP Scenario with LTC AM			4,701	1.00	907	1.00
H	LP Scenario with LTC PM			4,044	1.00	1,125	1.00

J3 southbound diverge - with LTC (ACTUAL)



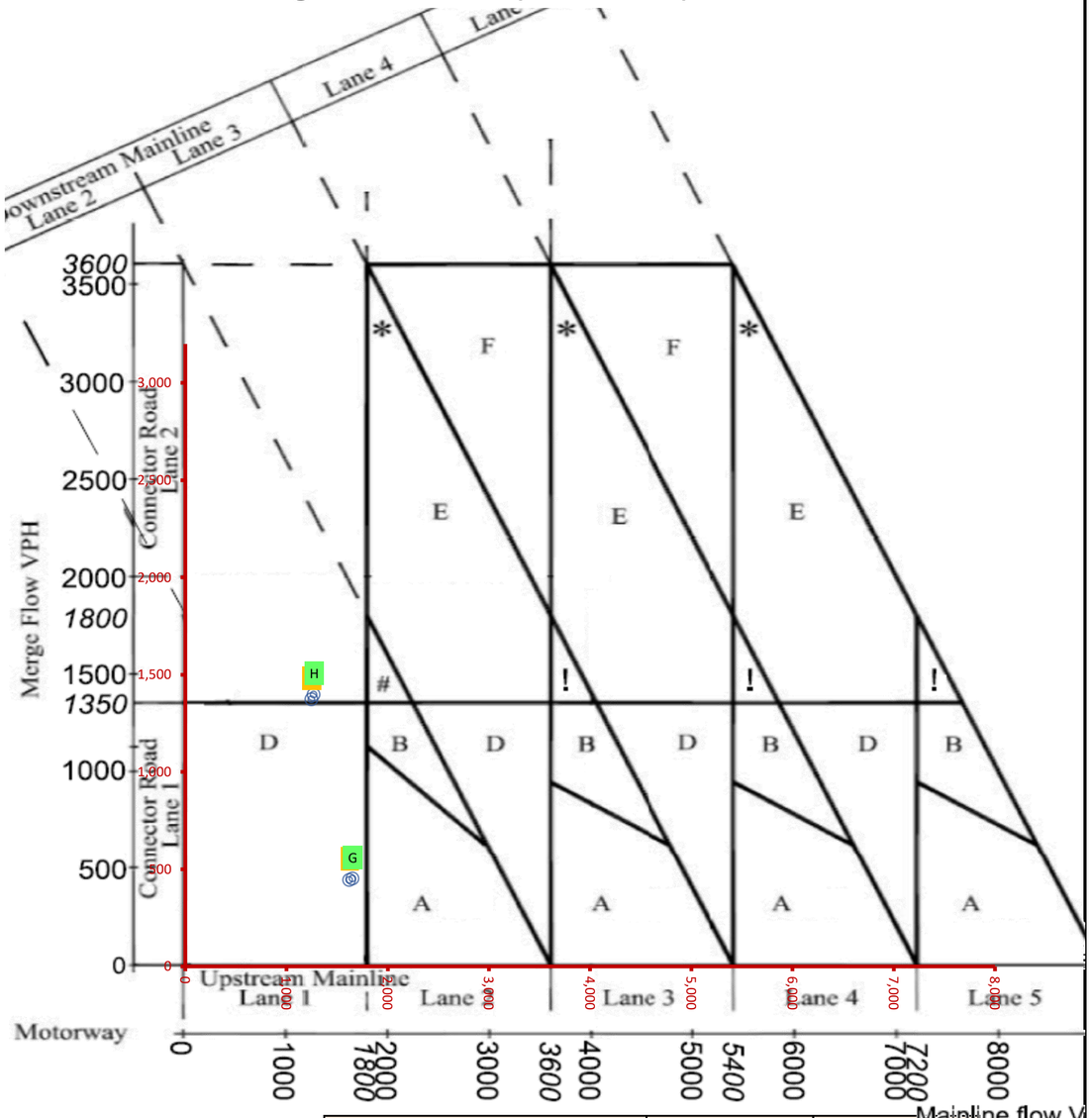
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,633	1.00	894	1.00
B	Ref no LTC PM			3,982	1.00	1,108	1.00
C	Ref with LTC AM	4,690	905	4,690	1.00	905	1.00
D	Ref with LTC PM	4,040	1,124	4,040	1.00	1,124	1.00
E	LP Scenario no LTC AM			4,642	1.00	896	1.00
F	LP Scenario no LTC PM			3,971	1.00	1,105	1.00
G	LP Scenario with LTC AM	4,701	907	4,701	1.00	907	1.00
H	LP Scenario with LTC PM	4,044	1,125	4,044	1.00	1,125	1.00

J3 eastbound merge - no LTC (DEMAND)



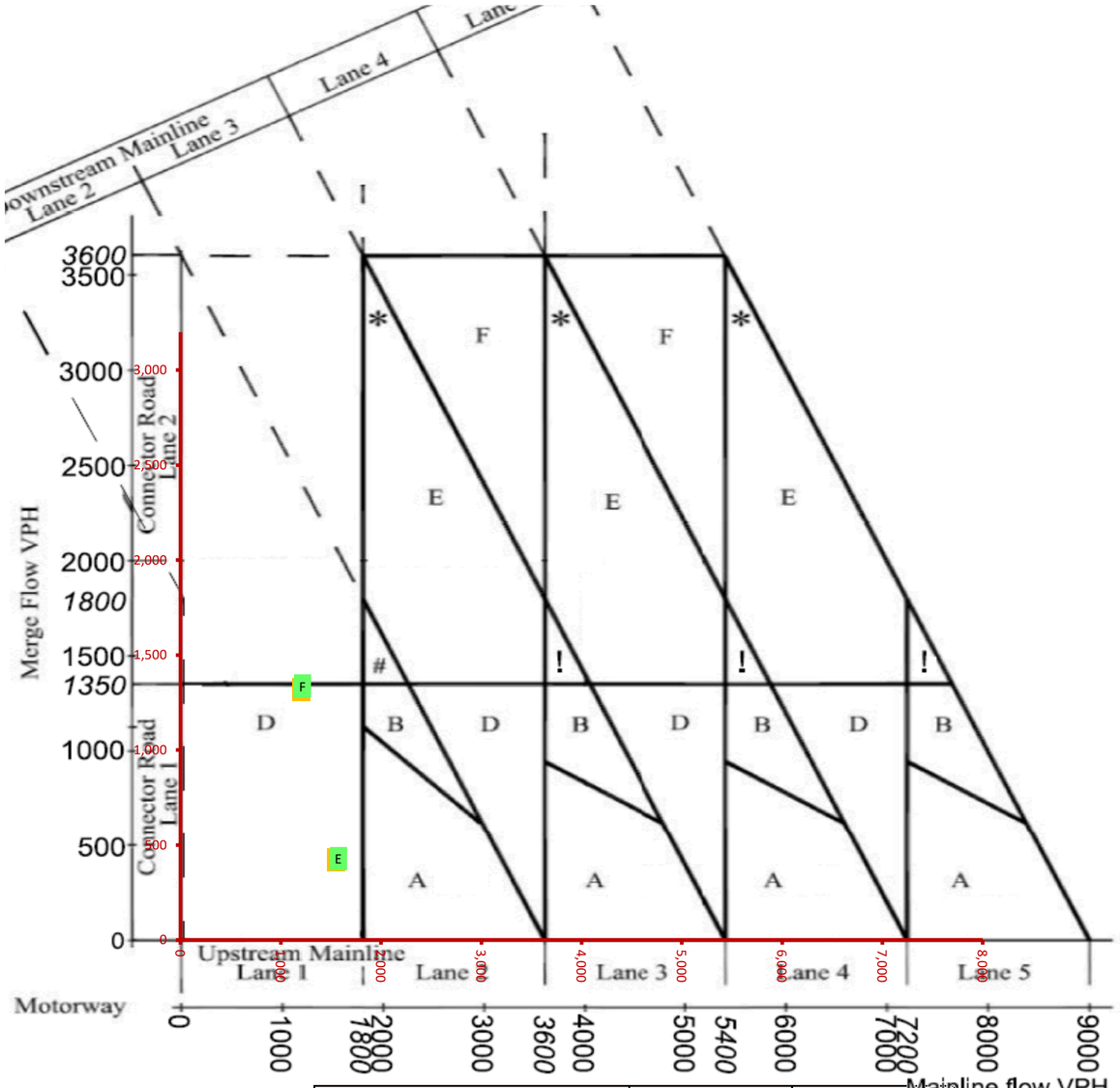
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	1,559	425	1,559	1.00	425	1.00
B	Ref no LTC PM	1,228	1,348	1,228	1.00	1,348	1.00
C	Ref with LTC AM			1,623	1.00	442	1.00
D	Ref with LTC PM			1,249	1.00	1,371	1.00
E	LP Scenario no LTC AM	1,588	433	1,588	1.00	433	1.00
F	LP Scenario no LTC PM	1,249	1,372	1,249	1.00	1,372	1.00
G	LP Scenario with LTC AM			1,653	1.00	450	1.00
H	LP Scenario with LTC PM			1,272	1.00	1,396	1.00

J3 eastbound merge - with LTC (DEMAND)



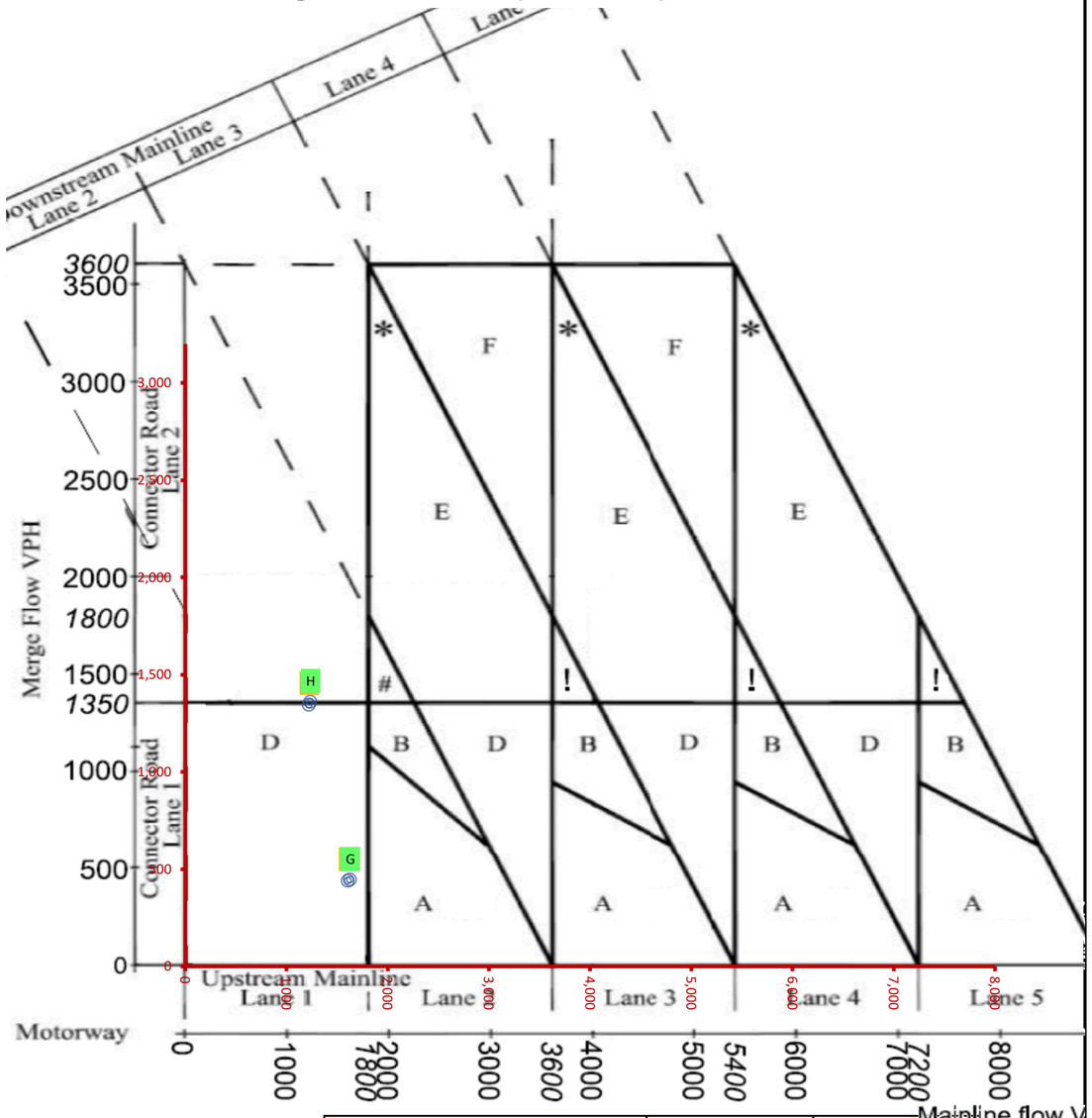
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			1,559	1.00	425	1.00
B	Ref no LTC PM			1,228	1.00	1,348	1.00
C	Ref with LTC AM	1,623	442	1,623	1.00	442	1.00
D	Ref with LTC PM	1,249	1,371	1,249	1.00	1,371	1.00
E	LP Scenario no LTC AM			1,588	1.00	433	1.00
F	LP Scenario no LTC PM			1,249	1.00	1,372	1.00
G	LP Scenario with LTC AM	1,653	450	1,653	1.00	450	1.00
H	LP Scenario with LTC PM	1,272	1,396	1,272	1.00	1,396	1.00

J3 eastbound merge - no LTC (ACTUAL)



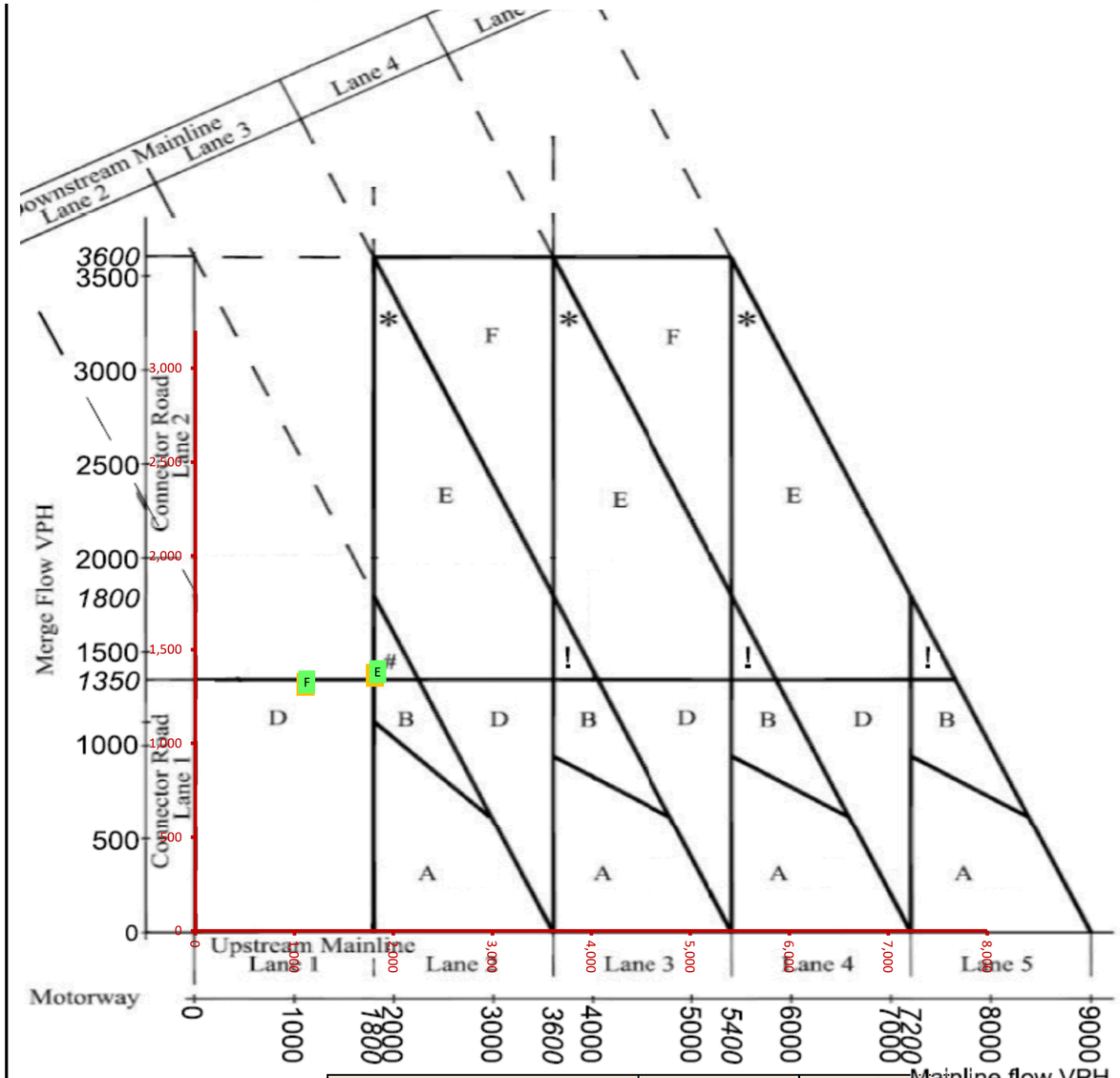
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	1,550	422	1,550	1.00	422	1.00
B	Ref no LTC PM	1,202	1,320	1,202	1.00	1,320	1.00
C	Ref with LTC AM			1,609	1.00	438	1.00
D	Ref with LTC PM			1,224	1.00	1,343	1.00
E	LP Scenario no LTC AM	1,573	428	1,573	1.00	428	1.00
F	LP Scenario no LTC PM	1,217	1,336	1,217	1.00	1,336	1.00
G	LP Scenario with LTC AM			1,630	1.00	444	1.00
H	LP Scenario with LTC PM			1,238	1.00	1,359	1.00

J3 eastbound merge - with LTC (ACTUAL)



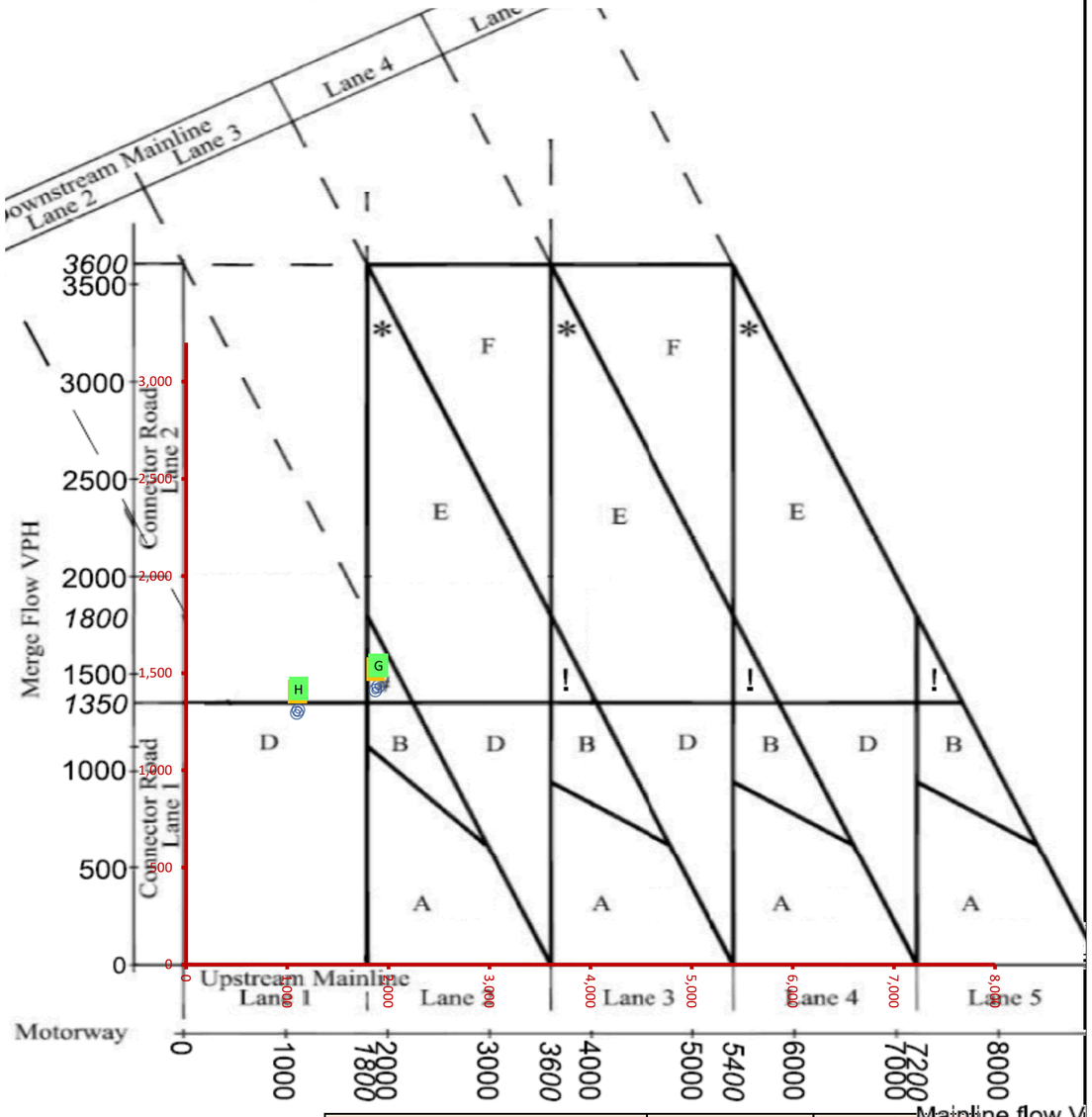
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			1,550	1.00	422	1.00
B	Ref no LTC PM			1,202	1.00	1,320	1.00
C	Ref with LTC AM	1,609	438	1,609	1.00	438	1.00
D	Ref with LTC PM	1,224	1,343	1,224	1.00	1,343	1.00
E	LP Scenario no LTC AM			1,573	1.00	428	1.00
F	LP Scenario no LTC PM			1,217	1.00	1,336	1.00
G	LP Scenario with LTC AM	1,630	444	1,630	1.00	444	1.00
H	LP Scenario with LTC PM	1,238	1,359	1,238	1.00	1,359	1.00

J3 westbound merge - no LTC (DEMAND)



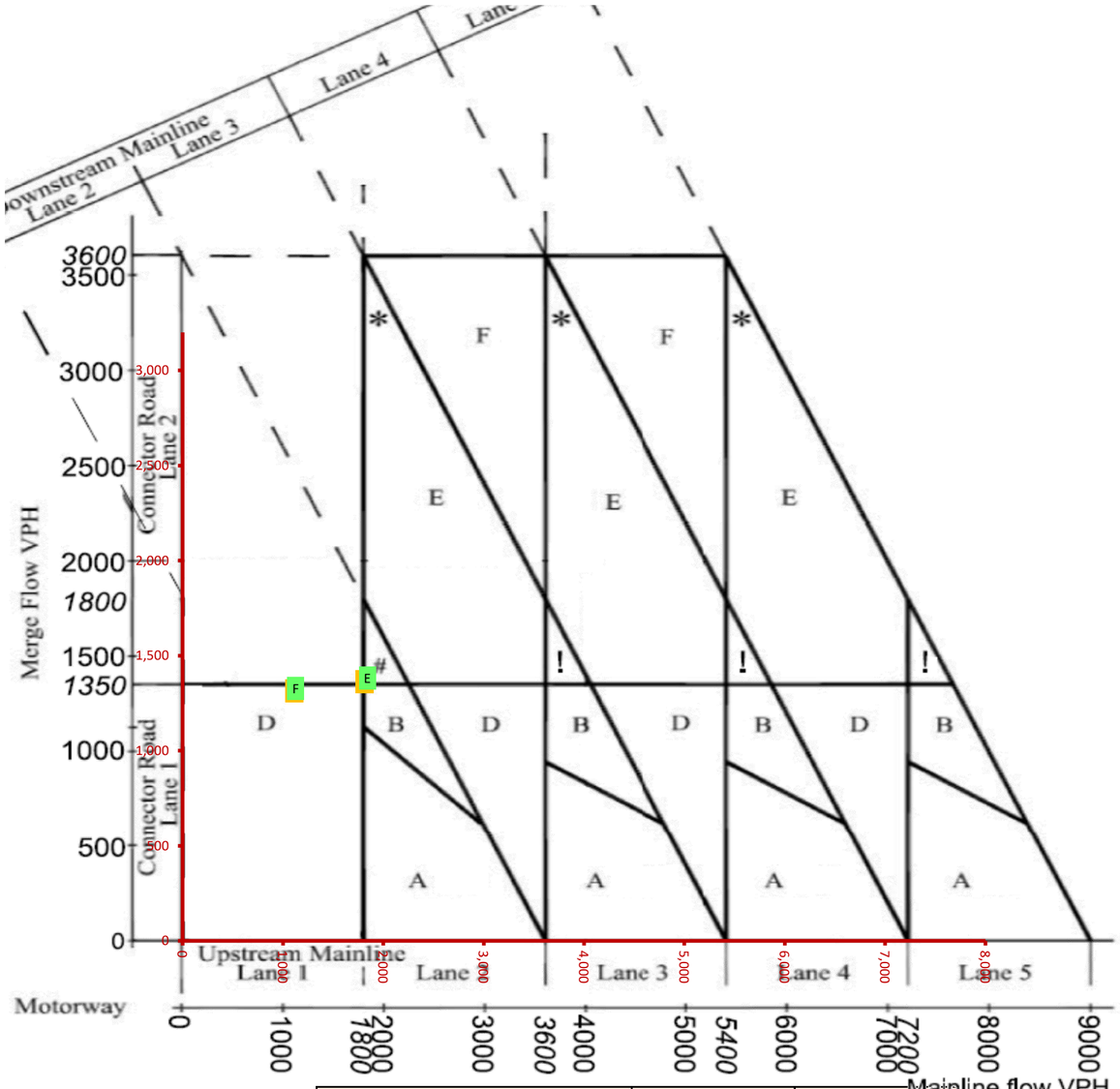
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	1,813	1,362	1,813	1.00	1,362	1.00
B	Ref no LTC PM	1,115	1,313	1,115	1.00	1,313	1.00
C	Ref with LTC AM			1,875	1.00	1,409	1.00
D	Ref with LTC PM			1,098	1.00	1,294	1.00
E	LP Scenario no LTC AM	1,841	1,383	1,841	1.00	1,383	1.00
F	LP Scenario no LTC PM	1,128	1,328	1,128	1.00	1,328	1.00
G	LP Scenario with LTC AM			1,902	1.00	1,429	1.00
H	LP Scenario with LTC PM			1,111	1.00	1,308	1.00

J3 westbound merge - with LTC (DEMAND)



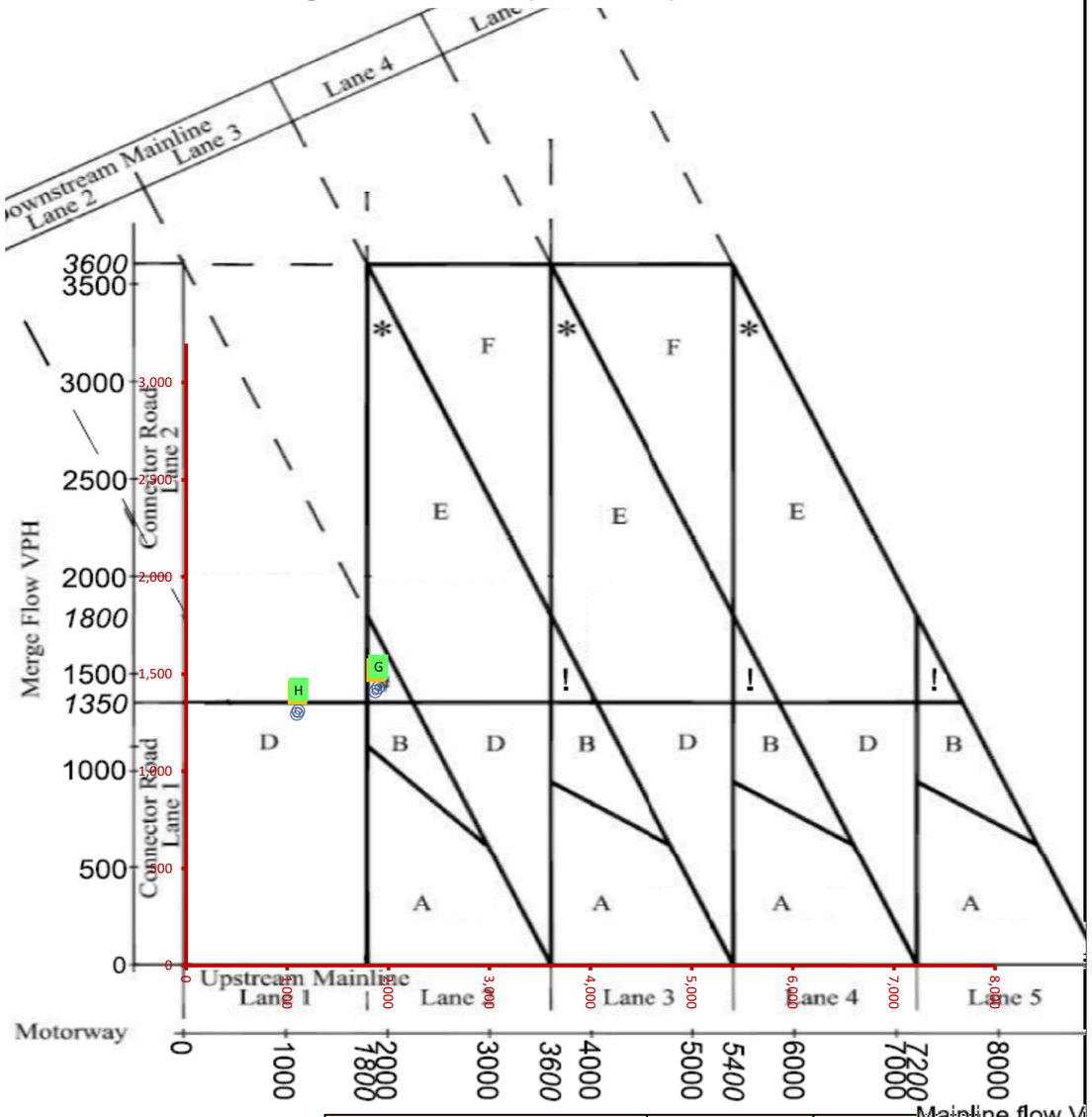
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			1,813	1.00	1,362	1.00
B	Ref no LTC PM			1,115	1.00	1,313	1.00
C	Ref with LTC AM	1,875	1,409	1,875	1.00	1,409	1.00
D	Ref with LTC PM	1,098	1,294	1,098	1.00	1,294	1.00
E	LP Scenario no LTC AM			1,841	1.00	1,383	1.00
F	LP Scenario no LTC PM			1,128	1.00	1,328	1.00
G	LP Scenario with LTC AM	1,902	1,429	1,902	1.00	1,429	1.00
H	LP Scenario with LTC PM	1,111	1,308	1,111	1.00	1,308	1.00

J3 westbound merge - no LTC (ACTUAL)



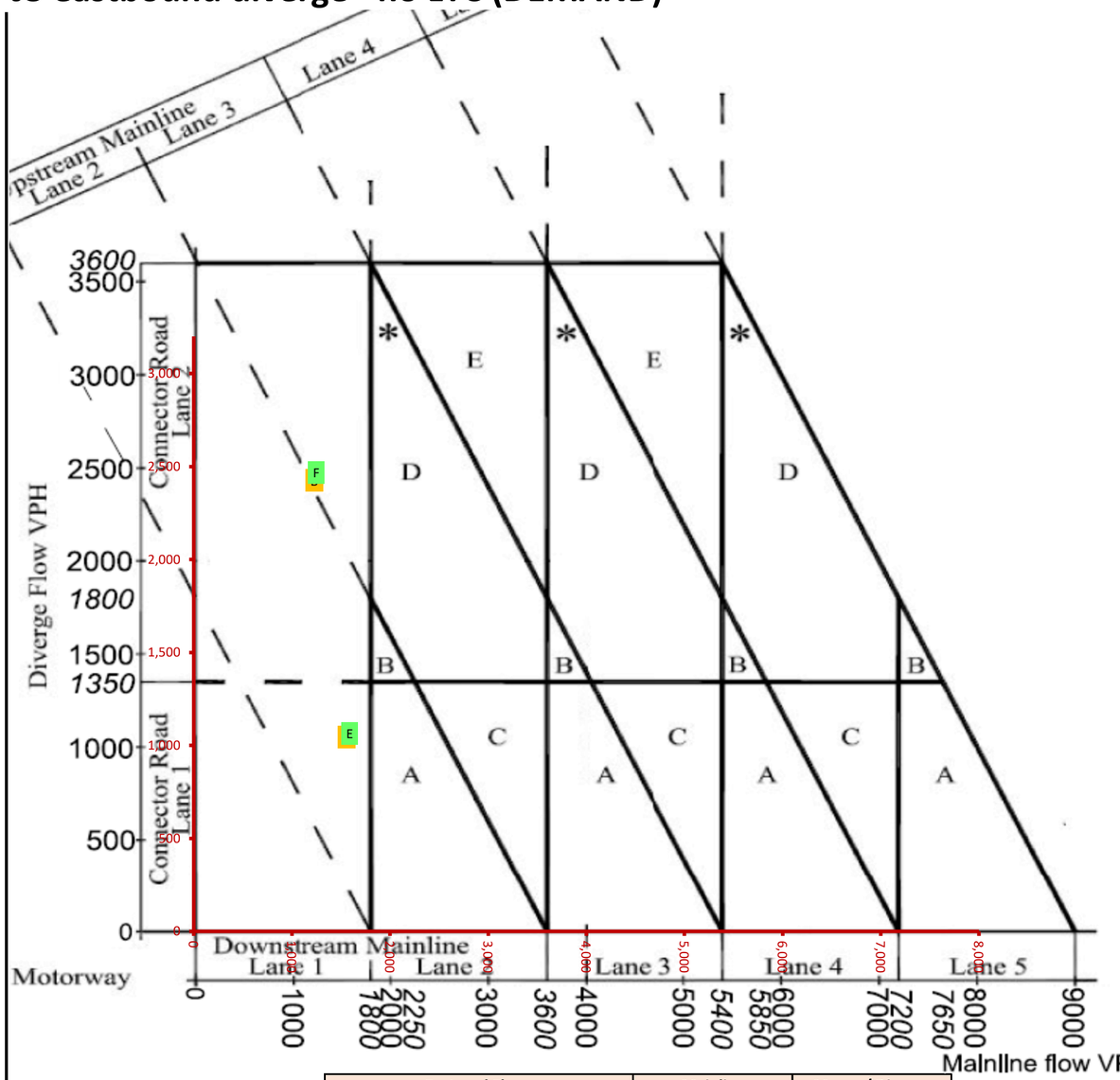
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	1,813	1,362	1,813	1.00	1,362	1.00
B	Ref no LTC PM	1,115	1,313	1,115	1.00	1,313	1.00
C	Ref with LTC AM			1,875	1.00	1,409	1.00
D	Ref with LTC PM			1,098	1.00	1,294	1.00
E	LP Scenario no LTC AM	1,841	1,383	1,841	1.00	1,383	1.00
F	LP Scenario no LTC PM	1,128	1,328	1,128	1.00	1,328	1.00
G	LP Scenario with LTC AM			1,902	1.00	1,429	1.00
H	LP Scenario with LTC PM			1,111	1.00	1,308	1.00

J3 westbound merge - with LTC (ACTUAL)



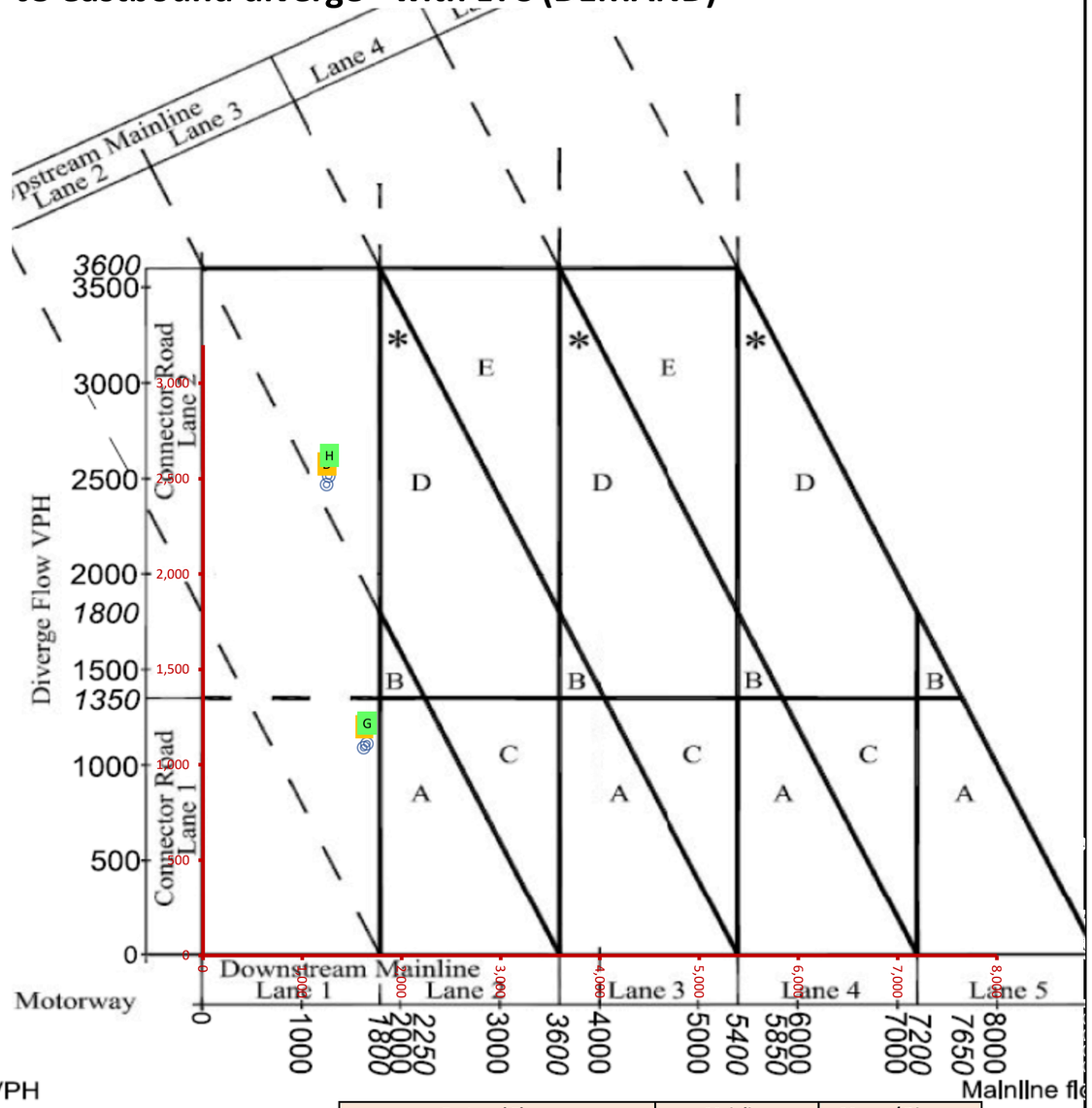
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			1,813	1.00	1,362	1.00
B	Ref no LTC PM			1,115	1.00	1,313	1.00
C	Ref with LTC AM	1,875	1,409	1,875	1.00	1,409	1.00
D	Ref with LTC PM	1,098	1,294	1,098	1.00	1,294	1.00
E	LP Scenario no LTC AM			1,841	1.00	1,383	1.00
F	LP Scenario no LTC PM			1,128	1.00	1,328	1.00
G	LP Scenario with LTC AM	1,902	1,429	1,902	1.00	1,429	1.00
H	LP Scenario with LTC PM	1,111	1,308	1,111	1.00	1,308	1.00

J3 eastbound diverge - no LTC (DEMAND)



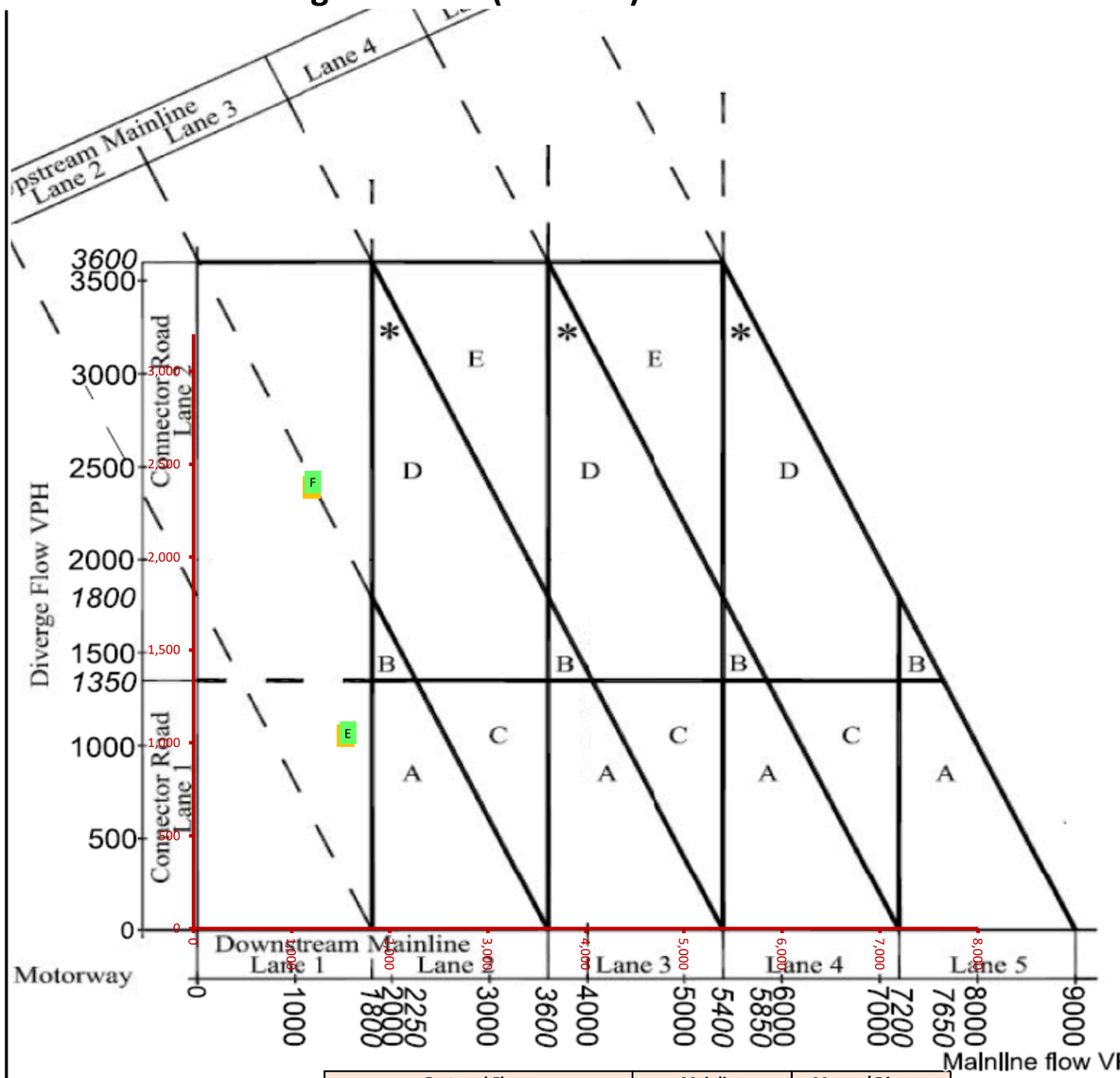
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	1,559	1,045	1,559	1.00	1,045	1.00
B	Ref no LTC PM	1,228	2,425	1,228	1.00	2,425	1.00
C	Ref with LTC AM			1,623	1.00	1,087	1.00
D	Ref with LTC PM			1,249	1.00	2,467	1.00
E	LP Scenario no LTC AM	1,588	1,064	1,588	1.00	1,064	1.00
F	LP Scenario no LTC PM	1,249	2,468	1,249	1.00	2,468	1.00
G	LP Scenario with LTC AM			1,653	1.00	1,108	1.00
H	LP Scenario with LTC PM			1,272	1.00	2,512	1.00

J3 eastbound diverge - with LTC (DEMAND)



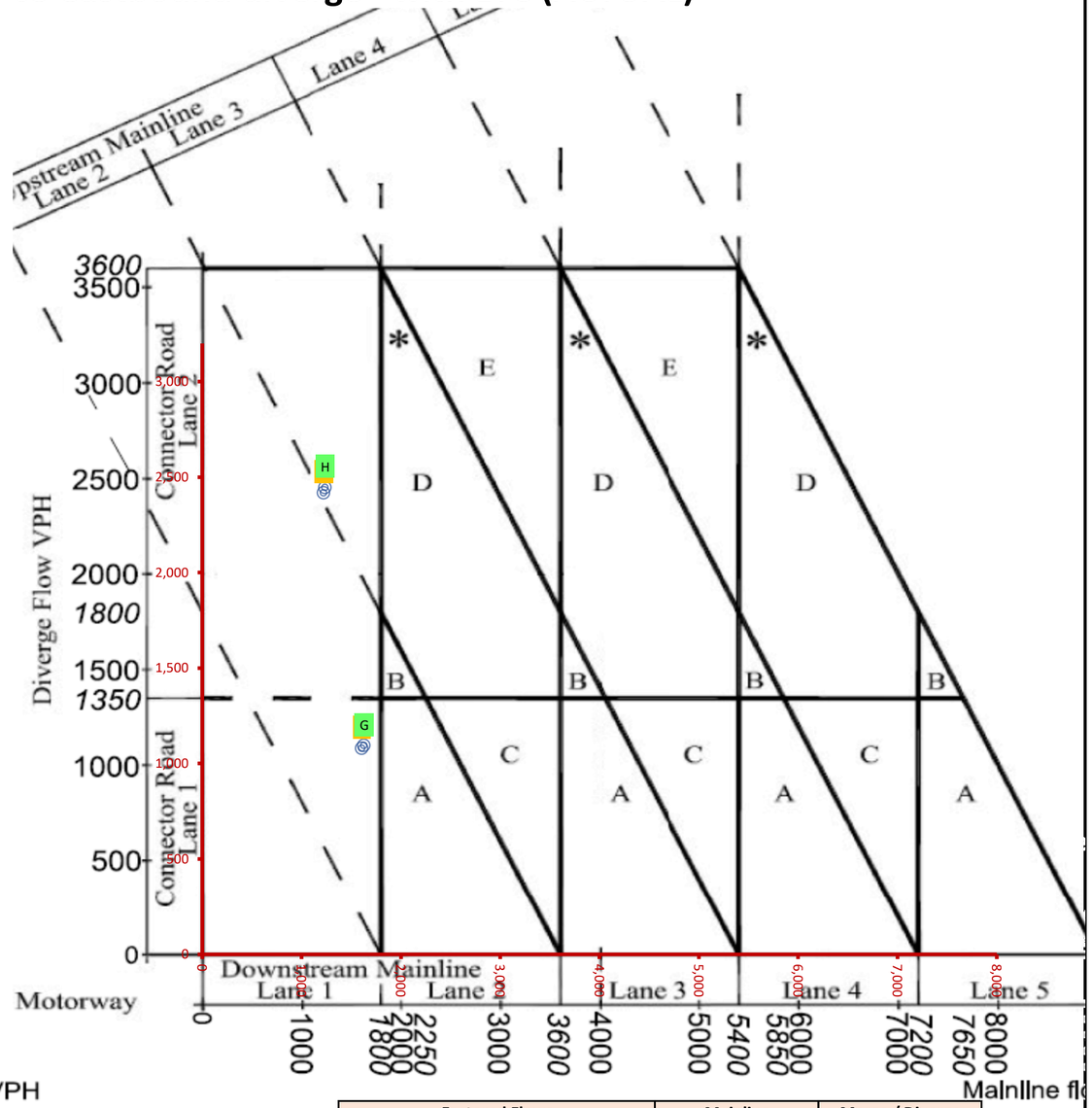
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			1,559	1.00	1,045	1.00
B	Ref no LTC PM			1,228	1.00	2,425	1.00
C	Ref with LTC AM	1,623	1,087	1,623	1.00	1,087	1.00
D	Ref with LTC PM	1,249	2,467	1,249	1.00	2,467	1.00
E	LP Scenario no LTC AM			1,588	1.00	1,064	1.00
F	LP Scenario no LTC PM			1,249	1.00	2,468	1.00
G	LP Scenario with LTC AM	1,653	1,108	1,653	1.00	1,108	1.00
H	LP Scenario with LTC PM	1,272	2,512	1,272	1.00	2,512	1.00

J3 eastbound diverge - no LTC (ACTUAL)



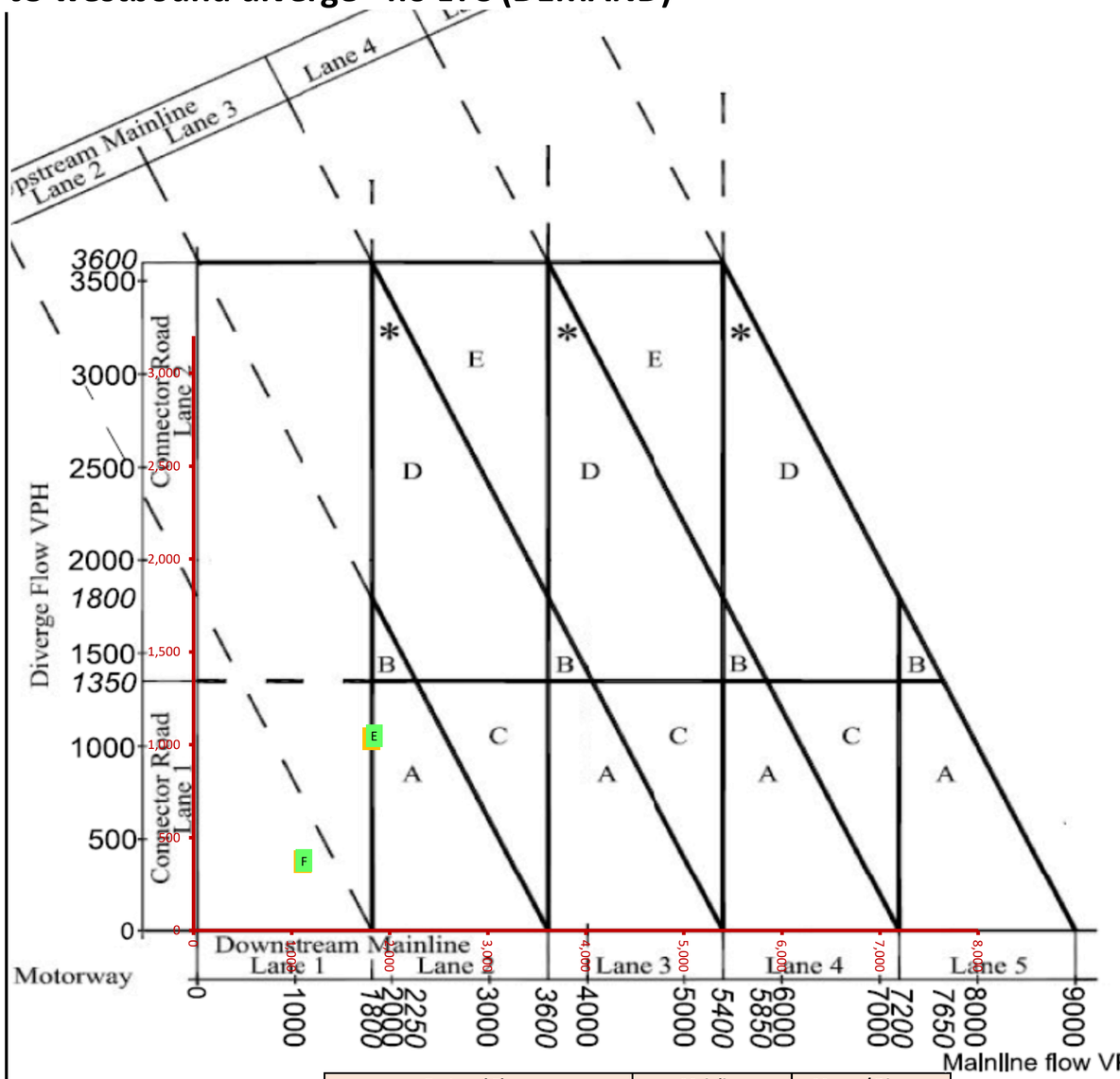
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	1,550	1,039	1,550	1.00	1,039	1.00
B	Ref no LTC PM	1,202	2,374	1,202	1.00	2,374	1.00
C	Ref with LTC AM			1,609	1.00	1,078	1.00
D	Ref with LTC PM			1,224	1.00	2,417	1.00
E	LP Scenario no LTC AM	1,573	1,054	1,573	1.00	1,054	1.00
F	LP Scenario no LTC PM	1,217	2,404	1,217	1.00	2,404	1.00
G	LP Scenario with LTC AM			1,630	1.00	1,092	1.00
H	LP Scenario with LTC PM			1,238	1.00	2,445	1.00

J3 eastbound diverge - with LTC (ACTUAL)



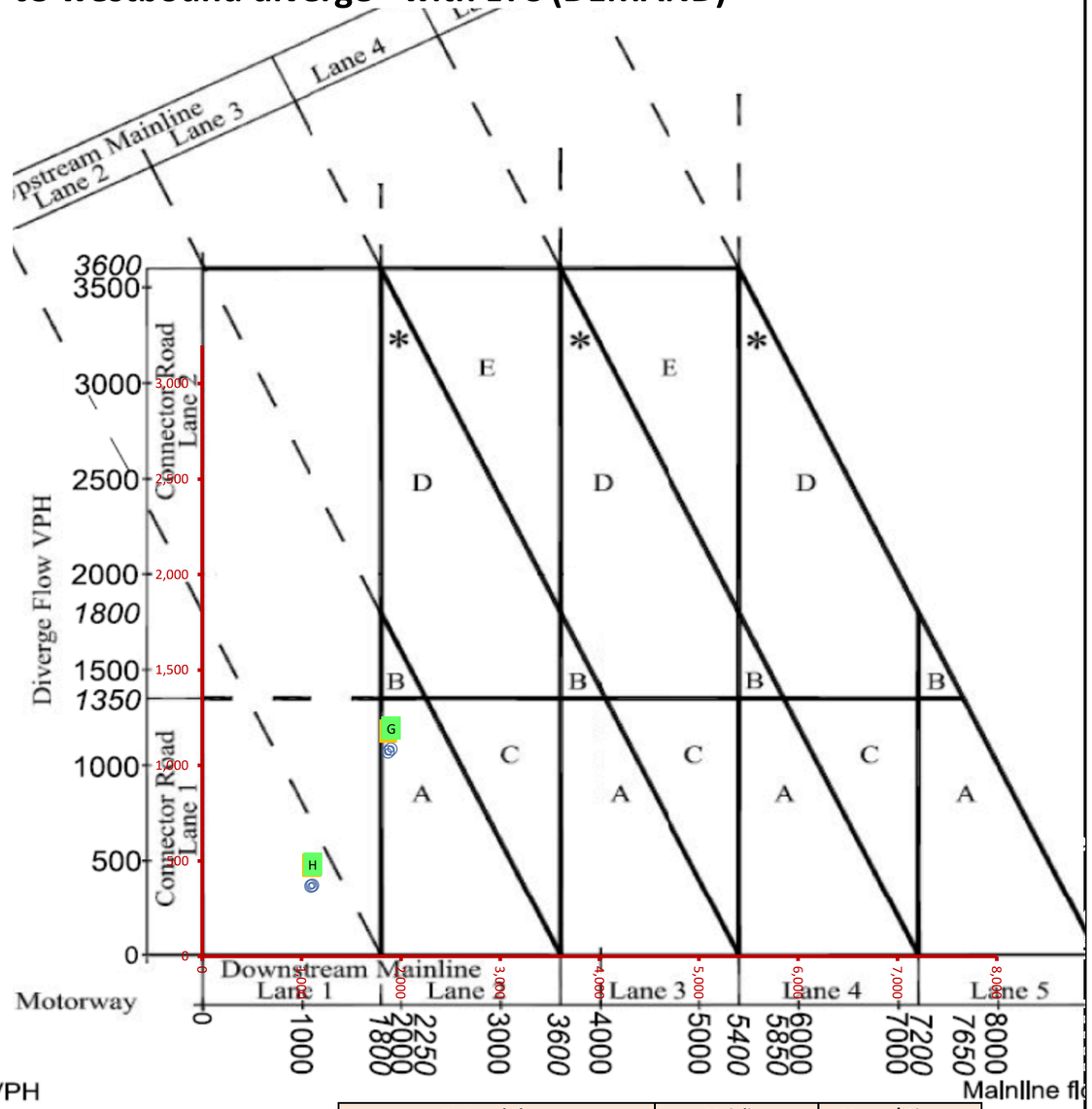
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			1,550	1.00	1,039	1.00
B	Ref no LTC PM			1,202	1.00	2,374	1.00
C	Ref with LTC AM	1,609	1,078	1,609	1.00	1,078	1.00
D	Ref with LTC PM	1,224	2,417	1,224	1.00	2,417	1.00
E	LP Scenario no LTC AM			1,573	1.00	1,054	1.00
F	LP Scenario no LTC PM			1,217	1.00	2,404	1.00
G	LP Scenario with LTC AM	1,630	1,092	1,630	1.00	1,092	1.00
H	LP Scenario with LTC PM	1,238	2,445	1,238	1.00	2,445	1.00

J3 westbound diverge - no LTC (DEMAND)



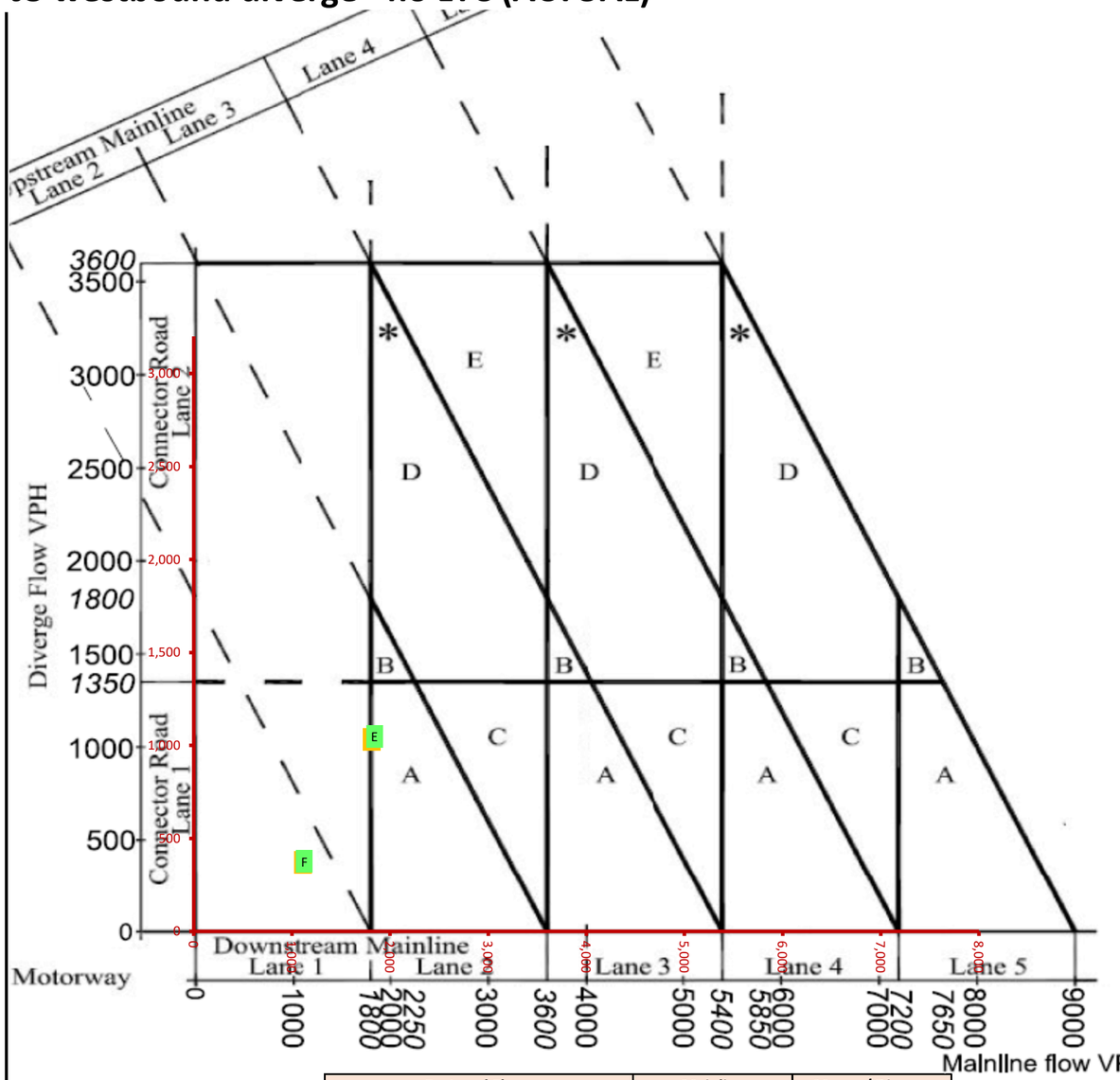
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	1,813	1,033	1,813	1.00	1,033	1.00
B	Ref no LTC PM	1,115	372	1,115	1.00	372	1.00
C	Ref with LTC AM			1,875	1.00	1,068	1.00
D	Ref with LTC PM			1,098	1.00	367	1.00
E	LP Scenario no LTC AM	1,841	1,049	1,841	1.00	1,049	1.00
F	LP Scenario no LTC PM	1,128	376	1,128	1.00	376	1.00
G	LP Scenario with LTC AM			1,902	1.00	1,084	1.00
H	LP Scenario with LTC PM			1,111	1.00	371	1.00

J3 westbound diverge - with LTC (DEMAND)



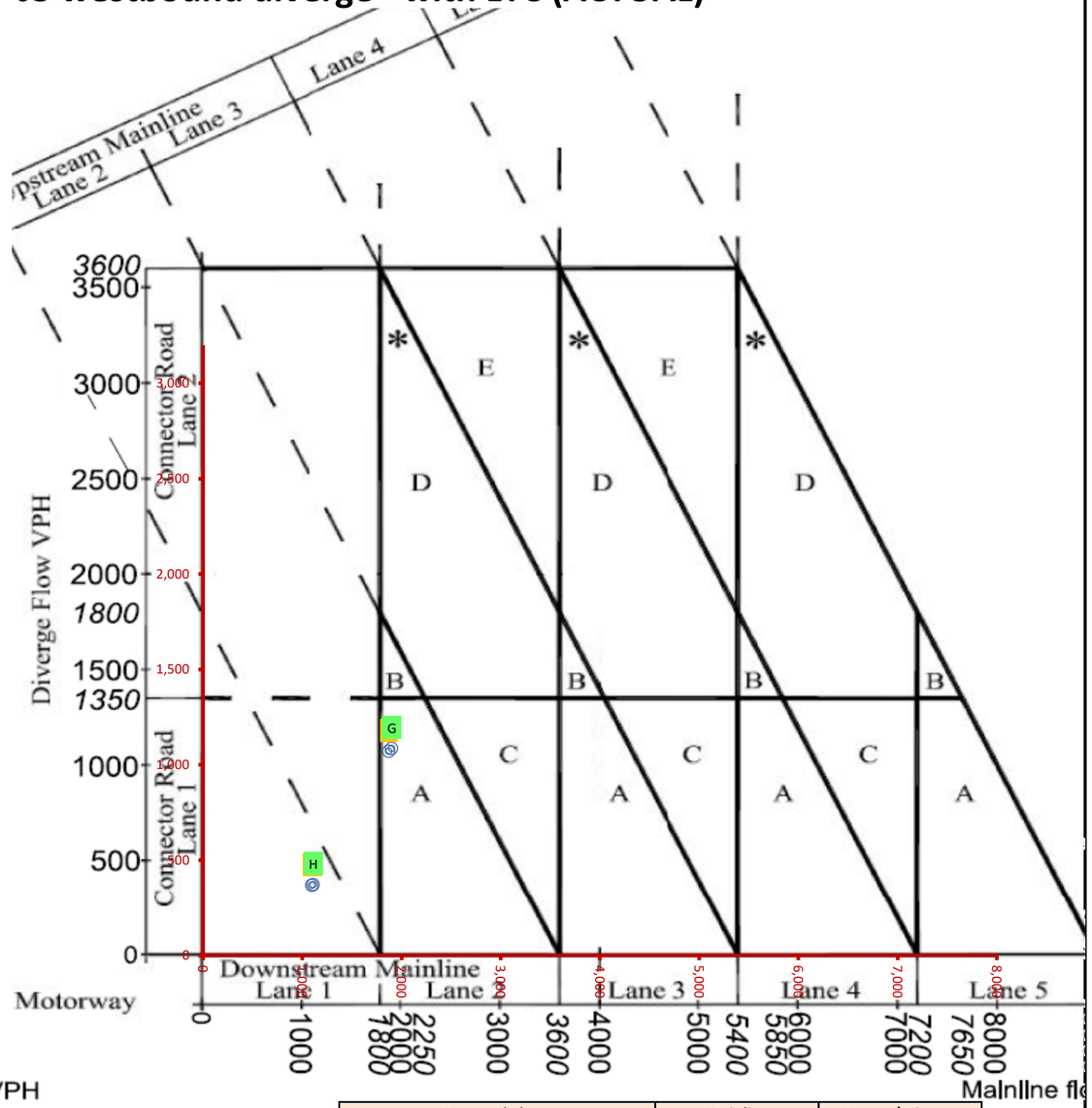
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			1,813	1.00	1,033	1.00
B	Ref no LTC PM			1,115	1.00	372	1.00
C	Ref with LTC AM	1,875	1,068	1,875	1.00	1,068	1.00
D	Ref with LTC PM	1,098	367	1,098	1.00	367	1.00
E	LP Scenario no LTC AM			1,841	1.00	1,049	1.00
F	LP Scenario no LTC PM			1,128	1.00	376	1.00
G	LP Scenario with LTC AM	1,902	1,084	1,902	1.00	1,084	1.00
H	LP Scenario with LTC PM	1,111	371	1,111	1.00	371	1.00

J3 westbound diverge - no LTC (ACTUAL)



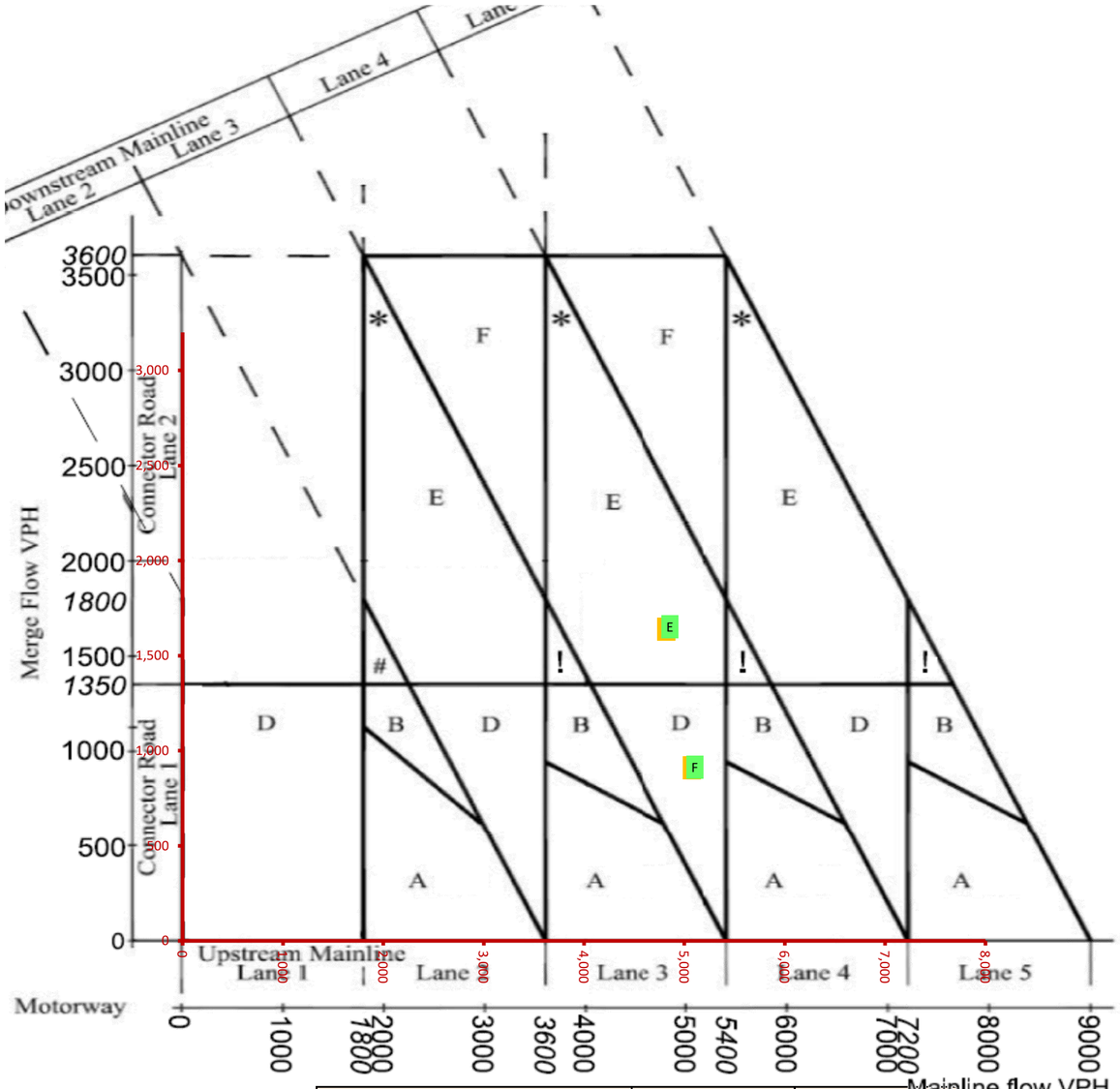
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	1,813	1,033	1,813	1.00	1,033	1.00
B	Ref no LTC PM	1,115	372	1,115	1.00	372	1.00
C	Ref with LTC AM			1,875	1.00	1,068	1.00
D	Ref with LTC PM			1,098	1.00	367	1.00
E	LP Scenario no LTC AM	1,841	1,049	1,841	1.00	1,049	1.00
F	LP Scenario no LTC PM	1,128	376	1,128	1.00	376	1.00
G	LP Scenario with LTC AM			1,902	1.00	1,084	1.00
H	LP Scenario with LTC PM			1,111	1.00	371	1.00

J3 westbound diverge - with LTC (ACTUAL)



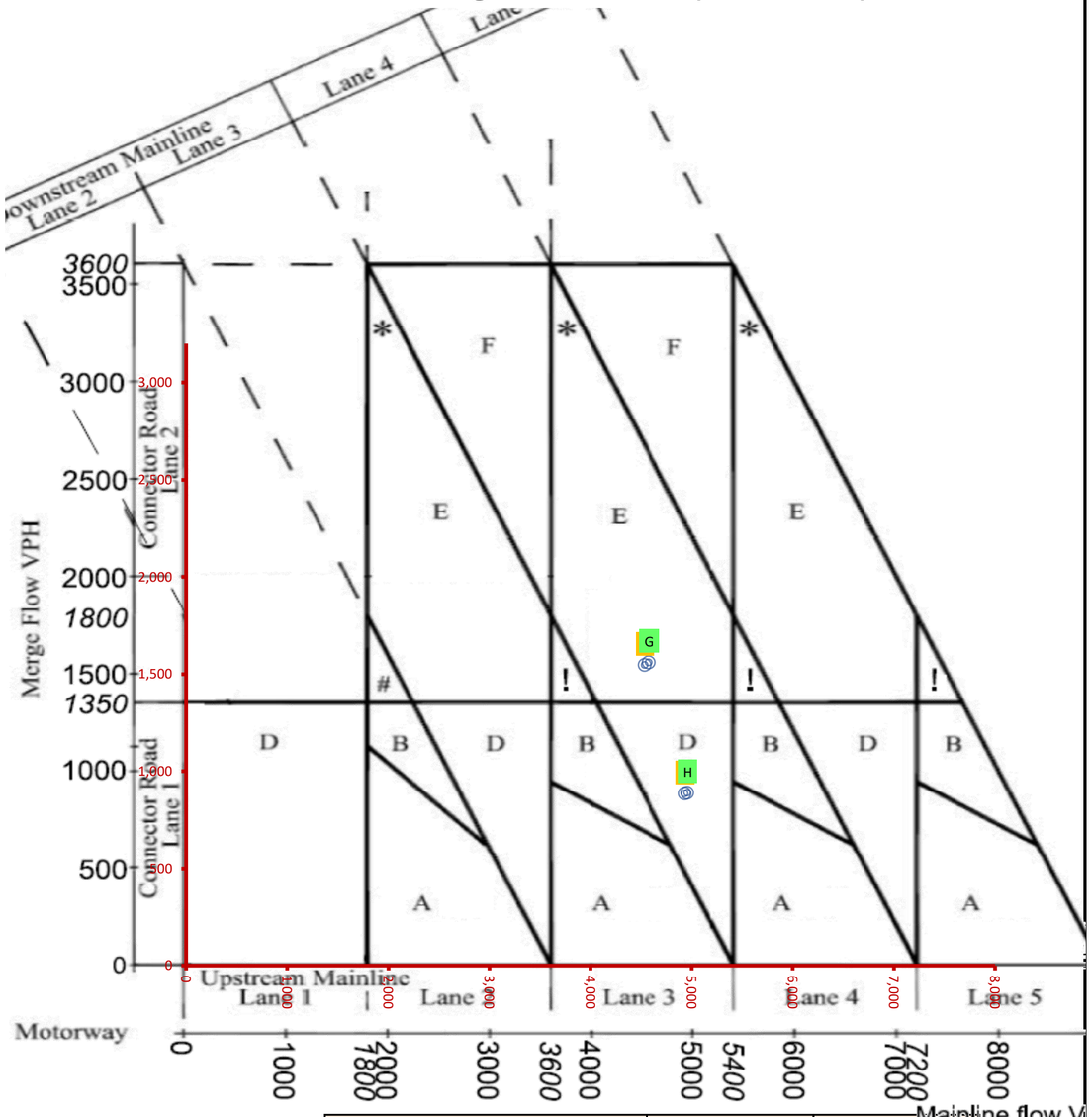
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			1,813	1.00	1,033	1.00
B	Ref no LTC PM			1,115	1.00	372	1.00
C	Ref with LTC AM	1,875	1,068	1,875	1.00	1,068	1.00
D	Ref with LTC PM	1,098	367	1,098	1.00	367	1.00
E	LP Scenario no LTC AM			1,841	1.00	1,049	1.00
F	LP Scenario no LTC PM			1,128	1.00	376	1.00
G	LP Scenario with LTC AM	1,902	1,084	1,902	1.00	1,084	1.00
H	LP Scenario with LTC PM	1,111	371	1,111	1.00	371	1.00

J3 northbound link road merge - no LTC (DEMAND)



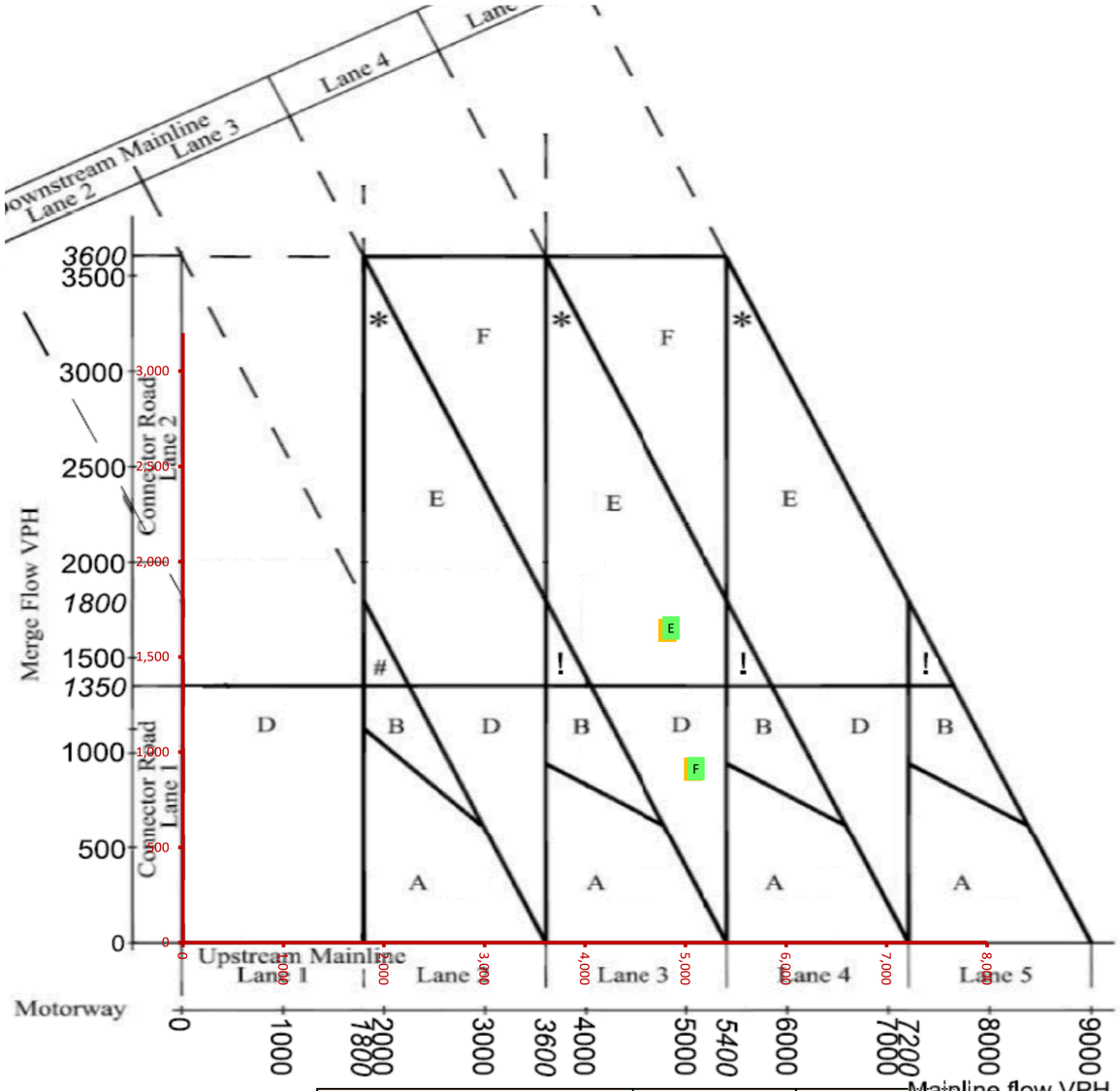
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,818	1,641	4,818	1.00	1,641	1.00
B	Ref no LTC PM	5,076	909	5,076	1.00	909	1.00
C	Ref with LTC AM			4,538	1.00	1,545	1.00
D	Ref with LTC PM			4,933	1.00	884	1.00
E	LP Scenario no LTC AM	4,855	1,653	4,855	1.00	1,653	1.00
F	LP Scenario no LTC PM	5,104	914	5,104	1.00	914	1.00
G	LP Scenario with LTC AM			4,577	1.00	1,558	1.00
H	LP Scenario with LTC PM			4,960	1.00	888	1.00

J3 northbound link road merge - with LTC (DEMAND)



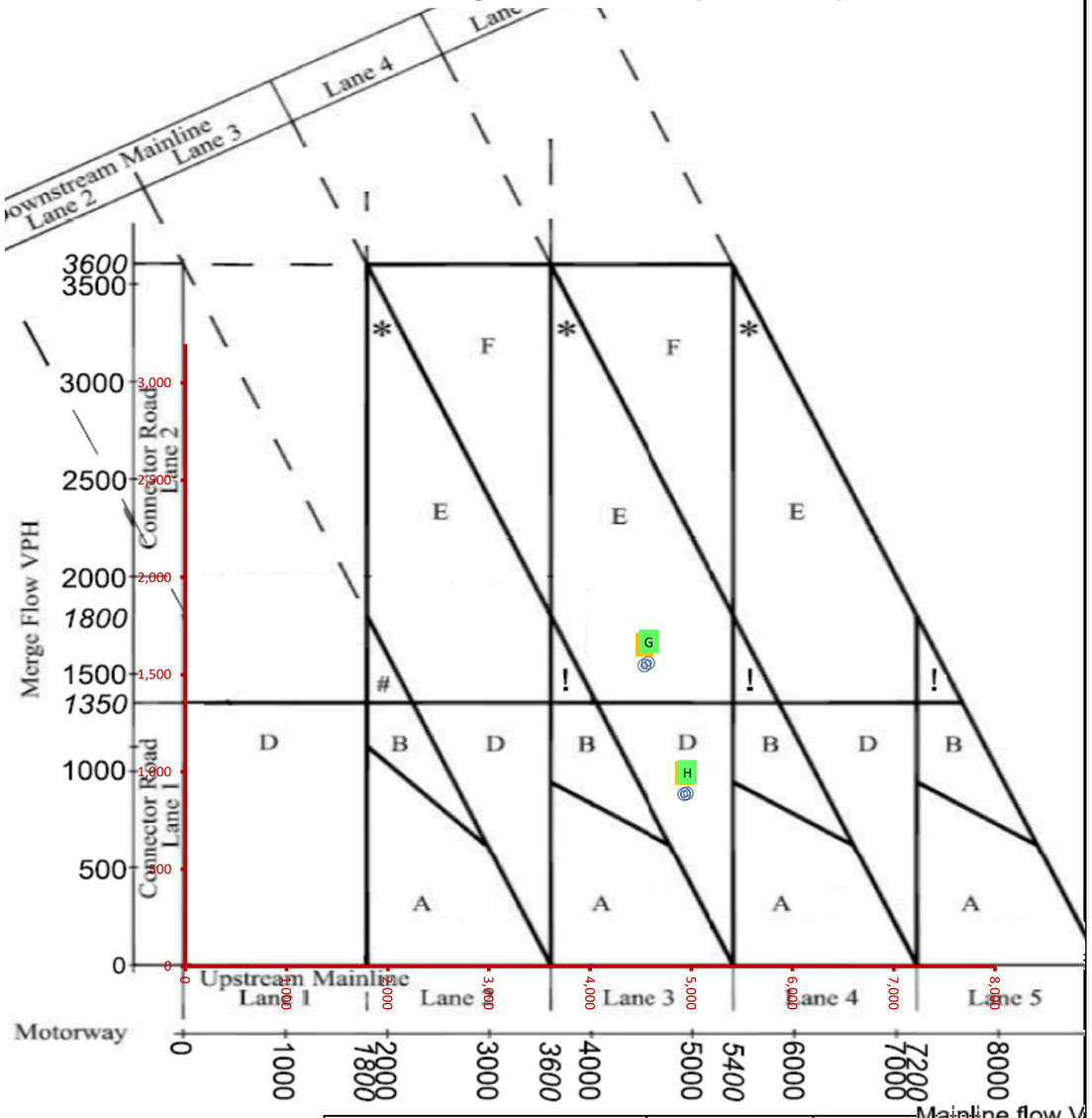
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,818	1.00	1,641	1.00
B	Ref no LTC PM			5,076	1.00	909	1.00
C	Ref with LTC AM	4,538	1,545	4,538	1.00	1,545	1.00
D	Ref with LTC PM	4,933	884	4,933	1.00	884	1.00
E	LP Scenario no LTC AM			4,855	1.00	1,653	1.00
F	LP Scenario no LTC PM			5,104	1.00	914	1.00
G	LP Scenario with LTC AM	4,577	1,558	4,577	1.00	1,558	1.00
H	LP Scenario with LTC PM	4,960	888	4,960	1.00	888	1.00

J3 northbound link road merge - no LTC (ACTUAL)



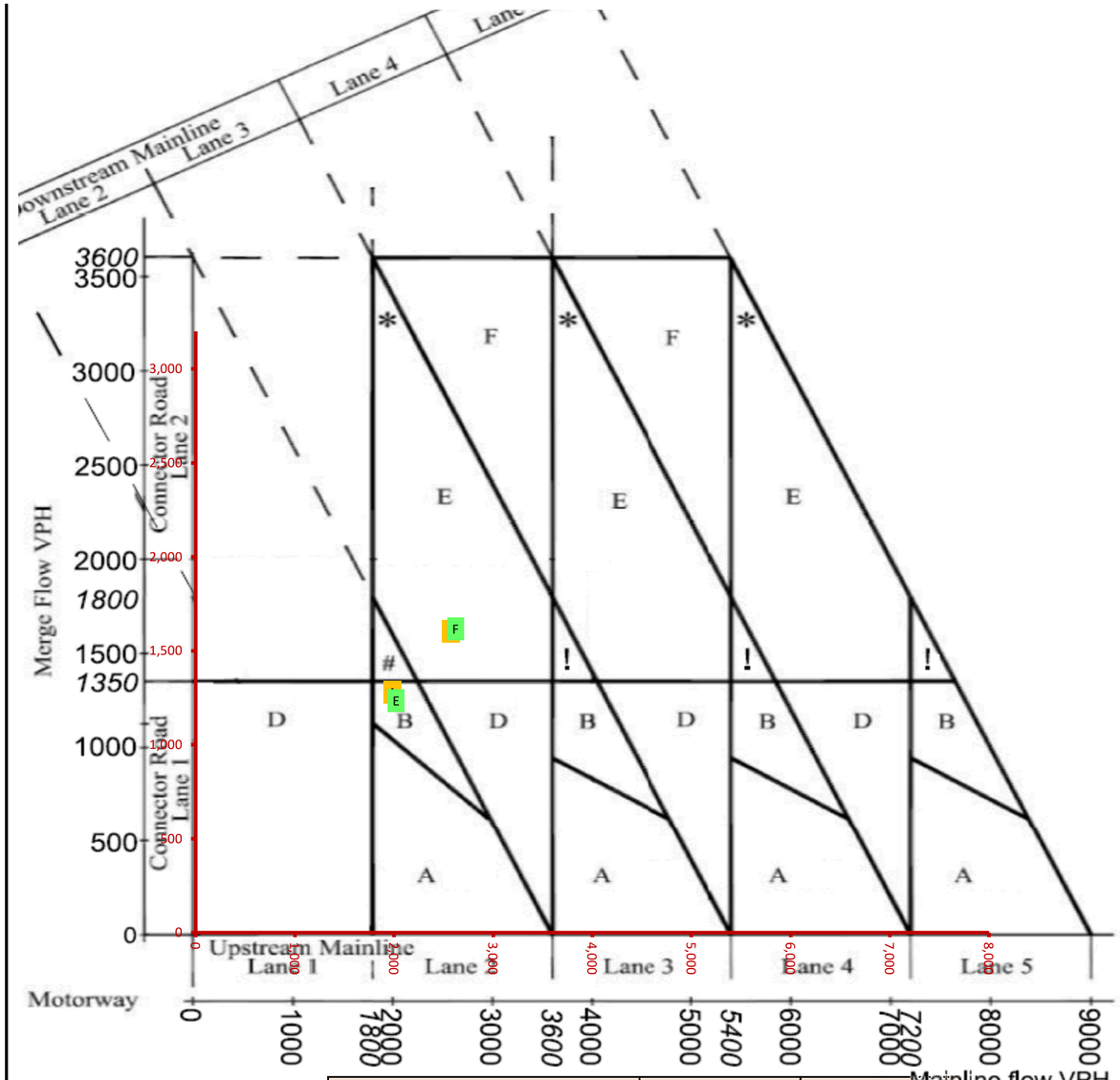
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,818	1,641	4,818	1.00	1,641	1.00
B	Ref no LTC PM	5,076	909	5,076	1.00	909	1.00
C	Ref with LTC AM			4,538	1.00	1,545	1.00
D	Ref with LTC PM			4,933	1.00	884	1.00
E	LP Scenario no LTC AM	4,855	1,653	4,855	1.00	1,653	1.00
F	LP Scenario no LTC PM	5,104	914	5,104	1.00	914	1.00
G	LP Scenario with LTC AM			4,577	1.00	1,558	1.00
H	LP Scenario with LTC PM			4,960	1.00	888	1.00

J3 northbound link road merge - with LTC (ACTUAL)



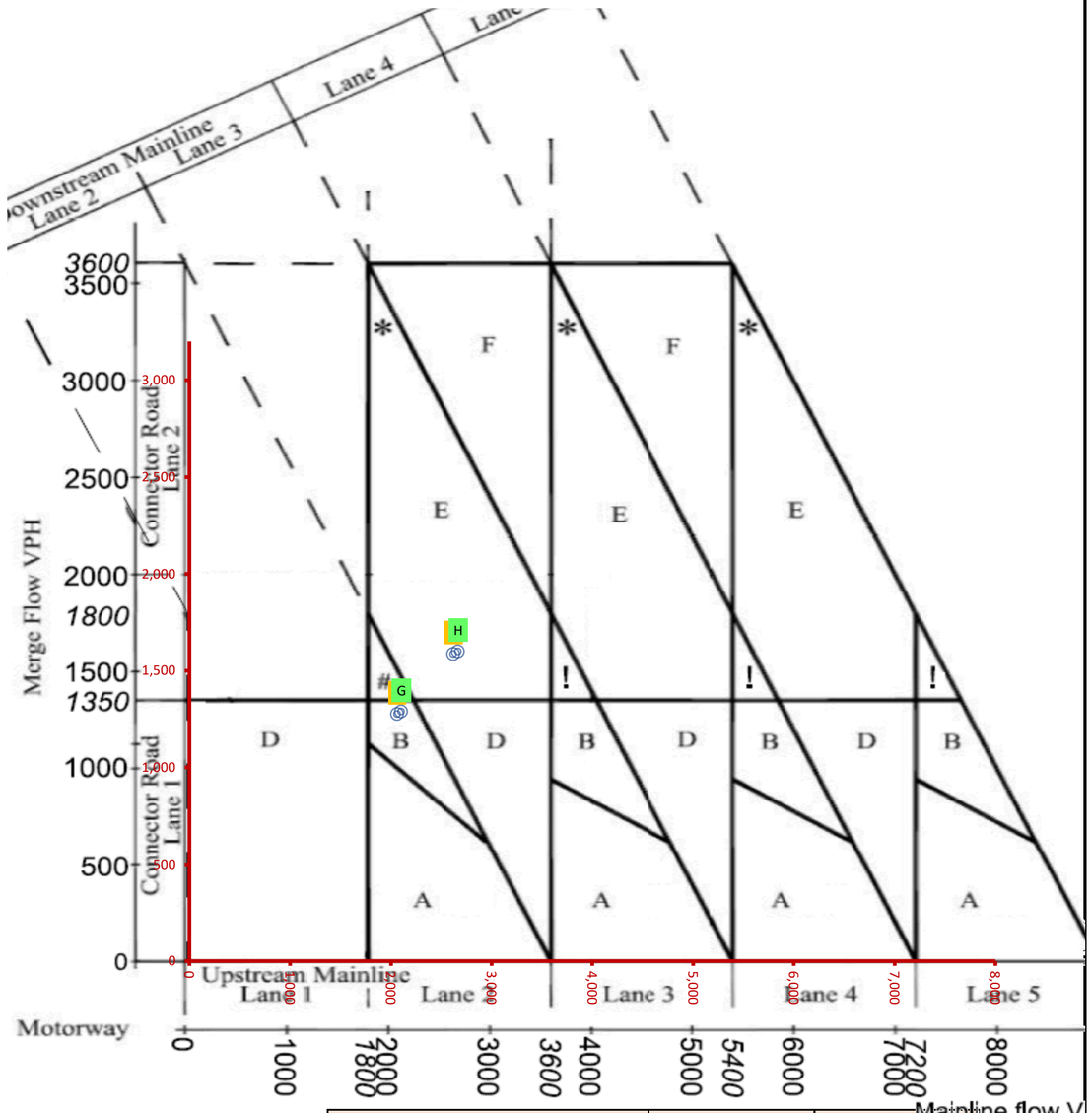
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,818	1.00	1,641	1.00
B	Ref no LTC PM			5,076	1.00	909	1.00
C	Ref with LTC AM	4,538	1,545	4,538	1.00	1,545	1.00
D	Ref with LTC PM	4,933	884	4,933	1.00	884	1.00
E	LP Scenario no LTC AM			4,855	1.00	1,653	1.00
F	LP Scenario no LTC PM			5,104	1.00	914	1.00
G	LP Scenario with LTC AM	4,577	1,558	4,577	1.00	1,558	1.00
H	LP Scenario with LTC PM	4,960	888	4,960	1.00	888	1.00

J3 eastbound link road merge - no LTC (DEMAND)



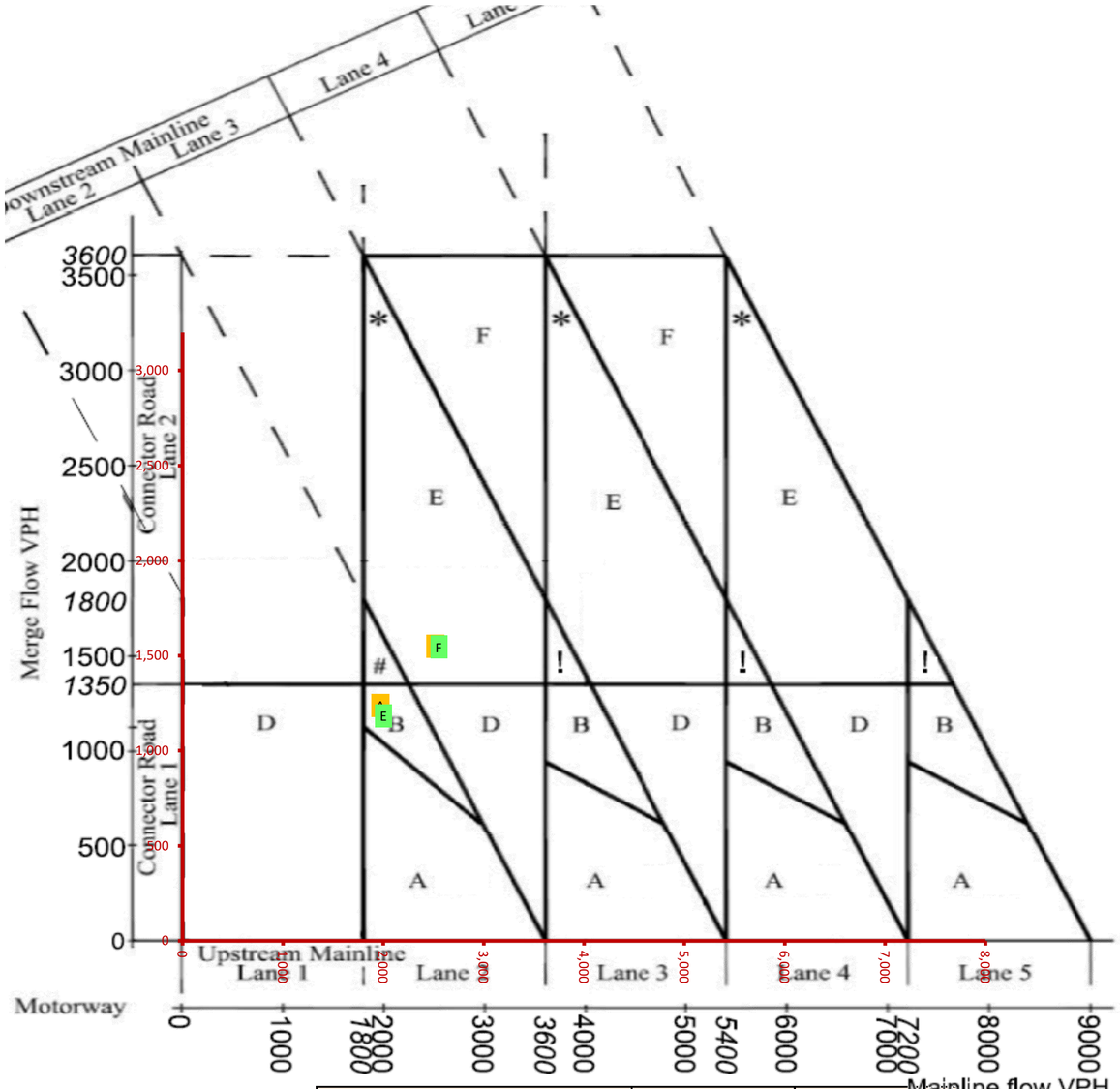
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	1,984	1,281	1,984	1.00	1,164	1.10
B	Ref no LTC PM	2,575	1,605	2,575	1.00	1,605	1.00
C	Ref with LTC AM			2,065	1.00	1,159	1.10
D	Ref with LTC PM			2,620	1.00	1,585	1.00
E	LP Scenario no LTC AM	2,021	1,236	2,021	1.00	1,177	1.05
F	LP Scenario no LTC PM	2,621	1,618	2,621	1.00	1,618	1.00
G	LP Scenario with LTC AM			2,103	1.00	1,171	1.10
H	LP Scenario with LTC PM			2,668	1.00	1,598	1.00

J3 eastbound link road merge - with LTC (DEMAND)



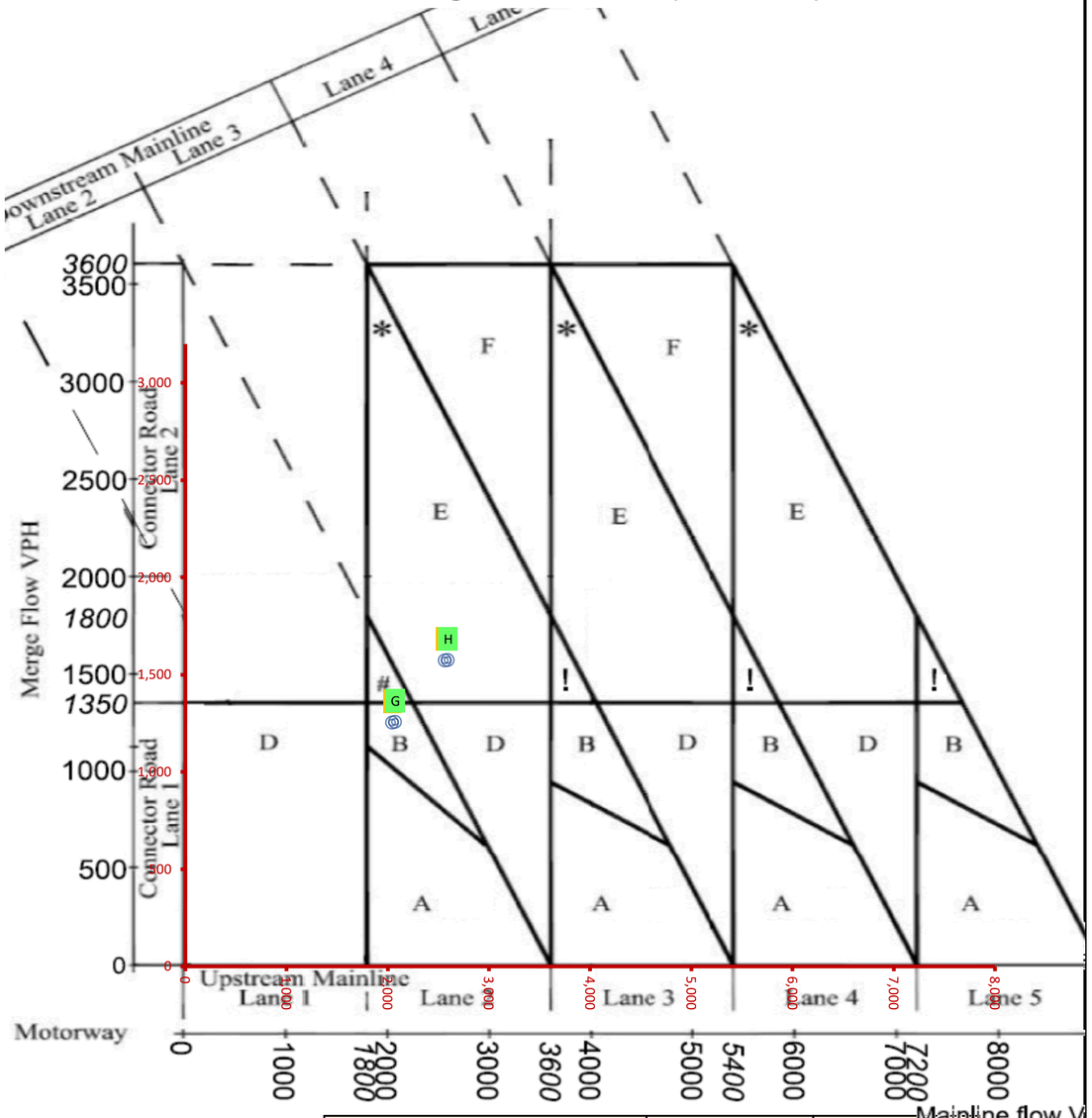
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			1,984	1.00	1,164	1.10
B	Ref no LTC PM			2,575	1.00	1,605	1.00
C	Ref with LTC AM	2,065	1,275	2,065	1.00	1,159	1.10
D	Ref with LTC PM	2,620	1,585	2,620	1.00	1,585	1.00
E	LP Scenario no LTC AM			2,021	1.00	1,177	1.05
F	LP Scenario no LTC PM			2,621	1.00	1,618	1.00
G	LP Scenario with LTC AM	2,103	1,288	2,103	1.00	1,171	1.10
H	LP Scenario with LTC PM	2,668	1,598	2,668	1.00	1,598	1.00

J3 eastbound link road merge - no LTC (ACTUAL)



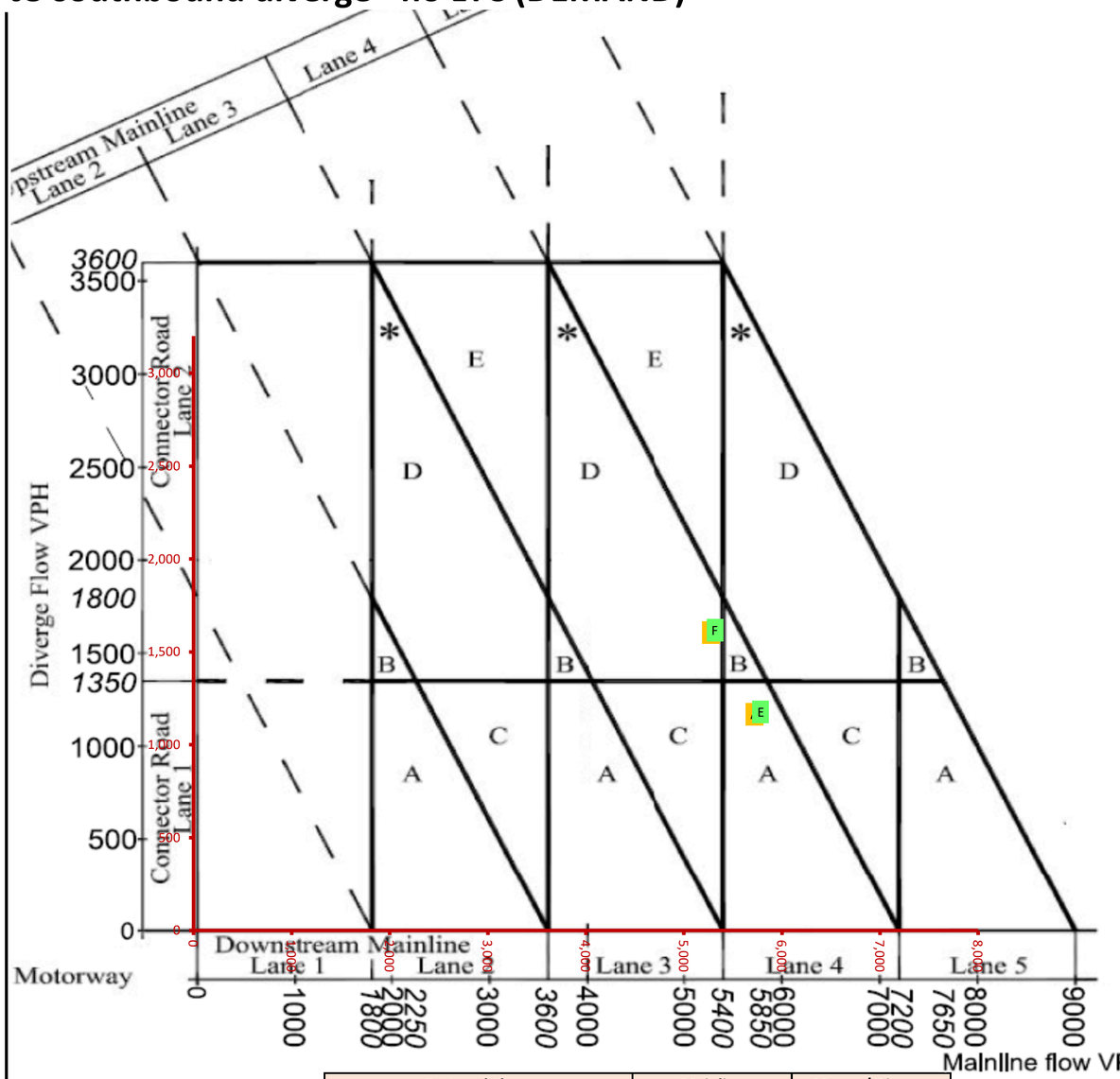
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	1,972	1,237	1,972	1.00	1,125	1.10
B	Ref no LTC PM	2,522	1,550	2,522	1.00	1,550	1.00
C	Ref with LTC AM			2,048	1.00	1,139	1.10
D	Ref with LTC PM			2,567	1.00	1,572	1.00
E	LP Scenario no LTC AM	2,001	1,183	2,001	1.00	1,127	1.05
F	LP Scenario no LTC PM	2,553	1,545	2,553	1.00	1,545	1.00
G	LP Scenario with LTC AM			2,074	1.00	1,141	1.10
H	LP Scenario with LTC PM			2,597	1.00	1,574	1.00

J3 eastbound link road merge - with LTC (ACTUAL)



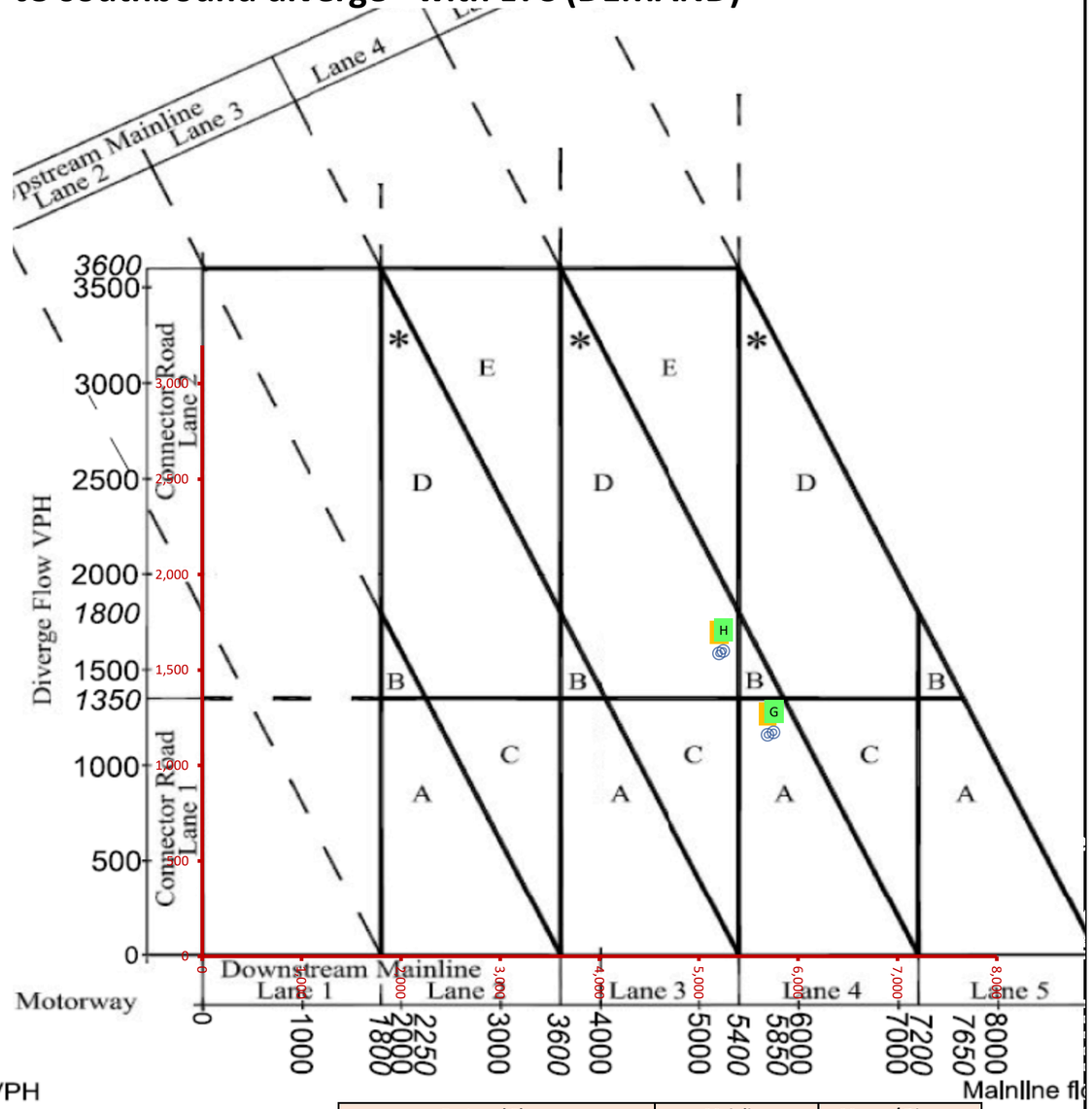
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			1,972	1.00	1,125	1.10
B	Ref no LTC PM			2,522	1.00	1,550	1.00
C	Ref with LTC AM	2,048	1,253	2,048	1.00	1,139	1.10
D	Ref with LTC PM	2,567	1,572	2,567	1.00	1,572	1.00
E	LP Scenario no LTC AM			2,001	1.00	1,127	1.05
F	LP Scenario no LTC PM			2,553	1.00	1,545	1.00
G	LP Scenario with LTC AM	2,074	1,255	2,074	1.00	1,141	1.10
H	LP Scenario with LTC PM	2,597	1,574	2,597	1.00	1,574	1.00

