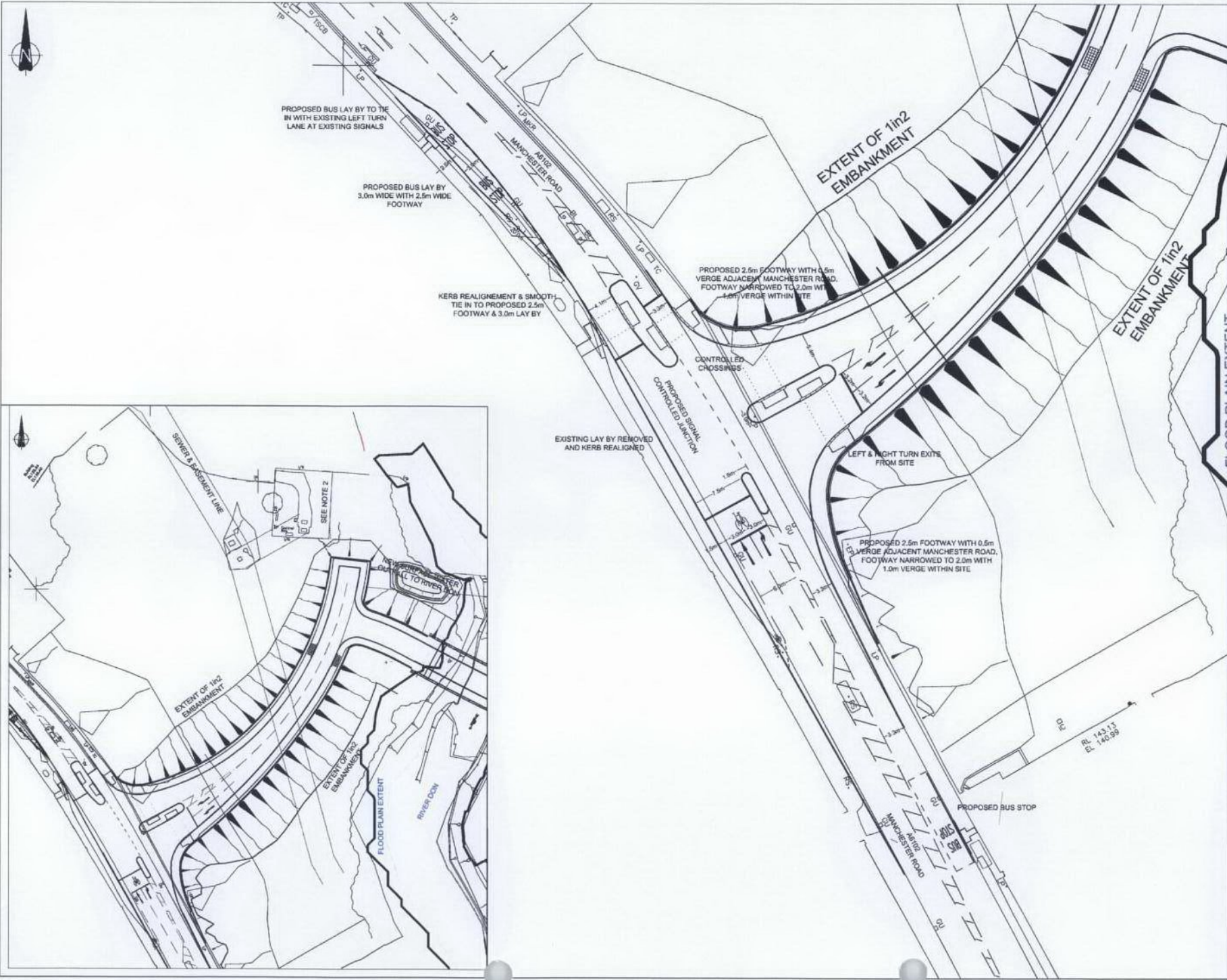


Appendix C

Access Junction



1. The drawings shall be used for construction purposes only. It is the responsibility of the contractor to ensure that the drawings are used in accordance with the contract documents and to ensure that the drawings are used in accordance with the contract documents and to ensure that the drawings are used in accordance with the contract documents.

- NOTES**
- 1a) SWS Storage to be provided by use of oversized pipes
 - 1b) Land drainage consent for new outfall to River Don will be required
 - 2) Confirmation required on future anticipated development proposed as it may be possible to reduce access road width and associated highway retaining structure adjacent to existing four pumping station compound

PRELIMINARY DRAWING
TO BE APPROVED BY BSH/FIELD CC

1	Revised to accommodate with SCC requirements 26/07/17	24/07/17	DJA
2	Revised to accommodate with SCC requirements	28/08/17	DJA
3	Revised to accommodate with SCC requirements	28/08/17	DJA
4	Revised to accommodate with SCC requirements	28/08/17	DJA
5	Revised to accommodate with SCC requirements	28/08/17	DJA
6	Revised to accommodate with SCC requirements	28/08/17	DJA
7	Revised to accommodate with SCC requirements	28/08/17	DJA
8	Revised to accommodate with SCC requirements	28/08/17	DJA
9	Revised to accommodate with SCC requirements	28/08/17	DJA
10	Revised to accommodate with SCC requirements	28/08/17	DJA

Rev.	Description	Date	By
------	-------------	------	----

Client: **BLOOR HOMES**

Project: **SECTION 278 WORKS
A6102 MANCHESTER ROAD, DEEPCAR**

Title: **PROPOSED ACCESS ROAD
GENERAL ARRANGEMENT**

BANNERS GATE
CIVIL, STRUCTURAL & TRANSPORTATION
ENGINEERS
Creswell House, 10-11 Birmingham Street, Halesowen B63 2HW
Tel: 0121 887 1200 Fax: 0121 887 1871
E: info@bannersgate.co.uk

Scale: 1:250/500 @ A1	Drawn: DJA
Date: May 11	Checked: HRV
File: 11027	Drawing: P774/400H

Appendix D

Traffic Data

CLASSIFIED TURNING COUNT

**DEEPCAR, SHEFFIELD
10871
OCTOBER 2007