J3 southbound diverge - no LTC (DEMAND)



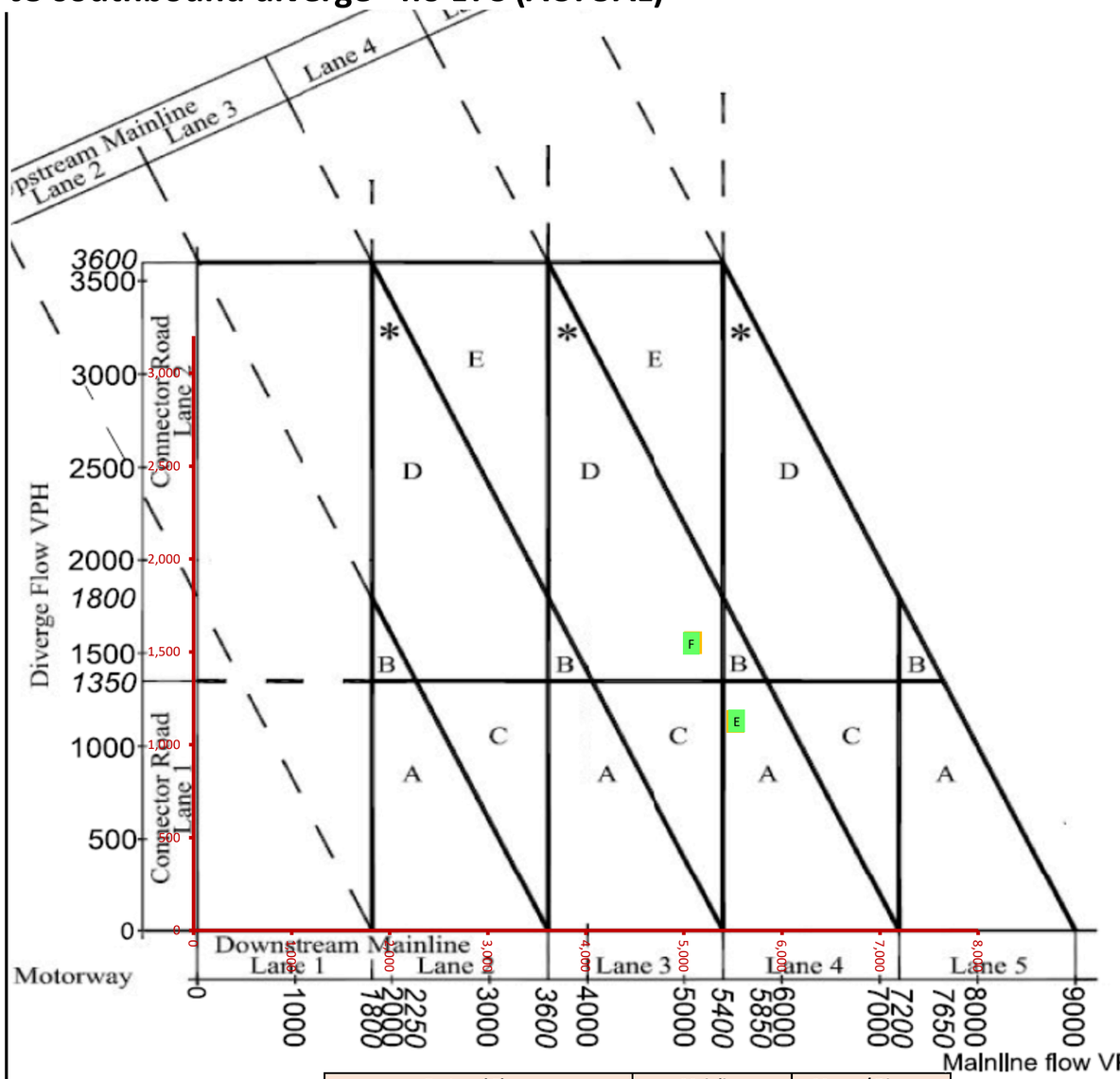
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,720	1,164	5,720	1.00	1,164	1.00
B	Ref no LTC PM	5,274	1,605	5,274	1.00	1,605	1.00
C	Ref with LTC AM			5,694	1.00	1,159	1.00
D	Ref with LTC PM			5,207	1.00	1,585	1.00
E	LP Scenario no LTC AM	5,783	1,177	5,783	1.00	1,177	1.00
F	LP Scenario no LTC PM	5,316	1,618	5,316	1.00	1,618	1.00
G	LP Scenario with LTC AM			5,754	1.00	1,171	1.00
H	LP Scenario with LTC PM			5,249	1.00	1,598	1.00

J3 southbound diverge - with LTC (DEMAND)



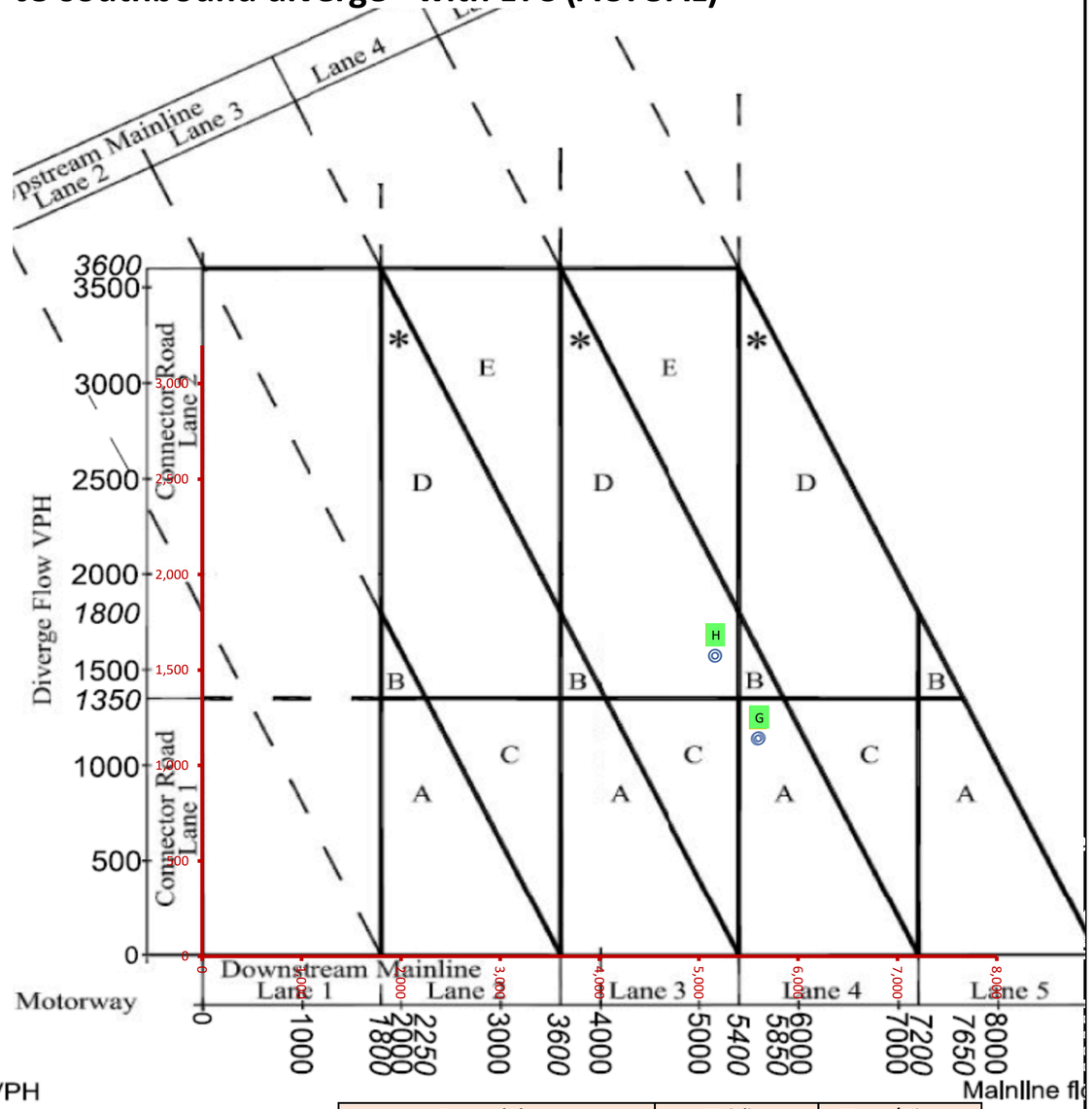
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,720	1.00	1,164	1.00
B	Ref no LTC PM			5,274	1.00	1,605	1.00
C	Ref with LTC AM	5,694	1,159	5,694	1.00	1,159	1.00
D	Ref with LTC PM	5,207	1,585	5,207	1.00	1,585	1.00
E	LP Scenario no LTC AM			5,783	1.00	1,177	1.00
F	LP Scenario no LTC PM			5,316	1.00	1,618	1.00
G	LP Scenario with LTC AM	5,754	1,171	5,754	1.00	1,171	1.00
H	LP Scenario with LTC PM	5,249	1,598	5,249	1.00	1,598	1.00

J3 southbound diverge - no LTC (ACTUAL)



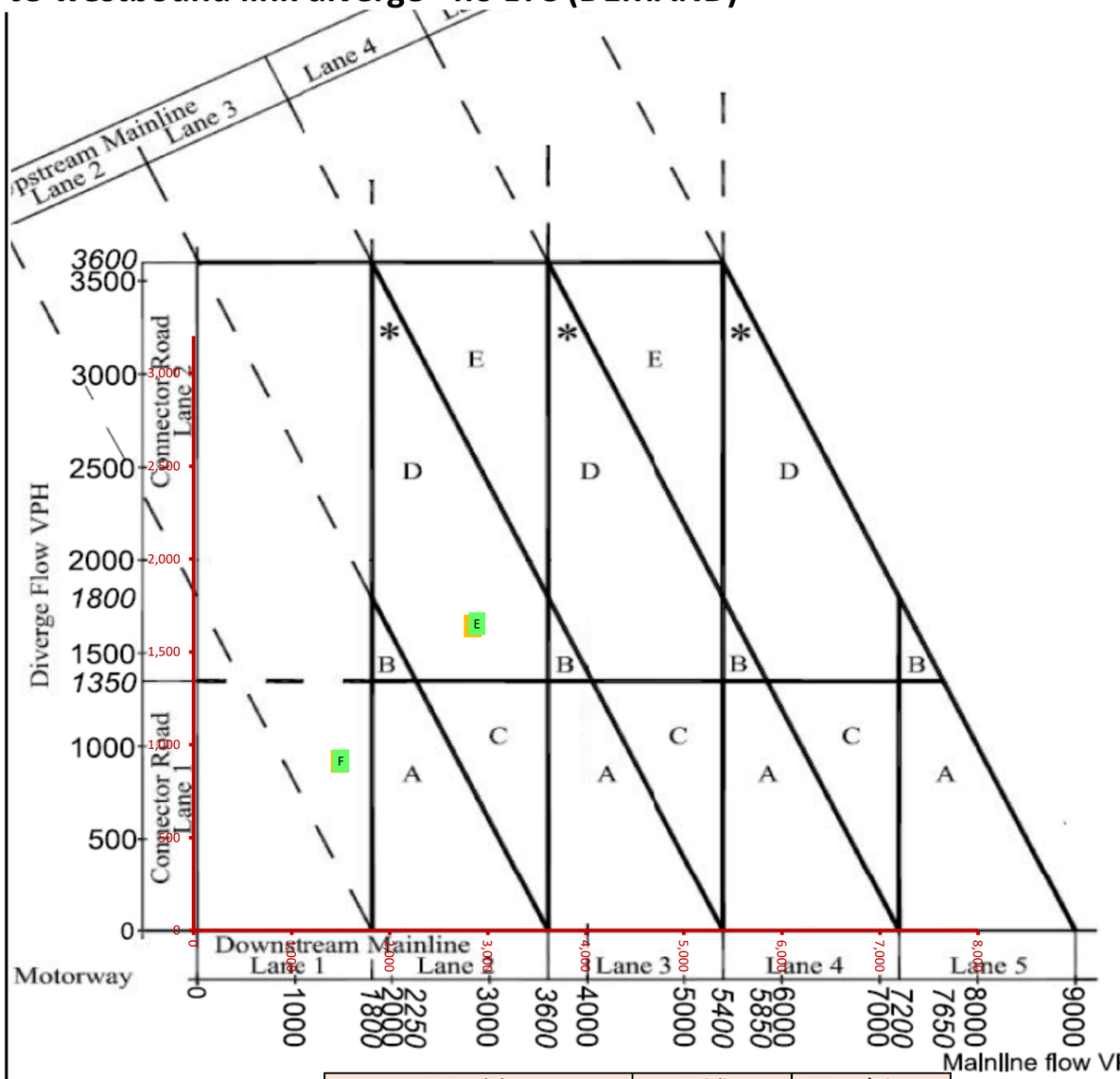
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,528	1,125	5,528	1.00	1,125	1.00
B	Ref no LTC PM	5,090	1,550	5,090	1.00	1,550	1.00
C	Ref with LTC AM			5,595	1.00	1,139	1.00
D	Ref with LTC PM			5,165	1.00	1,572	1.00
E	LP Scenario no LTC AM	5,538	1,127	5,538	1.00	1,127	1.00
F	LP Scenario no LTC PM	5,076	1,545	5,076	1.00	1,545	1.00
G	LP Scenario with LTC AM			5,608	1.00	1,141	1.00
H	LP Scenario with LTC PM			5,170	1.00	1,574	1.00

J3 southbound diverge - with LTC (ACTUAL)

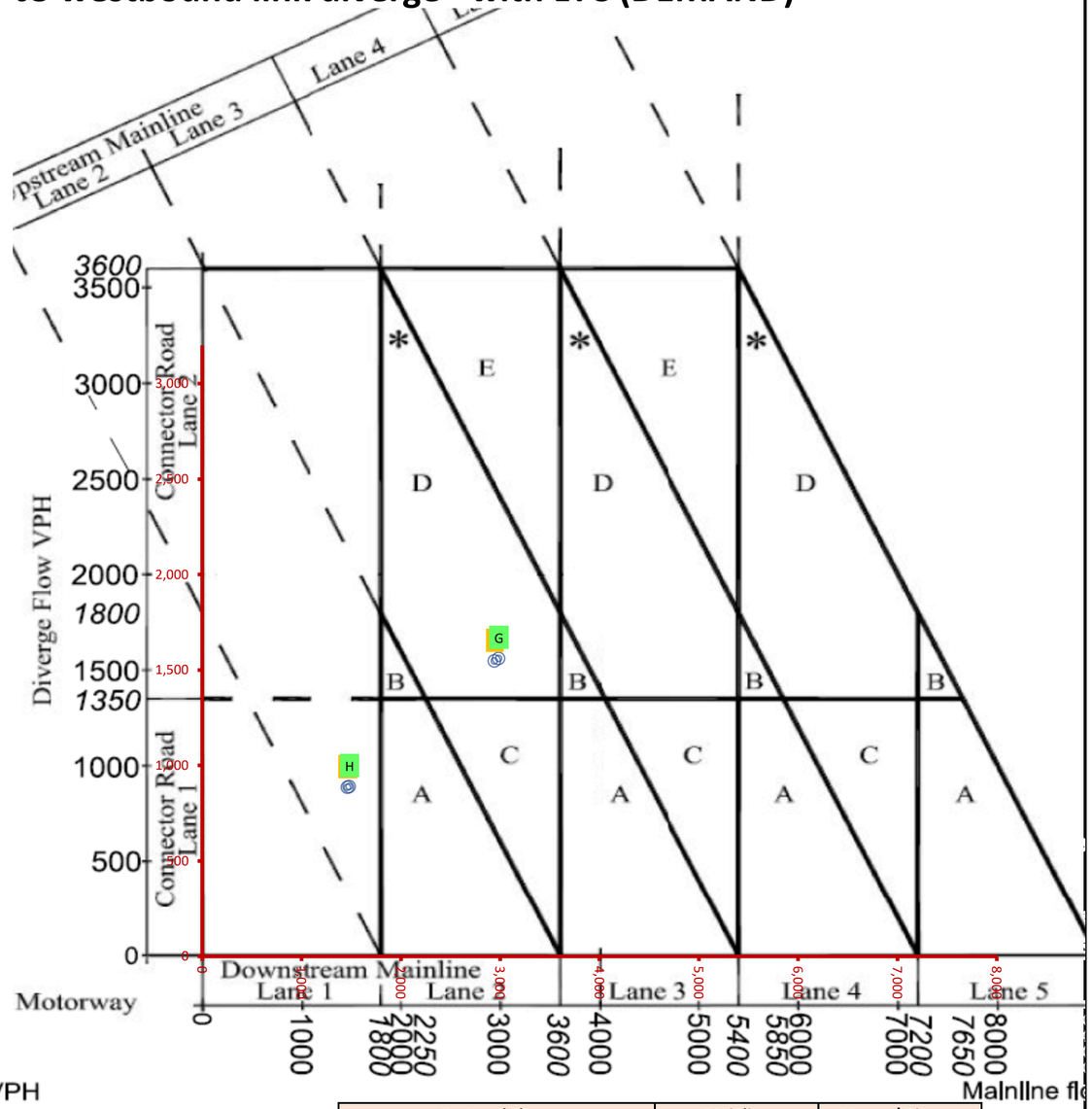


Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,528	1.00	1,125	1.00
B	Ref no LTC PM			5,090	1.00	1,550	1.00
C	Ref with LTC AM	5,595	1,139	5,595	1.00	1,139	1.00
D	Ref with LTC PM	5,165	1,572	5,165	1.00	1,572	1.00
E	LP Scenario no LTC AM			5,538	1.00	1,127	1.00
F	LP Scenario no LTC PM			5,076	1.00	1,545	1.00
G	LP Scenario with LTC AM	5,608	1,141	5,608	1.00	1,141	1.00
H	LP Scenario with LTC PM	5,170	1,574	5,170	1.00	1,574	1.00

J3 westbound link diverge - no LTC (DEMAND)



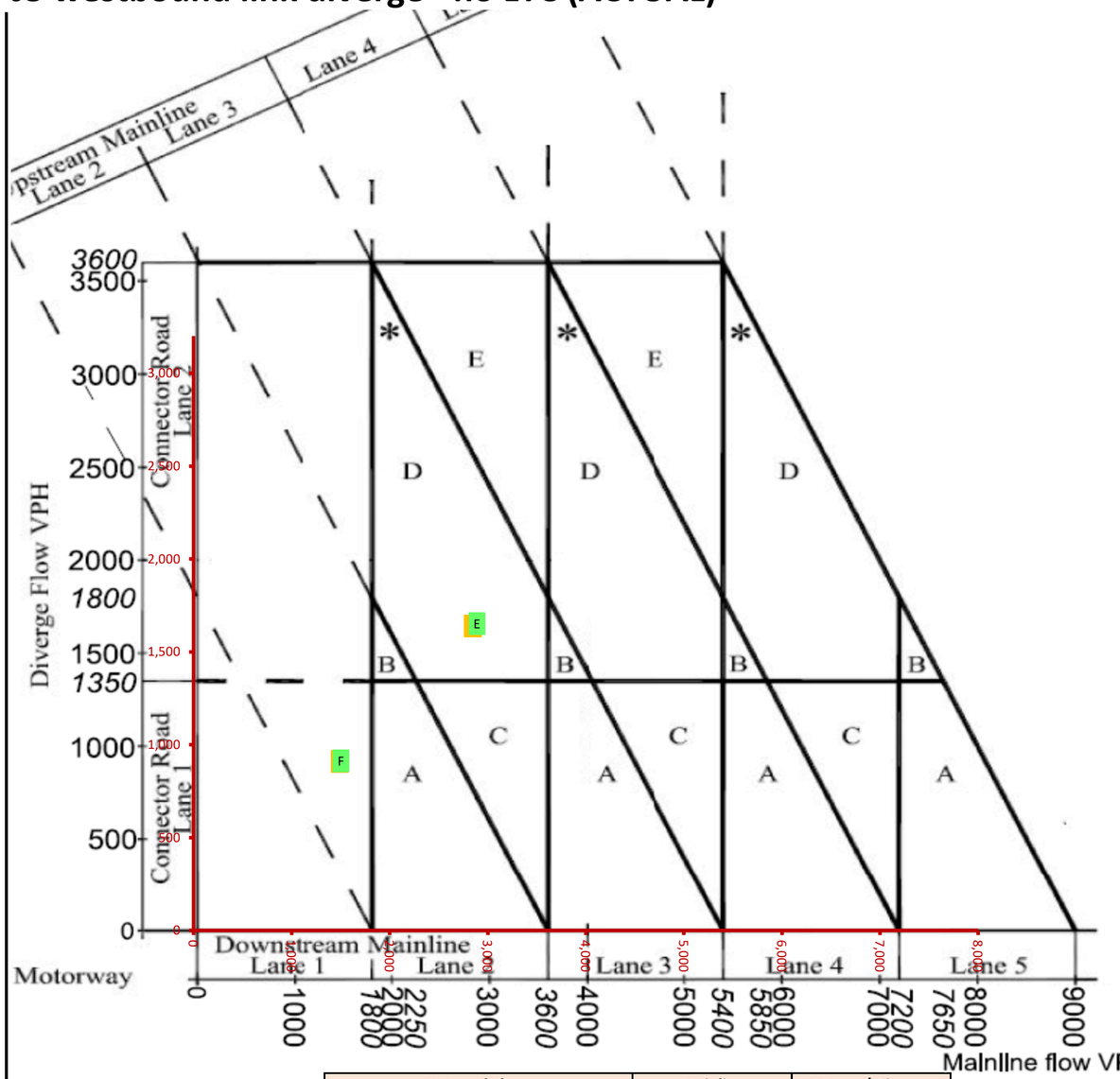
J3 westbound link diverge - with LTC (DEMAND)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	2,846	1,641	2,846	1.00	1,641	1.00
B	Ref no LTC PM	1,487	909	1,487	1.00	909	1.00
C	Ref with LTC AM			2,943	1.00	1,545	1.00
D	Ref with LTC PM			1,465	1.00	884	1.00
E	LP Scenario no LTC AM	2,889	1,653	2,889	1.00	1,653	1.00
F	LP Scenario no LTC PM	1,504	914	1,504	1.00	914	1.00
G	LP Scenario with LTC AM			2,986	1.00	1,558	1.00
H	LP Scenario with LTC PM			1,481	1.00	888	1.00

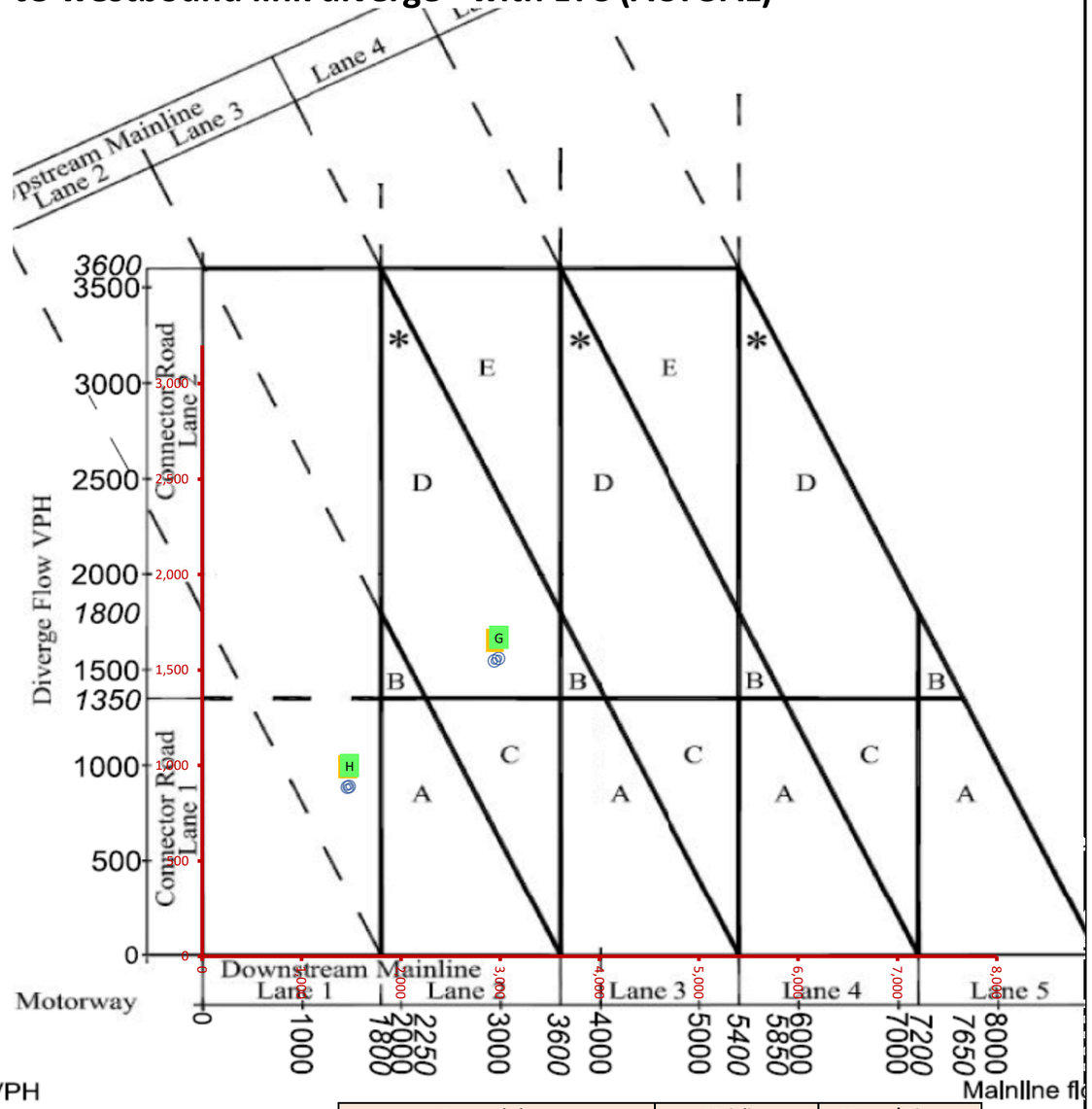
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			2,846	1.00	1,641	1.00
B	Ref no LTC PM			1,487	1.00	909	1.00
C	Ref with LTC AM	2,943	1,545	2,943	1.00	1,545	1.00
D	Ref with LTC PM	1,465	884	1,465	1.00	884	1.00
E	LP Scenario no LTC AM			2,889	1.00	1,653	1.00
F	LP Scenario no LTC PM			1,504	1.00	914	1.00
G	LP Scenario with LTC AM	2,986	1,558	2,986	1.00	1,558	1.00
H	LP Scenario with LTC PM	1,481	888	1,481	1.00	888	1.00

J3 westbound link diverge - no LTC (ACTUAL)



		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	2,846	1,641	2,846	1.00	1,641	1.00
B	Ref no LTC PM	1,487	909	1,487	1.00	909	1.00
C	Ref with LTC AM			2,943	1.00	1,545	1.00
D	Ref with LTC PM			1,465	1.00	884	1.00
E	LP Scenario no LTC AM	2,889	1,653	2,889	1.00	1,653	1.00
F	LP Scenario no LTC PM	1,504	914	1,504	1.00	914	1.00
G	LP Scenario with LTC AM			2,986	1.00	1,558	1.00
H	LP Scenario with LTC PM			1,481	1.00	888	1.00

J3 westbound link diverge - with LTC (ACTUAL)

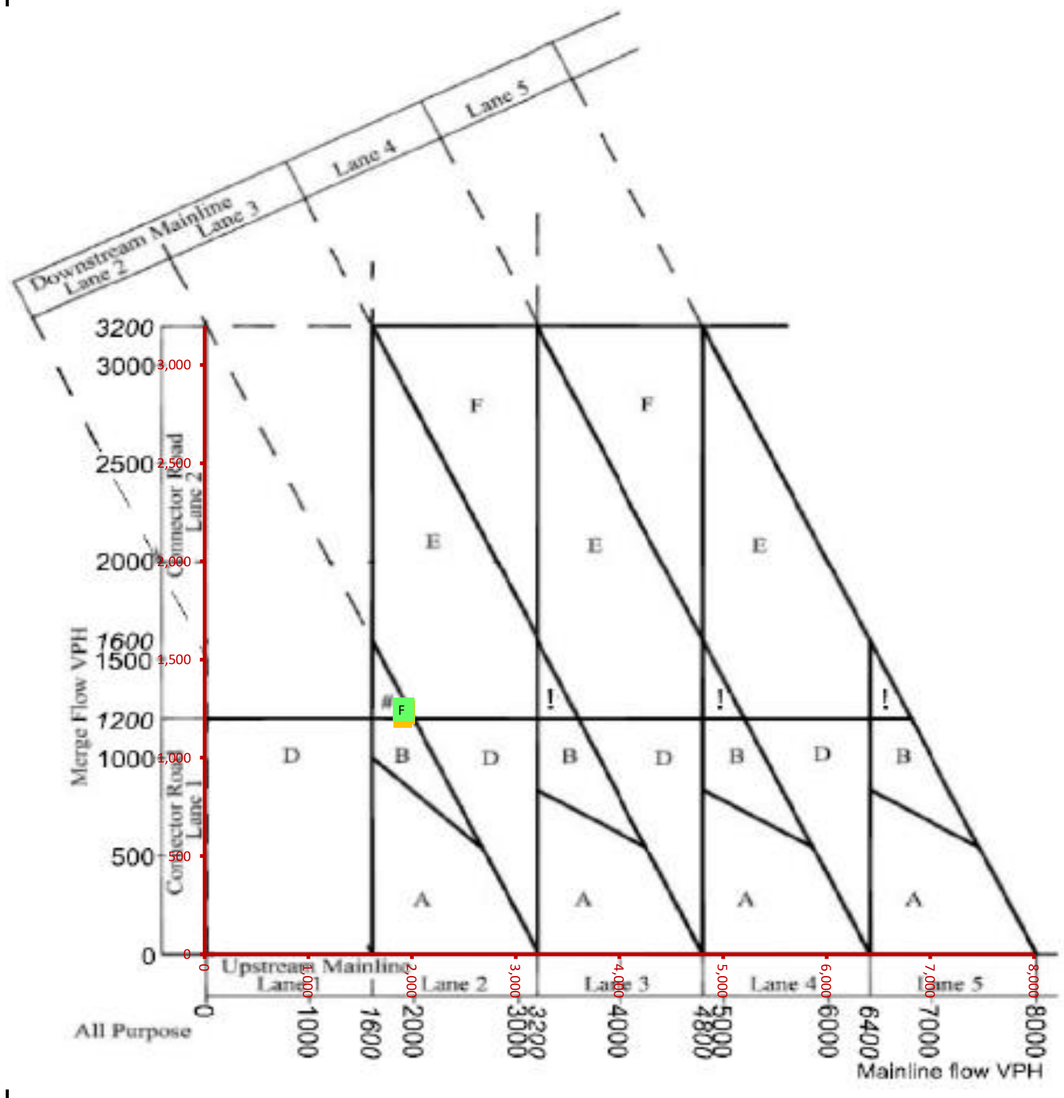


		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			2,846	1.00	1,641	1.00
B	Ref no LTC PM			1,487	1.00	909	1.00
C	Ref with LTC AM	2,943	1,545	2,943	1.00	1,545	1.00
D	Ref with LTC PM	1,465	884	1,465	1.00	884	1.00
E	LP Scenario no LTC AM			2,889	1.00	1,653	1.00
F	LP Scenario no LTC PM			1,504	1.00	914	1.00
G	LP Scenario with LTC AM	2,986	1,558	2,986	1.00	1,558	1.00
H	LP Scenario with LTC PM	1,481	888	1,481	1.00	888	1.00

Appendix L

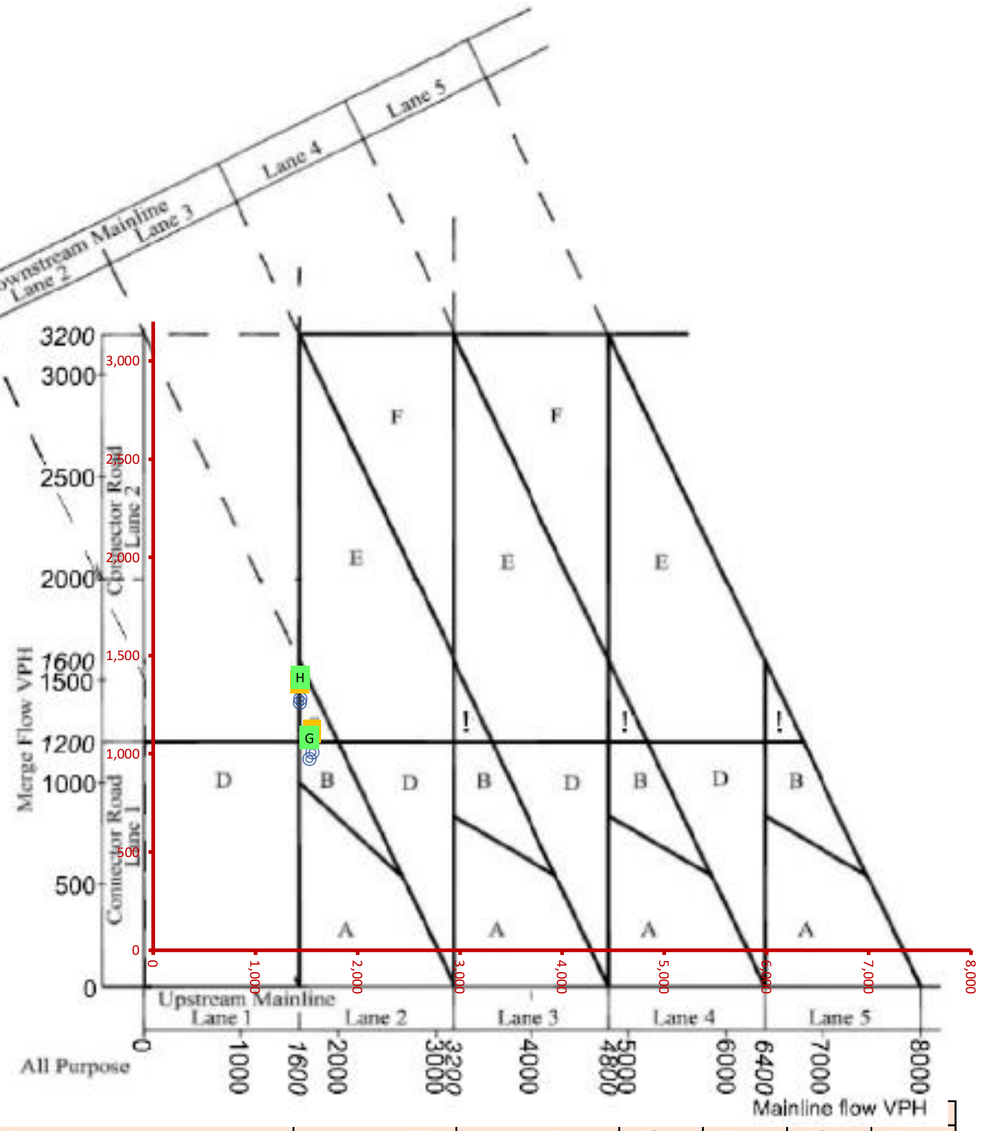
Merge / Diverge figures (Sensitivity assessment)

J1a northbound merge - no LTC (DEMAND)
SENSITIVITY ASSESSMENT



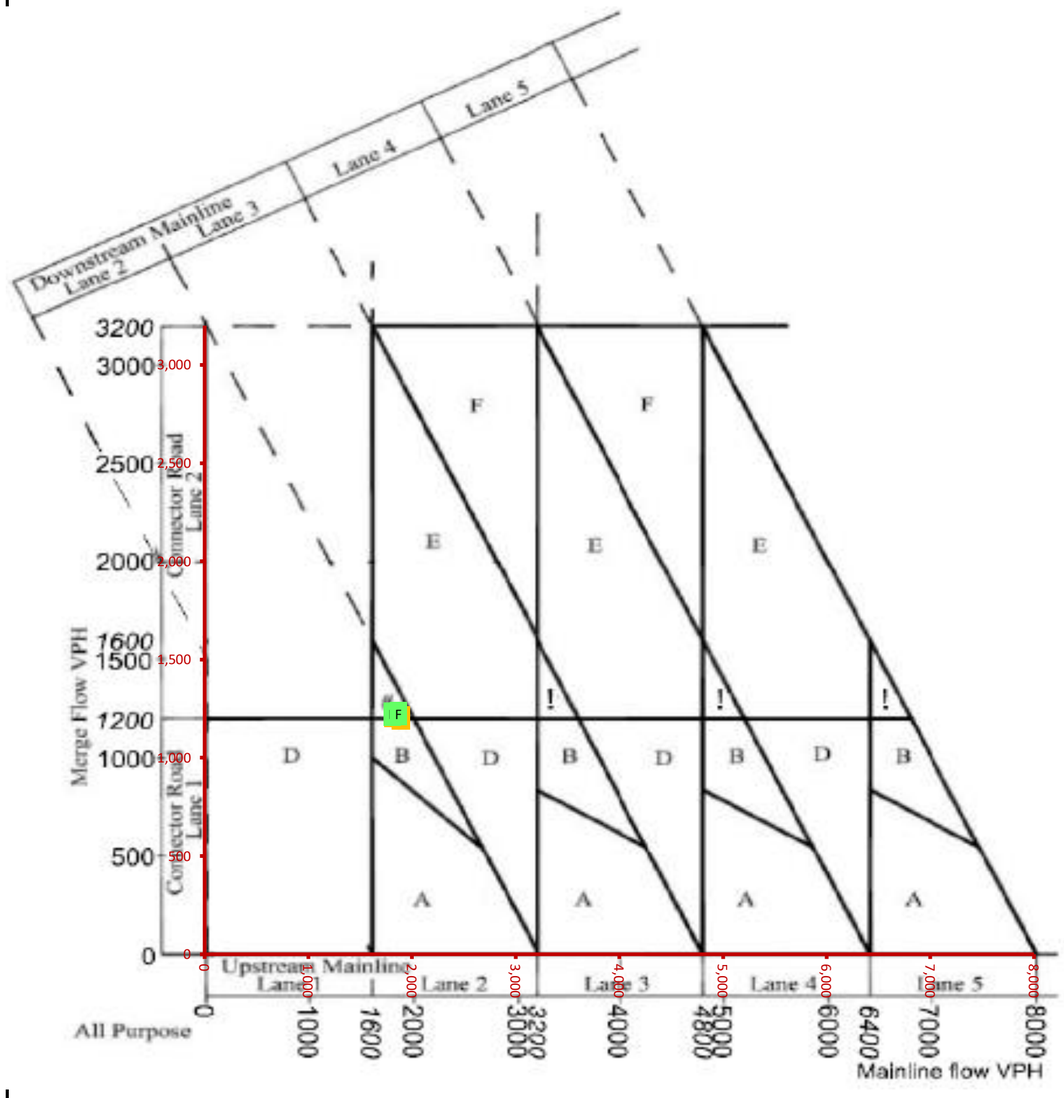
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	1,937	1,232	1,845	1.05	1,120	1.10
B	Ref no LTC PM	1,912	1,214	1,912	1.00	1,214	1.00
C	Ref with LTC AM			1,482	1.05	916	1.10
D	Ref with LTC PM			1,433	1.00	1,259	1.00
E	LP Scenario no LTC AM	1,938	1,247	1,845	1.05	1,134	1.10
F	LP Scenario no LTC PM	1,901	1,247	1,901	1.00	1,247	1.00
G	LP Scenario with LTC AM			1,529	1.00	886	1.10
H	LP Scenario with LTC PM			1,438	1.00	1,281	1.00

J1a northbound merge - with LTC (DEMAND)
SENSITIVITY ASSESSMENT



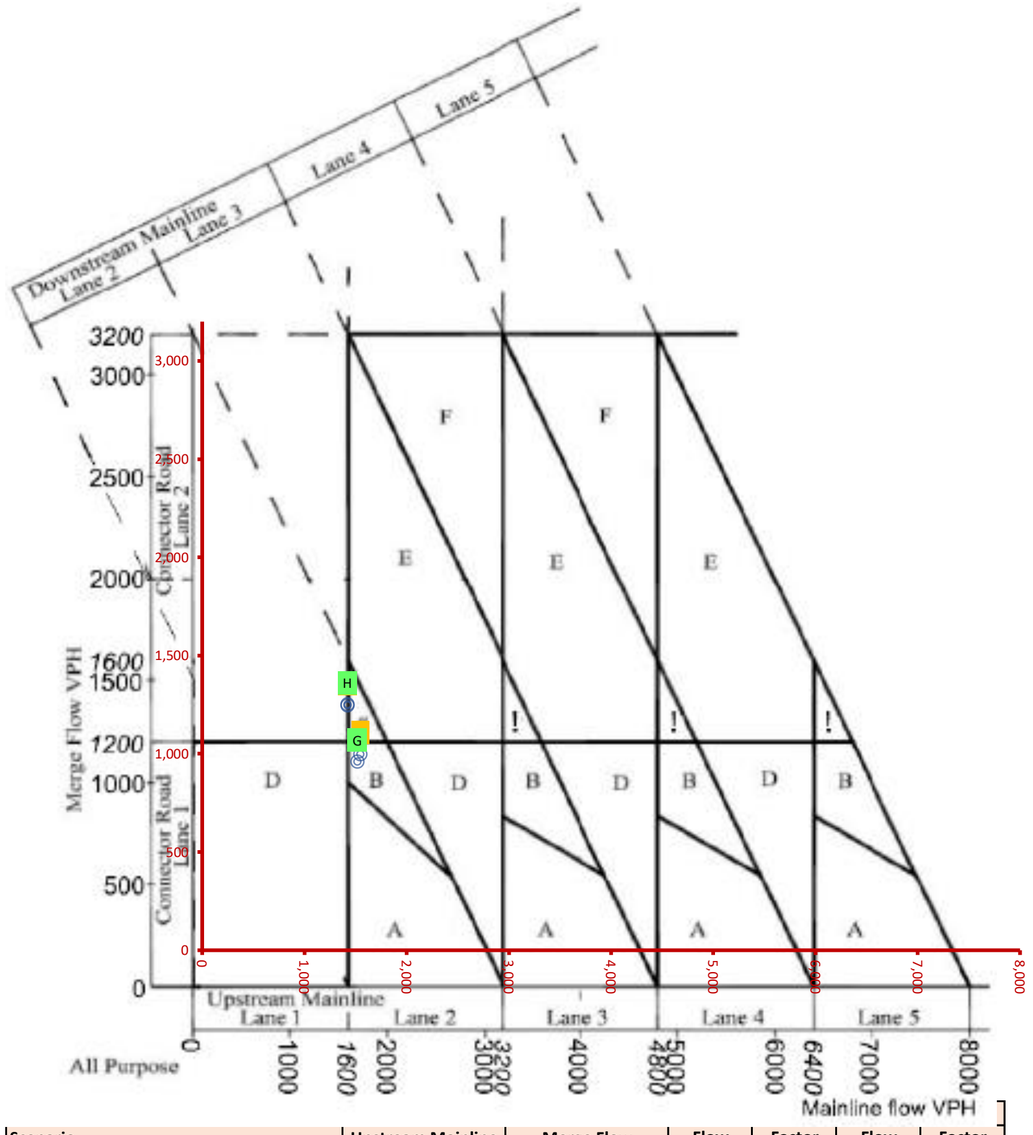
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			1,845	1.05	1,120	1.10
B	Ref no LTC PM			1,912	1.00	1,214	1.00
C	Ref with LTC AM	1,557	1,007	1,482	1.05	916	1.10
D	Ref with LTC PM	1,433	1,259	1,433	1.00	1,259	1.00
E	LP Scenario no LTC AM			1,845	1.05	1,134	1.10
F	LP Scenario no LTC PM			1,901	1.00	1,247	1.00
G	LP Scenario with LTC AM	1,529	975	1,529	1.00	886	1.10
H	LP Scenario with LTC PM	1,438	1,281	1,438	1.00	1,281	1.00

J1a northbound merge - no LTC (ACTUAL)
SENSITIVITY ASSESSMENT



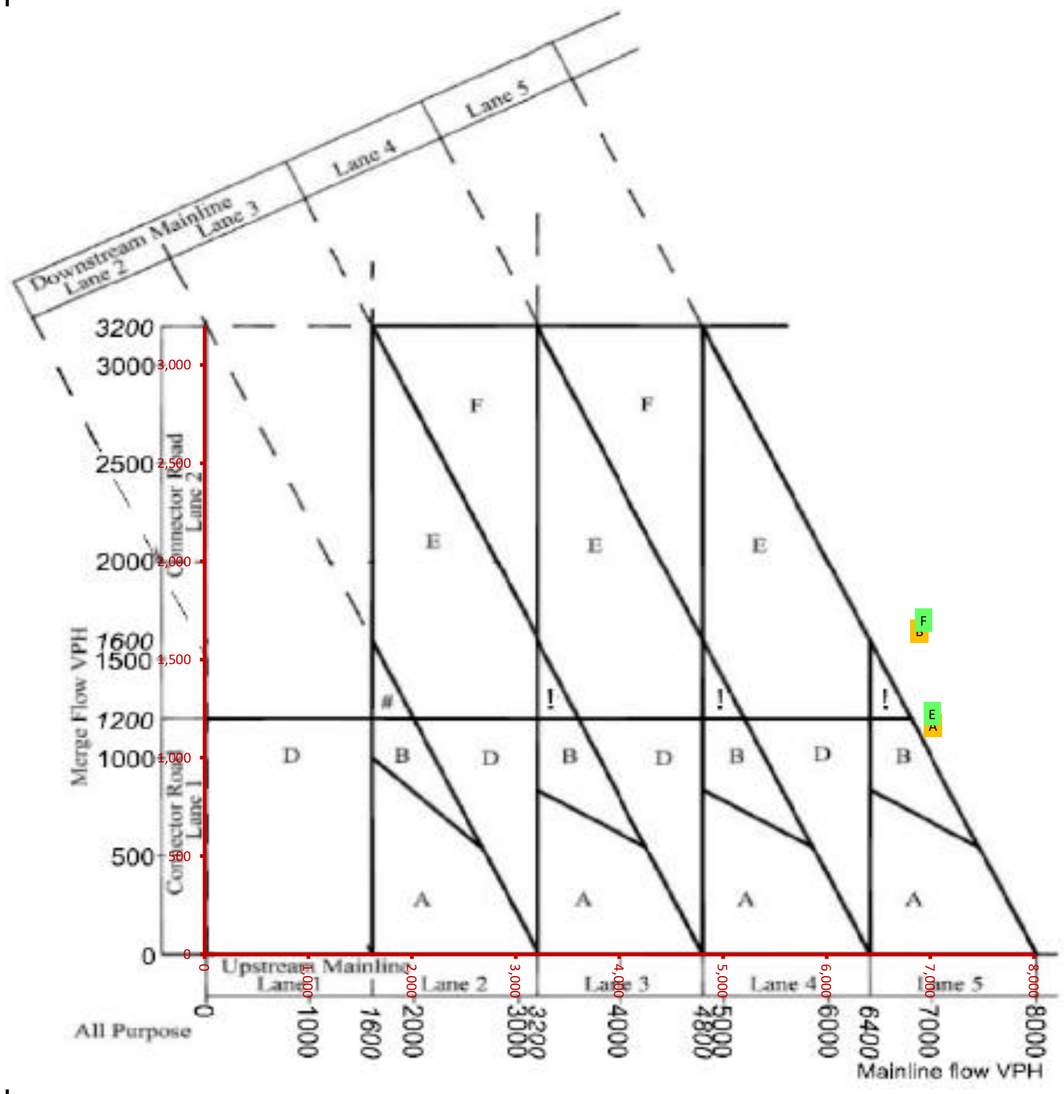
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	1,819	1,215	1,733	1.05	1,104	1.10
B	Ref no LTC PM	1,893	1,204	1,893	1.00	1,204	1.00
C	Ref with LTC AM			1,473	1.05	908	1.10
D	Ref with LTC PM			1,421	1.00	1,248	1.00
E	LP Scenario no LTC AM	1,807	1,223	1,721	1.05	1,112	1.10
F	LP Scenario no LTC PM	1,871	1,225	1,871	1.00	1,225	1.00
G	LP Scenario with LTC AM			1,515	1.00	874	1.10
H	LP Scenario with LTC PM			1,419	1.00	1,253	1.00

J1a northbound merge - with LTC (ACTUAL)
SENSITIVITY ASSESSMENT



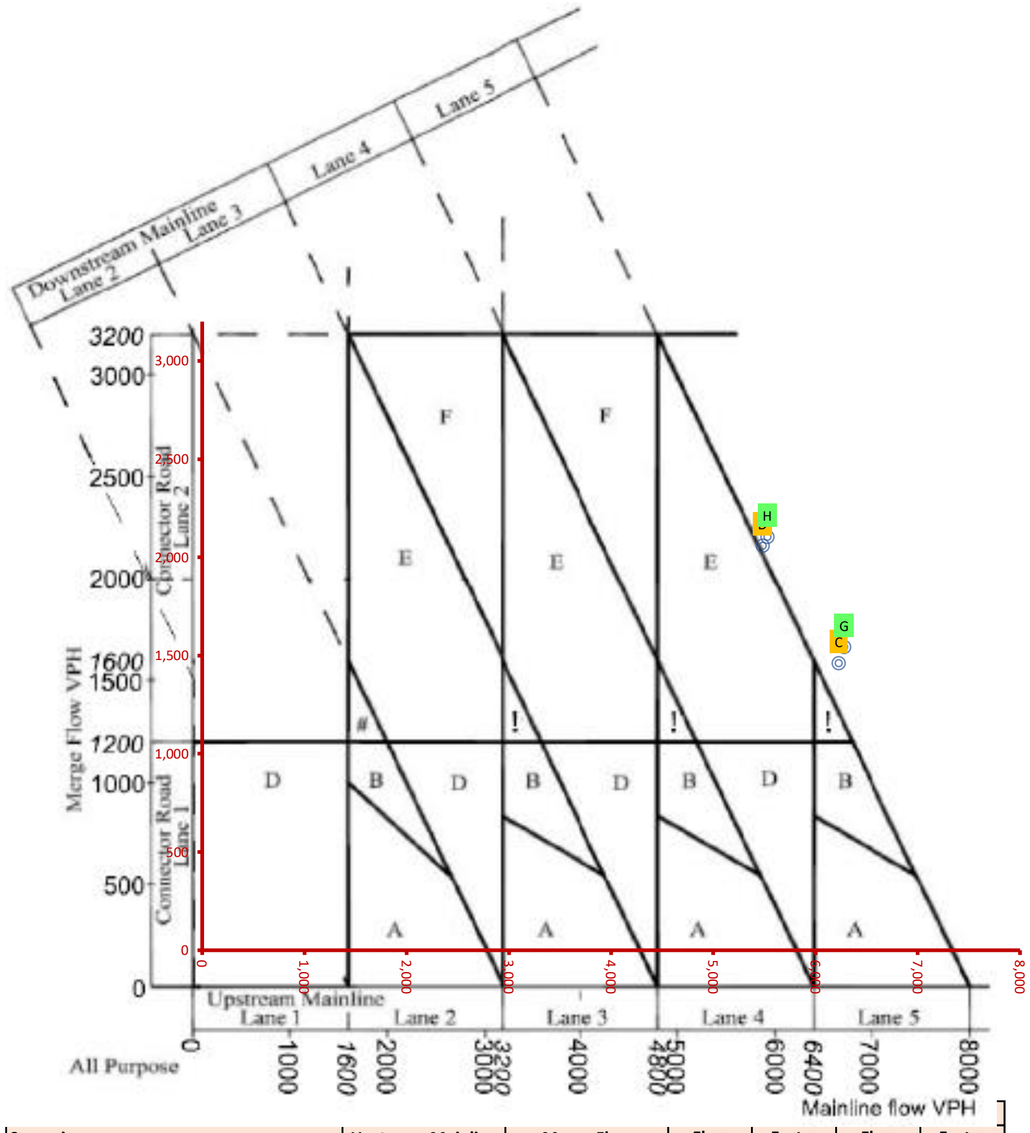
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			1,733	1.05	1,104	1.10
B	Ref no LTC PM			1,893	1.00	1,204	1.00
C	Ref with LTC AM	1,547	999	1,473	1.05	908	1.10
D	Ref with LTC PM	1,421	1,248	1,421	1.00	1,248	1.00
E	LP Scenario no LTC AM			1,721	1.05	1,112	1.10
F	LP Scenario no LTC PM			1,871	1.00	1,225	1.00
G	LP Scenario with LTC AM	1,515	961	1,515	1.00	874	1.10
H	LP Scenario with LTC PM	1,419	1,253	1,419	1.00	1,253	1.00

J1a southbound merge - no LTC (DEMAND) SENSITIVITY ASSESSMENT



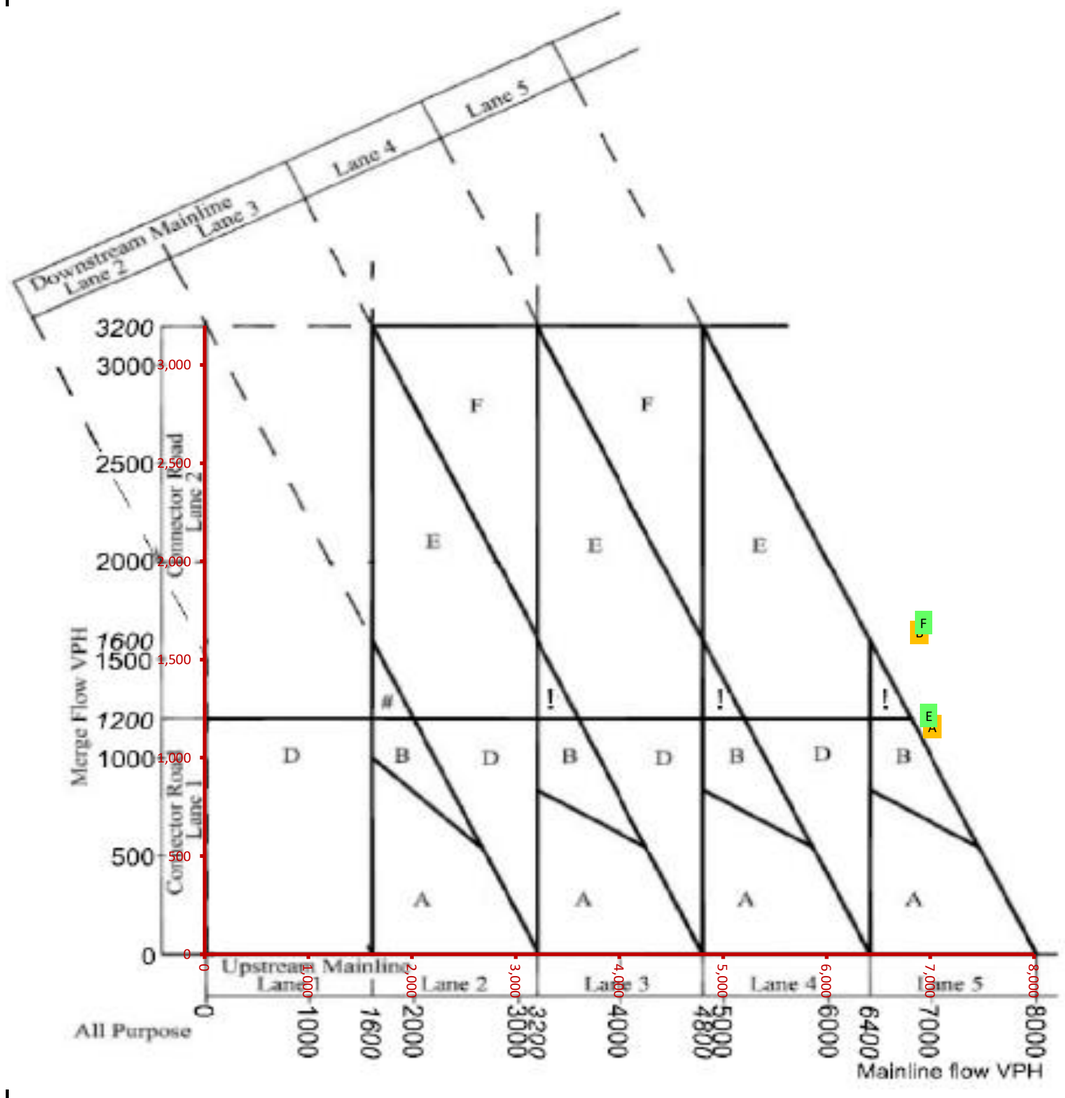
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	7,025	1,164	5,620	1.25	1,059	1.10
B	Ref no LTC PM	6,894	1,646	5,995	1.15	1,646	1.00
C	Ref with LTC AM			4,980	1.25	1,393	1.05
D	Ref with LTC PM			4,765	1.15	2,060	1.00
E	LP Scenario no LTC AM	7,017	1,225	5,613	1.25	1,113	1.10
F	LP Scenario no LTC PM	6,935	1,702	6,030	1.15	1,702	1.00
G	LP Scenario with LTC AM			5,022	1.25	1,471	1.05
H	LP Scenario with LTC PM			4,806	1.15	2,105	1.00

J1a southbound merge - with LTC (DEMAND) SENSITIVITY ASSESSMENT



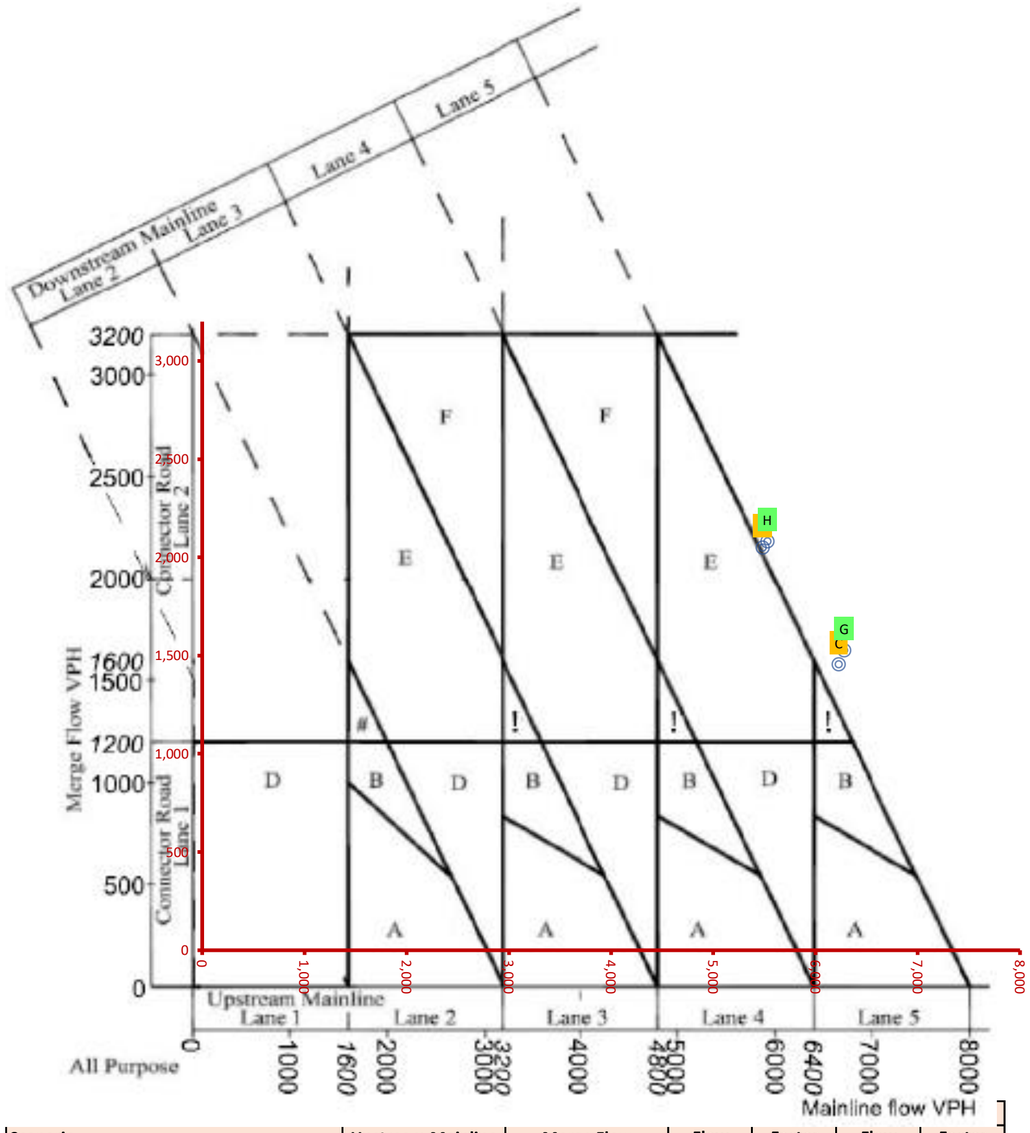
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,620	1.25	1,059	1.10
B	Ref no LTC PM			5,995	1.15	1,646	1.00
C	Ref with LTC AM	6,225	1,462	4,980	1.25	1,393	1.05
D	Ref with LTC PM	5,480	2,060	4,765	1.15	2,060	1.00
E	LP Scenario no LTC AM			5,613	1.25	1,113	1.10
F	LP Scenario no LTC PM			6,030	1.15	1,702	1.00
G	LP Scenario with LTC AM	6,277	1,545	5,022	1.25	1,471	1.05
H	LP Scenario with LTC PM	5,527	2,105	4,806	1.15	2,105	1.00

J1a southbound merge - no LTC (ACTUAL)
SENSITIVITY ASSESSMENT



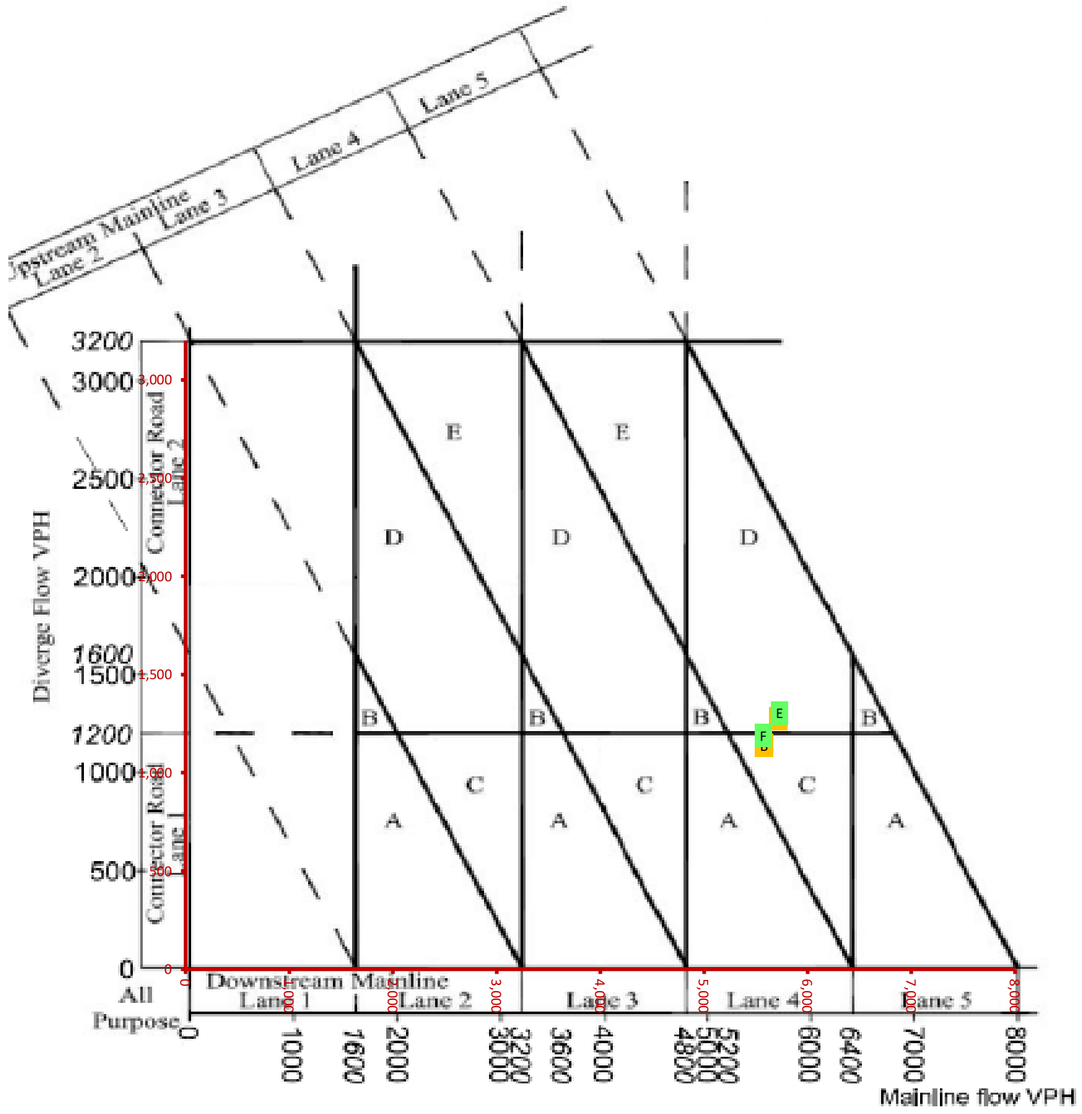
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	7,020	1,159	5,616	1.25	1,054	1.10
B	Ref no LTC PM	6,894	1,639	5,995	1.15	1,639	1.00
C	Ref with LTC AM			4,980	1.25	1,387	1.05
D	Ref with LTC PM			4,765	1.15	2,051	1.00
E	LP Scenario no LTC AM	6,986	1,216	5,589	1.25	1,106	1.10
F	LP Scenario no LTC PM	6,935	1,689	6,030	1.15	1,689	1.00
G	LP Scenario with LTC AM			5,022	1.25	1,455	1.05
H	LP Scenario with LTC PM			4,806	1.15	2,082	1.00

J1a southbound merge - with LTC (ACTUAL)
SENSITIVITY ASSESSMENT



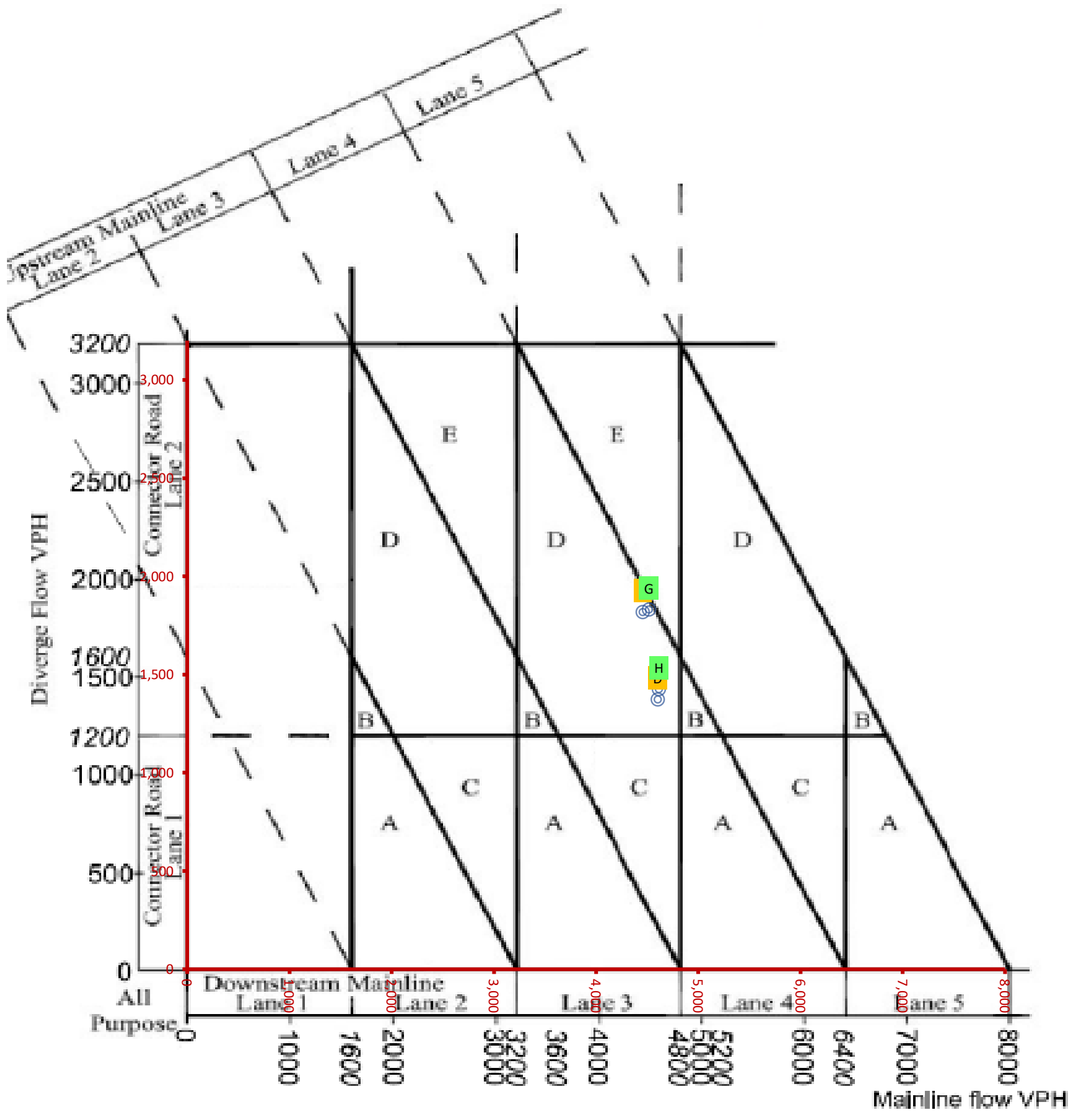
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,616	1.25	1,054	1.10
B	Ref no LTC PM			5,995	1.15	1,639	1.00
C	Ref with LTC AM	6,225	1,457	4,980	1.25	1,387	1.05
D	Ref with LTC PM	5,480	2,051	4,765	1.15	2,051	1.00
E	LP Scenario no LTC AM			5,589	1.25	1,106	1.10
F	LP Scenario no LTC PM			6,030	1.15	1,689	1.00
G	LP Scenario with LTC AM	6,277	1,527	5,022	1.25	1,455	1.05
H	LP Scenario with LTC PM	5,527	2,082	4,806	1.15	2,082	1.00

J1a northbound diverge - no LTC (DEMAND) SENSITIVITY ASSESSMENT



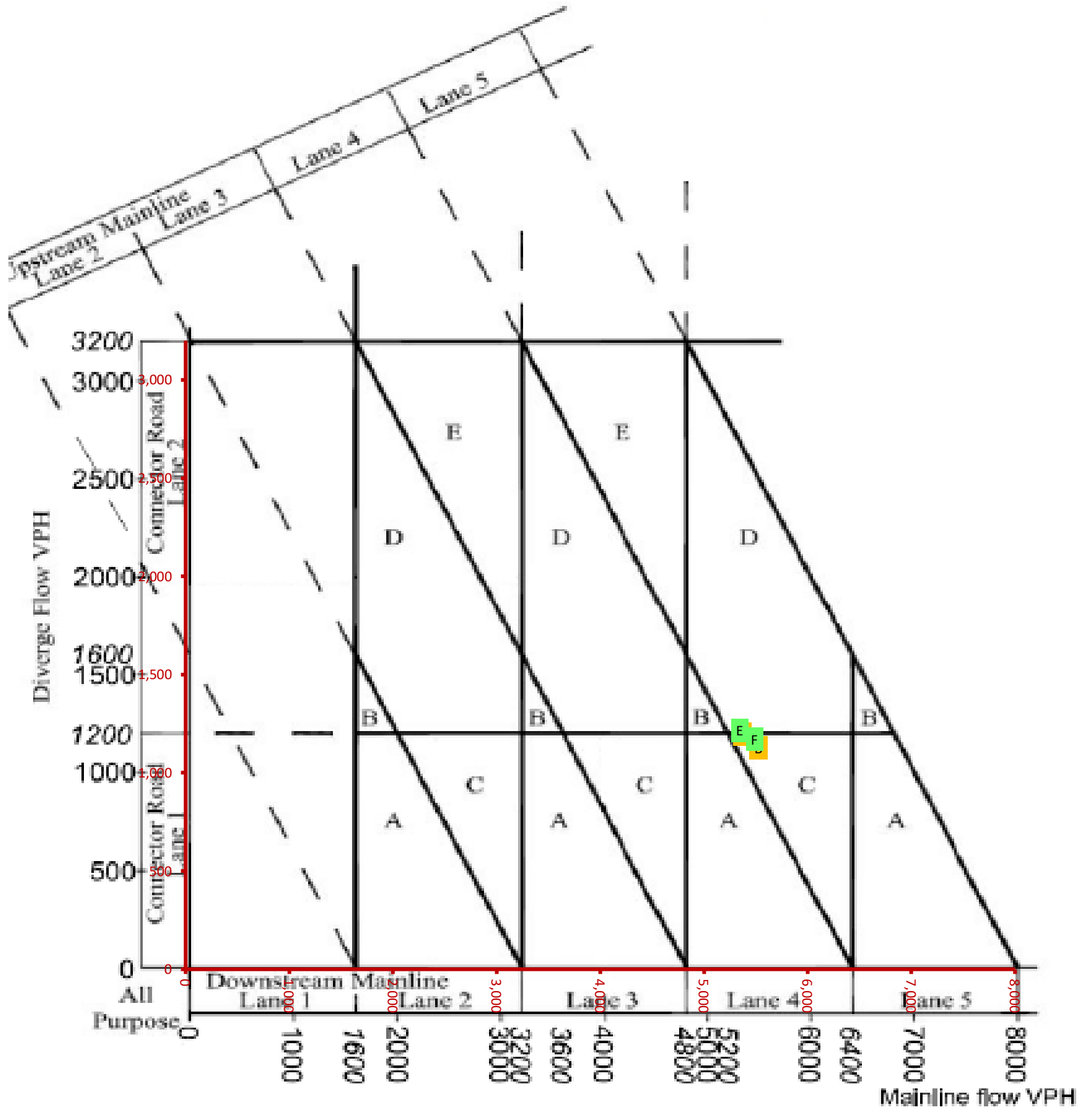
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,719	1,276	5,719	1.00	1,276	1.00
B	Ref no LTC PM	5,579	1,139	5,579	1.00	1,139	1.00
C	Ref with LTC AM			4,453	1.00	1,819	1.00
D	Ref with LTC PM			4,602	1.00	1,374	1.00
E	LP Scenario no LTC AM	5,728	1,305	5,728	1.00	1,305	1.00
F	LP Scenario no LTC PM	5,572	1,189	5,572	1.00	1,189	1.00
G	LP Scenario with LTC AM			4,514	1.00	1,832	1.00
H	LP Scenario with LTC PM			4,613	1.00	1,426	1.00

J1a northbound diverge - with LTC (DEMAND) SENSITIVITY ASSESSMENT



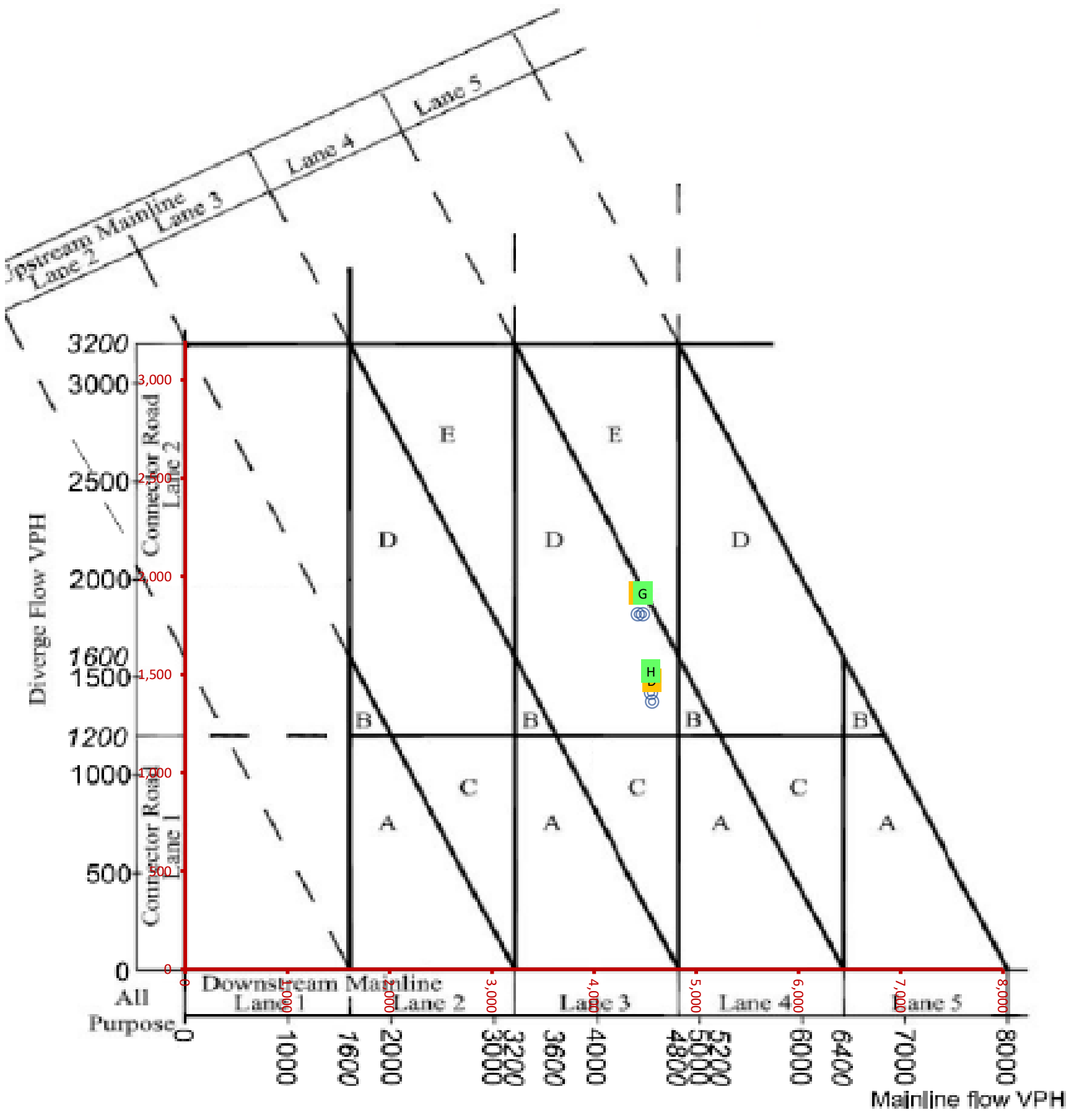
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,719	1.00	1,276	1.00
B	Ref no LTC PM			5,579	1.00	1,139	1.00
C	Ref with LTC AM	4,453	1,819	4,453	1.00	1,819	1.00
D	Ref with LTC PM	4,602	1,374	4,602	1.00	1,374	1.00
E	LP Scenario no LTC AM			5,728	1.00	1,305	1.00
F	LP Scenario no LTC PM			5,572	1.00	1,189	1.00
G	LP Scenario with LTC AM	4,514	1,832	4,514	1.00	1,832	1.00
H	LP Scenario with LTC PM	4,613	1,426	4,613	1.00	1,426	1.00

J1a northbound diverge - no LTC (ACTUAL)
SENSITIVITY ASSESSMENT



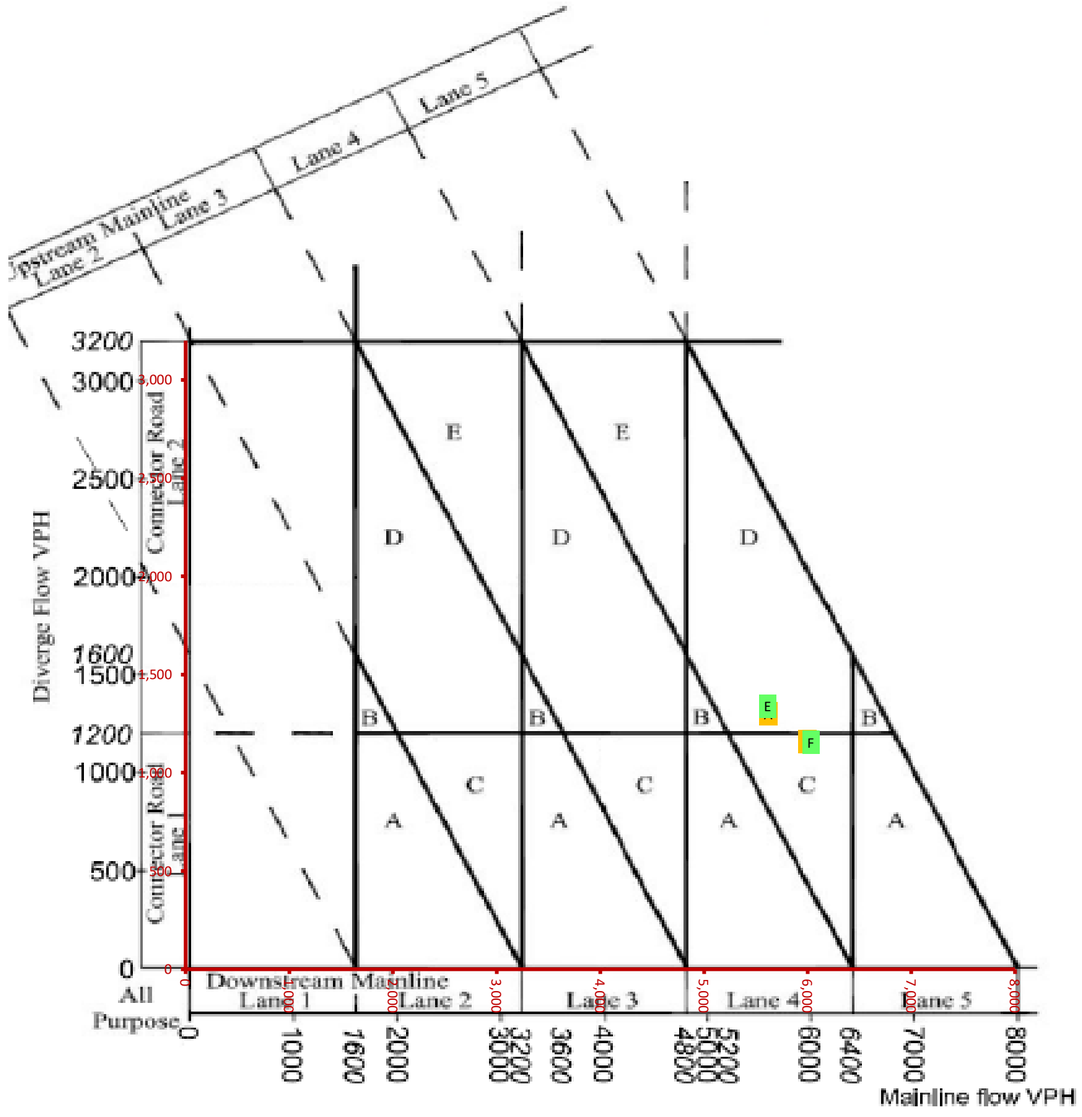
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,370	1,198	5,370	1.00	1,198	1.00
B	Ref no LTC PM	5,525	1,128	5,525	1.00	1,128	1.00
C	Ref with LTC AM			4,425	1.00	1,807	1.00
D	Ref with LTC PM			4,564	1.00	1,363	1.00
E	LP Scenario no LTC AM	5,343	1,217	5,343	1.00	1,217	1.00
F	LP Scenario no LTC PM	5,487	1,171	5,487	1.00	1,171	1.00
G	LP Scenario with LTC AM			4,475	1.00	1,807	1.00
H	LP Scenario with LTC PM			4,554	1.00	1,408	1.00

J1a northbound diverge - with LTC (ACTUAL)
SENSITIVITY ASSESSMENT



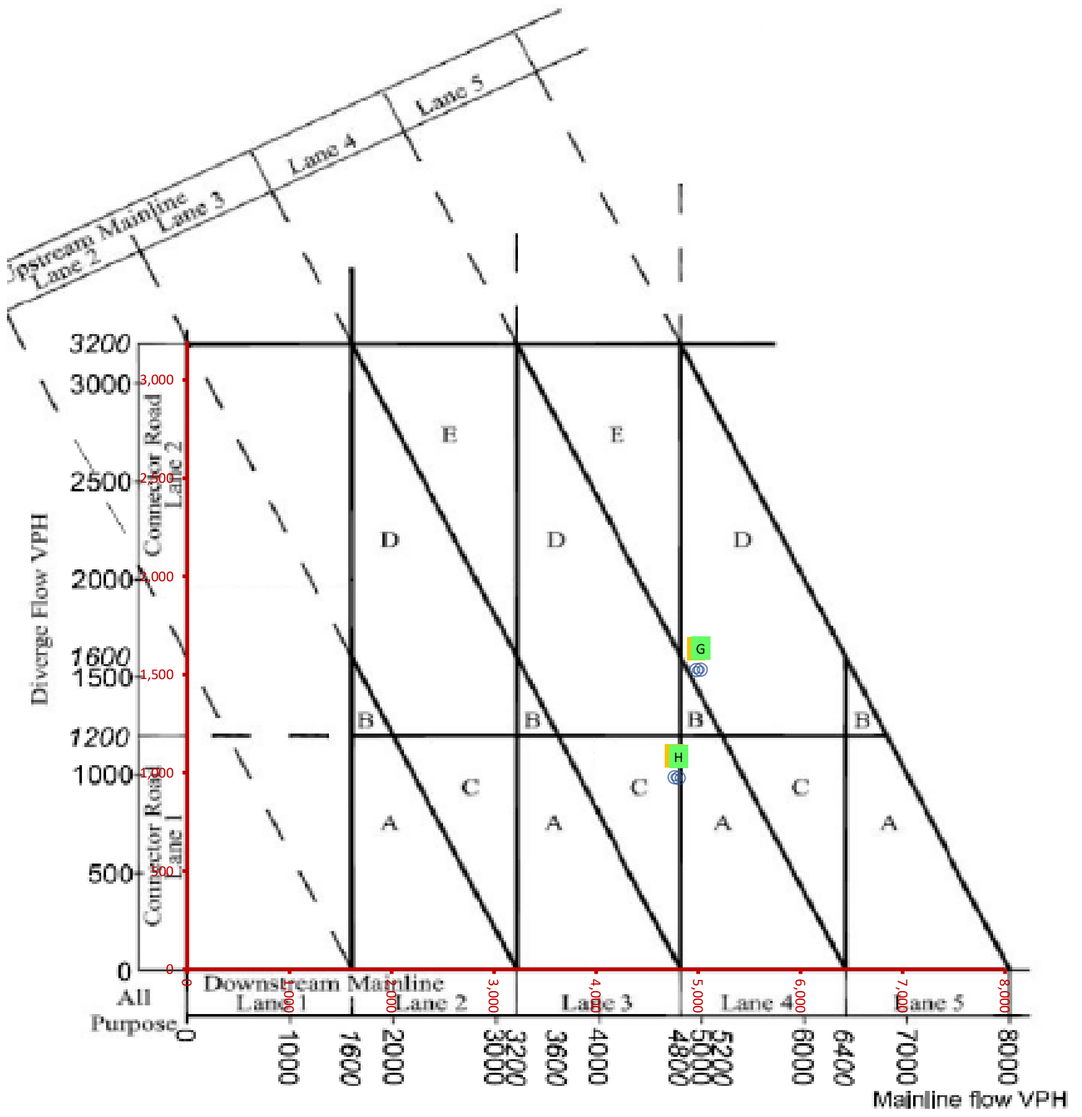
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,370	1.00	1,198	1.00
B	Ref no LTC PM			5,525	1.00	1,128	1.00
C	Ref with LTC AM	4,425	1,807	4,425	1.00	1,807	1.00
D	Ref with LTC PM	4,564	1,363	4,564	1.00	1,363	1.00
E	LP Scenario no LTC AM			5,343	1.00	1,217	1.00
F	LP Scenario no LTC PM			5,487	1.00	1,171	1.00
G	LP Scenario with LTC AM	4,475	1,807	4,475	1.00	1,807	1.00
H	LP Scenario with LTC PM	4,554	1,408	4,554	1.00	1,408	1.00

J1a southbound diverge - no LTC (DEMAND) SENSITIVITY ASSESSMENT



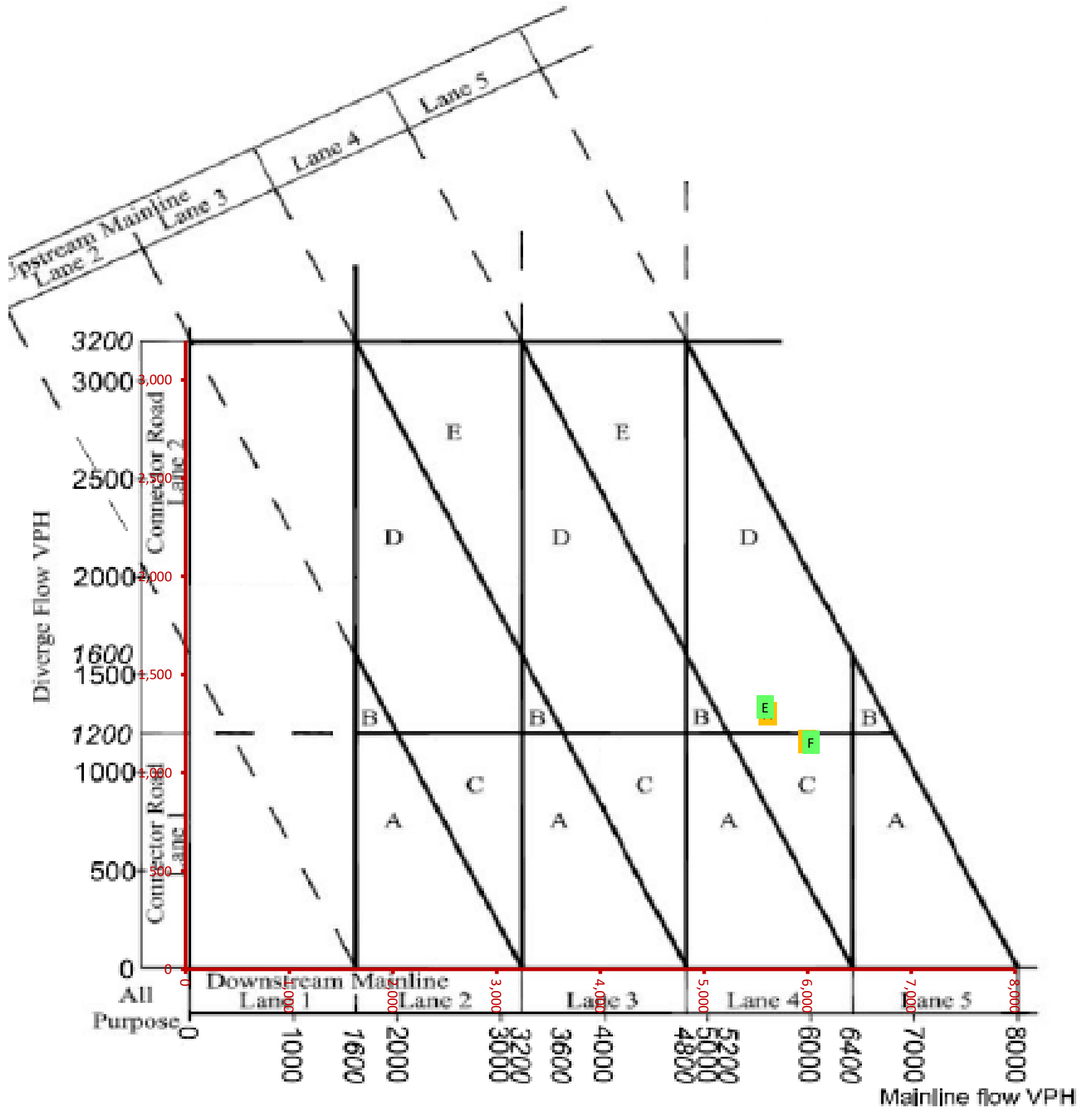
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,620	1,301	5,620	1.00	1,301	1.00
B	Ref no LTC PM	5,995	1,159	5,995	1.00	1,159	1.00
C	Ref with LTC AM			4,980	1.00	1,524	1.00
D	Ref with LTC PM			4,765	1.00	977	1.00
E	LP Scenario no LTC AM	5,613	1,340	5,613	1.00	1,340	1.00
F	LP Scenario no LTC PM	6,030	1,156	6,030	1.00	1,156	1.00
G	LP Scenario with LTC AM			5,022	1.00	1,525	1.00
H	LP Scenario with LTC PM			4,806	1.00	974	1.00

J1a southbound diverge - with LTC (DEMAND) SENSITIVITY ASSESSMENT



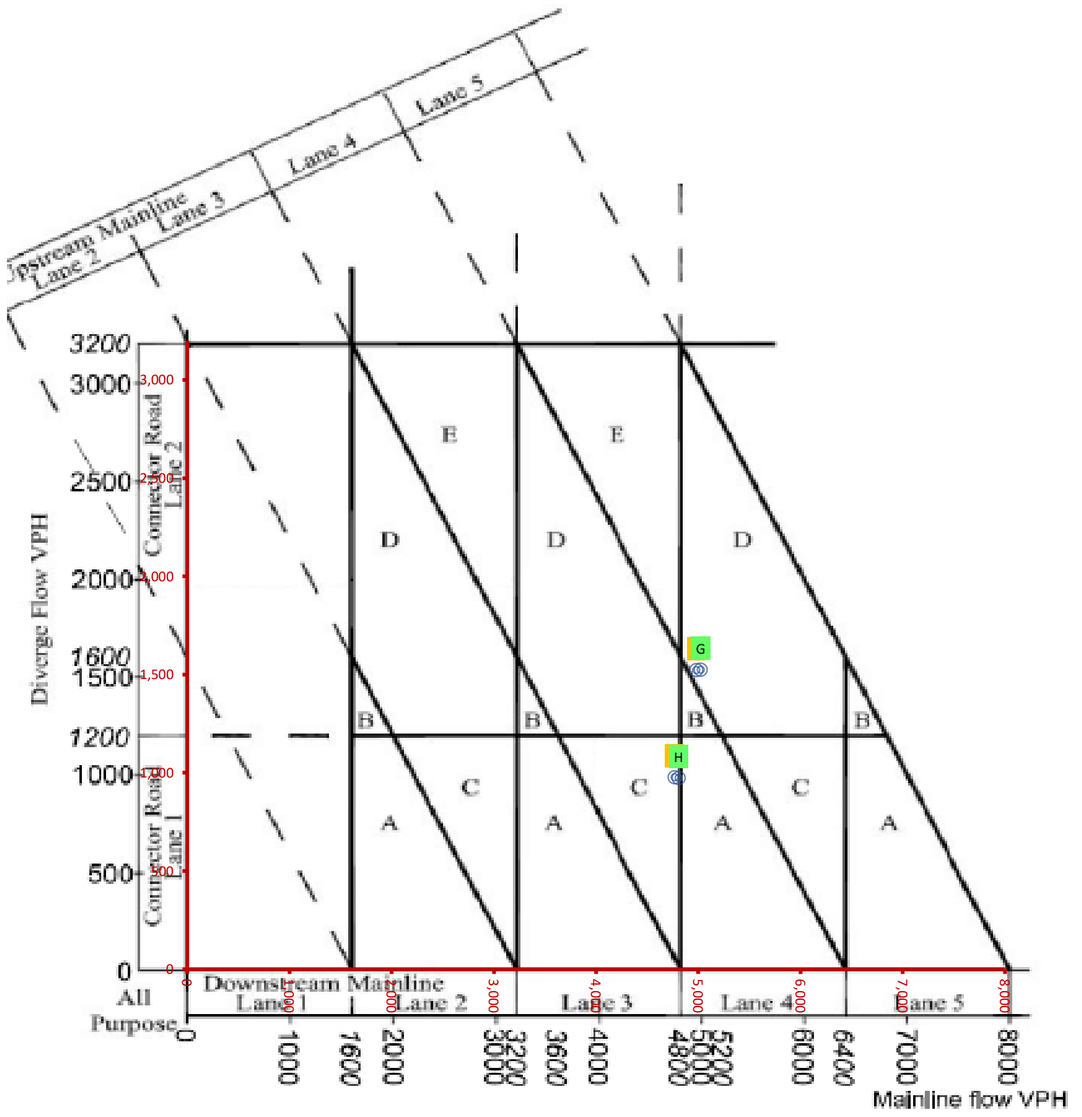
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,620	1.00	1,301	1.00
B	Ref no LTC PM			5,995	1.00	1,159	1.00
C	Ref with LTC AM	4,980	1,524	4,980	1.00	1,524	1.00
D	Ref with LTC PM	4,765	977	4,765	1.00	977	1.00
E	LP Scenario no LTC AM			5,613	1.00	1,340	1.00
F	LP Scenario no LTC PM			6,030	1.00	1,156	1.00
G	LP Scenario with LTC AM	5,022	1,525	5,022	1.00	1,525	1.00
H	LP Scenario with LTC PM	4,806	974	4,806	1.00	974	1.00

J1a southbound diverge - no LTC (ACTUAL)
SENSITIVITY ASSESSMENT



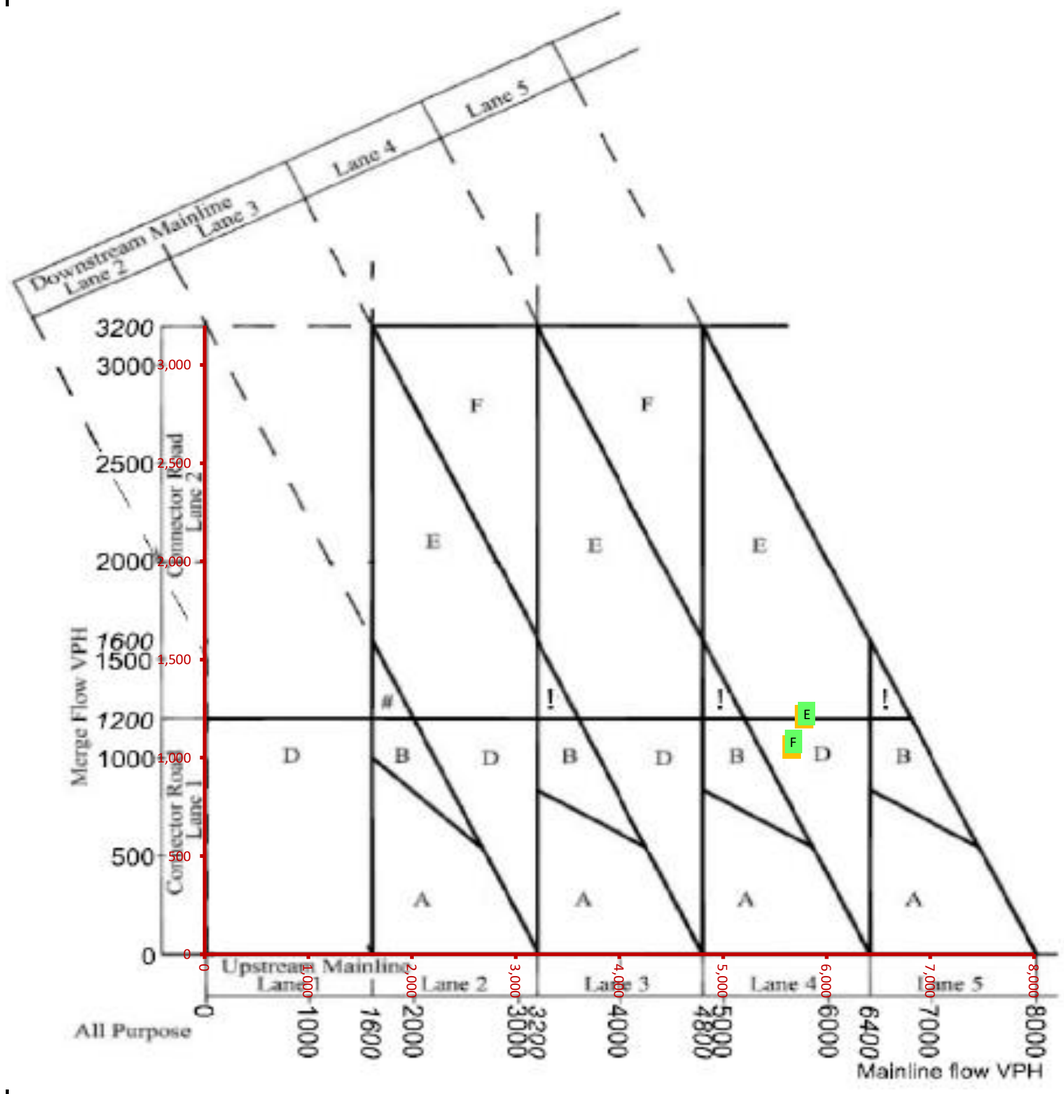
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,616	1,301	5,616	1.00	1,301	1.00
B	Ref no LTC PM	5,995	1,159	5,995	1.00	1,159	1.00
C	Ref with LTC AM			4,980	1.00	1,524	1.00
D	Ref with LTC PM			4,765	1.00	977	1.00
E	LP Scenario no LTC AM	5,589	1,334	5,589	1.00	1,334	1.00
F	LP Scenario no LTC PM	6,030	1,156	6,030	1.00	1,156	1.00
G	LP Scenario with LTC AM			5,022	1.00	1,525	1.00
H	LP Scenario with LTC PM			4,806	1.00	974	1.00

J1a southbound diverge - with LTC (ACTUAL)
SENSITIVITY ASSESSMENT



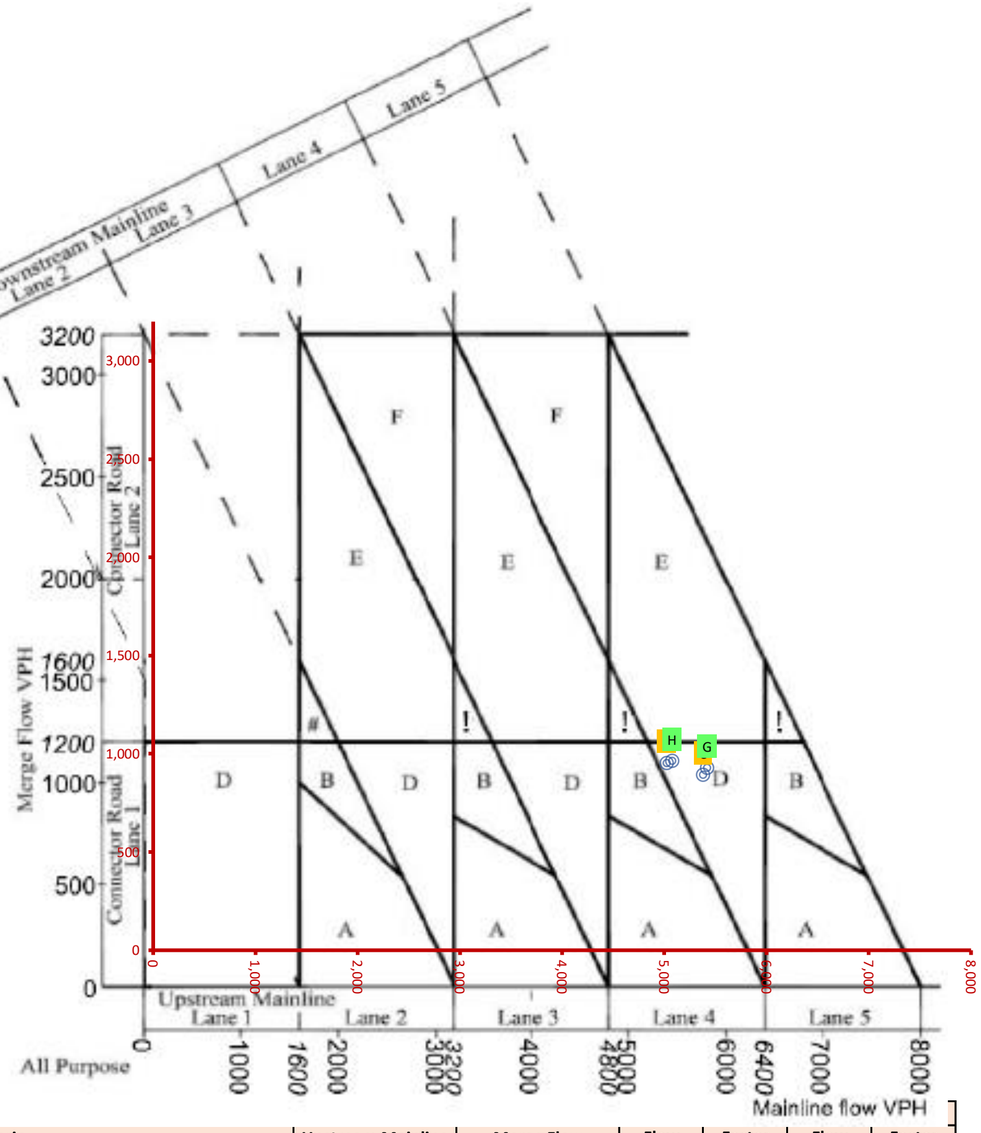
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,616	1.00	1,301	1.00
B	Ref no LTC PM			5,995	1.00	1,159	1.00
C	Ref with LTC AM	4,980	1,524	4,980	1.00	1,524	1.00
D	Ref with LTC PM	4,765	977	4,765	1.00	977	1.00
E	LP Scenario no LTC AM			5,589	1.00	1,334	1.00
F	LP Scenario no LTC PM			6,030	1.00	1,156	1.00
G	LP Scenario with LTC AM	5,022	1,525	5,022	1.00	1,525	1.00
H	LP Scenario with LTC PM	4,806	974	4,806	1.00	974	1.00

J1b northbound merge - no LTC (DEMAND) SENSITIVITY ASSESSMENT



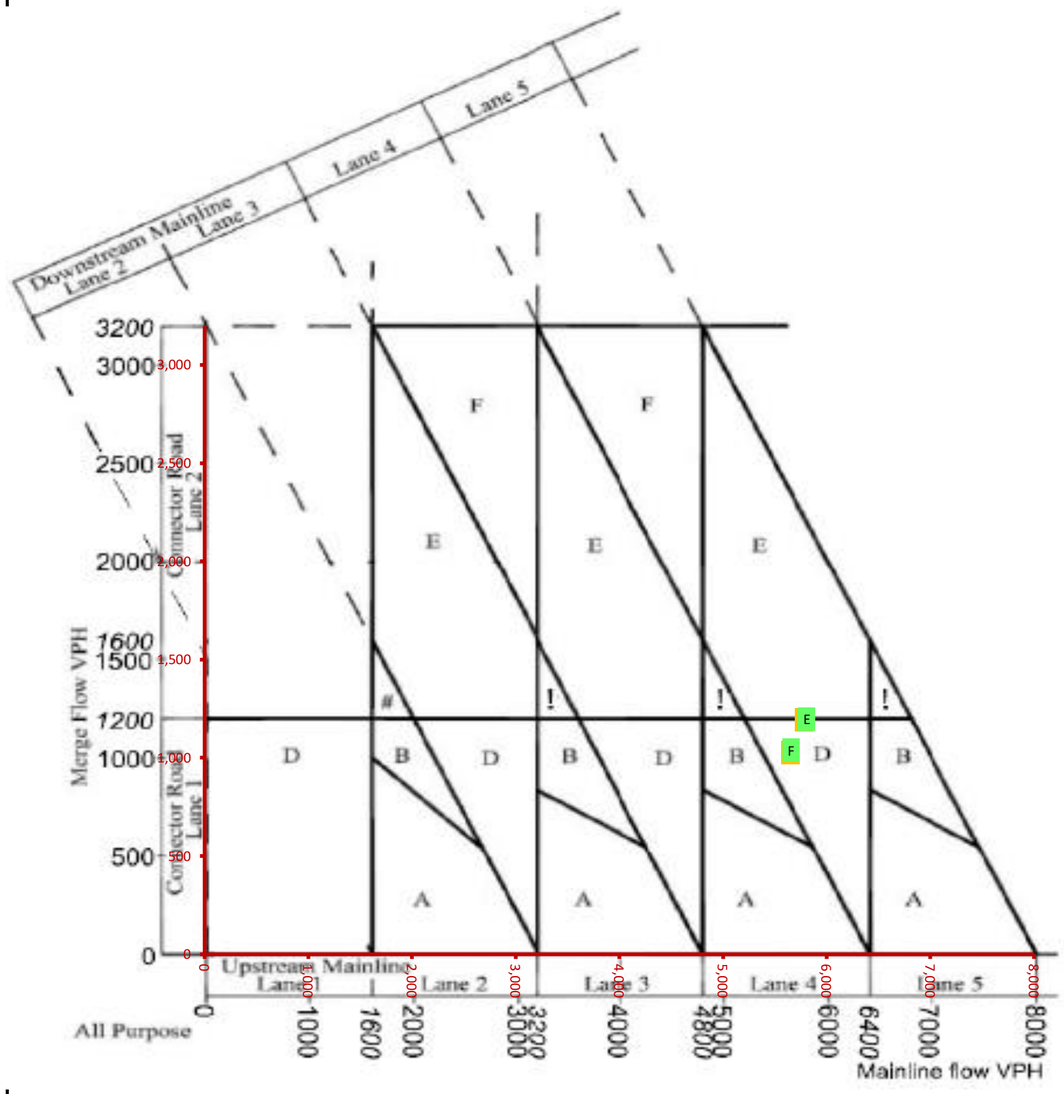
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,784	1,210	5,784	1.00	1,210	1.00
B	Ref no LTC PM	5,663	1,055	5,663	1.00	1,055	1.00
C	Ref with LTC AM			5,378	1.00	894	1.00
D	Ref with LTC PM			5,022	1.00	954	1.00
E	LP Scenario no LTC AM	5,809	1,225	5,809	1.00	1,225	1.00
F	LP Scenario no LTC PM	5,678	1,083	5,678	1.00	1,083	1.00
G	LP Scenario with LTC AM			5,416	1.00	929	1.00
H	LP Scenario with LTC PM			5,075	1.00	965	1.00

J1b northbound merge - with LTC (DEMAND) SENSITIVITY ASSESSMENT



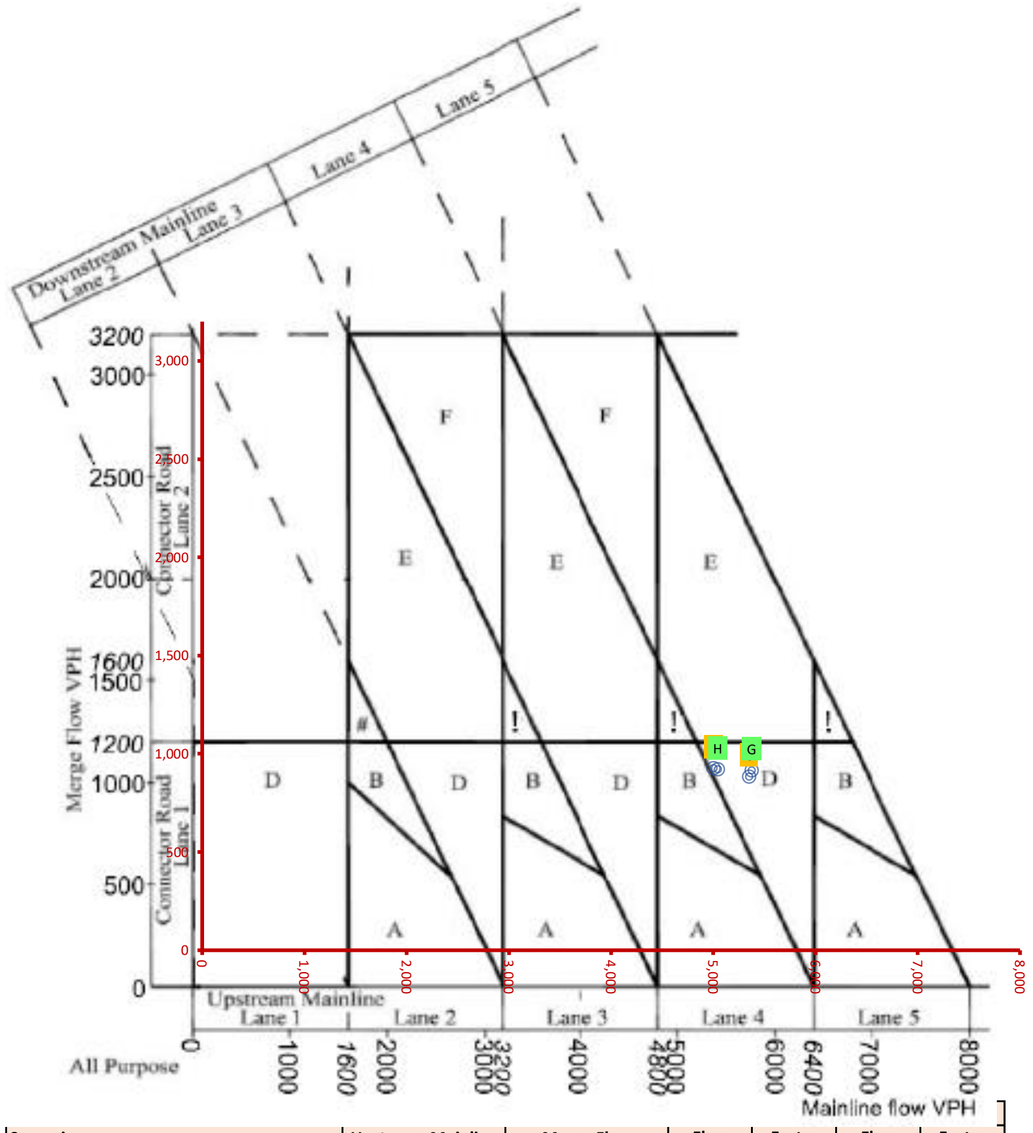
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,784	1.00	1,210	1.00
B	Ref no LTC PM			5,663	1.00	1,055	1.00
C	Ref with LTC AM	5,378	894	5,378	1.00	894	1.00
D	Ref with LTC PM	5,022	954	5,022	1.00	954	1.00
E	LP Scenario no LTC AM			5,809	1.00	1,225	1.00
F	LP Scenario no LTC PM			5,678	1.00	1,083	1.00
G	LP Scenario with LTC AM	5,416	929	5,416	1.00	929	1.00
H	LP Scenario with LTC PM	5,075	965	5,075	1.00	965	1.00

J1b northbound merge - no LTC (ACTUAL)
SENSITIVITY ASSESSMENT



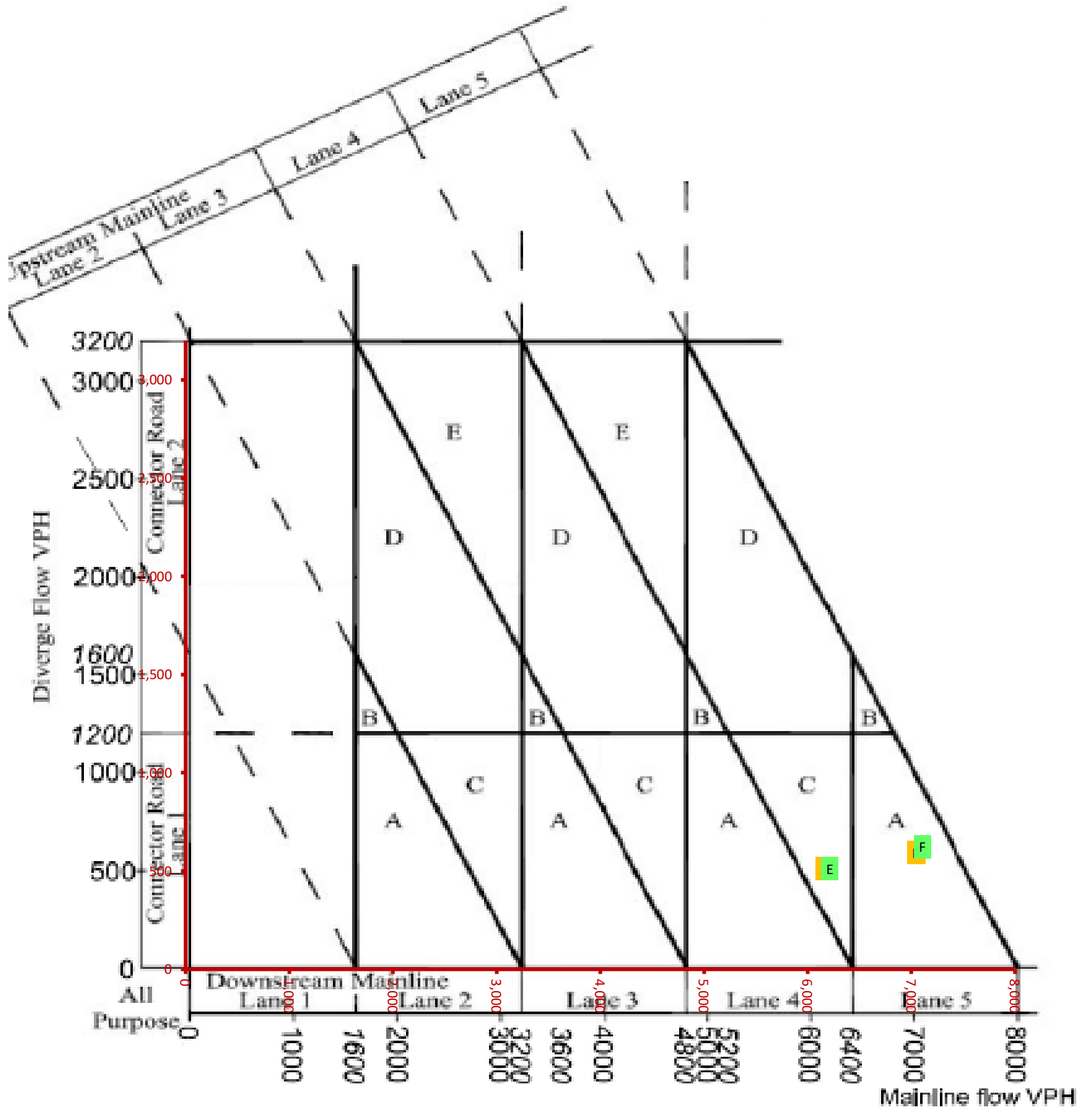
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,784	1,193	5,784	1.00	1,193	1.00
B	Ref no LTC PM	5,648	1,026	5,648	1.00	1,026	1.00
C	Ref with LTC AM			5,347	1.00	885	1.00
D	Ref with LTC PM			4,999	1.00	928	1.00
E	LP Scenario no LTC AM	5,809	1,198	5,809	1.00	1,198	1.00
F	LP Scenario no LTC PM	5,658	1,038	5,658	1.00	1,038	1.00
G	LP Scenario with LTC AM			5,373	1.00	917	1.00
H	LP Scenario with LTC PM			5,041	1.00	921	1.00

J1b northbound merge - with LTC (ACTUAL)
SENSITIVITY ASSESSMENT



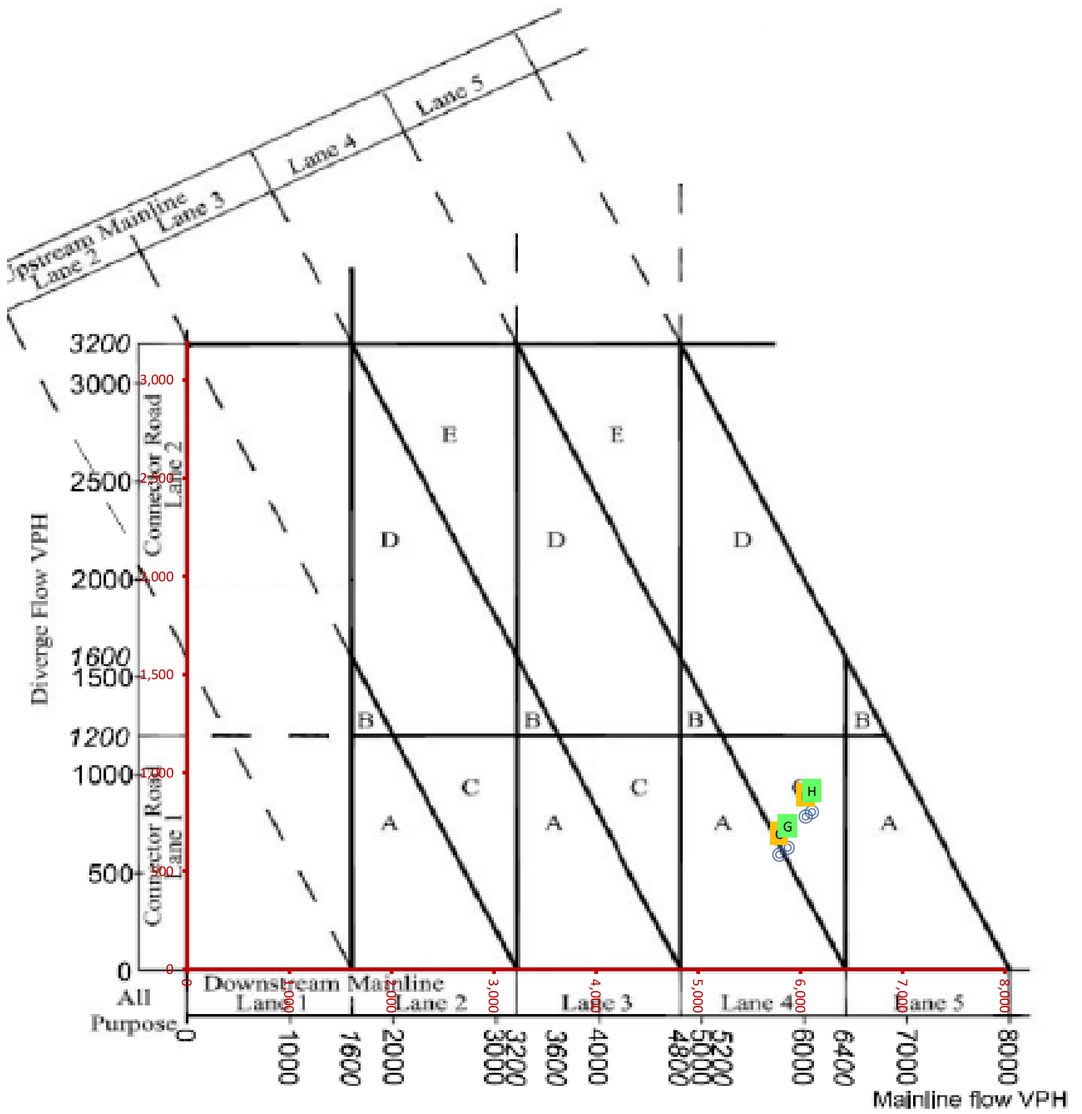
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,784	1.00	1,193	1.00
B	Ref no LTC PM			5,648	1.00	1,026	1.00
C	Ref with LTC AM	5,347	885	5,347	1.00	885	1.00
D	Ref with LTC PM	4,999	928	4,999	1.00	928	1.00
E	LP Scenario no LTC AM			5,809	1.00	1,198	1.00
F	LP Scenario no LTC PM			5,658	1.00	1,038	1.00
G	LP Scenario with LTC AM	5,373	917	5,373	1.00	917	1.00
H	LP Scenario with LTC PM	5,041	921	5,041	1.00	921	1.00

J1b southbound diverge - no LTC (DEMAND) SENSITIVITY ASSESSMENT



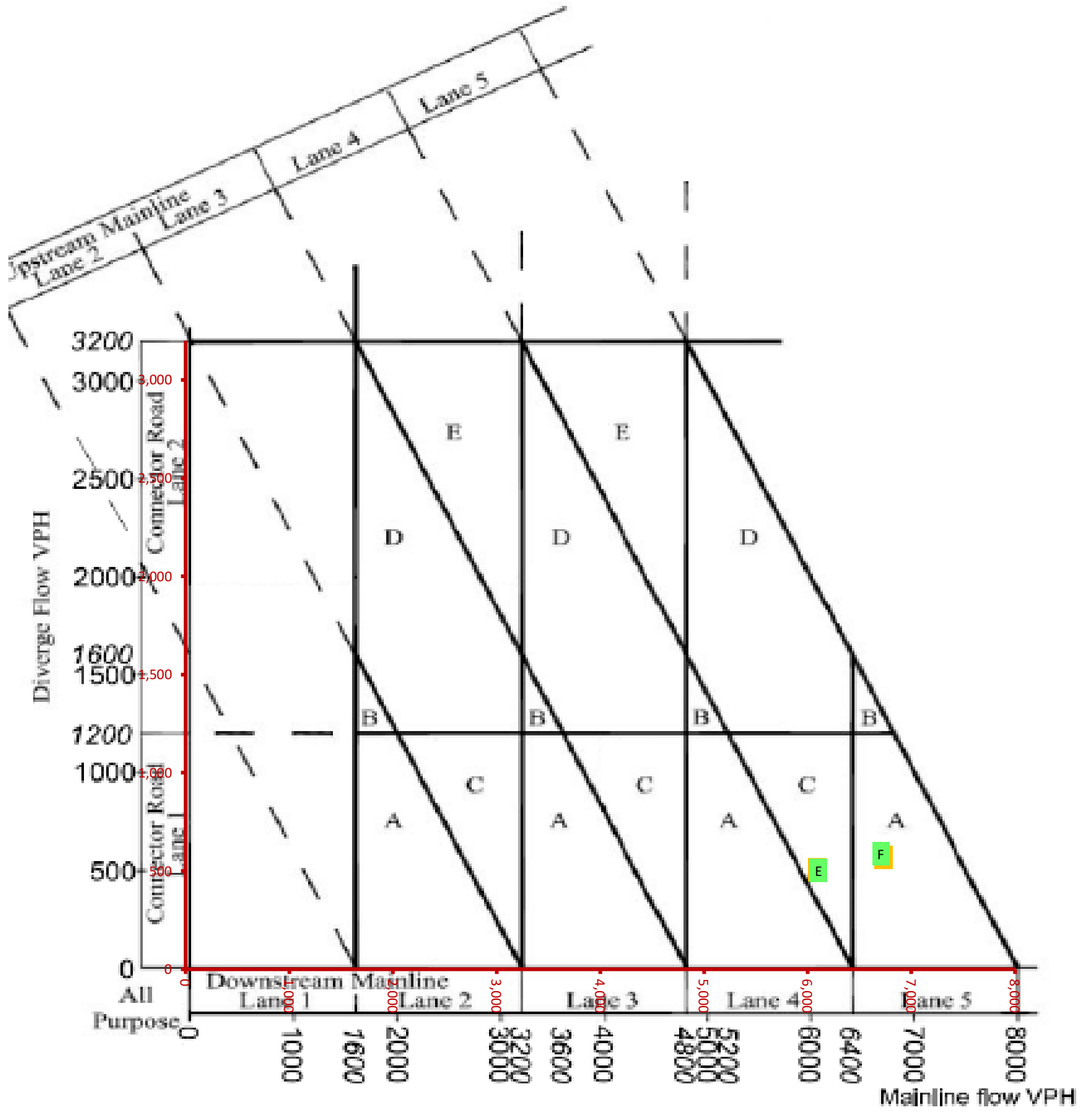
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	6,167	512	6,167	1.00	512	1.00
B	Ref no LTC PM	7,046	595	7,046	1.00	595	1.00
C	Ref with LTC AM			5,788	1.00	584	1.00
D	Ref with LTC PM			6,048	1.00	777	1.00
E	LP Scenario no LTC AM	6,213	513	6,213	1.00	513	1.00
F	LP Scenario no LTC PM	7,108	624	7,108	1.00	624	1.00
G	LP Scenario with LTC AM			5,873	1.00	620	1.00
H	LP Scenario with LTC PM			6,111	1.00	800	1.00

J1b southbound diverge - with LTC (DEMAND) SENSITIVITY ASSESSMENT



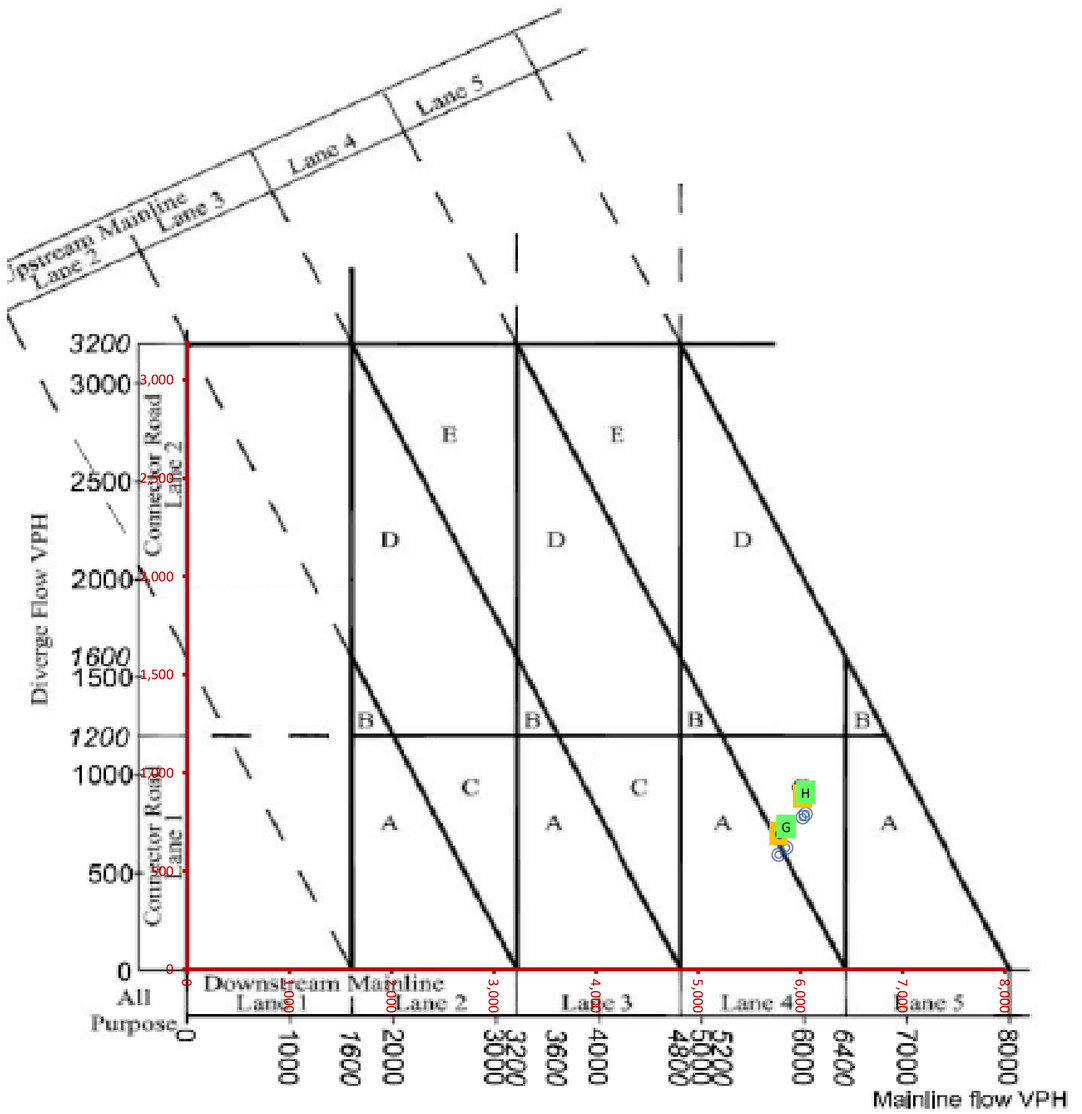
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			6,167	1.00	512	1.00
B	Ref no LTC PM			7,046	1.00	595	1.00
C	Ref with LTC AM	5,788	584	5,788	1.00	584	1.00
D	Ref with LTC PM	6,048	777	6,048	1.00	777	1.00
E	LP Scenario no LTC AM			6,213	1.00	513	1.00
F	LP Scenario no LTC PM			7,108	1.00	624	1.00
G	LP Scenario with LTC AM	5,873	620	5,873	1.00	620	1.00
H	LP Scenario with LTC PM	6,111	800	6,111	1.00	800	1.00

J1b southbound diverge - no LTC (ACTUAL)
SENSITIVITY ASSESSMENT



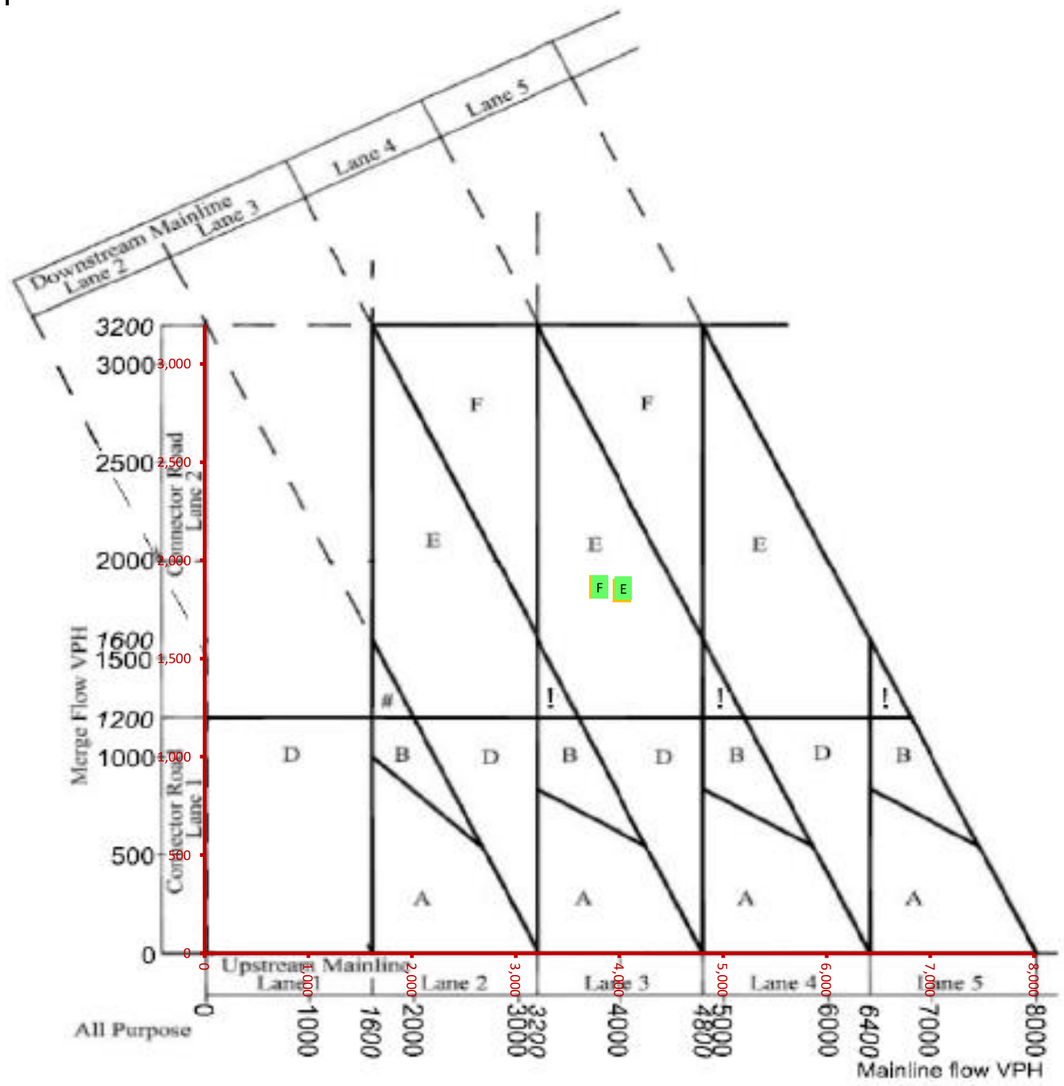
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	6,093	506	6,093	1.00	506	1.00
B	Ref no LTC PM	6,730	568	6,730	1.00	568	1.00
C	Ref with LTC AM			5,784	1.00	584	1.00
D	Ref with LTC PM			6,021	1.00	774	1.00
E	LP Scenario no LTC AM	6,105	504	6,105	1.00	504	1.00
F	LP Scenario no LTC PM	6,706	589	6,706	1.00	589	1.00
G	LP Scenario with LTC AM			5,858	1.00	619	1.00
H	LP Scenario with LTC PM			6,047	1.00	792	1.00

J1b southbound diverge - with LTC (ACTUAL)
SENSITIVITY ASSESSMENT



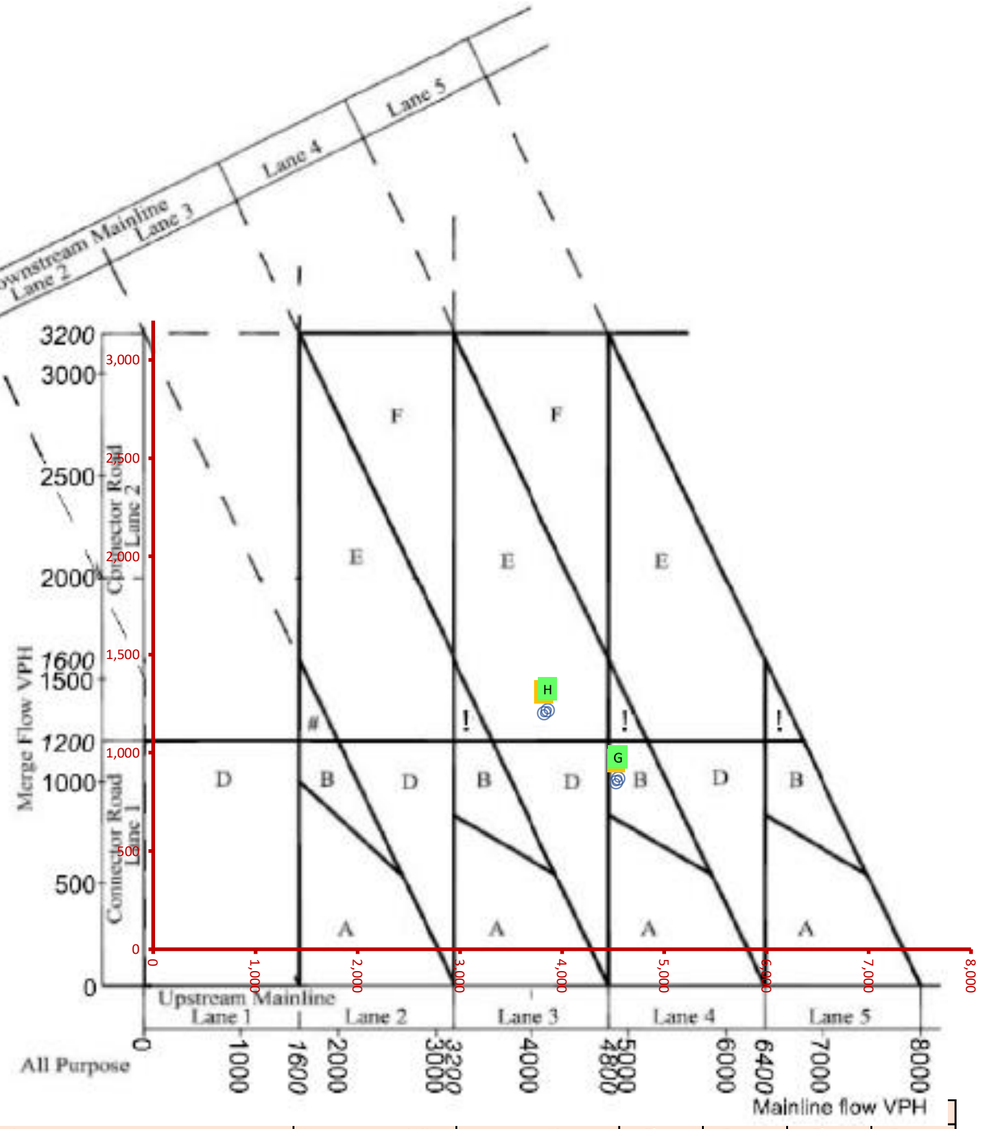
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			6,093	1.00	506	1.00
B	Ref no LTC PM			6,730	1.00	568	1.00
C	Ref with LTC AM	5,784	584	5,784	1.00	584	1.00
D	Ref with LTC PM	6,021	774	6,021	1.00	774	1.00
E	LP Scenario no LTC AM			6,105	1.00	504	1.00
F	LP Scenario no LTC PM			6,706	1.00	589	1.00
G	LP Scenario with LTC AM	5,858	619	5,858	1.00	619	1.00
H	LP Scenario with LTC PM	6,047	792	6,047	1.00	792	1.00

M25-A2 interchange northbound merge - no LTC (DEMAND) SENSITIVITY ASSESSMENT



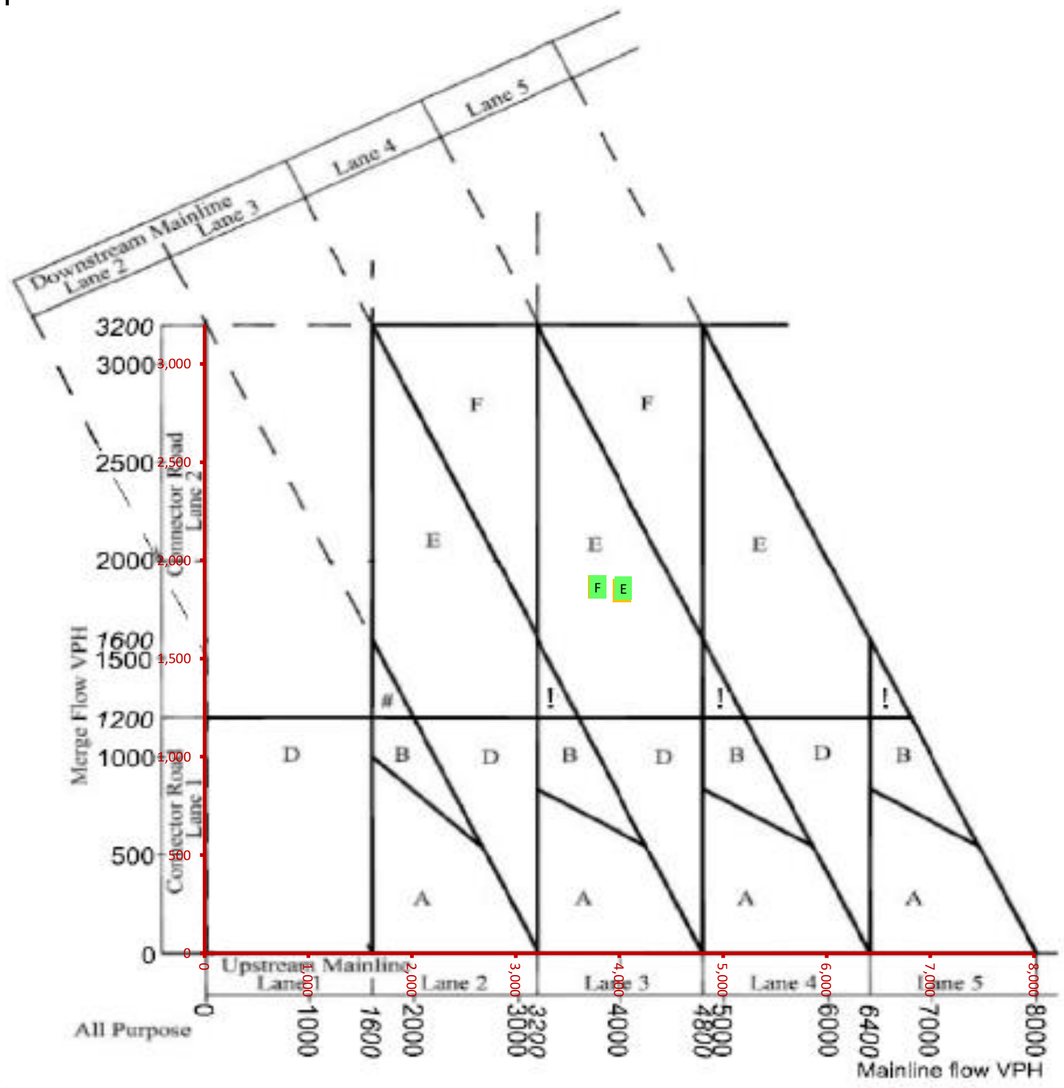
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,027	1,846	4,027	1.00	1,758	1.05
B	Ref no LTC PM	3,799	1,864	3,799	1.00	1,864	1.00
C	Ref with LTC AM			4,526	1.00	852	1.00
D	Ref with LTC PM			3,820	1.00	1,202	1.00
E	LP Scenario no LTC AM	4,039	1,858	4,039	1.00	1,769	1.05
F	LP Scenario no LTC PM	3,813	1,865	3,813	1.00	1,865	1.00
G	LP Scenario with LTC AM			4,546	1.00	870	1.00
H	LP Scenario with LTC PM			3,857	1.00	1,217	1.00

M25-A2 interchange northbound merge - with LTC (DEMAND) SENSITIVITY ASSESSMENT



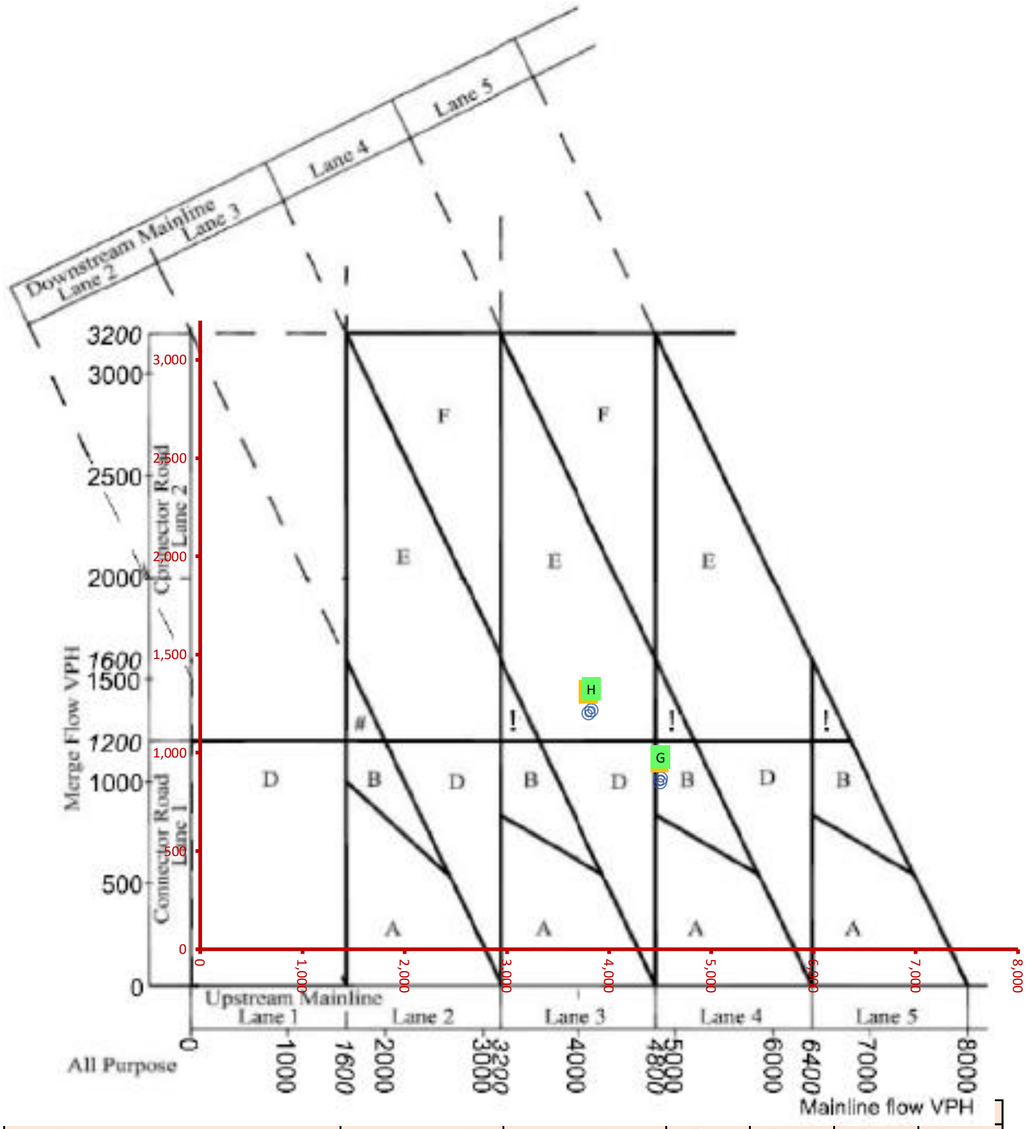
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,027	1.00	1,758	1.05
B	Ref no LTC PM			3,799	1.00	1,864	1.00
C	Ref with LTC AM	4,526	852	4,526	1.00	852	1.00
D	Ref with LTC PM	3,820	1,202	3,820	1.00	1,202	1.00
E	LP Scenario no LTC AM			4,039	1.00	1,769	1.05
F	LP Scenario no LTC PM			3,813	1.00	1,865	1.00
G	LP Scenario with LTC AM	4,546	870	4,546	1.00	870	1.00
H	LP Scenario with LTC PM	3,857	1,217	3,857	1.00	1,217	1.00

M25-A2 interchange northbound merge - no LTC (ACTUAL) SENSITIVITY ASSESSMENT



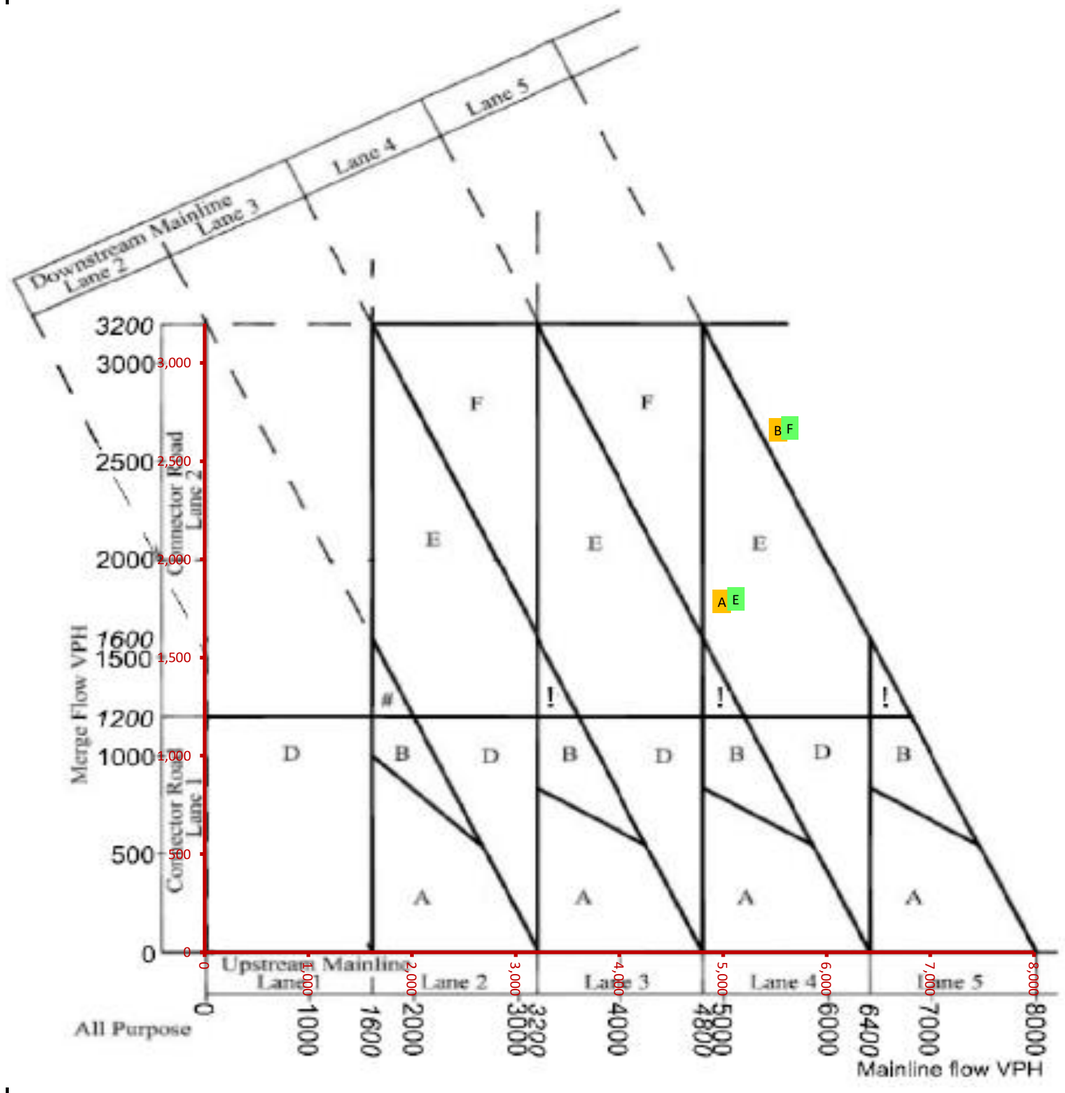
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,026	1,846	4,026	1.00	1,758	1.05
B	Ref no LTC PM	3,785	1,864	3,785	1.00	1,864	1.00
C	Ref with LTC AM			4,495	1.00	852	1.00
D	Ref with LTC PM			3,798	1.00	1,202	1.00
E	LP Scenario no LTC AM	4,039	1,858	4,039	1.00	1,769	1.05
F	LP Scenario no LTC PM	3,793	1,865	3,793	1.00	1,865	1.00
G	LP Scenario with LTC AM			4,503	1.00	870	1.00
H	LP Scenario with LTC PM			3,824	1.00	1,217	1.00

M25-A2 interchange northbound merge - with LTC (ACTUAL) SENSITIVITY ASSESSMENT



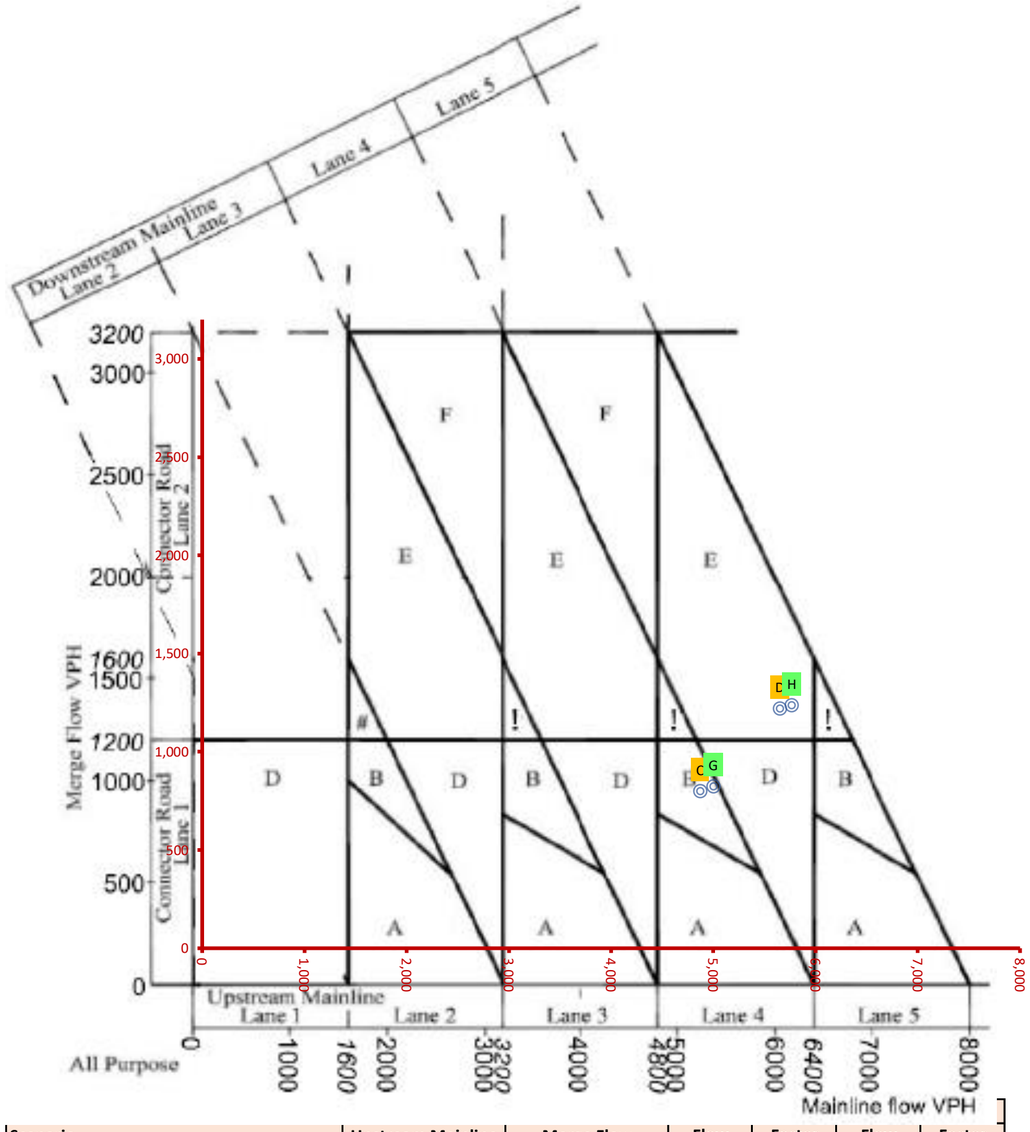
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,026	1.00	1,758	1.05
B	Ref no LTC PM			3,785	1.00	1,864	1.00
C	Ref with LTC AM	4,495	852	4,495	1.00	852	1.00
D	Ref with LTC PM	3,798	1,202	3,798	1.00	1,202	1.00
E	LP Scenario no LTC AM			4,039	1.00	1,769	1.05
F	LP Scenario no LTC PM			3,793	1.00	1,865	1.00
G	LP Scenario with LTC AM	4,503	870	4,503	1.00	870	1.00
H	LP Scenario with LTC PM	3,824	1,217	3,824	1.00	1,217	1.00

M25-A2 interchange eastbound merge - no LTC (DEMAND) SENSITIVITY ASSESSMENT



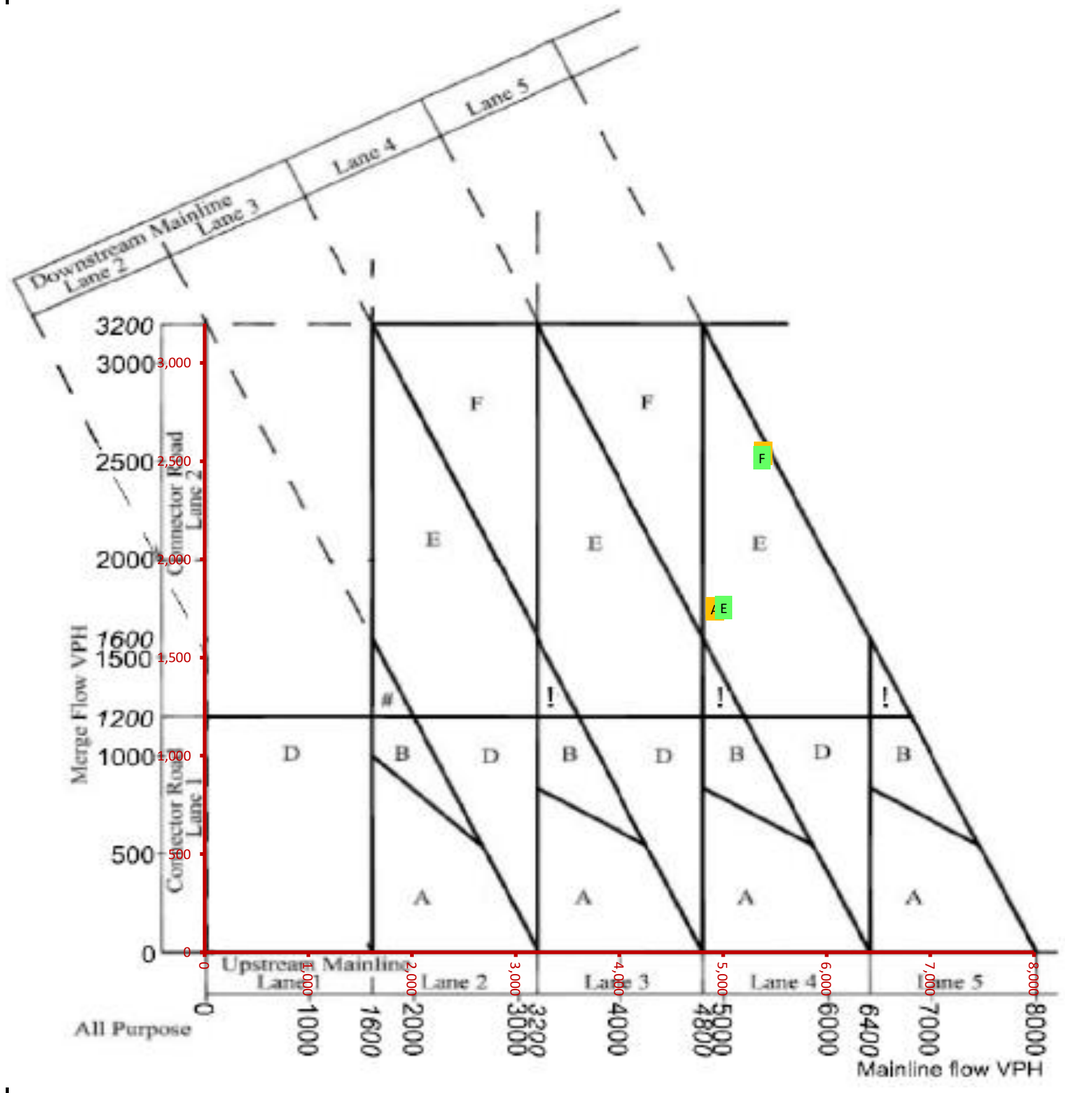
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,990	1,787	4,536	1.10	1,430	1.25
B	Ref no LTC PM	5,529	2,659	5,529	1.00	2,216	1.20
C	Ref with LTC AM			4,426	1.10	666	1.20
D	Ref with LTC PM			5,650	1.00	1,221	1.00
E	LP Scenario no LTC AM	5,122	1,799	4,657	1.10	1,439	1.25
F	LP Scenario no LTC PM	5,647	2,669	5,647	1.00	2,224	1.20
G	LP Scenario with LTC AM			4,544	1.10	688	1.20
H	LP Scenario with LTC PM			5,766	1.00	1,237	1.00

M25-A2 interchange eastbound merge - with LTC (DEMAND) SENSITIVITY ASSESSMENT



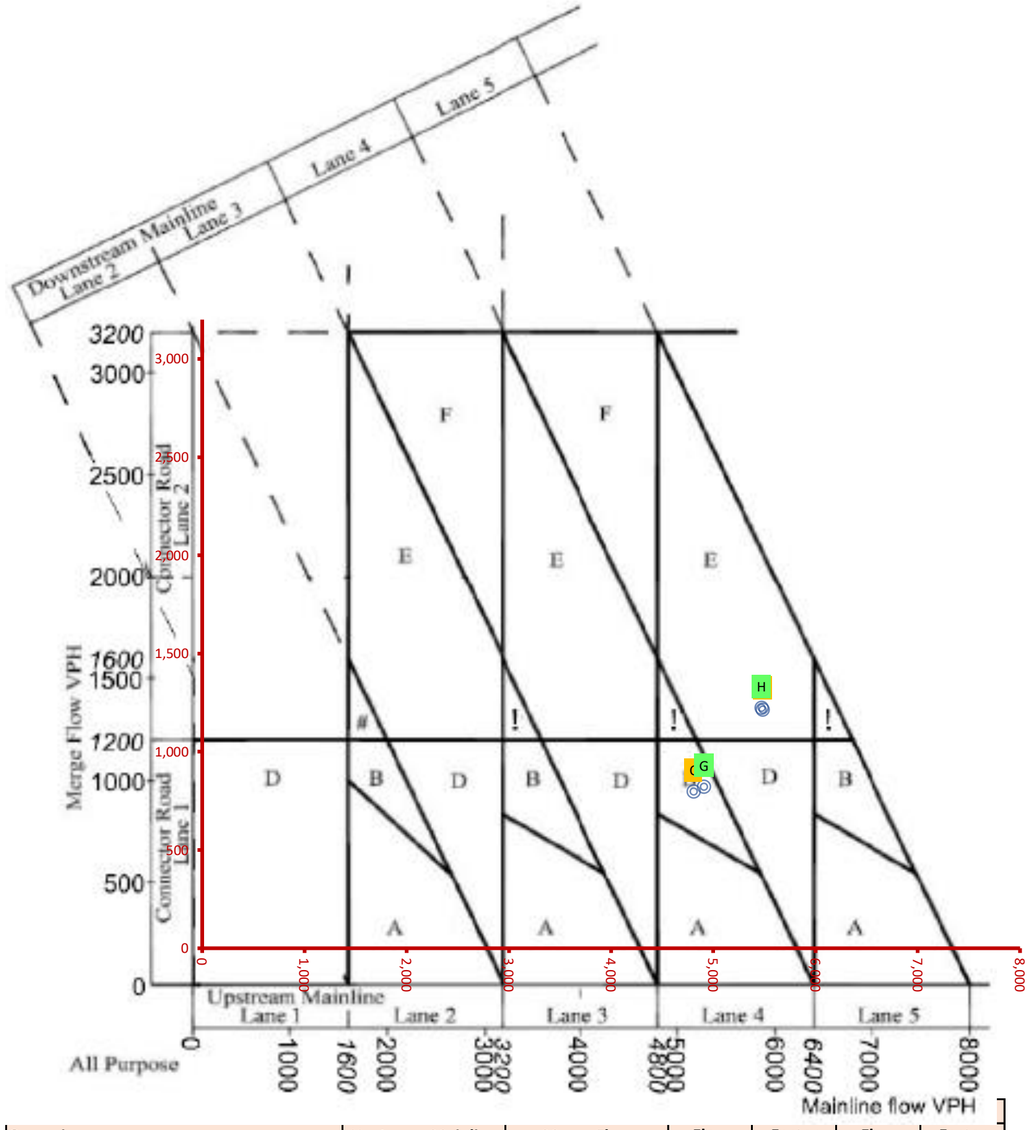
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,536	1.10	1,430	1.25
B	Ref no LTC PM			5,529	1.00	2,216	1.20
C	Ref with LTC AM	4,869	800	4,426	1.10	666	1.20
D	Ref with LTC PM	5,650	1,221	5,650	1.00	1,221	1.00
E	LP Scenario no LTC AM			4,657	1.10	1,439	1.25
F	LP Scenario no LTC PM			5,647	1.00	2,224	1.20
G	LP Scenario with LTC AM	4,998	825	4,544	1.10	688	1.20
H	LP Scenario with LTC PM	5,766	1,237	5,766	1.00	1,237	1.00

M25-A2 interchange eastbound merge - no LTC (ACTUAL) SENSITIVITY ASSESSMENT



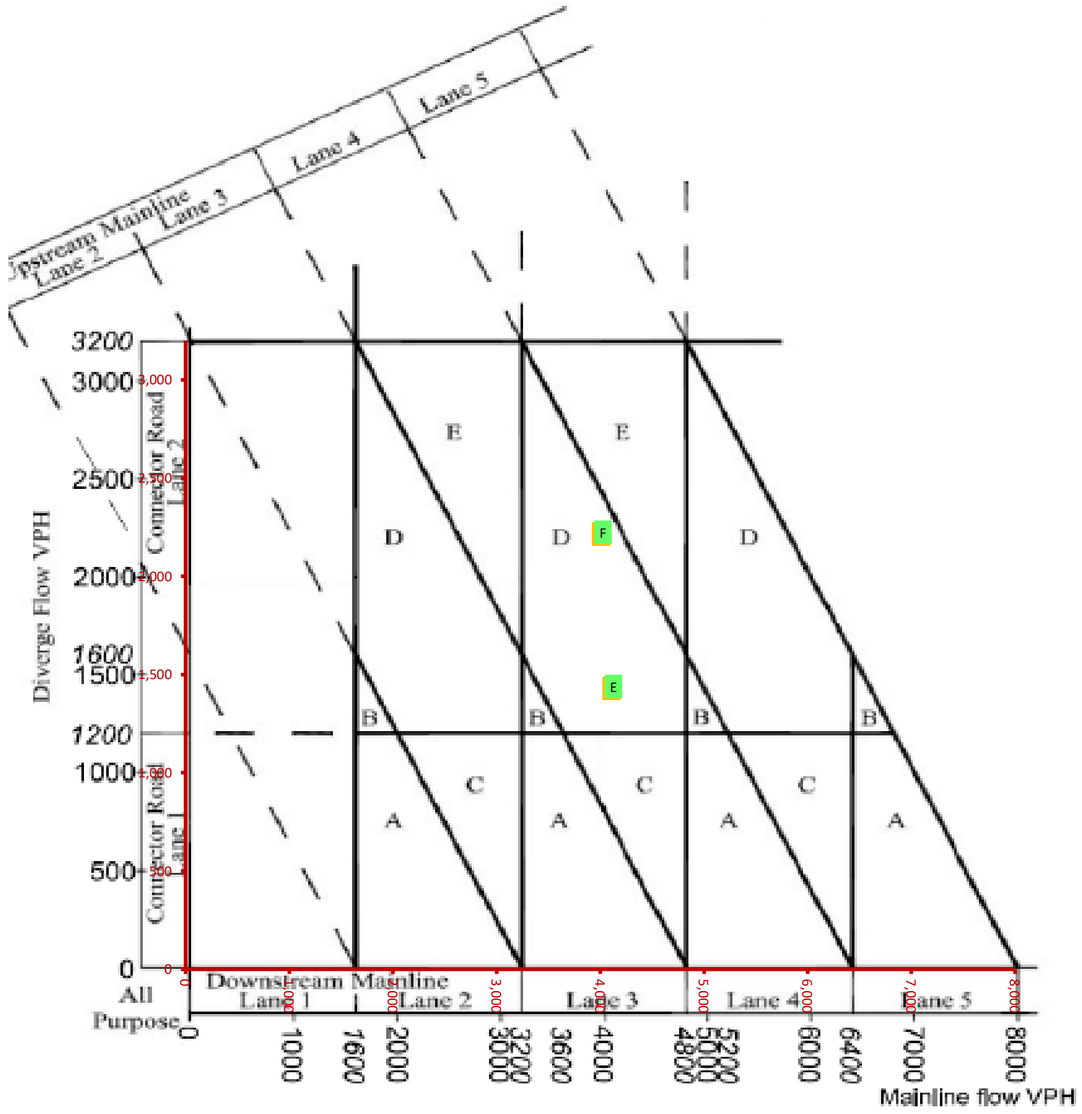
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,923	1,749	4,476	1.10	1,399	1.25
B	Ref no LTC PM	5,388	2,539	5,388	1.00	2,116	1.20
C	Ref with LTC AM			4,367	1.10	666	1.20
D	Ref with LTC PM			5,481	1.00	1,215	1.00
E	LP Scenario no LTC AM	5,006	1,753	4,551	1.10	1,403	1.25
F	LP Scenario no LTC PM	5,377	2,518	5,377	1.00	2,098	1.20
G	LP Scenario with LTC AM			4,460	1.10	686	1.20
H	LP Scenario with LTC PM			5,470	1.00	1,224	1.00

M25-A2 interchange eastbound merge - with LTC (ACTUAL) SENSITIVITY ASSESSMENT



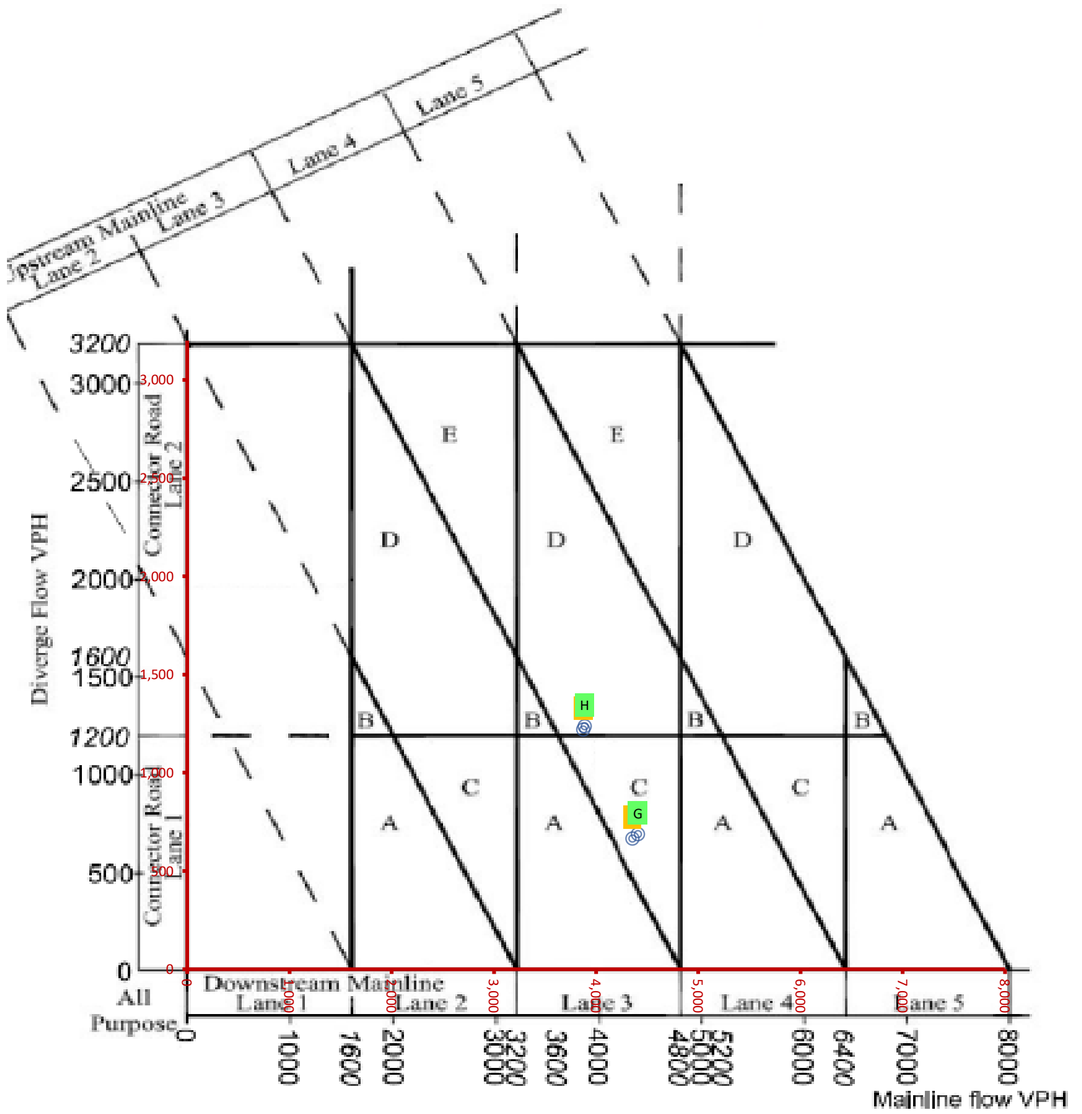
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,476	1.10	1,399	1.25
B	Ref no LTC PM			5,388	1.00	2,116	1.20
C	Ref with LTC AM	4,804	799	4,367	1.10	666	1.20
D	Ref with LTC PM	5,481	1,215	5,481	1.00	1,215	1.00
E	LP Scenario no LTC AM			4,551	1.10	1,403	1.25
F	LP Scenario no LTC PM			5,377	1.00	2,098	1.20
G	LP Scenario with LTC AM	4,906	823	4,460	1.10	686	1.20
H	LP Scenario with LTC PM	5,470	1,224	5,470	1.00	1,224	1.00

M25-A2 interchange southbound diverge - no LTC (DEMAND) SENSITIVITY ASSESSMENT



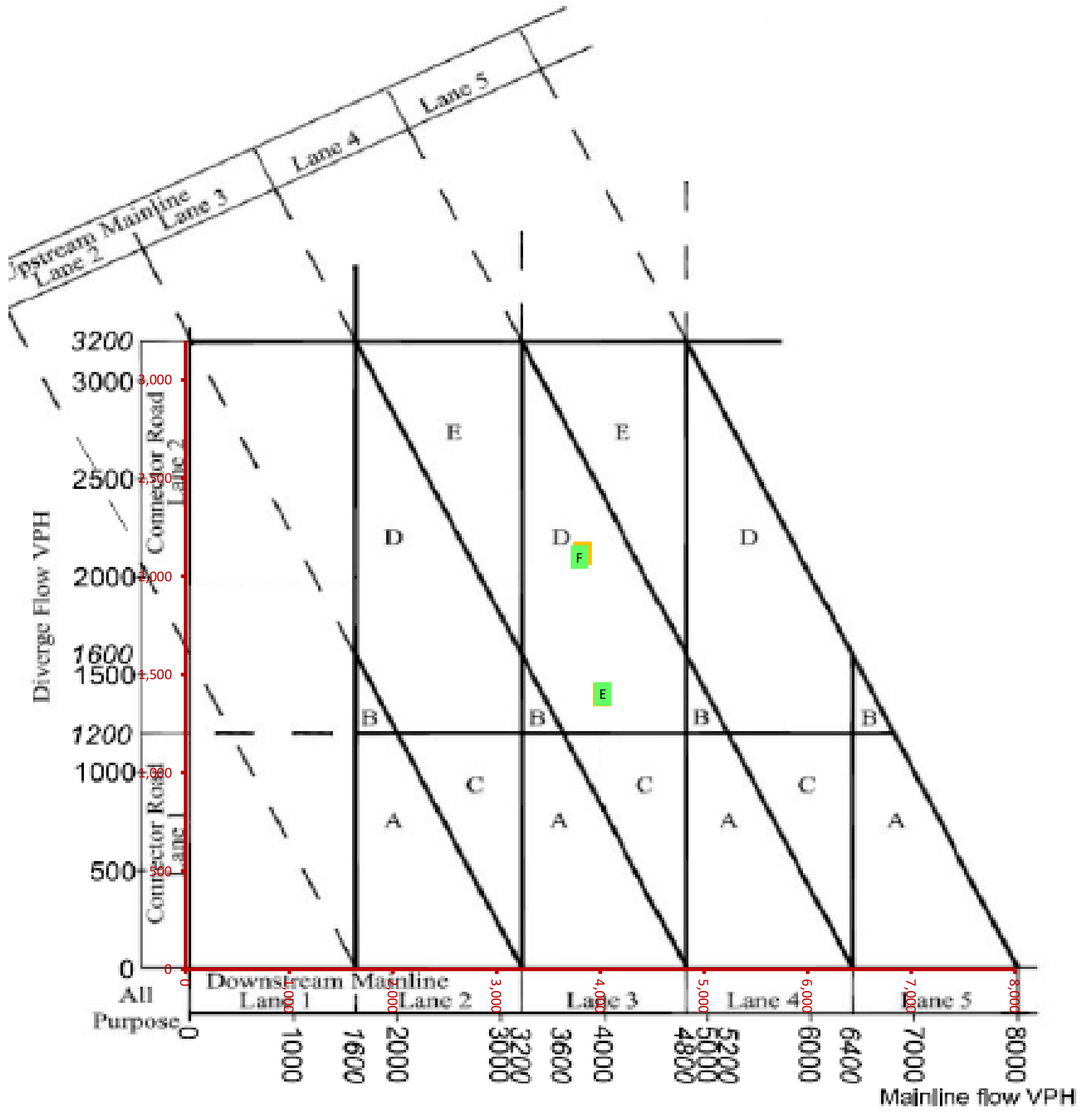
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,108	1,430	4,108	1.00	1,430	1.00
B	Ref no LTC PM	4,008	2,216	4,008	1.00	2,216	1.00
C	Ref with LTC AM			4,352	1.00	666	1.00
D	Ref with LTC PM			3,872	1.00	1,221	1.00
E	LP Scenario no LTC AM	4,127	1,439	4,127	1.00	1,439	1.00
F	LP Scenario no LTC PM	4,027	2,224	4,027	1.00	2,224	1.00
G	LP Scenario with LTC AM			4,407	1.00	688	1.00
H	LP Scenario with LTC PM			3,886	1.00	1,237	1.00

M25-A2 interchange southbound diverge - with LTC (DEMAND) SENSITIVITY ASSESSMENT



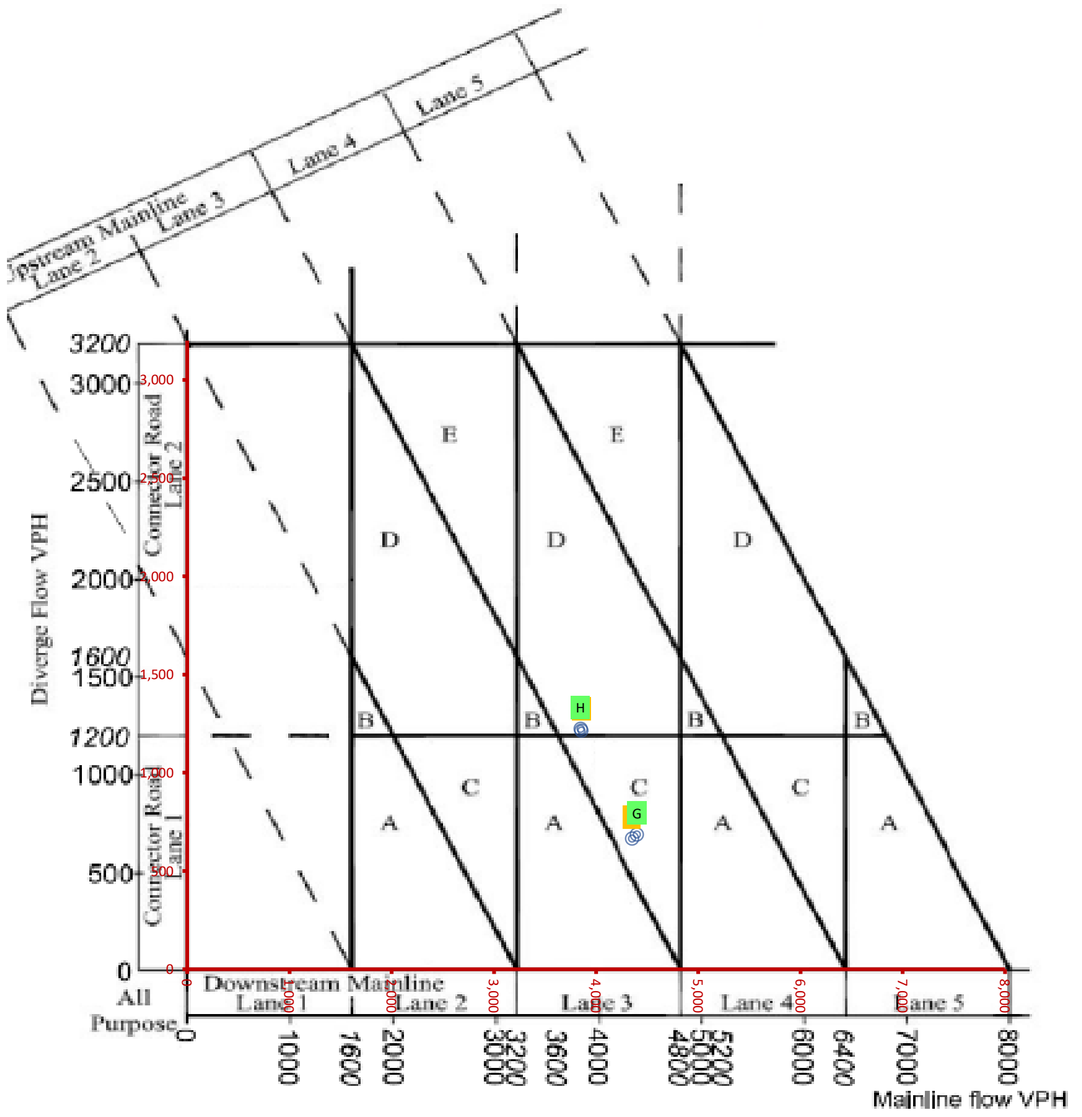
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,108	1.00	1,430	1.00
B	Ref no LTC PM			4,008	1.00	2,216	1.00
C	Ref with LTC AM	4,352	666	4,352	1.00	666	1.00
D	Ref with LTC PM	3,872	1,221	3,872	1.00	1,221	1.00
E	LP Scenario no LTC AM			4,127	1.00	1,439	1.00
F	LP Scenario no LTC PM			4,027	1.00	2,224	1.00
G	LP Scenario with LTC AM	4,407	688	4,407	1.00	688	1.00
H	LP Scenario with LTC PM	3,886	1,237	3,886	1.00	1,237	1.00

M25-A2 interchange southbound diverge - no LTC (ACTUAL) SENSITIVITY ASSESSMENT



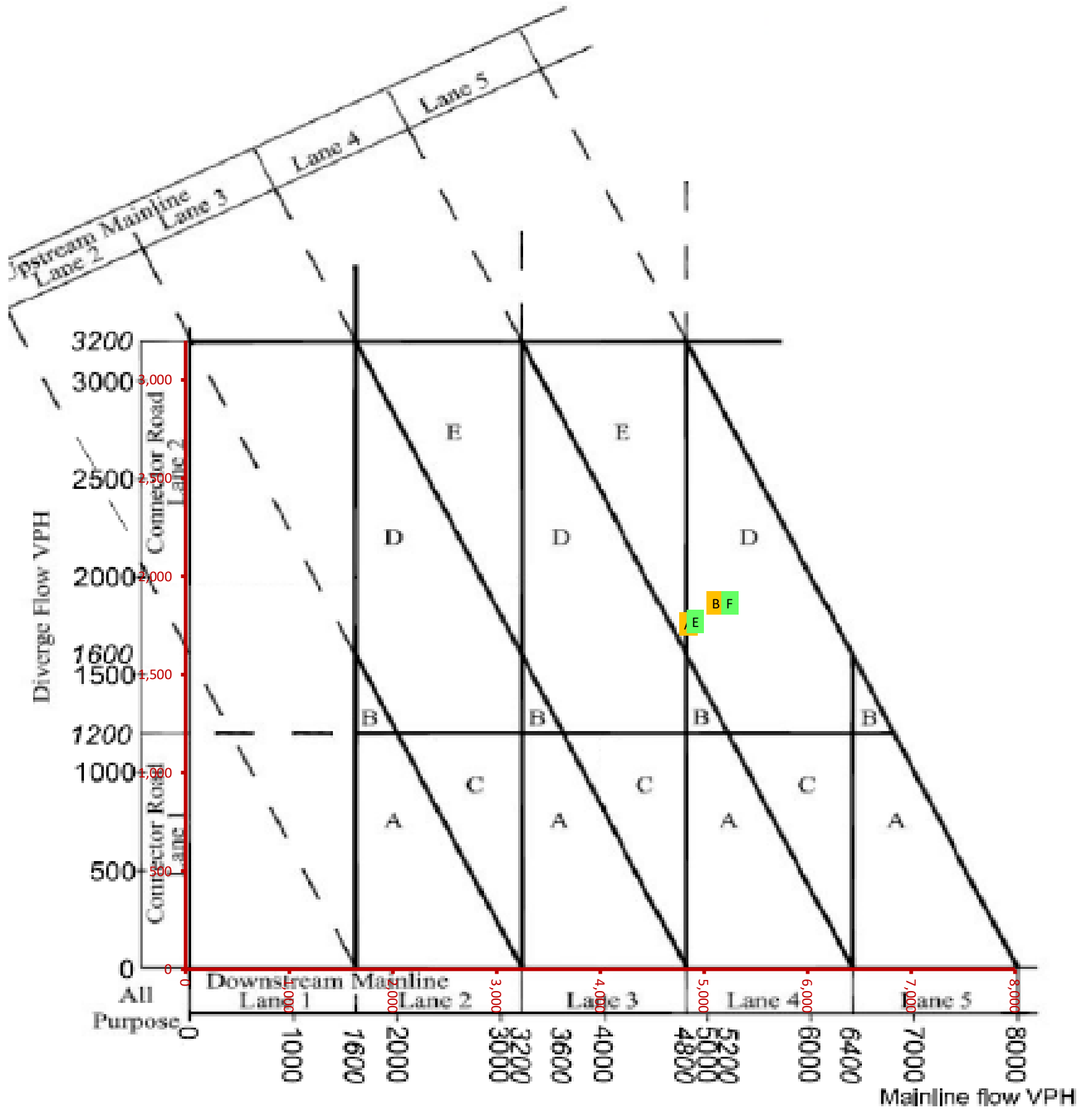
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,021	1,399	4,021	1.00	1,399	1.00
B	Ref no LTC PM	3,828	2,116	3,828	1.00	2,116	1.00
C	Ref with LTC AM			4,349	1.00	666	1.00
D	Ref with LTC PM			3,854	1.00	1,215	1.00
E	LP Scenario no LTC AM	4,024	1,403	4,024	1.00	1,403	1.00
F	LP Scenario no LTC PM	3,799	2,098	3,799	1.00	2,098	1.00
G	LP Scenario with LTC AM			4,396	1.00	686	1.00
H	LP Scenario with LTC PM			3,846	1.00	1,224	1.00

M25-A2 interchange southbound diverge - with LTC (ACTUAL) SENSITIVITY ASSESSMENT



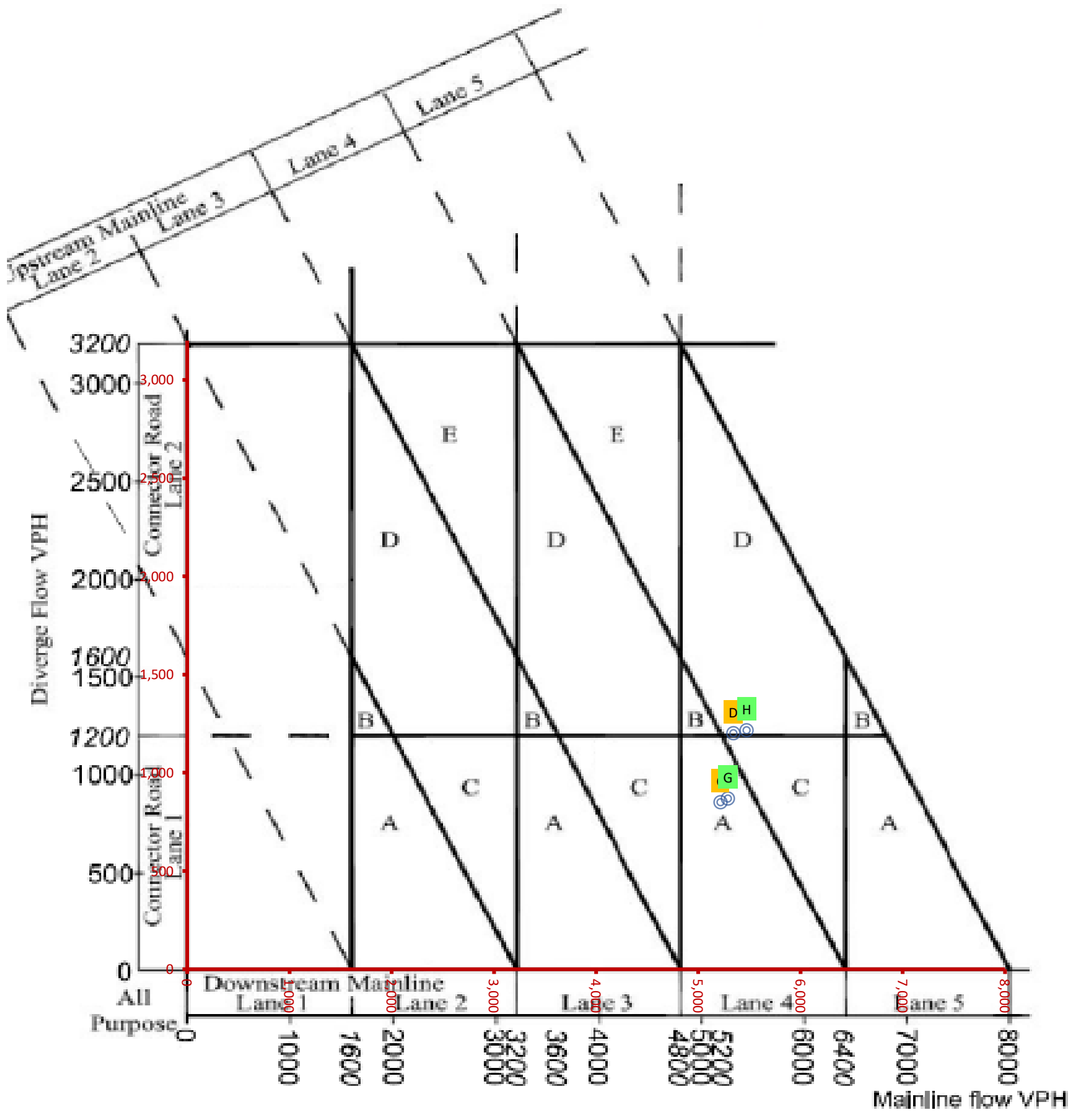
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,021	1.00	1,399	1.00
B	Ref no LTC PM			3,828	1.00	2,116	1.00
C	Ref with LTC AM	4,349	666	4,349	1.00	666	1.00
D	Ref with LTC PM	3,854	1,215	3,854	1.00	1,215	1.00
E	LP Scenario no LTC AM			4,024	1.00	1,403	1.00
F	LP Scenario no LTC PM			3,799	1.00	2,098	1.00
G	LP Scenario with LTC AM	4,396	686	4,396	1.00	686	1.00
H	LP Scenario with LTC PM	3,846	1,224	3,846	1.00	1,224	1.00

M25-A2 interchange westbound diverge - no LTC (DEMAND) SENSITIVITY ASSESSMENT



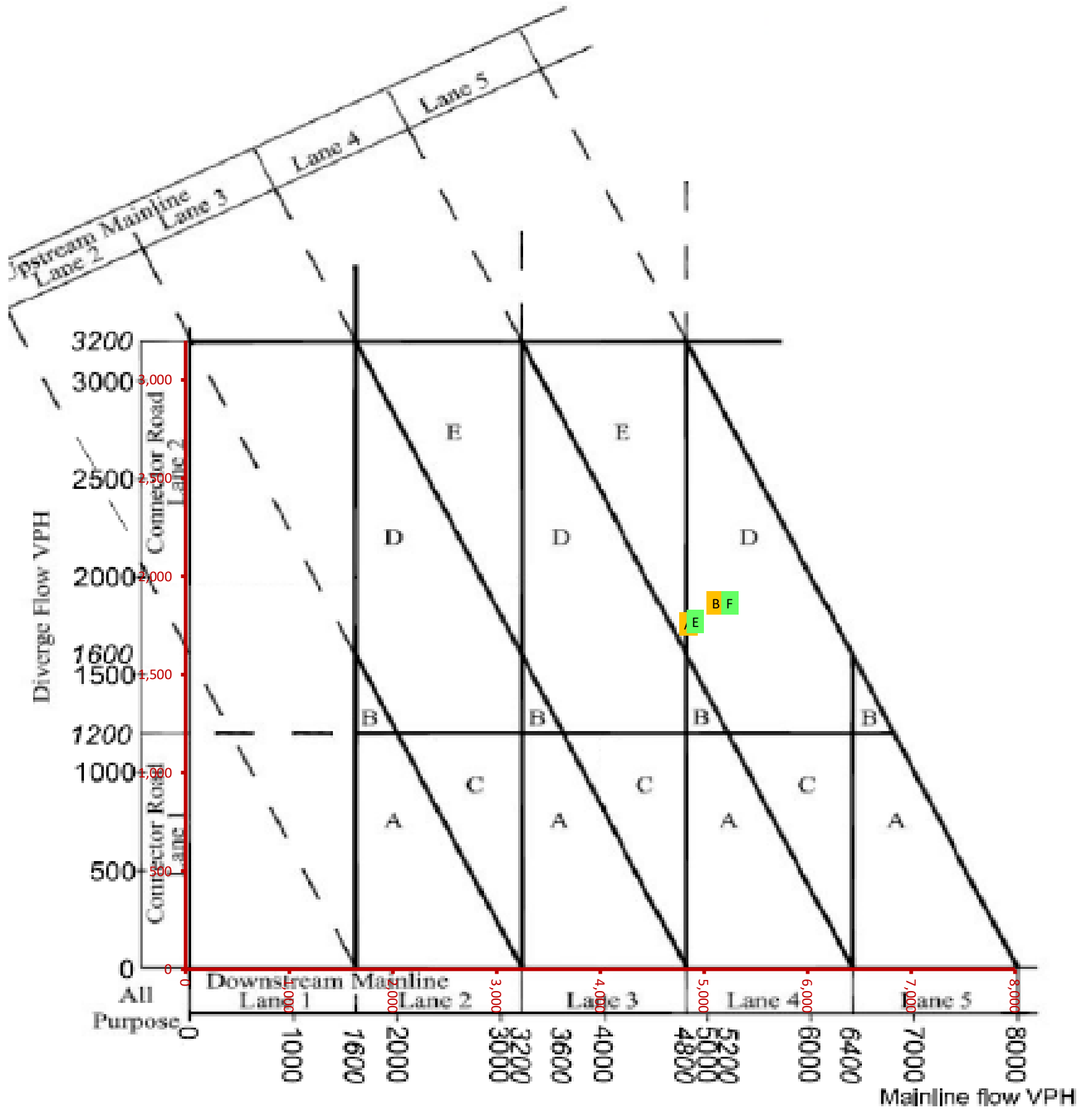
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,850	1,758	4,850	1.00	1,758	1.00
B	Ref no LTC PM	5,114	1,864	5,114	1.00	1,864	1.00
C	Ref with LTC AM			5,214	1.00	852	1.00
D	Ref with LTC PM			5,341	1.00	1,202	1.00
E	LP Scenario no LTC AM	4,918	1,769	4,918	1.00	1,769	1.00
F	LP Scenario no LTC PM	5,248	1,865	5,248	1.00	1,865	1.00
G	LP Scenario with LTC AM			5,288	1.00	870	1.00
H	LP Scenario with LTC PM			5,471	1.00	1,217	1.00

M25-A2 interchange westbound diverge - with LTC (DEMAND) SENSITIVITY ASSESSMENT



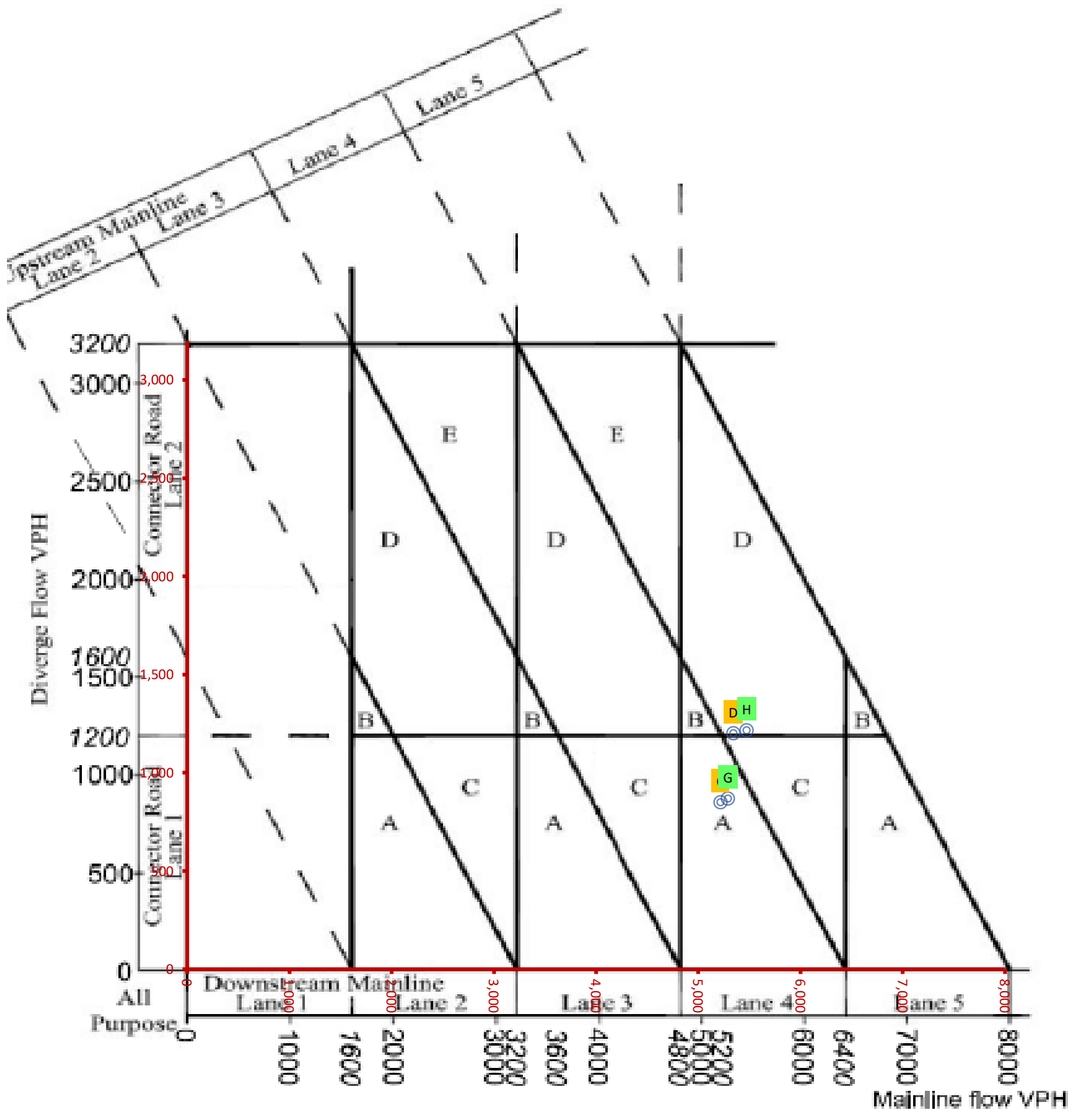
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,850	1.00	1,758	1.00
B	Ref no LTC PM			5,114	1.00	1,864	1.00
C	Ref with LTC AM	5,214	852	5,214	1.00	852	1.00
D	Ref with LTC PM	5,341	1,202	5,341	1.00	1,202	1.00
E	LP Scenario no LTC AM			4,918	1.00	1,769	1.00
F	LP Scenario no LTC PM			5,248	1.00	1,865	1.00
G	LP Scenario with LTC AM	5,288	870	5,288	1.00	870	1.00
H	LP Scenario with LTC PM	5,471	1,217	5,471	1.00	1,217	1.00

M25-A2 interchange westbound diverge - no LTC (ACTUAL) SENSITIVITY ASSESSMENT



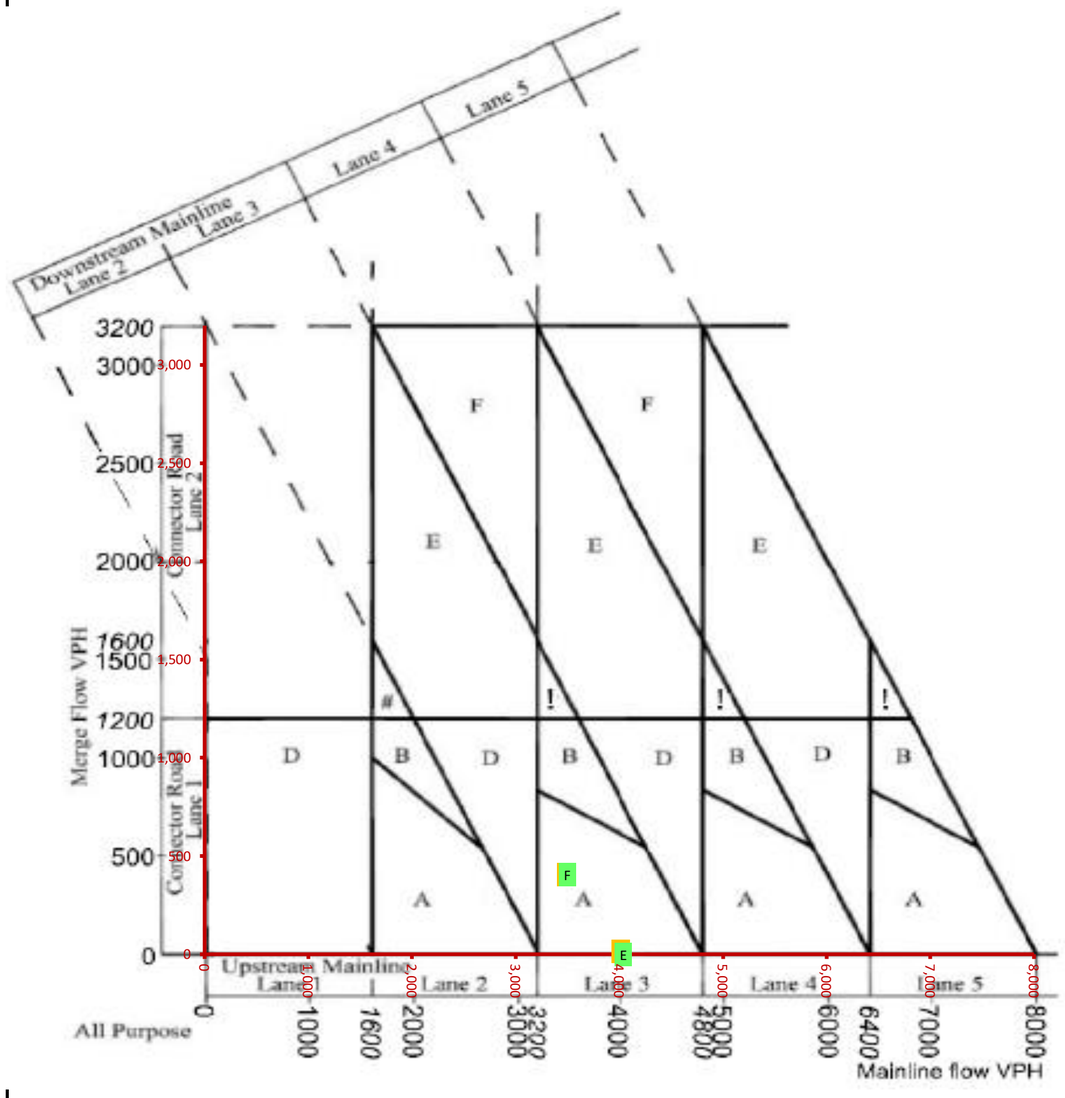
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,850	1,758	4,850	1.00	1,758	1.00
B	Ref no LTC PM	5,114	1,864	5,114	1.00	1,864	1.00
C	Ref with LTC AM			5,214	1.00	852	1.00
D	Ref with LTC PM			5,341	1.00	1,202	1.00
E	LP Scenario no LTC AM	4,918	1,769	4,918	1.00	1,769	1.00
F	LP Scenario no LTC PM	5,248	1,865	5,248	1.00	1,865	1.00
G	LP Scenario with LTC AM			5,288	1.00	870	1.00
H	LP Scenario with LTC PM			5,471	1.00	1,217	1.00

M25-A2 interchange westbound diverge - with LTC (ACTUAL) SENSITIVITY ASSESSMENT



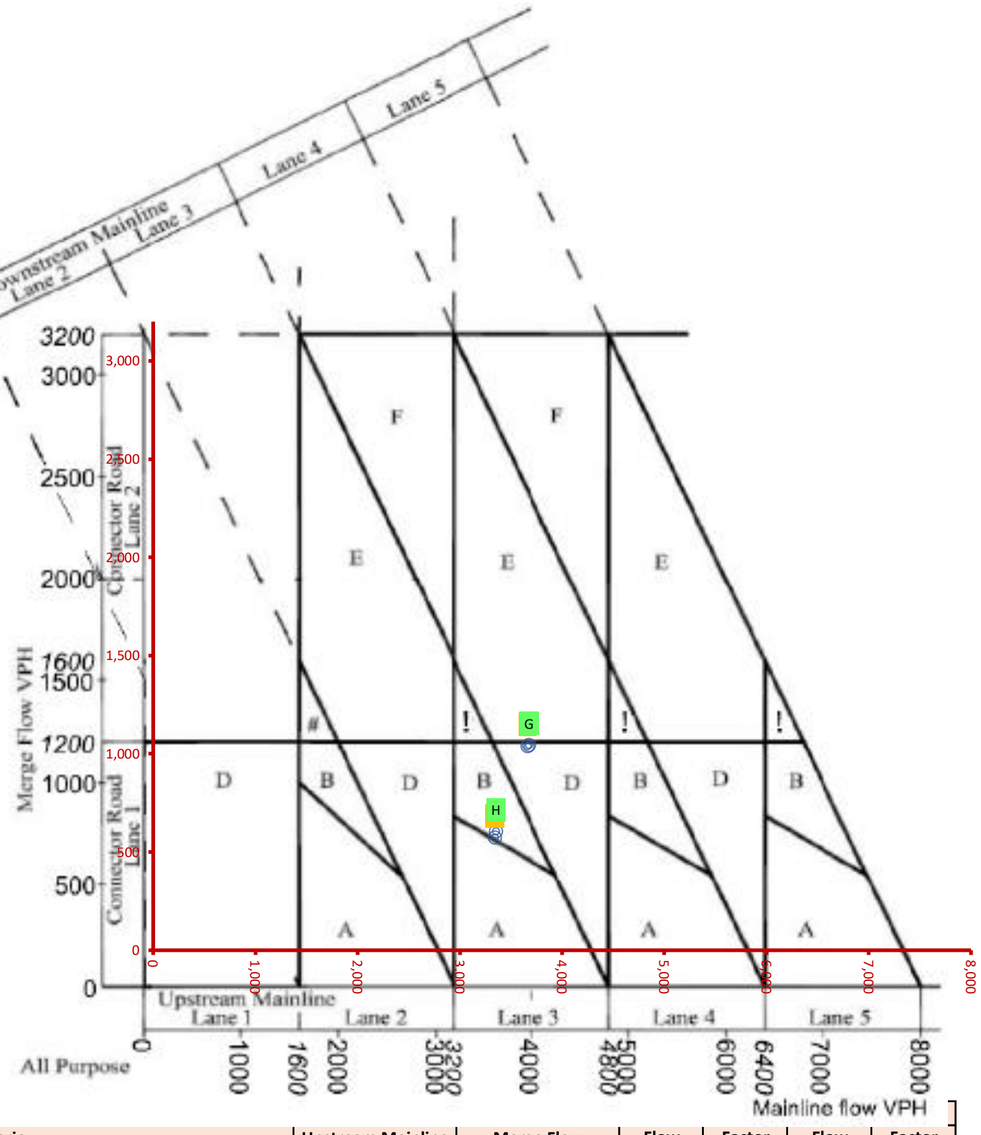
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,850	1.00	1,758	1.00
B	Ref no LTC PM			5,114	1.00	1,864	1.00
C	Ref with LTC AM	5,214	852	5,214	1.00	852	1.00
D	Ref with LTC PM	5,341	1,202	5,341	1.00	1,202	1.00
E	LP Scenario no LTC AM			4,918	1.00	1,769	1.00
F	LP Scenario no LTC PM			5,248	1.00	1,865	1.00
G	LP Scenario with LTC AM	5,288	870	5,288	1.00	870	1.00
H	LP Scenario with LTC PM	5,471	1,217	5,471	1.00	1,217	1.00

J2 northbound merge - no LTC (DEMAND) SENSITIVITY ASSESSMENT



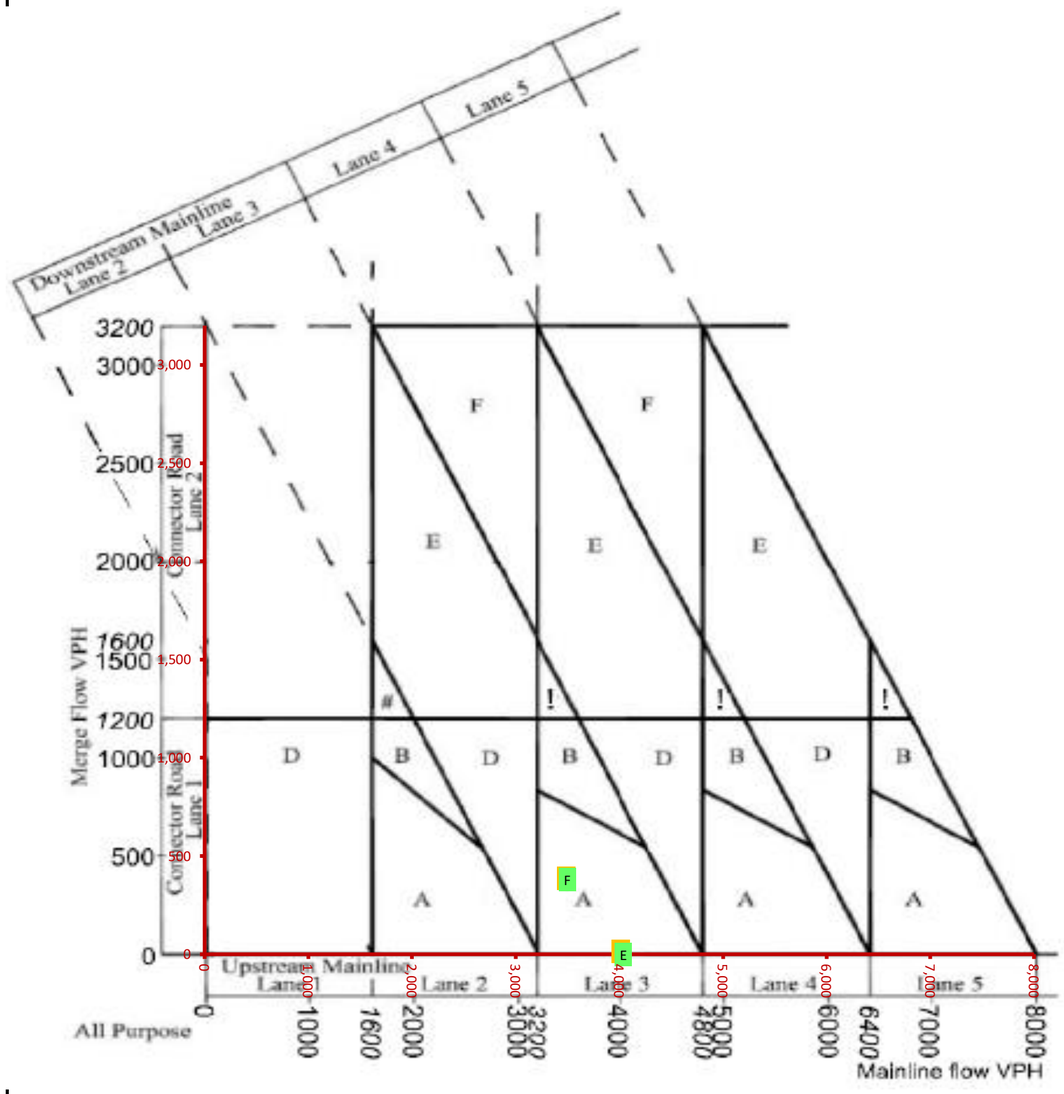
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,013	14	4,013	1.00	14	1.00
B	Ref no LTC PM	3,487	406	3,487	1.00	312	1.30
C	Ref with LTC AM			3,660	1.00	867	1.20
D	Ref with LTC PM			3,341	1.00	479	1.20
E	LP Scenario no LTC AM	4,039	0	4,039	1.00	0	1.20
F	LP Scenario no LTC PM	3,501	406	3,501	1.00	313	1.30
G	LP Scenario with LTC AM			3,675	1.00	871	1.20
H	LP Scenario with LTC PM			3,352	1.00	505	1.20

J2 northbound merge - with LTC (DEMAND) SENSITIVITY ASSESSMENT



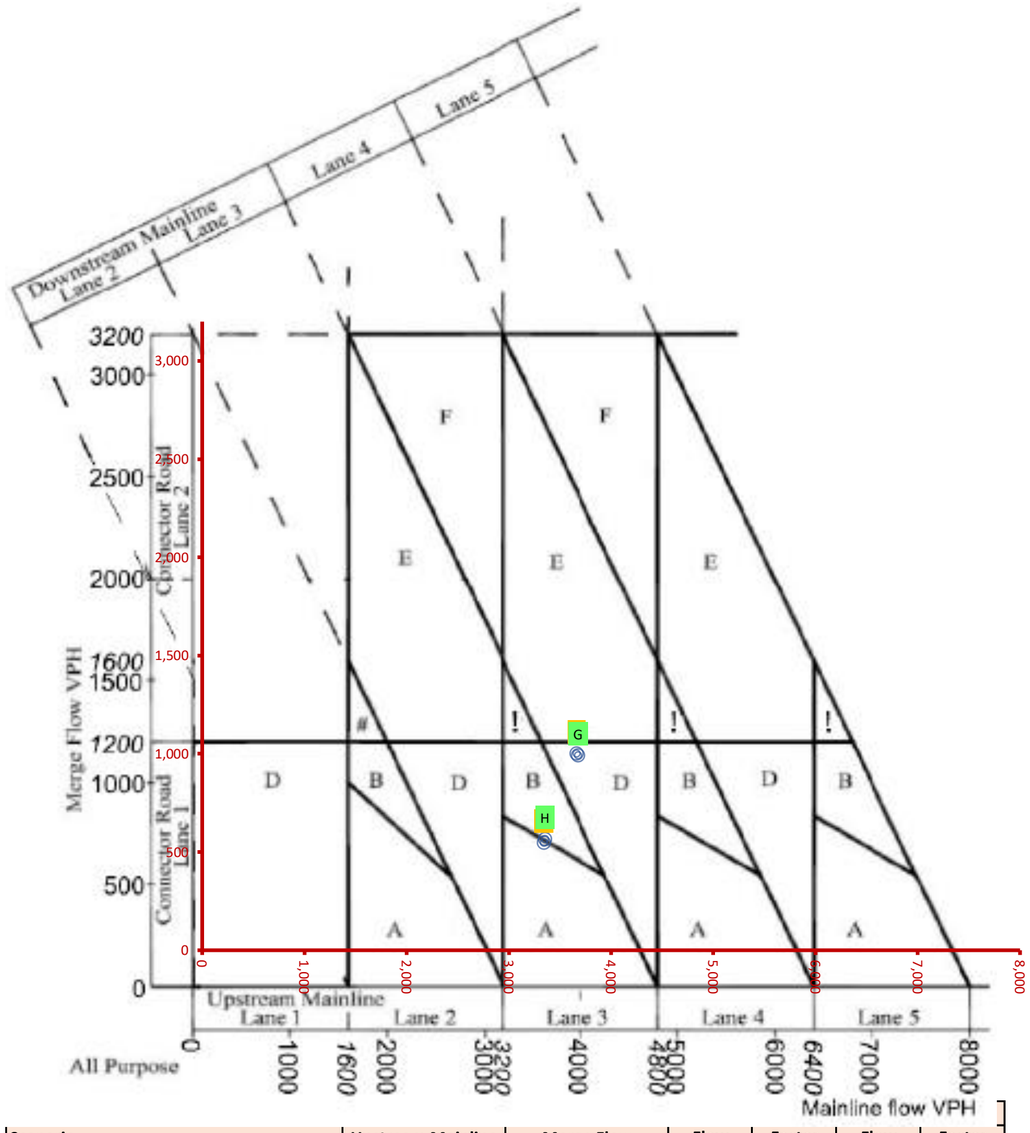
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,013	1.00	14	1.00
B	Ref no LTC PM			3,487	1.00	312	1.30
C	Ref with LTC AM	3,660	1,040	3,660	1.00	867	1.20
D	Ref with LTC PM	3,341	575	3,341	1.00	479	1.20
E	LP Scenario no LTC AM			4,039	1.00	0	1.20
F	LP Scenario no LTC PM			3,501	1.00	313	1.30
G	LP Scenario with LTC AM	3,675	1,046	3,675	1.00	871	1.20
H	LP Scenario with LTC PM	3,352	606	3,352	1.00	505	1.20

J2 northbound merge - no LTC (ACTUAL)
SENSITIVITY ASSESSMENT



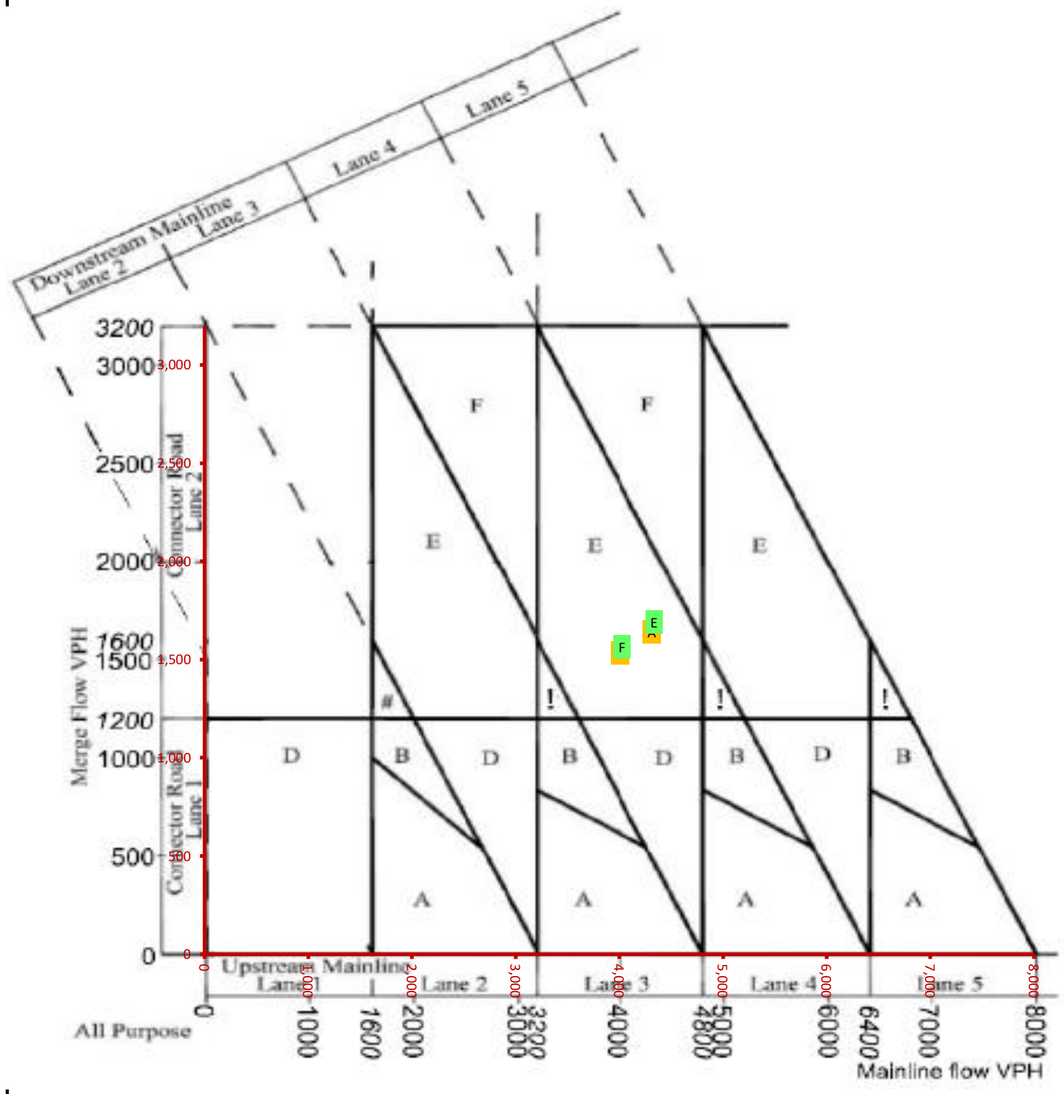
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,013	13	4,013	1.00	13	1.00
B	Ref no LTC PM	3,487	388	3,487	1.00	298	1.30
C	Ref with LTC AM			3,660	1.00	835	1.20
D	Ref with LTC PM			3,341	1.00	457	1.20
E	LP Scenario no LTC AM	4,039	0	4,039	1.00	0	1.20
F	LP Scenario no LTC PM	3,501	381	3,501	1.00	293	1.30
G	LP Scenario with LTC AM			3,675	1.00	828	1.20
H	LP Scenario with LTC PM			3,352	1.00	473	1.20

J2 northbound merge - with LTC (ACTUAL)
SENSITIVITY ASSESSMENT



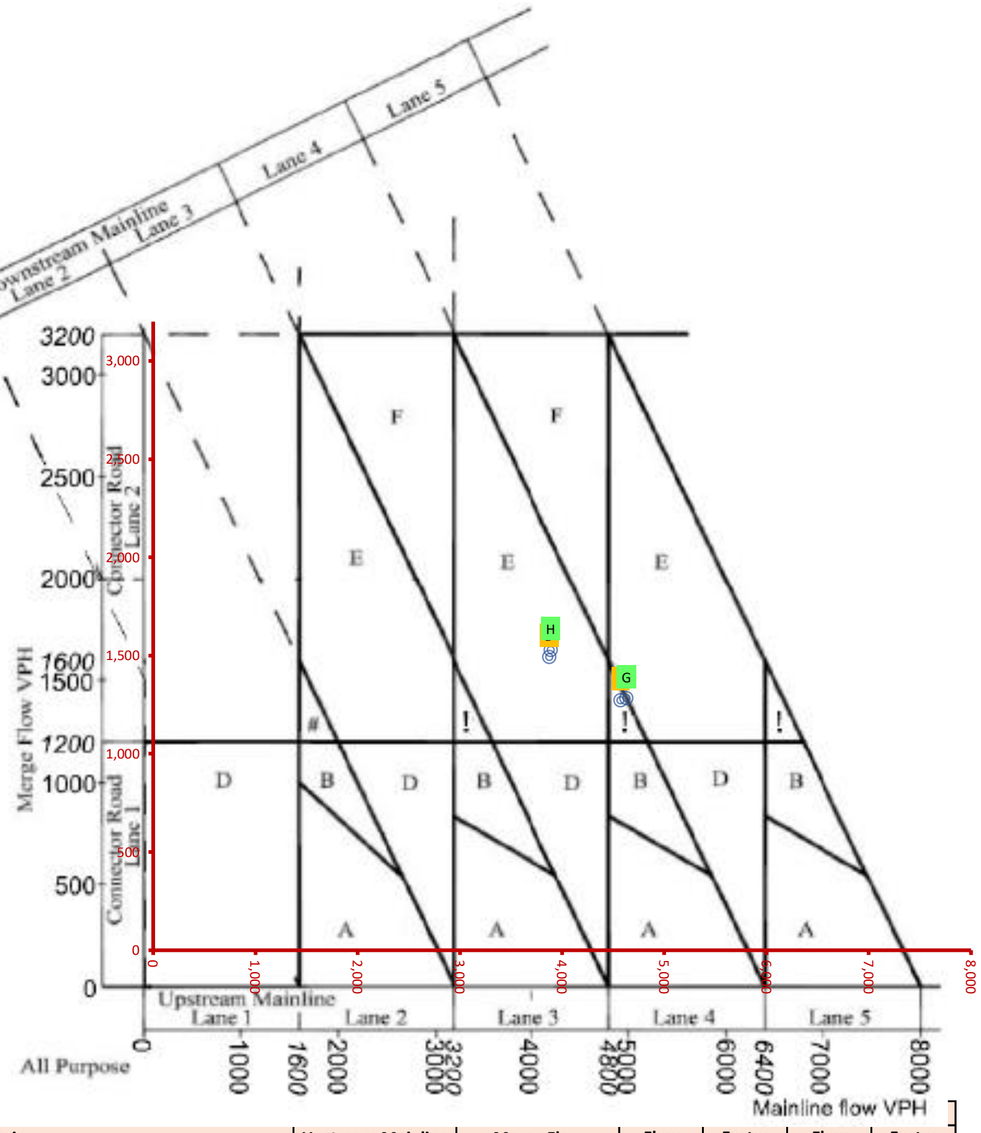
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,013	1.00	13	1.00
B	Ref no LTC PM			3,487	1.00	298	1.30
C	Ref with LTC AM	3,660	1,002	3,660	1.00	835	1.20
D	Ref with LTC PM	3,341	549	3,341	1.00	457	1.20
E	LP Scenario no LTC AM			4,039	1.00	0	1.20
F	LP Scenario no LTC PM			3,501	1.00	293	1.30
G	LP Scenario with LTC AM	3,675	993	3,675	1.00	828	1.20
H	LP Scenario with LTC PM	3,352	568	3,352	1.00	473	1.20

J2 southbound merge - no LTC (DEMAND) SENSITIVITY ASSESSMENT



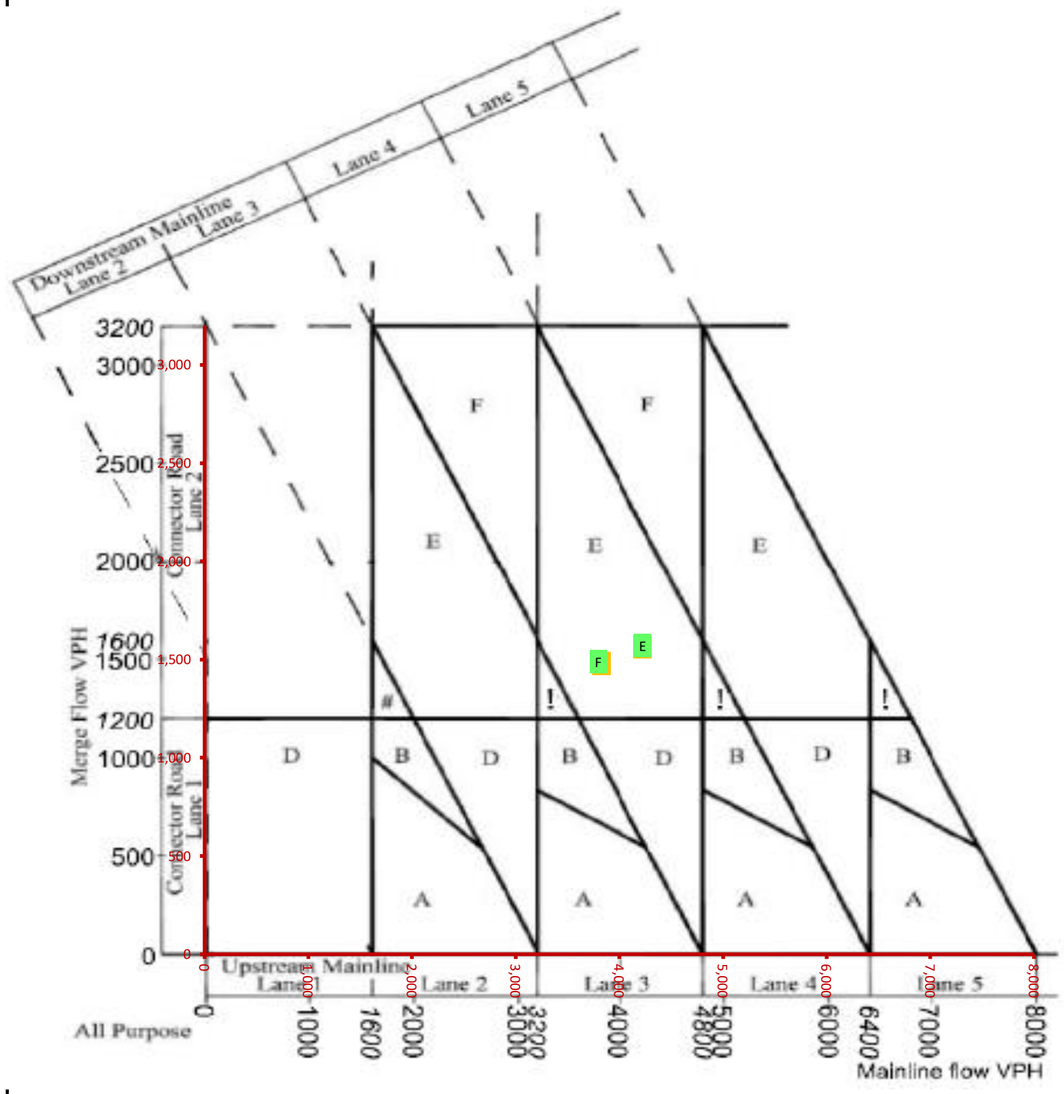
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,313	1,641	4,108	1.05	1,641	1.00
B	Ref no LTC PM	4,008	1,534	4,008	1.00	1,534	1.00
C	Ref with LTC AM			4,352	1.05	1,273	1.00
D	Ref with LTC PM			3,872	1.00	1,494	1.00
E	LP Scenario no LTC AM	4,334	1,691	4,127	1.05	1,691	1.00
F	LP Scenario no LTC PM	4,027	1,565	4,027	1.00	1,565	1.00
G	LP Scenario with LTC AM			4,407	1.05	1,284	1.00
H	LP Scenario with LTC PM			3,886	1.00	1,529	1.00

J2 southbound merge - with LTC (DEMAND) SENSITIVITY ASSESSMENT



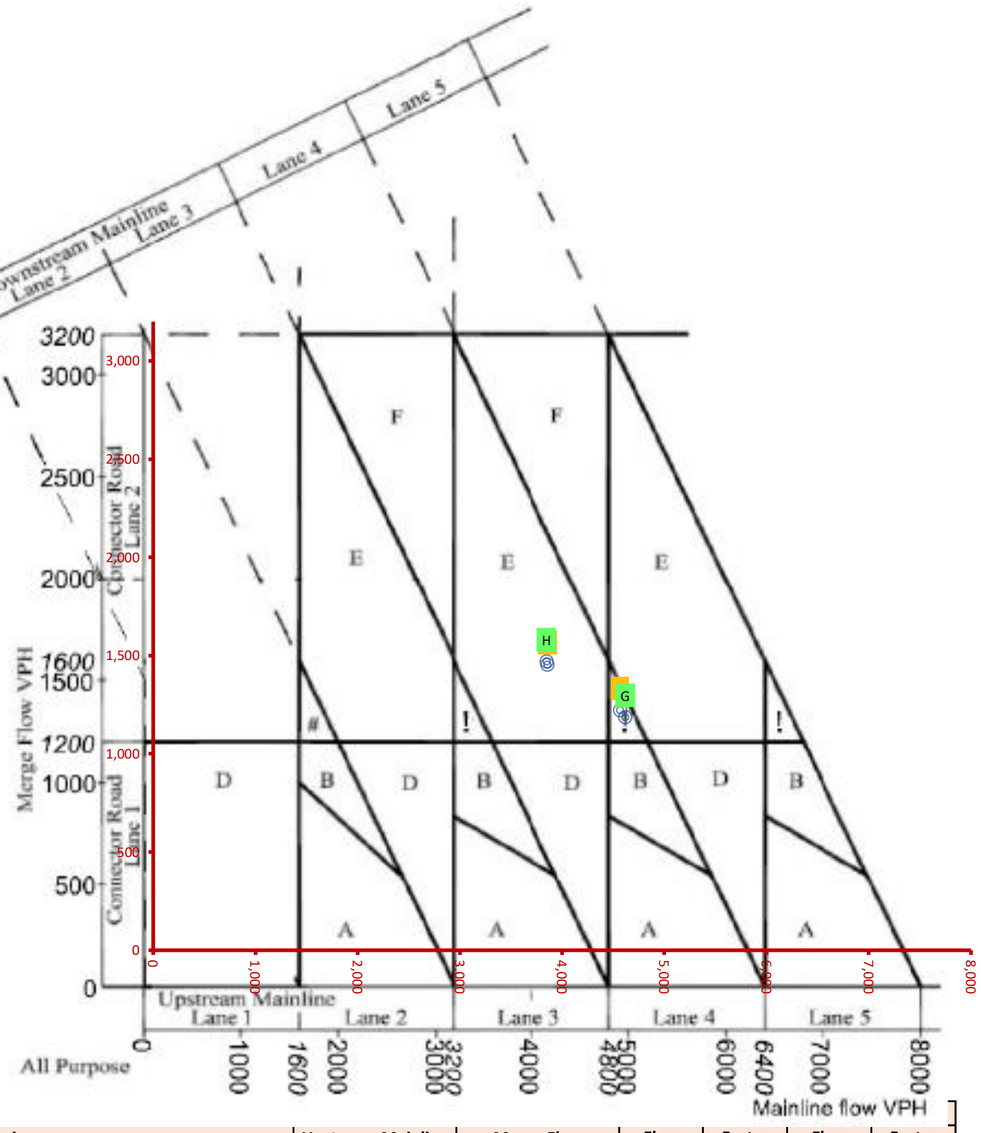
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,108	1.05	1,641	1.00
B	Ref no LTC PM			4,008	1.00	1,534	1.00
C	Ref with LTC AM	4,570	1,273	4,352	1.05	1,273	1.00
D	Ref with LTC PM	3,872	1,494	3,872	1.00	1,494	1.00
E	LP Scenario no LTC AM			4,127	1.05	1,691	1.00
F	LP Scenario no LTC PM			4,027	1.00	1,565	1.00
G	LP Scenario with LTC AM	4,628	1,284	4,407	1.05	1,284	1.00
H	LP Scenario with LTC PM	3,886	1,529	3,886	1.00	1,529	1.00

J2 southbound merge - no LTC (ACTUAL)
SENSITIVITY ASSESSMENT



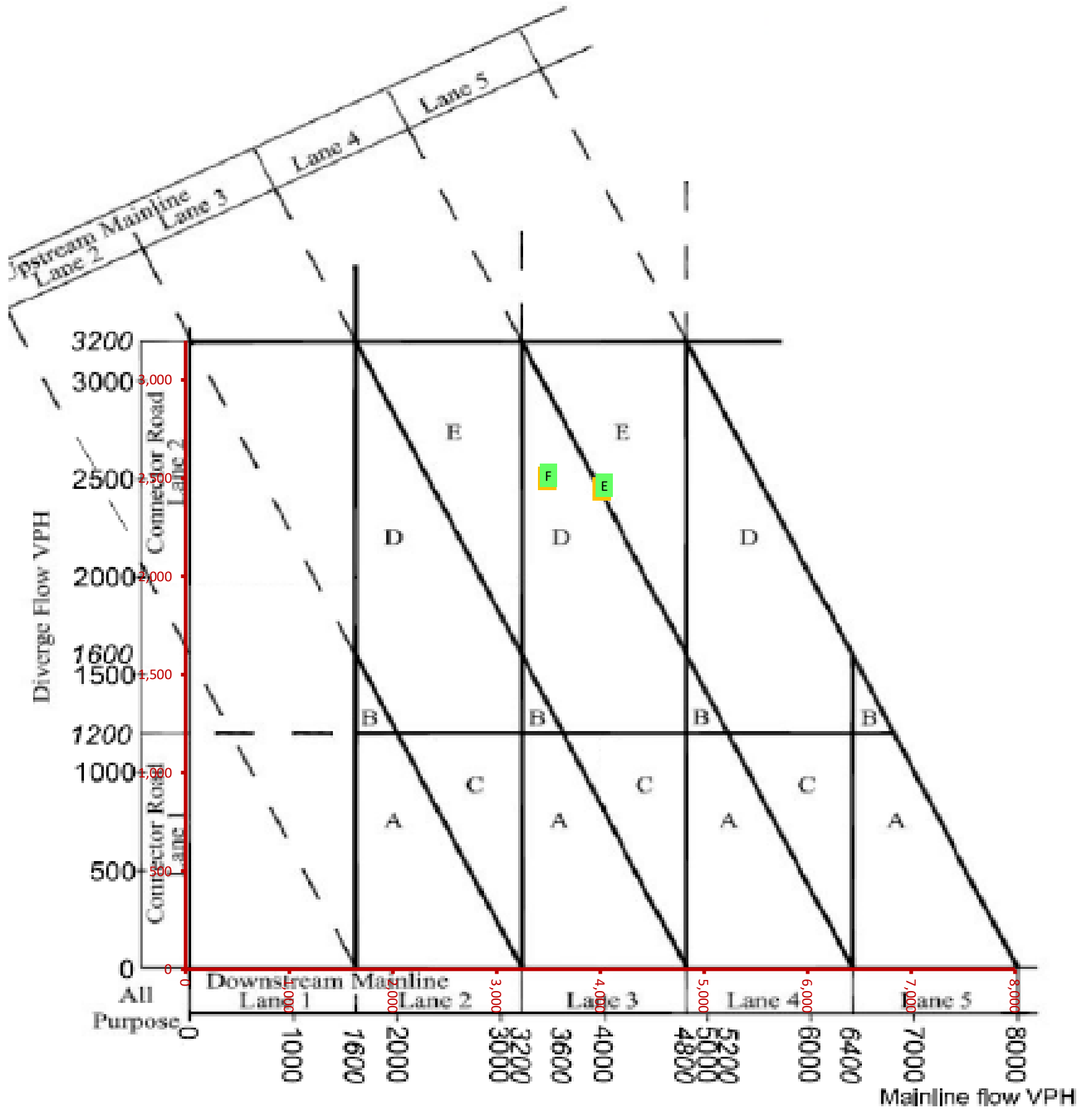
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,222	1,566	4,021	1.05	1,566	1.00
B	Ref no LTC PM	3,828	1,479	3,828	1.00	1,479	1.00
C	Ref with LTC AM			4,349	1.05	1,223	1.00
D	Ref with LTC PM			3,854	1.00	1,455	1.00
E	LP Scenario no LTC AM	4,225	1,572	4,024	1.05	1,572	1.00
F	LP Scenario no LTC PM	3,799	1,489	3,799	1.00	1,489	1.00
G	LP Scenario with LTC AM			4,396	1.05	1,187	1.00
H	LP Scenario with LTC PM			3,846	1.00	1,471	1.00

J2 southbound merge - with LTC (ACTUAL)
SENSITIVITY ASSESSMENT



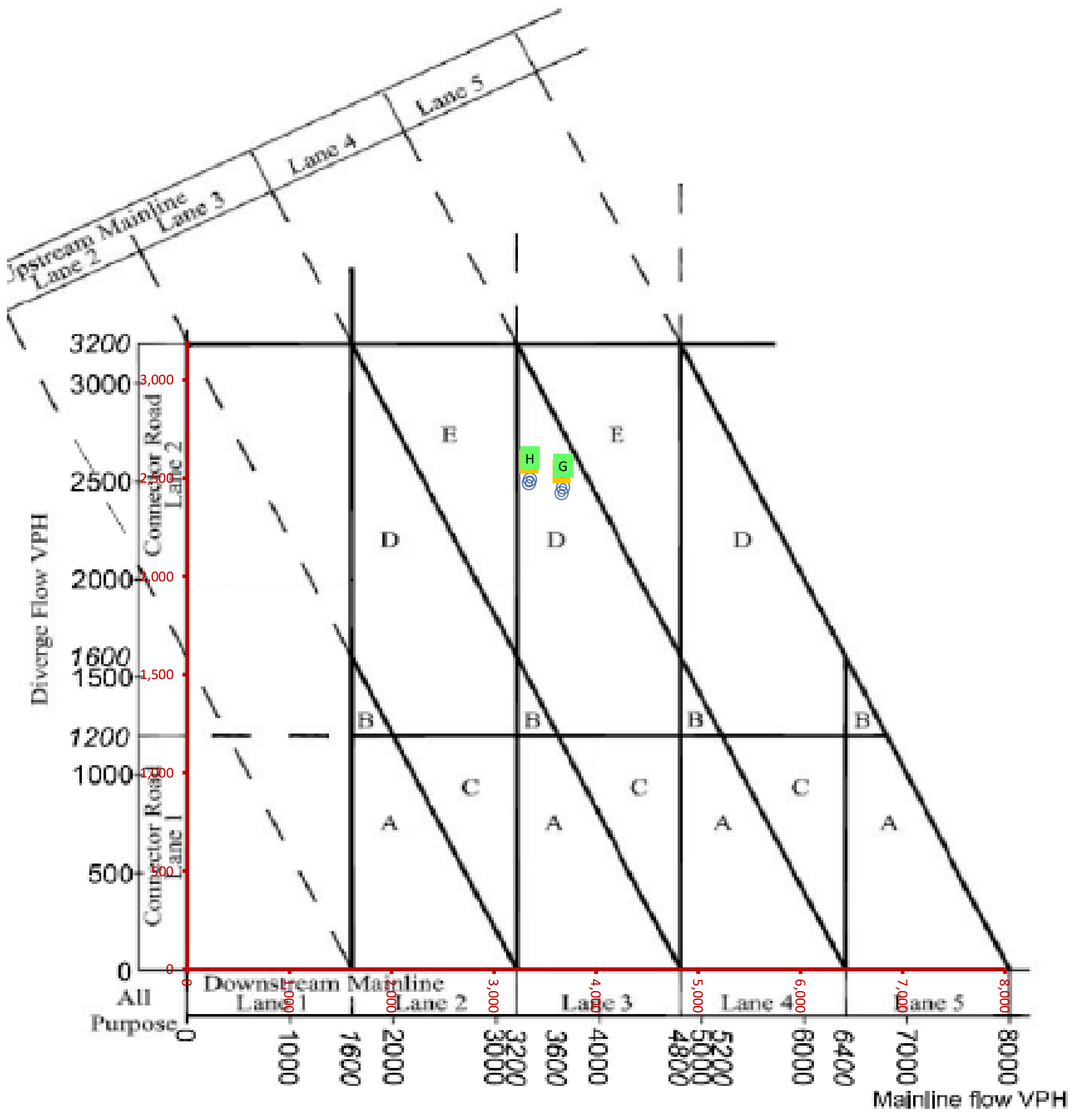
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,021	1.05	1,566	1.00
B	Ref no LTC PM			3,828	1.00	1,479	1.00
C	Ref with LTC AM	4,566	1,223	4,349	1.05	1,223	1.00
D	Ref with LTC PM	3,854	1,455	3,854	1.00	1,455	1.00
E	LP Scenario no LTC AM			4,024	1.05	1,572	1.00
F	LP Scenario no LTC PM			3,799	1.00	1,489	1.00
G	LP Scenario with LTC AM	4,616	1,187	4,396	1.05	1,187	1.00
H	LP Scenario with LTC PM	3,846	1,471	3,846	1.00	1,471	1.00

J2 northbound diverge - no LTC (DEMAND) SENSITIVITY ASSESSMENT



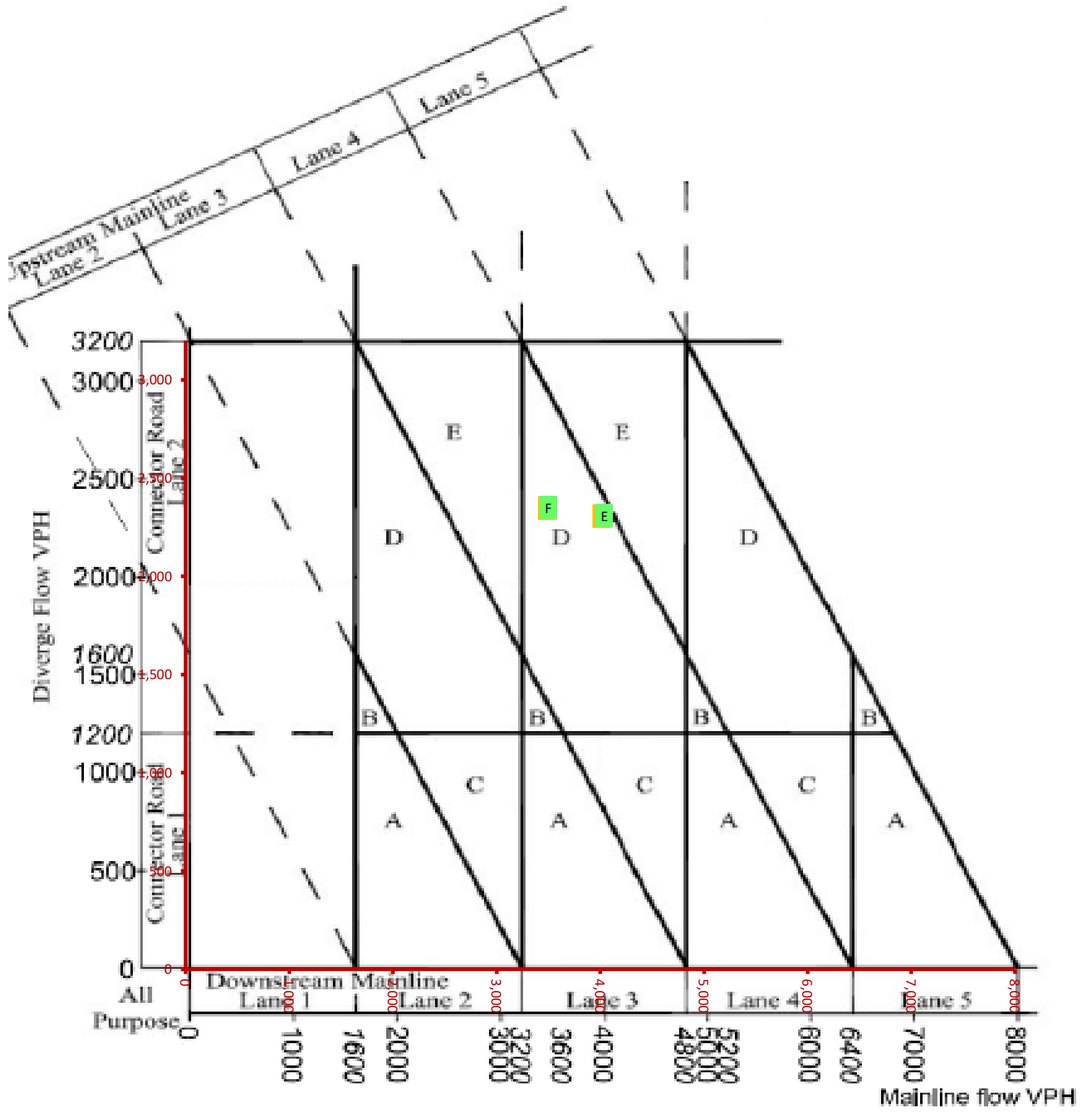
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,013	2,446	4,013	1.00	2,446	1.00
B	Ref no LTC PM	3,487	2,498	3,487	1.00	2,498	1.00
C	Ref with LTC AM			3,660	1.00	2,424	1.00
D	Ref with LTC PM			3,341	1.00	2,475	1.00
E	LP Scenario no LTC AM	4,039	2,465	4,039	1.00	2,465	1.00
F	LP Scenario no LTC PM	3,501	2,514	3,501	1.00	2,514	1.00
G	LP Scenario with LTC AM			3,675	1.00	2,455	1.00
H	LP Scenario with LTC PM			3,352	1.00	2,493	1.00

J2 northbound diverge - with LTC (DEMAND) SENSITIVITY ASSESSMENT



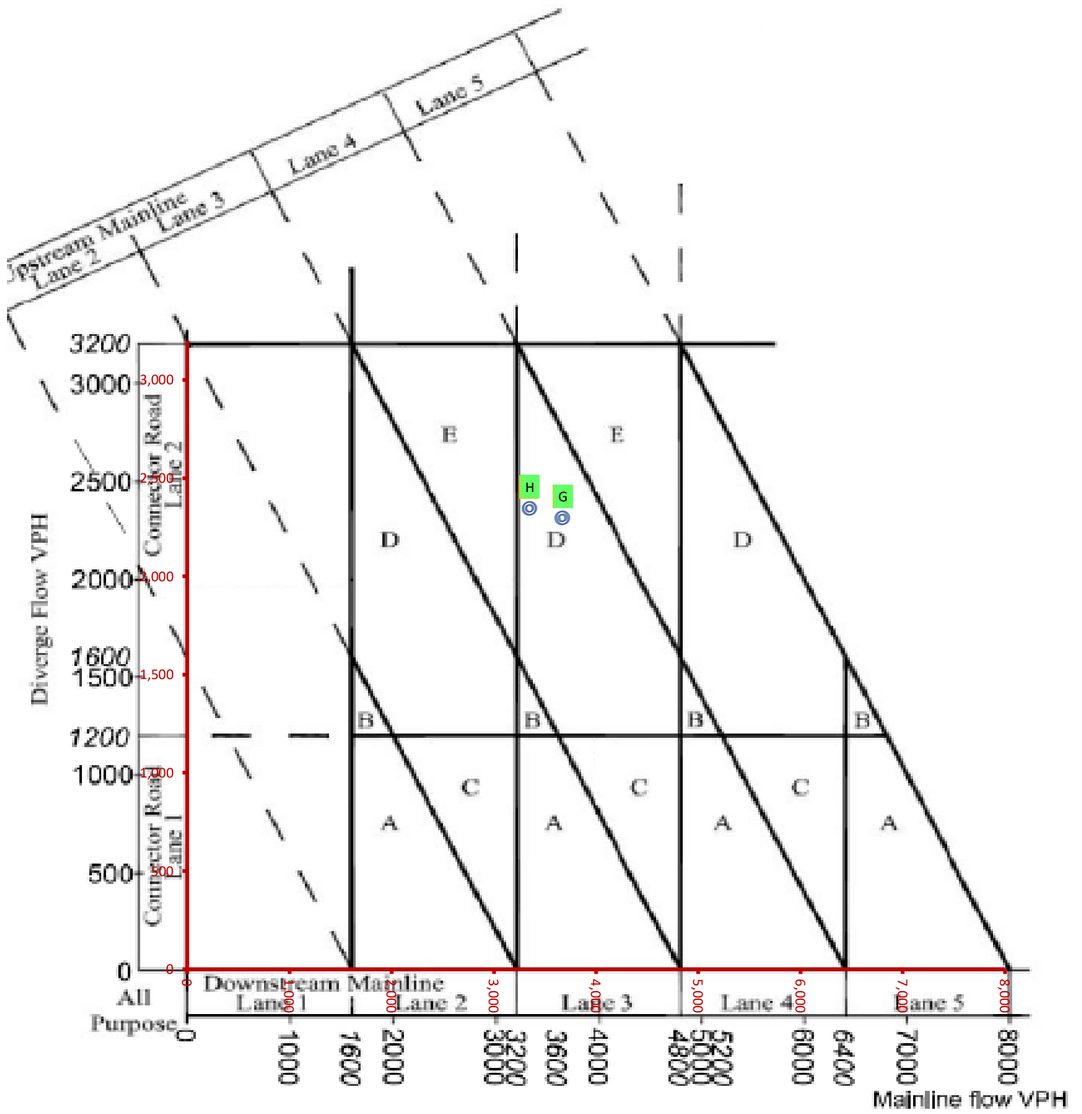
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,013	1.00	2,446	1.00
B	Ref no LTC PM			3,487	1.00	2,498	1.00
C	Ref with LTC AM	3,660	2,424	3,660	1.00	2,424	1.00
D	Ref with LTC PM	3,341	2,475	3,341	1.00	2,475	1.00
E	LP Scenario no LTC AM			4,039	1.00	2,465	1.00
F	LP Scenario no LTC PM			3,501	1.00	2,514	1.00
G	LP Scenario with LTC AM	3,675	2,455	3,675	1.00	2,455	1.00
H	LP Scenario with LTC PM	3,352	2,493	3,352	1.00	2,493	1.00

J2 northbound diverge - no LTC (ACTUAL) SENSITIVITY ASSESSMENT



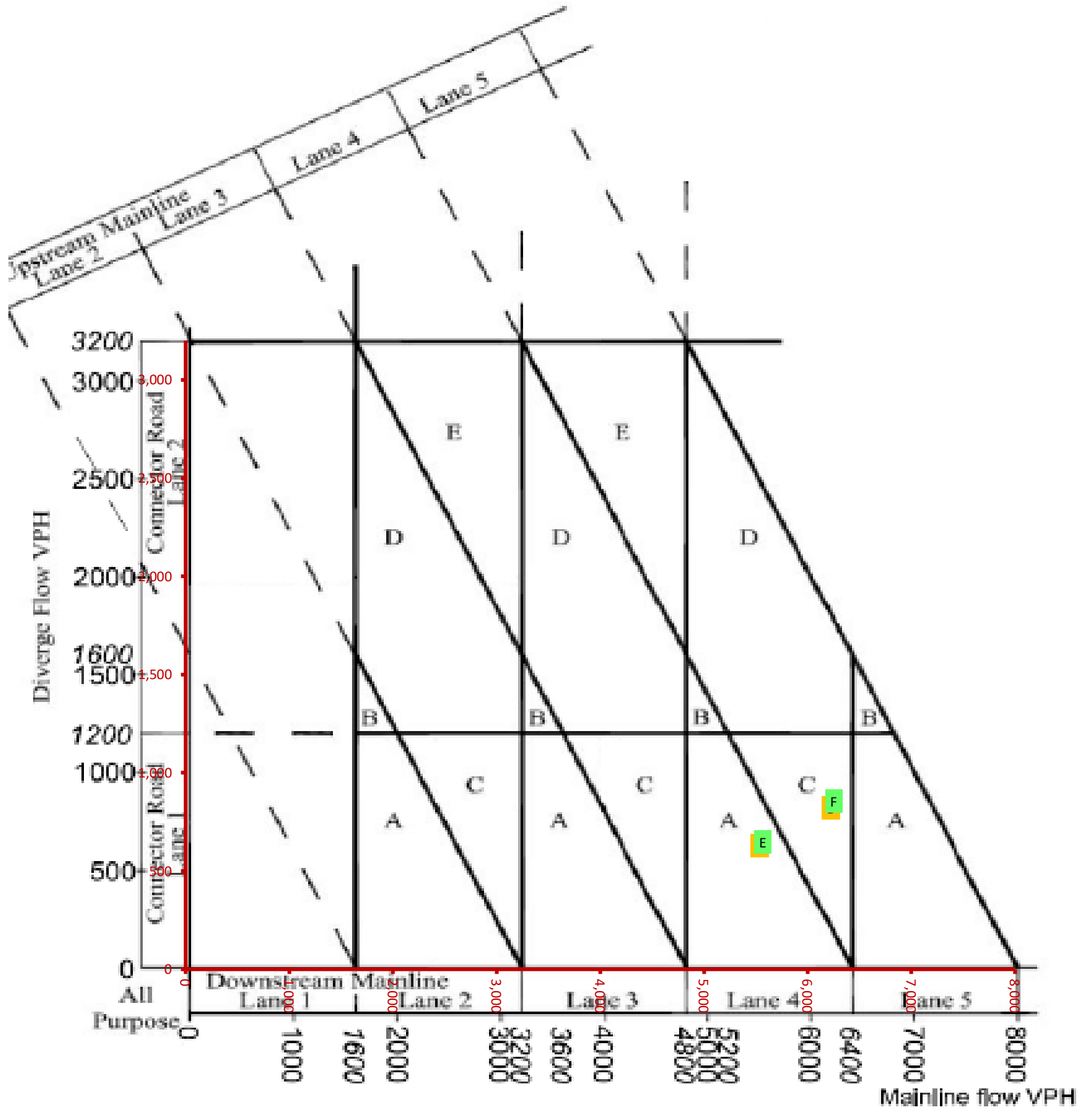
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,013	2,307	4,013	1.00	2,307	1.00
B	Ref no LTC PM	3,487	2,346	3,487	1.00	2,346	1.00
C	Ref with LTC AM			3,660	1.00	2,297	1.00
D	Ref with LTC PM			3,341	1.00	2,345	1.00
E	LP Scenario no LTC AM	4,039	2,308	4,039	1.00	2,308	1.00
F	LP Scenario no LTC PM	3,501	2,350	3,501	1.00	2,350	1.00
G	LP Scenario with LTC AM			3,675	1.00	2,299	1.00
H	LP Scenario with LTC PM			3,352	1.00	2,348	1.00

J2 northbound diverge - with LTC (ACTUAL) SENSITIVITY ASSESSMENT



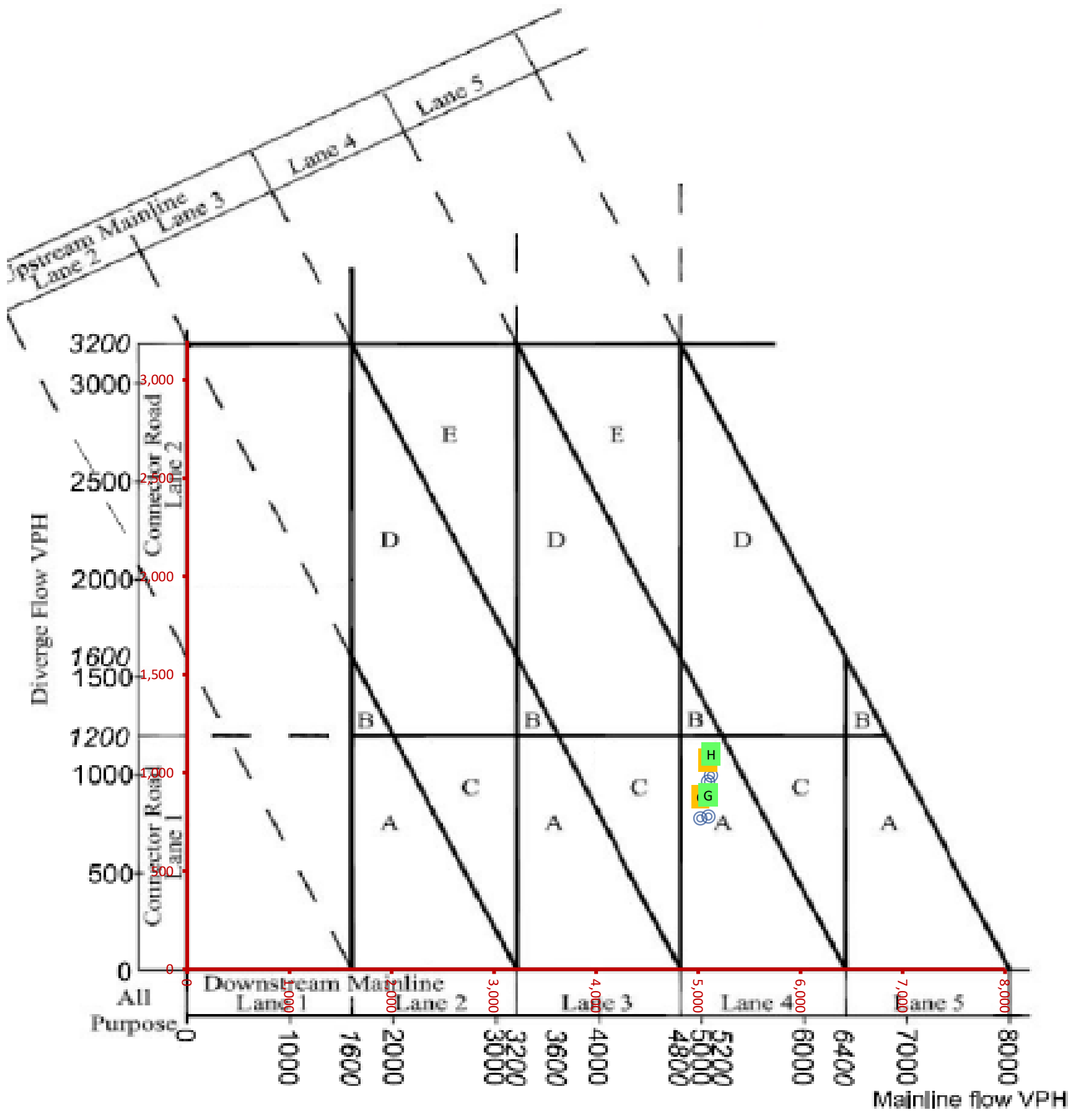
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,013	1.00	2,307	1.00
B	Ref no LTC PM			3,487	1.00	2,346	1.00
C	Ref with LTC AM	3,660	2,297	3,660	1.00	2,297	1.00
D	Ref with LTC PM	3,341	2,345	3,341	1.00	2,345	1.00
E	LP Scenario no LTC AM			4,039	1.00	2,308	1.00
F	LP Scenario no LTC PM			3,501	1.00	2,350	1.00
G	LP Scenario with LTC AM	3,675	2,299	3,675	1.00	2,299	1.00
H	LP Scenario with LTC PM	3,352	2,348	3,352	1.00	2,348	1.00

J2 southbound diverge - no LTC (DEMAND) SENSITIVITY ASSESSMENT



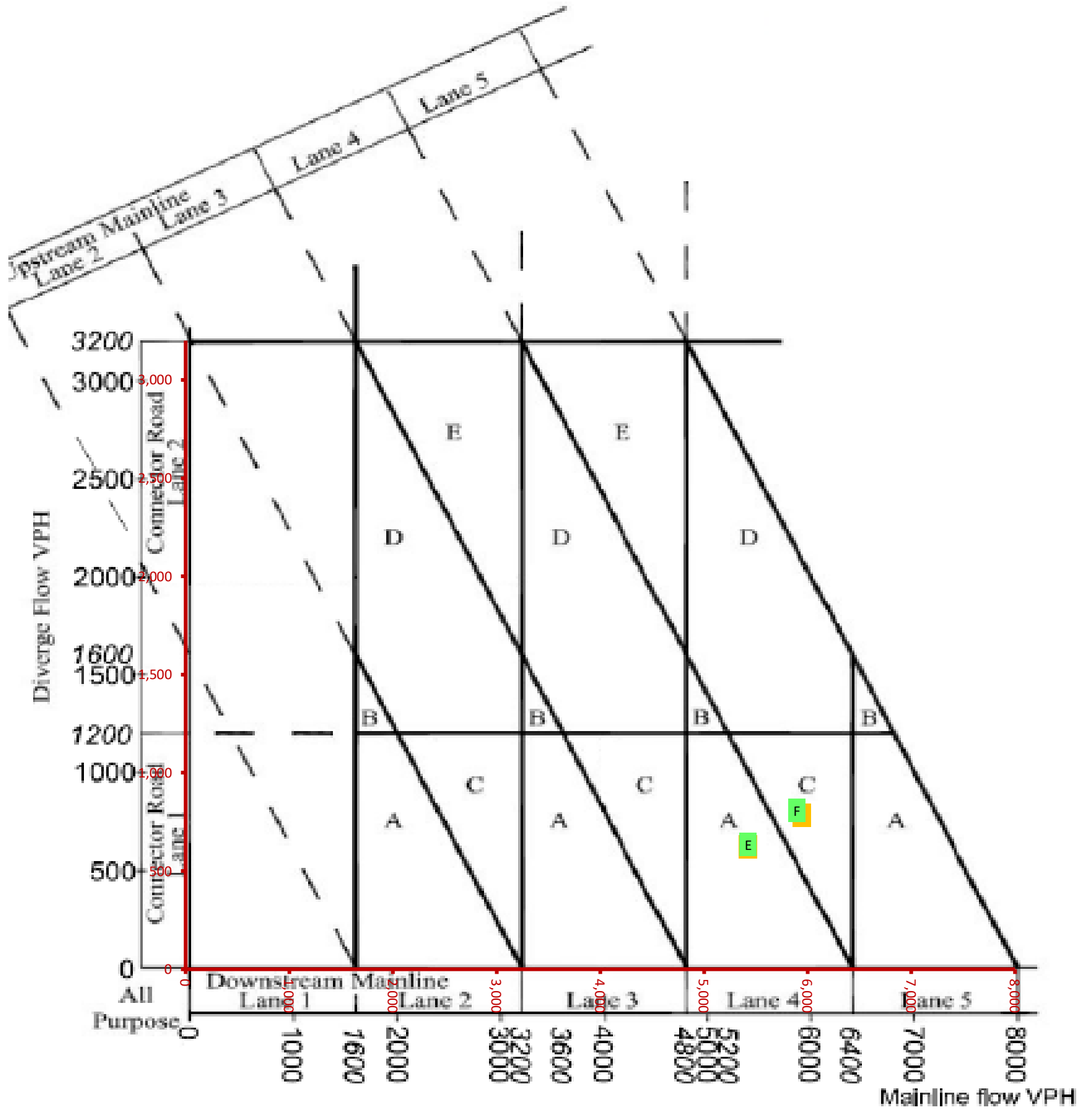
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,538	629	5,538	1.00	629	1.00
B	Ref no LTC PM	6,224	822	6,224	1.00	822	1.00
C	Ref with LTC AM			5,019	1.00	769	1.00
D	Ref with LTC PM			5,093	1.00	955	1.00
E	LP Scenario no LTC AM	5,566	647	5,566	1.00	647	1.00
F	LP Scenario no LTC PM	6,251	857	6,251	1.00	857	1.00
G	LP Scenario with LTC AM			5,095	1.00	778	1.00
H	LP Scenario with LTC PM			5,124	1.00	987	1.00

J2 southbound diverge - with LTC (DEMAND) SENSITIVITY ASSESSMENT



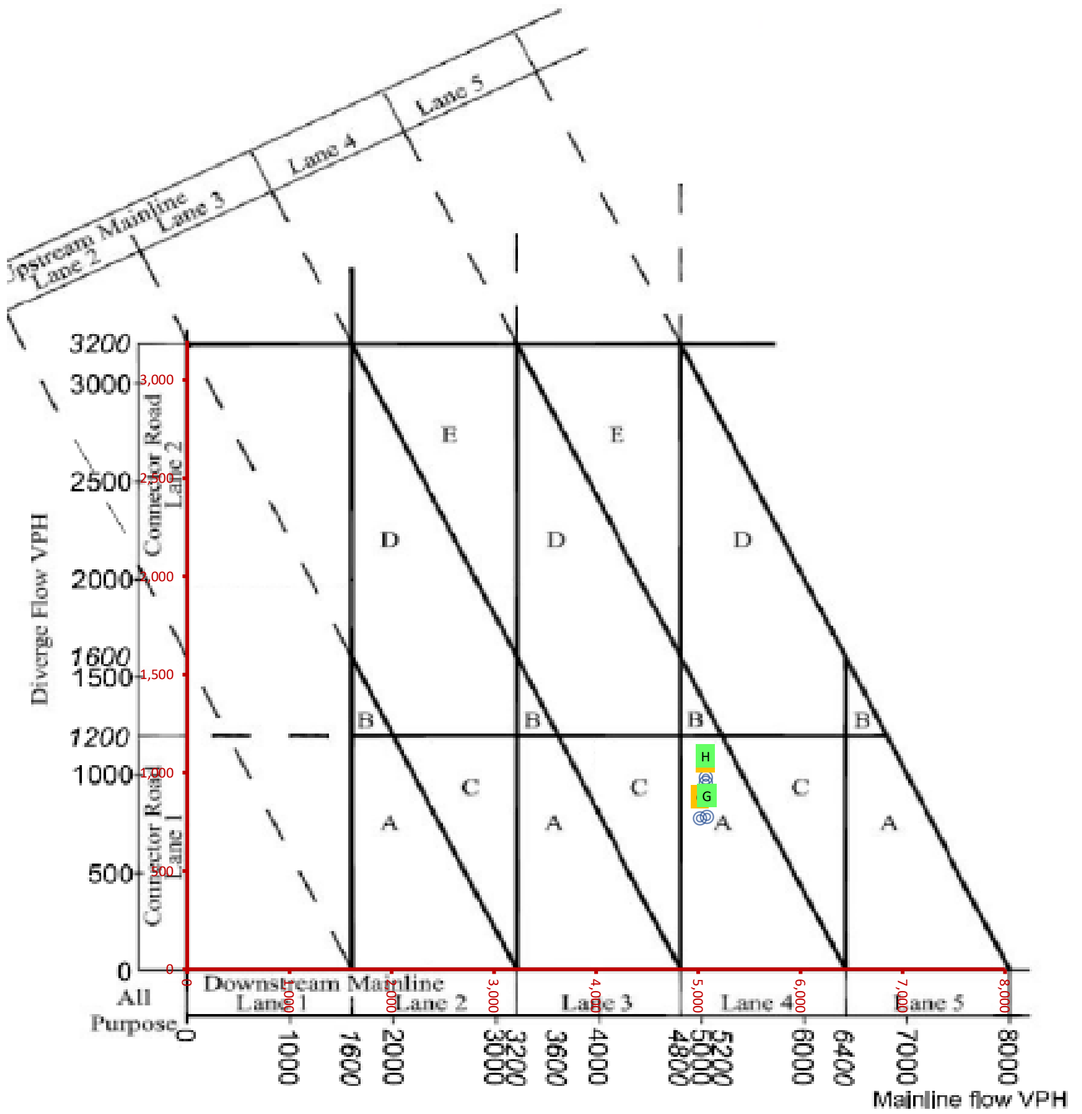
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,538	1.00	629	1.00
B	Ref no LTC PM			6,224	1.00	822	1.00
C	Ref with LTC AM	5,019	769	5,019	1.00	769	1.00
D	Ref with LTC PM	5,093	955	5,093	1.00	955	1.00
E	LP Scenario no LTC AM			5,566	1.00	647	1.00
F	LP Scenario no LTC PM			6,251	1.00	857	1.00
G	LP Scenario with LTC AM	5,095	778	5,095	1.00	778	1.00
H	LP Scenario with LTC PM	5,124	987	5,124	1.00	987	1.00

J2 southbound diverge - no LTC (ACTUAL) SENSITIVITY ASSESSMENT



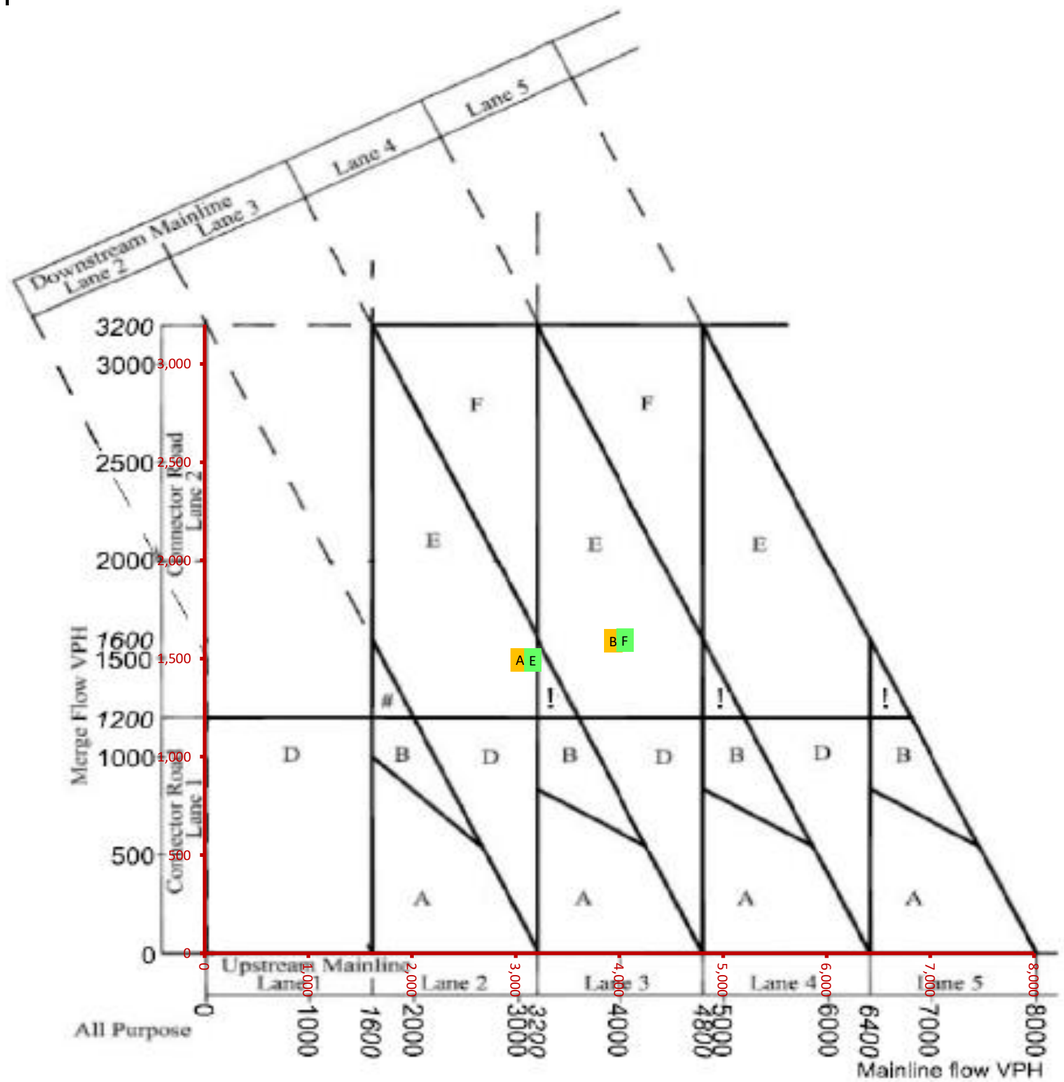
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,421	622	5,421	1.00	622	1.00
B	Ref no LTC PM	5,945	785	5,945	1.00	785	1.00
C	Ref with LTC AM			5,015	1.00	769	1.00
D	Ref with LTC PM			5,070	1.00	951	1.00
E	LP Scenario no LTC AM	5,426	636	5,426	1.00	636	1.00
F	LP Scenario no LTC PM	5,898	808	5,898	1.00	808	1.00
G	LP Scenario with LTC AM			5,082	1.00	776	1.00
H	LP Scenario with LTC PM			5,070	1.00	977	1.00

J2 southbound diverge - with LTC (ACTUAL) SENSITIVITY ASSESSMENT



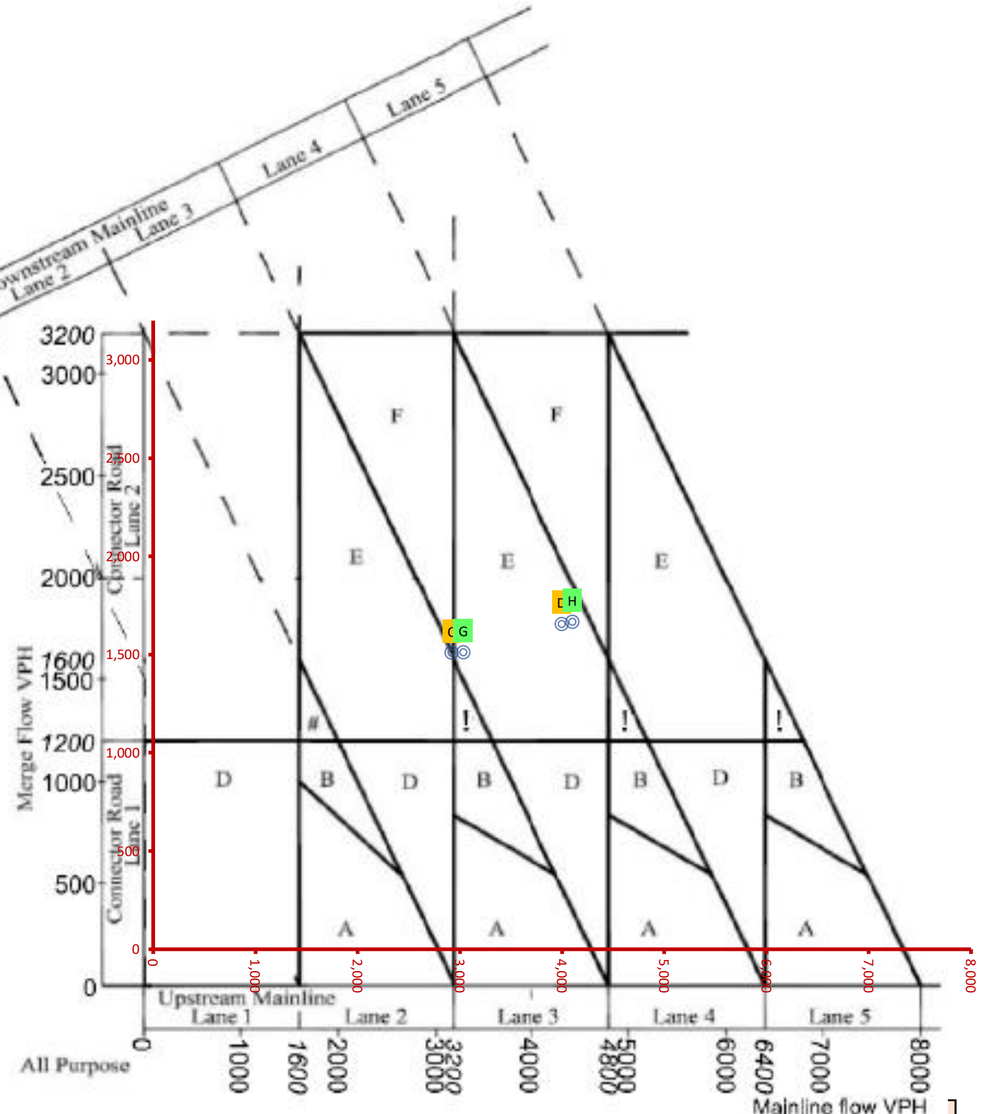
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,421	1.00	622	1.00
B	Ref no LTC PM			5,945	1.00	785	1.00
C	Ref with LTC AM	5,015	769	5,015	1.00	769	1.00
D	Ref with LTC PM	5,070	951	5,070	1.00	951	1.00
E	LP Scenario no LTC AM			5,426	1.00	636	1.00
F	LP Scenario no LTC PM			5,898	1.00	808	1.00
G	LP Scenario with LTC AM	5,082	776	5,082	1.00	776	1.00
H	LP Scenario with LTC PM	5,070	977	5,070	1.00	977	1.00

J2 eastbound merge - no LTC (DEMAND) SENSITIVITY ASSESSMENT



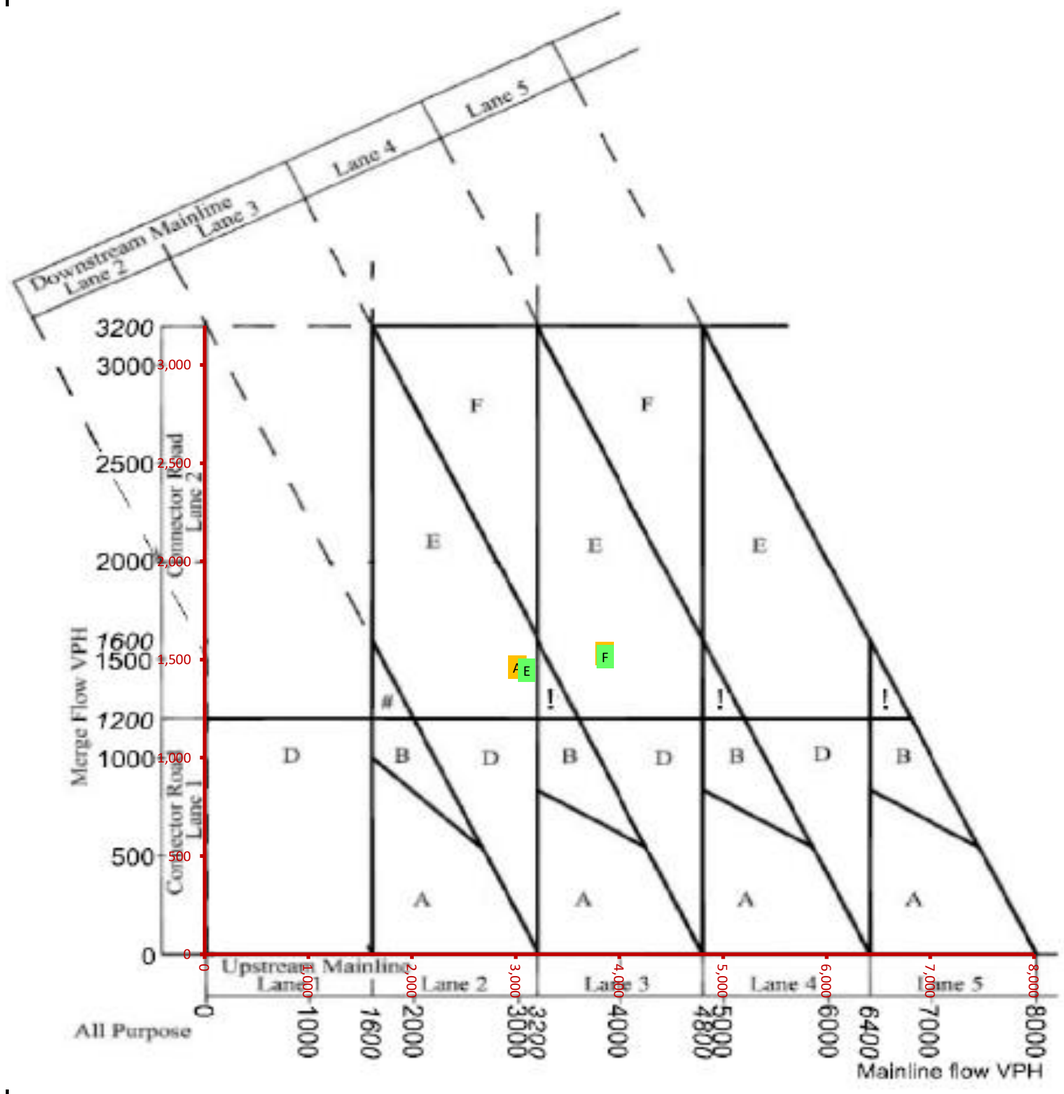
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	3,042	1,494	3,042	1.00	1,494	1.00
B	Ref no LTC PM	3,939	1,590	3,939	1.00	1,590	1.00
C	Ref with LTC AM			2,916	1.00	1,511	1.00
D	Ref with LTC PM			3,993	1.00	1,657	1.00
E	LP Scenario no LTC AM	3,163	1,494	3,163	1.00	1,494	1.00
F	LP Scenario no LTC PM	4,053	1,593	4,053	1.00	1,593	1.00
G	LP Scenario with LTC AM			3,031	1.00	1,512	1.00
H	LP Scenario with LTC PM			4,098	1.00	1,667	1.00

J2 eastbound merge - with LTC (DEMAND) SENSITIVITY ASSESSMENT



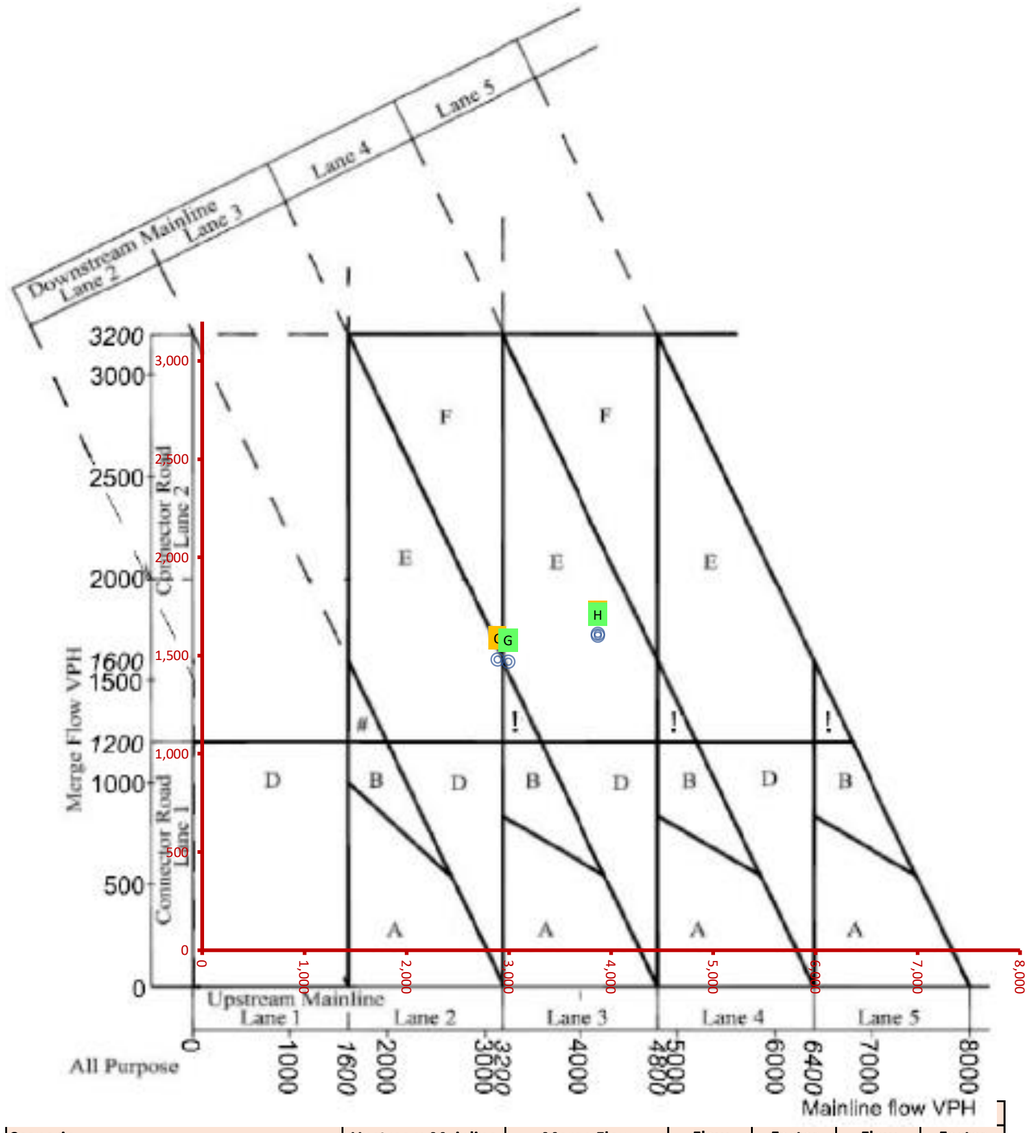
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			3,042	1.00	1,494	1.00
B	Ref no LTC PM			3,939	1.00	1,590	1.00
C	Ref with LTC AM	2,916	1,511	2,916	1.00	1,511	1.00
D	Ref with LTC PM	3,993	1,657	3,993	1.00	1,657	1.00
E	LP Scenario no LTC AM			3,163	1.00	1,494	1.00
F	LP Scenario no LTC PM			4,053	1.00	1,593	1.00
G	LP Scenario with LTC AM	3,031	1,512	3,031	1.00	1,512	1.00
H	LP Scenario with LTC PM	4,098	1,667	4,098	1.00	1,667	1.00

J2 eastbound merge - no LTC (ACTUAL)
SENSITIVITY ASSESSMENT



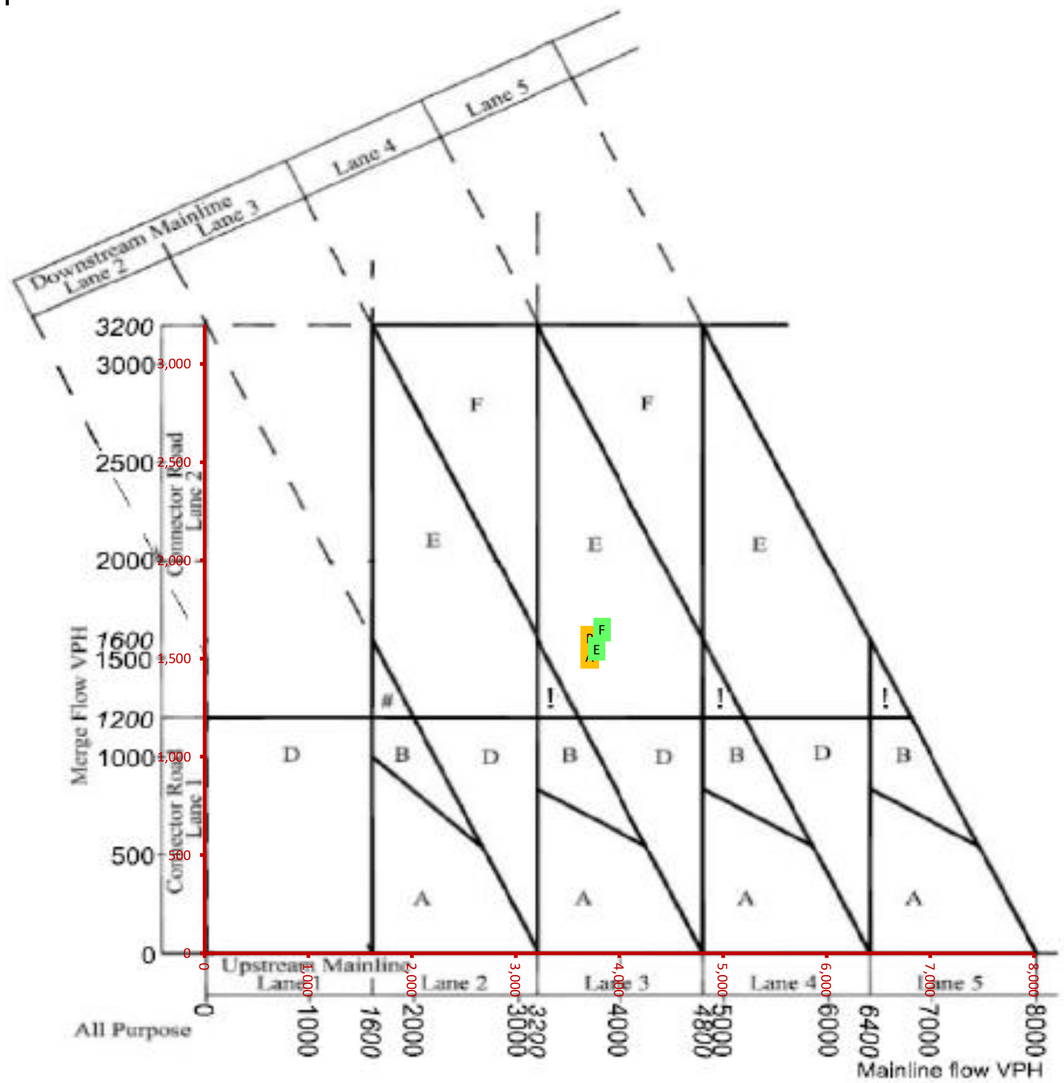
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	3,015	1,461	3,015	1.00	1,461	1.00
B	Ref no LTC PM	3,857	1,531	3,857	1.00	1,531	1.00
C	Ref with LTC AM			2,887	1.00	1,481	1.00
D	Ref with LTC PM			3,868	1.00	1,612	1.00
E	LP Scenario no LTC AM	3,108	1,444	3,108	1.00	1,444	1.00
F	LP Scenario no LTC PM	3,863	1,514	3,863	1.00	1,514	1.00
G	LP Scenario with LTC AM			2,991	1.00	1,470	1.00
H	LP Scenario with LTC PM			3,868	1.00	1,602	1.00

J2 eastbound merge - with LTC (ACTUAL)
SENSITIVITY ASSESSMENT



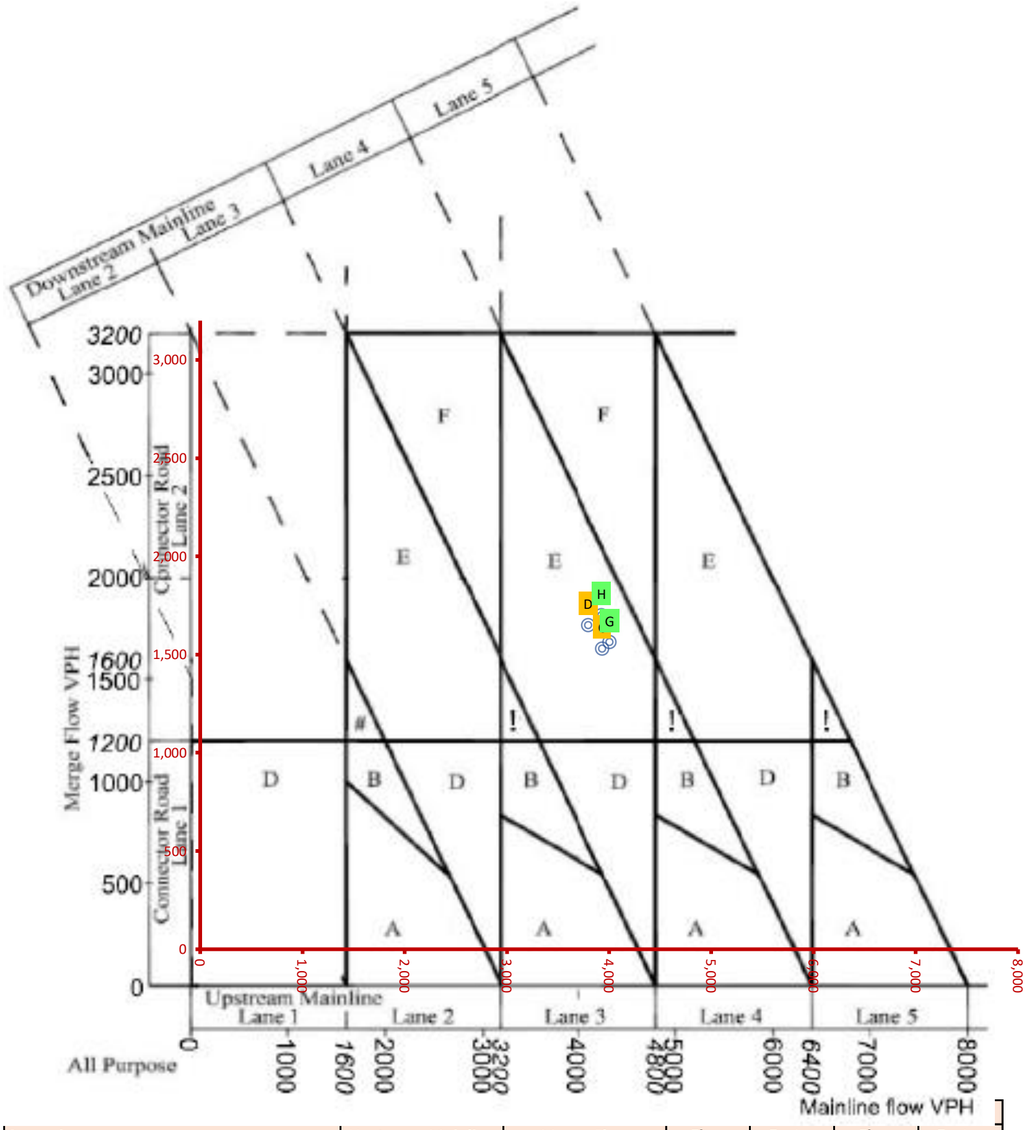
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			3,015	1.00	1,461	1.00
B	Ref no LTC PM			3,857	1.00	1,531	1.00
C	Ref with LTC AM	2,887	1,481	2,887	1.00	1,481	1.00
D	Ref with LTC PM	3,868	1,612	3,868	1.00	1,612	1.00
E	LP Scenario no LTC AM			3,108	1.00	1,444	1.00
F	LP Scenario no LTC PM			3,863	1.00	1,514	1.00
G	LP Scenario with LTC AM	2,991	1,470	2,991	1.00	1,470	1.00
H	LP Scenario with LTC PM	3,868	1,602	3,868	1.00	1,602	1.00

J2 westbound merge - no LTC (DEMAND) SENSITIVITY ASSESSMENT



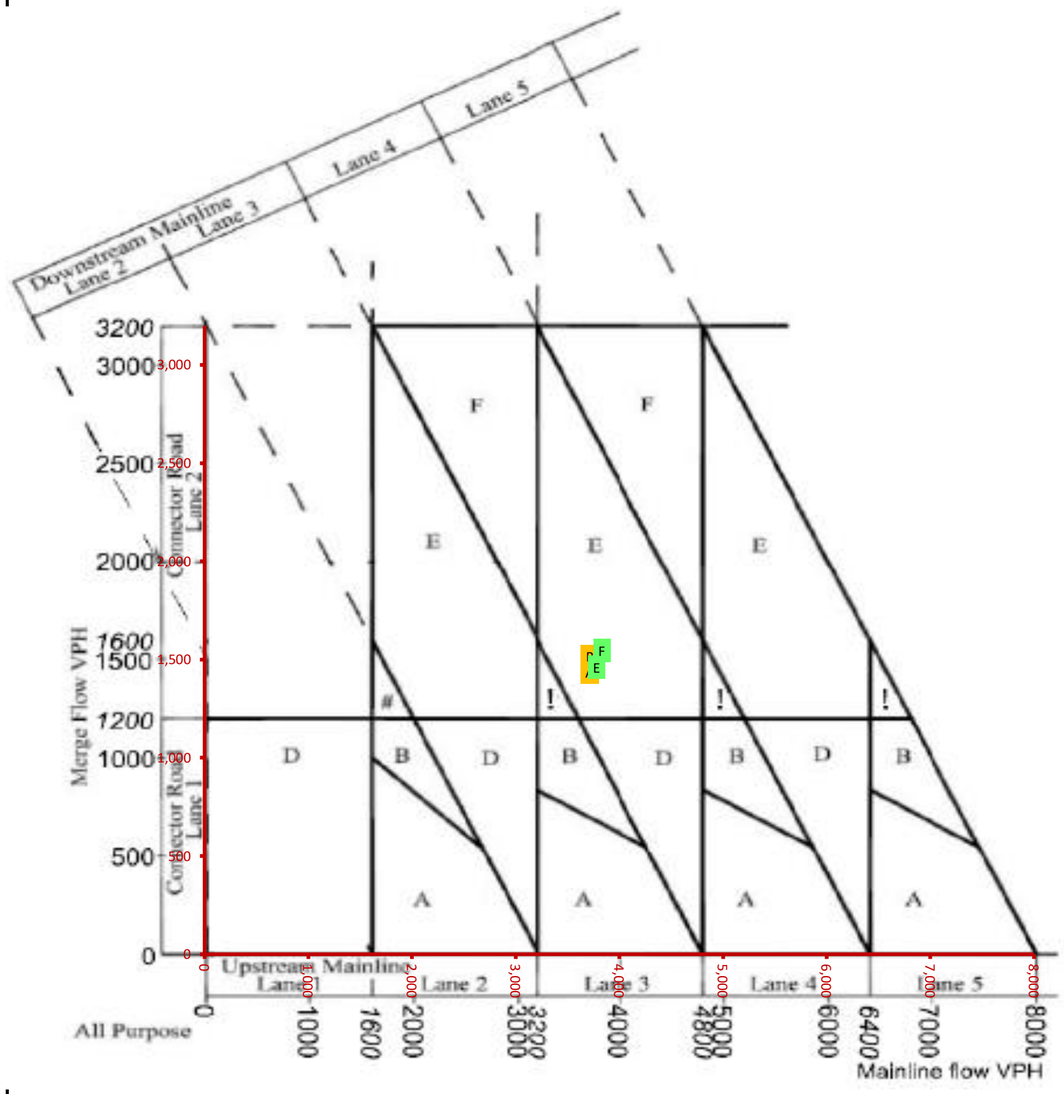
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	3,715	1,510	3,715	1.00	1,510	1.00
B	Ref no LTC PM	3,716	1,605	3,716	1.00	1,605	1.00
C	Ref with LTC AM			3,931	1.00	1,530	1.00
D	Ref with LTC PM			3,794	1.00	1,650	1.00
E	LP Scenario no LTC AM	3,781	1,549	3,781	1.00	1,549	1.00
F	LP Scenario no LTC PM	3,833	1,649	3,833	1.00	1,649	1.00
G	LP Scenario with LTC AM			4,003	1.00	1,564	1.00
H	LP Scenario with LTC PM			3,924	1.00	1,702	1.00

J2 westbound merge - with LTC (DEMAND) SENSITIVITY ASSESSMENT



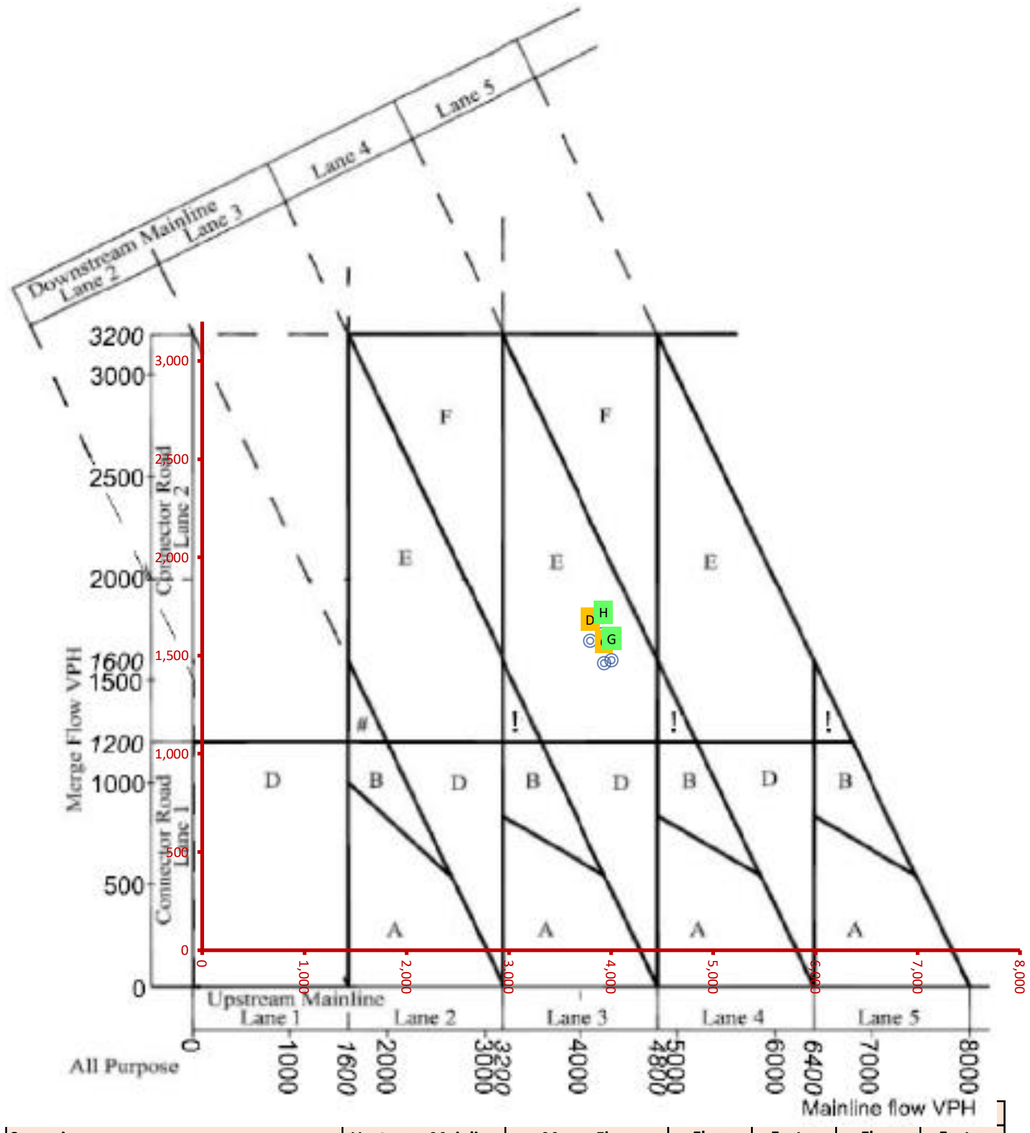
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			3,715	1.00	1,510	1.00
B	Ref no LTC PM			3,716	1.00	1,605	1.00
C	Ref with LTC AM	3,931	1,530	3,931	1.00	1,530	1.00
D	Ref with LTC PM	3,794	1,650	3,794	1.00	1,650	1.00
E	LP Scenario no LTC AM			3,781	1.00	1,549	1.00
F	LP Scenario no LTC PM			3,833	1.00	1,649	1.00
G	LP Scenario with LTC AM	4,003	1,564	4,003	1.00	1,564	1.00
H	LP Scenario with LTC PM	3,924	1,702	3,924	1.00	1,702	1.00

J2 westbound merge - no LTC (ACTUAL)
SENSITIVITY ASSESSMENT



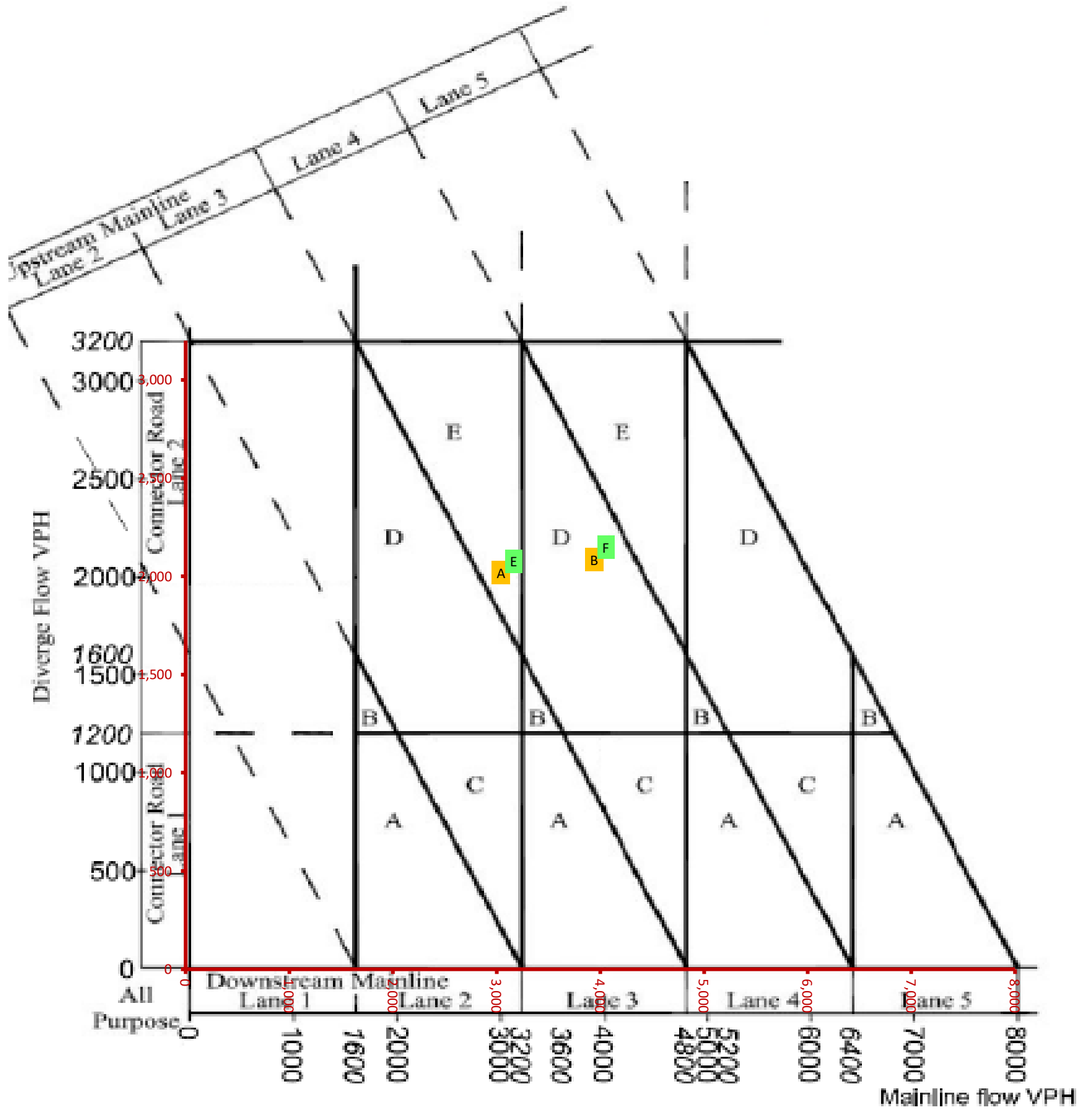
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	3,715	1,435	3,715	1.00	1,435	1.00
B	Ref no LTC PM	3,716	1,516	3,716	1.00	1,516	1.00
C	Ref with LTC AM			3,931	1.00	1,462	1.00
D	Ref with LTC PM			3,794	1.00	1,575	1.00
E	LP Scenario no LTC AM	3,781	1,461	3,781	1.00	1,461	1.00
F	LP Scenario no LTC PM	3,833	1,547	3,833	1.00	1,547	1.00
G	LP Scenario with LTC AM			4,003	1.00	1,477	1.00
H	LP Scenario with LTC PM			3,924	1.00	1,612	1.00

J2 westbound merge - with LTC (ACTUAL)
SENSITIVITY ASSESSMENT



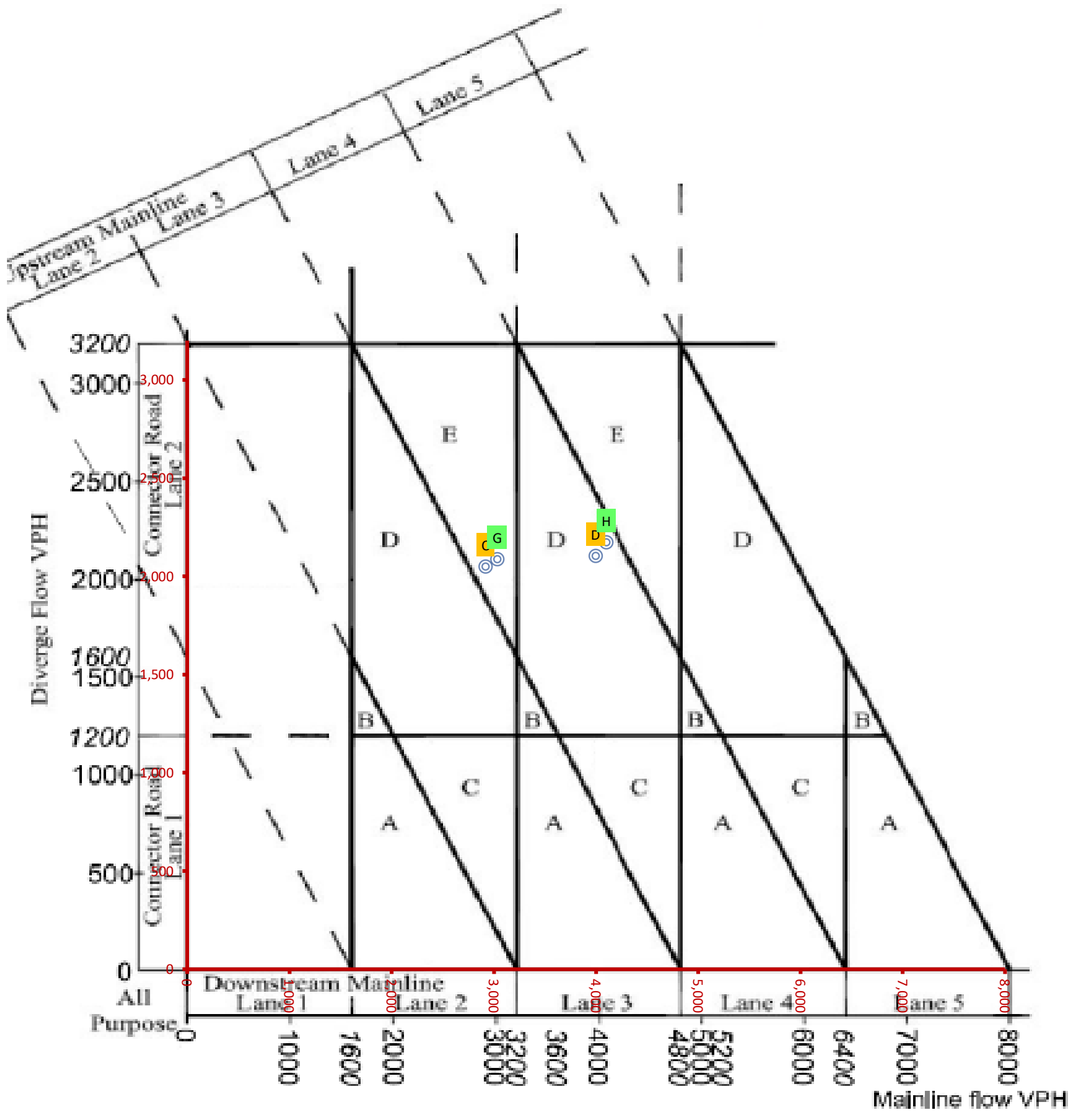
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			3,715	1.00	1,435	1.00
B	Ref no LTC PM			3,716	1.00	1,516	1.00
C	Ref with LTC AM	3,931	1,462	3,931	1.00	1,462	1.00
D	Ref with LTC PM	3,794	1,575	3,794	1.00	1,575	1.00
E	LP Scenario no LTC AM			3,781	1.00	1,461	1.00
F	LP Scenario no LTC PM			3,833	1.00	1,547	1.00
G	LP Scenario with LTC AM	4,003	1,477	4,003	1.00	1,477	1.00
H	LP Scenario with LTC PM	3,924	1,612	3,924	1.00	1,612	1.00

J2 eastbound diverge - no LTC (DEMAND) SENSITIVITY ASSESSMENT



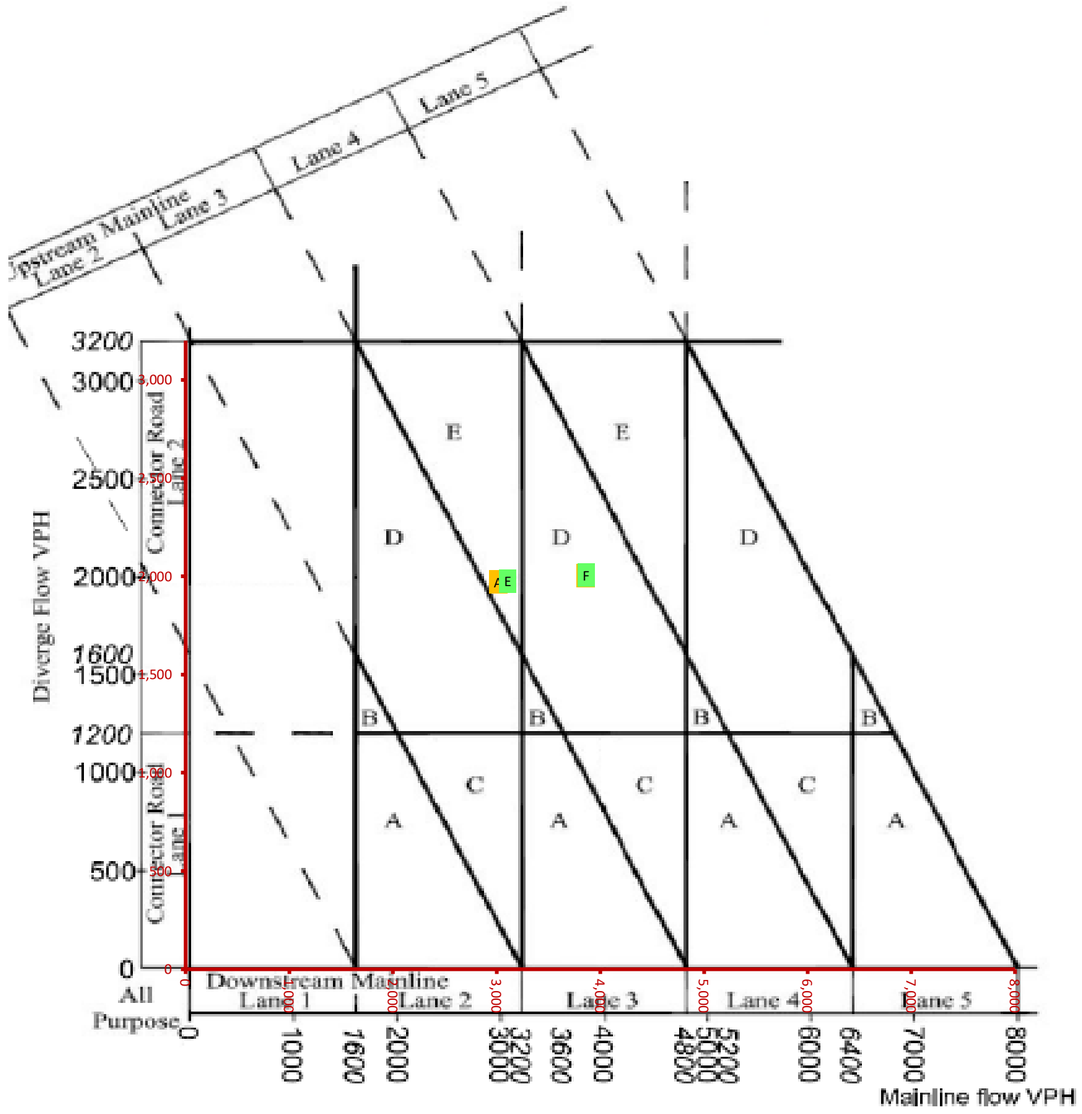
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	3,042	2,019	3,042	1.00	2,019	1.00
B	Ref no LTC PM	3,939	2,086	3,939	1.00	2,086	1.00
C	Ref with LTC AM			2,916	1.00	2,051	1.00
D	Ref with LTC PM			3,993	1.00	2,104	1.00
E	LP Scenario no LTC AM	3,163	2,078	3,163	1.00	2,078	1.00
F	LP Scenario no LTC PM	4,053	2,148	4,053	1.00	2,148	1.00
G	LP Scenario with LTC AM			3,031	1.00	2,089	1.00
H	LP Scenario with LTC PM			4,098	1.00	2,174	1.00

J2 eastbound diverge - with LTC (DEMAND) SENSITIVITY ASSESSMENT



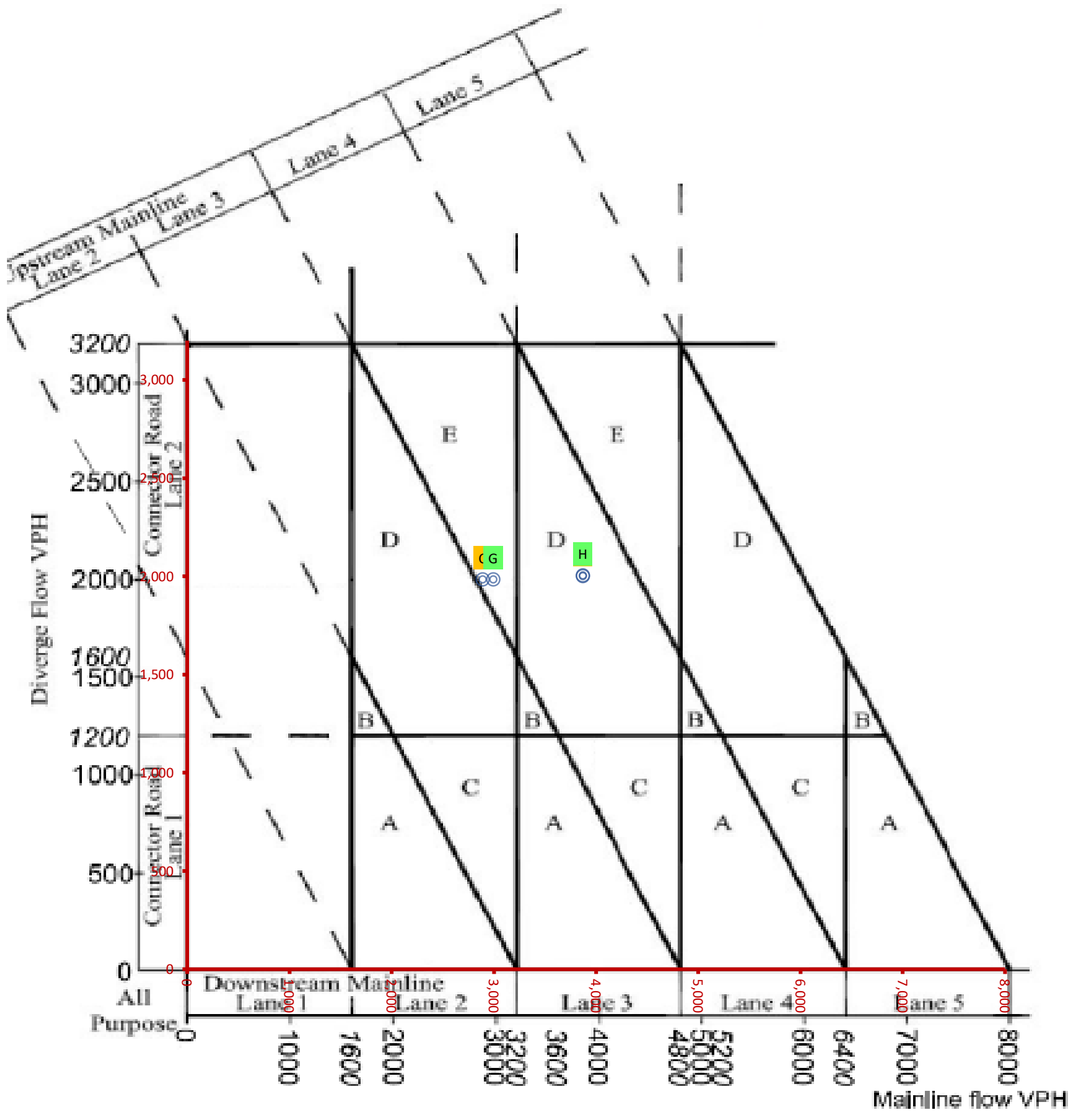
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			3,042	1.00	2,019	1.00
B	Ref no LTC PM			3,939	1.00	2,086	1.00
C	Ref with LTC AM	2,916	2,051	2,916	1.00	2,051	1.00
D	Ref with LTC PM	3,993	2,104	3,993	1.00	2,104	1.00
E	LP Scenario no LTC AM			3,163	1.00	2,078	1.00
F	LP Scenario no LTC PM			4,053	1.00	2,148	1.00
G	LP Scenario with LTC AM	3,031	2,089	3,031	1.00	2,089	1.00
H	LP Scenario with LTC PM	4,098	2,174	4,098	1.00	2,174	1.00

J2 eastbound diverge - no LTC (ACTUAL)
SENSITIVITY ASSESSMENT



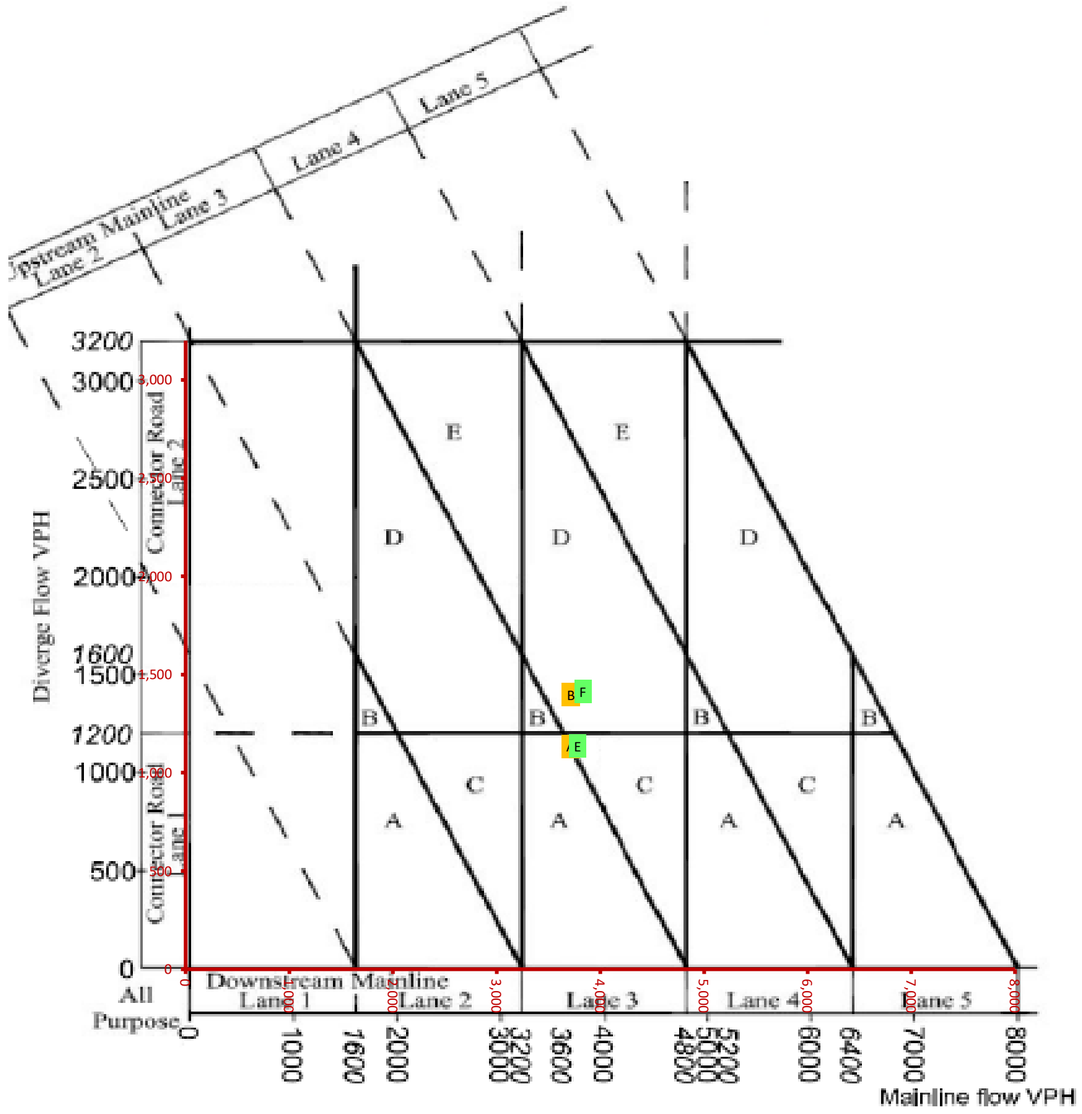
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	3,015	1,972	3,015	1.00	1,972	1.00
B	Ref no LTC PM	3,857	2,004	3,857	1.00	2,004	1.00
C	Ref with LTC AM			2,887	1.00	1,986	1.00
D	Ref with LTC PM			3,868	1.00	2,002	1.00
E	LP Scenario no LTC AM	3,108	1,976	3,108	1.00	1,976	1.00
F	LP Scenario no LTC PM	3,863	2,007	3,863	1.00	2,007	1.00
G	LP Scenario with LTC AM			2,991	1.00	1,986	1.00
H	LP Scenario with LTC PM			3,868	1.00	2,006	1.00

J2 eastbound diverge - with LTC (ACTUAL)
SENSITIVITY ASSESSMENT



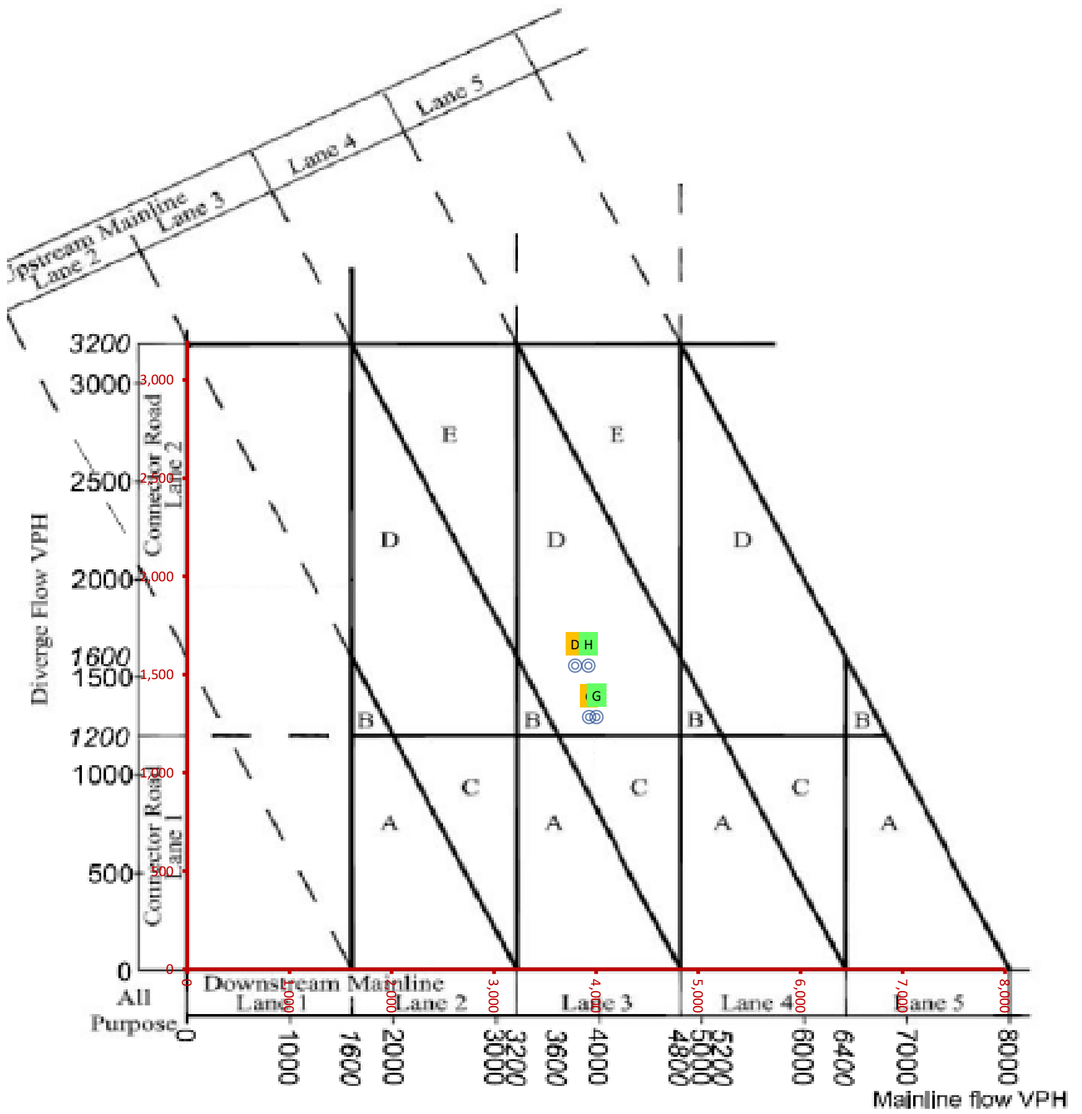
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			3,015	1.00	1,972	1.00
B	Ref no LTC PM			3,857	1.00	2,004	1.00
C	Ref with LTC AM	2,887	1,986	2,887	1.00	1,986	1.00
D	Ref with LTC PM	3,868	2,002	3,868	1.00	2,002	1.00
E	LP Scenario no LTC AM			3,108	1.00	1,976	1.00
F	LP Scenario no LTC PM			3,863	1.00	2,007	1.00
G	LP Scenario with LTC AM	2,991	1,986	2,991	1.00	1,986	1.00
H	LP Scenario with LTC PM	3,868	2,006	3,868	1.00	2,006	1.00

J2 westbound diverge - no LTC (DEMAND) SENSITIVITY ASSESSMENT



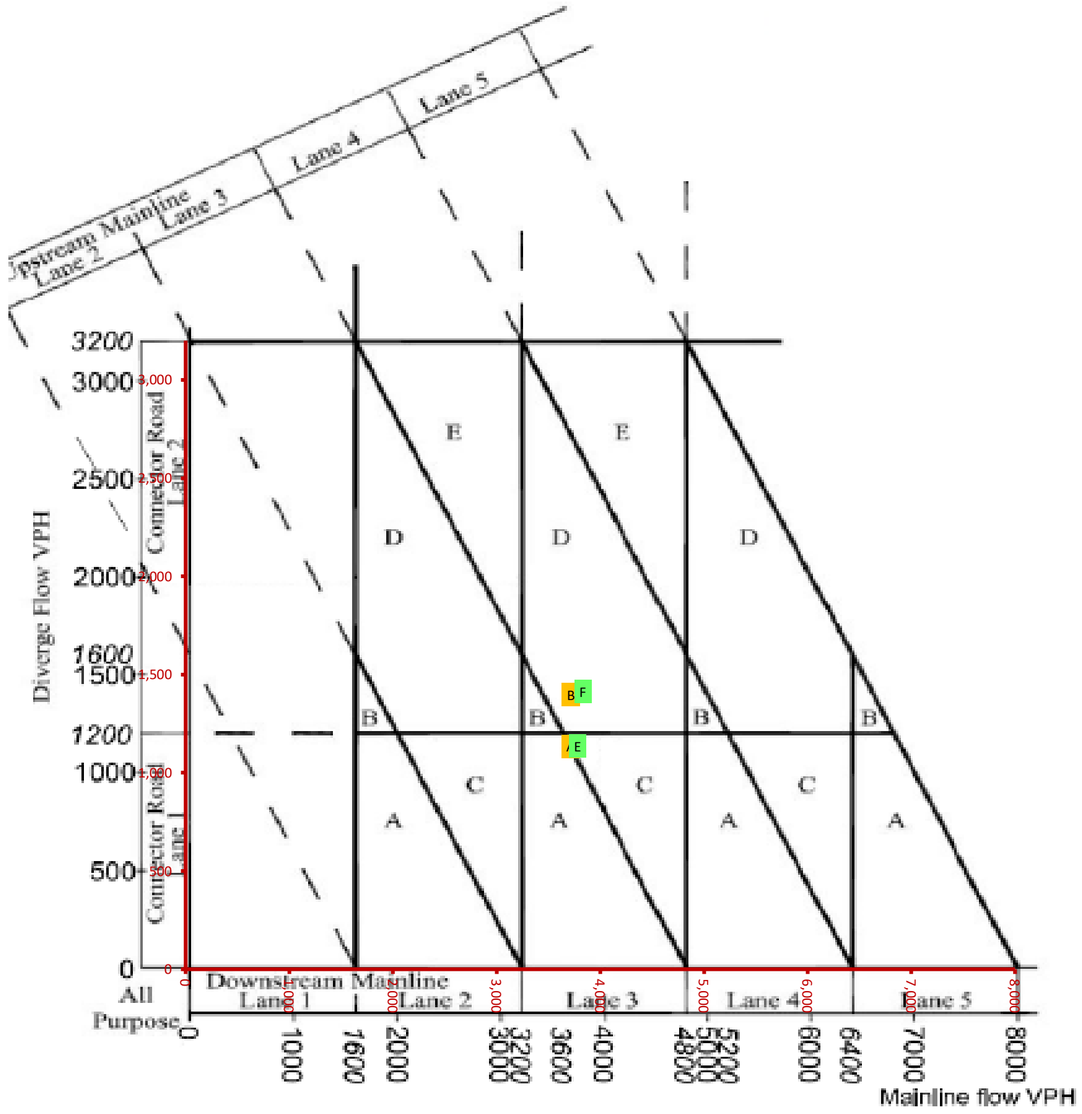
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	3,715	1,135	3,715	1.00	1,135	1.00
B	Ref no LTC PM	3,716	1,398	3,716	1.00	1,398	1.00
C	Ref with LTC AM			3,931	1.00	1,284	1.00
D	Ref with LTC PM			3,794	1.00	1,547	1.00
E	LP Scenario no LTC AM	3,781	1,137	3,781	1.00	1,137	1.00
F	LP Scenario no LTC PM	3,833	1,415	3,833	1.00	1,415	1.00
G	LP Scenario with LTC AM			4,003	1.00	1,285	1.00
H	LP Scenario with LTC PM			3,924	1.00	1,547	1.00

J2 westbound diverge - with LTC (DEMAND) SENSITIVITY ASSESSMENT



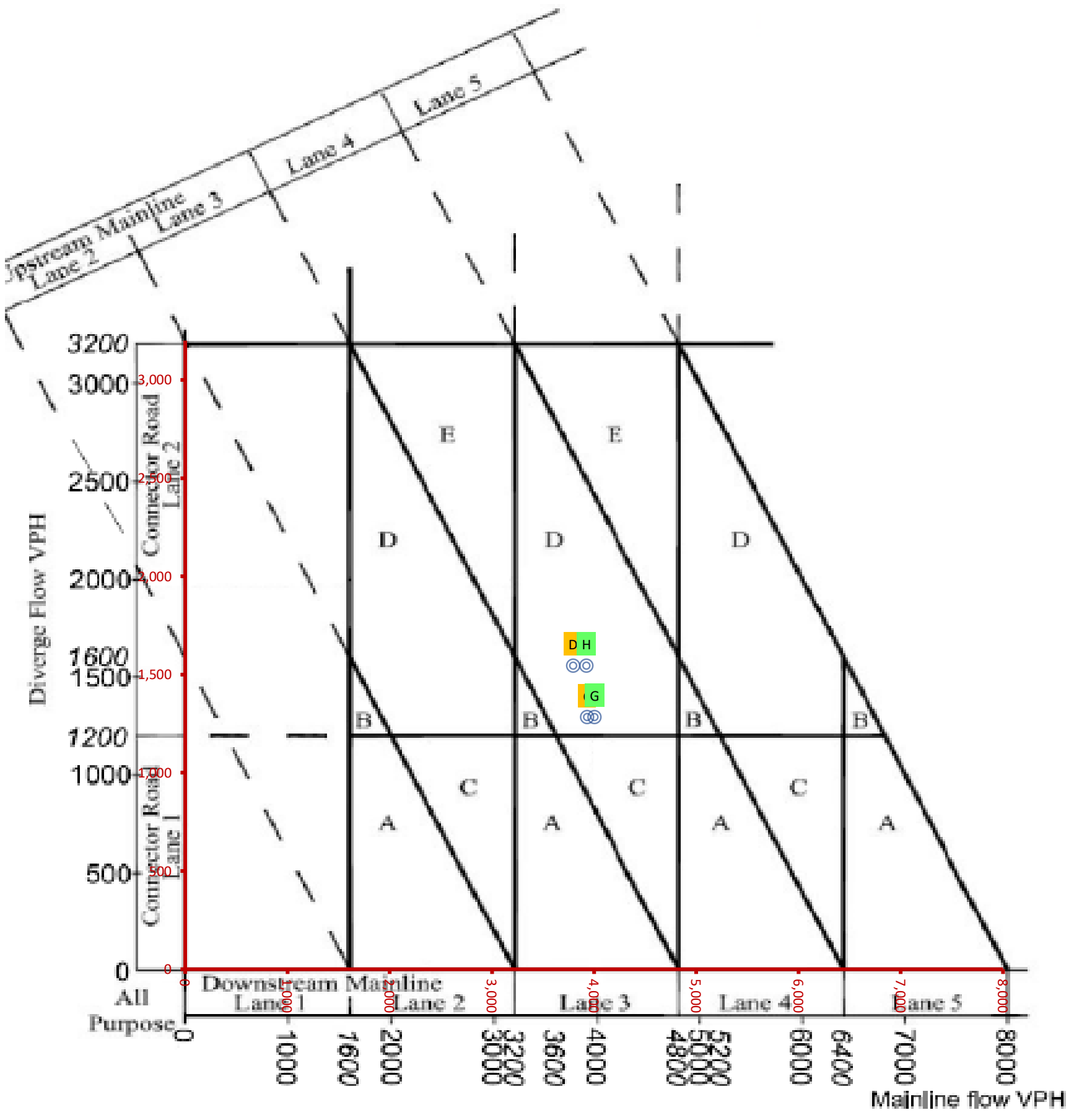
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			3,715	1.00	1,135	1.00
B	Ref no LTC PM			3,716	1.00	1,398	1.00
C	Ref with LTC AM	3,931	1,284	3,931	1.00	1,284	1.00
D	Ref with LTC PM	3,794	1,547	3,794	1.00	1,547	1.00
E	LP Scenario no LTC AM			3,781	1.00	1,137	1.00
F	LP Scenario no LTC PM			3,833	1.00	1,415	1.00
G	LP Scenario with LTC AM	4,003	1,285	4,003	1.00	1,285	1.00
H	LP Scenario with LTC PM	3,924	1,547	3,924	1.00	1,547	1.00

J2 westbound diverge - no LTC (ACTUAL)
SENSITIVITY ASSESSMENT



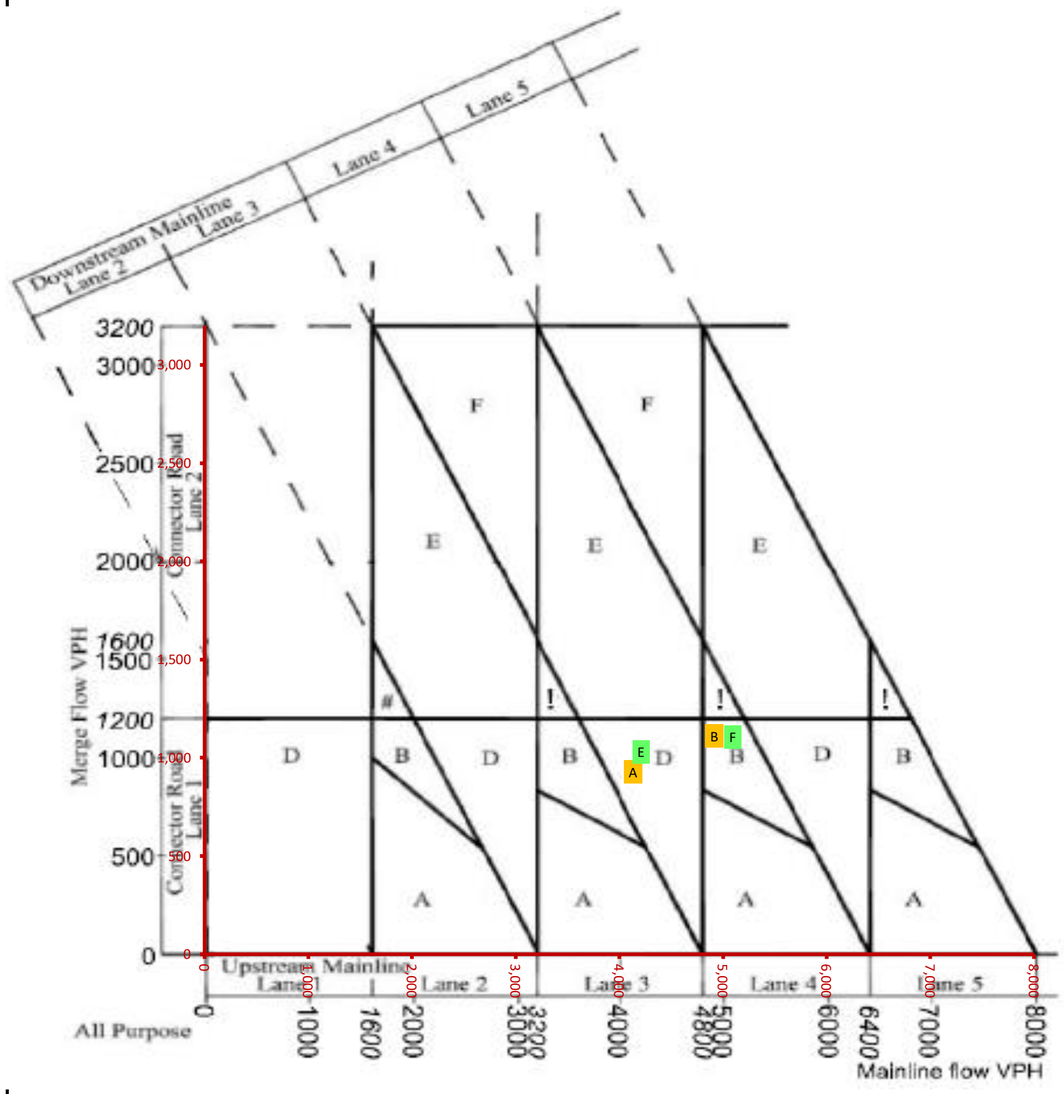
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	3,715	1,135	3,715	1.00	1,135	1.00
B	Ref no LTC PM	3,716	1,398	3,716	1.00	1,398	1.00
C	Ref with LTC AM			3,931	1.00	1,284	1.00
D	Ref with LTC PM			3,794	1.00	1,547	1.00
E	LP Scenario no LTC AM	3,781	1,137	3,781	1.00	1,137	1.00
F	LP Scenario no LTC PM	3,833	1,415	3,833	1.00	1,415	1.00
G	LP Scenario with LTC AM			4,003	1.00	1,285	1.00
H	LP Scenario with LTC PM			3,924	1.00	1,547	1.00

J2 westbound diverge - with LTC (ACTUAL)
SENSITIVITY ASSESSMENT



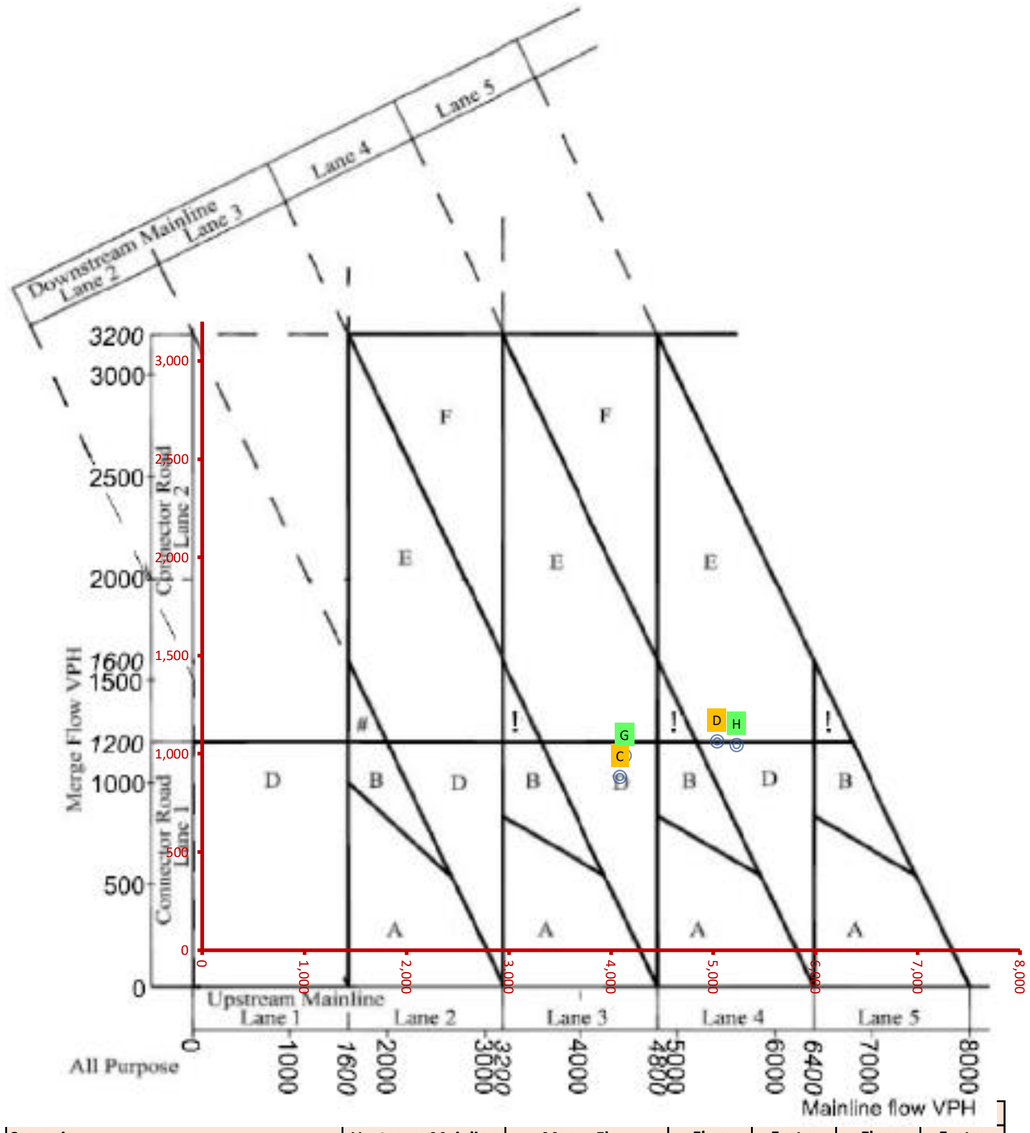
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			3,715	1.00	1,135	1.00
B	Ref no LTC PM			3,716	1.00	1,398	1.00
C	Ref with LTC AM	3,931	1,284	3,931	1.00	1,284	1.00
D	Ref with LTC PM	3,794	1,547	3,794	1.00	1,547	1.00
E	LP Scenario no LTC AM			3,781	1.00	1,137	1.00
F	LP Scenario no LTC PM			3,833	1.00	1,415	1.00
G	LP Scenario with LTC AM	4,003	1,285	4,003	1.00	1,285	1.00
H	LP Scenario with LTC PM	3,924	1,547	3,924	1.00	1,547	1.00

A2 / A2018 eastbound merge - no LTC (DEMAND) SENSITIVITY ASSESSMENT



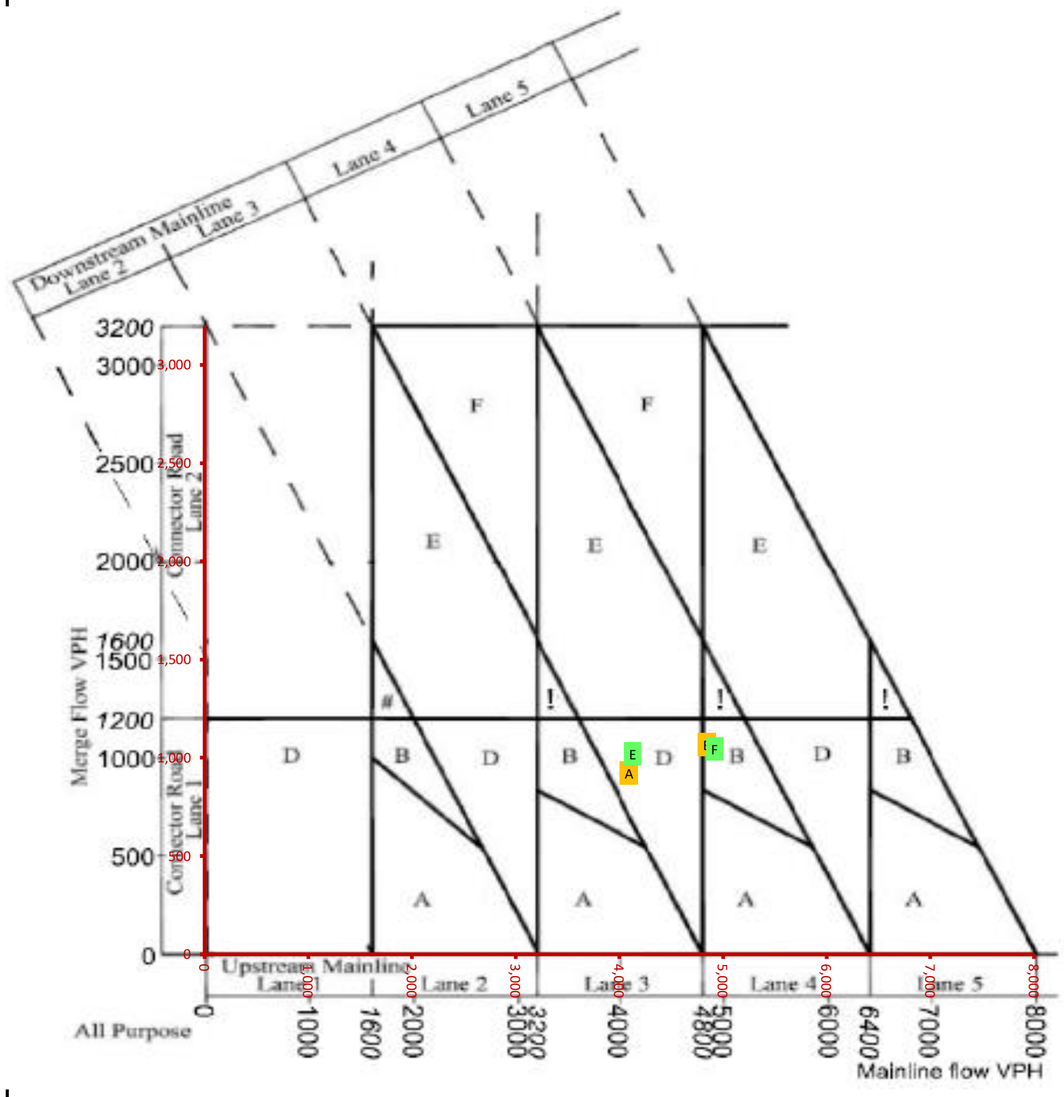
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,133	928	4,133	1.00	928	1.00
B	Ref no LTC PM	4,914	1,112	4,914	1.00	1,112	1.00
C	Ref with LTC AM			4,084	1.00	883	1.00
D	Ref with LTC PM			5,034	1.00	1,064	1.00
E	LP Scenario no LTC AM	4,209	1,031	4,209	1.00	1,031	1.00
F	LP Scenario no LTC PM	5,095	1,106	5,095	1.00	1,106	1.00
G	LP Scenario with LTC AM			4,130	1.00	990	1.00
H	LP Scenario with LTC PM			5,226	1.00	1,046	1.00

A2 / A2018 eastbound merge - with LTC (DEMAND) SENSITIVITY ASSESSMENT



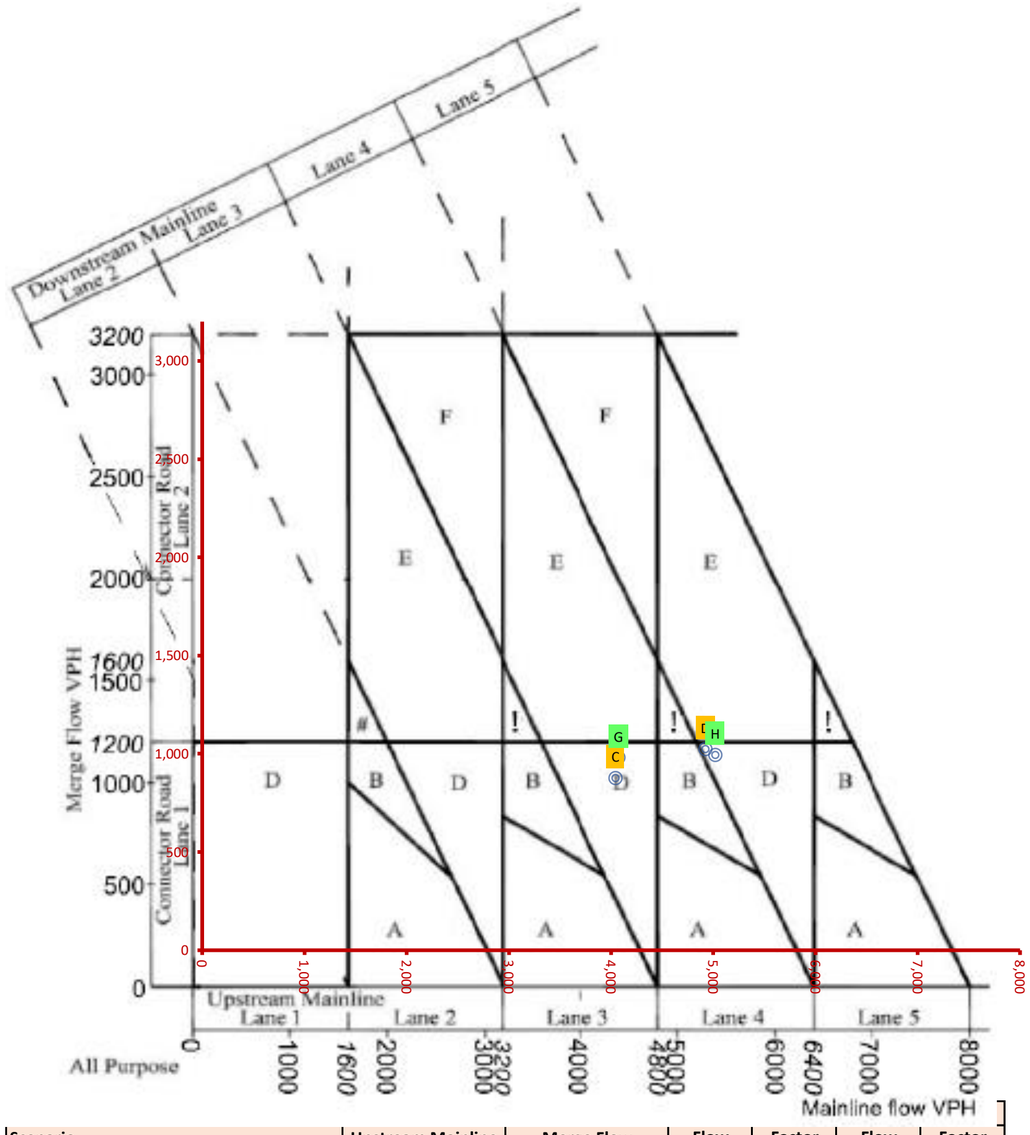
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,133	1.00	928	1.00
B	Ref no LTC PM			4,914	1.00	1,112	1.00
C	Ref with LTC AM	4,084	883	4,084	1.00	883	1.00
D	Ref with LTC PM	5,034	1,064	5,034	1.00	1,064	1.00
E	LP Scenario no LTC AM			4,209	1.00	1,031	1.00
F	LP Scenario no LTC PM			5,095	1.00	1,106	1.00
G	LP Scenario with LTC AM	4,130	990	4,130	1.00	990	1.00
H	LP Scenario with LTC PM	5,226	1,046	5,226	1.00	1,046	1.00

A2 / A2018 eastbound merge - no LTC (ACTUAL)
SENSITIVITY ASSESSMENT



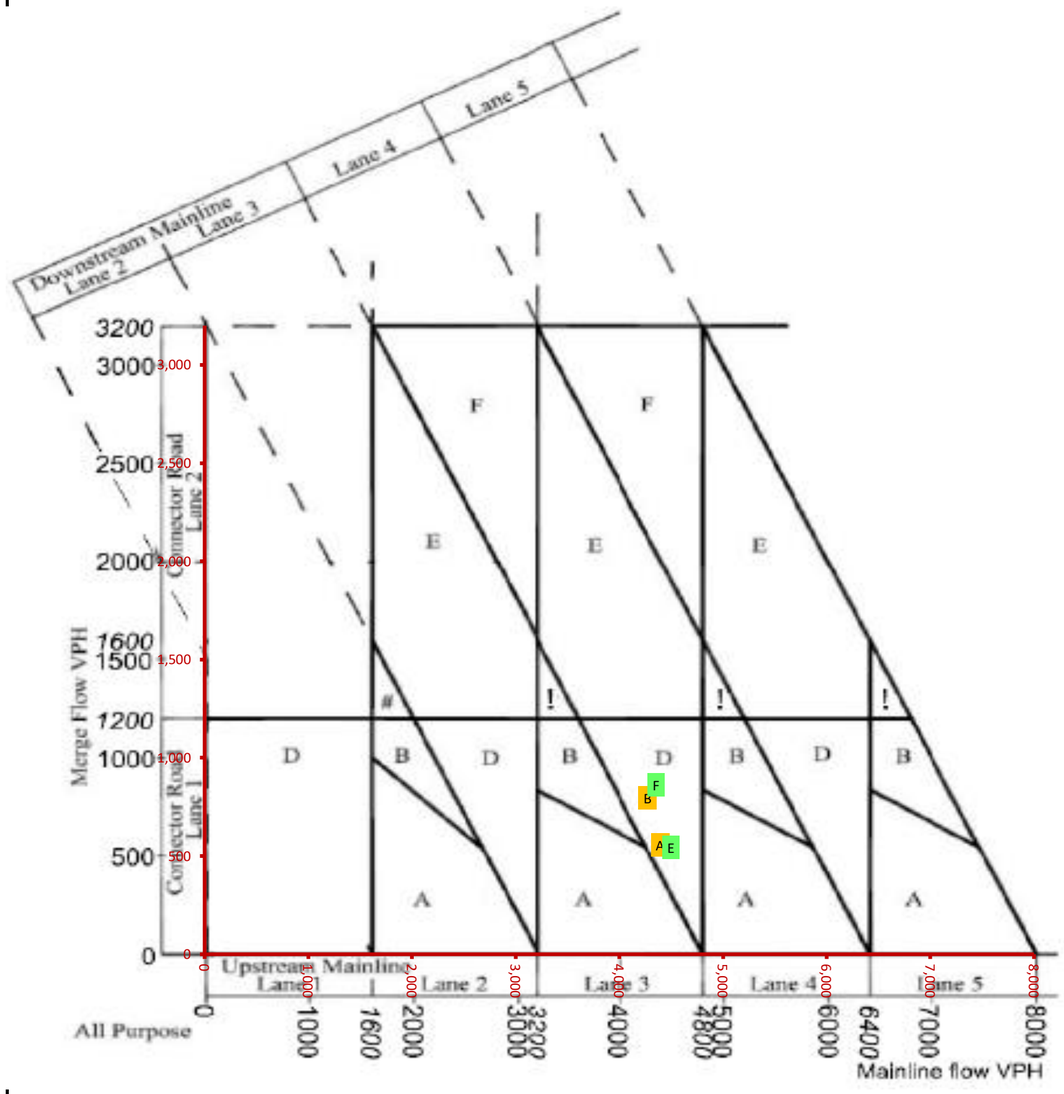
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,093	922	4,093	1.00	922	1.00
B	Ref no LTC PM	4,845	1,066	4,845	1.00	1,066	1.00
C	Ref with LTC AM			4,040	1.00	878	1.00
D	Ref with LTC PM			4,921	1.00	1,025	1.00
E	LP Scenario no LTC AM	4,129	1,020	4,129	1.00	1,020	1.00
F	LP Scenario no LTC PM	4,919	1,045	4,919	1.00	1,045	1.00
G	LP Scenario with LTC AM			4,070	1.00	981	1.00
H	LP Scenario with LTC PM			5,017	1.00	996	1.00

A2 / A2018 eastbound merge - with LTC (ACTUAL)
SENSITIVITY ASSESSMENT



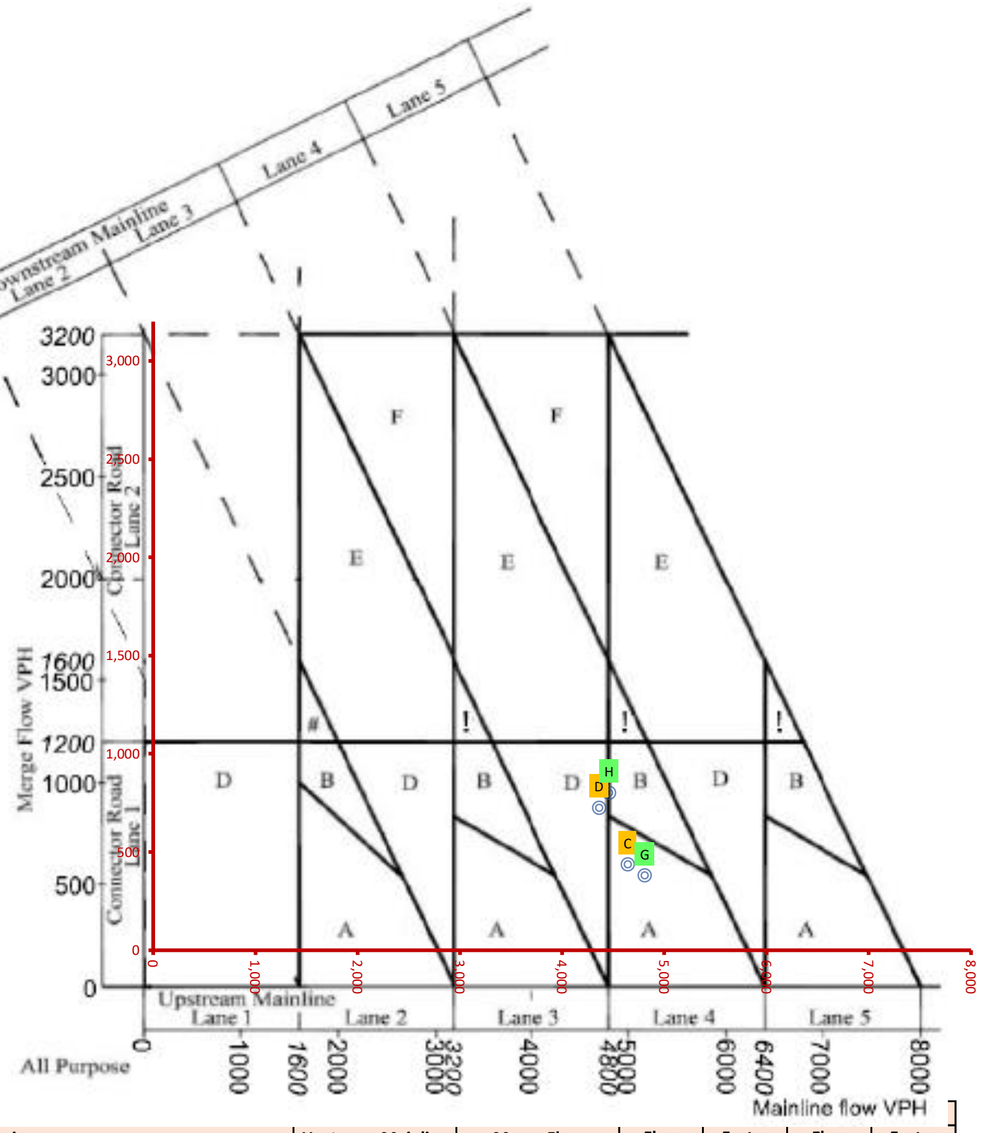
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,093	1.00	922	1.00
B	Ref no LTC PM			4,845	1.00	1,066	1.00
C	Ref with LTC AM	4,040	878	4,040	1.00	878	1.00
D	Ref with LTC PM	4,921	1,025	4,921	1.00	1,025	1.00
E	LP Scenario no LTC AM			4,129	1.00	1,020	1.00
F	LP Scenario no LTC PM			4,919	1.00	1,045	1.00
G	LP Scenario with LTC AM	4,070	981	4,070	1.00	981	1.00
H	LP Scenario with LTC PM	5,017	996	5,017	1.00	996	1.00

A2 / A2018 westbound merge - no LTC (DEMAND) SENSITIVITY ASSESSMENT



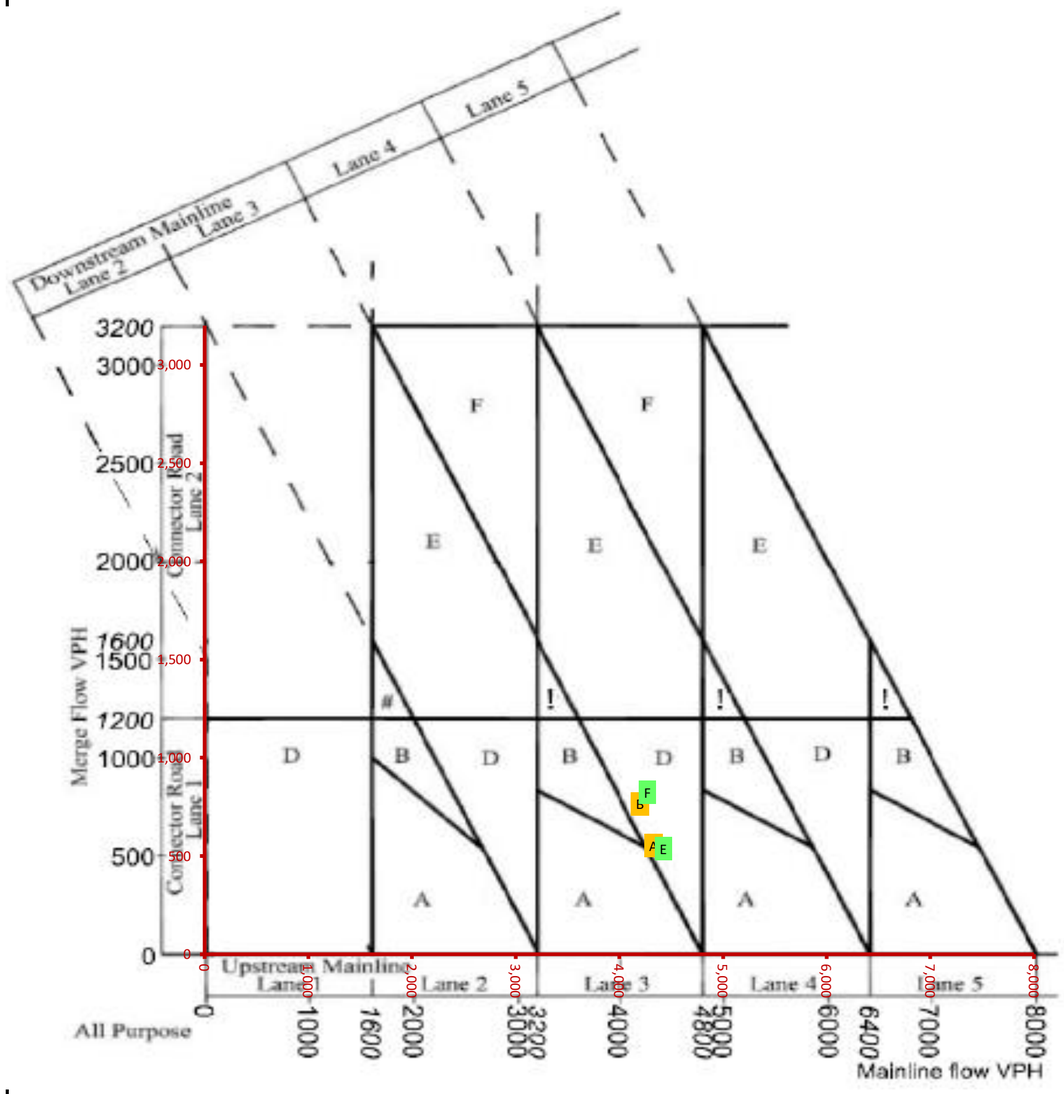
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,393	556	4,393	1.00	556	1.00
B	Ref no LTC PM	4,272	797	4,272	1.00	797	1.00
C	Ref with LTC AM			4,640	1.00	438	1.00
D	Ref with LTC PM			4,360	1.00	727	1.00
E	LP Scenario no LTC AM	4,498	543	4,498	1.00	543	1.00
F	LP Scenario no LTC PM	4,355	862	4,355	1.00	862	1.00
G	LP Scenario with LTC AM			4,807	1.00	382	1.00
H	LP Scenario with LTC PM			4,457	1.00	802	1.00

A2 / A2018 westbound merge - with LTC (DEMAND) SENSITIVITY ASSESSMENT



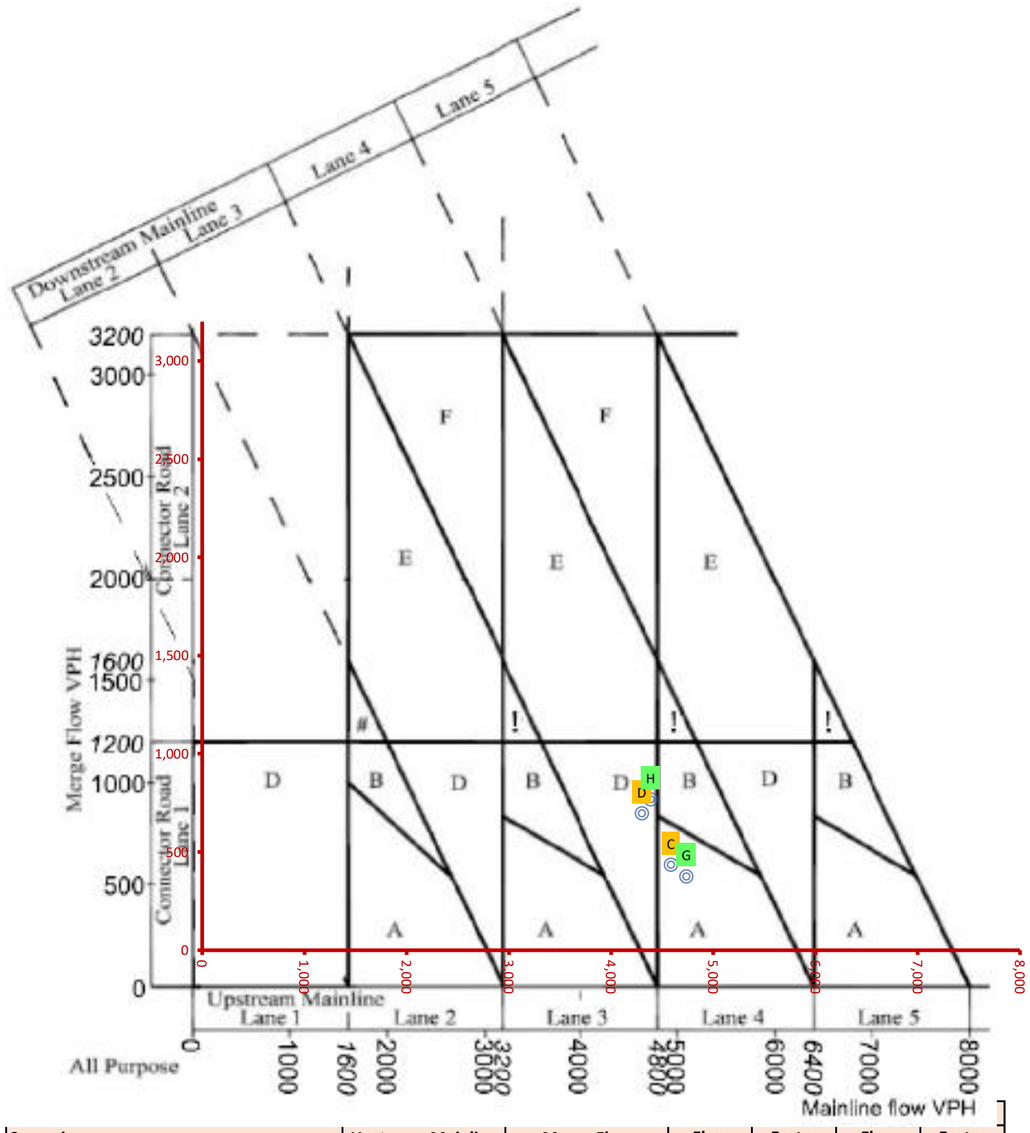
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,393	1.00	556	1.00
B	Ref no LTC PM			4,272	1.00	797	1.00
C	Ref with LTC AM	4,640	438	4,640	1.00	438	1.00
D	Ref with LTC PM	4,360	727	4,360	1.00	727	1.00
E	LP Scenario no LTC AM			4,498	1.00	543	1.00
F	LP Scenario no LTC PM			4,355	1.00	862	1.00
G	LP Scenario with LTC AM	4,807	382	4,807	1.00	382	1.00
H	LP Scenario with LTC PM	4,457	802	4,457	1.00	802	1.00

A2 / A2018 westbound merge - no LTC (ACTUAL)
SENSITIVITY ASSESSMENT



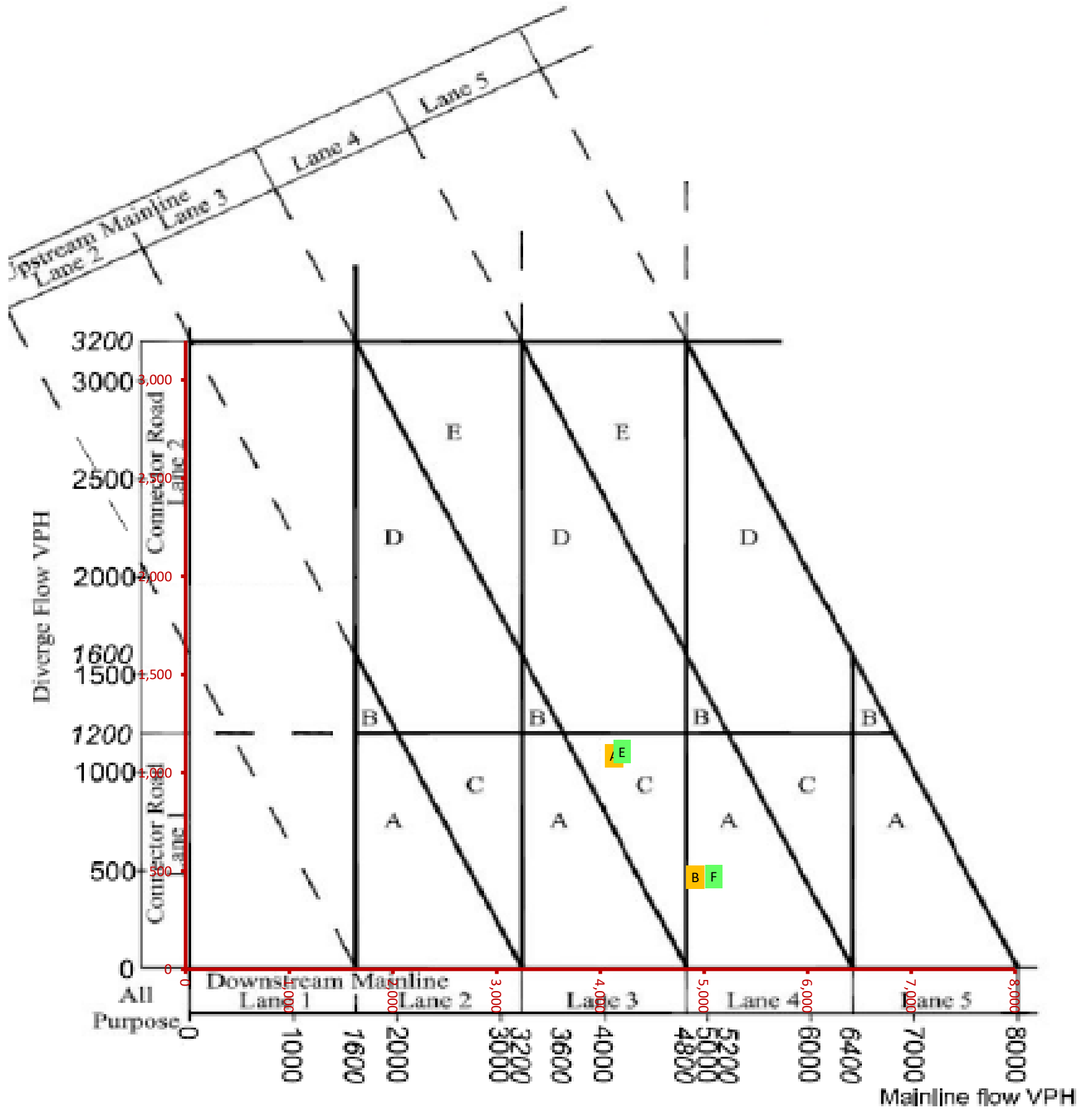
		Factored Flows		Mainline		Merge / Diverge	
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,330	552	4,330	1.00	552	1.00
B	Ref no LTC PM	4,199	766	4,199	1.00	766	1.00
C	Ref with LTC AM			4,582	1.00	436	1.00
D	Ref with LTC PM			4,298	1.00	697	1.00
E	LP Scenario no LTC AM	4,424	538	4,424	1.00	538	1.00
F	LP Scenario no LTC PM	4,273	825	4,273	1.00	825	1.00
G	LP Scenario with LTC AM			4,734	1.00	377	1.00
H	LP Scenario with LTC PM			4,385	1.00	768	1.00

A2 / A2018 westbound merge - with LTC (ACTUAL)
SENSITIVITY ASSESSMENT



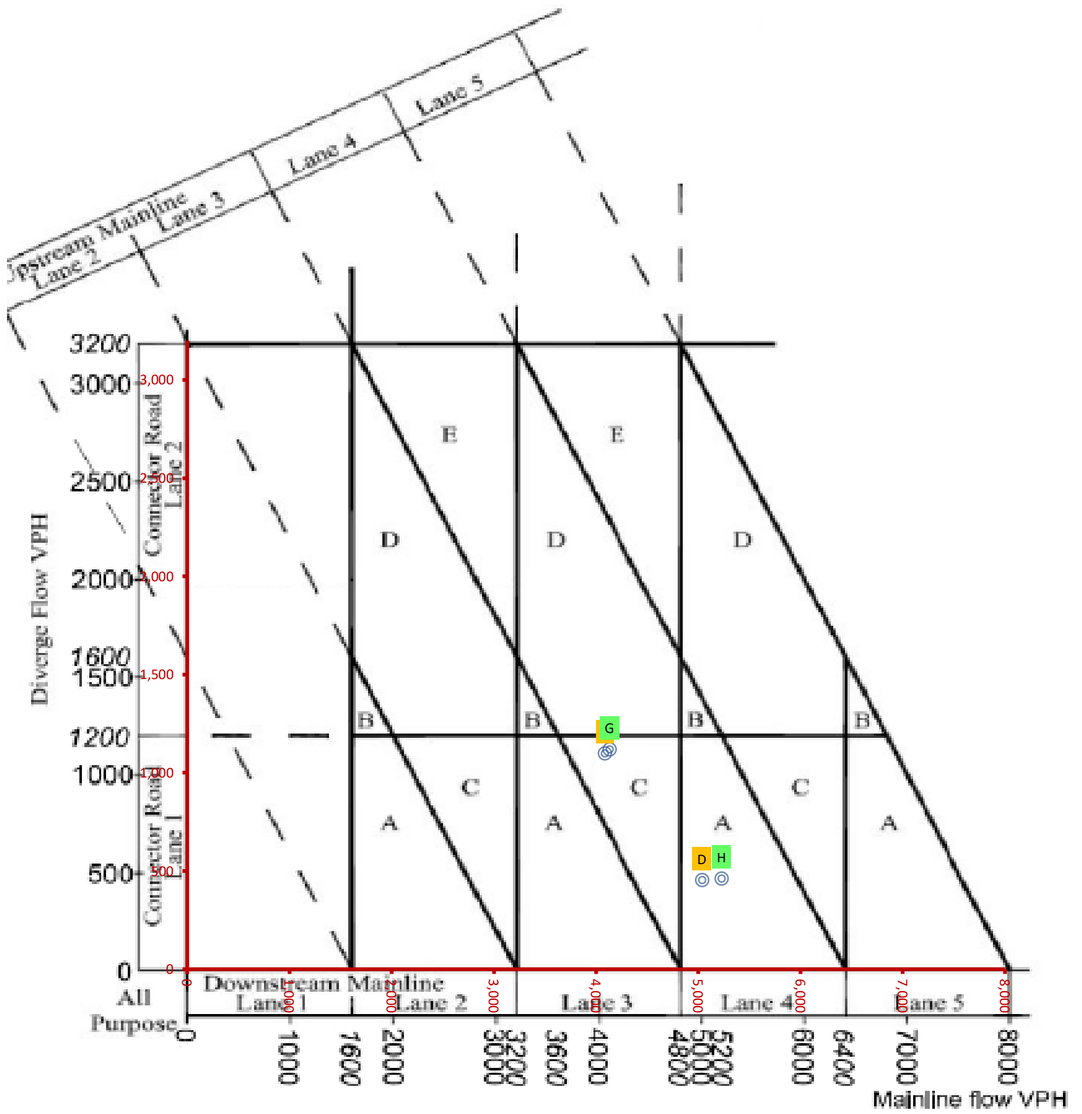
Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,330	1.00	552	1.00
B	Ref no LTC PM			4,199	1.00	766	1.00
C	Ref with LTC AM	4,582	436	4,582	1.00	436	1.00
D	Ref with LTC PM	4,298	697	4,298	1.00	697	1.00
E	LP Scenario no LTC AM			4,424	1.00	538	1.00
F	LP Scenario no LTC PM			4,273	1.00	825	1.00
G	LP Scenario with LTC AM	4,734	377	4,734	1.00	377	1.00
H	LP Scenario with LTC PM	4,385	768	4,385	1.00	768	1.00

A2 / A2018 eastbound diverge - no LTC (DEMAND) SENSITIVITY ASSESSMENT



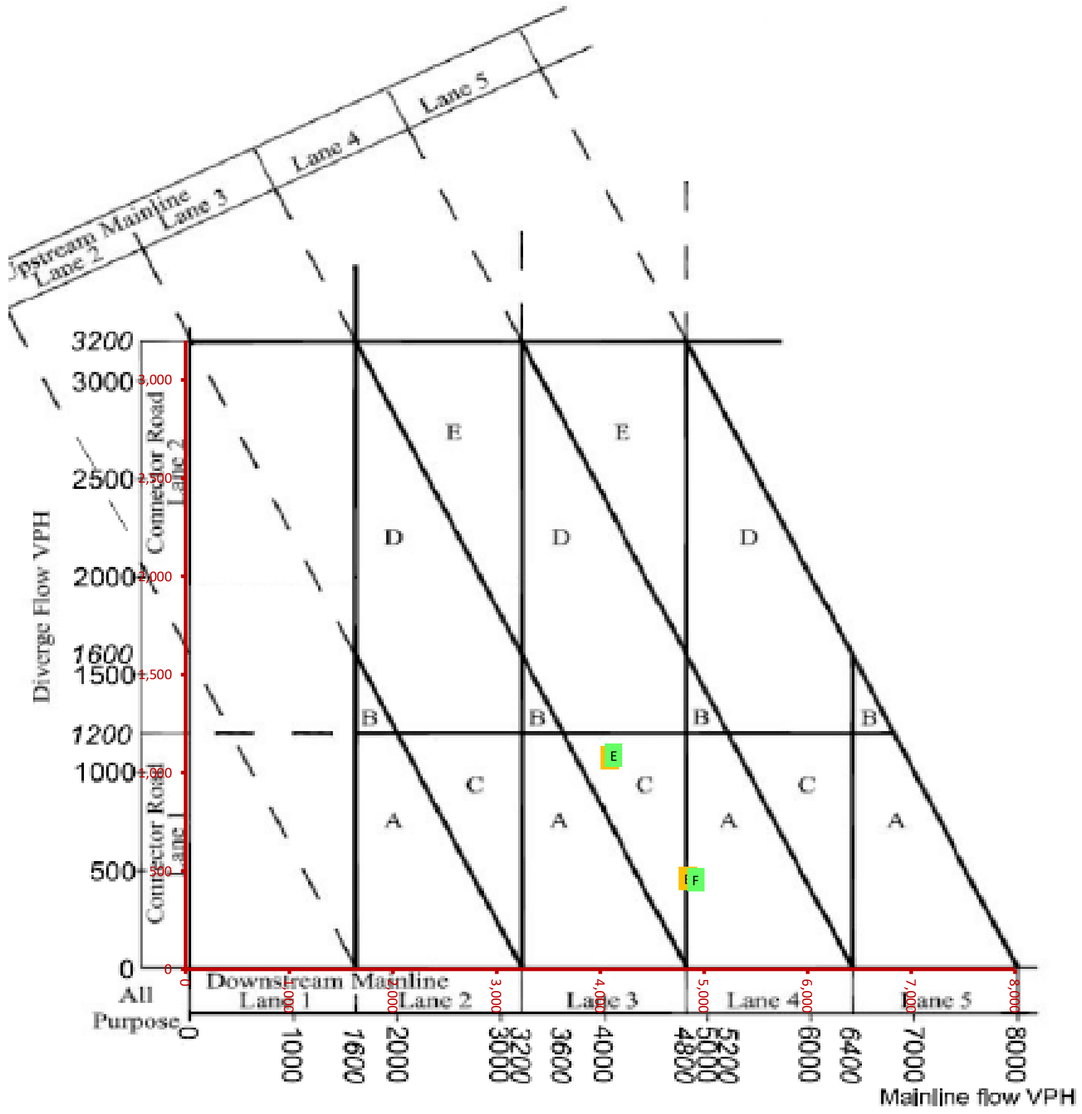
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,133	1,087	4,133	1.00	1,087	1.00
B	Ref no LTC PM	4,914	470	4,914	1.00	470	1.00
C	Ref with LTC AM			4,084	1.00	1,100	1.00
D	Ref with LTC PM			5,034	1.00	454	1.00
E	LP Scenario no LTC AM	4,209	1,110	4,209	1.00	1,110	1.00
F	LP Scenario no LTC PM	5,095	473	5,095	1.00	473	1.00
G	LP Scenario with LTC AM			4,130	1.00	1,120	1.00
H	LP Scenario with LTC PM			5,226	1.00	463	1.00

A2 / A2018 eastbound diverge - with LTC (DEMAND) SENSITIVITY ASSESSMENT



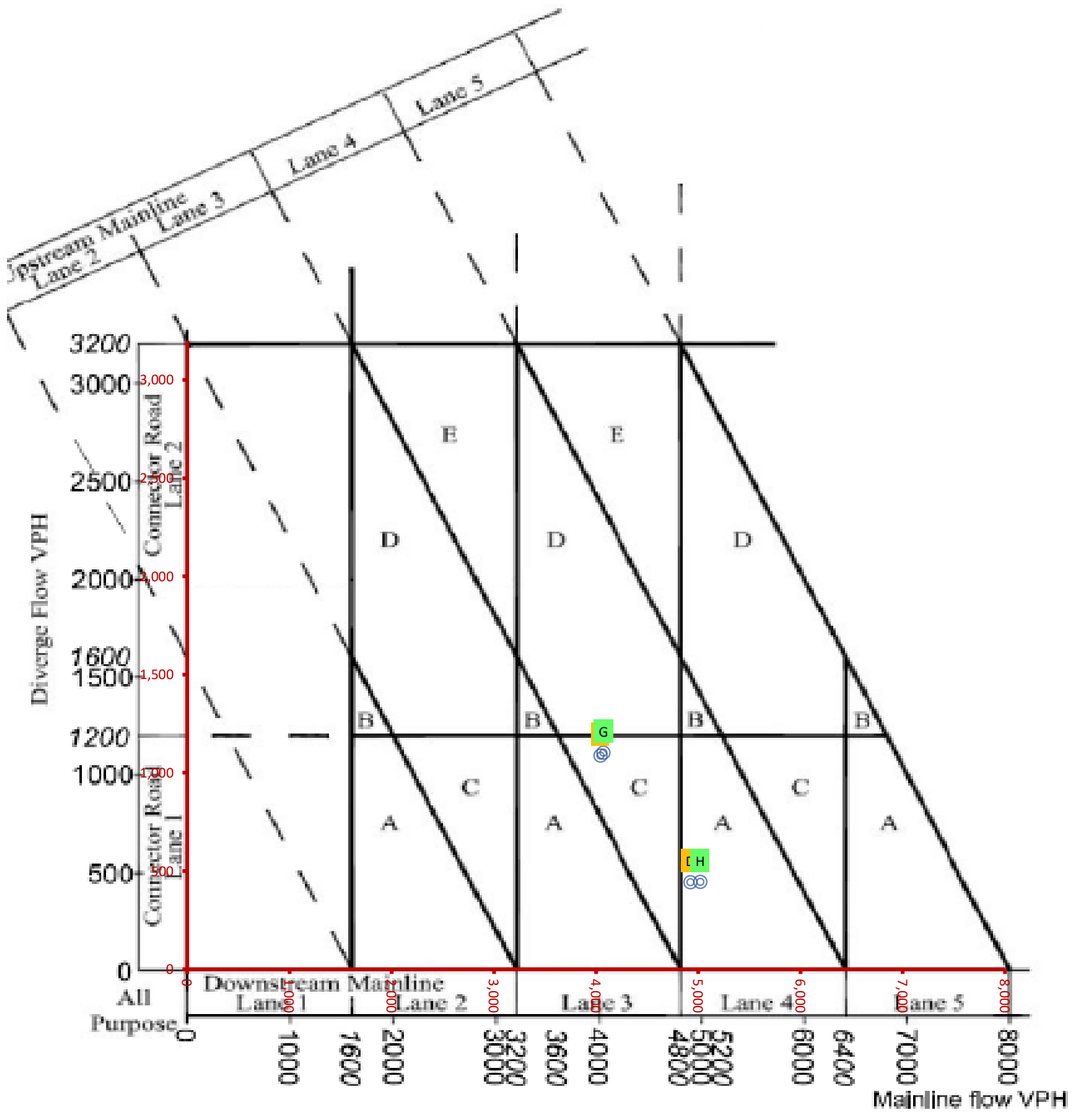
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,133	1.00	1,087	1.00
B	Ref no LTC PM			4,914	1.00	470	1.00
C	Ref with LTC AM	4,084	1,100	4,084	1.00	1,100	1.00
D	Ref with LTC PM	5,034	454	5,034	1.00	454	1.00
E	LP Scenario no LTC AM			4,209	1.00	1,110	1.00
F	LP Scenario no LTC PM			5,095	1.00	473	1.00
G	LP Scenario with LTC AM	4,130	1,120	4,130	1.00	1,120	1.00
H	LP Scenario with LTC PM	5,226	463	5,226	1.00	463	1.00

A2 / A2018 eastbound diverge - no LTC (ACTUAL)
SENSITIVITY ASSESSMENT



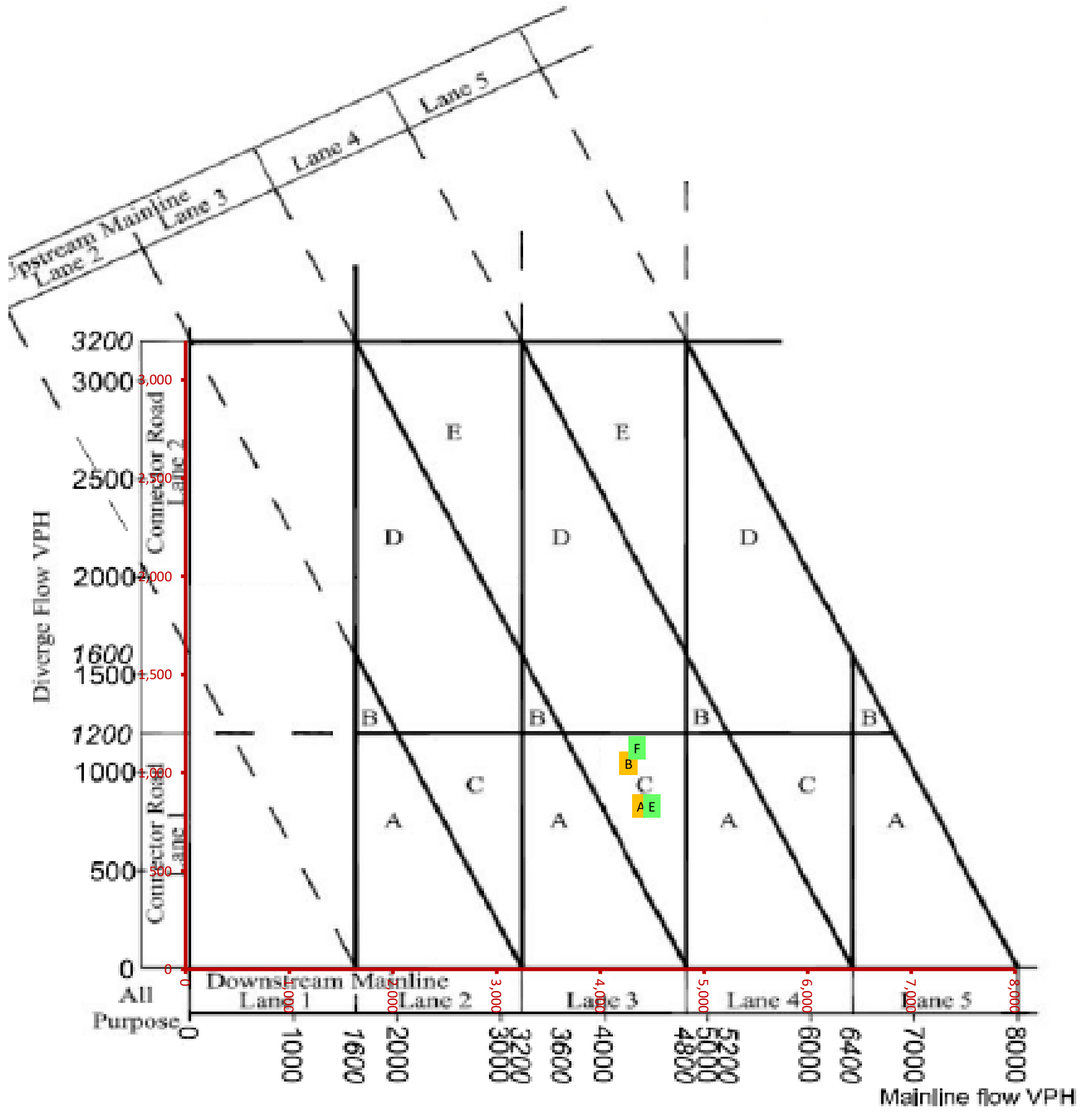
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,093	1,077	4,093	1.00	1,077	1.00
B	Ref no LTC PM	4,845	463	4,845	1.00	463	1.00
C	Ref with LTC AM			4,040	1.00	1,088	1.00
D	Ref with LTC PM			4,921	1.00	444	1.00
E	LP Scenario no LTC AM	4,129	1,088	4,129	1.00	1,088	1.00
F	LP Scenario no LTC PM	4,919	457	4,919	1.00	457	1.00
G	LP Scenario with LTC AM			4,070	1.00	1,104	1.00
H	LP Scenario with LTC PM			5,017	1.00	445	1.00

A2 / A2018 eastbound diverge - with LTC (ACTUAL)
SENSITIVITY ASSESSMENT



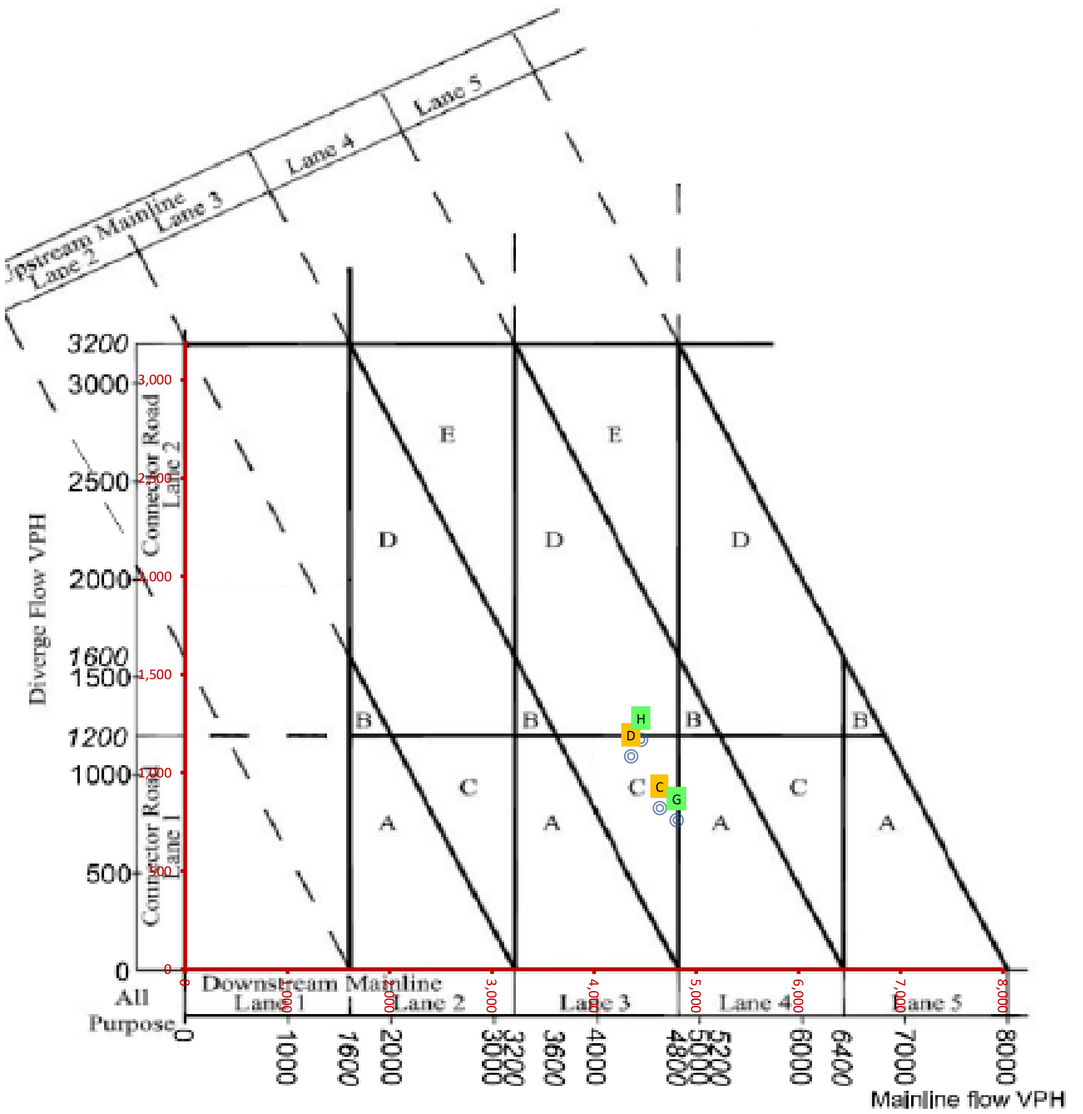
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,093	1.00	1,077	1.00
B	Ref no LTC PM			4,845	1.00	463	1.00
C	Ref with LTC AM	4,040	1,088	4,040	1.00	1,088	1.00
D	Ref with LTC PM	4,921	444	4,921	1.00	444	1.00
E	LP Scenario no LTC AM			4,129	1.00	1,088	1.00
F	LP Scenario no LTC PM			4,919	1.00	457	1.00
G	LP Scenario with LTC AM	4,070	1,104	4,070	1.00	1,104	1.00
H	LP Scenario with LTC PM	5,017	445	5,017	1.00	445	1.00

A2 / A2018 westbound diverge - no LTC (DEMAND) SENSITIVITY ASSESSMENT



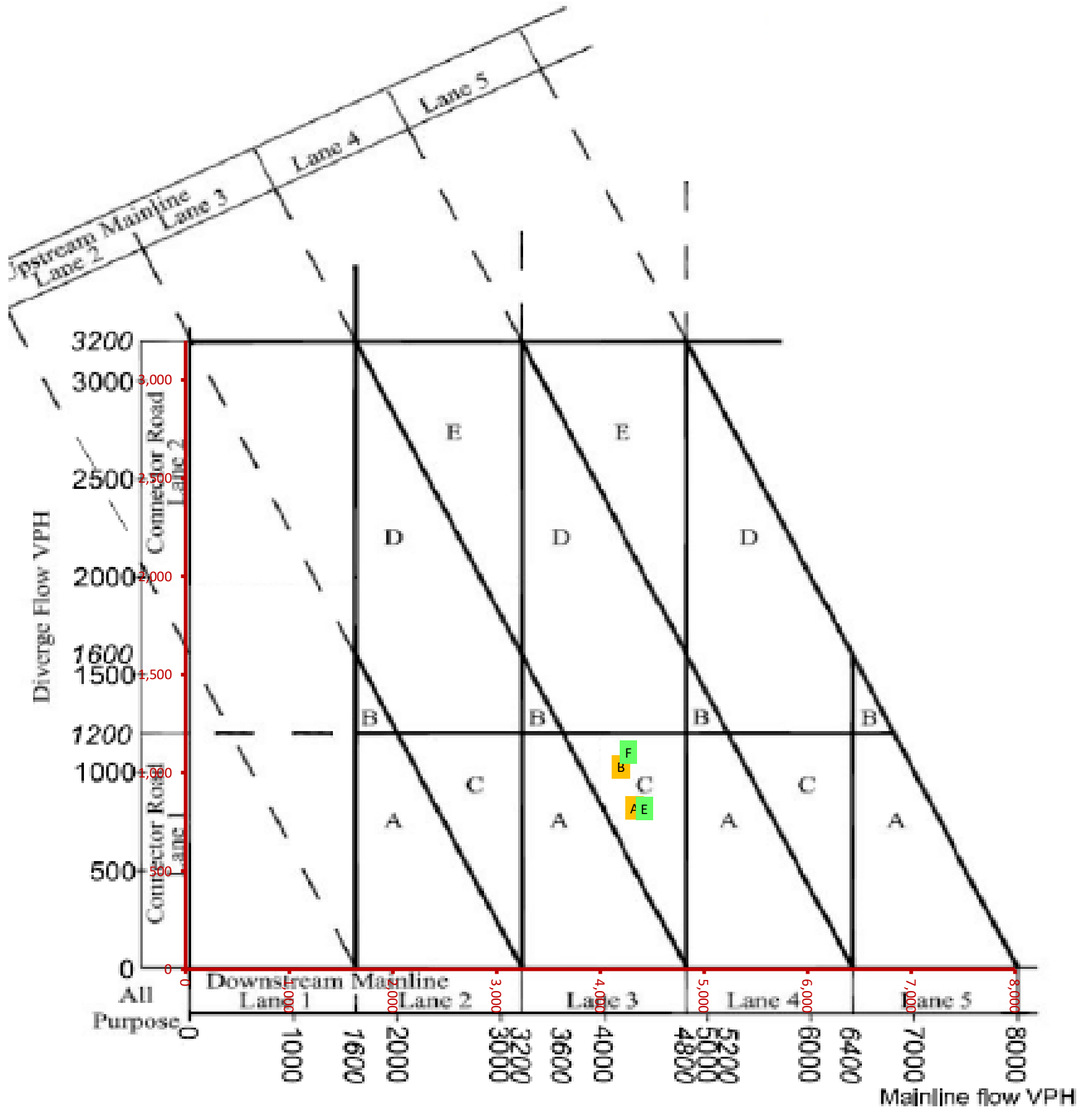
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,393	832	4,393	1.00	832	1.00
B	Ref no LTC PM	4,272	1,049	4,272	1.00	1,049	1.00
C	Ref with LTC AM			4,640	1.00	821	1.00
D	Ref with LTC PM			4,360	1.00	1,085	1.00
E	LP Scenario no LTC AM	4,498	831	4,498	1.00	831	1.00
F	LP Scenario no LTC PM	4,355	1,127	4,355	1.00	1,127	1.00
G	LP Scenario with LTC AM			4,807	1.00	759	1.00
H	LP Scenario with LTC PM			4,457	1.00	1,168	1.00

A2 / A2018 westbound diverge - with LTC (DEMAND) SENSITIVITY ASSESSMENT



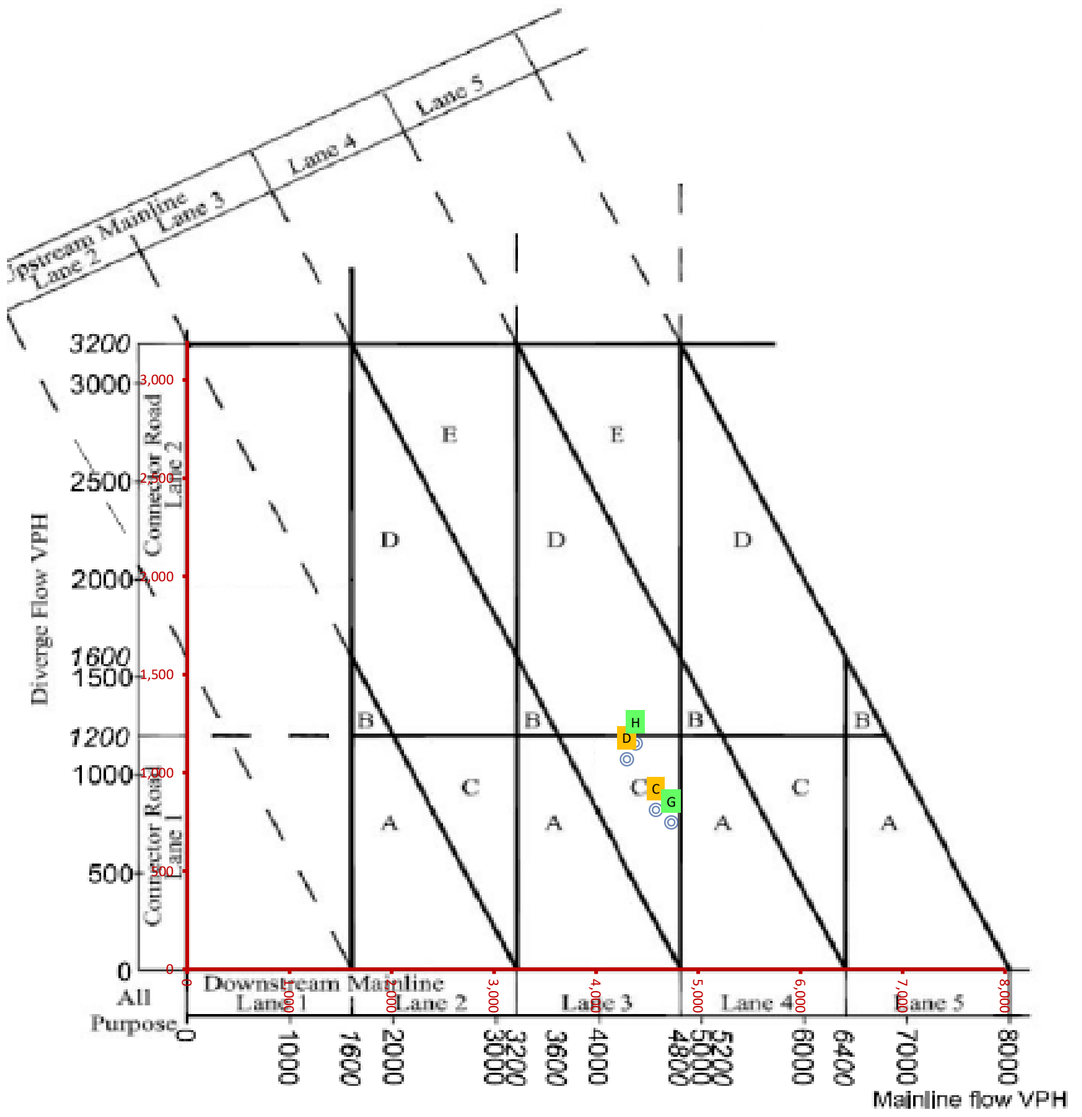
Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,393	1.00	832	1.00
B	Ref no LTC PM			4,272	1.00	1,049	1.00
C	Ref with LTC AM	4,640	821	4,640	1.00	821	1.00
D	Ref with LTC PM	4,360	1,085	4,360	1.00	1,085	1.00
E	LP Scenario no LTC AM			4,498	1.00	831	1.00
F	LP Scenario no LTC PM			4,355	1.00	1,127	1.00
G	LP Scenario with LTC AM	4,807	759	4,807	1.00	759	1.00
H	LP Scenario with LTC PM	4,457	1,168	4,457	1.00	1,168	1.00

A2 / A2018 westbound diverge - no LTC (ACTUAL)
SENSITIVITY ASSESSMENT



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,330	820	4,330	1.00	820	1.00
B	Ref no LTC PM	4,199	1,031	4,199	1.00	1,031	1.00
C	Ref with LTC AM			4,582	1.00	811	1.00
D	Ref with LTC PM			4,298	1.00	1,070	1.00
E	LP Scenario no LTC AM	4,424	818	4,424	1.00	818	1.00
F	LP Scenario no LTC PM	4,273	1,105	4,273	1.00	1,105	1.00
G	LP Scenario with LTC AM			4,734	1.00	748	1.00
H	LP Scenario with LTC PM			4,385	1.00	1,149	1.00

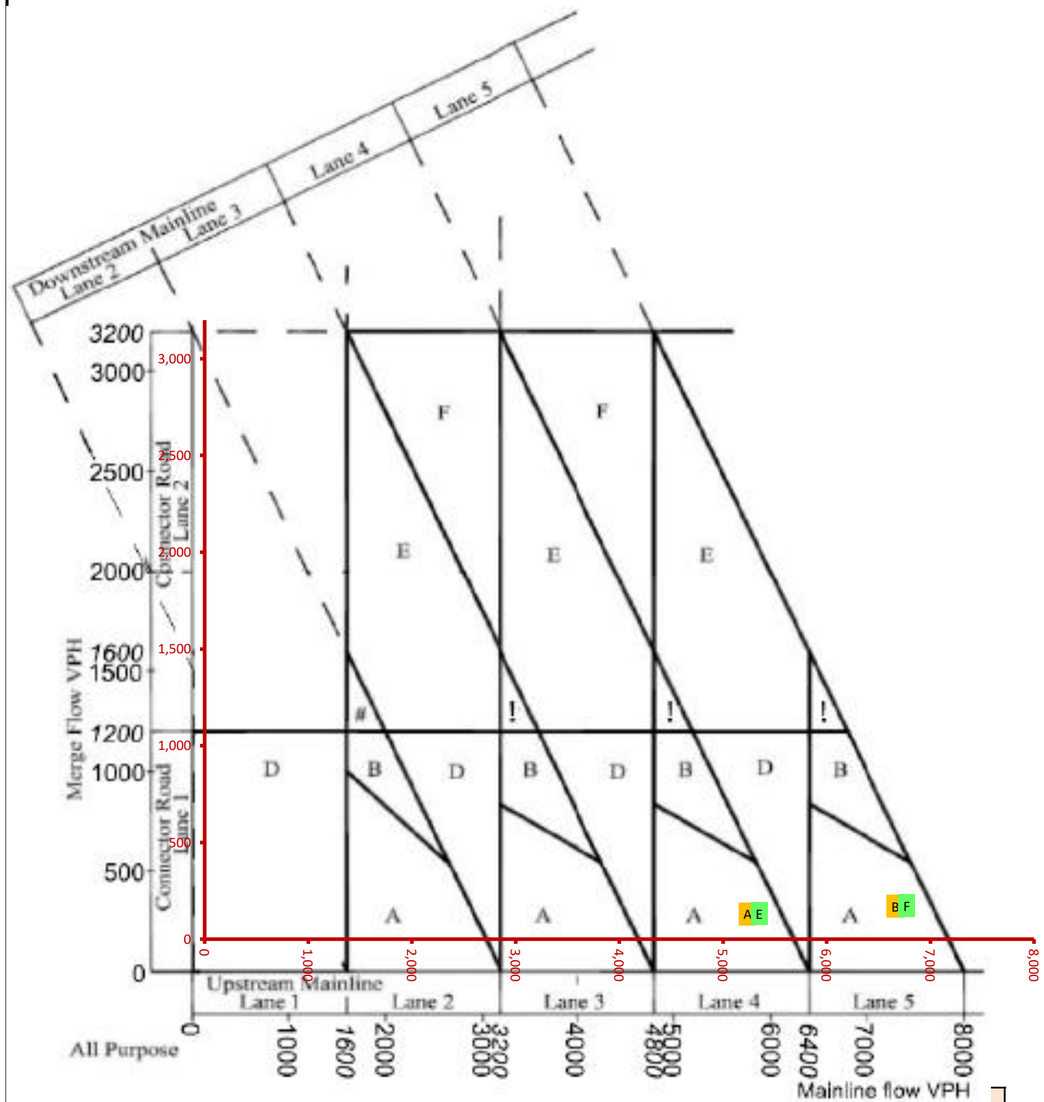
A2 / A2018 westbound diverge - with LTC (ACTUAL)
SENSITIVITY ASSESSMENT



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,330	1.00	820	1.00
B	Ref no LTC PM			4,199	1.00	1,031	1.00
C	Ref with LTC AM	4,582	811	4,582	1.00	811	1.00
D	Ref with LTC PM	4,298	1,070	4,298	1.00	1,070	1.00
E	LP Scenario no LTC AM			4,424	1.00	818	1.00
F	LP Scenario no LTC PM			4,273	1.00	1,105	1.00
G	LP Scenario with LTC AM	4,734	748	4,734	1.00	748	1.00
H	LP Scenario with LTC PM	4,385	1,149	4,385	1.00	1,149	1.00

SENSITIVITY ASSESSMENT

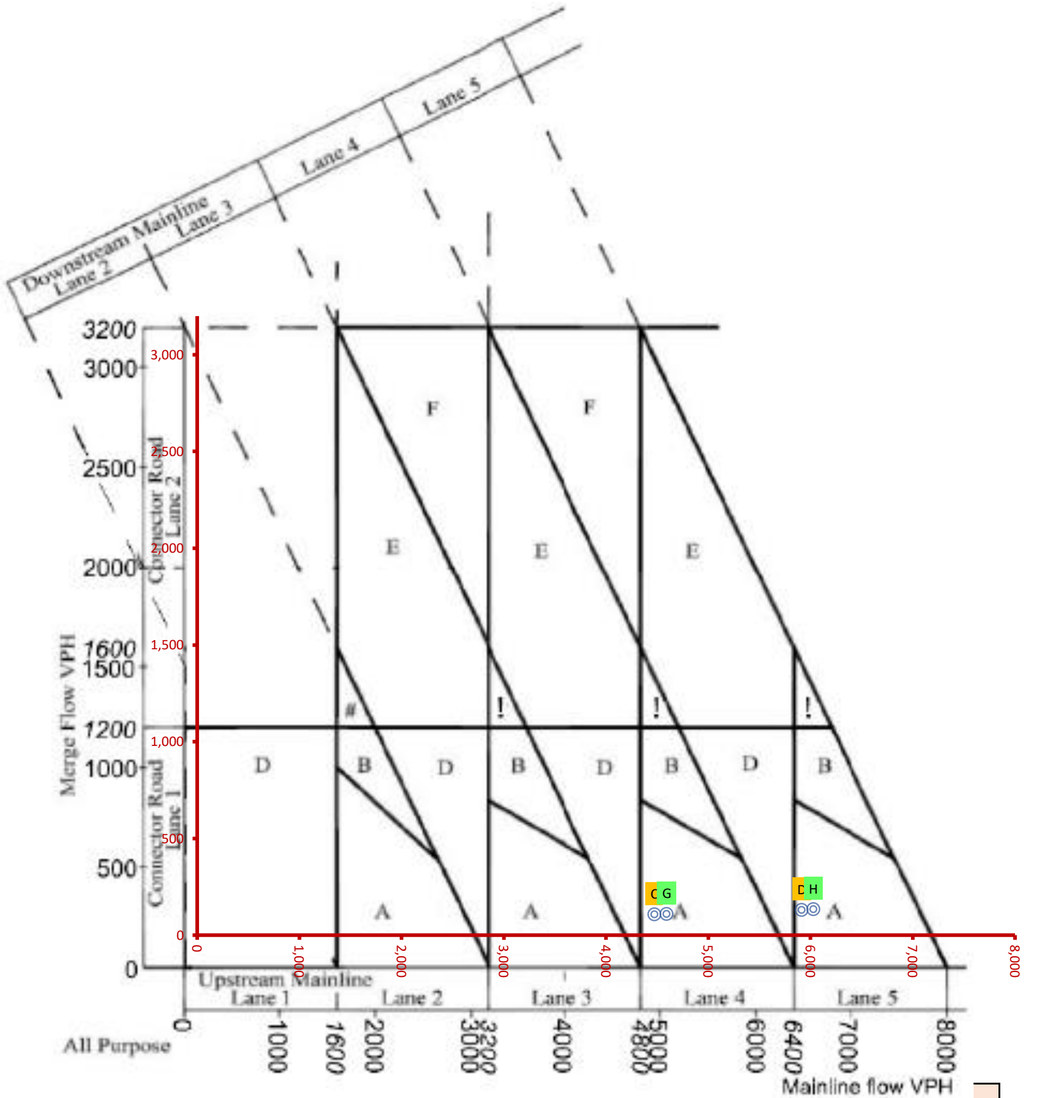
A2 Bean eastbound merge - no LTC (DEMAND)



Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,237	131	5,237	1.00	109	1.20
B	Ref no LTC PM	6,664	170	6,664	1.00	148	1.15
C	Ref with LTC AM			4,470	1.00	93	1.15
D	Ref with LTC PM			5,912	1.00	131	1.00
E	LP Scenario no LTC AM	5,350	134	5,350	1.00	111	1.20
F	LP Scenario no LTC PM	6,772	173	6,772	1.00	150	1.15
G	LP Scenario with LTC AM			4,592	1.00	96	1.15
H	LP Scenario with LTC PM			6,025	1.00	134	1.00

SENSITIVITY ASSESSMENT

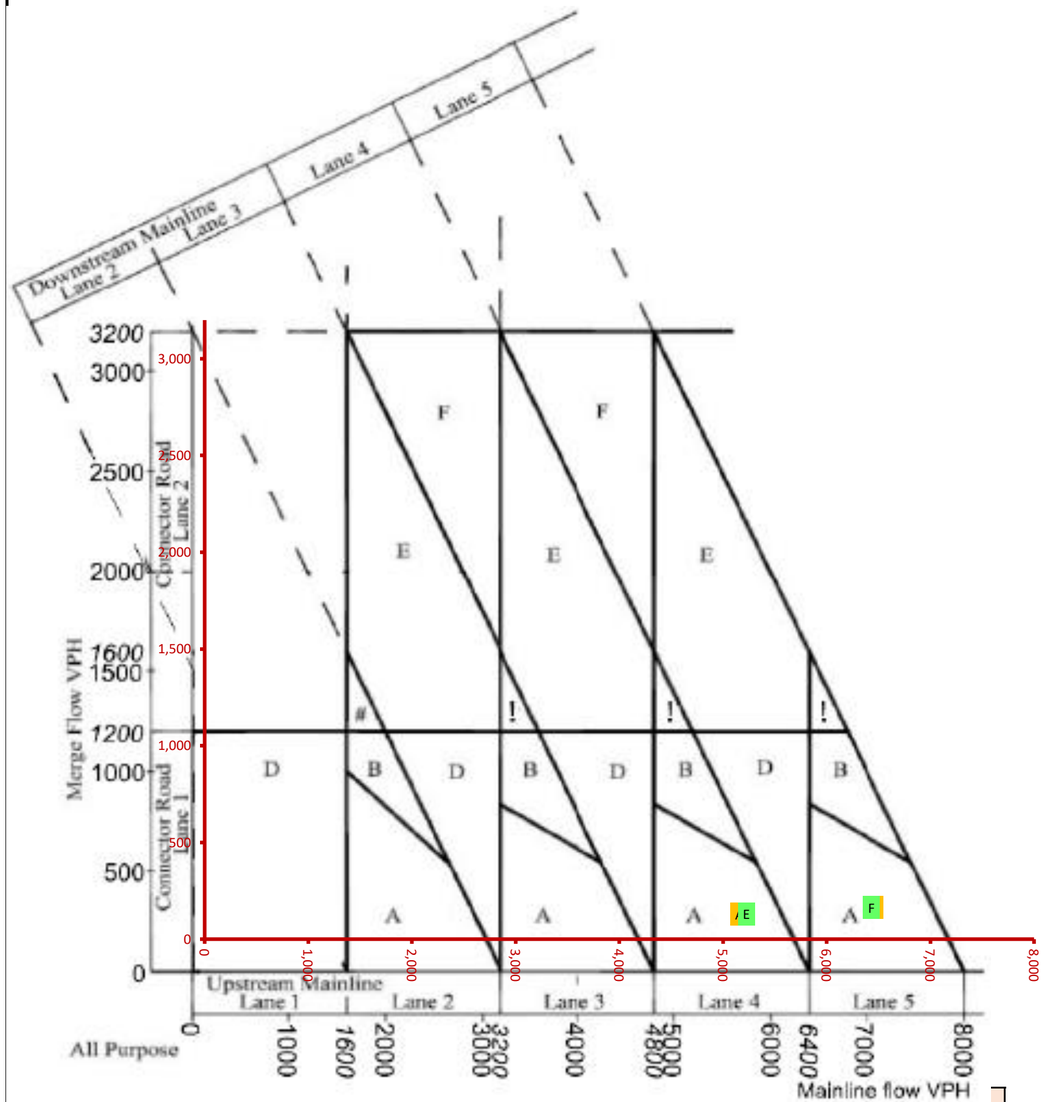
A2 Bean eastbound merge - with LTC (DEMAND)



Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,237	1.00	109	1.20
B	Ref no LTC PM			6,664	1.00	148	1.15
C	Ref with LTC AM	4,470	107	4,470	1.00	93	1.15
D	Ref with LTC PM	5,912	131	5,912	1.00	131	1.00
E	LP Scenario no LTC AM			5,350	1.00	111	1.20
F	LP Scenario no LTC PM			6,772	1.00	150	1.15
G	LP Scenario with LTC AM	4,592	110	4,592	1.00	96	1.15
H	LP Scenario with LTC PM	6,025	134	6,025	1.00	134	1.00

SENSITIVITY ASSESSMENT

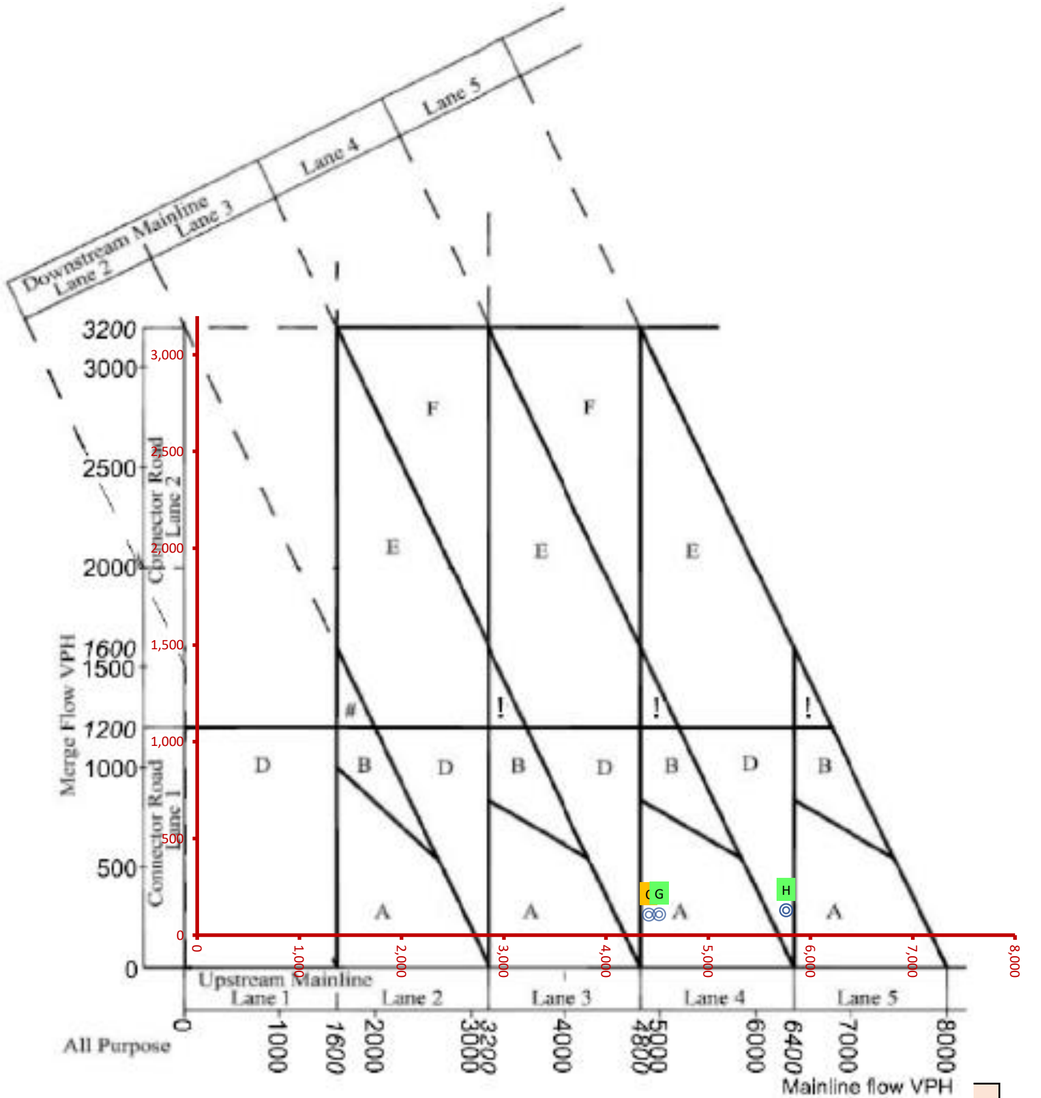
A2 Bean eastbound merge - no LTC (ACTUAL)



Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,157	129	5,157	1.00	107	1.20
B	Ref no LTC PM	6,456	165	6,456	1.00	143	1.15
C	Ref with LTC AM			4,418	1.00	92	1.15
D	Ref with LTC PM			5,761	1.00	128	1.00
E	LP Scenario no LTC AM	5,226	131	5,226	1.00	109	1.20
F	LP Scenario no LTC PM	6,432	164	6,432	1.00	143	1.15
G	LP Scenario with LTC AM			4,517	1.00	94	1.15
H	LP Scenario with LTC PM			5,760	1.00	128	1.00

SENSITIVITY ASSESSMENT

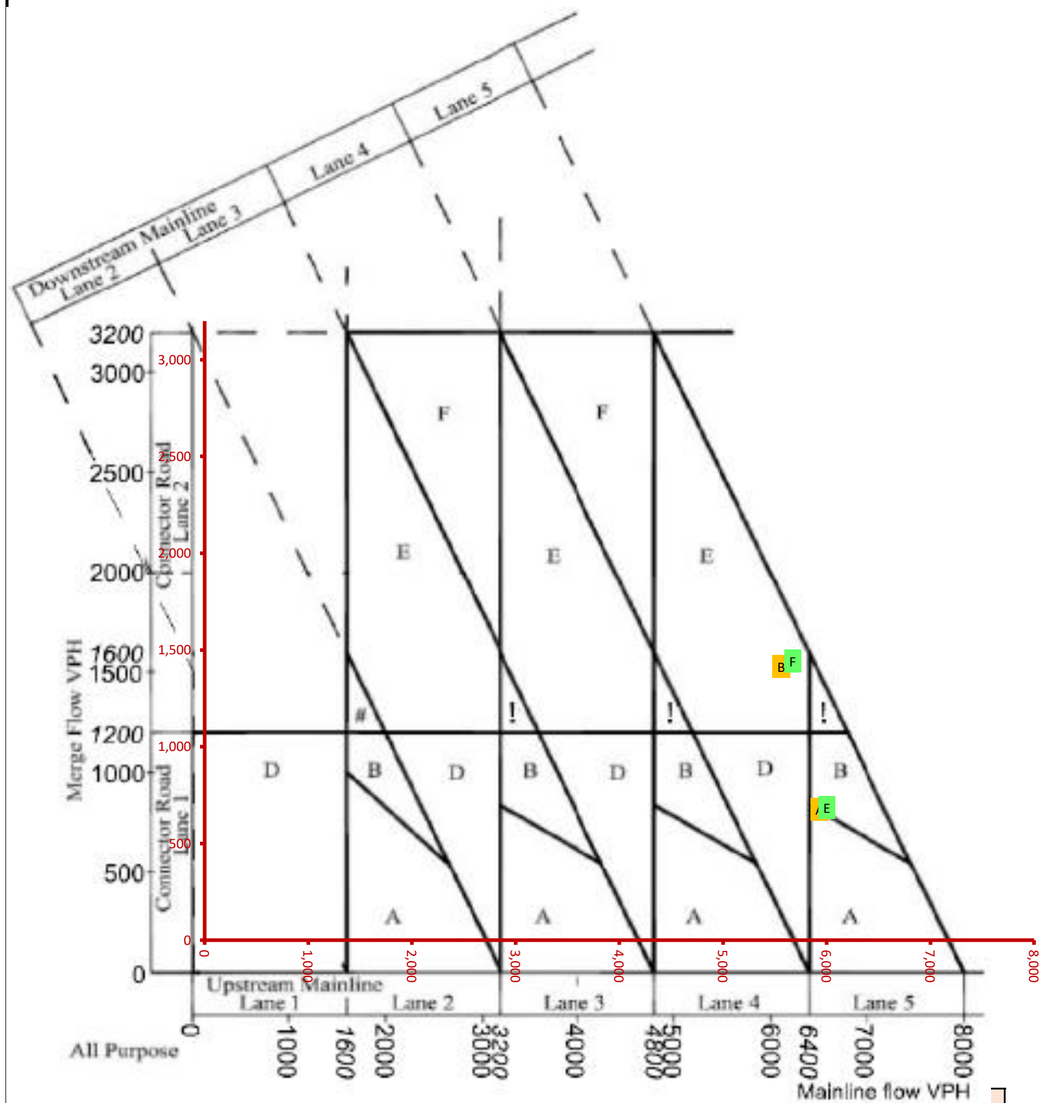
A2 Bean eastbound merge - with LTC (ACTUAL)



Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,157	1.00	107	1.20
B	Ref no LTC PM			6,456	1.00	143	1.15
C	Ref with LTC AM	4,418	106	4,418	1.00	92	1.15
D	Ref with LTC PM	5,761	128	5,761	1.00	128	1.00
E	LP Scenario no LTC AM			5,226	1.00	109	1.20
F	LP Scenario no LTC PM			6,432	1.00	143	1.15
G	LP Scenario with LTC AM	4,517	108	4,517	1.00	94	1.15
H	LP Scenario with LTC PM	5,760	128	5,760	1.00	128	1.00

SENSITIVITY ASSESSMENT

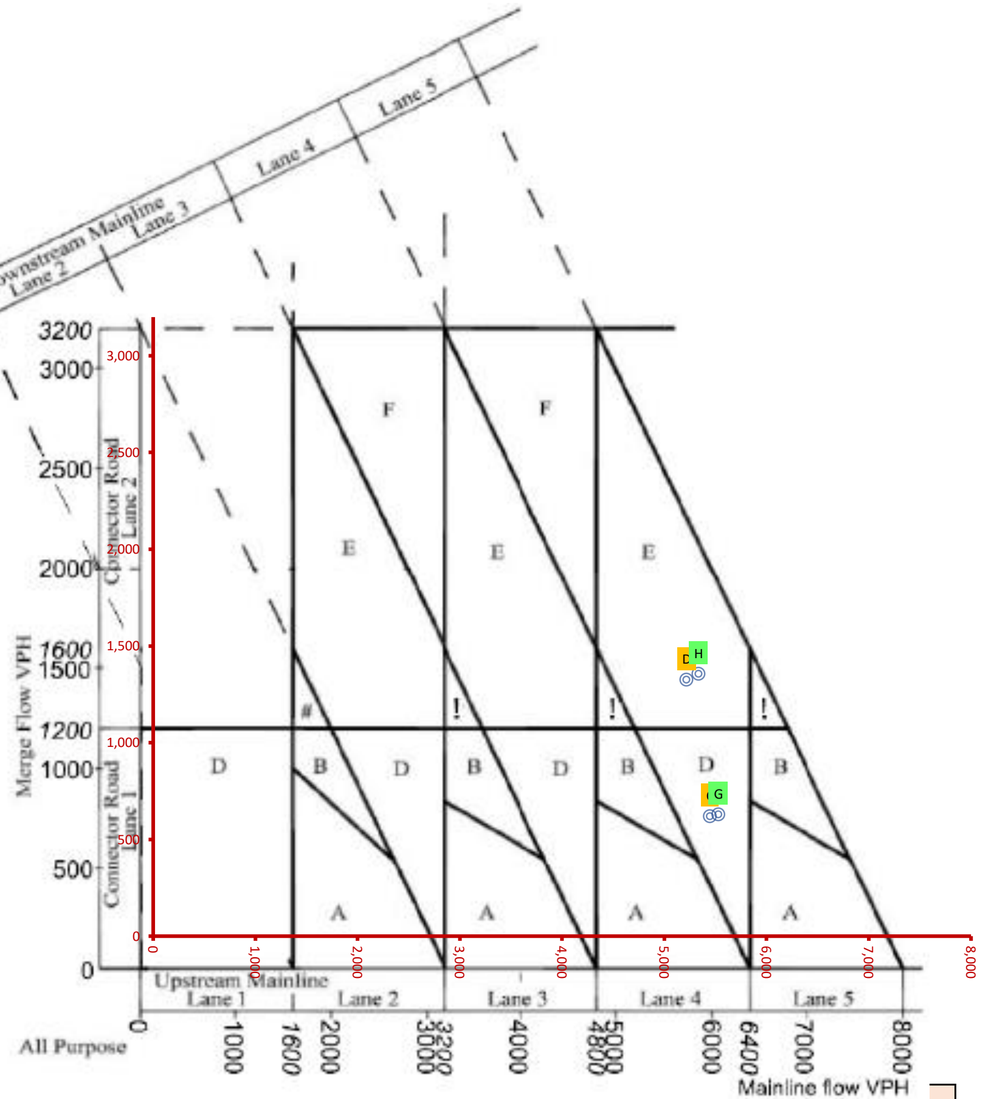
A2 Bean westbound merge - no LTC (DEMAND)



Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,931	676	5,931	1.00	676	1.00
B	Ref no LTC PM	5,563	1,415	5,563	1.00	1,415	1.00
C	Ref with LTC AM			5,445	1.00	621	1.00
D	Ref with LTC PM			5,216	1.00	1,326	1.00
E	LP Scenario no LTC AM	6,003	685	6,003	1.00	685	1.00
F	LP Scenario no LTC PM	5,671	1,442	5,671	1.00	1,442	1.00
G	LP Scenario with LTC AM			5,527	1.00	630	1.00
H	LP Scenario with LTC PM			5,333	1.00	1,356	1.00

SENSITIVITY ASSESSMENT

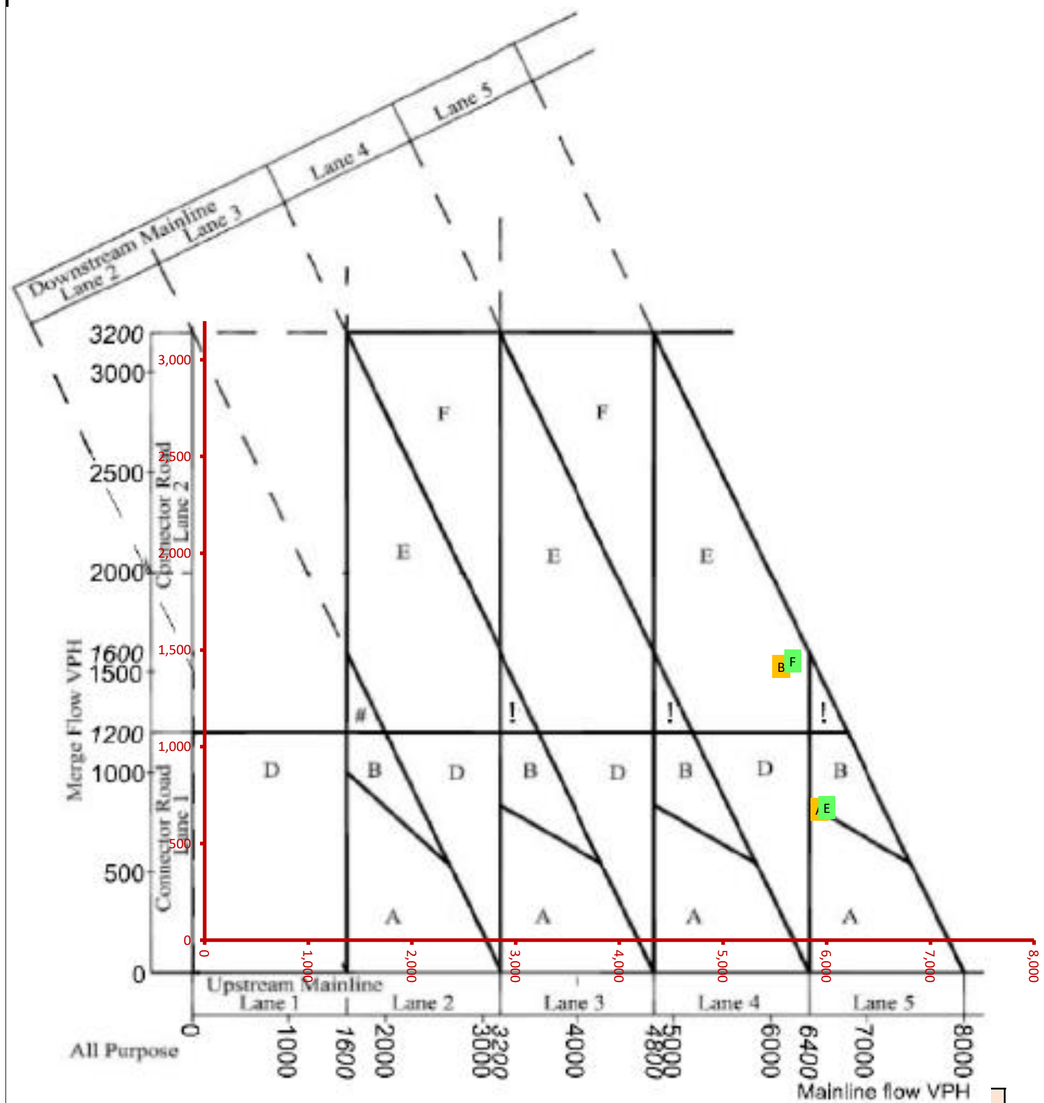
A2 Bean westbound merge - with LTC (DEMAND)



Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,931	1.00	676	1.00
B	Ref no LTC PM			5,563	1.00	1,415	1.00
C	Ref with LTC AM	5,445	621	5,445	1.00	621	1.00
D	Ref with LTC PM	5,216	1,326	5,216	1.00	1,326	1.00
E	LP Scenario no LTC AM			6,003	1.00	685	1.00
F	LP Scenario no LTC PM			5,671	1.00	1,442	1.00
G	LP Scenario with LTC AM	5,527	630	5,527	1.00	630	1.00
H	LP Scenario with LTC PM	5,333	1,356	5,333	1.00	1,356	1.00

SENSITIVITY ASSESSMENT

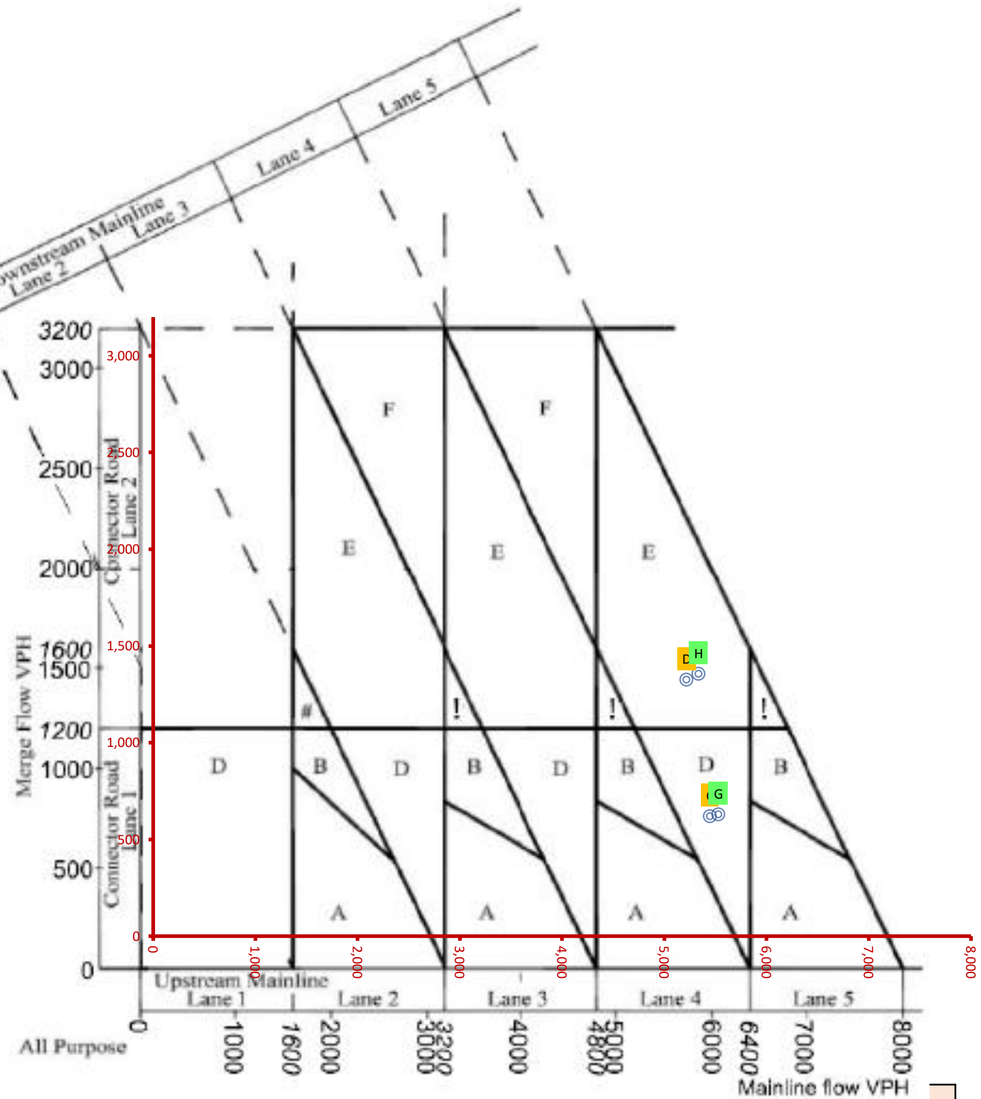
A2 Bean westbound merge - no LTC (ACTUAL)



Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,931	676	5,931	1.00	676	1.00
B	Ref no LTC PM	5,563	1,415	5,563	1.00	1,415	1.00
C	Ref with LTC AM			5,445	1.00	621	1.00
D	Ref with LTC PM			5,216	1.00	1,326	1.00
E	LP Scenario no LTC AM	6,003	685	6,003	1.00	685	1.00
F	LP Scenario no LTC PM	5,671	1,442	5,671	1.00	1,442	1.00
G	LP Scenario with LTC AM			5,527	1.00	630	1.00
H	LP Scenario with LTC PM			5,333	1.00	1,356	1.00

SENSITIVITY ASSESSMENT

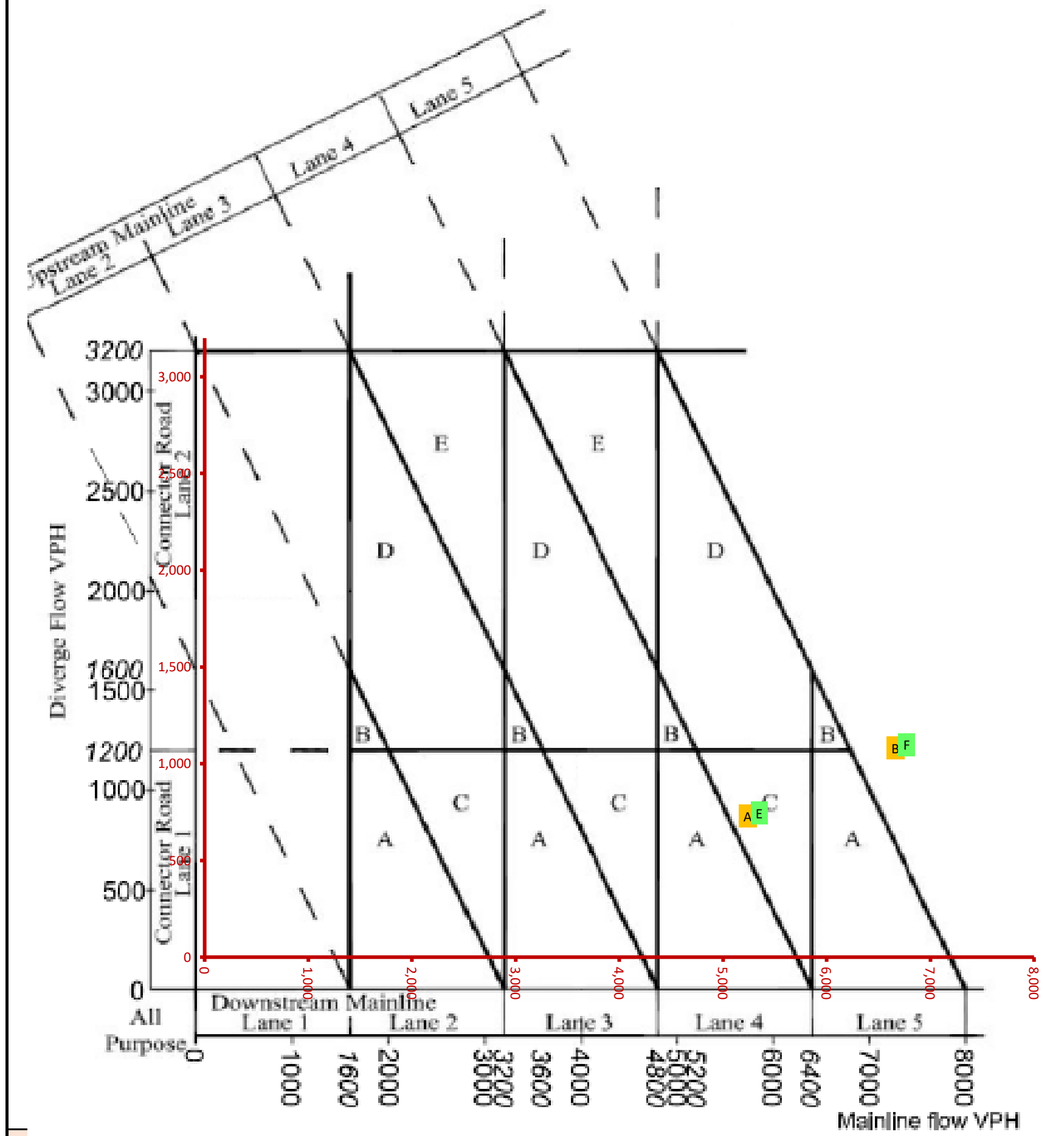
A2 Bean westbound merge - with LTC (ACTUAL)



Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,931	1.00	676	1.00
B	Ref no LTC PM			5,563	1.00	1,415	1.00
C	Ref with LTC AM	5,445	621	5,445	1.00	621	1.00
D	Ref with LTC PM	5,216	1,326	5,216	1.00	1,326	1.00
E	LP Scenario no LTC AM			6,003	1.00	685	1.00
F	LP Scenario no LTC PM			5,671	1.00	1,442	1.00
G	LP Scenario with LTC AM	5,527	630	5,527	1.00	630	1.00
H	LP Scenario with LTC PM	5,333	1,356	5,333	1.00	1,356	1.00

SENSITIVITY ASSESSMENT

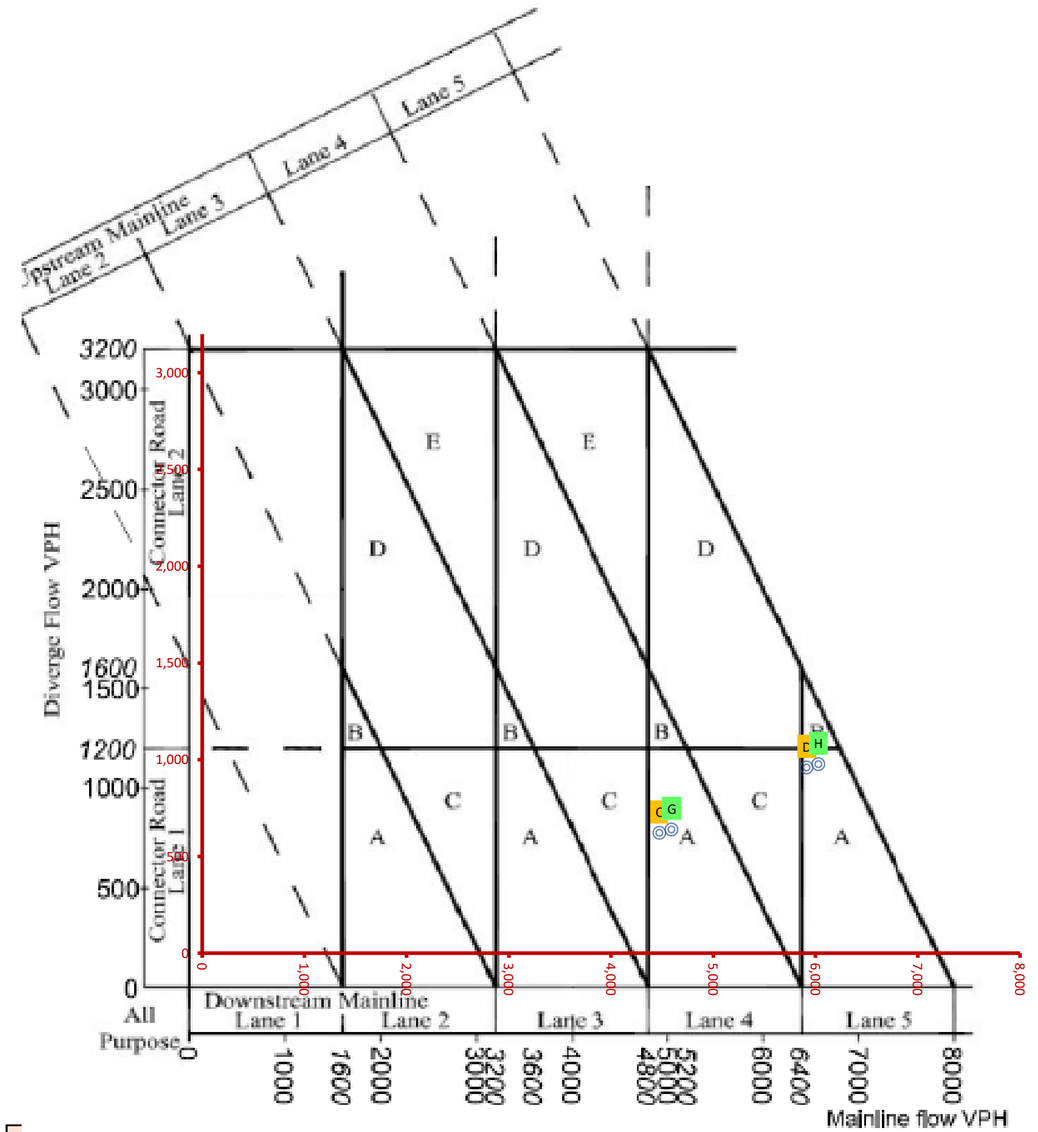
A2 Bean eastbound diverge - no LTC (DEMAND)



Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,237	729	5,237	1.00	729	1.00
B	Ref no LTC PM	6,664	1,081	6,664	1.00	1,081	1.00
C	Ref with LTC AM			4,470	1.00	623	1.00
D	Ref with LTC PM			5,912	1.00	959	1.00
E	LP Scenario no LTC AM	5,350	745	5,350	1.00	745	1.00
F	LP Scenario no LTC PM	6,772	1,099	6,772	1.00	1,099	1.00
G	LP Scenario with LTC AM			4,592	1.00	640	1.00
H	LP Scenario with LTC PM			6,025	1.00	977	1.00

SENSITIVITY ASSESSMENT

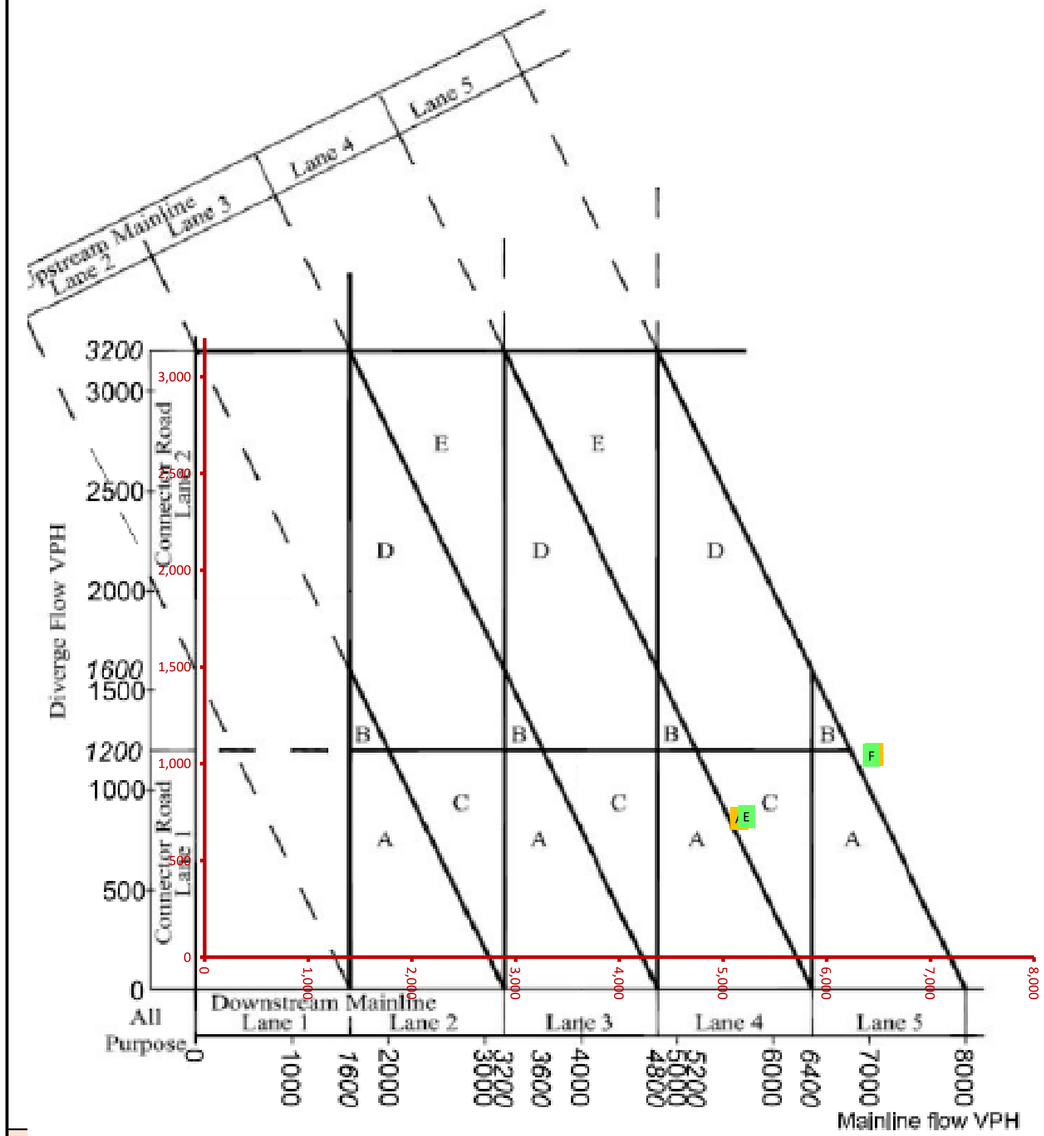
A2 Bean eastbound diverge - with LTC (DEMAND)



Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,237	1.00	729	1.00
B	Ref no LTC PM			6,664	1.00	1,081	1.00
C	Ref with LTC AM	4,470	623	4,470	1.00	623	1.00
D	Ref with LTC PM	5,912	959	5,912	1.00	959	1.00
E	LP Scenario no LTC AM			5,350	1.00	745	1.00
F	LP Scenario no LTC PM			6,772	1.00	1,099	1.00
G	LP Scenario with LTC AM	4,592	640	4,592	1.00	640	1.00
H	LP Scenario with LTC PM	6,025	977	6,025	1.00	977	1.00

SENSITIVITY ASSESSMENT

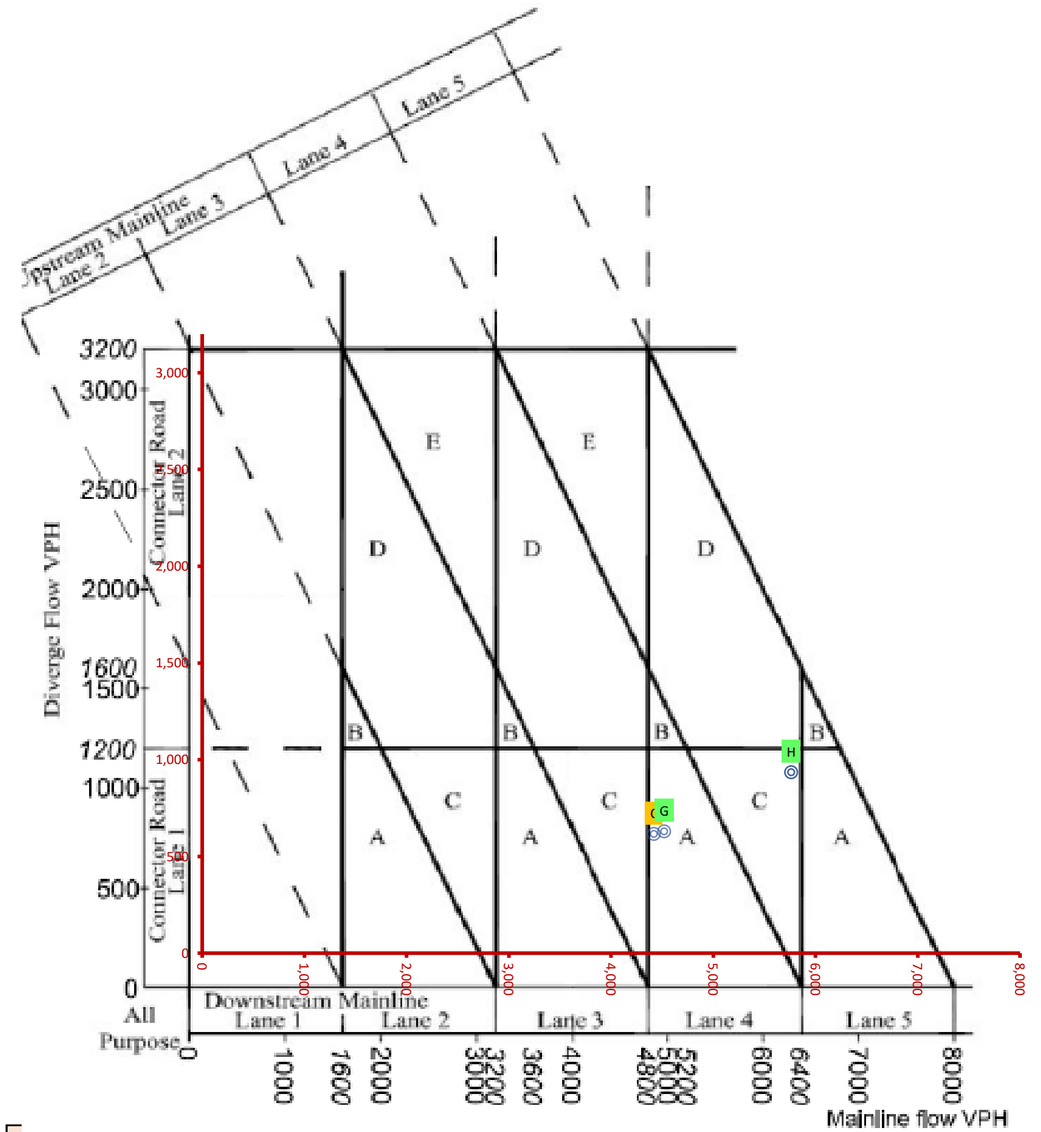
A2 Bean eastbound diverge - no LTC (ACTUAL)



Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,157	718	5,157	1.00	718	1.00
B	Ref no LTC PM	6,456	1,047	6,456	1.00	1,047	1.00
C	Ref with LTC AM			4,418	1.00	615	1.00
D	Ref with LTC PM			5,761	1.00	935	1.00
E	LP Scenario no LTC AM	5,226	728	5,226	1.00	728	1.00
F	LP Scenario no LTC PM	6,432	1,043	6,432	1.00	1,043	1.00
G	LP Scenario with LTC AM			4,517	1.00	629	1.00
H	LP Scenario with LTC PM			5,760	1.00	934	1.00

SENSITIVITY ASSESSMENT

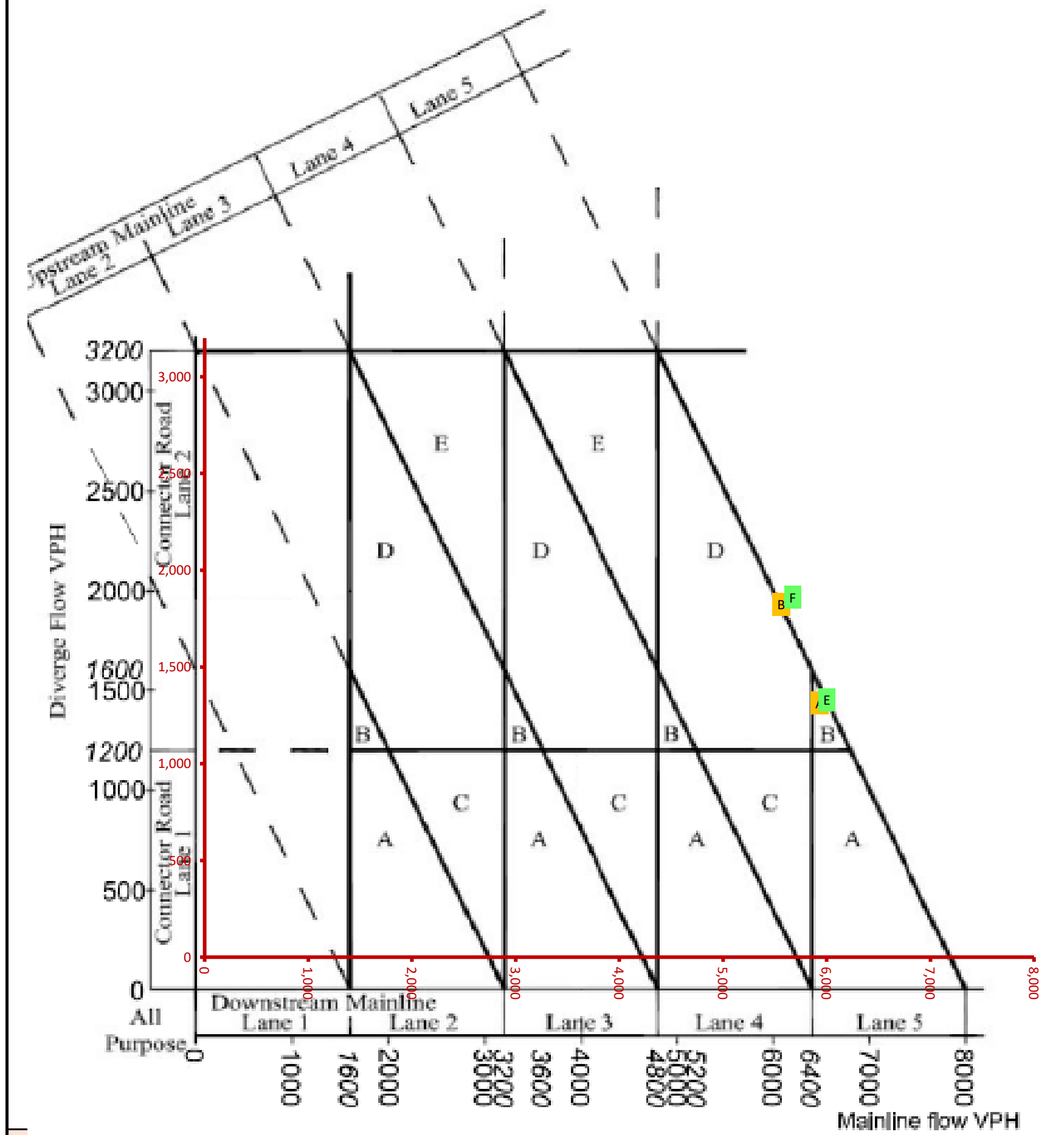
A2 Bean eastbound diverge - with LTC (ACTUAL)



Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,157	1.00	718	1.00
B	Ref no LTC PM			6,456	1.00	1,047	1.00
C	Ref with LTC AM	4,418	615	4,418	1.00	615	1.00
D	Ref with LTC PM	5,761	935	5,761	1.00	935	1.00
E	LP Scenario no LTC AM			5,226	1.00	728	1.00
F	LP Scenario no LTC PM			6,432	1.00	1,043	1.00
G	LP Scenario with LTC AM	4,517	629	4,517	1.00	629	1.00
H	LP Scenario with LTC PM	5,760	934	5,760	1.00	934	1.00

SENSITIVITY ASSESSMENT

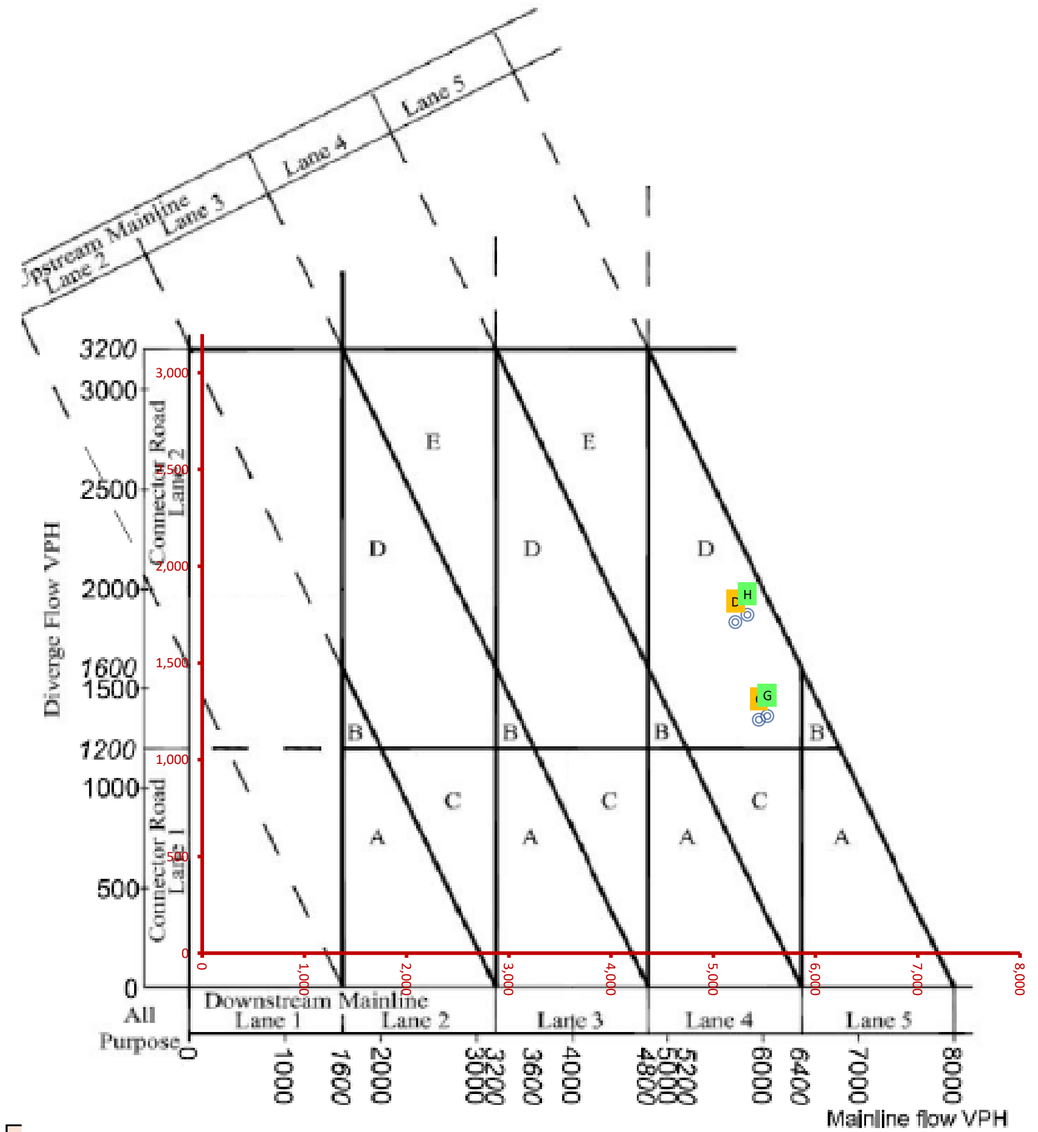
A2 Bean westbound diverge - no LTC (DEMAND)



Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,931	1,315	5,931	1.00	1,315	1.00
B	Ref no LTC PM	5,563	1,825	5,563	1.00	1,825	1.00
C	Ref with LTC AM			5,445	1.00	1,207	1.00
D	Ref with LTC PM			5,216	1.00	1,711	1.00
E	LP Scenario no LTC AM	6,003	1,330	6,003	1.00	1,330	1.00
F	LP Scenario no LTC PM	5,671	1,860	5,671	1.00	1,860	1.00
G	LP Scenario with LTC AM			5,527	1.00	1,225	1.00
H	LP Scenario with LTC PM			5,333	1.00	1,749	1.00

SENSITIVITY ASSESSMENT

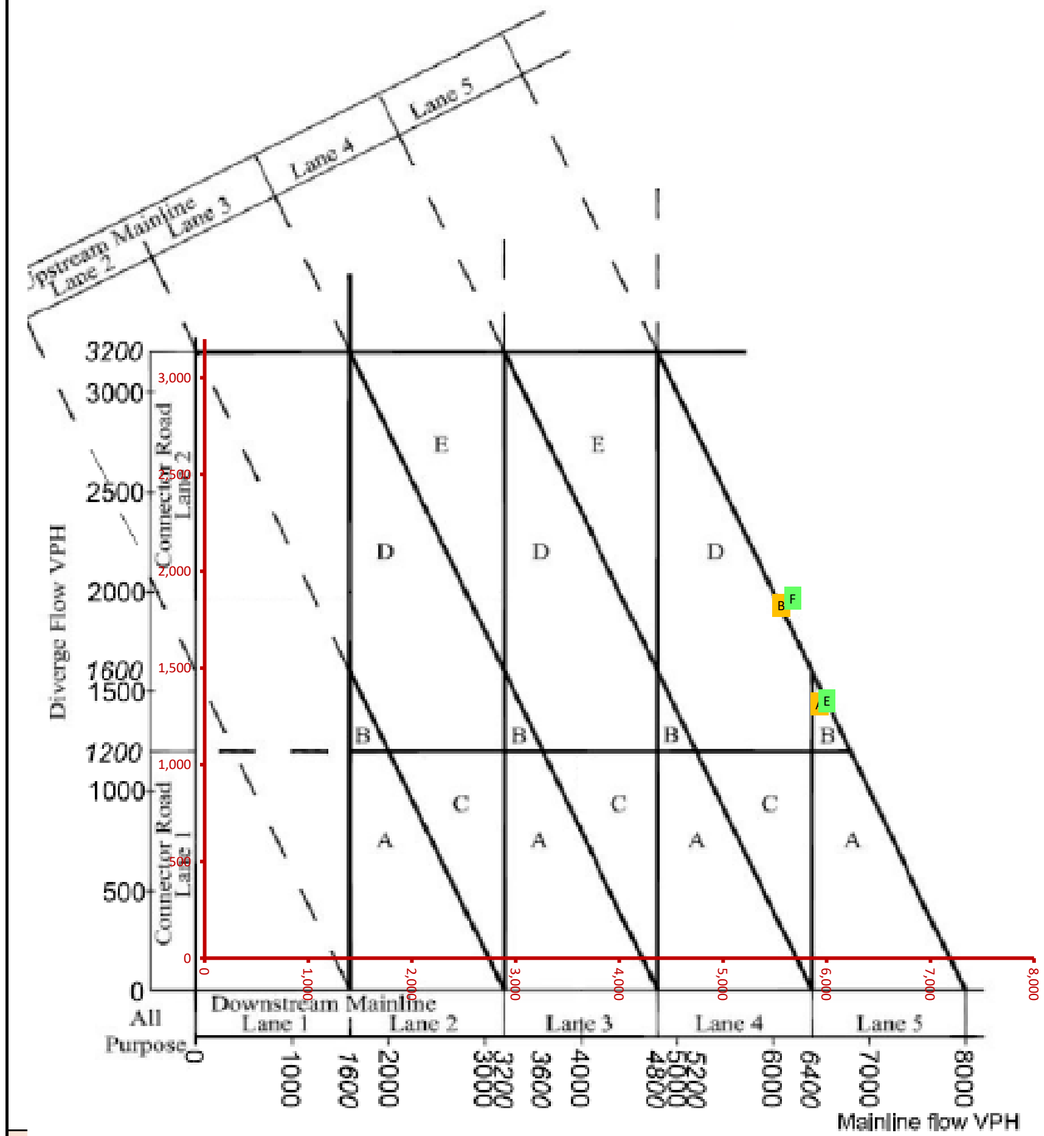
A2 Bean westbound diverge - with LTC (DEMAND)



Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,931	1.00	1,315	1.00
B	Ref no LTC PM			5,563	1.00	1,825	1.00
C	Ref with LTC AM	5,445	1,207	5,445	1.00	1,207	1.00
D	Ref with LTC PM	5,216	1,711	5,216	1.00	1,711	1.00
E	LP Scenario no LTC AM			6,003	1.00	1,330	1.00
F	LP Scenario no LTC PM			5,671	1.00	1,860	1.00
G	LP Scenario with LTC AM	5,527	1,225	5,527	1.00	1,225	1.00
H	LP Scenario with LTC PM	5,333	1,749	5,333	1.00	1,749	1.00

SENSITIVITY ASSESSMENT

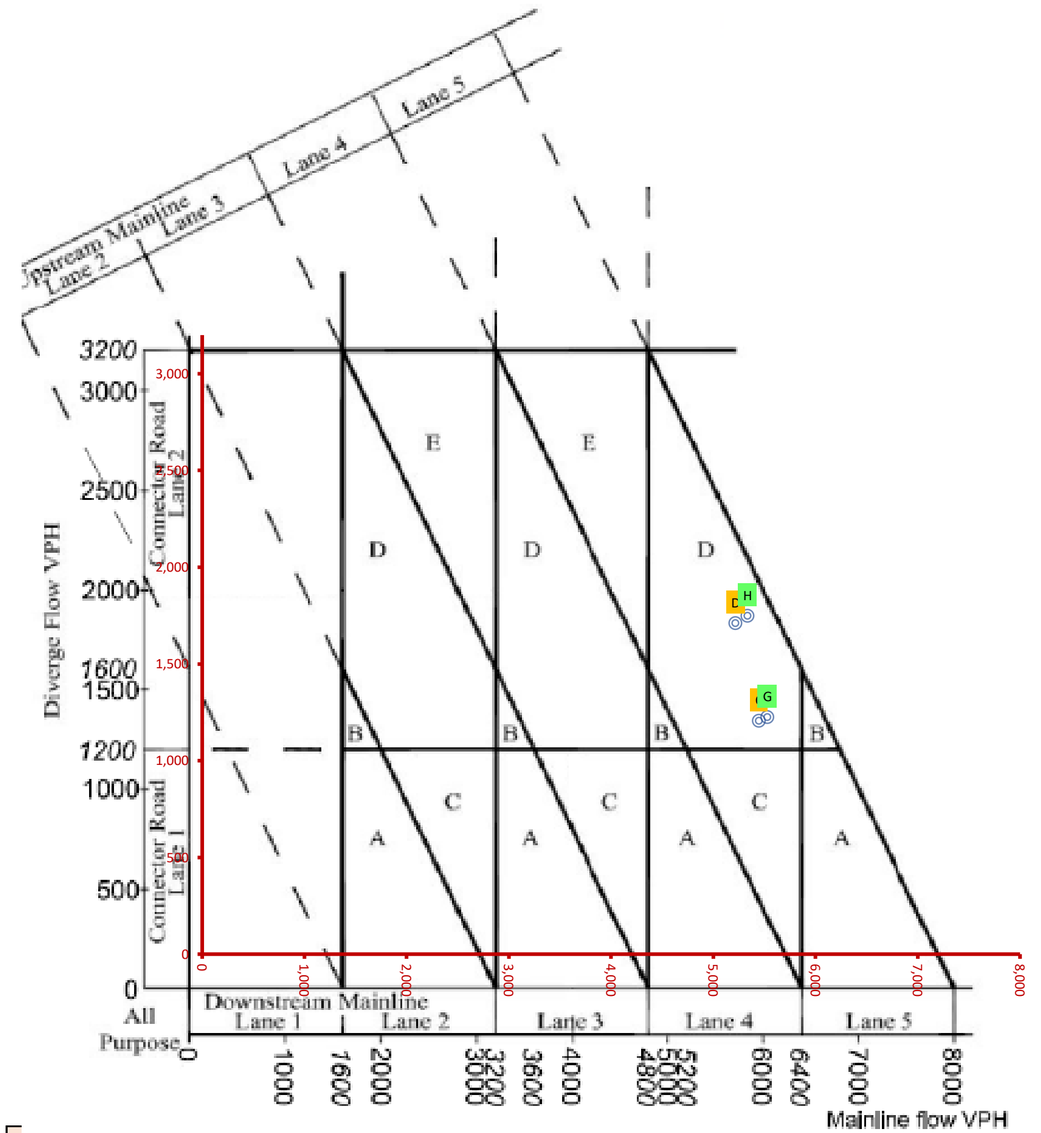
A2 Bean westbound diverge - no LTC (ACTUAL)



Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,931	1,315	5,931	1.00	1,315	1.00
B	Ref no LTC PM	5,563	1,825	5,563	1.00	1,825	1.00
C	Ref with LTC AM			5,445	1.00	1,207	1.00
D	Ref with LTC PM			5,216	1.00	1,711	1.00
E	LP Scenario no LTC AM	6,003	1,330	6,003	1.00	1,330	1.00
F	LP Scenario no LTC PM	5,671	1,860	5,671	1.00	1,860	1.00
G	LP Scenario with LTC AM			5,527	1.00	1,225	1.00
H	LP Scenario with LTC PM			5,333	1.00	1,749	1.00

SENSITIVITY ASSESSMENT

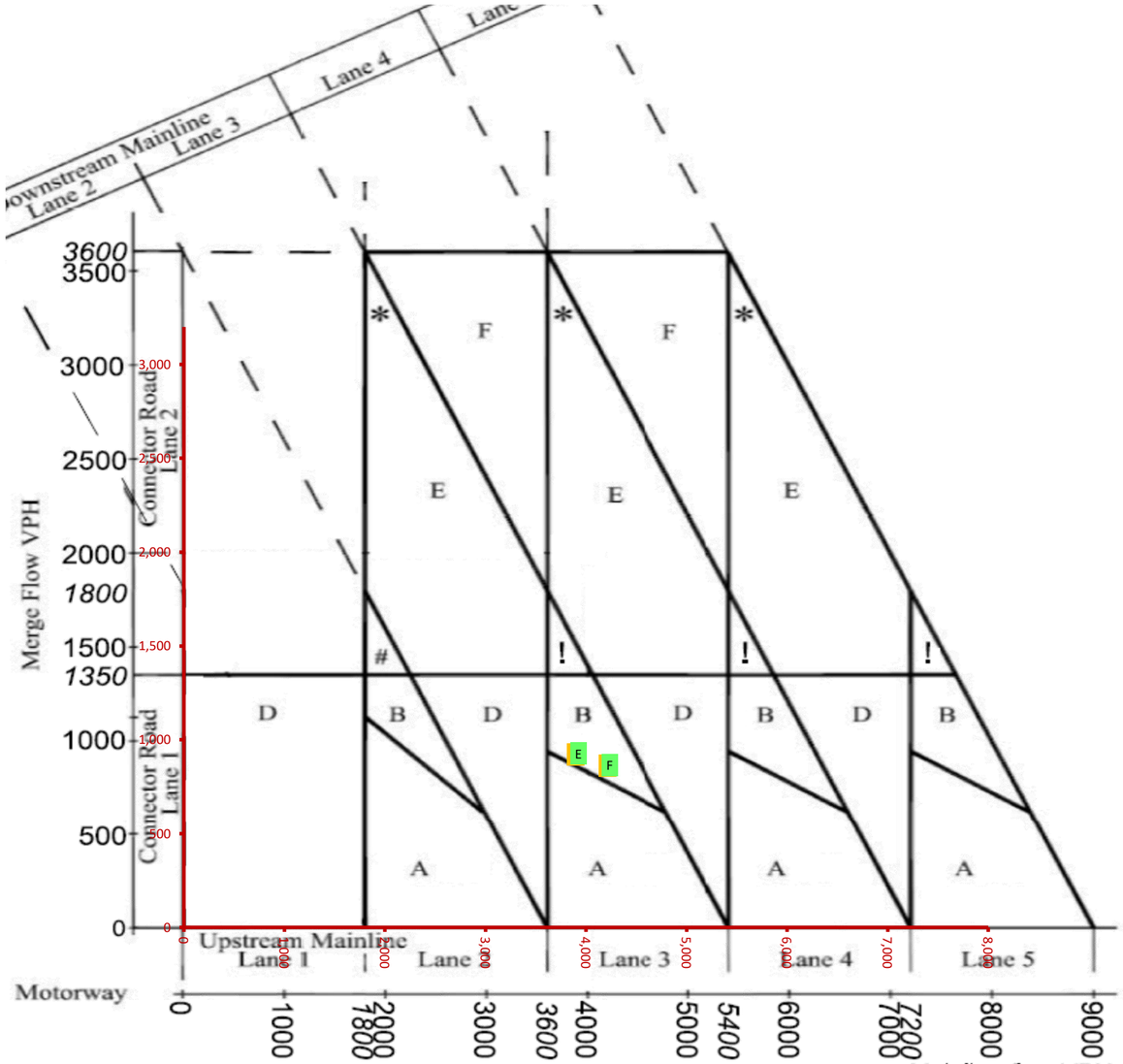
A2 Bean westbound diverge - with LTC (ACTUAL)



Scenario		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,931	1.00	1,315	1.00
B	Ref no LTC PM			5,563	1.00	1,825	1.00
C	Ref with LTC AM	5,445	1,207	5,445	1.00	1,207	1.00
D	Ref with LTC PM	5,216	1,711	5,216	1.00	1,711	1.00
E	LP Scenario no LTC AM			6,003	1.00	1,330	1.00
F	LP Scenario no LTC PM			5,671	1.00	1,860	1.00
G	LP Scenario with LTC AM	5,527	1,225	5,527	1.00	1,225	1.00
H	LP Scenario with LTC PM	5,333	1,749	5,333	1.00	1,749	1.00

SENSITIVITY ASSESSMENT

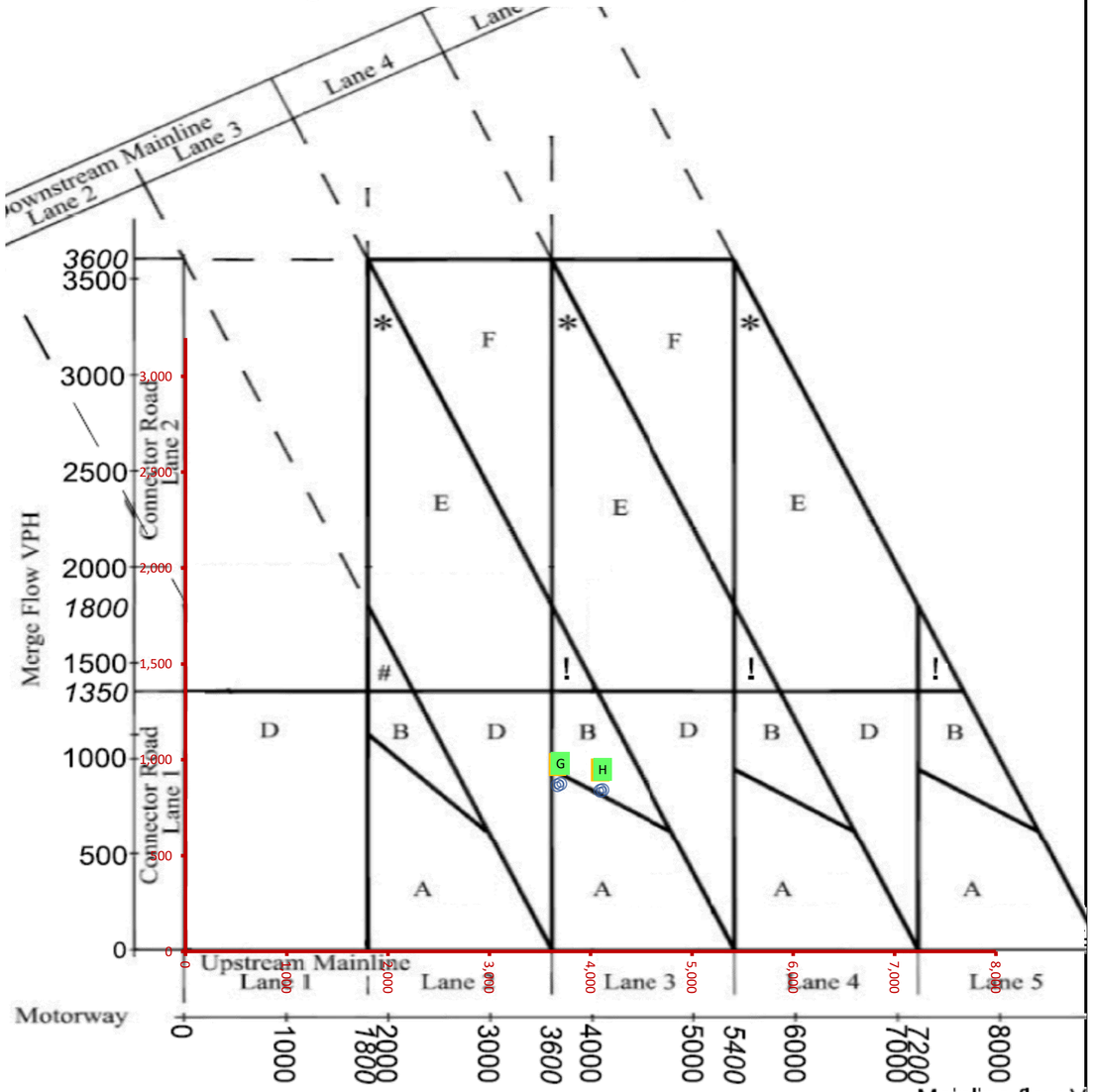
J3 northbound merge - no LTC (DEMAND)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	3,898	920	3,898	1.00	920	1.00
B	Ref no LTC PM	4,214	862	4,214	1.00	862	1.00
C	Ref with LTC AM			3,671	1.00	867	1.00
D	Ref with LTC PM			4,095	1.00	838	1.00
E	LP Scenario no LTC AM	3,925	927	3,925	1.00	927	1.00
F	LP Scenario no LTC PM	4,235	866	4,235	1.00	866	1.00
G	LP Scenario with LTC AM			3,699	1.00	874	1.00
H	LP Scenario with LTC PM			4,115	1.00	842	1.00

SENSITIVITY ASSESSMENT

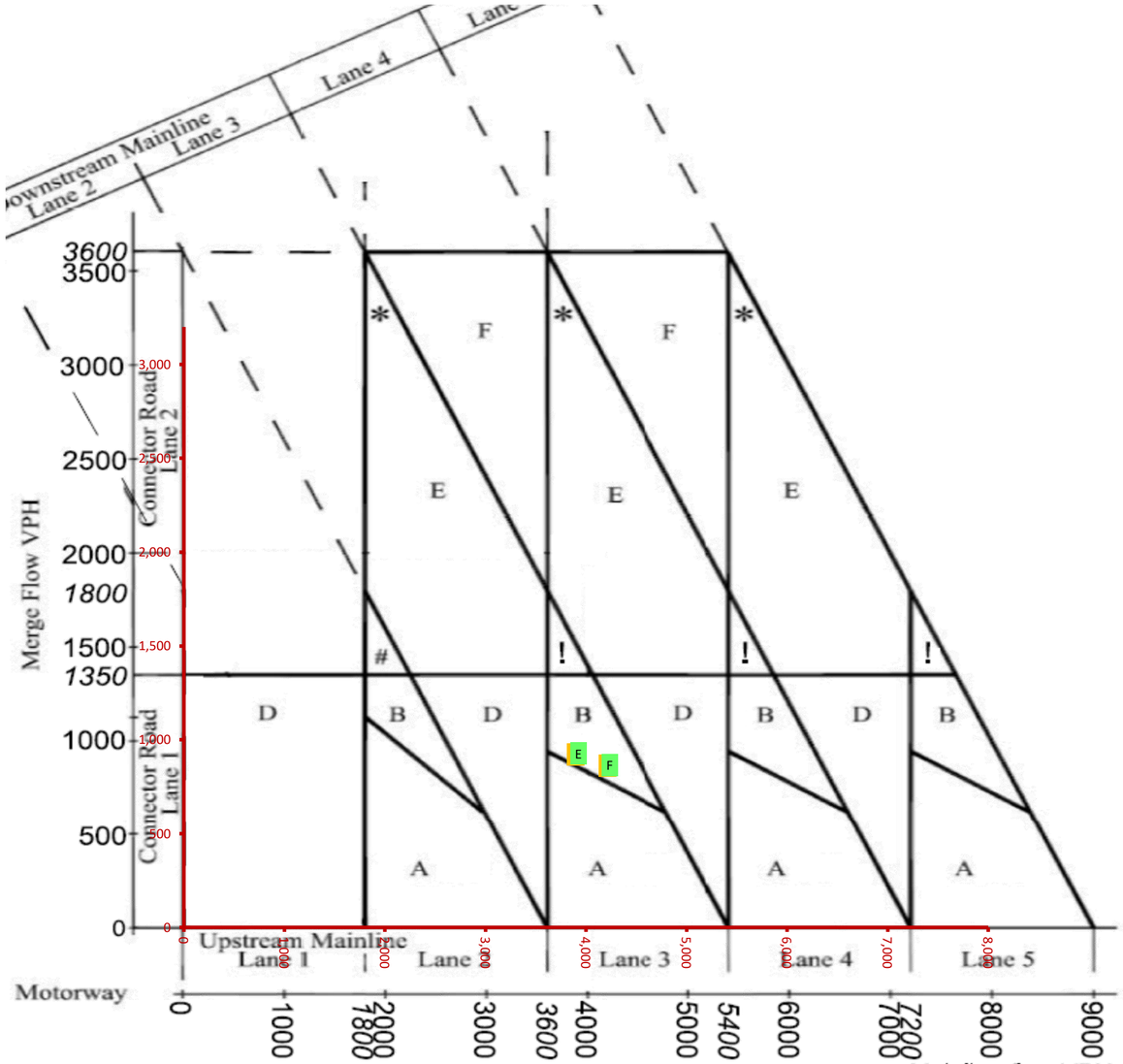
J3 northbound merge - with LTC (DEMAND)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			3,898	1.00	920	1.00
B	Ref no LTC PM			4,214	1.00	862	1.00
C	Ref with LTC AM	3,671	867	3,671	1.00	867	1.00
D	Ref with LTC PM	4,095	838	4,095	1.00	838	1.00
E	LP Scenario no LTC AM			3,925	1.00	927	1.00
F	LP Scenario no LTC PM			4,235	1.00	866	1.00
G	LP Scenario with LTC AM	3,699	874	3,699	1.00	874	1.00
H	LP Scenario with LTC PM	4,115	842	4,115	1.00	842	1.00

SENSITIVITY ASSESSMENT

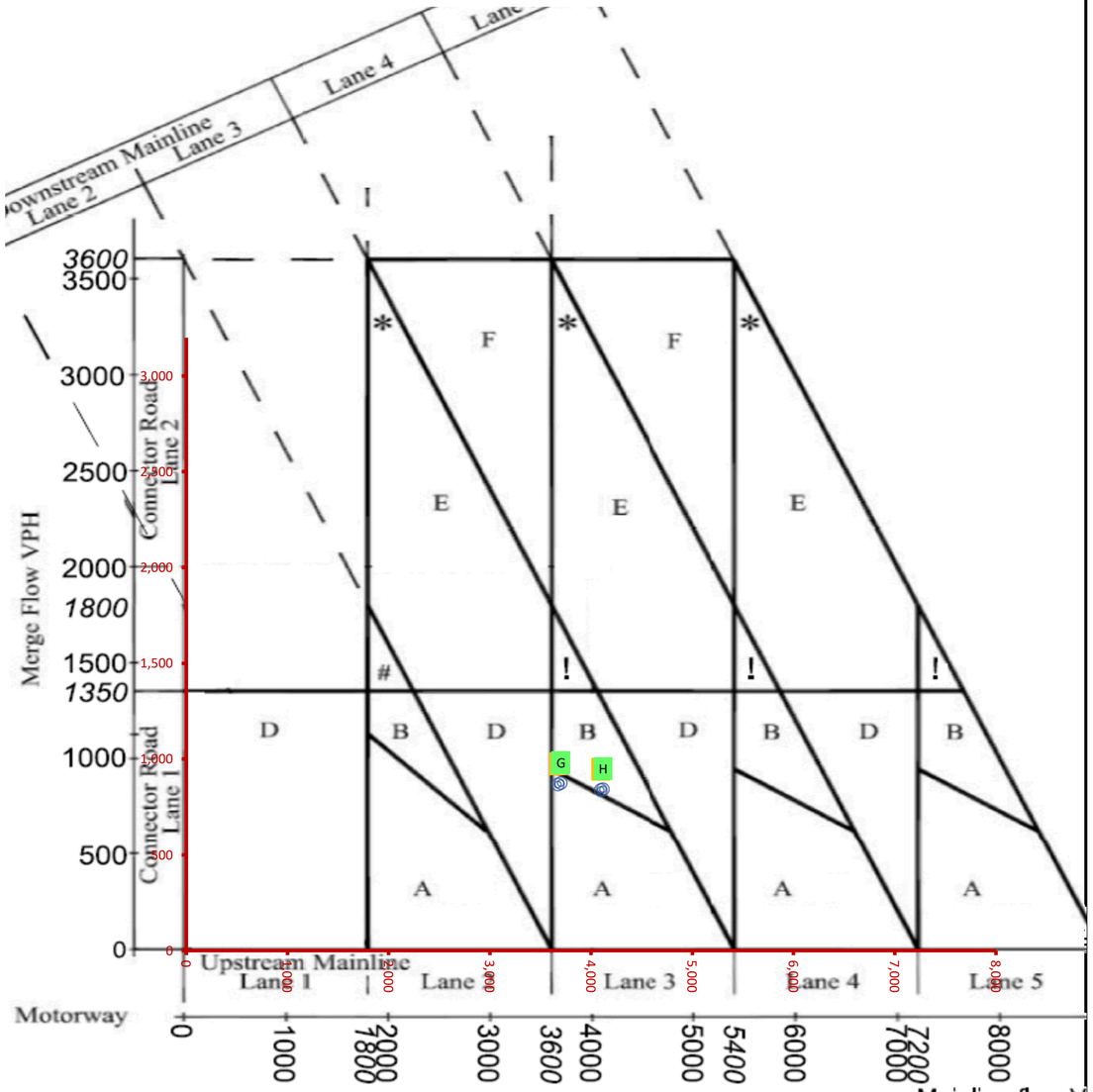
J3 northbound merge - no LTC (ACTUAL)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	3,898	920	3,898	1.00	920	1.00
B	Ref no LTC PM	4,214	862	4,214	1.00	862	1.00
C	Ref with LTC AM			3,671	1.00	867	1.00
D	Ref with LTC PM			4,095	1.00	838	1.00
E	LP Scenario no LTC AM	3,925	927	3,925	1.00	927	1.00
F	LP Scenario no LTC PM	4,235	866	4,235	1.00	866	1.00
G	LP Scenario with LTC AM			3,699	1.00	874	1.00
H	LP Scenario with LTC PM			4,115	1.00	842	1.00

SENSITIVITY ASSESSMENT

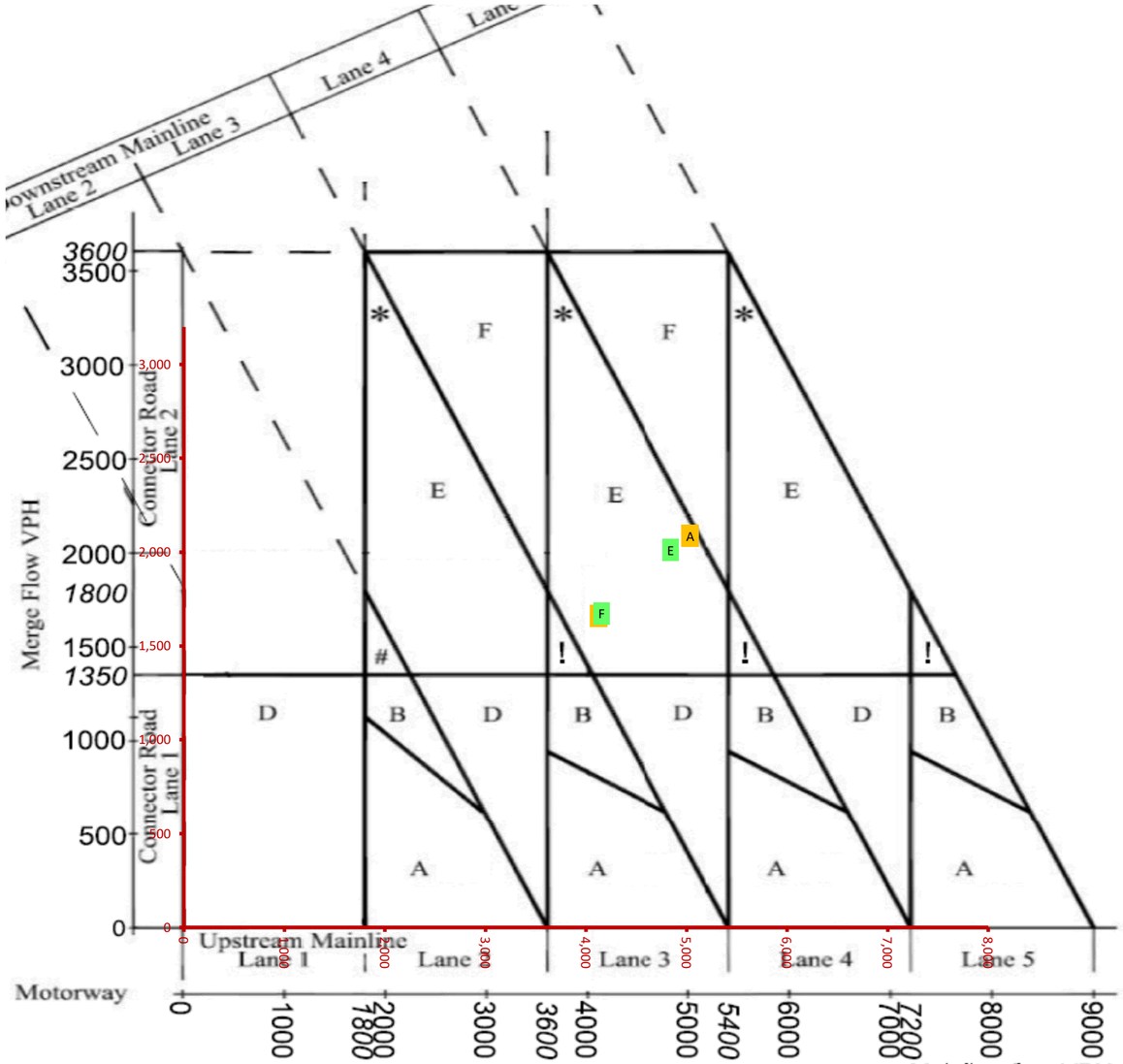
J3 northbound merge - with LTC (ACTUAL)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			3,898	1.00	920	1.00
B	Ref no LTC PM			4,214	1.00	862	1.00
C	Ref with LTC AM	3,671	867	3,671	1.00	867	1.00
D	Ref with LTC PM	4,095	838	4,095	1.00	838	1.00
E	LP Scenario no LTC AM			3,925	1.00	927	1.00
F	LP Scenario no LTC PM			4,235	1.00	866	1.00
G	LP Scenario with LTC AM	3,699	874	3,699	1.00	874	1.00
H	LP Scenario with LTC PM	4,115	842	4,115	1.00	842	1.00

SENSITIVITY ASSESSMENT

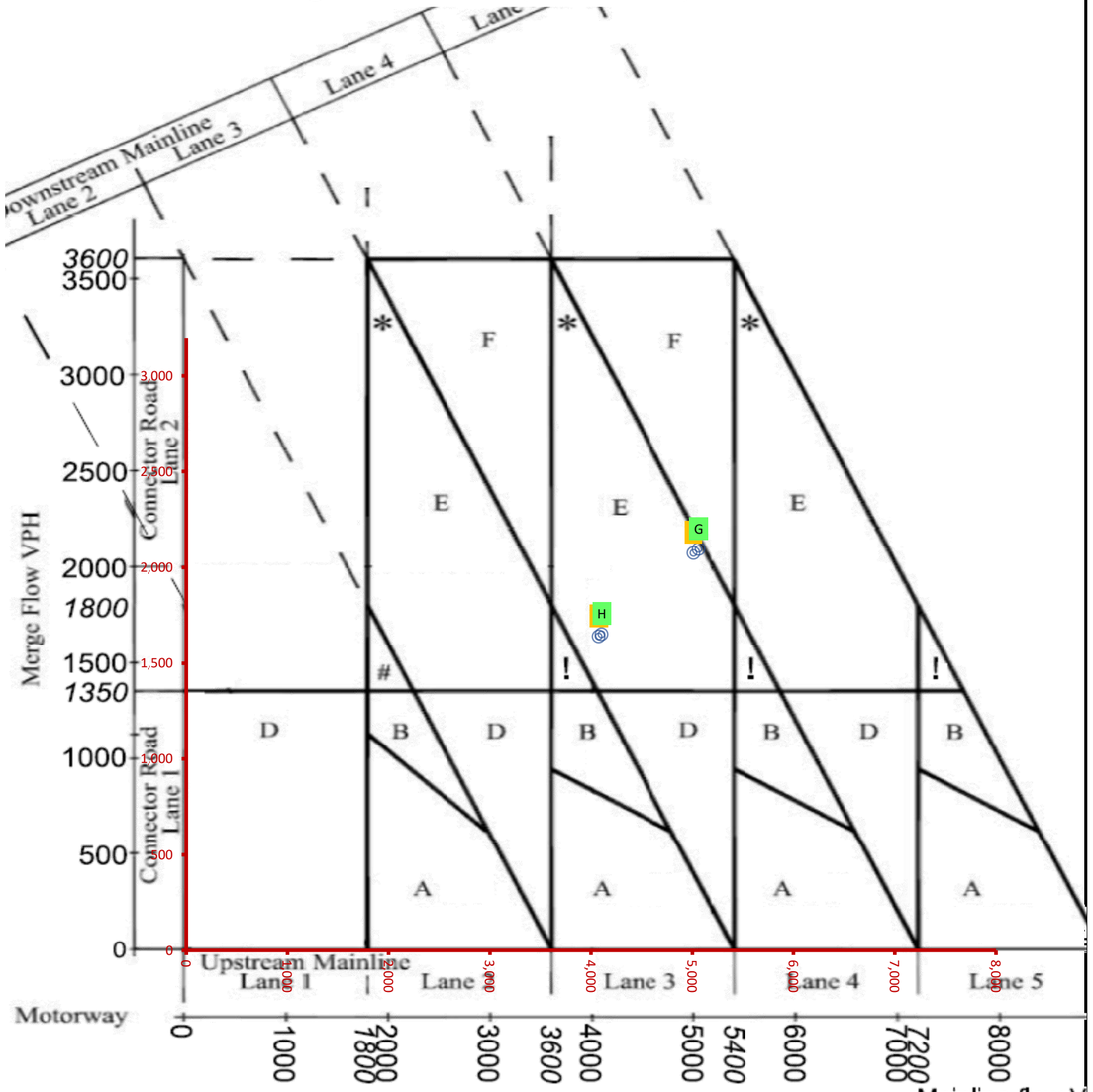
J3 southbound merge - no LTC (DEMAND)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,034	2,086	4,795	1.05	1,896	1.10
B	Ref no LTC PM	4,126	1,661	4,126	1.00	1,661	1.00
C	Ref with LTC AM			4,772	1.05	1,887	1.10
D	Ref with LTC PM			4,074	1.00	1,641	1.00
E	LP Scenario no LTC AM	4,842	2,011	4,842	1.00	1,915	1.05
F	LP Scenario no LTC PM	4,155	1,673	4,155	1.00	1,673	1.00
G	LP Scenario with LTC AM			4,818	1.05	1,905	1.10
H	LP Scenario with LTC PM			4,103	1.00	1,652	1.00

SENSITIVITY ASSESSMENT

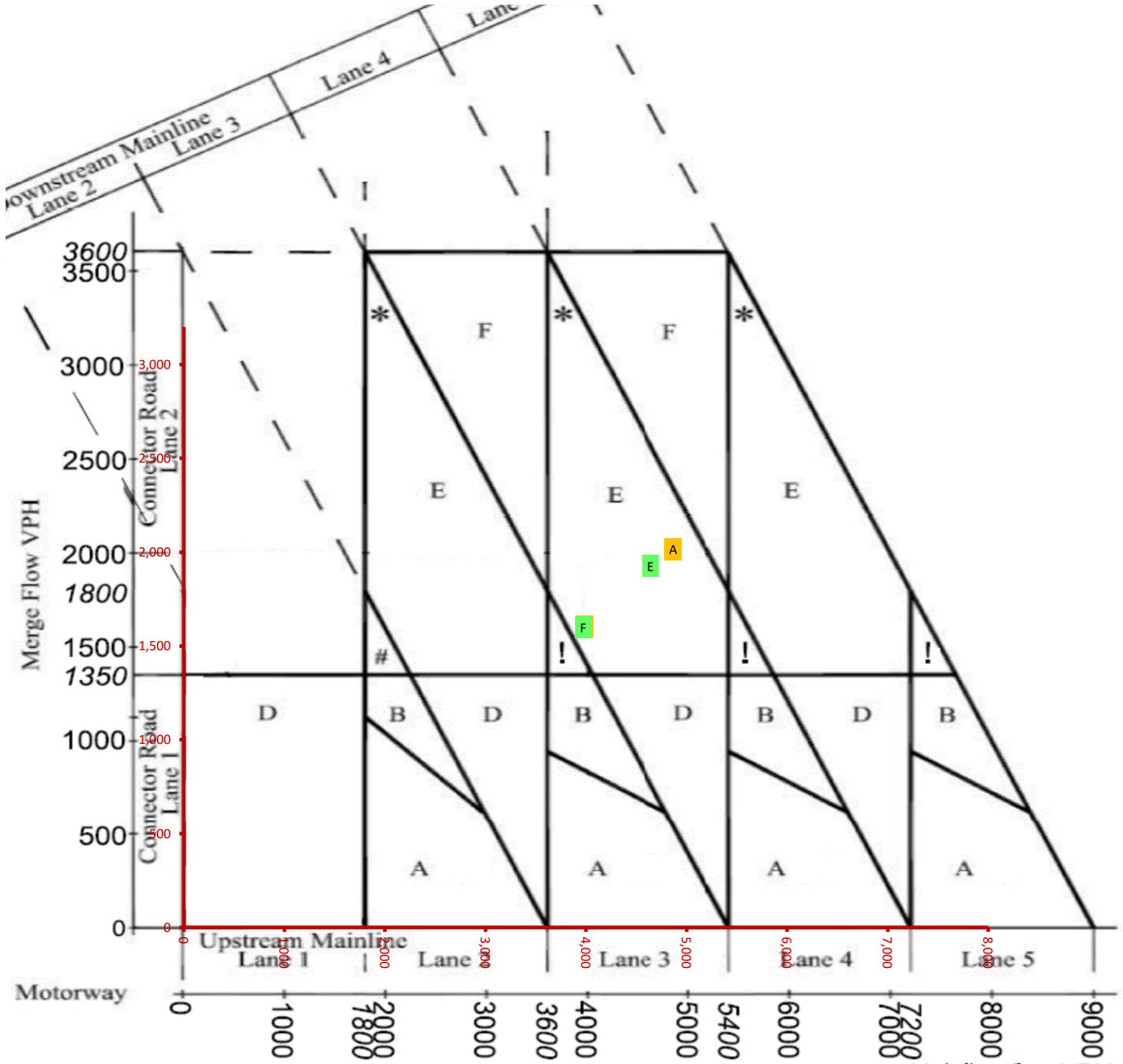
J3 southbound merge - with LTC (DEMAND)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,795	1.05	1,896	1.10
B	Ref no LTC PM			4,126	1.00	1,661	1.00
C	Ref with LTC AM	5,011	2,076	4,772	1.05	1,887	1.10
D	Ref with LTC PM	4,074	1,641	4,074	1.00	1,641	1.00
E	LP Scenario no LTC AM			4,842	1.00	1,915	1.05
F	LP Scenario no LTC PM			4,155	1.00	1,673	1.00
G	LP Scenario with LTC AM	5,059	2,096	4,818	1.05	1,905	1.10
H	LP Scenario with LTC PM	4,103	1,652	4,103	1.00	1,652	1.00

SENSITIVITY ASSESSMENT

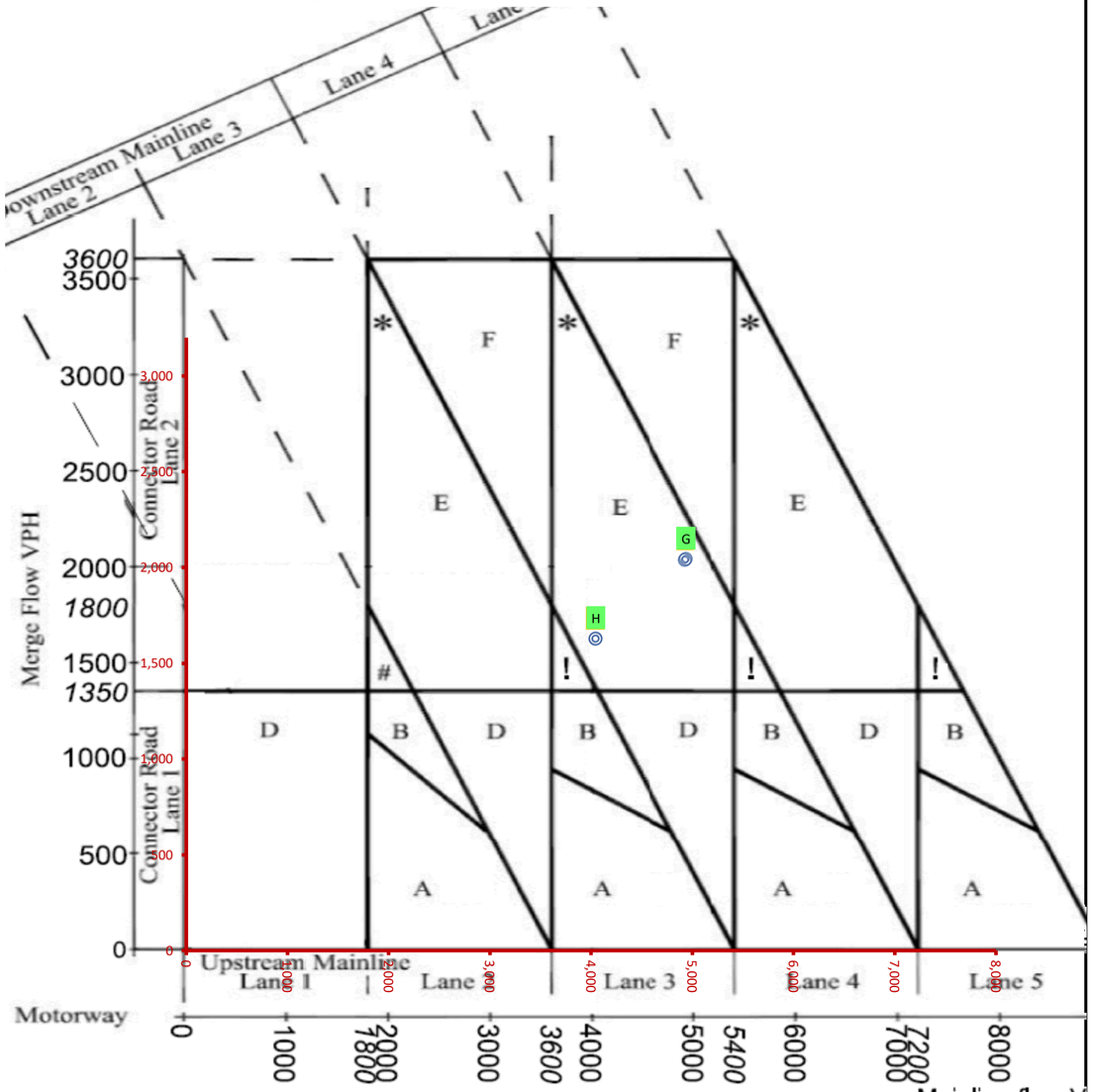
J3 southbound merge - no LTC (ACTUAL)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,865	2,016	4,633	1.05	1,832	1.10
B	Ref no LTC PM	3,982	1,604	3,982	1.00	1,604	1.00
C	Ref with LTC AM			4,690	1.05	1,855	1.10
D	Ref with LTC PM			4,040	1.00	1,627	1.00
E	LP Scenario no LTC AM	4,641	1,927	4,641	1.00	1,835	1.05
F	LP Scenario no LTC PM	3,970	1,599	3,970	1.00	1,599	1.00
G	LP Scenario with LTC AM			4,699	1.05	1,858	1.10
H	LP Scenario with LTC PM			4,045	1.00	1,629	1.00

SENSITIVITY ASSESSMENT

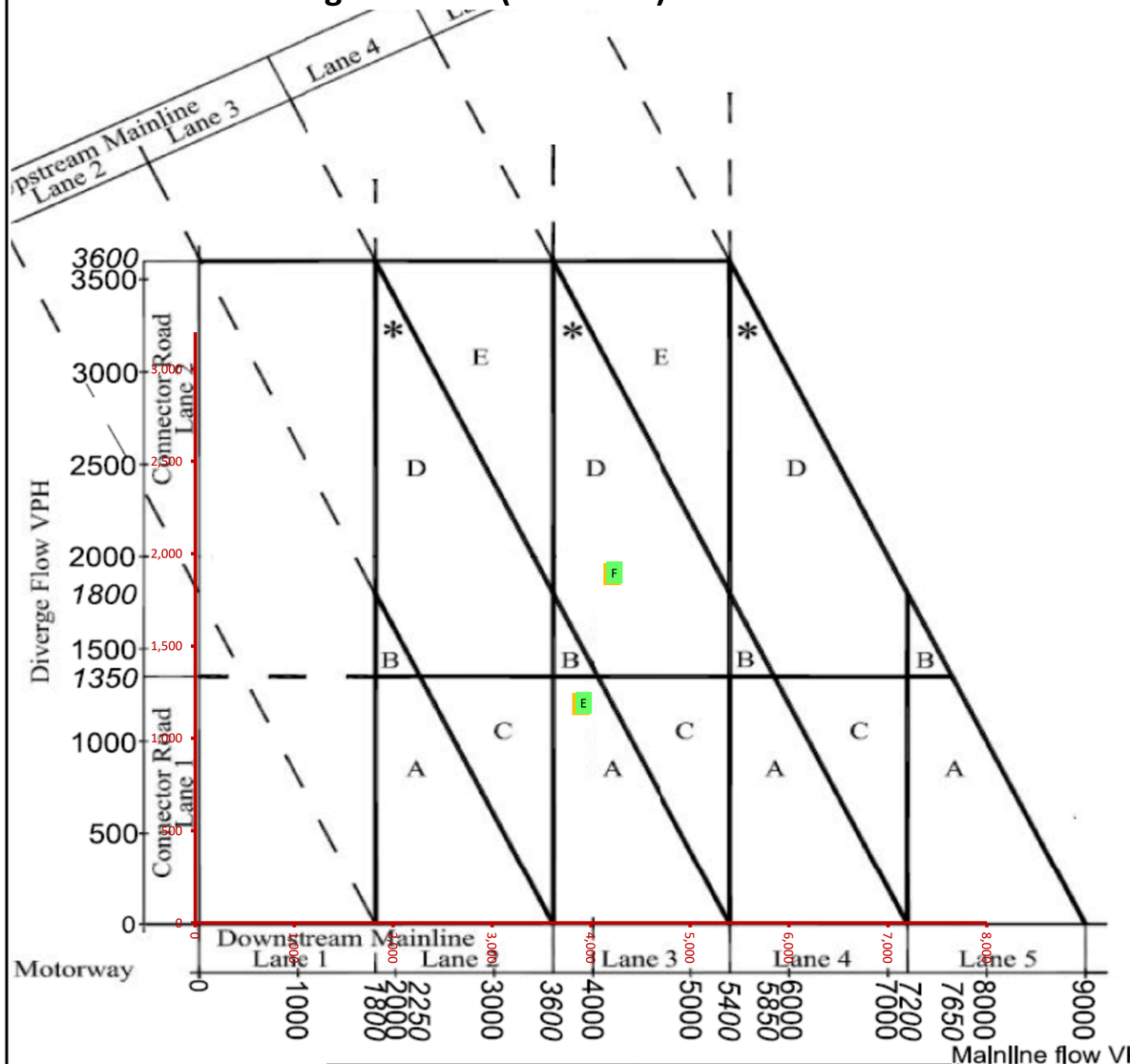
J3 southbound merge - with LTC (ACTUAL)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,633	1.05	1,832	1.10
B	Ref no LTC PM			3,982	1.00	1,604	1.00
C	Ref with LTC AM	4,924	2,040	4,690	1.05	1,855	1.10
D	Ref with LTC PM	4,040	1,627	4,040	1.00	1,627	1.00
E	LP Scenario no LTC AM			4,641	1.00	1,835	1.05
F	LP Scenario no LTC PM			3,970	1.00	1,599	1.00
G	LP Scenario with LTC AM	4,934	2,044	4,699	1.05	1,858	1.10
H	LP Scenario with LTC PM	4,045	1,629	4,045	1.00	1,629	1.00

SENSITIVITY ASSESSMENT

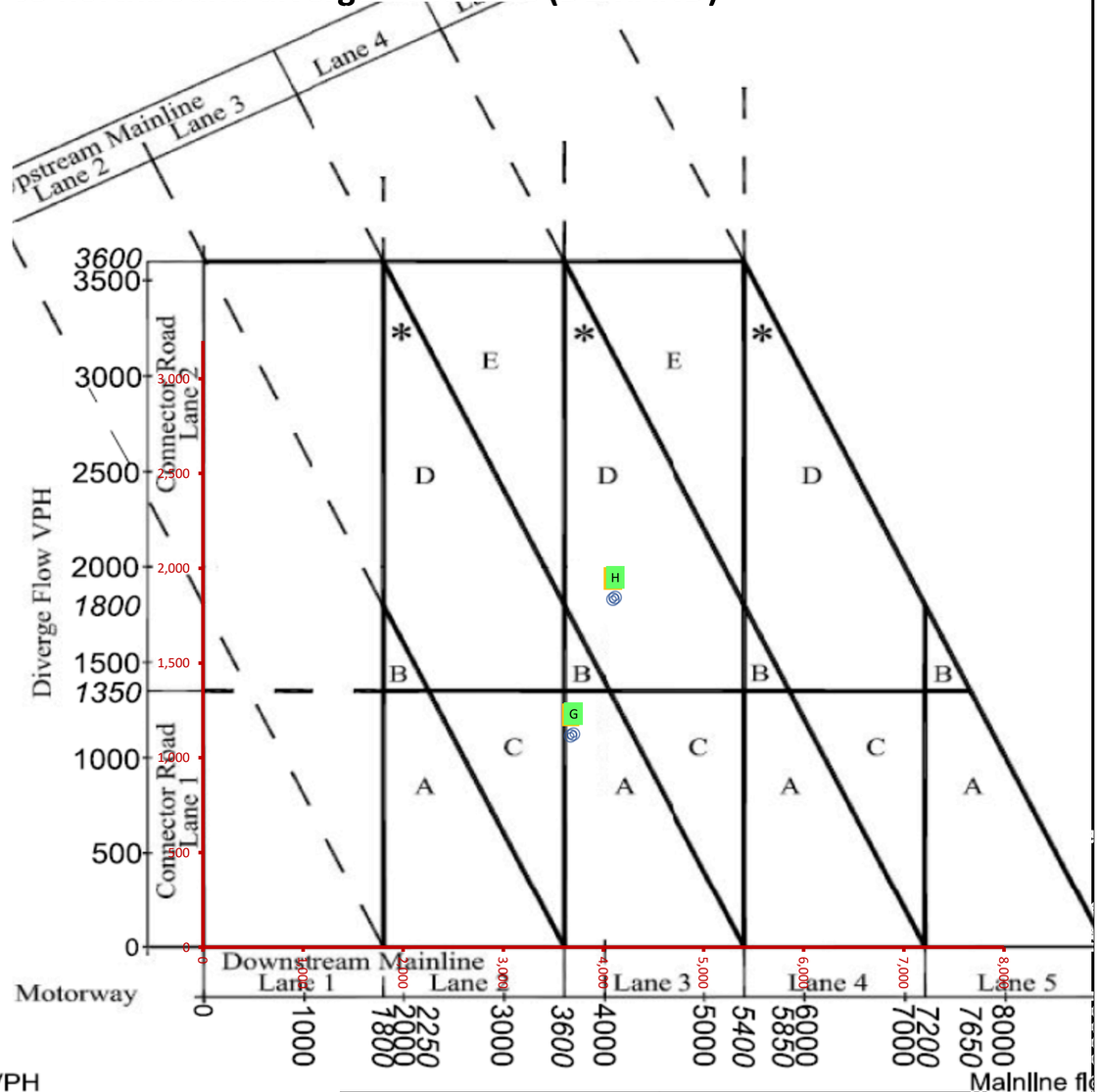
J3 northbound diverge - no LTC (DEMAND)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	3,898	1,185	3,898	1.00	1,185	1.00
B	Ref no LTC PM	4,214	1,889	4,214	1.00	1,889	1.00
C	Ref with LTC AM			3,671	1.00	1,116	1.00
D	Ref with LTC PM			4,095	1.00	1,836	1.00
E	LP Scenario no LTC AM	3,925	1,193	3,925	1.00	1,193	1.00
F	LP Scenario no LTC PM	4,235	1,898	4,235	1.00	1,898	1.00
G	LP Scenario with LTC AM			3,699	1.00	1,125	1.00
H	LP Scenario with LTC PM			4,115	1.00	1,845	1.00

SENSITIVITY ASSESSMENT

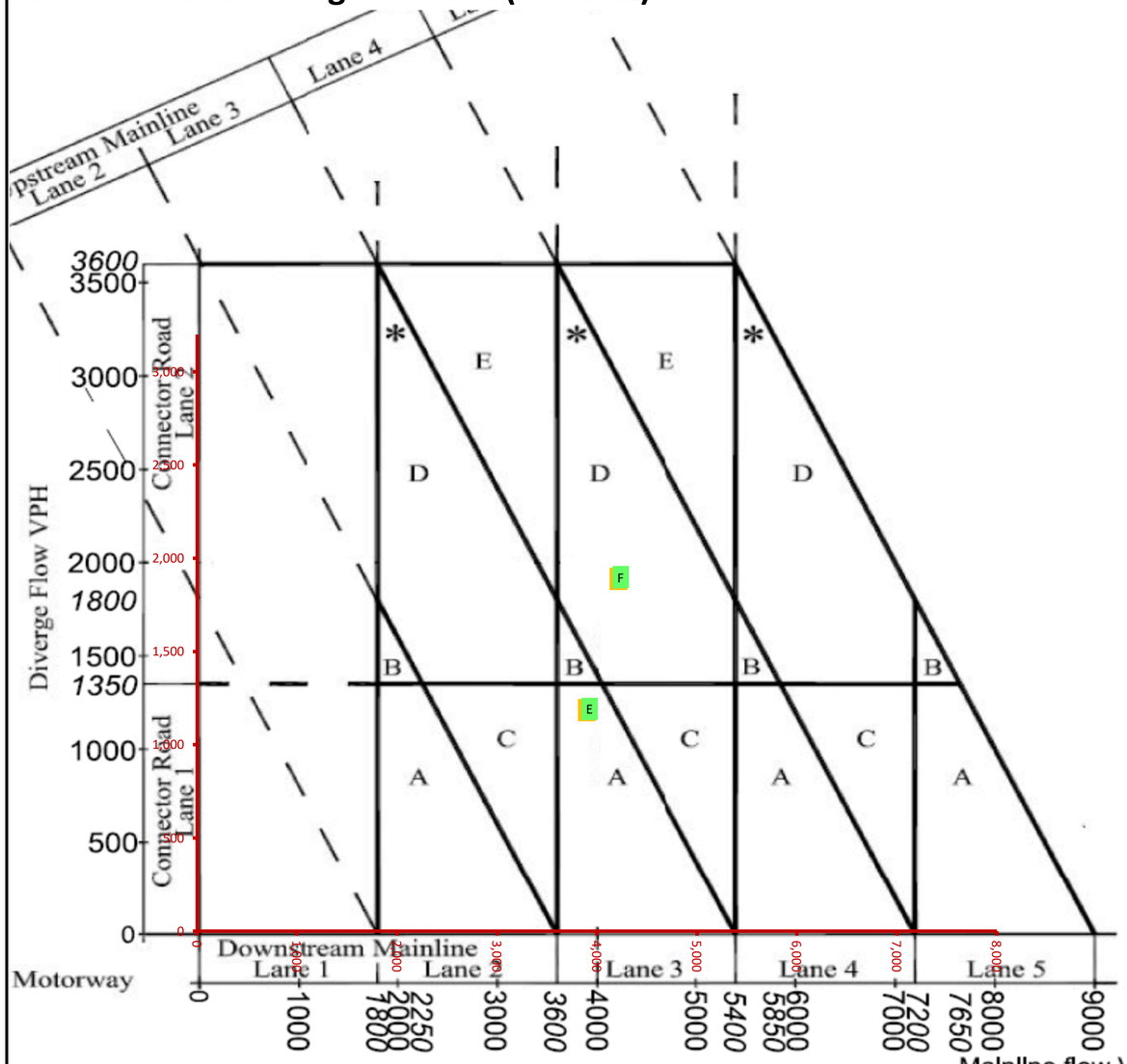
J3 northbound diverge - with LTC (DEMAND)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			3,898	1.00	1,185	1.00
B	Ref no LTC PM			4,214	1.00	1,889	1.00
C	Ref with LTC AM	3,671	1,116	3,671	1.00	1,116	1.00
D	Ref with LTC PM	4,095	1,836	4,095	1.00	1,836	1.00
E	LP Scenario no LTC AM			3,925	1.00	1,193	1.00
F	LP Scenario no LTC PM			4,235	1.00	1,898	1.00
G	LP Scenario with LTC AM	3,699	1,125	3,699	1.00	1,125	1.00
H	LP Scenario with LTC PM	4,115	1,845	4,115	1.00	1,845	1.00

SENSITIVITY ASSESSMENT

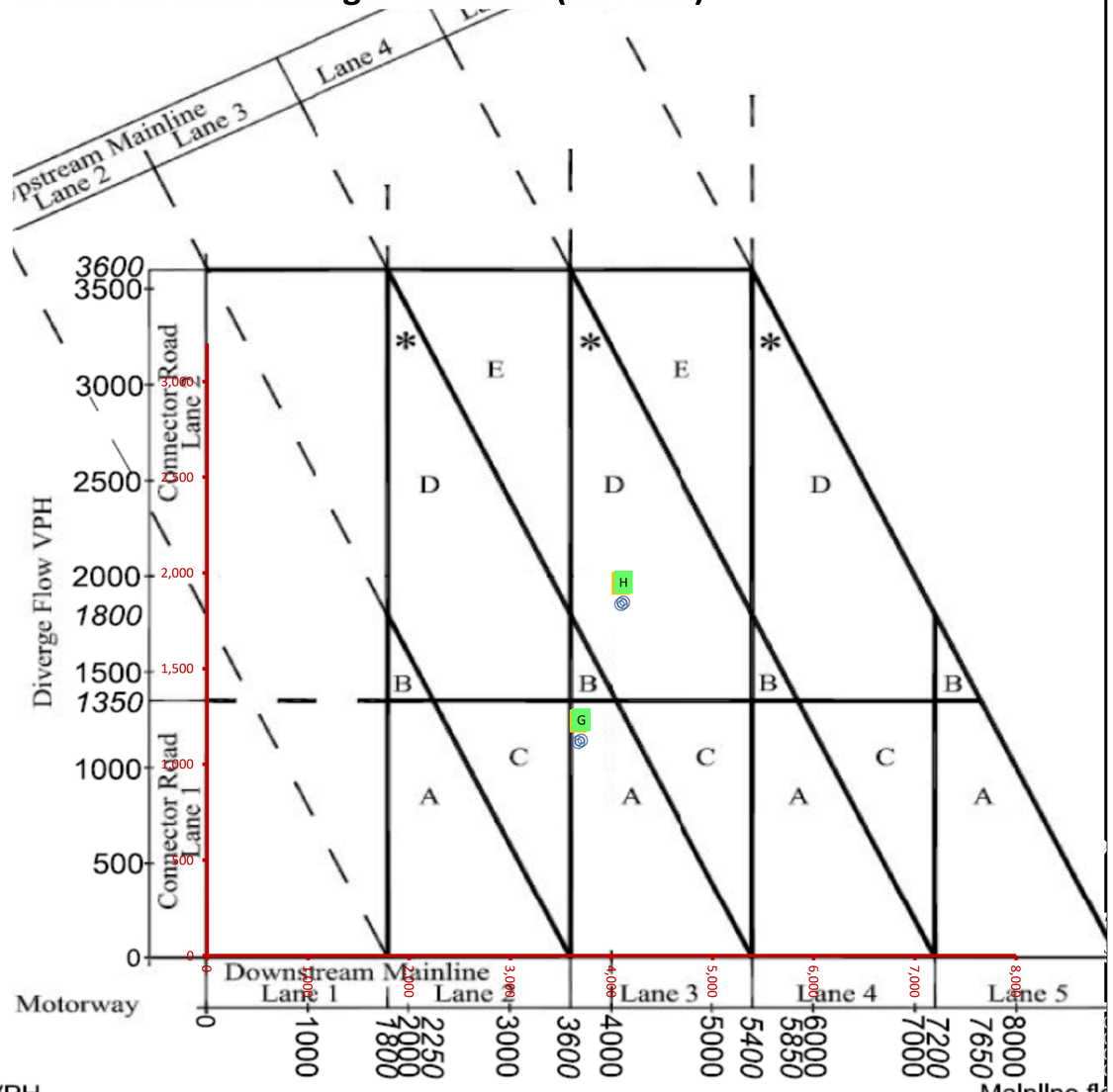
J3 northbound diverge - no LTC (ACTUAL)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	3,898	1,185	3,898	1.00	1,185	1.00
B	Ref no LTC PM	4,214	1,889	4,214	1.00	1,889	1.00
C	Ref with LTC AM			3,671	1.00	1,116	1.00
D	Ref with LTC PM			4,095	1.00	1,836	1.00
E	LP Scenario no LTC AM	3,925	1,193	3,925	1.00	1,193	1.00
F	LP Scenario no LTC PM	4,235	1,898	4,235	1.00	1,898	1.00
G	LP Scenario with LTC AM			3,699	1.00	1,125	1.00
H	LP Scenario with LTC PM			4,115	1.00	1,845	1.00

SENSITIVITY ASSESSMENT

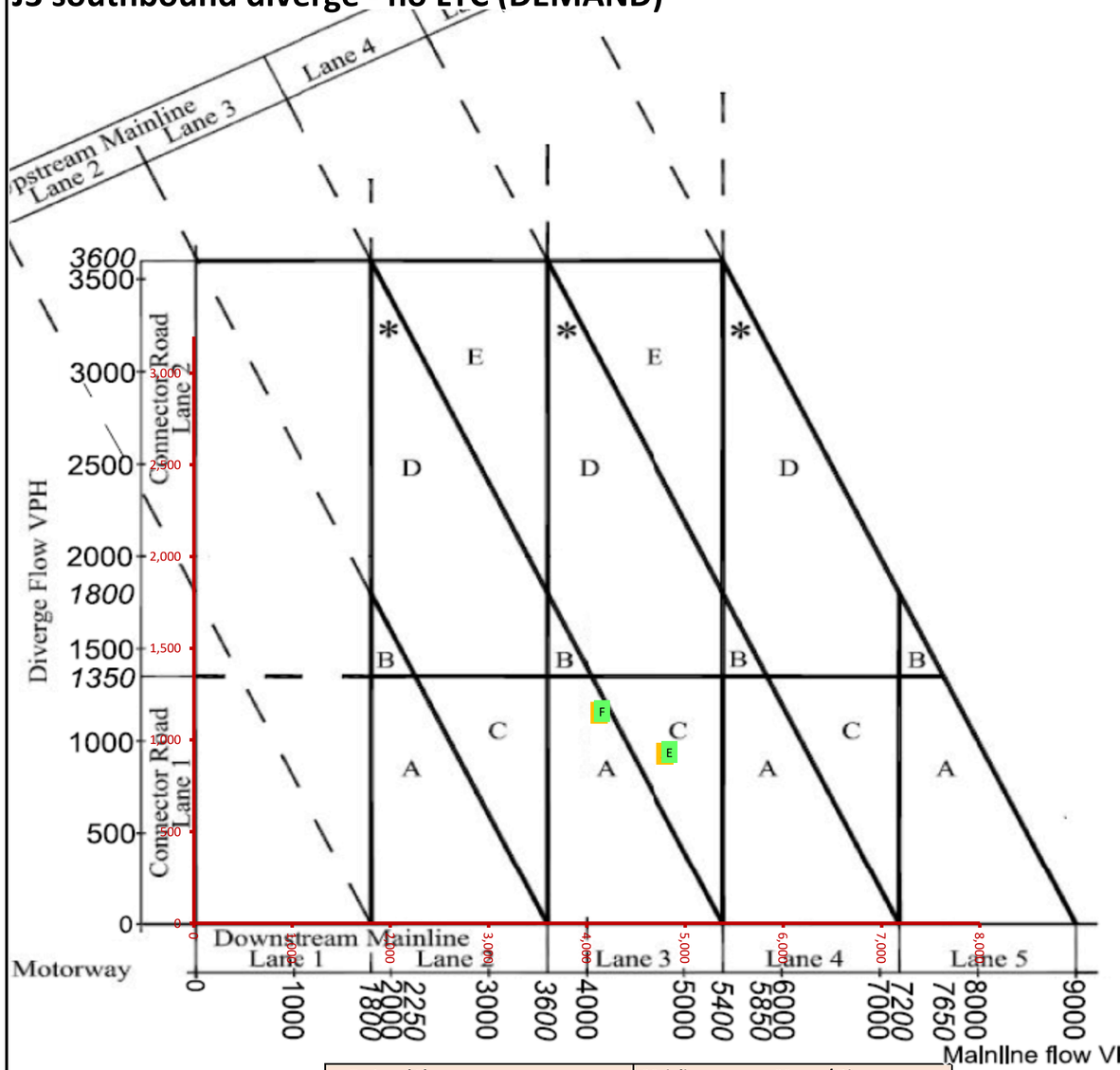
J3 northbound diverge - with LTC (ACTUAL)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			3,898	1.00	1,185	1.00
B	Ref no LTC PM			4,214	1.00	1,889	1.00
C	Ref with LTC AM	3,671	1,116	3,671	1.00	1,116	1.00
D	Ref with LTC PM	4,095	1,836	4,095	1.00	1,836	1.00
E	LP Scenario no LTC AM			3,925	1.00	1,193	1.00
F	LP Scenario no LTC PM			4,235	1.00	1,898	1.00
G	LP Scenario with LTC AM	3,699	1,125	3,699	1.00	1,125	1.00
H	LP Scenario with LTC PM	4,115	1,845	4,115	1.00	1,845	1.00

SENSITIVITY ASSESSMENT

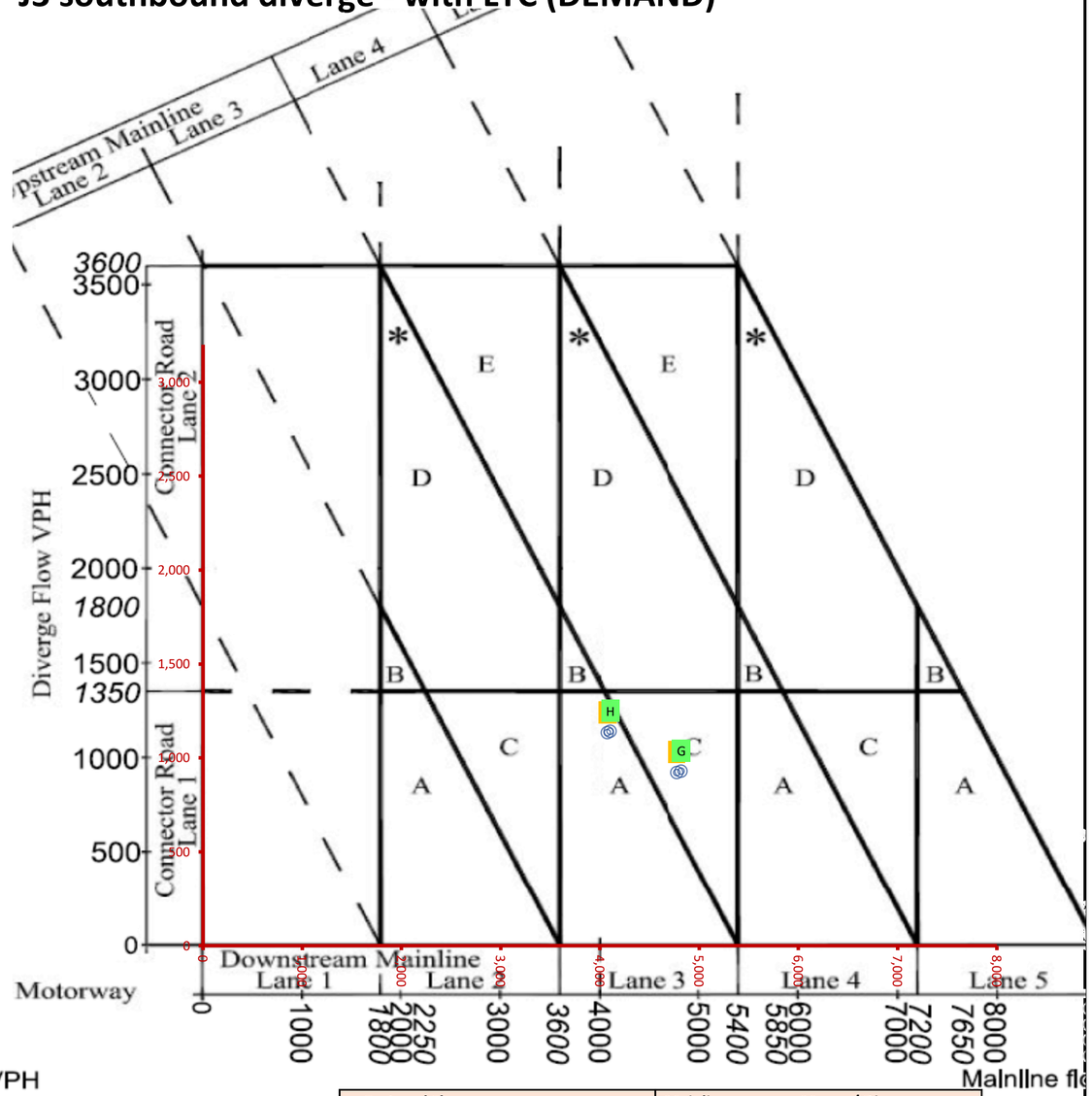
J3 southbound diverge - no LTC (DEMAND)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,795	926	4,795	1.00	926	1.00
B	Ref no LTC PM	4,126	1,148	4,126	1.00	1,148	1.00
C	Ref with LTC AM			4,772	1.00	921	1.00
D	Ref with LTC PM			4,074	1.00	1,133	1.00
E	LP Scenario no LTC AM	4,842	935	4,842	1.00	935	1.00
F	LP Scenario no LTC PM	4,155	1,156	4,155	1.00	1,156	1.00
G	LP Scenario with LTC AM			4,818	1.00	930	1.00
H	LP Scenario with LTC PM			4,103	1.00	1,142	1.00

SENSITIVITY ASSESSMENT

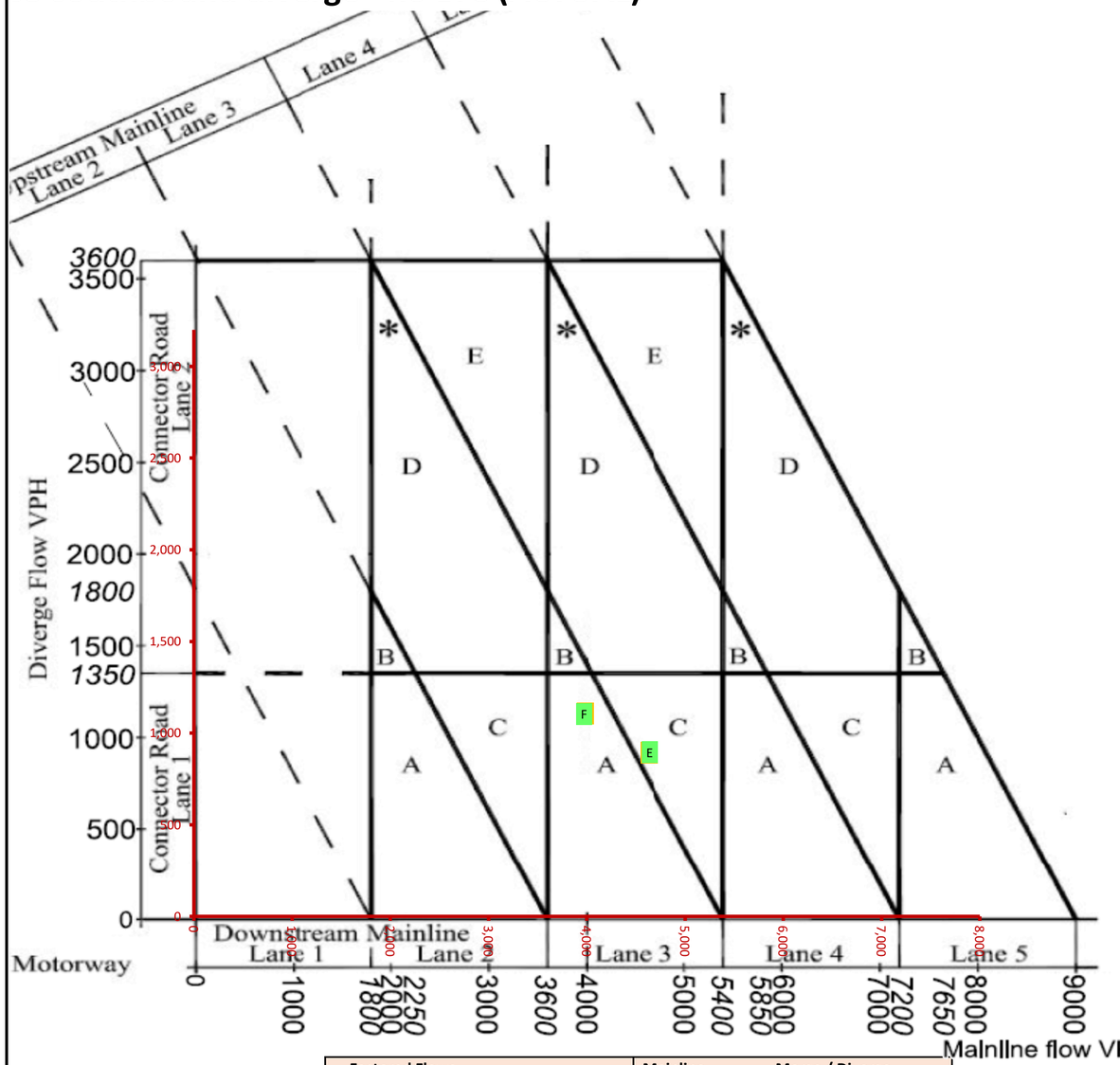
J3 southbound diverge - with LTC (DEMAND)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,795	1.00	926	1.00
B	Ref no LTC PM			4,126	1.00	1,148	1.00
C	Ref with LTC AM	4,772	921	4,772	1.00	921	1.00
D	Ref with LTC PM	4,074	1,133	4,074	1.00	1,133	1.00
E	LP Scenario no LTC AM			4,842	1.00	935	1.00
F	LP Scenario no LTC PM			4,155	1.00	1,156	1.00
G	LP Scenario with LTC AM	4,818	930	4,818	1.00	930	1.00
H	LP Scenario with LTC PM	4,103	1,142	4,103	1.00	1,142	1.00

SENSITIVITY ASSESSMENT

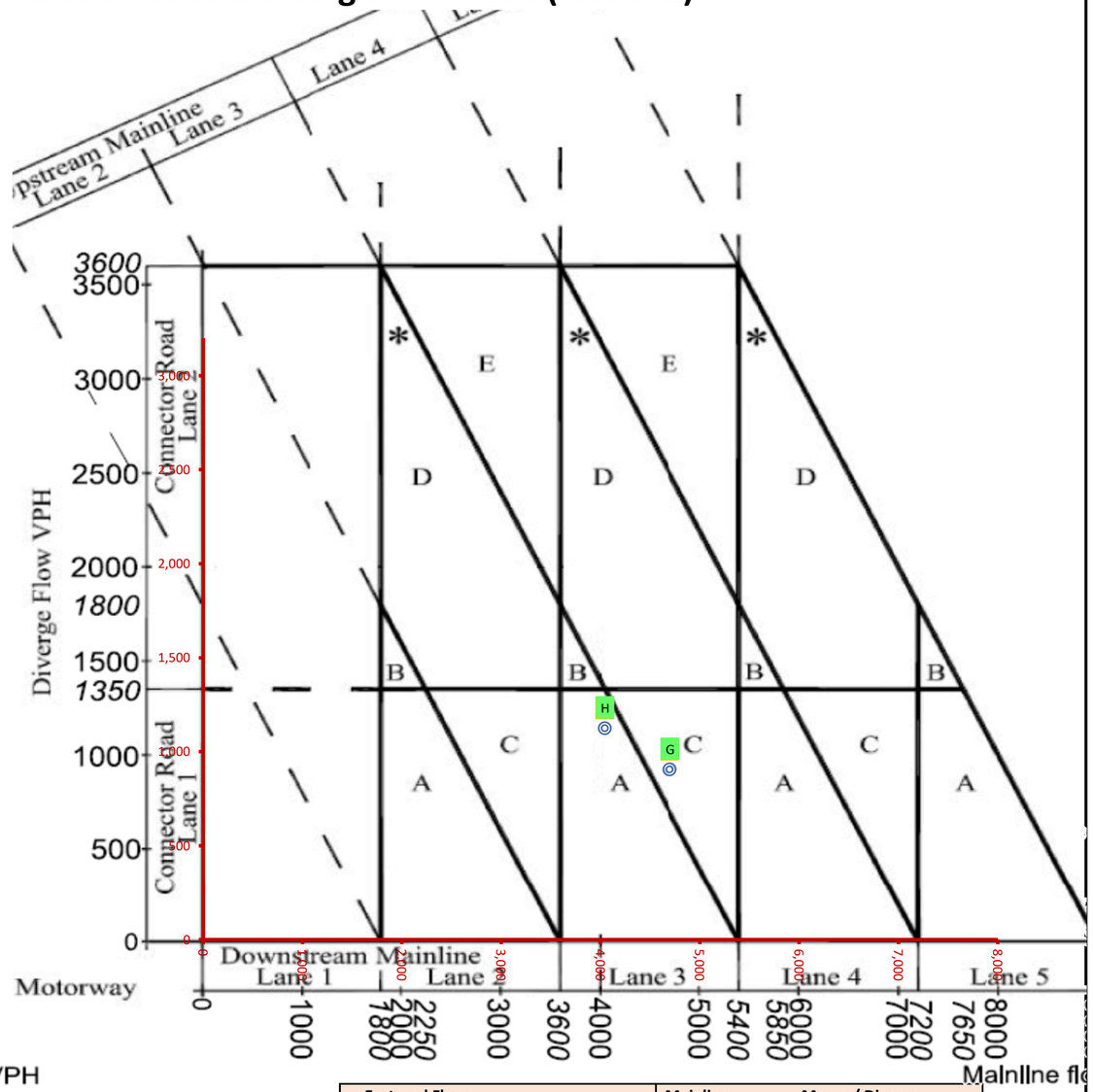
J3 southbound diverge - no LTC (ACTUAL)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,633	894	4,633	1.00	894	1.00
B	Ref no LTC PM	3,982	1,108	3,982	1.00	1,108	1.00
C	Ref with LTC AM			4,690	1.00	905	1.00
D	Ref with LTC PM			4,040	1.00	1,124	1.00
E	LP Scenario no LTC AM	4,641	896	4,641	1.00	896	1.00
F	LP Scenario no LTC PM	3,970	1,105	3,970	1.00	1,105	1.00
G	LP Scenario with LTC AM			4,699	1.00	907	1.00
H	LP Scenario with LTC PM			4,045	1.00	1,125	1.00

SENSITIVITY ASSESSMENT

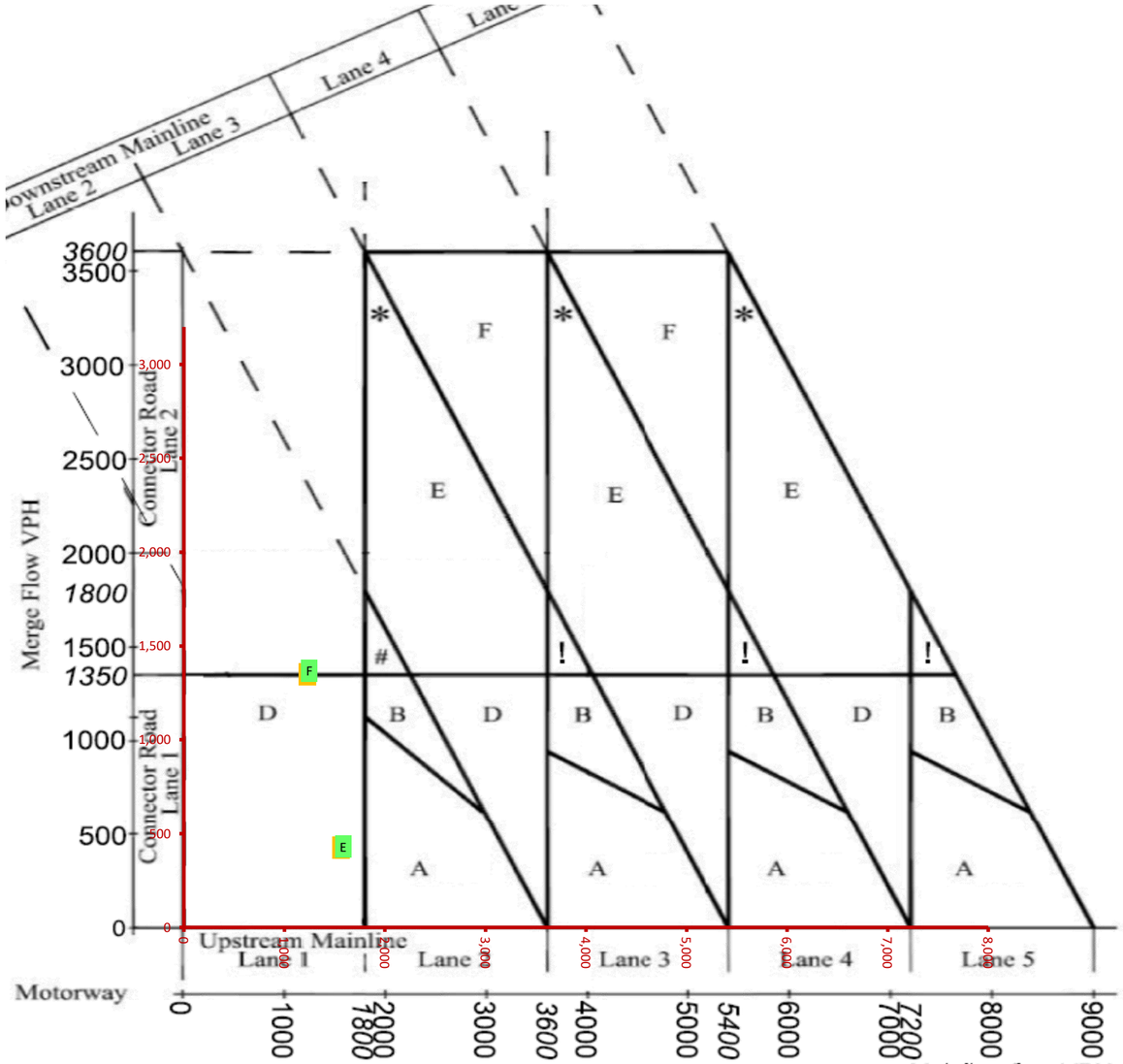
J3 southbound diverge - with LTC (ACTUAL)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,633	1.00	894	1.00
B	Ref no LTC PM			3,982	1.00	1,108	1.00
C	Ref with LTC AM	4,690	905	4,690	1.00	905	1.00
D	Ref with LTC PM	4,040	1,124	4,040	1.00	1,124	1.00
E	LP Scenario no LTC AM			4,641	1.00	896	1.00
F	LP Scenario no LTC PM			3,970	1.00	1,105	1.00
G	LP Scenario with LTC AM	4,699	907	4,699	1.00	907	1.00
H	LP Scenario with LTC PM	4,045	1,125	4,045	1.00	1,125	1.00

SENSITIVITY ASSESSMENT

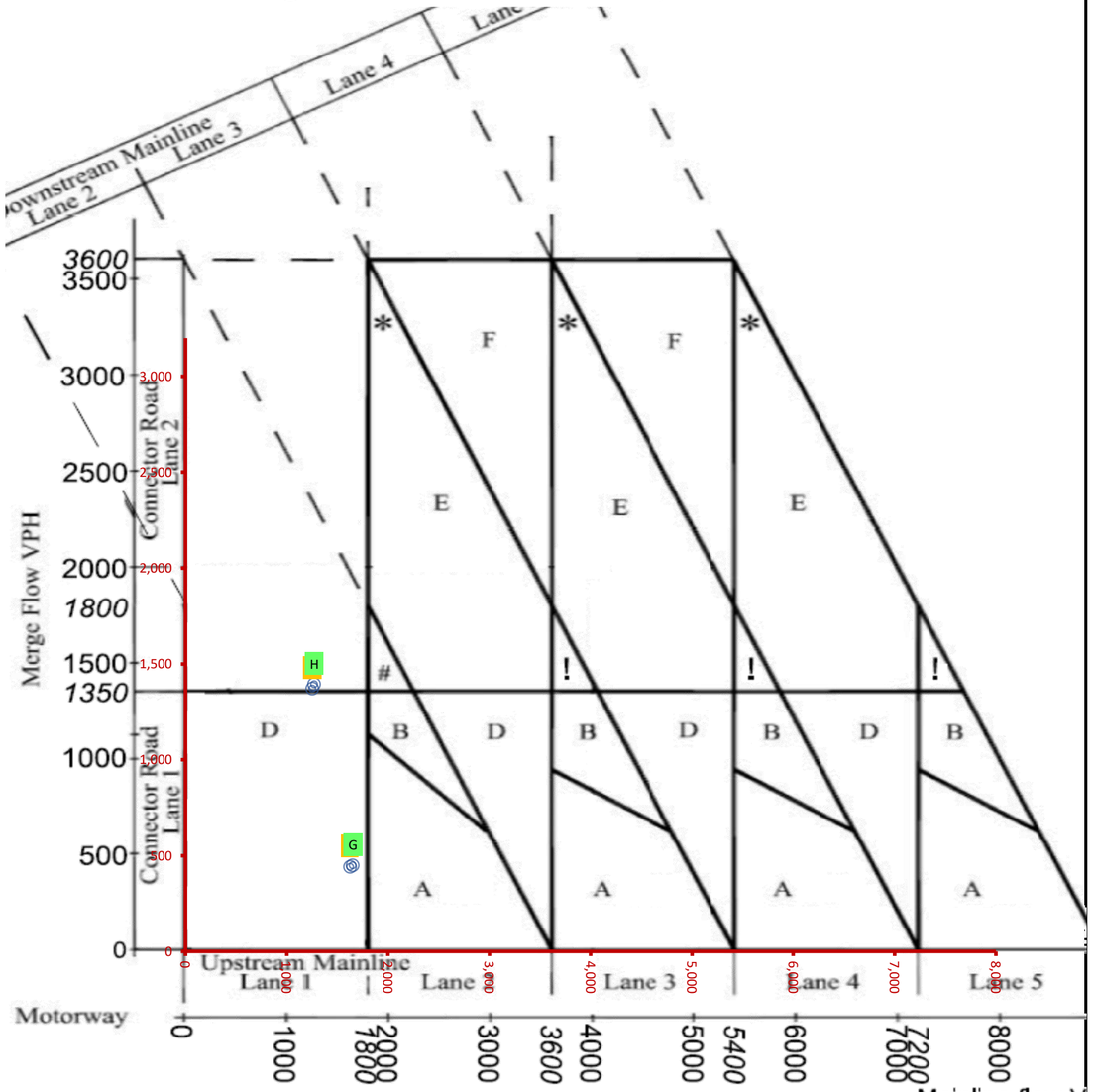
J3 eastbound merge - no LTC (DEMAND)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	1,559	425	1,559	1.00	425	1.00
B	Ref no LTC PM	1,228	1,348	1,228	1.00	1,348	1.00
C	Ref with LTC AM			1,623	1.00	442	1.00
D	Ref with LTC PM			1,249	1.00	1,371	1.00
E	LP Scenario no LTC AM	1,585	432	1,585	1.00	432	1.00
F	LP Scenario no LTC PM	1,247	1,369	1,247	1.00	1,369	1.00
G	LP Scenario with LTC AM			1,650	1.00	449	1.00
H	LP Scenario with LTC PM			1,269	1.00	1,393	1.00

SENSITIVITY ASSESSMENT

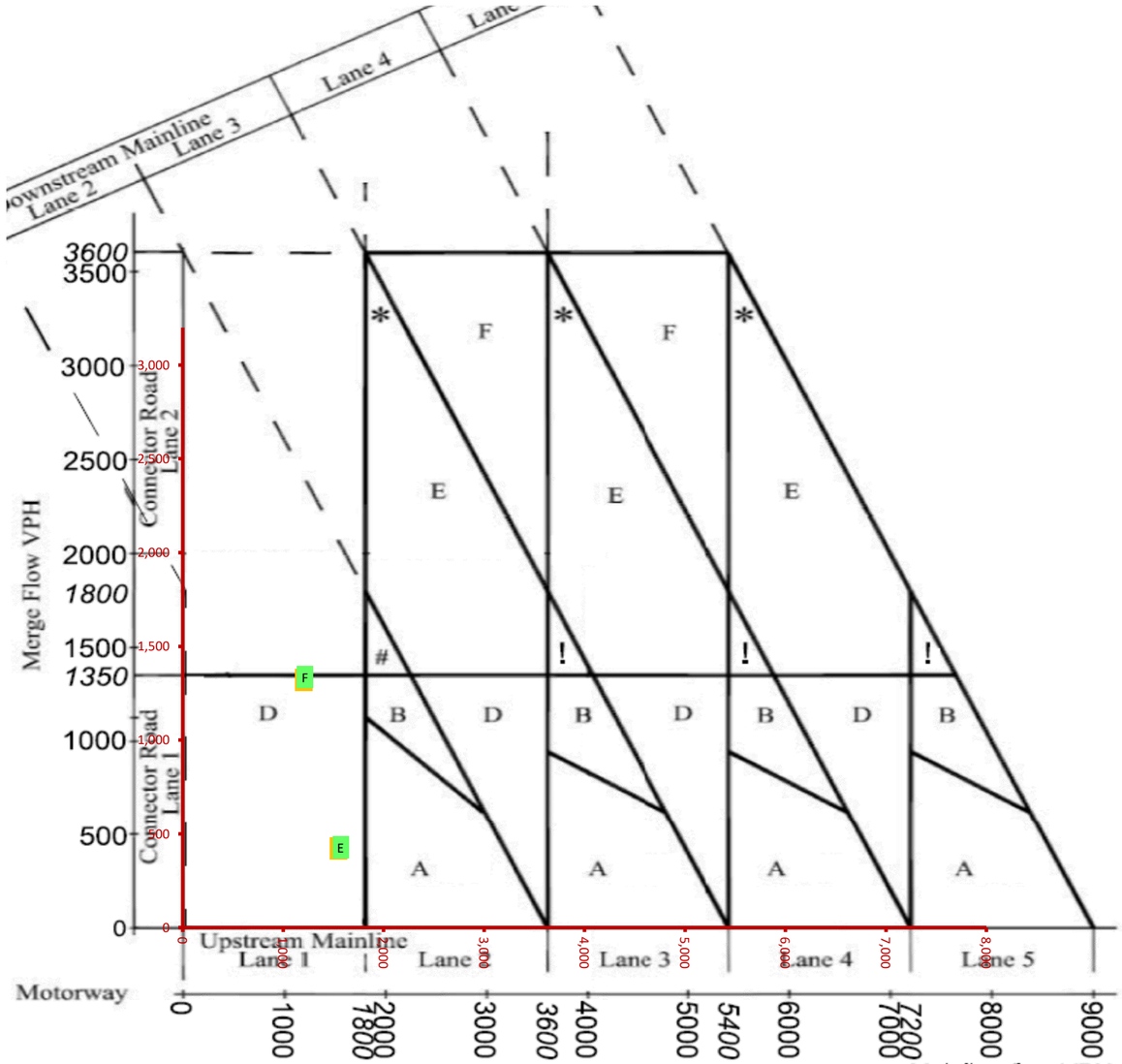
J3 eastbound merge - with LTC (DEMAND)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			1,559	1.00	425	1.00
B	Ref no LTC PM			1,228	1.00	1,348	1.00
C	Ref with LTC AM	1,623	442	1,623	1.00	442	1.00
D	Ref with LTC PM	1,249	1,371	1,249	1.00	1,371	1.00
E	LP Scenario no LTC AM			1,585	1.00	432	1.00
F	LP Scenario no LTC PM			1,247	1.00	1,369	1.00
G	LP Scenario with LTC AM	1,650	449	1,650	1.00	449	1.00
H	LP Scenario with LTC PM	1,269	1,393	1,269	1.00	1,393	1.00

SENSITIVITY ASSESSMENT

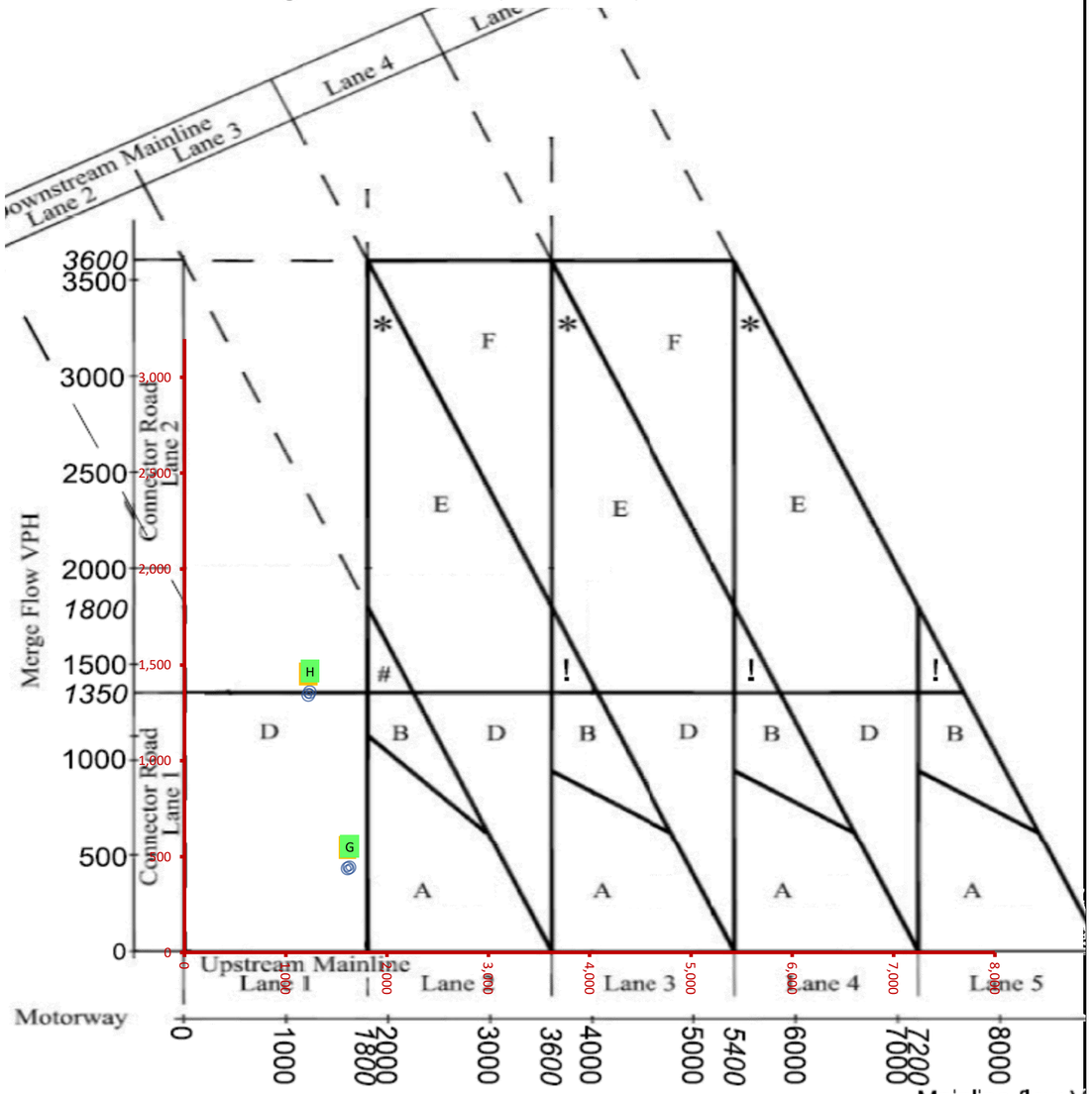
J3 eastbound merge - no LTC (ACTUAL)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	1,550	422	1,550	1.00	422	1.00
B	Ref no LTC PM	1,202	1,320	1,202	1.00	1,320	1.00
C	Ref with LTC AM			1,609	1.00	438	1.00
D	Ref with LTC PM			1,224	1.00	1,343	1.00
E	LP Scenario no LTC AM	1,572	428	1,572	1.00	428	1.00
F	LP Scenario no LTC PM	1,217	1,336	1,217	1.00	1,336	1.00
G	LP Scenario with LTC AM			1,629	1.00	444	1.00
H	LP Scenario with LTC PM			1,237	1.00	1,358	1.00

SENSITIVITY ASSESSMENT

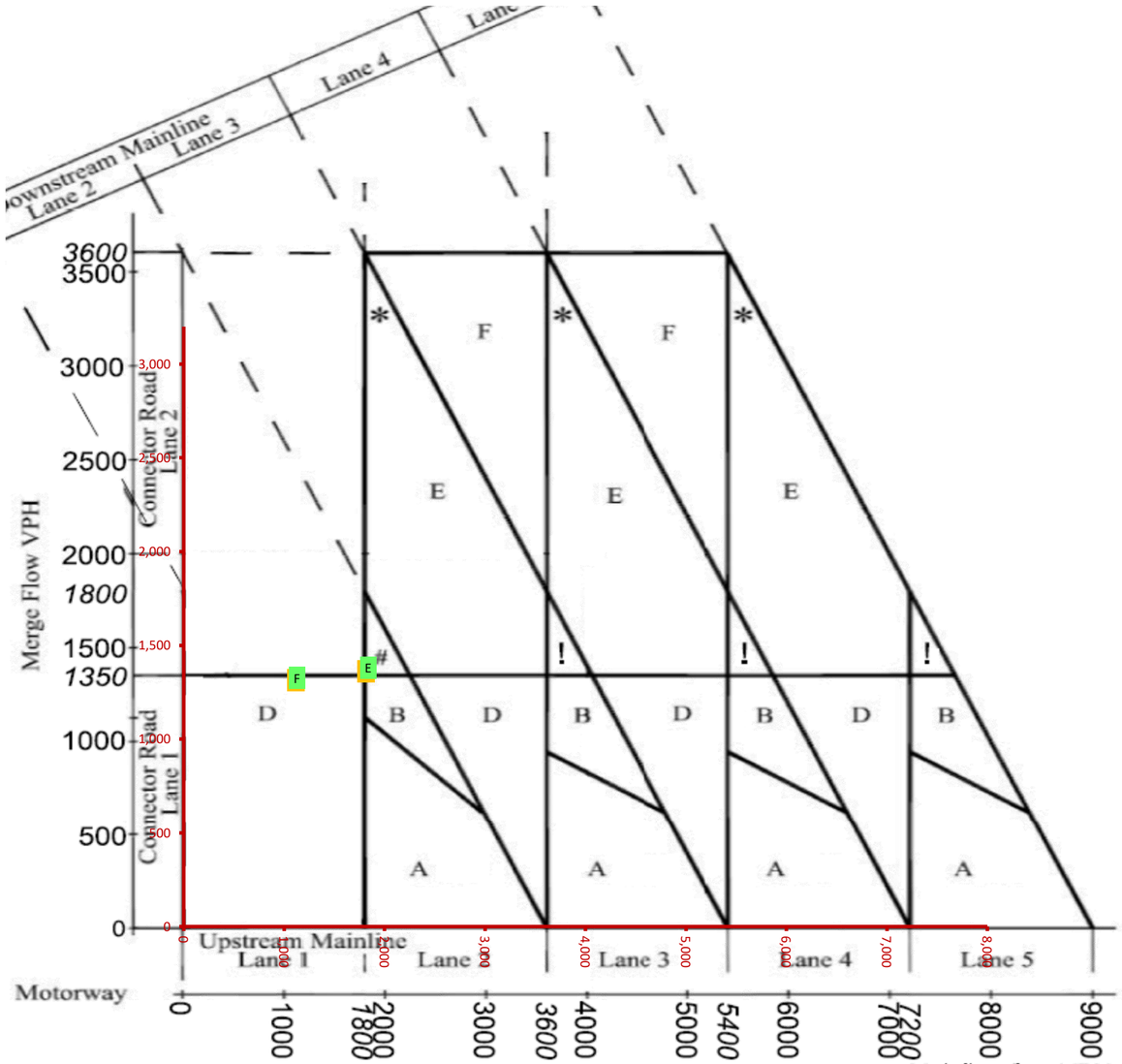
J3 eastbound merge - with LTC (ACTUAL)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			1,550	1.00	422	1.00
B	Ref no LTC PM			1,202	1.00	1,320	1.00
C	Ref with LTC AM	1,609	438	1,609	1.00	438	1.00
D	Ref with LTC PM	1,224	1,343	1,224	1.00	1,343	1.00
E	LP Scenario no LTC AM			1,572	1.00	428	1.00
F	LP Scenario no LTC PM			1,217	1.00	1,336	1.00
G	LP Scenario with LTC AM	1,629	444	1,629	1.00	444	1.00
H	LP Scenario with LTC PM	1,237	1,358	1,237	1.00	1,358	1.00

SENSITIVITY ASSESSMENT

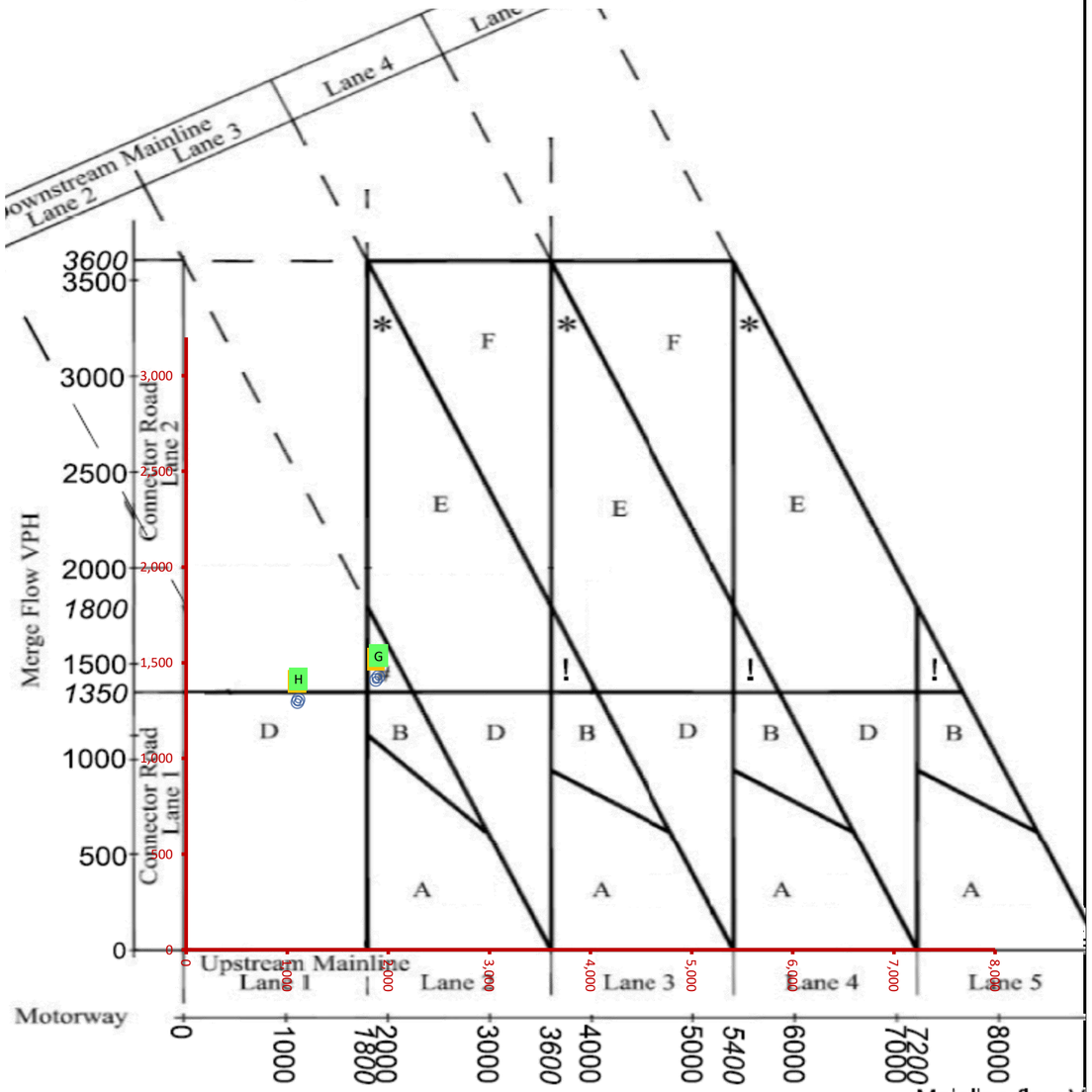
J3 westbound merge - no LTC (DEMAND)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	1,813	1,362	1,813	1.00	1,362	1.00
B	Ref no LTC PM	1,115	1,313	1,115	1.00	1,313	1.00
C	Ref with LTC AM			1,875	1.00	1,409	1.00
D	Ref with LTC PM			1,098	1.00	1,294	1.00
E	LP Scenario no LTC AM	1,838	1,381	1,838	1.00	1,381	1.00
F	LP Scenario no LTC PM	1,126	1,327	1,126	1.00	1,327	1.00
G	LP Scenario with LTC AM			1,900	1.00	1,427	1.00
H	LP Scenario with LTC PM			1,109	1.00	1,307	1.00

SENSITIVITY ASSESSMENT

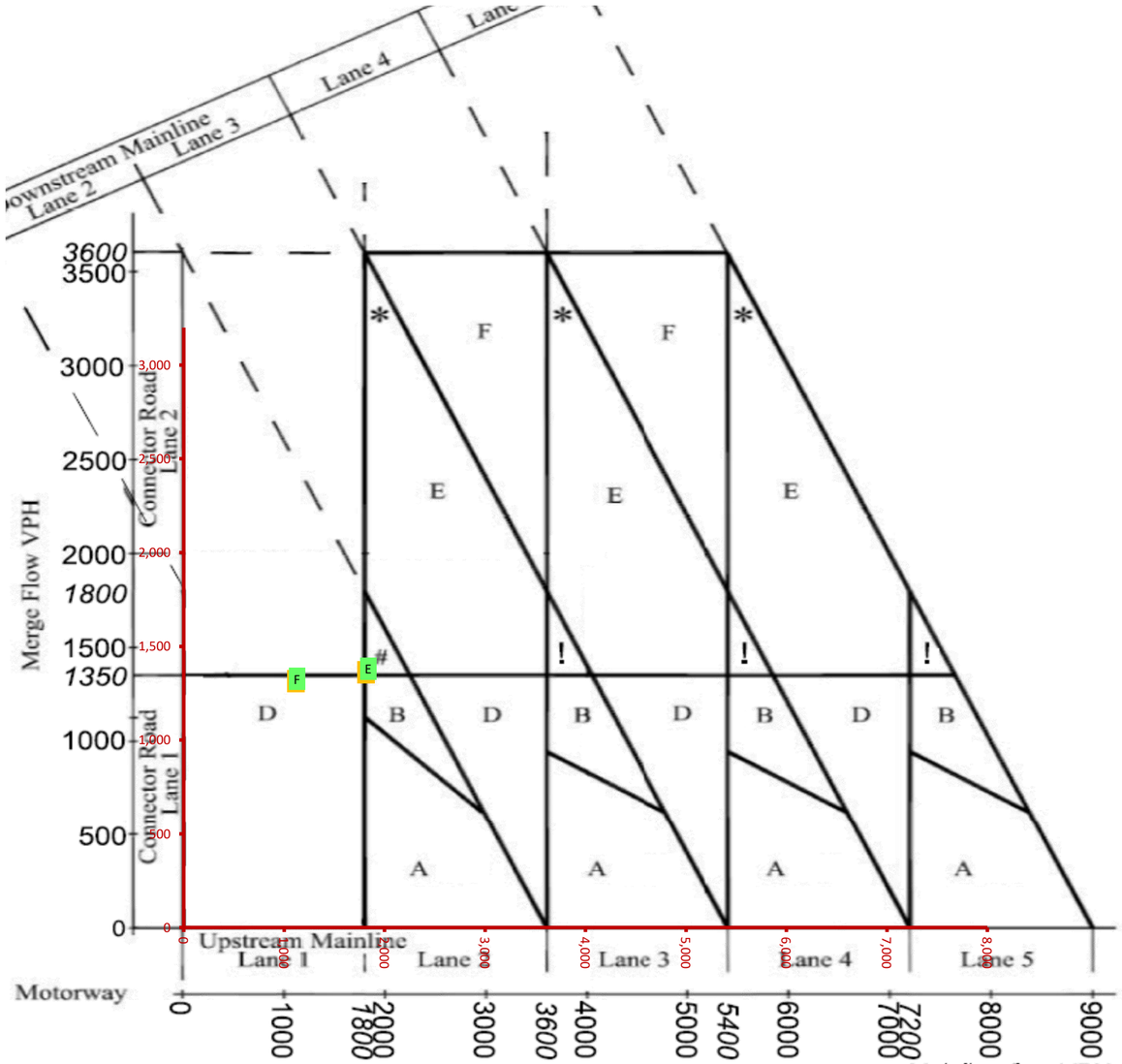
J3 westbound merge - with LTC (DEMAND)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			1,813	1.00	1,362	1.00
B	Ref no LTC PM			1,115	1.00	1,313	1.00
C	Ref with LTC AM	1,875	1,409	1,875	1.00	1,409	1.00
D	Ref with LTC PM	1,098	1,294	1,098	1.00	1,294	1.00
E	LP Scenario no LTC AM			1,838	1.00	1,381	1.00
F	LP Scenario no LTC PM			1,126	1.00	1,327	1.00
G	LP Scenario with LTC AM	1,900	1,427	1,900	1.00	1,427	1.00
H	LP Scenario with LTC PM	1,109	1,307	1,109	1.00	1,307	1.00

SENSITIVITY ASSESSMENT

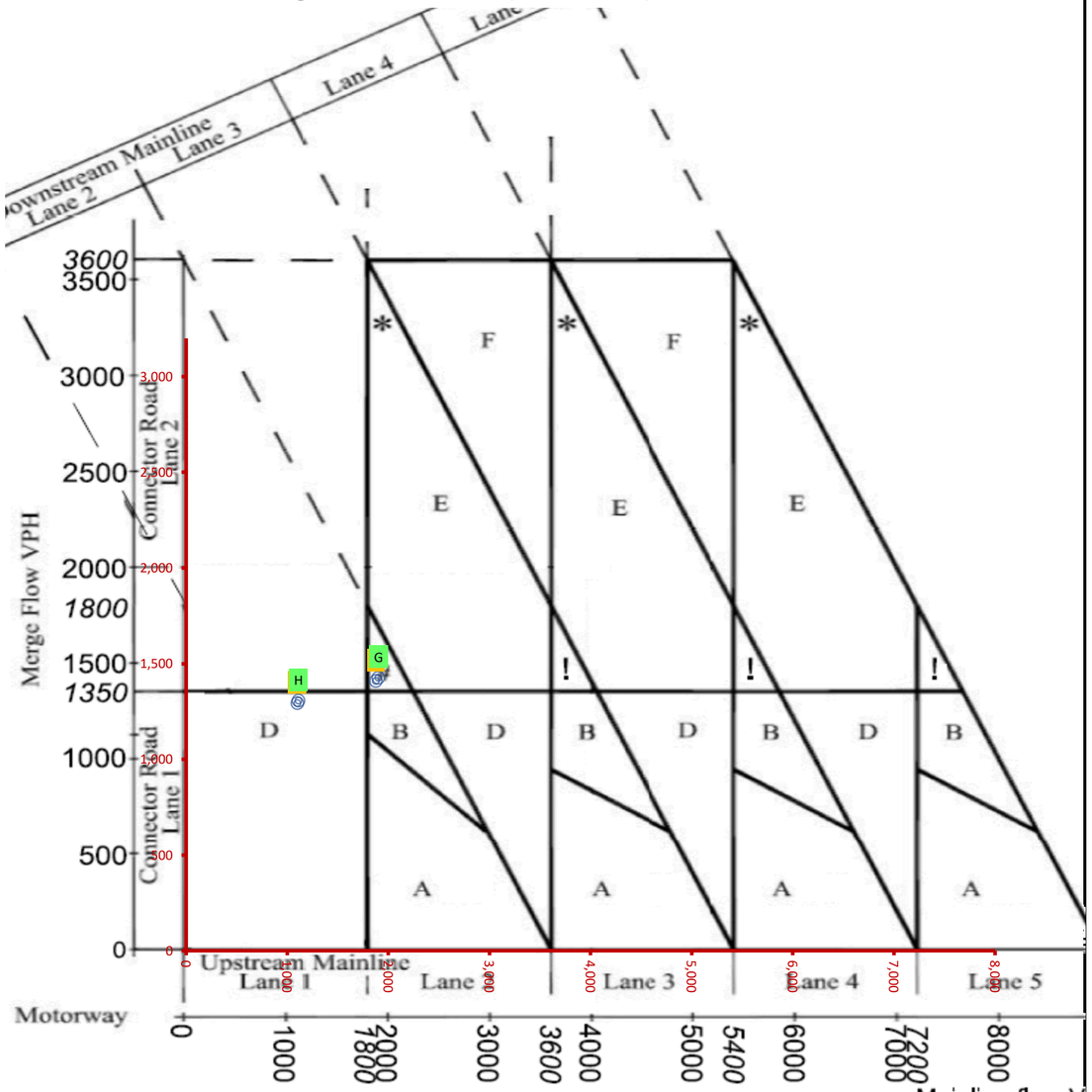
J3 westbound merge - no LTC (ACTUAL)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	1,813	1,362	1,813	1.00	1,362	1.00
B	Ref no LTC PM	1,115	1,313	1,115	1.00	1,313	1.00
C	Ref with LTC AM			1,875	1.00	1,409	1.00
D	Ref with LTC PM			1,098	1.00	1,294	1.00
E	LP Scenario no LTC AM	1,838	1,381	1,838	1.00	1,381	1.00
F	LP Scenario no LTC PM	1,126	1,327	1,126	1.00	1,327	1.00
G	LP Scenario with LTC AM			1,900	1.00	1,427	1.00
H	LP Scenario with LTC PM			1,109	1.00	1,307	1.00

SENSITIVITY ASSESSMENT

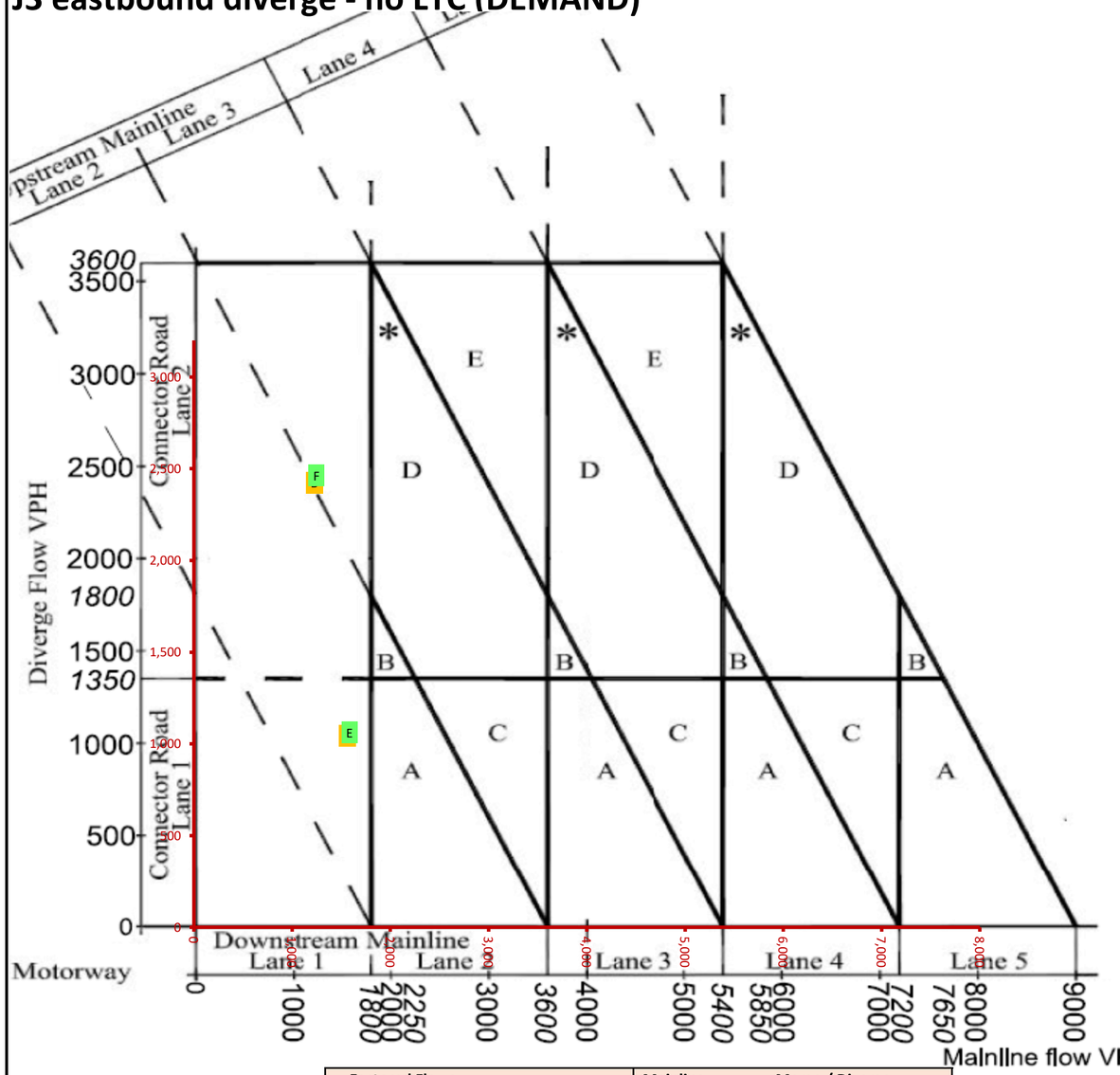
J3 westbound merge - with LTC (ACTUAL)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			1,813	1.00	1,362	1.00
B	Ref no LTC PM			1,115	1.00	1,313	1.00
C	Ref with LTC AM	1,875	1,409	1,875	1.00	1,409	1.00
D	Ref with LTC PM	1,098	1,294	1,098	1.00	1,294	1.00
E	LP Scenario no LTC AM			1,838	1.00	1,381	1.00
F	LP Scenario no LTC PM			1,126	1.00	1,327	1.00
G	LP Scenario with LTC AM	1,900	1,427	1,900	1.00	1,427	1.00
H	LP Scenario with LTC PM	1,109	1,307	1,109	1.00	1,307	1.00

SENSITIVITY ASSESSMENT

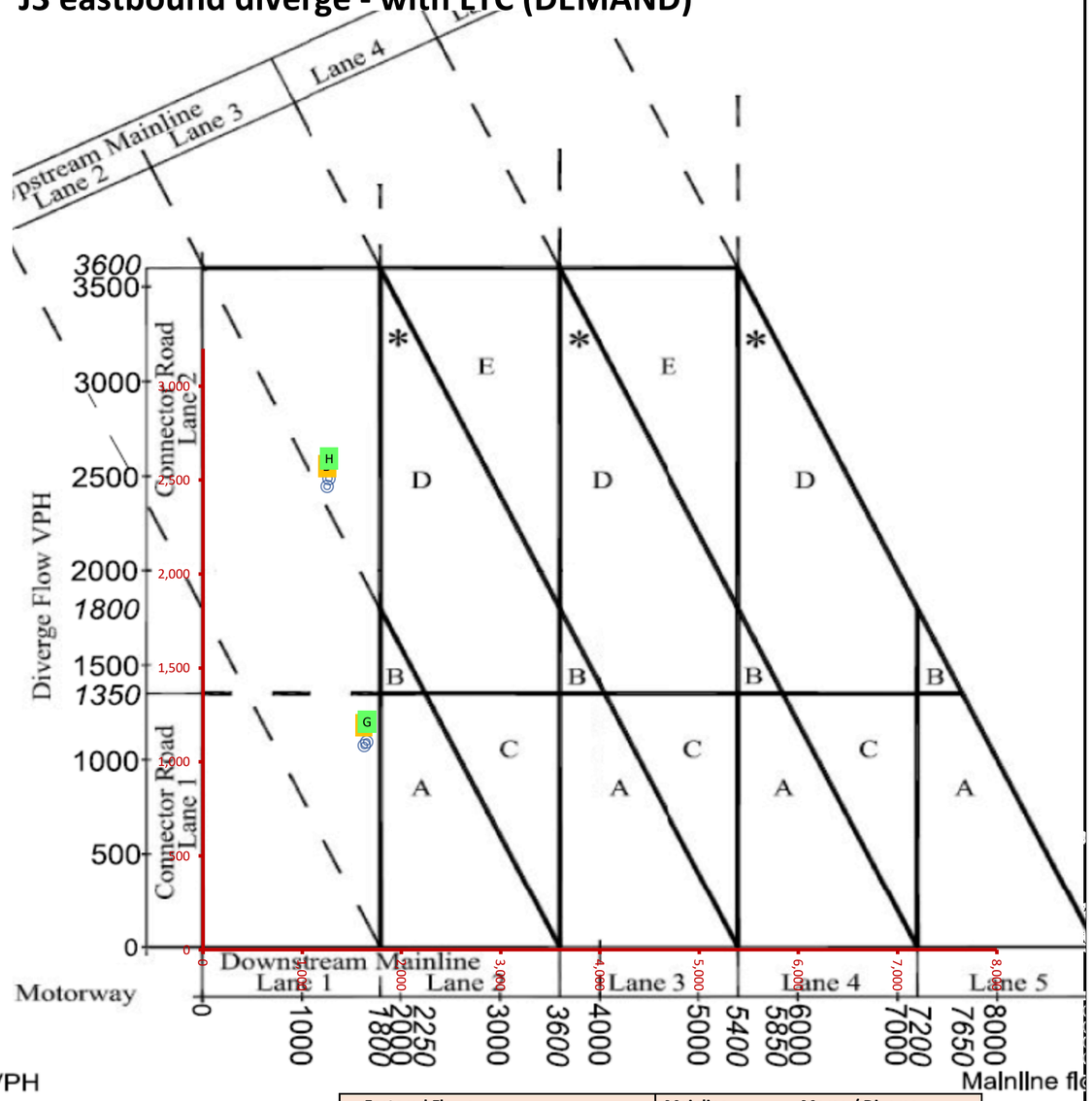
J3 eastbound diverge - no LTC (DEMAND)



Scenario		Factored Flows		Mainline	Merge / Diverge		
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	1,559	1,045	1,559	1.00	1,045	1.00
B	Ref no LTC PM	1,228	2,425	1,228	1.00	2,425	1.00
C	Ref with LTC AM			1,623	1.00	1,087	1.00
D	Ref with LTC PM			1,249	1.00	2,467	1.00
E	LP Scenario no LTC AM	1,585	1,062	1,585	1.00	1,062	1.00
F	LP Scenario no LTC PM	1,247	2,464	1,247	1.00	2,464	1.00
G	LP Scenario with LTC AM			1,650	1.00	1,106	1.00
H	LP Scenario with LTC PM			1,269	1.00	2,507	1.00

SENSITIVITY ASSESSMENT

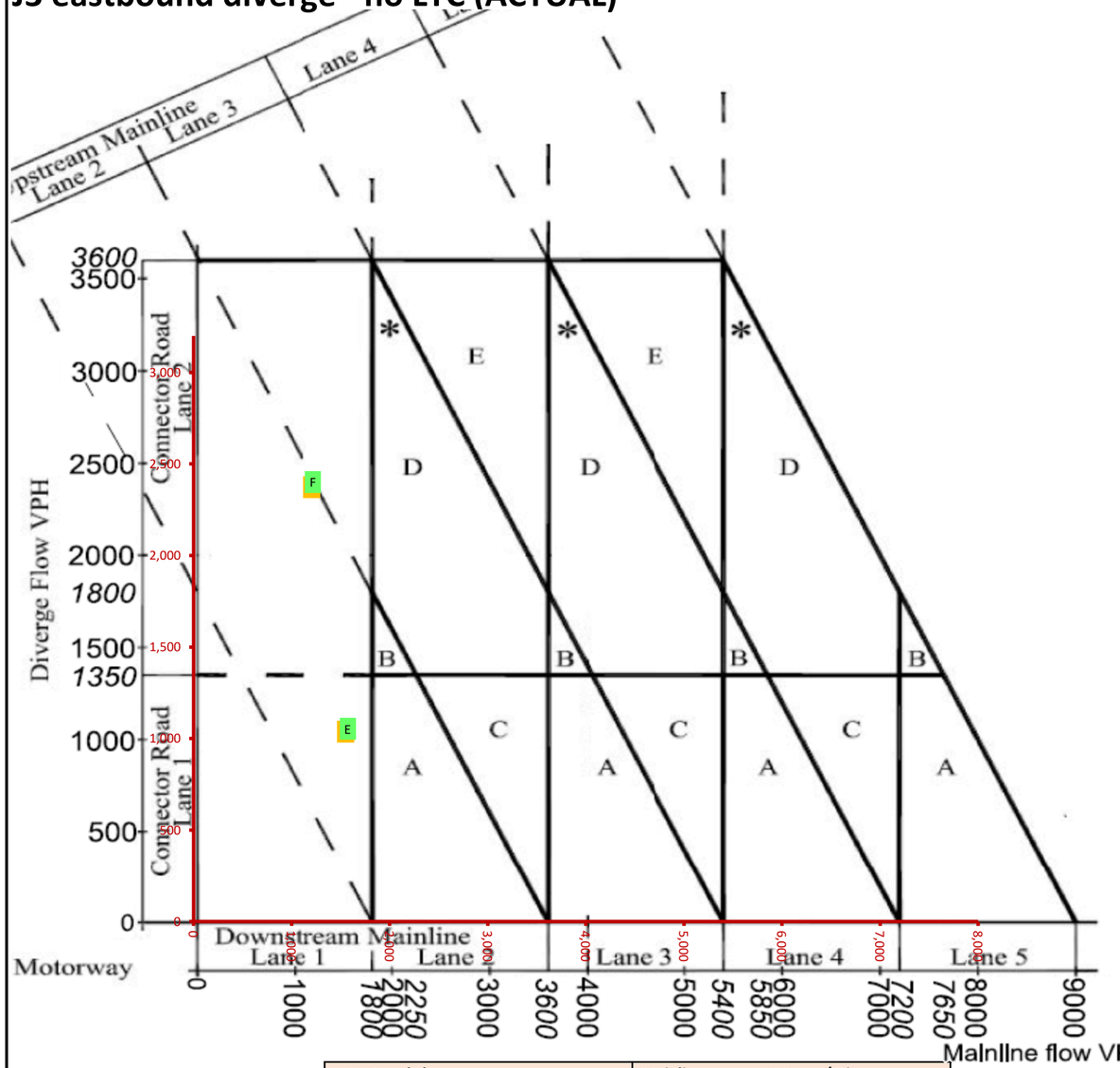
J3 eastbound diverge - with LTC (DEMAND)



Scenario		Factored Flows		Mainline	Merge / Diverge		
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			1,559	1.00	1,045	1.00
B	Ref no LTC PM			1,228	1.00	2,425	1.00
C	Ref with LTC AM	1,623	1,087	1,623	1.00	1,087	1.00
D	Ref with LTC PM	1,249	2,467	1,249	1.00	2,467	1.00
E	LP Scenario no LTC AM			1,585	1.00	1,062	1.00
F	LP Scenario no LTC PM			1,247	1.00	2,464	1.00
G	LP Scenario with LTC AM	1,650	1,106	1,650	1.00	1,106	1.00
H	LP Scenario with LTC PM	1,269	2,507	1,269	1.00	2,507	1.00

SENSITIVITY ASSESSMENT

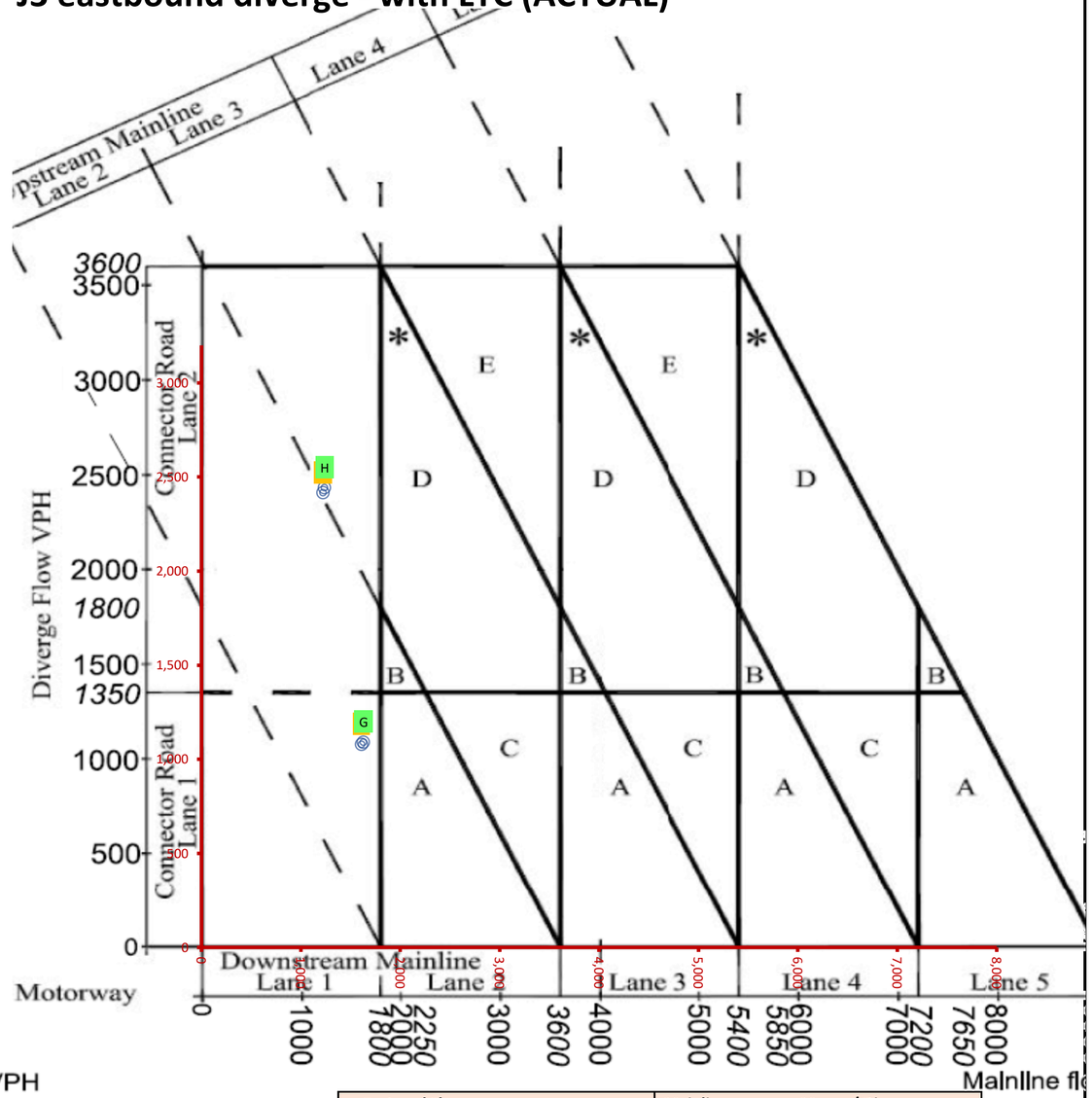
J3 eastbound diverge - no LTC (ACTUAL)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	1,550	1,039	1,550	1.00	1,039	1.00
B	Ref no LTC PM	1,202	2,374	1,202	1.00	2,374	1.00
C	Ref with LTC AM			1,609	1.00	1,078	1.00
D	Ref with LTC PM			1,224	1.00	2,417	1.00
E	LP Scenario no LTC AM	1,572	1,053	1,572	1.00	1,053	1.00
F	LP Scenario no LTC PM	1,217	2,403	1,217	1.00	2,403	1.00
G	LP Scenario with LTC AM			1,629	1.00	1,091	1.00
H	LP Scenario with LTC PM			1,237	1.00	2,443	1.00

SENSITIVITY ASSESSMENT

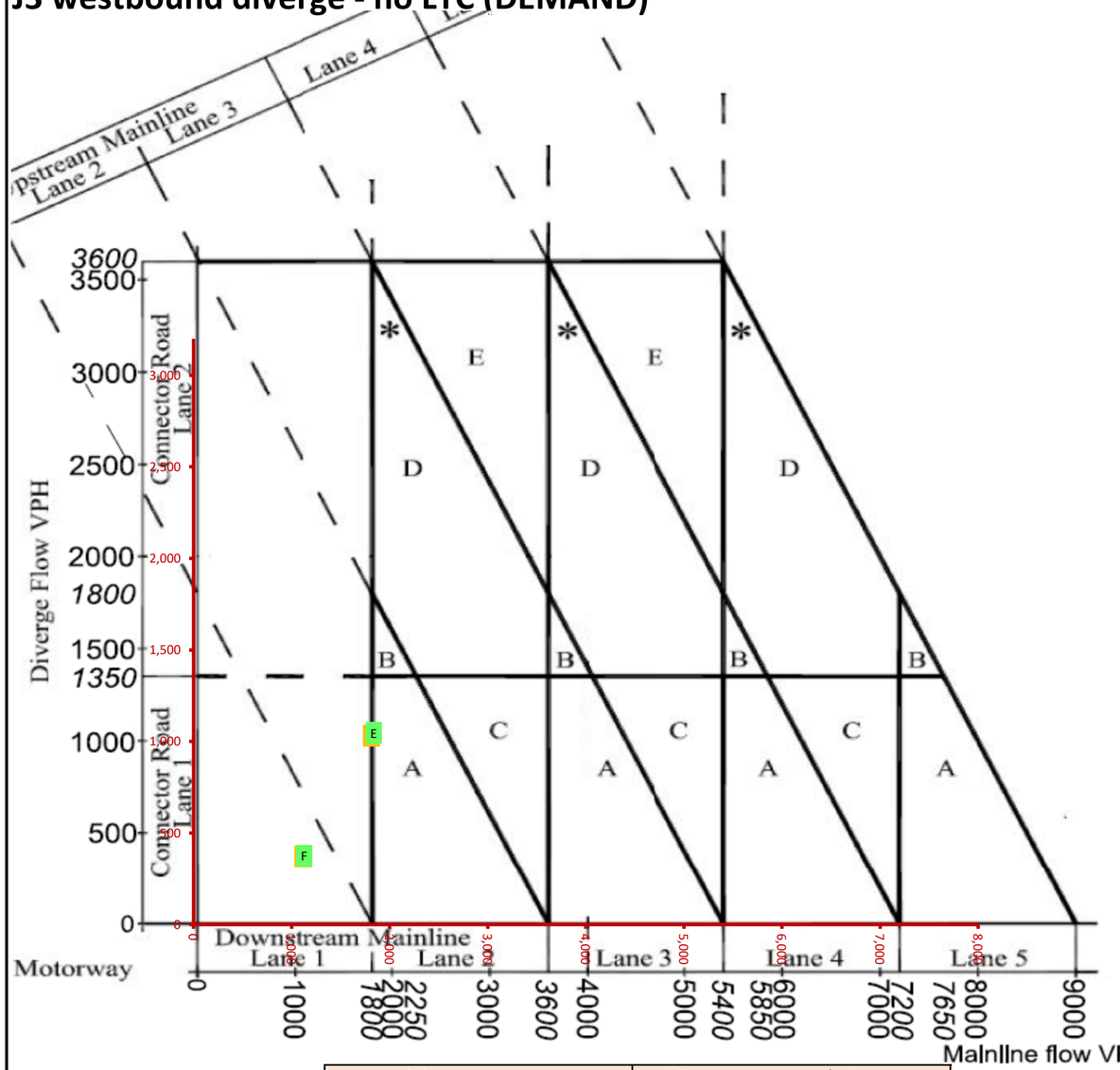
J3 eastbound diverge - with LTC (ACTUAL)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			1,550	1.00	1,039	1.00
B	Ref no LTC PM			1,202	1.00	2,374	1.00
C	Ref with LTC AM	1,609	1,078	1,609	1.00	1,078	1.00
D	Ref with LTC PM	1,224	2,417	1,224	1.00	2,417	1.00
E	LP Scenario no LTC AM			1,572	1.00	1,053	1.00
F	LP Scenario no LTC PM			1,217	1.00	2,403	1.00
G	LP Scenario with LTC AM	1,629	1,091	1,629	1.00	1,091	1.00
H	LP Scenario with LTC PM	1,237	2,443	1,237	1.00	2,443	1.00

SENSITIVITY ASSESSMENT

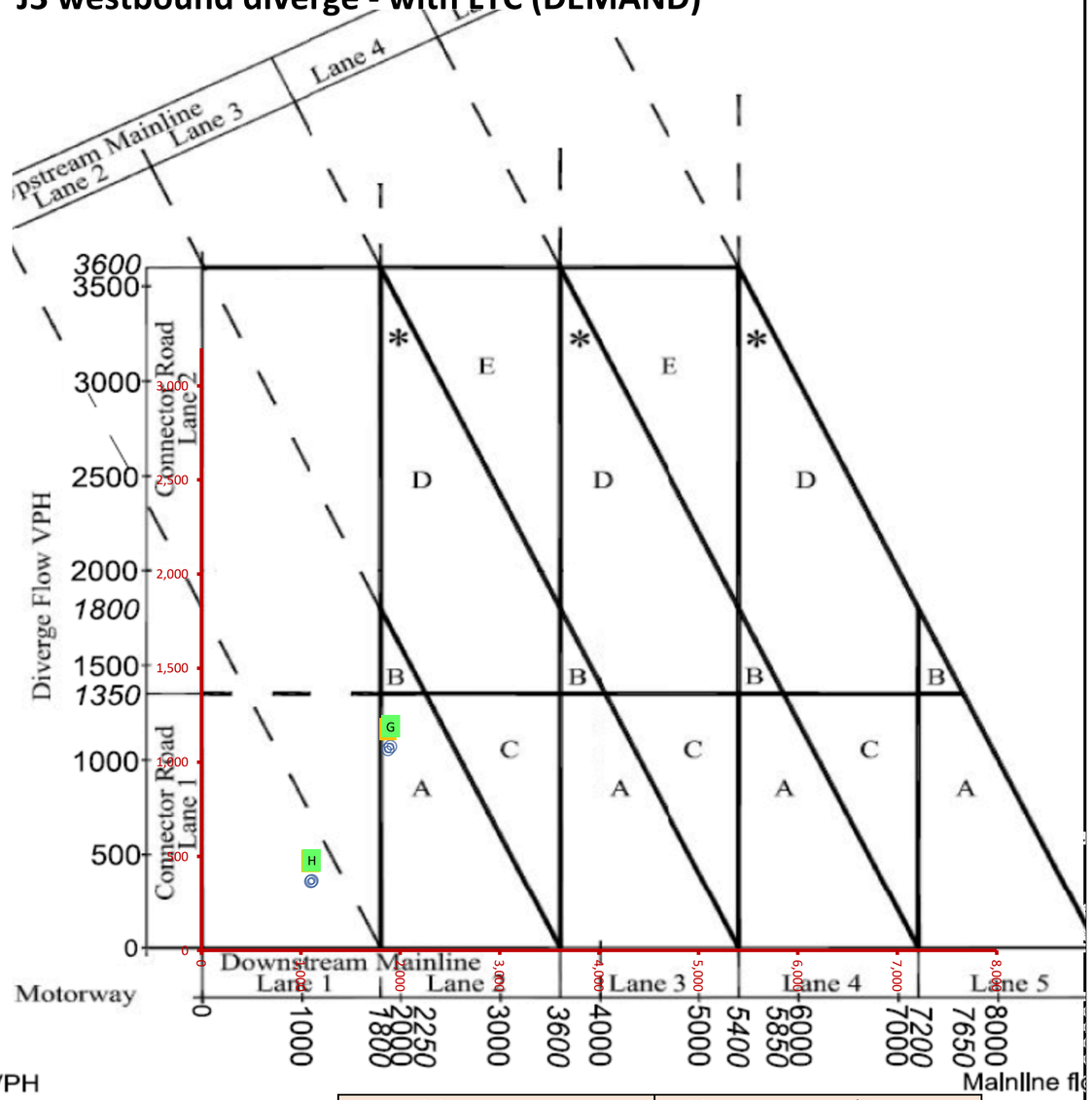
J3 westbound diverge - no LTC (DEMAND)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	1,813	1,033	1,813	1.00	1,033	1.00
B	Ref no LTC PM	1,115	372	1,115	1.00	372	1.00
C	Ref with LTC AM			1,875	1.00	1,068	1.00
D	Ref with LTC PM			1,098	1.00	367	1.00
E	LP Scenario no LTC AM	1,838	1,047	1,838	1.00	1,047	1.00
F	LP Scenario no LTC PM	1,126	376	1,126	1.00	376	1.00
G	LP Scenario with LTC AM			1,900	1.00	1,082	1.00
H	LP Scenario with LTC PM			1,109	1.00	370	1.00

SENSITIVITY ASSESSMENT

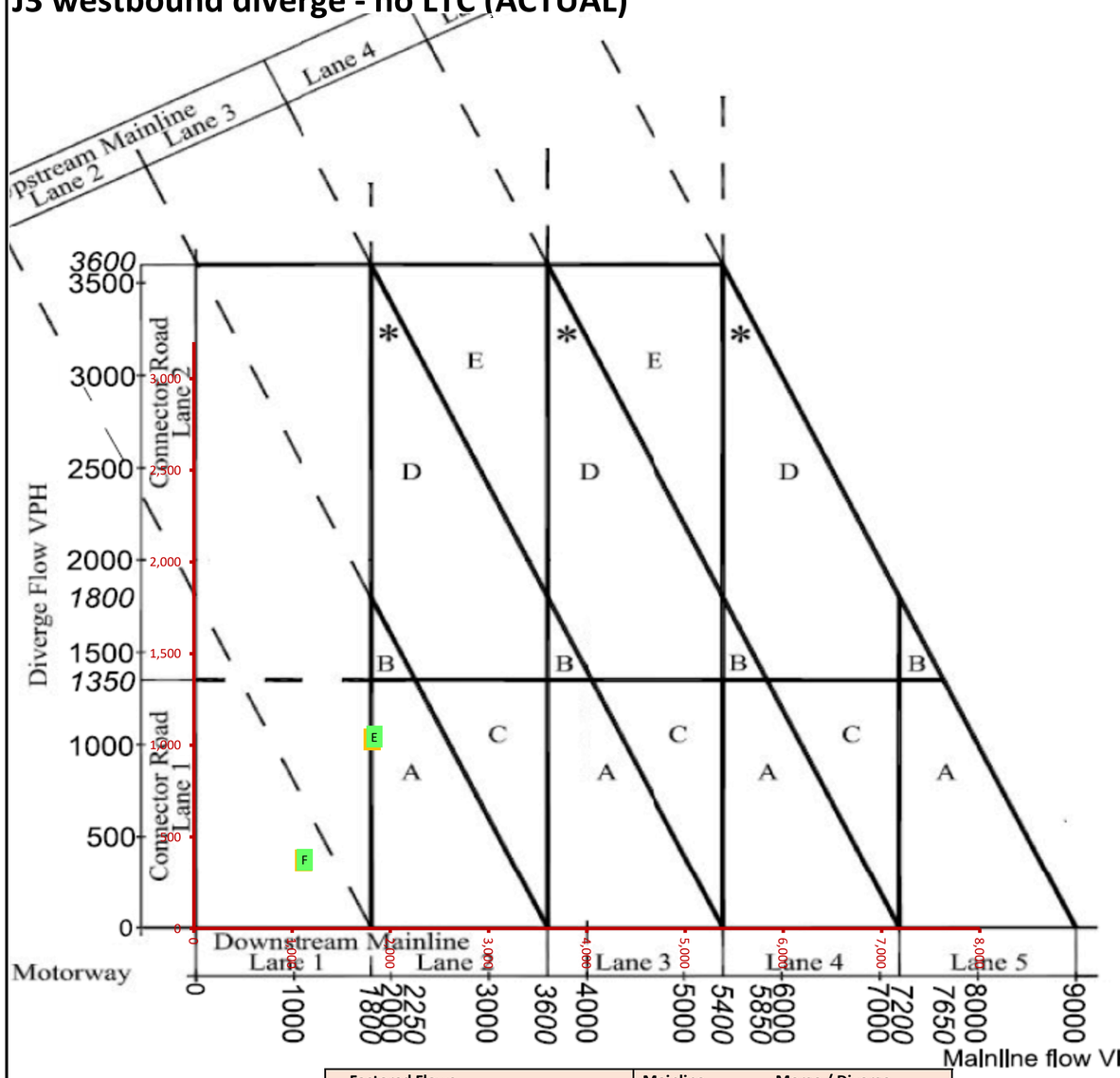
J3 westbound diverge - with LTC (DEMAND)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			1,813	1.00	1,033	1.00
B	Ref no LTC PM			1,115	1.00	372	1.00
C	Ref with LTC AM	1,875	1,068	1,875	1.00	1,068	1.00
D	Ref with LTC PM	1,098	367	1,098	1.00	367	1.00
E	LP Scenario no LTC AM			1,838	1.00	1,047	1.00
F	LP Scenario no LTC PM			1,126	1.00	376	1.00
G	LP Scenario with LTC AM	1,900	1,082	1,900	1.00	1,082	1.00
H	LP Scenario with LTC PM	1,109	370	1,109	1.00	370	1.00

SENSITIVITY ASSESSMENT

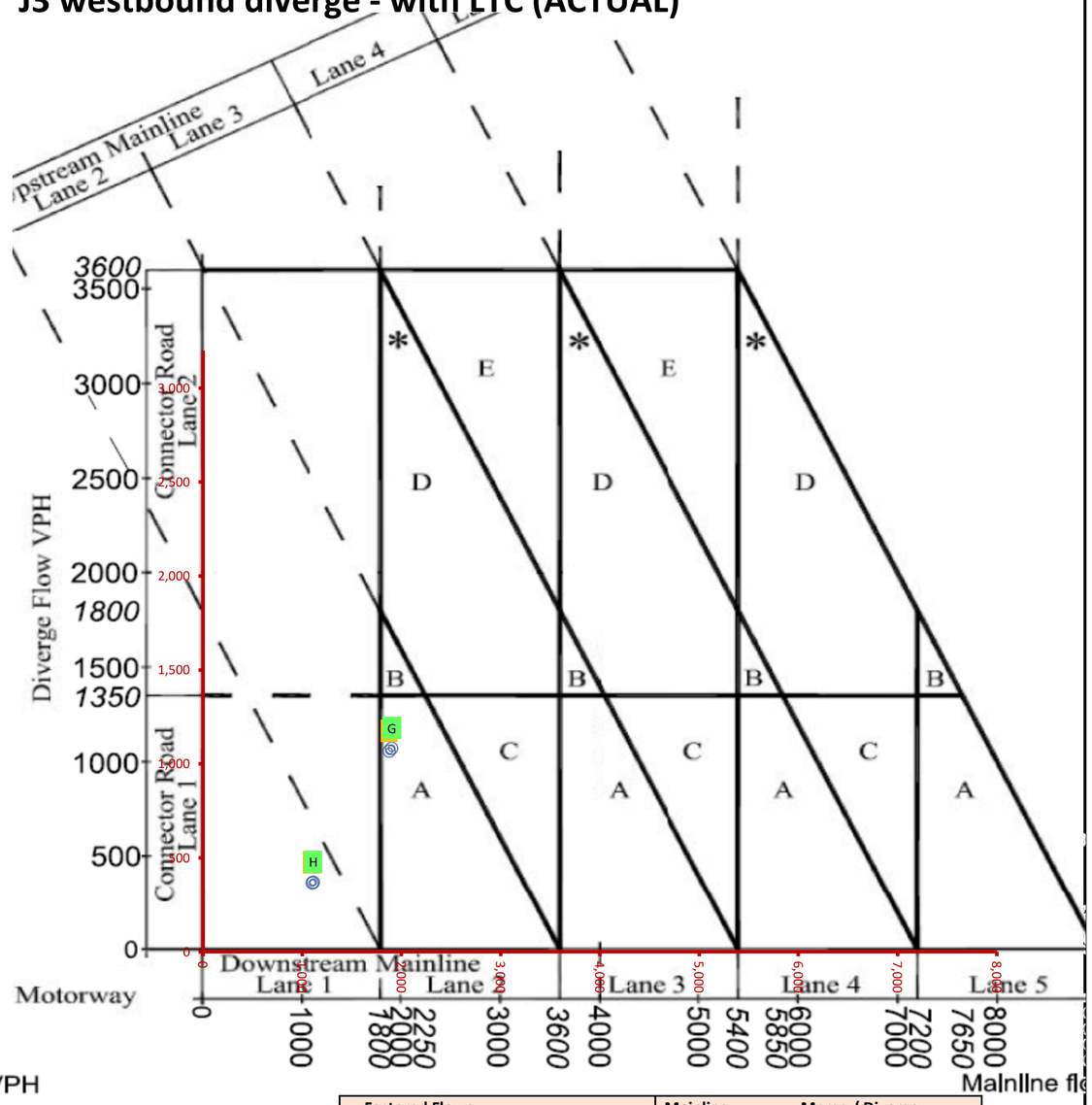
J3 westbound diverge - no LTC (ACTUAL)



Scenario		Factored Flows		Mainline	Merge / Diverge		
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	1,813	1,033	1,813	1.00	1,033	1.00
B	Ref no LTC PM	1,115	372	1,115	1.00	372	1.00
C	Ref with LTC AM			1,875	1.00	1,068	1.00
D	Ref with LTC PM			1,098	1.00	367	1.00
E	LP Scenario no LTC AM	1,838	1,047	1,838	1.00	1,047	1.00
F	LP Scenario no LTC PM	1,126	376	1,126	1.00	376	1.00
G	LP Scenario with LTC AM			1,900	1.00	1,082	1.00
H	LP Scenario with LTC PM			1,109	1.00	370	1.00

SENSITIVITY ASSESSMENT

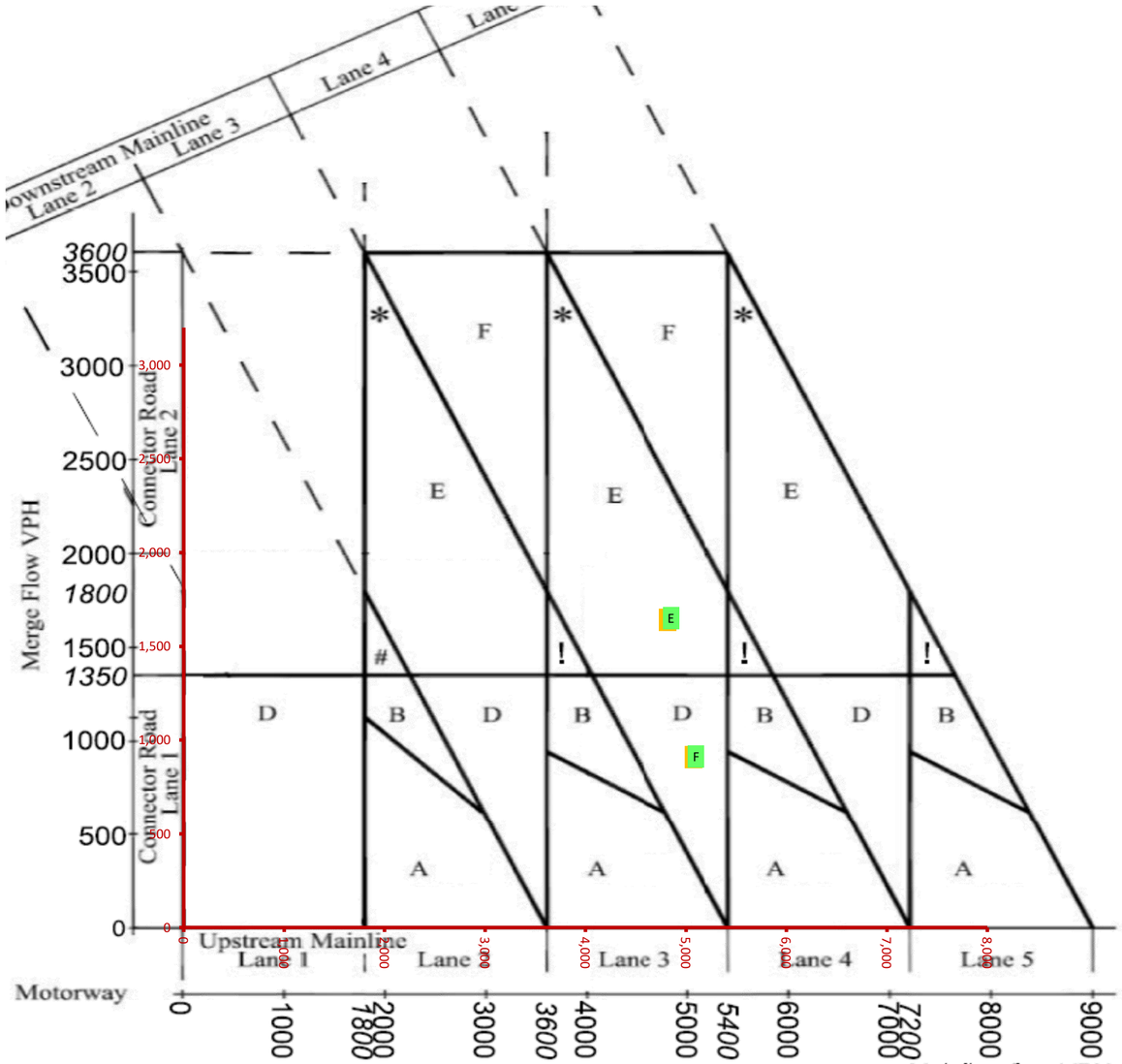
J3 westbound diverge - with LTC (ACTUAL)



Scenario		Factored Flows		Mainline	Merge / Diverge		
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			1,813	1.00	1,033	1.00
B	Ref no LTC PM			1,115	1.00	372	1.00
C	Ref with LTC AM	1,875	1,068	1,875	1.00	1,068	1.00
D	Ref with LTC PM	1,098	367	1,098	1.00	367	1.00
E	LP Scenario no LTC AM			1,838	1.00	1,047	1.00
F	LP Scenario no LTC PM			1,126	1.00	376	1.00
G	LP Scenario with LTC AM	1,900	1,082	1,900	1.00	1,082	1.00
H	LP Scenario with LTC PM	1,109	370	1,109	1.00	370	1.00

SENSITIVITY ASSESSMENT

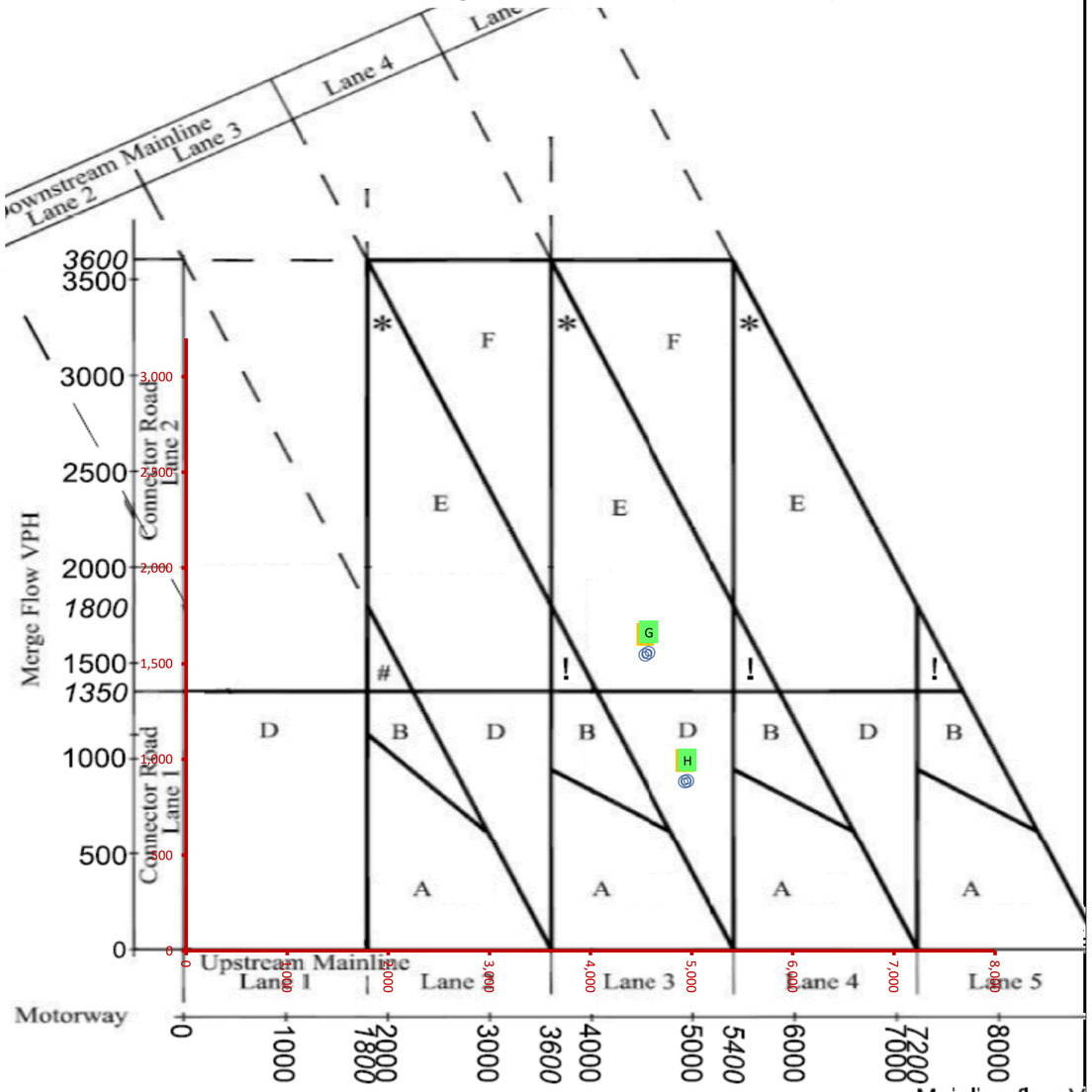
J3 northbound link road merge - no LTC (DEMAND)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,818	1,641	4,818	1.00	1,641	1.00
B	Ref no LTC PM	5,076	909	5,076	1.00	909	1.00
C	Ref with LTC AM			4,538	1.00	1,545	1.00
D	Ref with LTC PM			4,933	1.00	884	1.00
E	LP Scenario no LTC AM	4,852	1,652	4,852	1.00	1,652	1.00
F	LP Scenario no LTC PM	5,101	914	5,101	1.00	914	1.00
G	LP Scenario with LTC AM			4,573	1.00	1,557	1.00
H	LP Scenario with LTC PM			4,957	1.00	888	1.00

SENSITIVITY ASSESSMENT

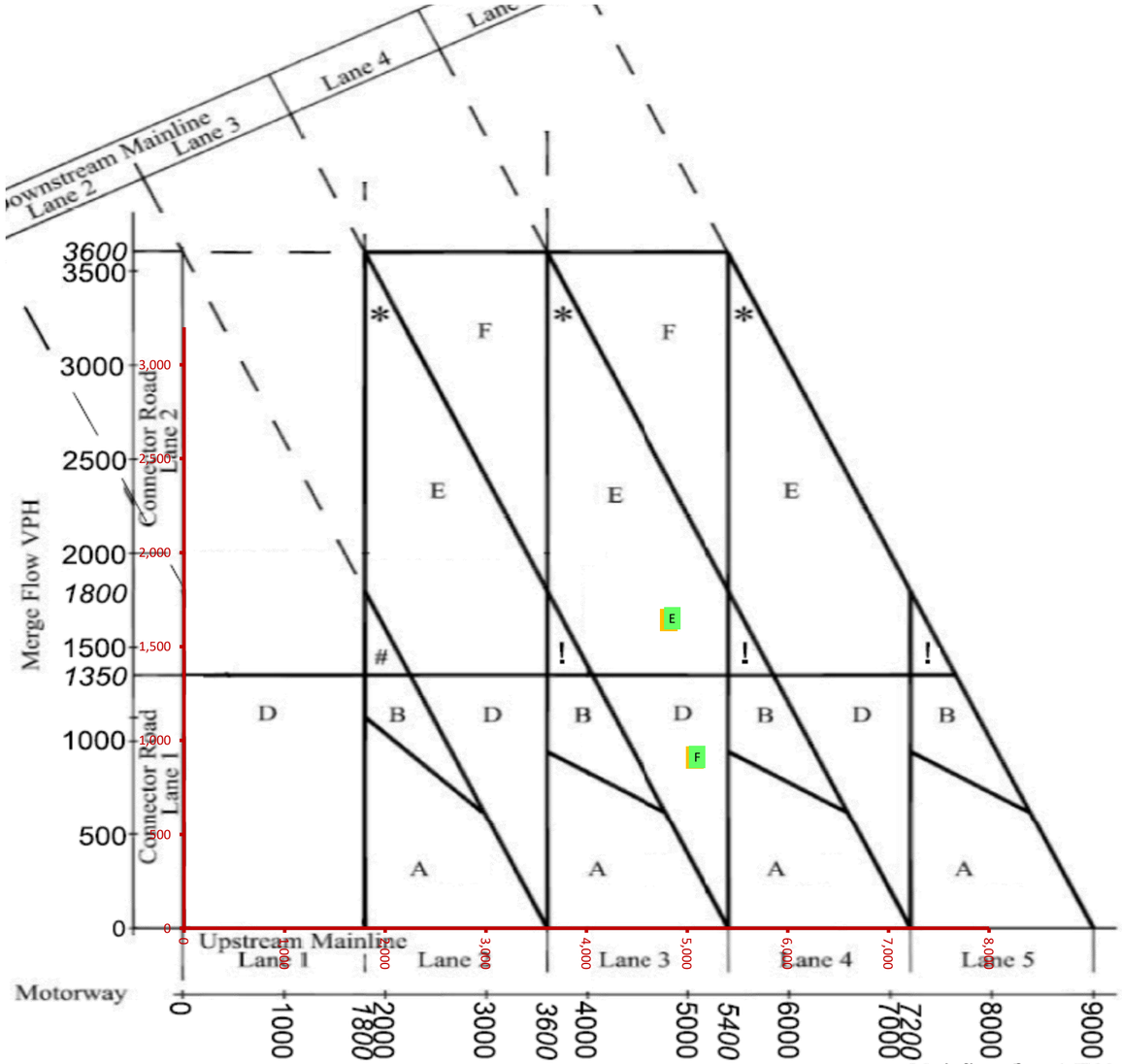
J3 northbound link road merge - with LTC (DEMAND)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,818	1.00	1,641	1.00
B	Ref no LTC PM			5,076	1.00	909	1.00
C	Ref with LTC AM	4,538	1,545	4,538	1.00	1,545	1.00
D	Ref with LTC PM	4,933	884	4,933	1.00	884	1.00
E	LP Scenario no LTC AM			4,852	1.00	1,652	1.00
F	LP Scenario no LTC PM			5,101	1.00	914	1.00
G	LP Scenario with LTC AM	4,573	1,557	4,573	1.00	1,557	1.00
H	LP Scenario with LTC PM	4,957	888	4,957	1.00	888	1.00

SENSITIVITY ASSESSMENT

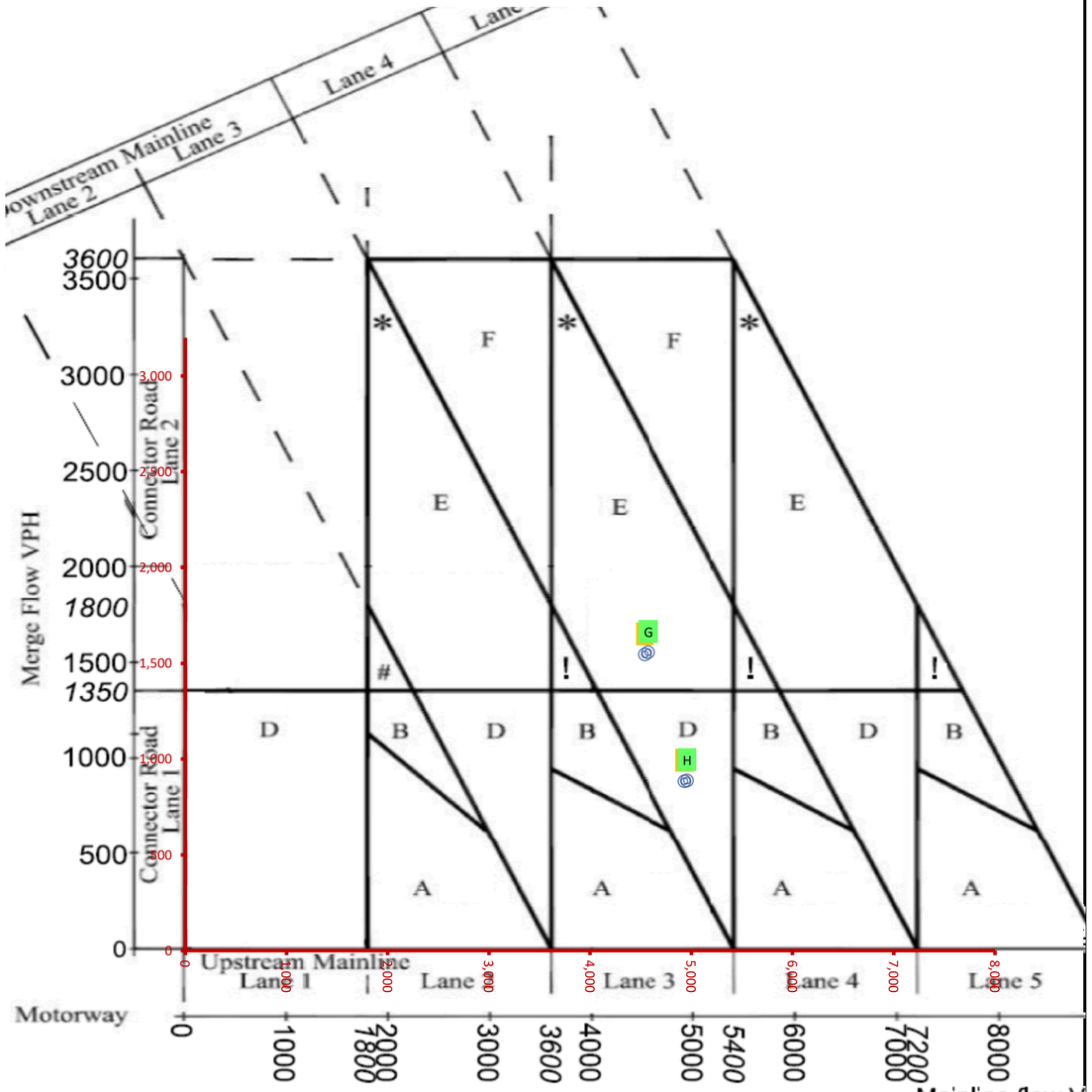
J3 northbound link road merge - no LTC (ACTUAL)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	4,818	1,641	4,818	1.00	1,641	1.00
B	Ref no LTC PM	5,076	909	5,076	1.00	909	1.00
C	Ref with LTC AM			4,538	1.00	1,545	1.00
D	Ref with LTC PM			4,933	1.00	884	1.00
E	LP Scenario no LTC AM	4,852	1,652	4,852	1.00	1,652	1.00
F	LP Scenario no LTC PM	5,101	914	5,101	1.00	914	1.00
G	LP Scenario with LTC AM			4,573	1.00	1,557	1.00
H	LP Scenario with LTC PM			4,957	1.00	888	1.00

SENSITIVITY ASSESSMENT

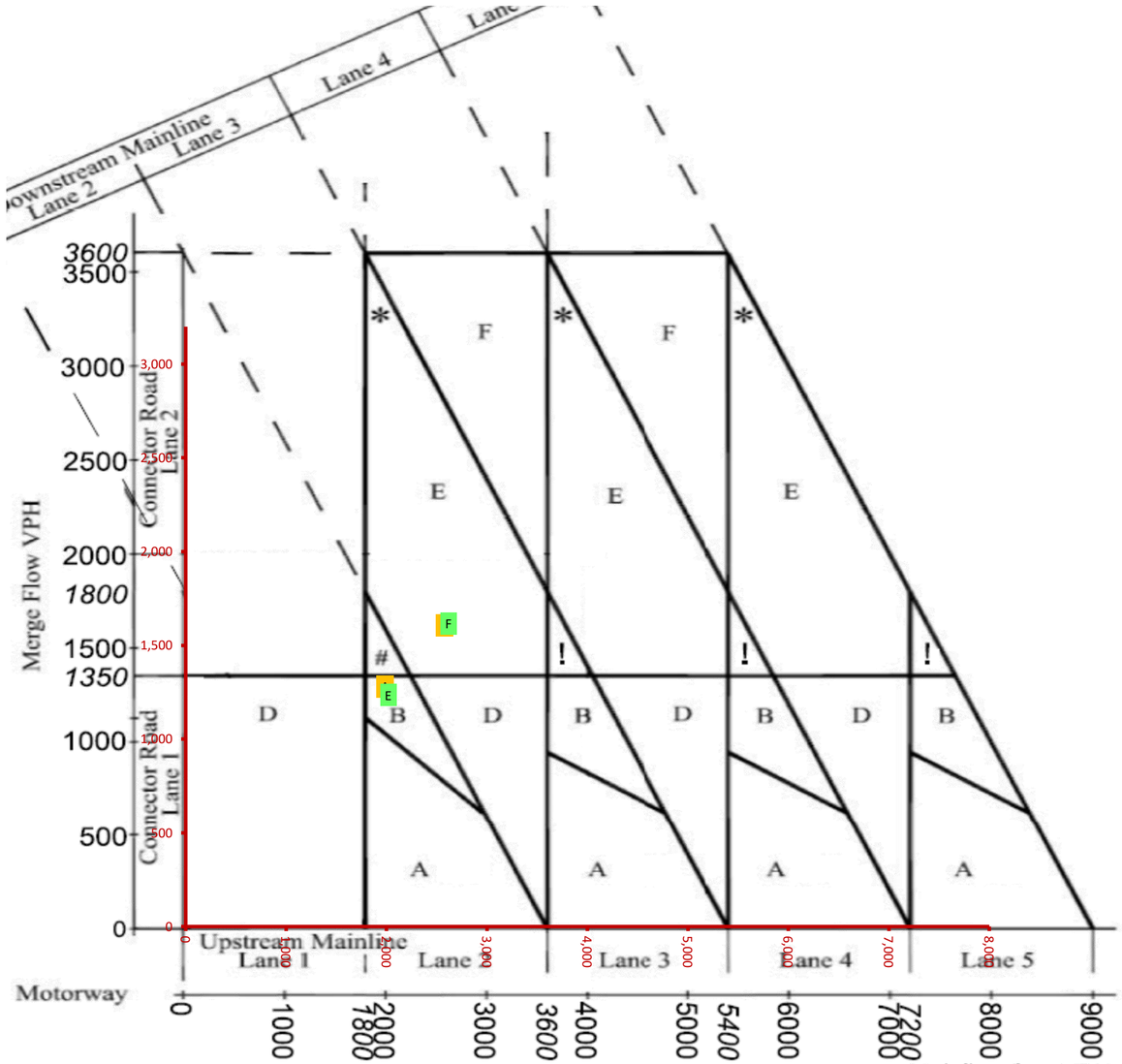
J3 northbound link road merge - with LTC (ACTUAL)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			4,818	1.00	1,641	1.00
B	Ref no LTC PM			5,076	1.00	909	1.00
C	Ref with LTC AM	4,538	1,545	4,538	1.00	1,545	1.00
D	Ref with LTC PM	4,933	884	4,933	1.00	884	1.00
E	LP Scenario no LTC AM			4,852	1.00	1,652	1.00
F	LP Scenario no LTC PM			5,101	1.00	914	1.00
G	LP Scenario with LTC AM	4,573	1,557	4,573	1.00	1,557	1.00
H	LP Scenario with LTC PM	4,957	888	4,957	1.00	888	1.00

SENSITIVITY ASSESSMENT

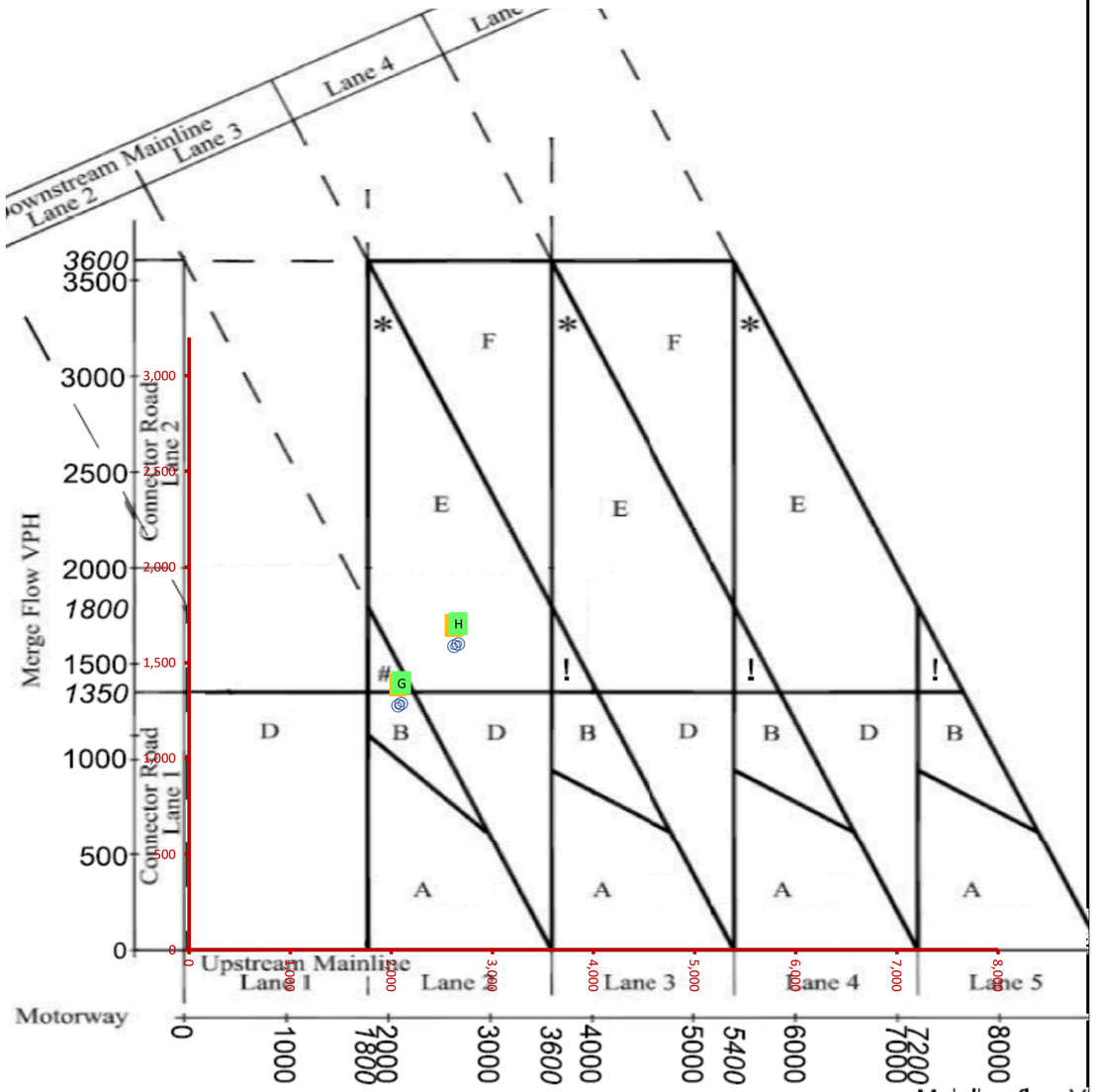
J3 eastbound link road merge - no LTC (DEMAND)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	1,984	1,281	1,984	1.00	1,164	1.10
B	Ref no LTC PM	2,575	1,605	2,575	1.00	1,605	1.00
C	Ref with LTC AM			2,065	1.00	1,159	1.10
D	Ref with LTC PM			2,620	1.00	1,585	1.00
E	LP Scenario no LTC AM	2,017	1,234	2,017	1.00	1,176	1.05
F	LP Scenario no LTC PM	2,616	1,617	2,616	1.00	1,617	1.00
G	LP Scenario with LTC AM			2,100	1.00	1,170	1.10
H	LP Scenario with LTC PM			2,663	1.00	1,597	1.00

SENSITIVITY ASSESSMENT

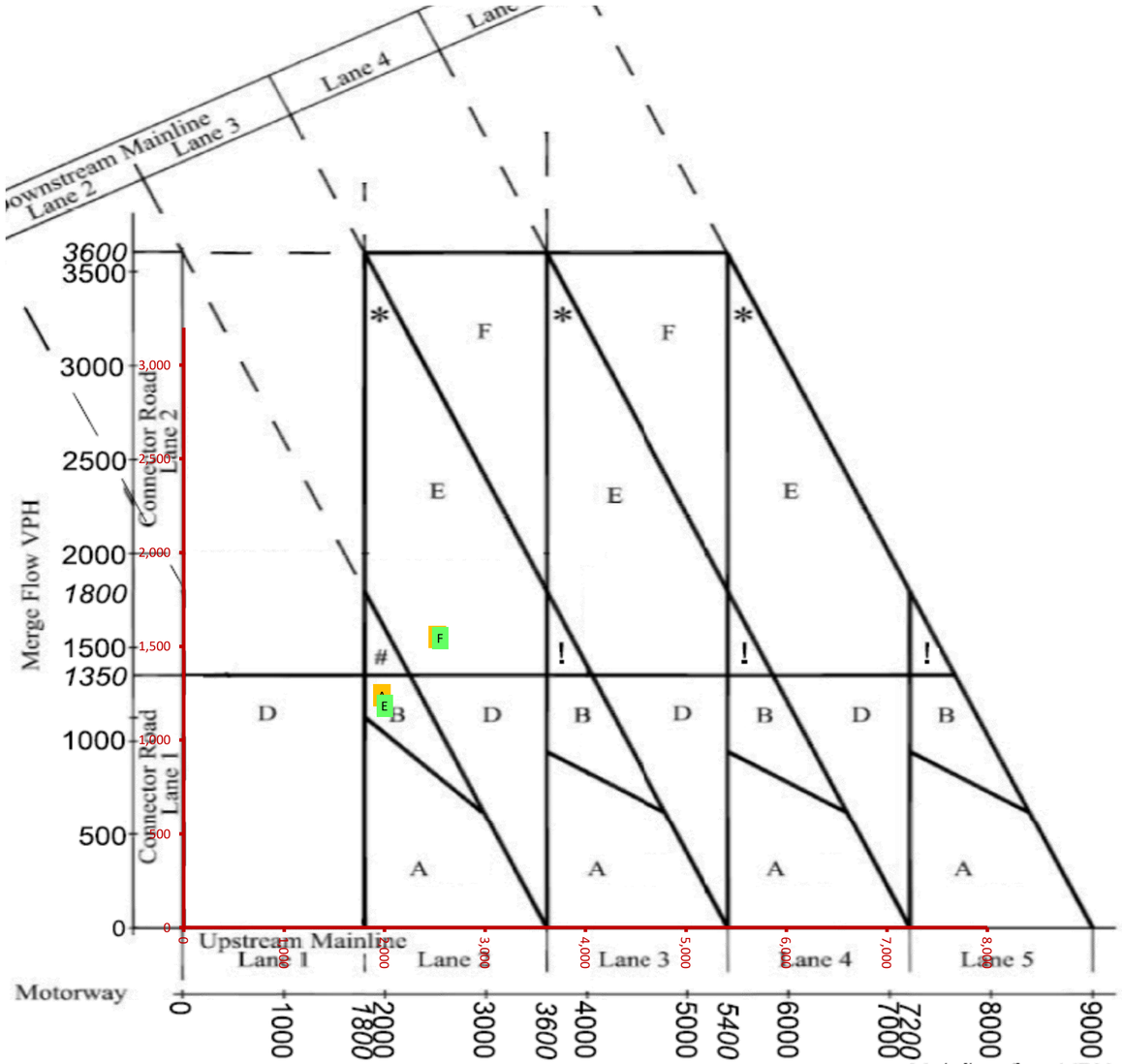
J3 eastbound link road merge - with LTC (DEMAND)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			1,984	1.00	1,164	1.10
B	Ref no LTC PM			2,575	1.00	1,605	1.00
C	Ref with LTC AM	2,065	1,275	2,065	1.00	1,159	1.10
D	Ref with LTC PM	2,620	1,585	2,620	1.00	1,585	1.00
E	LP Scenario no LTC AM			2,017	1.00	1,176	1.05
F	LP Scenario no LTC PM			2,616	1.00	1,617	1.00
G	LP Scenario with LTC AM	2,100	1,287	2,100	1.00	1,170	1.10
H	LP Scenario with LTC PM	2,663	1,597	2,663	1.00	1,597	1.00

SENSITIVITY ASSESSMENT

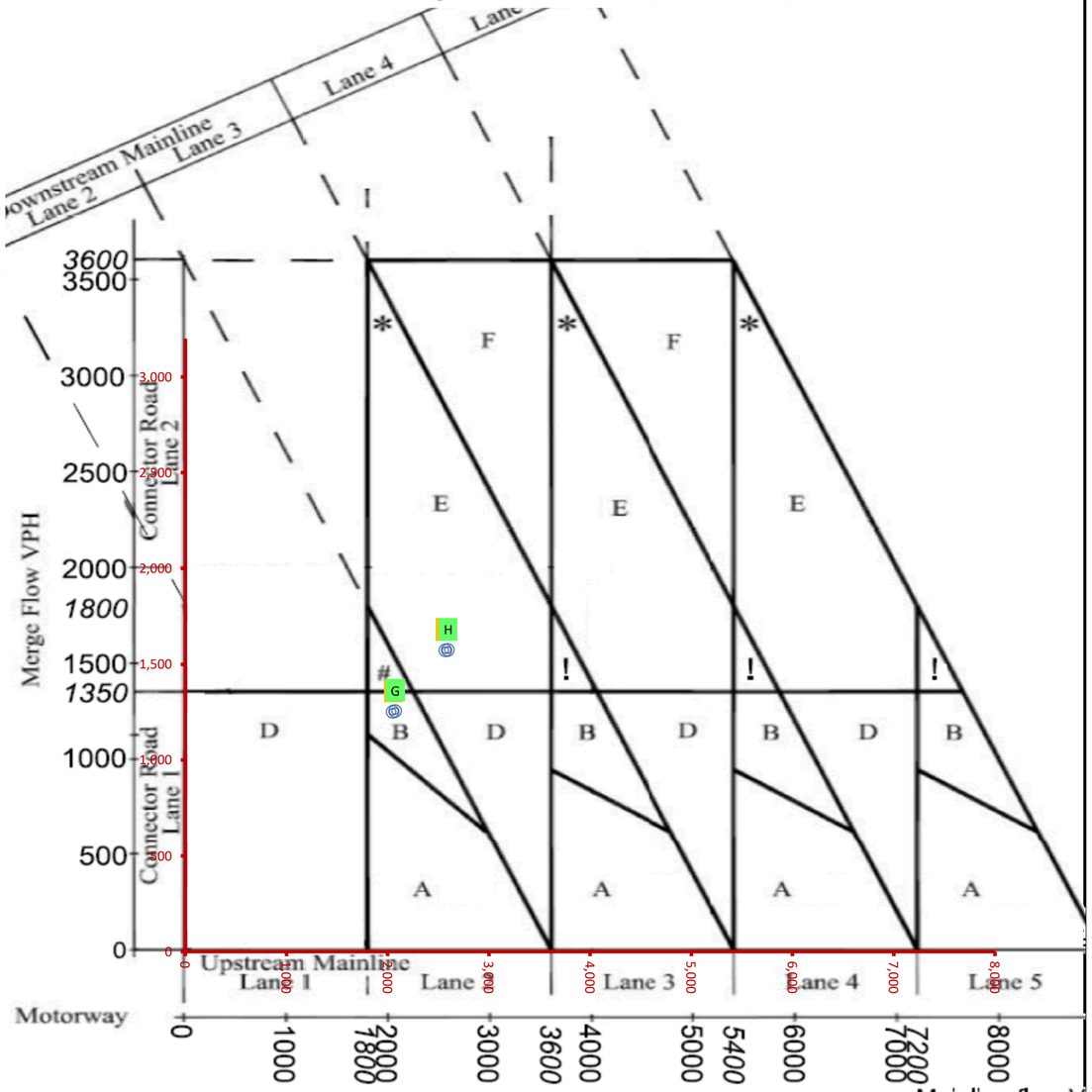
J3 eastbound link road merge - no LTC (ACTUAL)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	1,972	1,237	1,972	1.00	1,125	1.10
B	Ref no LTC PM	2,522	1,550	2,522	1.00	1,550	1.00
C	Ref with LTC AM			2,048	1.00	1,139	1.10
D	Ref with LTC PM			2,567	1.00	1,572	1.00
E	LP Scenario no LTC AM	1,999	1,183	1,999	1.00	1,127	1.05
F	LP Scenario no LTC PM	2,552	1,545	2,552	1.00	1,545	1.00
G	LP Scenario with LTC AM			2,072	1.00	1,141	1.10
H	LP Scenario with LTC PM			2,595	1.00	1,574	1.00

SENSITIVITY ASSESSMENT

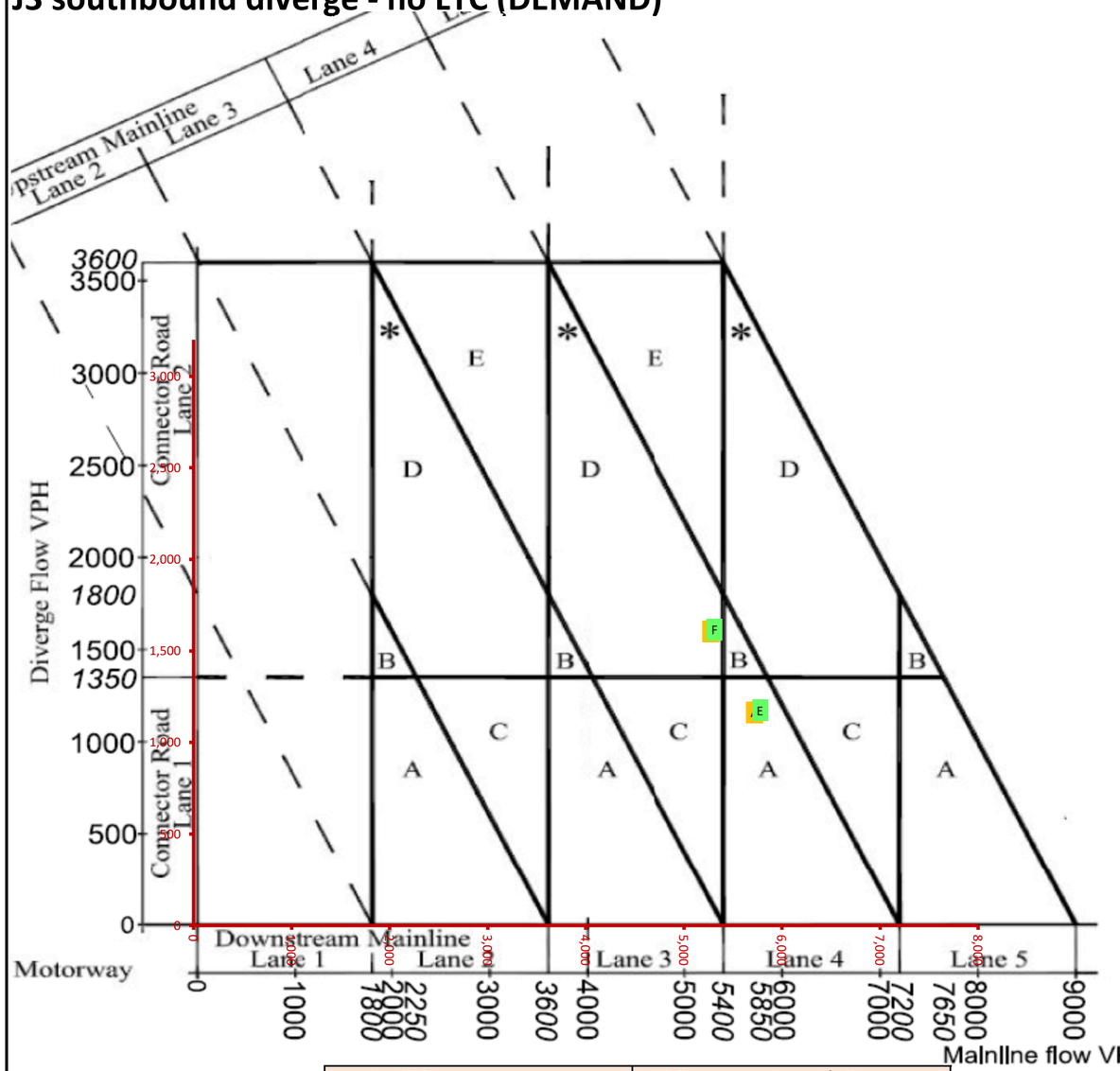
J3 eastbound link road merge - with LTC (ACTUAL)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			1,972	1.00	1,125	1.10
B	Ref no LTC PM			2,522	1.00	1,550	1.00
C	Ref with LTC AM	2,048	1,253	2,048	1.00	1,139	1.10
D	Ref with LTC PM	2,567	1,572	2,567	1.00	1,572	1.00
E	LP Scenario no LTC AM			1,999	1.00	1,127	1.05
F	LP Scenario no LTC PM			2,552	1.00	1,545	1.00
G	LP Scenario with LTC AM	2,072	1,255	2,072	1.00	1,141	1.10
H	LP Scenario with LTC PM	2,595	1,574	2,595	1.00	1,574	1.00

SENSITIVITY ASSESSMENT

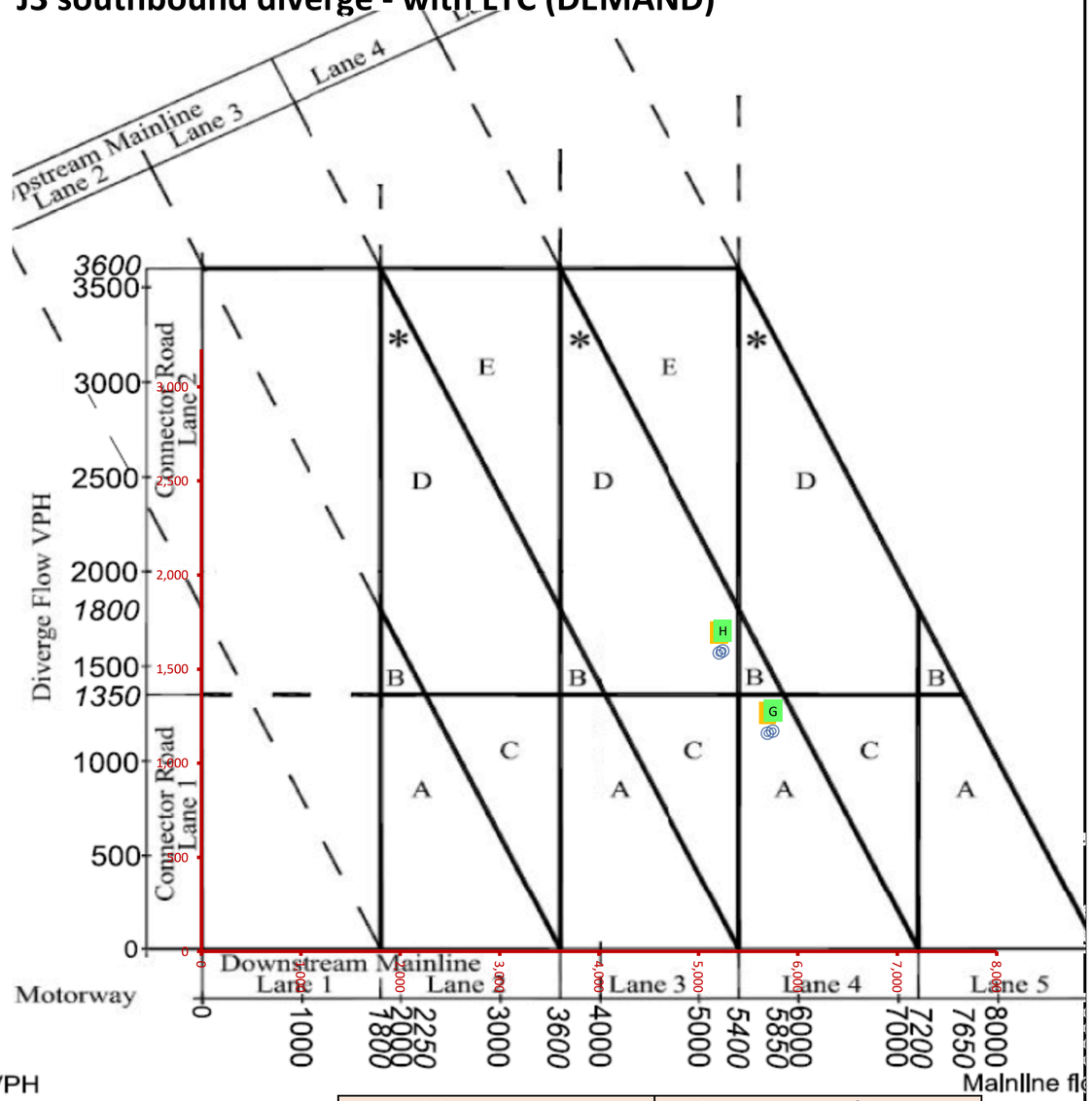
J3 southbound diverge - no LTC (DEMAND)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,720	1,164	5,720	1.00	1,164	1.00
B	Ref no LTC PM	5,274	1,605	5,274	1.00	1,605	1.00
C	Ref with LTC AM			5,694	1.00	1,159	1.00
D	Ref with LTC PM			5,207	1.00	1,585	1.00
E	LP Scenario no LTC AM	5,777	1,176	5,777	1.00	1,176	1.00
F	LP Scenario no LTC PM	5,311	1,617	5,311	1.00	1,617	1.00
G	LP Scenario with LTC AM			5,748	1.00	1,170	1.00
H	LP Scenario with LTC PM			5,245	1.00	1,597	1.00

SENSITIVITY ASSESSMENT

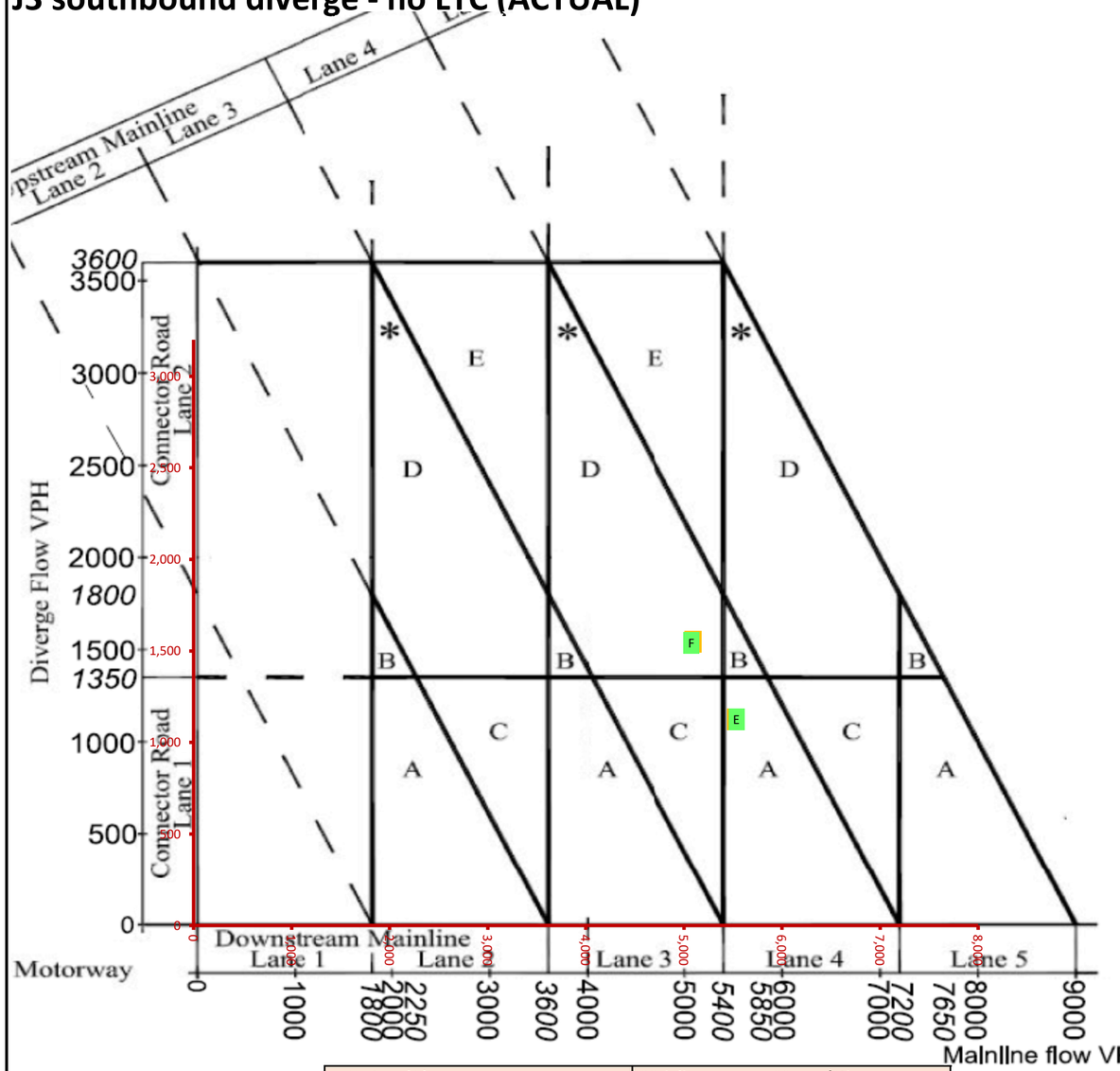
J3 southbound diverge - with LTC (DEMAND)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,720	1.00	1,164	1.00
B	Ref no LTC PM			5,274	1.00	1,605	1.00
C	Ref with LTC AM	5,694	1,159	5,694	1.00	1,159	1.00
D	Ref with LTC PM	5,207	1,585	5,207	1.00	1,585	1.00
E	LP Scenario no LTC AM			5,777	1.00	1,176	1.00
F	LP Scenario no LTC PM			5,311	1.00	1,617	1.00
G	LP Scenario with LTC AM	5,748	1,170	5,748	1.00	1,170	1.00
H	LP Scenario with LTC PM	5,245	1,597	5,245	1.00	1,597	1.00

SENSITIVITY ASSESSMENT

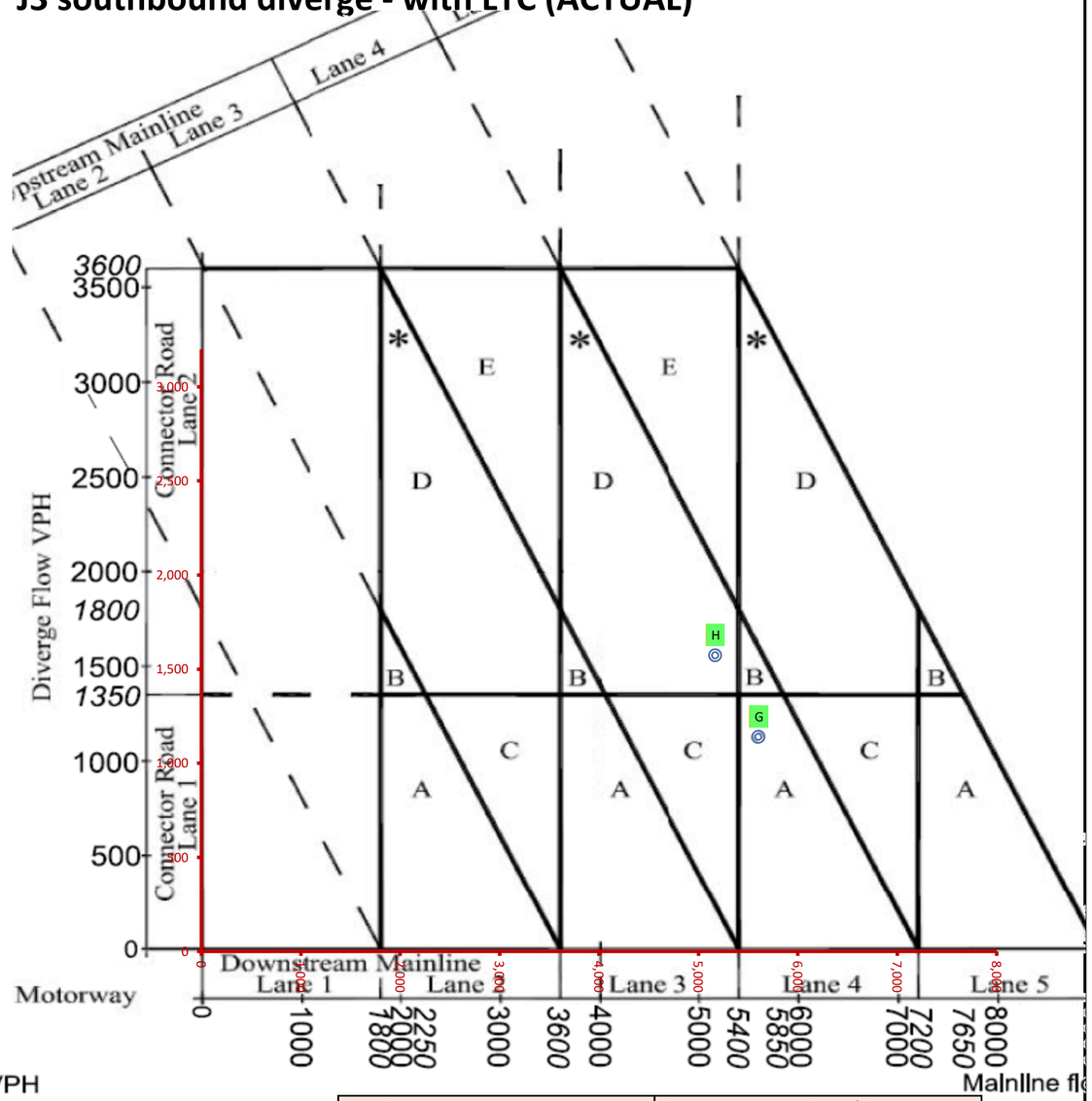
J3 southbound diverge - no LTC (ACTUAL)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	5,528	1,125	5,528	1.00	1,125	1.00
B	Ref no LTC PM	5,090	1,550	5,090	1.00	1,550	1.00
C	Ref with LTC AM			5,595	1.00	1,139	1.00
D	Ref with LTC PM			5,165	1.00	1,572	1.00
E	LP Scenario no LTC AM	5,537	1,127	5,537	1.00	1,127	1.00
F	LP Scenario no LTC PM	5,075	1,545	5,075	1.00	1,545	1.00
G	LP Scenario with LTC AM			5,606	1.00	1,141	1.00
H	LP Scenario with LTC PM			5,170	1.00	1,574	1.00

SENSITIVITY ASSESSMENT

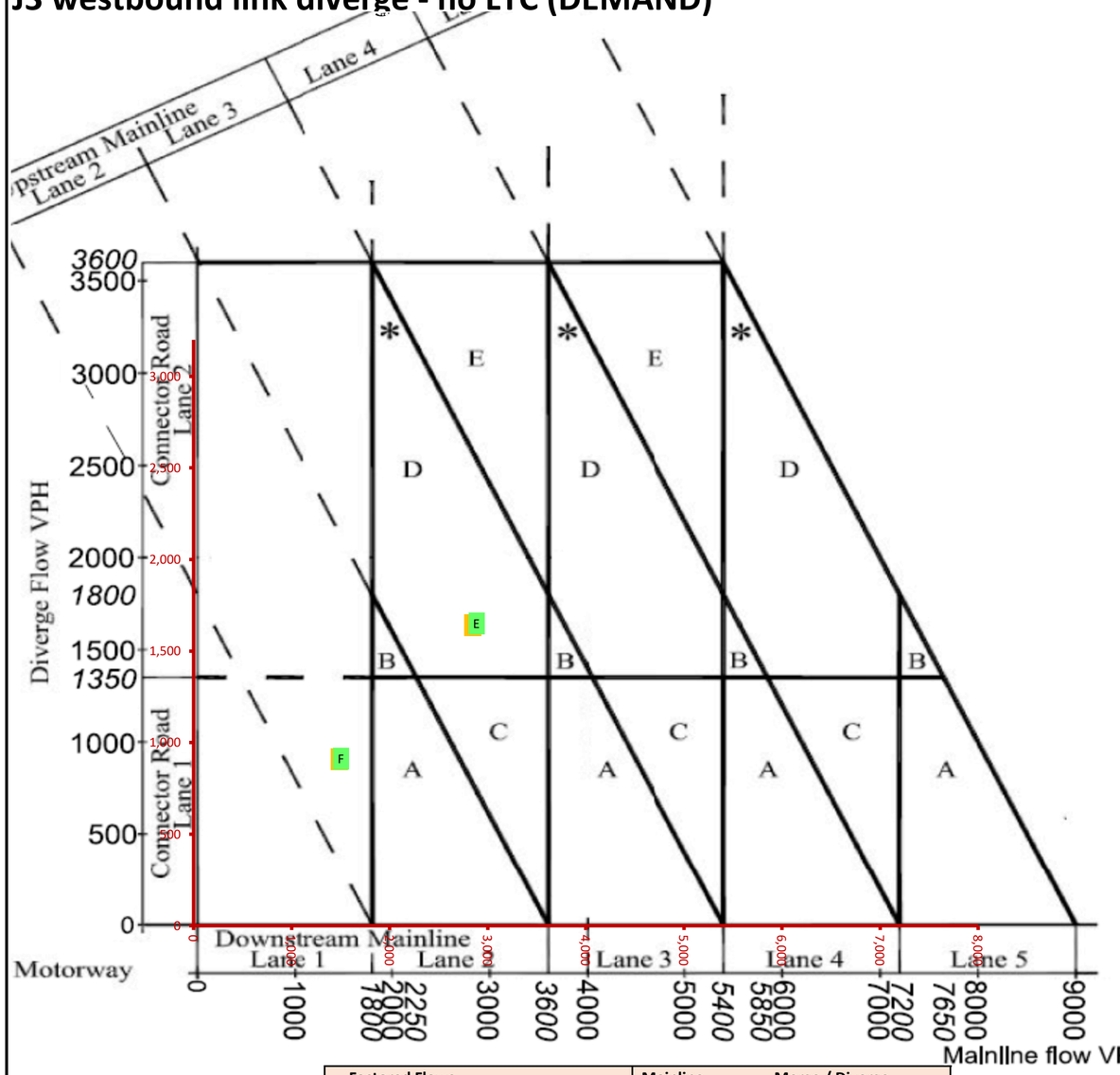
J3 southbound diverge - with LTC (ACTUAL)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			5,528	1.00	1,125	1.00
B	Ref no LTC PM			5,090	1.00	1,550	1.00
C	Ref with LTC AM	5,595	1,139	5,595	1.00	1,139	1.00
D	Ref with LTC PM	5,165	1,572	5,165	1.00	1,572	1.00
E	LP Scenario no LTC AM			5,537	1.00	1,127	1.00
F	LP Scenario no LTC PM			5,075	1.00	1,545	1.00
G	LP Scenario with LTC AM	5,606	1,141	5,606	1.00	1,141	1.00
H	LP Scenario with LTC PM	5,170	1,574	5,170	1.00	1,574	1.00

SENSITIVITY ASSESSMENT

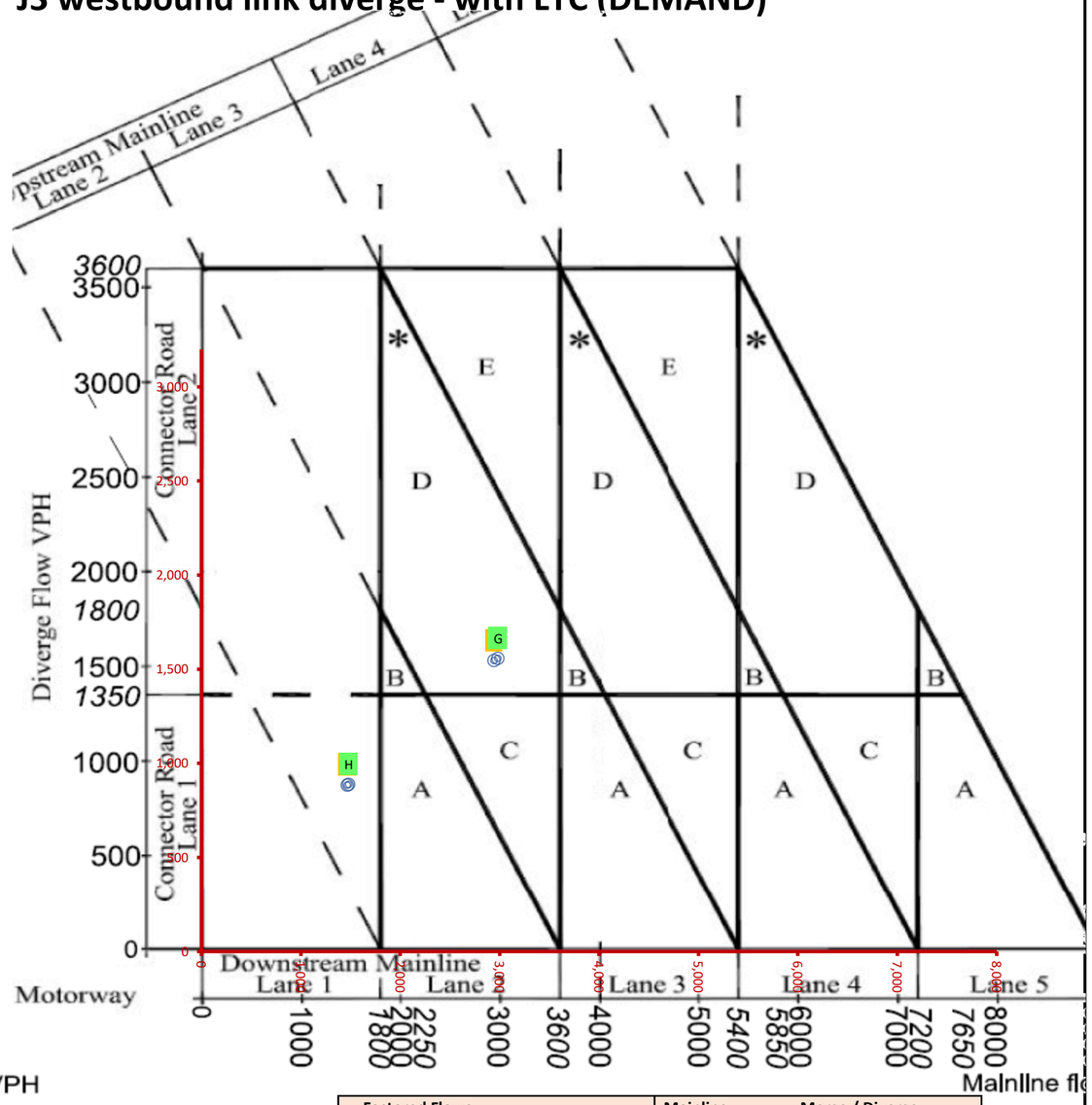
J3 westbound link diverge - no LTC (DEMAND)



Scenario		Factored Flows		Mainline	Merge / Diverge		
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	2,846	1,641	2,846	1.00	1,641	1.00
B	Ref no LTC PM	1,487	909	1,487	1.00	909	1.00
C	Ref with LTC AM			2,943	1.00	1,545	1.00
D	Ref with LTC PM			1,465	1.00	884	1.00
E	LP Scenario no LTC AM	2,885	1,652	2,885	1.00	1,652	1.00
F	LP Scenario no LTC PM	1,502	914	1,502	1.00	914	1.00
G	LP Scenario with LTC AM			2,982	1.00	1,557	1.00
H	LP Scenario with LTC PM			1,480	1.00	888	1.00

SENSITIVITY ASSESSMENT

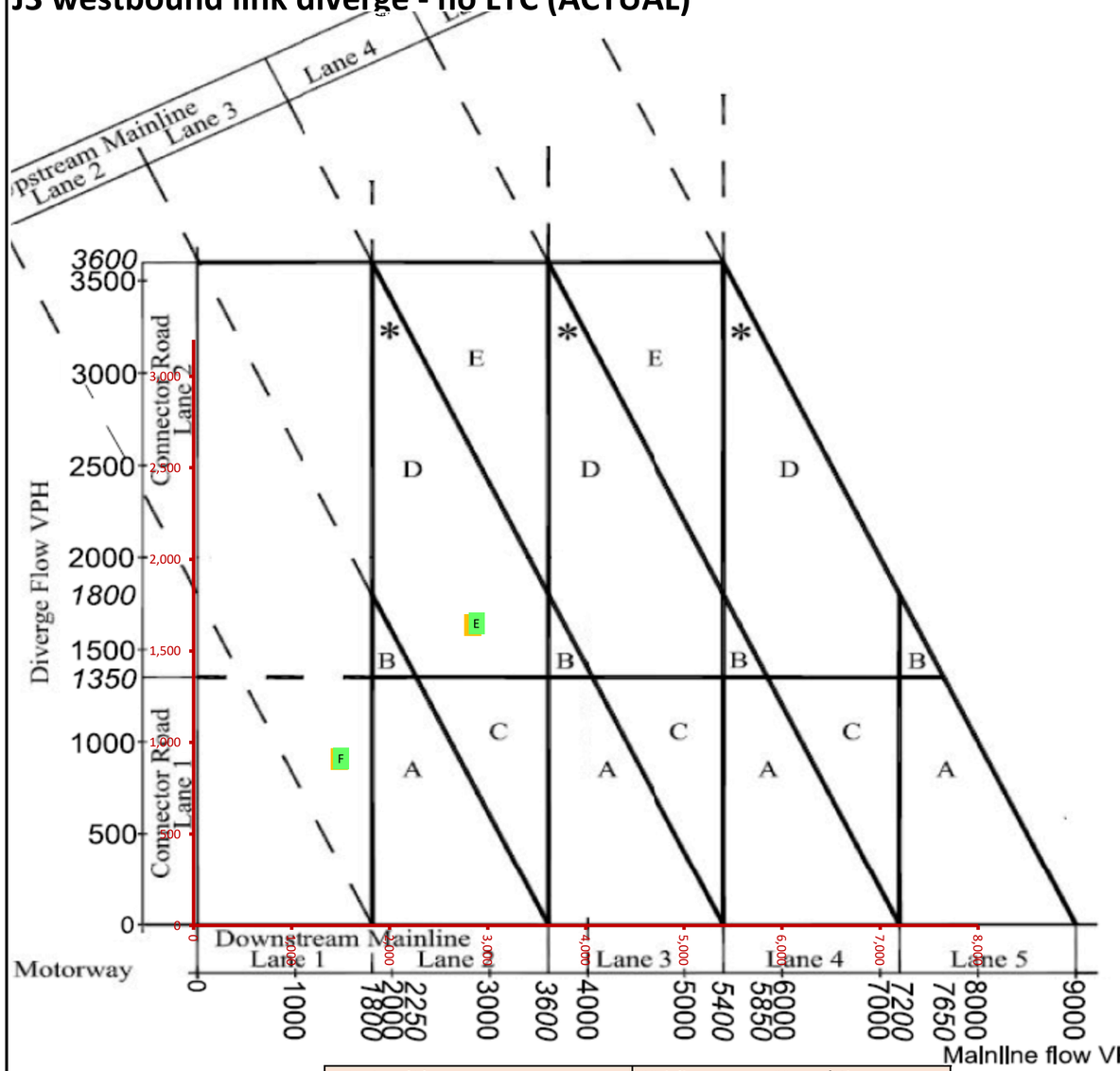
J3 westbound link diverge - with LTC (DEMAND)



Scenario		Factored Flows		Mainline	Merge / Diverge		
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			2,846	1.00	1,641	1.00
B	Ref no LTC PM			1,487	1.00	909	1.00
C	Ref with LTC AM	2,943	1,545	2,943	1.00	1,545	1.00
D	Ref with LTC PM	1,465	884	1,465	1.00	884	1.00
E	LP Scenario no LTC AM			2,885	1.00	1,652	1.00
F	LP Scenario no LTC PM			1,502	1.00	914	1.00
G	LP Scenario with LTC AM	2,982	1,557	2,982	1.00	1,557	1.00
H	LP Scenario with LTC PM	1,480	888	1,480	1.00	888	1.00

SENSITIVITY ASSESSMENT

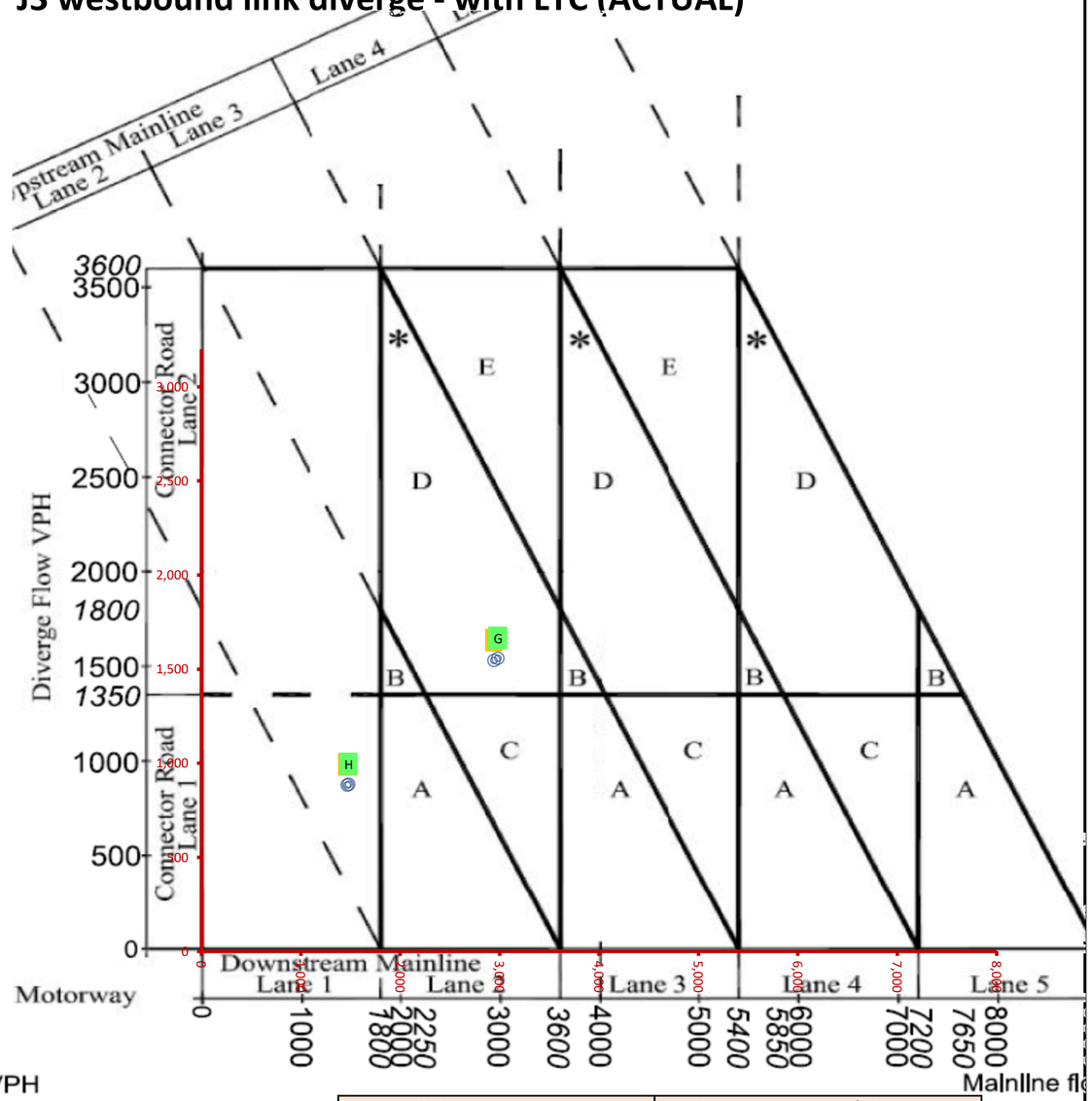
J3 westbound link diverge - no LTC (ACTUAL)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM	2,846	1,641	2,846	1.00	1,641	1.00
B	Ref no LTC PM	1,487	909	1,487	1.00	909	1.00
C	Ref with LTC AM			2,943	1.00	1,545	1.00
D	Ref with LTC PM			1,465	1.00	884	1.00
E	LP Scenario no LTC AM	2,885	1,652	2,885	1.00	1,652	1.00
F	LP Scenario no LTC PM	1,502	914	1,502	1.00	914	1.00
G	LP Scenario with LTC AM			2,982	1.00	1,557	1.00
H	LP Scenario with LTC PM			1,480	1.00	888	1.00

SENSITIVITY ASSESSMENT

J3 westbound link diverge - with LTC (ACTUAL)



Scenario		Factored Flows		Mainline		Merge / Diverge	
		Upstream Mainline	Merge Flow	Flow	Factor	Flow	Factor
A	Ref no LTC AM			2,846	1.00	1,641	1.00
B	Ref no LTC PM			1,487	1.00	909	1.00
C	Ref with LTC AM	2,943	1,545	2,943	1.00	1,545	1.00
D	Ref with LTC PM	1,465	884	1,465	1.00	884	1.00
E	LP Scenario no LTC AM			2,885	1.00	1,652	1.00
F	LP Scenario no LTC PM			1,502	1.00	914	1.00
G	LP Scenario with LTC AM	2,982	1,557	2,982	1.00	1,557	1.00
H	LP Scenario with LTC PM	1,480	888	1,480	1.00	888	1.00

Appendix M

TRANSYT summary tables

M25 Junction 1a
AM PEAK HOUR - No LTC

Degree of Sat is 90% or less
Degree of Sat is 90%-100%
Degree of Sat is greater than 100%

Reduction due to Local Plan
Increase due to Local Plan

Reduction due to Local Plan
Increase due to Local Plan

			Reference			Local Plan			Differences			Local Plan + Mitigation			Differences		
Arm	Stream	Description	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)
A	1	Rennie Drive Entry – Lane 1	11	24	1	20	37	1	9	13	0	24	42	2	13	18	0
A	2	Rennie Drive Entry – Lane 2	39	27	4	68	50	6	29	22	2	83	74	8	44	47	3
A	3	Rennie Drive Entry – Lane 3	16	25	2	29	38	2	13	14	1	36	44	2	20	20	1
Ac	1	Circ @ Rennie Drive – Lane 1	45	8	3	39	1	0	-6	-7	-3	38	1	0	-7	-7	-3
Ac	2	Circ @ Rennie Drive – Lane 2	23	4	6	20	0	12	-3	-4	6	20	0	6	-3	-4	0
Ac	3	Circ @ Rennie Drive – Lane 3	64	3	3	32	8	10	-32	5	7	45	1	0	-19	-2	-3
Ax	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
B	1	Bridge to West Rbt	37	19	7	58	14	4	21	-5	-3	72	19	8	35	0	1
B	2	Bridge to West Rbt	37	18	7	58	14	4	21	-4	-2	73	18	8	36	0	2
B	3	Bridge to West Rbt	17	0	0	18	9	4	1	9	4	0	0	0	-17	0	0
Bc	1	West Rbt Circ @ Bridge	33	3	2	17	0	0	-16	-2	-2	25	3	3	-8	1	1
Bc	2	West Rbt Circ @ Bridge	59	9	6	33	3	2	-26	-6	-4	52	6	8	-7	-3	2
Bx	1	Bridge to East Rbt Feeder Lane	33	0	0	35	0	0	2	0	0	35	0	0	2	0	0
Bx	2	Bridge to East Rbt Feeder Lane	17	0	0	18	0	0	1	0	0	18	0	0	1	0	0
Bx	3	Bridge to East Rbt Feeder Lane	31	4	3	31	3	6	0	-2	3	33	5	6	2	1	3
C	1	A282 NB Offslip	66	40	6	28	18	4	-38	-22	-2	69	48	7	3	8	1
C	2	A282 NB Offslip	65	39	5	27	18	4	-38	-21	-2	66	47	7	1	8	1
C	3	A282 NB Offslip	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Cc	1	Circ @ A282 NB Offslip	20	0	0	41	1	0	21	1	0	36	1	0	16	0	0
Cc	2	Circ @ A282 NB Offslip	32	5	3	52	7	3	20	2	-1	50	2	1	18	-4	-3
Cc	3	Circ @ A282 NB Offslip	11	0	0	14	0	0	3	0	0	0	0	0	-11	0	0
Cx	1	Exit to A282 NB	25	0	0	16	0	0	-9	0	0	35	0	0	10	0	0
D	1	A206 Bob Dunn Way Entry	47	21	6	96	95	16	49	74	10	43	20	8	-4	-1	1
D	2	A206 Bob Dunn Way Entry	23	17	6	47	34	10	24	16	4	22	17	7	-1	0	1
D	3	A206 Bob Dunn Way Entry	98	72	24	195	900	187	97	827	162	86	37	21	-12	-35	-4
Dc	1	Circ @ Bob Dunn Way	39	1	1	25	3	5	-14	2	4	45	4	4	6	2	3
Dc	2	Circ @ Bob Dunn Way	23	1	0	17	5	5	-6	4	5	26	1	0	3	0	0
Dc	3	Circ @ Bob Dunn Way	15	8	1	10	0	0	-5	-7	-1	0	0	0	-15	-8	-1
Dx	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
13	1	A206 Crossway Blvd Entry	90	126	7	90	143	7	0	17	0	43	29	6	-47	-97	-1
13	2	A206 Crossway Blvd Entry	94	210	11	94	240	11	0	29	0	43	29	6	-51	-181	-5
13	3	A206 Crossway Blvd Entry	100	252	26	100	285	26	0	32	-1	81	41	19	-19	-212	-7
14	1	Cotton Lane Entry	28	21	6	56	84	5	28	63	-1	22	41	4	-6	20	-2
14	2	Cotton Lane Entry	46	24	5	100	290	13	54	265	8	83	59	9	37	35	4
15	1	Circ @ Cotton Lane	46	4	6	29	0	0	-17	-4	-6	40	7	9	-6	3	2
15	2	Circ @ Cotton Lane	24	0	0	15	0	0	-9	0	0	48	5	4	24	5	4
16	1	A282 SB Offslip	100	333	35	50	27	14	-50	-306	-21	86	52	19	-14	-281	-16
16	2	A282 SB Offslip	89	281	32	61	29	19	-28	-253	-13	86	111	31	-3	-170	-1
17	1	Circ @ A282 SB Offslip	24	2	9	22	1	9	-2	-1	0	90	22	24	66	20	16
17	2	Circ @ A282 SB Offslip	30	1	2	30	15	7	0	13	6	19	8	3	-11	6	1
18	1	Bridge to East Rbt	10	23	1	11	28	1	1	6	0	8	14	1	-2	-8	0
18	2	Bridge to East Rbt	43	19	6	49	8	3	6	-10	-3	36	19	4	-7	1	-2
18	3	Bridge to East Rbt	78	35	9	93	58	12	15	23	3	65	21	8	-13	-14	-1
19	1	A206 Bob Dunn Way Feeder	33	0	0	36	0	0	3	0	0	36	0	0	3	0	0
20	1	Exit to A282 NB – Feeder from Circ	19	0	0	12	0	0	-7	0	0	15	0	0	-4	0	0
21	1	Exit to A282 NB – Feeder from Bridge	13	0	0	8	0	0	-5	0	0	40	1	0	27	0	0
22	1	Bridge to West Rbt Feeder Lane	29	0	2	29	0	0	0	0	-1	82	11	31	53	11	30
22	2	Bridge to West Rbt Feeder Lane	22	0	1	26	0	0	4	0	-1	32	5	9	10	5	7
23	1	A282 NB Offslip Feeder Lane	43	1	0	45	1	0	2	0	0	45	1	0	2	0	0
23	2	A282 NB Offslip Feeder Lane	24	0	0	24	0	0	0	0	0	24	0	0	0	0	0
24	1	Filter from A282 NB to A206 WB	43	1	0	44	1	0	1	0	0	44	1	0	1	0	0
25	1	Rennie Drive Feeder Lane	3	0	0	3	0	0	0	0	0	3	0	0	0	0	0
25	2	Rennie Drive Feeder Lane	14	0	0	14	0	0	0	0	0	14	0	0	0	0	0
26	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
27	1	A282 SB Offslip Feeder Lane	182	829	152	32	0	0	-150	-829	-152	32	0	0	-150	-829	-152
27	2	A282 SB Offslip Feeder Lane	242	1069	272	42	1	0	-200	-1068	-271	115	273	83	-127	-796	-189
28	1	East Rbt Circ @ Bridge	23	6	2	36	1	1	13	-4	-1	40	4	8	17	-2	6
28	2	East Rbt Circ @ Bridge	48	5	3	58	2	2	10	-3	-1	54	8	14	6	2	11
29	1	Circ @ A206 Crossway Blvd	8	1	1	13	0	0	5	0	-1	17	19	3	9	18	2
29	2	Circ @ A206 Crossway Blvd	23	1	1	20	2	2	-3	1	0	23	0	0	0	-1	-1
29	3	Circ @ A206 Crossway Blvd	35	1	2	33	2	2	-2	0	0	40	1	0	5	0	-1
30	1	Exit to A206 Crossway Blvd from Circ	14	0	0	24	0	0	10	0	0	22	0	0	8	0	0
31	1	Exit to A206 Crossway Blvd from Bridge	31	0	0	32	0	0	1	0	0	32	0	0	1	0	0
32	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
33	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
34	1	A206 Crossway Blvd Feeder Lane	156	673	108	184	847	138	28	174	30	27	0	0	-129	-673	-108
34	2	A206 Crossway Blvd Feeder Lane	282	1175	328	325	1258	352	43	84	24	69	12	29	-213	-1163	-299
35	1	Cotton Lane Feeder Lane	32	0	0	198	915	175	166	915	175	86	41	33	54	41	33
36	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0

Time spent (PCU-hr/hr)	1147 PCUhr/hr	1099 PCUhr/hr	-47 PCUhr/hr	383 PCUhr/hr	-763 PCUhr/hr
Mean journey speed (kph)	4.02 kph	4.27 kph	0.25 kph	14.45 kph	10.43 kph
Total delay (PCU hr / hr)	993 PCUhr/hr	943 PCUhr/hr	-50 PCUhr/hr	199 PCUhr/hr	-794 PCUhr/hr

M25 Junction 1a
PM PEAK HOUR - No LTC

Degree of Sat is 90% or less
Degree of Sat is 90%-100%
Degree of Sat is greater than 100%

Reduction due to Local Plan
Increase due to Local Plan

Reduction due to Local Plan
Increase due to Local Plan

			Reference			Local Plan			Differences			Local Plan + Mitigation			Differences		
Arm	Stream	Description	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)
A	1	Rennie Drive Entry – Lane 1	18	19	1	21	22	1	3	3	0	16	20	1	-2	1	0
A	2	Rennie Drive Entry – Lane 2	89	56	7	101	131	14	12	76	7	81	40	6	-8	-16	-1
A	3	Rennie Drive Entry – Lane 3	53	25	2	60	31	3	7	6	0	47	24	3	-6	-1	0
Ac	1	Circ @ Rennie Drive – Lane 1	44	5	3	41	2	2	-3	-3	-2	44	3	2	0	-2	-2
Ac	2	Circ @ Rennie Drive – Lane 2	38	3	6	37	1	9	-1	-2	3	39	1	9	1	-2	3
Ac	3	Circ @ Rennie Drive – Lane 3	67	6	4	64	3	2	-3	-4	-2	50	1	0	-17	-5	-4
Ax	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
B	1	Bridge to West Rbt	65	24	6	53	21	5	-12	-3	-1	62	14	7	-3	-10	1
B	2	Bridge to West Rbt	65	24	6	54	23	6	-11	-1	-1	62	14	7	-3	-10	1
B	3	Bridge to West Rbt	37	18	3	28	7	4	-9	-11	0	0	0	0	-37	-18	-3
Bc	1	West Rbt Circ @ Bridge	39	3	2	42	7	2	3	4	0	31	5	2	-8	1	0
Bc	2	West Rbt Circ @ Bridge	67	11	7	72	13	7	5	2	0	60	9	4	-7	-2	-3
Bx	1	Bridge to East Rbt Feeder Lane	33	0	0	34	0	0	1	0	0	34	0	0	1	0	0
Bx	2	Bridge to East Rbt Feeder Lane	38	1	0	39	1	0	1	0	0	39	1	0	1	0	0
Bx	3	Bridge to East Rbt Feeder Lane	25	0	0	25	0	0	0	0	0	26	0	1	1	0	1
C	1	A282 NB Offslip	29	14	2	28	15	2	-1	1	0	28	15	2	-1	1	0
C	2	A282 NB Offslip	29	14	2	28	15	2	-1	1	0	28	15	2	-1	1	0
C	3	A282 NB Offslip	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Cc	1	Circ @ A282 NB Offslip	38	2	0	36	1	0	-2	-1	0	41	1	0	3	-1	0
Cc	2	Circ @ A282 NB Offslip	49	3	2	47	3	2	-2	0	0	52	4	2	3	0	0
Cc	3	Circ @ A282 NB Offslip	24	3	0	21	0	0	-3	-2	0	0	0	0	-24	-3	0
Cx	1	Exit to A282 NB	29	0	0	28	0	0	-1	0	0	33	0	0	4	0	0
D	1	A206 Bob Dunn Way Entry	42	9	4	46	11	5	4	2	1	46	11	5	4	2	1
D	2	A206 Bob Dunn Way Entry	39	8	7	43	10	8	4	2	2	43	10	8	4	2	2
D	3	A206 Bob Dunn Way Entry	68	13	7	75	17	10	7	4	2	75	17	10	7	4	2
Dc	1	Circ @ Bob Dunn Way	45	8	3	39	7	3	-6	-1	0	39	7	3	-6	-1	0
Dc	2	Circ @ Bob Dunn Way	27	11	2	24	9	3	-3	-1	0	24	9	3	-3	-1	0
Dc	3	Circ @ Bob Dunn Way	40	28	3	31	20	2	-9	-8	-1	0	0	0	-40	-28	-3
Dx	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
13	1	A206 Crossway Blvd Entry	91	85	9	91	94	8	0	9	0	73	25	7	-18	-60	-2
13	2	A206 Crossway Blvd Entry	92	112	11	92	128	11	0	15	0	73	25	7	-19	-87	-4
13	3	A206 Crossway Blvd Entry	100	157	29	100	175	28	0	17	-1	77	23	12	-23	-134	-17
14	1	Cotton Lane Entry	30	19	3	34	22	3	4	4	0	23	21	3	-7	2	0
14	2	Cotton Lane Entry	48	23	2	56	29	2	8	6	0	71	36	4	23	13	2
15	1	Circ @ Cotton Lane	54	5	7	50	1	9	-4	-4	2	56	9	20	2	4	13
15	2	Circ @ Cotton Lane	26	9	6	22	0	3	-4	-9	-3	35	12	12	9	4	6
16	1	A282 SB Offslip	38	12	5	37	13	6	-1	1	1	75	27	9	37	15	3
16	2	A282 SB Offslip	47	13	7	45	13	8	-2	1	1	87	34	13	40	21	6
17	1	Circ @ A282 SB Offslip	50	3	6	45	13	9	-5	10	3	57	6	12	7	3	6
17	2	Circ @ A282 SB Offslip	27	5	2	26	2	2	-1	-3	0	8	0	0	-19	-5	-1
18	1	Bridge to East Rbt	59	24	4	60	25	5	1	1	1	54	21	5	-5	-2	1
18	2	Bridge to East Rbt	69	28	6	71	25	5	2	-3	-1	61	21	5	-8	-7	-1
18	3	Bridge to East Rbt	88	37	9	89	38	9	1	1	0	75	25	8	-13	-12	-1
19	1	A206 Bob Dunn Way Feeder	43	0	0	45	0	0	2	0	0	45	0	0	2	0	0
20	1	Exit to A282 NB – Feeder from Circ	24	0	0	24	0	0	0	0	0	19	0	0	-5	0	0
21	1	Exit to A282 NB – Feeder from Bridge	11	0	0	10	0	0	-1	0	0	31	0	0	20	0	0
22	1	Bridge to West Rbt Feeder Lane	32	0	0	31	0	0	-1	0	0	55	1	2	23	1	2
22	2	Bridge to West Rbt Feeder Lane	33	0	0	31	0	0	-2	0	0	23	0	1	-10	0	1
23	1	A282 NB Offslip Feeder Lane	40	1	0	43	1	0	3	0	0	43	1	0	3	0	0
23	2	A282 NB Offslip Feeder Lane	18	0	0	18	0	0	0	0	0	18	0	0	0	0	0
24	1	Filter from A282 NB to A206 WB	40	1	0	43	1	0	3	0	0	43	1	0	3	0	0
25	1	Rennie Drive Feeder Lane	3	0	0	3	0	0	0	0	0	3	0	0	0	0	0
25	2	Rennie Drive Feeder Lane	23	0	0	23	0	0	0	0	0	23	0	0	0	0	0
26	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
27	1	A282 SB Offslip Feeder Lane	27	0	0	27	0	0	0	0	0	27	0	0	0	0	0
27	2	A282 SB Offslip Feeder Lane	36	0	0	36	0	0	0	0	0	36	0	0	0	0	0
28	1	East Rbt Circ @ Bridge	26	4	1	25	4	1	-1	0	0	28	21	4	2	16	3
28	2	East Rbt Circ @ Bridge	64	8	4	63	6	4	-1	-2	1	55	28	9	-9	20	5
29	1	Circ @ A206 Crossway Blvd	45	2	3	42	4	2	-3	2	-1	54	10	7	9	8	4
29	2	Circ @ A206 Crossway Blvd	34	2	2	34	6	4	0	4	2	38	1	3	4	-1	1
29	3	Circ @ A206 Crossway Blvd	42	2	2	40	8	5	-2	6	3	48	2	5	6	0	3
30	1	Exit to A206 Crossway Blvd from Circ	15	0	0	15	0	0	0	0	0	15	0	0	0	0	0
31	1	Exit to A206 Crossway Blvd from Bridge	31	0	0	31	0	0	0	0	0	31	0	0	0	0	0
32	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
33	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
34	1	A206 Crossway Blvd Feeder Lane	139	523	132	160	691	176	21	167	44	42	1	0	-97	-523	-132
34	2	A206 Crossway Blvd Feeder Lane	144	561	139	162	705	174	18	144	35	40	1	0	-104	-561	-139
35	1	Cotton Lane Feeder Lane	17	0	0	18	0	0	1	0	0	17	0	0	0	0	0
36	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0

0.00	539	PCUhr/hr	624	PCUhr/hr	86	PCUhr/hr
Mean journey speed (kph)	9.93	kph	8.62	kph	-1.31	kph
Total delay (PCU hr / hr)	360	PCUhr/hr	445	PCUhr/hr	85	PCUhr/hr

264	PCUhr/hr	-275	PCUhr/hr
21.40	kph	11.47	kph
76	PCUhr/hr	-285	PCUhr/hr

M25 Junction 1a
AM PEAK HOUR - With LTC

Degree of Sat is 90% or less
Degree of Sat is 90%-100%
Degree of Sat is greater than 100%

Reduction due to Local Plan
Increase due to Local Plan

Reduction due to Local Plan
Increase due to Local Plan

			Reference			Local Plan			Differences			Local Plan + Mitigation			Differences		
Arm	Stream	Description	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)
A	1	Rennie Drive Entry – Lane 1	18	34	1	33	0	0	15	-34	-1	16	48	1	-2	14	1
A	2	Rennie Drive Entry – Lane 2	110	248	19	######	0	0	######	-248	-19	84	81	10	-26	-168	-9
A	3	Rennie Drive Entry – Lane 3	43	40	2	69	0	0	26	-40	-2	33	51	3	-10	11	1
Ac	1	Circ @ Rennie Drive – Lane 1	34	6	5	15	0	0	-19	-6	-5	37	4	7	3	-2	3
Ac	2	Circ @ Rennie Drive – Lane 2	29	3	12	100	0	0	71	-3	-12	30	6	17	1	4	6
Ac	3	Circ @ Rennie Drive – Lane 3	50	1	0	47	0	0	-3	-1	0	43	11	10	-7	10	10
Ax	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
B	1	Bridge to West Rbt	40	35	5	65	0	0	25	-35	-5	57	12	6	17	-23	1
B	2	Bridge to West Rbt	43	35	5	66	0	0	23	-35	-5	63	14	6	20	-21	1
B	3	Bridge to West Rbt	20	1	0	13	0	0	-7	-1	0	0	0	0	-20	-1	0
Bc	1	West Rbt Circ @ Bridge	29	1	0	25	0	0	-4	-1	0	26	4	3	-3	3	3
Bc	2	West Rbt Circ @ Bridge	51	7	5	48	0	0	-3	-7	-5	56	15	10	5	8	5
Bx	1	Bridge to East Rbt Feeder Lane	30	0	0	16	0	0	-14	0	0	33	0	0	3	0	0
Bx	2	Bridge to East Rbt Feeder Lane	24	0	1	13	0	0	-11	0	-1	25	1	7	1	0	6
Bx	3	Bridge to East Rbt Feeder Lane	55	13	8	100	0	0	45	-13	-8	76	24	17	21	11	9
C	1	A282 NB Offslip	57	27	6	0	0	0	-57	-27	-6	75	50	8	18	24	2
C	2	A282 NB Offslip	56	27	6	188	0	0	132	-27	-6	73	49	8	17	22	2
C	3	A282 NB Offslip	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Cc	1	Circ @ A282 NB Offslip	23	0	0	48	0	0	25	0	0	39	1	0	16	0	0
Cc	2	Circ @ A282 NB Offslip	37	7	5	69	0	0	32	-7	-5	53	7	6	16	0	1
Cc	3	Circ @ A282 NB Offslip	13	0	0	11	0	0	-2	0	0	0	0	0	-13	0	0
Cx	1	Exit to A282 NB	23	0	0	21	0	0	-2	0	0	28	0	0	5	0	0
D	1	A206 Bob Dunn Way Entry	30	19	4	32	0	0	2	-19	-4	28	19	6	-2	0	2
D	2	A206 Bob Dunn Way Entry	39	19	9	270	0	0	231	-19	-9	34	20	14	-5	0	4
D	3	A206 Bob Dunn Way Entry	97	72	22	76	0	0	-21	-72	-22	90	49	23	-7	-23	1
Dc	1	Circ @ Bob Dunn Way	46	3	2	17	0	0	-29	-3	-2	56	3	2	10	0	0
Dc	2	Circ @ Bob Dunn Way	31	1	0	100	0	0	69	-1	0	37	1	0	6	0	0
Dc	3	Circ @ Bob Dunn Way	15	28	3	11	0	0	-4	-28	-3	0	0	0	-15	-28	-3
Dx	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
13	1	A206 Crossway Blvd Entry	90	118	7	89	0	0	-1	-118	-7	57	40	8	-33	-78	1
13	2	A206 Crossway Blvd Entry	94	200	11	93	0	0	-1	-200	-11	58	41	8	-36	-160	-3
13	3	A206 Crossway Blvd Entry	100	241	27	100	0	0	0	-241	-27	79	43	19	-21	-198	-8
14	1	Cotton Lane Entry	23	22	4	13	0	0	-10	-22	-4	32	39	6	9	17	2
14	2	Cotton Lane Entry	64	31	7	36	0	0	-28	-31	-7	73	52	8	9	21	1
15	1	Circ @ Cotton Lane	54	7	8	42	0	0	-12	-7	-8	50	2	3	-4	-5	-5
15	2	Circ @ Cotton Lane	28	5	3	15	0	0	-13	-5	-3	38	0	0	10	-4	-3
16	1	A282 SB Offslip	100	318	35	41	0	0	-59	-318	-35	67	39	23	-33	-279	-12
16	2	A282 SB Offslip	89	267	32	45	0	0	-44	-267	-32	70	41	28	-19	-226	-4
17	1	Circ @ A282 SB Offslip	21	3	9	33	0	0	12	-3	-9	63	10	18	42	7	10
17	2	Circ @ A282 SB Offslip	38	5	10	39	0	0	1	-5	-10	30	4	2	-8	-1	-8
18	1	Bridge to East Rbt	8	23	1	6	0	0	-2	-23	-1	7	33	2	-1	10	0
18	2	Bridge to East Rbt	50	17	7	100	0	0	50	-17	-7	48	6	7	-2	-11	-1
18	3	Bridge to East Rbt	93	46	12	100	0	0	7	-46	-12	81	27	9	-12	-19	-4
19	1	A206 Bob Dunn Way Feeder	34	0	0	37	0	0	3	0	0	37	0	0	3	0	0
20	1	Exit to A282 NB – Feeder from Circ	18	0	0	16	0	0	-2	0	0	13	0	0	-5	0	0
21	1	Exit to A282 NB – Feeder from Bridge	11	0	0	10	0	0	-1	0	0	31	0	0	20	0	0
22	1	Bridge to West Rbt Feeder Lane	26	0	0	53	0	0	27	0	0	60	1	0	34	1	0
22	2	Bridge to West Rbt Feeder Lane	21	0	0	44	0	0	23	0	0	29	0	12	8	0	12
23	1	A282 NB Offslip Feeder Lane	60	1	0	61	0	0	1	-1	0	61	1	0	1	0	0
23	2	A282 NB Offslip Feeder Lane	33	0	0	37658	0	0	37625	0	0	43	6	8	10	6	8
24	1	Filter from A282 NB to A206 WB	60	1	0	61	0	0	1	-1	0	61	1	0	1	0	0
25	1	Rennie Drive Feeder Lane	2	0	0	2	0	0	0	0	0	2	0	0	0	0	0
25	2	Rennie Drive Feeder Lane	15	0	0	15	0	0	0	0	0	15	0	0	0	0	0
26	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
27	1	A282 SB Offslip Feeder Lane	219	994	229	38	0	0	-181	-994	-229	38	1	0	-181	-994	-229
27	2	A282 SB Offslip Feeder Lane	243	1074	289	45	0	0	-198	-1074	-289	45	1	0	-198	-1073	-288
28	1	East Rbt Circ @ Bridge	30	3	3	22	0	0	-8	-3	-3	55	21	18	25	17	15
28	2	East Rbt Circ @ Bridge	65	5	7	48	0	0	-17	-5	-7	76	28	26	11	23	19
29	1	Circ @ A206 Crossway Blvd	9	0	0	11	0	0	2	0	0	19	20	6	10	19	6
29	2	Circ @ A206 Crossway Blvd	31	2	2	15	0	0	-16	-2	-2	31	1	0	0	-1	-1
29	3	Circ @ A206 Crossway Blvd	49	2	2	15	0	0	-34	-2	-2	53	1	0	4	0	-1
30	1	Exit to A206 Crossway Blvd from Circ	16	0	0	20	0	0	4	0	0	27	0	5	11	0	5
31	1	Exit to A206 Crossway Blvd from Bridge	28	0	0	31	0	0	3	0	0	31	0	0	3	0	0
32	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
33	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
34	1	A206 Crossway Blvd Feeder Lane	164	723	127	238	0	0	74	-723	-127	37	3	5	-127	-720	-122
34	2	A206 Crossway Blvd Feeder Lane	213	970	216	307	0	0	94	-970	-216	50	6	11	-163	-964	-206
35	1	Cotton Lane Feeder Lane	29	0	0	30	0	0	1	0	0	38	5	7	9	4	6
36	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0

Time spent (PCU-hr/hr)	1191 PCUhr/hr	1495 PCUhr/hr	303 PCUhr/hr	323 PCUhr/hr	-869 PCUhr/hr
Mean journey speed (kph)	4.29 kph	3.17 kph	-1.12 kph	18.78 kph	14.49 kph
Total delay (PCU hr / hr)	1021 PCUhr/hr	1336 PCUhr/hr	316 PCUhr/hr	121 PCUhr/hr	-900 PCUhr/hr

M25 Junction 1a
PM PEAK HOUR - With LTC

Degree of Sat is 90% or less
Degree of Sat is 90%-100%
Degree of Sat is greater than 100%

Reduction due to Local Plan
Increase due to Local Plan

Reduction due to Local Plan
Increase due to Local Plan

			Reference			Local Plan			Differences			Local Plan + Mitigation			Differences		
Arm	Stream	Description	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)
A	1	Rennie Drive Entry – Lane 1	29	38	1	16	0	1	-13	-38	0	14	35	1	-15	-3	0
A	2	Rennie Drive Entry – Lane 2	165	740	72	95	0	15	-70	-740	-57	81	57	11	-84	-683	-61
A	3	Rennie Drive Entry – Lane 3	103	190	12	55	0	5	-48	-190	-7	46	41	5	-57	-149	-7
Ac	1	Circ @ Rennie Drive – Lane 1	41	2	2	25	0	12	-16	-2	9	46	1	0	5	-1	-2
Ac	2	Circ @ Rennie Drive – Lane 2	37	3	15	18	0	20	-19	-3	6	44	3	18	7	0	3
Ac	3	Circ @ Rennie Drive – Lane 3	53	3	4	18	0	10	-35	-3	6	45	1	10	-8	-2	6
Ax	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
B	1	Bridge to West Rbt	42	13	6	41	0	7	-1	-13	1	58	20	8	16	7	2
B	2	Bridge to West Rbt	42	12	6	41	0	7	-1	-12	1	59	15	8	17	3	2
B	3	Bridge to West Rbt	21	1	0	12	0	0	-9	-1	0	0	0	0	-21	-1	0
Bc	1	West Rbt Circ @ Bridge	31	4	3	12	0	2	-19	-4	-2	26	1	0	-5	-3	-3
Bc	2	West Rbt Circ @ Bridge	54	4	10	32	0	3	-22	-4	-7	51	11	7	-3	7	-4
Bx	1	Bridge to East Rbt Feeder Lane	37	1	0	23	0	0	-14	-1	0	38	1	0	1	0	0
Bx	2	Bridge to East Rbt Feeder Lane	42	1	5	23	0	0	-19	-1	-5	51	5	8	9	4	3
Bx	3	Bridge to East Rbt Feeder Lane	33	2	3	21	0	1	-12	-2	-2	40	4	6	7	2	3
C	1	A282 NB Offslip	26	16	3	27	0	4	1	-16	1	22	15	4	-4	-1	0
C	2	A282 NB Offslip	26	16	3	26	0	4	0	-16	1	22	15	4	-4	-1	0
C	3	A282 NB Offslip	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Cc	1	Circ @ A282 NB Offslip	27	1	0	33	0	0	6	-1	0	51	5	1	24	4	1
Cc	2	Circ @ A282 NB Offslip	38	7	2	37	0	2	-1	-7	-1	63	10	4	25	3	1
Cc	3	Circ @ A282 NB Offslip	15	0	0	11	0	0	-4	0	0	0	0	0	-15	0	0
Cx	1	Exit to A282 NB	27	0	0	15	0	0	-12	0	0	33	0	0	6	0	0
D	1	A206 Bob Dunn Way Entry	39	11	6	293	0	158	254	-11	152	67	33	12	28	22	6
D	2	A206 Bob Dunn Way Entry	40	11	12	299	0	327	259	-11	316	71	32	25	31	21	13
D	3	A206 Bob Dunn Way Entry	65	15	12	465	0	296	400	-15	284	112	243	63	47	228	51
Dc	1	Circ @ Bob Dunn Way	51	12	5	15	0	0	-36	-12	-5	29	16	6	-22	4	1
Dc	2	Circ @ Bob Dunn Way	34	14	5	14	0	0	-20	-14	-5	21	20	6	-13	6	1
Dc	3	Circ @ Bob Dunn Way	23	30	3	7	0	0	-16	-30	-3	0	0	0	-23	-30	-3
Dx	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
13	1	A206 Crossway Blvd Entry	89	119	7	88	0	7	-1	-119	0	77	60	8	-12	-59	2
13	2	A206 Crossway Blvd Entry	92	201	11	93	0	11	1	-201	0	78	61	9	-14	-139	-2
13	3	A206 Crossway Blvd Entry	100	250	26	100	0	25	0	-250	-1	90	71	21	-10	-179	-5
14	1	Cotton Lane Entry	16	20	3	11	0	3	-5	-20	0	40	43	6	24	22	3
14	2	Cotton Lane Entry	40	24	4	28	0	4	-12	-24	0	75	60	7	35	37	3
15	1	Circ @ Cotton Lane	60	3	6	54	0	7	-6	-3	1	54	2	8	-6	-1	1
15	2	Circ @ Cotton Lane	22	5	3	23	0	3	1	-5	0	34	1	3	12	-5	0
16	1	A282 SB Offslip	100	329	35	61	0	14	-39	-329	-21	79	50	15	-21	-279	-20
16	2	A282 SB Offslip	89	277	32	60	0	16	-29	-277	-16	76	48	17	-13	-229	-15
17	1	Circ @ A282 SB Offslip	18	2	9	18	0	9	0	-2	0	41	19	23	23	17	14
17	2	Circ @ A282 SB Offslip	23	1	1	27	0	6	4	-1	4	10	2	0	-13	1	-1
18	1	Bridge to East Rbt	46	17	5	26	0	2	-20	-17	-3	29	10	5	-17	-7	0
18	2	Bridge to East Rbt	65	20	8	41	0	6	-24	-20	-2	46	13	7	-19	-8	0
18	3	Bridge to East Rbt	87	32	10	61	0	7	-26	-32	-3	59	11	8	-28	-21	-2
19	1	A206 Bob Dunn Way Feeder	49	0	0	51	0	0	2	0	0	51	0	0	2	0	0
20	1	Exit to A282 NB – Feeder from Circ	23	0	0	11	0	0	-12	0	0	19	0	0	-4	0	0
21	1	Exit to A282 NB – Feeder from Bridge	10	0	0	9	0	0	-1	0	0	29	0	0	19	0	0
22	1	Bridge to West Rbt Feeder Lane	23	0	0	48	0	5	25	0	5	65	11	30	42	11	30
22	2	Bridge to West Rbt Feeder Lane	20	0	0	41	0	7	21	0	7	26	4	4	6	3	4
23	1	A282 NB Offslip Feeder Lane	47	1	0	49	0	0	2	-1	0	49	1	0	2	0	0
23	2	A282 NB Offslip Feeder Lane	23	0	0	23	0	0	0	0	0	23	0	0	0	0	0
24	1	Filter from A282 NB to A206 WB	46	1	0	49	0	0	3	-1	0	49	1	0	3	0	0
25	1	Rennie Drive Feeder Lane	3	0	0	3	0	0	0	0	0	3	0	0	0	0	0
25	2	Rennie Drive Feeder Lane	25	0	0	25	0	0	0	0	0	25	0	0	0	0	0
26	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
27	1	A282 SB Offslip Feeder Lane	153	649	103	25	0	0	-128	-649	-103	25	0	0	-128	-649	-103
27	2	A282 SB Offslip Feeder Lane	159	691	120	28	0	0	-131	-691	-120	28	0	0	-131	-690	-120
28	1	East Rbt Circ @ Bridge	17	8	2	23	0	0	6	-8	-2	37	7	2	20	-1	1
28	2	East Rbt Circ @ Bridge	49	6	3	59	0	0	10	-6	-3	62	8	9	13	2	6
29	1	Circ @ A206 Crossway Blvd	26	3	3	21	0	0	-5	-3	-3	36	3	5	10	0	2
29	2	Circ @ A206 Crossway Blvd	34	1	2	23	0	0	-11	-1	-2	37	2	2	3	1	0
29	3	Circ @ A206 Crossway Blvd	42	1	2	31	0	0	-11	-1	-2	47	3	2	5	2	0
30	1	Exit to A206 Crossway Blvd from Circ	10	0	0	14	0	0	4	0	0	14	0	0	4	0	0
31	1	Exit to A206 Crossway Blvd from Bridge	34	0	0	21	0	0	-13	0	0	35	0	0	1	0	0
32	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
33	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
34	1	A206 Crossway Blvd Feeder Lane	269	1144	314	352	0	0	83	-1144	-314	130	442	136	-139	-703	-178
34	2	A206 Crossway Blvd Feeder Lane	226	1019	232	293	0	0	67	-1019	-232	82	32	44	-144	-987	-188
35	1	Cotton Lane Feeder Lane	22	0	0	22	0	0	0	0	0	22	0	0	0	0	0
36	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0

Time spent (PCU-hr/hr)	1139 PCUhr/hr	1646 PCUhr/hr	507 PCUhr/hr	481 PCUhr/hr	-657 PCUhr/hr
0.00	4.51 kph	2.75 kph	-1.76 kph	12.20 kph	7.69 kph
Total delay (PCU hr / hr)	968 PCUhr/hr	1408 PCUhr/hr	440 PCUhr/hr	286 PCUhr/hr	-682 PCUhr/hr

M25 Junction 1b
AM PEAK HOUR - No LTC

Degree of Sat is 90% or less
Degree of Sat is 90%-100%
Degree of Sat is greater than 100%

Reduction due to Local Plan
Increase due to Local Plan

Reduction due to Local Plan
Increase due to Local Plan

			Reference			Local Plan			Differences			Local Plan + Mitigation			Differences		
Arm	Stream	Description	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)
	1	Eastern Circulatory	14	0	0	13	0	0	-1	0	0	11	0	0	-3	0	0
	2	Eastern Circulatory	20	0	1	20	0	1	0	0	0	29	0	2	9	0	0
	3	Eastern Circulatory	6	0	0	6	0	0	0	0	0	6	0	0	0	0	0
	1	Northern Circulatory	43	3	2	63	10	5	20	7	3	9	4	1	-34	1	-1
	2	Northern Circulatory	52	5	3	74	17	7	22	12	3	77	9	9	25	4	6
	3	Northern Circulatory	26	8	2	36	14	2	10	6	0	39	5	2	13	-3	0
	1	Southern Circulatory	39	7	2	39	8	2	0	1	0	69	17	3	30	11	1
	2	Southern Circulatory	33	5	2	30	7	2	-3	1	0	53	11	2	20	6	0
	3	Southern Circulatory	8	9	0	12	8	1	4	-1	1	21	14	1	13	5	1
	1	Western Circulatory	33	0	0	35	0	0	2	0	0	21	0	0	-12	0	0
	2	Western Circulatory	4	0	0	6	0	0	2	0	0	21	0	0	17	0	0
	3	Western Circulatory	30	0	0	30	0	0	0	0	0	30	0	0	0	0	0
	1	A225 West entry	63	5	2	67	6	2	4	1	0	67	6	2	4	1	0
	2	A225 West entry	38	4	2	41	5	2	3	1	0	83	19	3	45	14	2
	3	A225 West entry	100	89	16	100	91	16	0	3	0	83	18	3	-17	-70	-13
	1	A225 West Exit	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	1	A225 West Feeder	35	0	0	36	1	0	1	0	0	48	1	0	13	0	0
	2	A225 West Feeder	120	312	67	125	375	79	5	63	12	23	0	0	-97	-312	-67
	1	A282 North Entry	68	23	4	38	10	2	-30	-13	-1	77	29	4	9	7	1
	2	A282 North Entry	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	3	A282 North Entry	28	14	2	15	8	1	-13	-6	0	32	16	2	4	1	0
	4	A282 North Entry	28	14	2	15	8	1	-13	-6	0	32	16	2	4	1	0
	1	A282 North Exit	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	1	A282 North Feeder	15	0	0	15	0	0	0	0	0	15	0	0	0	0	0
	2	A282 North Feeder	12	0	0	12	0	0	0	0	0	12	0	0	0	0	0
	1	A282 South Entry	56	11	5	64	14	5	8	3	1	45	6	3	-11	-4	-1
	2	A282 South Entry	73	15	7	87	26	9	14	11	3	56	7	5	-17	-8	-2
	3	A282 South Entry	71	14	7	83	22	8	12	8	2	53	7	5	-18	-7	-2
	1	A282 South Exit	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	1	A296 East Entry	80	9	3	80	10	3	0	0	0	86	14	4	6	5	1
	2	A296 East Entry	21	1	1	27	1	2	6	0	0	28	1	2	7	0	0
	3	A296 East Entry	23	1	1	29	1	2	6	0	0	31	1	2	8	0	0
	1	A296 East Exit	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	1	A296 East Feeder	41	1	0	43	1	0	2	0	0	43	1	0	2	0	0
	2	A296 East Feeder	9	0	0	11	0	0	2	0	0	11	0	0	2	0	0

Time spent (PCU-hr/hr)	143	PCUhr/hr	163	PCUhr/hr	20	PCUhr/hr	75	PCUhr/hr	-68	PCUhr/hr
Mean journey speed (kph)	10.65	kph	9.59	kph	-1.06	kph	21.14	kph	10.49	kph
Total delay (PCU hr / hr)	92	PCUhr/hr	111	PCUhr/hr	19	PCUhr/hr	22	PCUhr/hr	-70	PCUhr/hr

M25 Junction 1b
PM PEAK HOUR - No LTC

Degree of Sat is 90% or less
Degree of Sat is 90%-100%
Degree of Sat is greater than 100%

Reduction due to Local Plan
Increase due to Local Plan

Reduction due to Local Plan
Increase due to Local Plan

			Reference			Local Plan			Differences			Local Plan + Mitigation			Differences		
Arm	Stream	Description	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)
	1	Eastern Circulatory	15	0	0	15	0	0	0	0	0	9	0	0	-6	0	0
	2	Eastern Circulatory	22	0	2	22	0	3	0	0	1	28	0	2	6	0	0
	3	Eastern Circulatory	6	0	0	7	0	0	1	0	0	7	0	0	1	0	0
	1	Northern Circulatory	28	3	2	23	2	2	-5	0	0	26	6	3	-2	3	2
	2	Northern Circulatory	35	4	2	30	3	2	-5	-1	0	61	10	8	26	6	6
	3	Northern Circulatory	25	6	2	22	4	2	-3	-2	0	32	9	5	7	3	3
	1	Southern Circulatory	26	2	1	25	2	1	-1	0	0	55	16	4	29	13	3
	2	Southern Circulatory	30	2	2	29	2	2	-1	-1	0	65	18	6	35	16	4
	3	Southern Circulatory	21	3	2	20	2	2	-1	-1	0	45	21	5	24	17	3
	1	Western Circulatory	16	0	0	17	0	0	1	0	0	16	0	0	0	0	0
	2	Western Circulatory	14	0	0	15	0	0	1	0	0	29	0	0	15	0	0
	3	Western Circulatory	14	1	10	12	1	10	-2	0	0	27	0	2	13	0	-9
	1	A225 West entry	62	4	2	62	4	2	0	0	0	69	7	2	7	3	0
	2	A225 West entry	33	1	2	33	1	2	0	0	0	83	20	4	50	19	2
	3	A225 West entry	92	26	6	90	21	5	-2	-4	-1	81	19	3	-11	-7	-2
	1	A225 West Exit	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	1	A225 West Feeder	37	1	0	36	1	0	-1	0	0	47	1	0	10	0	0
	2	A225 West Feeder	32	0	0	31	0	0	-1	0	0	21	0	0	-11	0	0
	1	A282 North Entry	84	42	7	91	151	15	7	109	8	87	52	9	3	11	2
	2	A282 North Entry	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	3	A282 North Entry	29	20	2	41	30	3	12	10	1	33	26	2	4	6	1
	4	A282 North Entry	30	20	2	41	30	3	11	10	1	33	26	2	3	6	1
	1	A282 North Exit	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	1	A282 North Feeder	18	0	0	120	336	39	102	336	39	18	0	0	0	0	0
	2	A282 North Feeder	12	0	0	13	0	0	1	0	0	13	0	0	1	0	0
	1	A282 South Entry	129	440	49	174	787	91	45	347	42	48	12	7	-81	-428	-42
	2	A282 South Entry	129	443	50	174	788	91	45	345	42	48	12	7	-81	-431	-43
	3	A282 South Entry	272	1148	258	340	1281	291	68	133	33	51	13	7	-221	-1135	-251
	1	A282 South Exit	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	1	A296 East Entry	62	4	2	63	4	2	1	0	0	63	4	2	1	0	0
	2	A296 East Entry	36	2	2	37	2	2	1	0	0	37	2	2	1	0	0
	3	A296 East Entry	84	14	4	87	17	4	3	3	1	88	20	5	4	6	1
	1	A296 East Exit	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	1	A296 East Feeder	38	1	0	38	1	0	0	0	0	38	1	0	0	0	0
	2	A296 East Feeder	30	0	0	31	0	0	1	0	0	31	0	0	1	0	0

Time spent (PCU-hr/hr)	416 PCUhr/hr	576 PCUhr/hr	160 PCUhr/hr	91 PCUhr/hr	-325 PCUhr/hr
Mean journey speed (kph)	3.61 kph	2.56 kph	-1.05 kph	18.98 kph	15.37 kph
Total delay (PCU hr / hr)	366 PCUhr/hr	527 PCUhr/hr	161 PCUhr/hr	33 PCUhr/hr	-333 PCUhr/hr

M25 Junction 1b
AM PEAK HOUR - With LTC

Degree of Sat is 90% or less
Degree of Sat is 90%-100%
Degree of Sat is greater than 100%

Reduction due to Local Plan
Increase due to Local Plan

Reduction due to Local Plan
Increase due to Local Plan

			Reference			Local Plan			Differences			Local Plan + Mitigation			Differences		
Arm	Stream	Description	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)
	1	Eastern Circulatory	15	0	0	15	0	0	0	0	0	9	0	0	-6	0	0
	2	Eastern Circulatory	23	0	1	25	0	2	2	0	0	31	0	2	8	0	0
	3	Eastern Circulatory	8	0	0	10	0	0	2	0	0	10	0	0	2	0	0
	1	Northern Circulatory	64	10	6	65	10	6	1	0	0	27	2	2	-37	-8	-4
	2	Northern Circulatory	77	16	7	78	17	8	1	1	0	65	6	7	-12	-10	-1
	3	Northern Circulatory	40	11	2	41	11	2	1	0	0	40	6	2	0	-5	0
	1	Southern Circulatory	42	7	2	49	8	2	7	0	0	56	8	3	14	1	1
	2	Southern Circulatory	39	7	2	42	7	2	3	0	0	49	6	3	10	0	2
	3	Southern Circulatory	18	8	1	18	8	1	0	0	0	21	10	1	3	2	0
	1	Western Circulatory	8	0	0	9	0	0	1	0	0	8	0	0	0	0	0
	2	Western Circulatory	7	0	0	7	0	0	0	0	0	17	0	0	10	0	0
	3	Western Circulatory	30	0	0	30	0	0	0	0	0	21	0	3	-9	0	3
	1	A225 West entry	67	4	2	71	5	2	4	1	0	76	7	3	9	3	0
	2	A225 West entry	35	1	2	36	1	2	1	0	0	63	5	2	28	4	0
	3	A225 West entry	91	24	5	94	33	7	3	9	2	64	6	2	-27	-18	-3
	1	A225 West Exit	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	1	A225 West Feeder	42	1	0	44	1	0	2	0	0	54	1	0	12	0	0
	2	A225 West Feeder	31	0	0	32	0	0	1	0	0	22	0	0	-9	0	0
	1	A282 North Entry	36	10	2	36	10	2	0	0	0	58	18	3	22	8	1
	2	A282 North Entry	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	3	A282 North Entry	20	9	1	24	9	2	4	0	0	40	15	2	20	6	0
	4	A282 North Entry	20	9	1	24	9	2	4	0	0	40	15	2	20	6	0
	1	A282 North Exit	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	1	A282 North Feeder	14	0	0	14	0	0	0	0	0	14	0	0	0	0	0
	2	A282 North Feeder	16	0	0	19	0	0	3	0	0	19	0	0	3	0	0
	1	A282 South Entry	37	10	2	38	10	3	1	0	0	44	9	3	7	-1	1
	2	A282 South Entry	37	10	3	38	10	3	1	0	0	44	9	3	7	-1	1
	3	A282 South Entry	81	21	8	82	22	8	1	1	0	46	10	3	-35	-11	-4
	1	A282 South Exit	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	1	A296 East Entry	70	6	2	69	6	2	-1	0	0	70	6	2	0	0	0
	2	A296 East Entry	26	1	1	30	1	2	4	0	0	31	1	2	5	0	0
	3	A296 East Entry	42	2	2	43	3	2	1	0	0	44	3	2	2	0	0
	1	A296 East Exit	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	1	A296 East Feeder	38	1	0	38	1	0	0	0	0	38	1	0	0	0	0
	2	A296 East Feeder	15	0	0	15	0	0	0	0	0	15	0	0	0	0	0

Time spent (PCU-hr/hr)	70	PCUhr/hr	75	PCUhr/hr	5	PCUhr/hr	66	PCUhr/hr	-4	PCUhr/hr
Mean journey speed (kph)	21.23	kph	20.65	kph	-0.58	kph	23.20	kph	1.97	kph
Total delay (PCU hr / hr)	20	PCUhr/hr	23	PCUhr/hr	3	PCUhr/hr	15	PCUhr/hr	-6	PCUhr/hr

M25 Junction 1b
PM PEAK HOUR - With LTC

Degree of Sat is 90% or less
Degree of Sat is 90%-100%
Degree of Sat is greater than 100%

Reduction due to Local Plan
Increase due to Local Plan

Reduction due to Local Plan
Increase due to Local Plan

			Reference			Local Plan			Differences			Local Plan + Mitigation			Differences		
Arm	Stream	Description	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)
	1	Eastern Circulatory	15	0	0	16	0	0	1	0	0	11	0	0	-4	0	0
	2	Eastern Circulatory	26	0	2	27	0	3	1	0	1	32	1	3	6	0	1
	3	Eastern Circulatory	10	0	0	11	0	0	1	0	0	11	0	0	1	0	0
	1	Northern Circulatory	35	5	2	30	4	2	-5	-1	0	29	2	2	-6	-2	0
	2	Northern Circulatory	51	7	3	42	5	3	-9	-2	-1	69	6	11	18	-2	8
	3	Northern Circulatory	33	10	3	29	7	2	-4	-3	-1	37	6	3	4	-4	0
	1	Southern Circulatory	34	4	2	32	2	2	-2	-1	0	76	25	7	42	22	6
	2	Southern Circulatory	35	3	2	33	2	2	-2	-1	0	79	28	7	44	24	6
	3	Southern Circulatory	19	6	2	18	3	1	-1	-2	0	44	17	3	25	11	1
	1	Western Circulatory	12	0	0	12	0	0	0	0	0	12	0	0	0	0	0
	2	Western Circulatory	12	0	0	12	0	0	0	0	0	25	0	0	13	0	0
	3	Western Circulatory	18	1	10	16	1	10	-2	0	0	27	1	6	9	0	-4
	1	A225 West entry	66	4	2	67	4	2	1	0	0	74	7	2	8	3	0
	2	A225 West entry	26	1	2	28	1	2	2	0	0	75	10	3	49	9	1
	3	A225 West entry	90	23	5	91	23	6	1	1	0	74	10	3	-16	-12	-3
	1	A225 West Exit	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	1	A225 West Feeder	38	1	0	39	1	0	1	0	0	50	1	0	12	0	0
	2	A225 West Feeder	32	0	0	33	0	0	1	0	0	22	0	0	-10	0	0
	1	A282 North Entry	63	18	4	76	28	6	13	10	2	82	33	7	19	16	3
	2	A282 North Entry	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	3	A282 North Entry	31	13	2	40	18	3	9	5	1	43	19	3	12	7	1
	4	A282 North Entry	32	13	2	40	18	3	8	5	1	43	19	3	11	7	1
	1	A282 North Exit	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	1	A282 North Feeder	20	0	0	20	0	0	0	0	0	20	0	0	0	0	0
	2	A282 North Feeder	20	0	0	20	0	0	0	0	0	20	0	0	0	0	0
	1	A282 South Entry	98	91	12	119	328	37	21	238	25	44	8	4	-54	-83	-7
	2	A282 South Entry	98	91	12	119	325	37	21	234	25	44	8	4	-54	-83	-7
	3	A282 South Entry	215	974	0	251	1093	244	36	119	244	46	9	5	-169	-965	5
	1	A282 South Exit	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	1	A296 East Entry	61	4	2	63	4	2	2	0	0	63	4	2	2	0	0
	2	A296 East Entry	35	2	2	37	2	2	2	0	0	38	2	2	3	0	0
	3	A296 East Entry	72	8	2	75	9	3	3	1	0	76	10	3	4	2	0
	1	A296 East Exit	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	1	A296 East Feeder	37	1	0	37	1	0	0	0	0	37	1	0	0	0	0
	2	A296 East Feeder	24	0	0	25	0	0	1	0	0	25	0	0	1	0	0

Time spent (PCU-hr/hr)	301	PCUhr/hr	378	PCUhr/hr	77	PCUhr/hr	85	PCUhr/hr	-216	PCUhr/hr
Mean journey speed (kph)	5.26	kph	4.17	kph	-1.09	kph	20.59	kph	15.33	kph
Total delay (PCU hr / hr)	248	PCUhr/hr	325	PCUhr/hr	77	PCUhr/hr	27	PCUhr/hr	-221	PCUhr/hr

M25 Junction 2
AM PEAK HOUR - No LTC

Degree of Sat is 90% or less
Degree of Sat is 90%-100%
Degree of Sat is greater than 100%

Reduction due to Local Plan
Increase due to Local Plan

Reduction due to Local Plan
Increase due to Local Plan

Arm	Stream	Description	Reference			Local Plan			Differences			Local Plan + Mitigation			Differences		
			Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)
A	1	A2 East Entry	0	0	0	0	13	0	0	13	0	1	53	0	1	53	0
	2	A2 East Entry	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Ac	1	Eastern Circulatory	100	190	37	97	113	35	-3	-77	-2	45	1	0	-55	-189	-37
	2	Eastern Circulatory	100	189	37	96	109	34	-4	-80	-3	64	2	21	-36	-187	-16
	3	Eastern Circulatory	100	212	37	97	126	34	-3	-85	-2	32	1	26	-68	-210	-11
Ax	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
B	1	A282 South Entry	87	67	29	86	53	29	-1	-14	0	87	45	23	0	-22	-5
	2	A282 South Entry	0	0	0	0	0	0	0	0	0	80	39	20	80	39	20
	3	A282 South Entry	0	######	28	113	1466	35	113	######	7	80	39	20	80	######	-8
Bc	1	Southern Circulatory	86	80	18	86	56	18	0	-24	0	56	54	21	-30	-26	2
	2	Southern Circulatory	0	0	0	0	33	0	0	33	0	0	0	0	0	0	0
	3	Southern Circulatory	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Bx	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
C	1	A2 West Entry	88	31	33	93	80	40	5	49	8	94	100	41	6	69	8
	2	A2 West Entry	1	9	0	0	0	0	-1	-9	0	0	0	0	-1	-9	0
	3	A2 West Entry	0	0	0	0	0	0	0	0	0	61	26	14	61	26	14
	4	A2 West Entry	100	549	42	100	236	46	0	-313	4	61	26	14	-39	-523	-29
Cc	1	Western Circulatory	100	208	38	83	51	20	-17	-157	-18	83	12	3	-17	-196	-35
	2	Western Circulatory	0	0	0	0	0	0	0	0	0	76	9	3	76	9	3
	3	Western Circulatory	100	63350	26	100	1420	30	0	-61930	4	76	9	3	-24	-63341	-24
Cx	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
D	1	A282 North Entry	25	10	5	29	16	6	4	5	1	85	55	19	60	45	14
	2	A282 North Entry	57	15	15	66	23	18	9	8	4	99	109	28	42	94	13
	3	A282 North Entry	205	941	275	161	703	217	-44	-238	-59	187	863	260	-18	-78	-15
Dc	1	Northern Circulatory	0	66	0	5	58	1	5	-8	1	51	26	12	51	-40	12
	2	Northern Circulatory	0	70	0	5	0	0	5	-70	0	51	26	12	51	-44	12
	3	Northern Circulatory	92	202	15	90	75	15	-2	-127	0	49	11	12	-43	-191	-4
	4	Northern Circulatory	0	0	0	0	0	0	0	0	0	49	10	10	49	10	10
Dx	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
13	1	A2 West Feeder	50	1	0	113	245	101	63	244	101	127	410	148	77	409	148
	2	A2 West Feeder	444	1402	431	209	956	315	-235	-446	-116	52	1	0	-392	-1401	-431
14	1	Circulatory After A2 West Entry	73	2	1	71	2	1	-2	0	0	74	2	1	1	0	0
	2	Circulatory After A2 West Entry	1	0	0	0	0	0	-1	0	0	31	0	0	30	0	0
	3	Circulatory After A2 West Entry	0	0	0	2	0	0	2	0	0	32	0	0	32	0	0
	4	Circulatory After A2 West Entry	100	272	20	100	125	25	0	-147	4	27	0	0	-73	-272	-20
	5	Circulatory After A2 West Entry	0	0	0	0	0	0	0	0	0	26	0	0	26	0	0
15	1	Circulatory After Access to A282	0	0	0	2	0	0	2	0	0	48	1	2	48	1	2
	2	Circulatory After Access to A282	100	217	16	94	72	14	-6	-145	-2	32	0	2	-68	-217	-15
	3	Circulatory After Access to A282	0	0	0	0	0	0	0	0	0	32	4	7	32	4	7
			0	0	0	0	0	0				32	5	10	32	5	10
16	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
17	1	A2 East Feeder	59	1	0	59	1	0	0	0	0	59	1	0	0	0	0
	2	A2 East Feeder	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
18	1	A2 East to A282 South Bypass	59	1	0	59	1	0	0	0	0	59	1	0	0	0	0
19	1	Circulatory after A2 East Entry	24	0	0	31	0	0	7	0	0	38	1	0	14	0	0
	2	Circulatory after A2 East Entry	24	0	0	31	0	0	7	0	0	53	1	0	29	1	0
	3	Circulatory after A2 East Entry	24	0	0	31	0	0	7	0	0	27	0	0	3	0	0
	4	Circulatory after A2 East Entry	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
20	1	Exit to A2 West from Circulatory	40	1	0	50	1	0	10	0	0	26	0	0	-14	0	0
21	1	A282 South Feeder	145	577	235	131	444	193	-14	-132	-42	61	1	0	-84	-576	-235
	2	A282 South Feeder	1858	1713	632	1610	1691	625	-248	-22	-8	62	1	1	-1796	-1712	-632
22	1	A282 South to A2 West Bypass	2	0	0	2	0	0	0	0	0	29	0	0	27	0	0

Time spent (PCU- hr/hr)	1922	PCUhr/hr	1745	PCUhr/hr	-176	PCUhr/hr	643	PCUhr/hr	-1279	PCUhr/hr
Mean journey speed (kph)	1.52	kph	1.90	kph	0.38	kph	7.21	kph	5.69	kph
Total delay (PCU hr / hr)	1825	PCUhr/hr	1635	PCUhr/hr	-190	PCUhr/hr	489	PCUhr/hr	-1336	PCUhr/hr

M25 Junction 2
PM PEAK HOUR - No LTC

Degree of Sat is 90% or less
Degree of Sat is 90%-100%
Degree of Sat is greater than 100%

Reduction due to Local Plan
Increase due to Local Plan

Reduction due to Local Plan
Increase due to Local Plan

			Reference			Local Plan			Differences			Local Plan + Mitigation			Differences		
Arm	Stream	Description	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)
A	1	A2 East Entry	5	13	1	7	14	1	2	0	0	64	78	3	59	65	2
	2	A2 East Entry	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Ac	1	Eastern Circulatory	89	60	20	89	57	19	0	-3	0	37	1	5	-52	-59	-15
	2	Eastern Circulatory	89	58	19	88	56	19	-1	-3	0	59	3	6	-30	-56	-13
	3	Eastern Circulatory	97	123	34	97	121	35	0	-3	0	42	5	26	-55	-118	-8
Ax	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
B	1	A282 South Entry	86	55	29	86	57	29	0	2	0	89	48	25	3	-7	-3
	2	A282 South Entry	0	0	0	0	0	0	0	0	0	76	36	18	76	36	18
	3	A282 South Entry	97	1088	32	89	1516	30	-8	428	-2	76	36	18	-21	-1052	-14
Bc	1	Southern Circulatory	86	55	18	86	54	18	0	-1	0	76	25	23	-10	-30	5
	2	Southern Circulatory	8	33	2	11	32	2	3	-1	1	9	0	0	1	-32	-2
	3	Southern Circulatory	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Bx	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
C	1	A2 West Entry	73	27	19	78	29	21	5	3	2	95	123	42	22	96	23
	2	A2 West Entry	35	17	7	36	18	7	1	0	0	45	35	12	10	18	6
	3	A2 West Entry	0	0	0	0	0	0	0	0	0	70	34	15	70	34	15
	4	A2 West Entry	94	156	40	100	180	47	6	24	6	69	33	15	-25	-123	-26
Cc	1	Western Circulatory	91	58	24	90	55	24	-1	-3	0	88	36	15	-3	-22	-9
	2	Western Circulatory	0	0	0	0	0	0	0	0	0	66	17	6	66	17	6
	3	Western Circulatory	100	1029	31	100	1368	30	0	339	-1	66	16	5	-34	-1013	-26
Cx	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
D	1	A282 North Entry	37	17	8	37	17	8	0	0	0	57	31	13	20	14	5
	2	A282 North Entry	49	19	12	50	19	12	1	0	0	62	33	14	13	14	2
	3	A282 North Entry	164	727	232	167	744	245	3	17	13	153	648	218	-11	-79	-15
Dc	1	Northern Circulatory	6	54	2	5	54	1	-1	0	0	59	15	12	53	-40	10
	2	Northern Circulatory	9	32	2	5	42	1	-4	10	0	59	14	12	50	-18	10
	3	Northern Circulatory	87	55	14	87	53	14	0	-1	0	55	13	4	-32	-41	-10
	4	Northern Circulatory	0	0	0	0	0	0	0	0	0	54	14	4	54	14	4
Dx	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
13	1	A2 West Feeder	53	1	0	54	1	0	1	0	0	103	110	64	50	109	64
	2	A2 West Feeder	169	752	242	166	736	245	-3	-16	3	51	1	0	-118	-751	-241
14	1	Circulatory After A2 West Entry	64	1	1	65	2	1	1	0	0	74	2	1	10	1	1
	2	Circulatory After A2 West Entry	18	0	0	18	0	0	0	0	0	50	1	6	32	1	6
	3	Circulatory After A2 West Entry	2	0	0	2	0	0	0	0	0	32	1	6	30	1	6
	4	Circulatory After A2 West Entry	90	55	17	91	59	17	1	4	0	27	0	0	-63	-54	-17
	5	Circulatory After A2 West Entry	0	0	0	0	0	0	0	0	0	26	0	0	26	0	0
15	1	Circulatory After Access to A282	2	0	0	2	0	0	0	0	0	36	8	10	34	8	10
	2	Circulatory After Access to A282	95	56	15	100	91	22	5	34	6	37	8	10	-58	-49	-5
	3	Circulatory After Access to A282	0	0	0	0	0	0	0	0	0	27	0	0	27	0	0
			0	0	0	0	0	0				26	0	0	26	0	0
16	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
17	1	A2 East Feeder	68	2	1	69	2	1	1	0	0	69	2	1	1	0	0
	2	A2 East Feeder	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
18	1	A2 East to A282 South Bypass	65	2	1	65	2	1	0	0	0	65	2	1	0	0	0
19	1	Circulatory after A2 East Entry	29	0	0	30	0	0	1	0	0	31	0	0	2	0	0
	2	Circulatory after A2 East Entry	29	0	0	30	0	0	1	0	0	50	1	0	21	1	0
	3	Circulatory after A2 East Entry	35	0	0	36	0	0	1	0	0	40	1	3	5	0	3
	4	Circulatory after A2 East Entry	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
20	1	Exit to A2 West from Circulatory	50	1	0	50	1	0	0	0	0	34	0	0	-16	0	0
21	1	A282 South Feeder	136	497	216	139	529	230	3	33	14	63	1	1	-73	-495	-216
	2	A282 South Feeder	1300	1665	596	1889	1707	610	589	42	14	60	1	0	-1240	-1664	-595
22	1	A282 South to A2 West Bypass	2	0	0	2	0	0	0	0	0	30	0	0	28	0	0

Time spent (PCU- hr/hr)	1560	PCUhr/hr	1618	PCUhr/hr	57	PCUhr/hr	513	PCUhr/hr	-1047	PCUhr/hr
Mean journey speed (kph)	2.28	kph	2.23	kph	-0.05	kph	9.66	kph	7.38	kph
Total delay (PCU hr / hr)	1442	PCUhr/hr	1498	PCUhr/hr	56	PCUhr/hr	348	PCUhr/hr	-1094	PCUhr/hr

M25 Junction 2
AM PEAK HOUR - With LTC

Degree of Sat is 90% or less
Degree of Sat is 90%-100%
Degree of Sat is greater than 100%

Reduction due to Local Plan
Increase due to Local Plan

Reduction due to Local Plan
Increase due to Local Plan

Arm	Stream	Description	Reference			Local Plan			Differences			Local Plan + Mitigation			Differences		
			Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)
A	1	A2 East Entry	5	13	1	5	13	1	0	0	0	41	60	2	36	47	0
	2	A2 East Entry	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Ac	1	Eastern Circulatory	97	86	27	96	81	26	-1	-5	-1	33	7	7	-64	-79	-20
	2	Eastern Circulatory	96	83	26	95	78	26	-1	-5	-1	51	5	8	-45	-78	-19
	3	Eastern Circulatory	97	126	34	97	125	34	0	-1	0	48	1	26	-49	-125	-8
Ax	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
B	1	A282 South Entry	86	55	29	86	54	29	0	-1	0	88	45	24	2	-10	-5
	2	A282 South Entry	0	0	0	0	0	0	0	0	0	81	37	19	81	37	19
	3	A282 South Entry	102	1557	32	89	1128	30	-13	-429	-2	81	37	20	-21	-1519	-12
Bc	1	Southern Circulatory	86	56	18	86	56	18	0	-1	0	86	43	26	0	-13	7
	2	Southern Circulatory	41	72	2	8	33	2	-33	-39	0	6	57	2	-35	-16	0
	3	Southern Circulatory	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Bx	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
C	1	A2 West Entry	39	18	8	42	18	8	3	1	0	43	32	11	4	14	3
	2	A2 West Entry	92	45	33	94	50	35	2	5	2	96	133	43	4	87	10
	3	A2 West Entry	0	0	0	0	0	0	0	0	0	51	28	10	51	28	10
	4	A2 West Entry	106	259	61	94	157	40	-12	-101	-20	50	27	9	-56	-231	-51
Cc	1	Western Circulatory	97	126	36	95	72	27	-2	-54	-9	80	11	3	-17	-115	-32
	2	Western Circulatory	0	0	0	0	0	0	0	0	0	68	4	1	68	4	1
	3	Western Circulatory	100	1494	30	100	1034	31	0	-460	1	68	4	1	-32	-1490	-29
Cx	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
D	1	A282 North Entry	29	16	6	29	16	6	0	0	0	50	24	11	21	9	5
	2	A282 North Entry	56	20	14	56	20	14	0	0	0	53	26	12	-3	6	-3
	3	A282 North Entry	169	759	245	167	742	238	-2	-17	-7	132	465	159	-37	-294	-86
Dc	1	Northern Circulatory	4	64	2	7	55	2	3	-8	0	71	5	1	67	-59	-1
	2	Northern Circulatory	2	74	2	9	33	2	7	-41	0	71	5	1	69	-69	-1
	3	Northern Circulatory	87	56	14	87	55	14	0	-1	0	48	53	12	-39	-3	-2
	4	Northern Circulatory	0	0	0	0	0	0	0	0	0	48	47	10	48	47	10
Dx	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
13	1	A2 West Feeder	64	2	1	66	2	1	2	0	0	129	427	194	65	425	194
	2	A2 West Feeder	121	348	95	130	441	116	9	93	21	38	0	0	-83	-348	-95
14	1	Circulatory After A2 West Entry	50	1	0	50	1	0	0	0	0	53	1	0	3	0	0
	2	Circulatory After A2 West Entry	45	1	0	46	1	0	1	0	0	68	2	1	23	1	1
	3	Circulatory After A2 West Entry	2	0	0	2	0	0	0	0	0	32	0	0	30	0	0
	4	Circulatory After A2 West Entry	91	64	17	90	55	17	-1	-9	0	20	0	0	-71	-64	-17
	5	Circulatory After A2 West Entry	0	0	0	0	0	0	0	0	0	19	0	0	19	0	0
15	1	Circulatory After Access to A282	2	0	0	2	0	0	0	0	0	32	0	0	30	0	0
	2	Circulatory After Access to A282	100	96	21	95	57	15	-5	-39	-6	32	0	0	-68	-96	-21
	3	Circulatory After Access to A282	0	0	0	0	0	0	0	0	0	35	6	2	35	6	2
			0	0	0	0	0	0				40	11	6	40	11	6
16	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
17	1	A2 East Feeder	67	2	1	67	2	1	0	0	0	67	2	1	0	0	0
	2	A2 East Feeder	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
18	1	A2 East to A282 South Bypass	64	2	1	64	2	1	0	0	0	64	2	1	0	0	0
19	1	Circulatory after A2 East Entry	31	0	0	31	0	0	0	0	0	27	0	0	-4	0	0
	2	Circulatory after A2 East Entry	31	0	0	31	0	0	0	0	0	43	1	0	12	0	0
	3	Circulatory after A2 East Entry	34	0	0	34	0	0	0	0	0	63	7	11	29	7	11
	4	Circulatory after A2 East Entry	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
20	1	Exit to A2 West from Circulatory	48	1	0	49	1	0	1	0	0	38	1	0	-10	0	0
21	1	A282 South Feeder	126	399	168	129	423	0	3	24	-168	60	1	0	-66	-398	-168
	2	A282 South Feeder	519	1480	566	1498	1683	0	979	203	-566	64	1	1	-455	-1478	-566
22	1	A282 South to A2 West Bypass	2	0	0	2	0	0	0	0	0	26	0	0	24	0	0

Time spent (PCU- hr/hr)	1405	PCUhr/hr	1471	PCUhr/hr	66	PCUhr/hr	574	PCUhr/hr	-831	PCUhr/hr
Mean journey speed (kph)	2.63	kph	2.54	kph	-0.09	kph	8.37	kph	5.74	kph
Total delay (PCU hr / hr)	1282	PCUhr/hr	1347	PCUhr/hr	65	PCUhr/hr	414	PCUhr/hr	-868	PCUhr/hr

M25 Junction 2
PM PEAK HOUR - With LTC

Degree of Sat is 90% or less
Degree of Sat is 90%-100%
Degree of Sat is greater than 100%

Reduction due to Local Plan
Increase due to Local Plan

Reduction due to Local Plan
Increase due to Local Plan

			Reference			Local Plan			Differences			Local Plan + Mitigation			Differences		
Arm	Stream	Description	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)	Deg Sat (%)	Mean Delay/ Veh (s)	Mean Max Q (pcu)
A	1	A2 East Entry	10	14	2	10	14	2	0	0	0	84	101	5	74	87	3
	2	A2 East Entry	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Ac	1	Eastern Circulatory	89	59	19	90	62	20	1	3	1	35	1	0	-54	-58	-19
	2	Eastern Circulatory	88	57	19	89	61	20	1	3	1	63	5	18	-25	-52	-1
	3	Eastern Circulatory	97	124	34	97	127	34	0	3	0	41	9	26	-56	-115	-8
Ax	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
B	1	A282 South Entry	87	65	29	87	65	29	0	0	0	76	26	18	-11	-38	-11
	2	A282 South Entry	0	0	0	0	0	0	0	0	0	65	22	14	65	22	14
	3	A282 South Entry	120	1501	37	118	1524	36	-2	24	-1	65	22	14	-55	-1479	-23
Bc	1	Southern Circulatory	86	55	18	86	56	18	0	1	0	85	60	20	-1	6	1
	2	Southern Circulatory	107	484	18	110	593	21	3	109	4	16	0	0	-91	-483	-18
	3	Southern Circulatory	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Bx	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
C	1	A2 West Entry	62	23	14	63	23	15	1	0	1	92	56	22	30	33	8
	2	A2 West Entry	53	20	11	54	21	12	1	0	1	79	38	15	26	17	4
	3	A2 West Entry	0	0	0	0	0	0	0	0	0	74	35	14	74	35	14
	4	A2 West Entry	106	253	61	106	258	61	0	5	0	73	34	13	-33	-219	-47
Cc	1	Western Circulatory	97	129	36	97	132	36	0	3	0	89	24	12	-8	-105	-24
	2	Western Circulatory	0	0	0	0	0	0	0	0	0	65	11	4	65	11	4
	3	Western Circulatory	100	1468	30	100	1494	30	0	26	0	65	11	4	-35	-1457	-26
Cx	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
D	1	A282 North Entry	39	17	8	39	17	9	0	0	0	67	34	13	28	17	4
	2	A282 North Entry	48	19	11	48	18	11	0	0	0	74	38	14	26	19	3
	3	A282 North Entry	184	841	297	193	889	323	9	47	26	192	882	318	8	40	22
Dc	1	Northern Circulatory	4	61	2	4	64	2	0	2	0	57	27	12	53	-34	10
	2	Northern Circulatory	2	70	2	2	74	2	0	3	0	57	28	12	55	-43	10
	3	Northern Circulatory	87	55	14	87	56	14	0	1	0	52	3	11	-35	-52	-4
	4	Northern Circulatory	0	0	0	0	0	0	0	0	0	52	2	9	52	2	9
Dx	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
13	1	A2 West Feeder	55	1	0	58	1	0	3	0	0	58	1	0	3	0	0
	2	A2 West Feeder	153	645	204	161	702	227	8	57	23	49	1	0	-104	-644	-203
14	1	Circulatory After A2 West Entry	60	1	0	61	1	0	1	0	0	72	2	1	12	1	0
	2	Circulatory After A2 West Entry	26	0	0	27	0	0	1	0	0	59	1	0	33	1	0
	3	Circulatory After A2 West Entry	2	0	0	2	0	0	0	0	0	32	0	0	30	0	0
	4	Circulatory After A2 West Entry	91	63	17	91	64	17	0	2	0	26	0	0	-65	-62	-17
	5	Circulatory After A2 West Entry	0	0	0	0	0	0	0	0	0	25	0	0	25	0	0
15	1	Circulatory After Access to A282	2	0	0	2	0	0	0	0	0	54	11	9	52	11	9
	2	Circulatory After Access to A282	100	95	21	100	96	21	0	1	0	55	12	9	-45	-83	-12
	3	Circulatory After Access to A282	0	0	0	0	0	0	0	0	0	27	0	7	27	0	7
			0	0	0	0	0	0				26	0	4	26	0	4
16	1	X	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
17	1	A2 East Feeder	75	3	1	75	3	1	0	0	0	75	3	1	0	0	0
	2	A2 East Feeder	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
18	1	A2 East to A282 South Bypass	70	2	1	70	2	1	0	0	0	70	2	1	0	0	0
19	1	Circulatory after A2 East Entry	29	0	0	29	0	0	0	0	0	29	0	0	0	0	0
	2	Circulatory after A2 East Entry	29	0	0	29	0	0	0	0	0	50	1	0	21	1	0
	3	Circulatory after A2 East Entry	37	1	0	37	1	0	0	0	0	37	1	0	0	0	0
	4	Circulatory after A2 East Entry	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
20	1	Exit to A2 West from Circulatory	48	1	0	48	1	0	0	0	0	30	0	0	-18	0	0
21	1	A282 South Feeder	141	545	223	143	561	231	2	16	9	60	1	0	-81	-544	-222
	2	A282 South Feeder	1559	1687	622	1614	1691	624	55	4	1	62	1	1	-1497	-1686	-622
22	1	A282 South to A2 West Bypass	2	0	0	2	0	0	0	0	0	26	0	0	24	0	0

Time spent (PCU- hr/hr)	1687	PCUhr/hr	1752	PCUhr/hr	65	PCUhr/hr	572	PCUhr/hr	-1116	PCUhr/hr
Mean journey speed (kph)	2.18	kph	2.11	kph	-0.07	kph	8.81	kph	6.63	kph
Total delay (PCU hr / hr)	1565	PCUhr/hr	1629	PCUhr/hr	64	PCUhr/hr	404	PCUhr/hr	-1161	PCUhr/hr

Appendix N

TRANSYT output – Junction 1a

Appendix O

TRANSYT output – Junction 1b

Appendix P
TRANSYT output – Junction 2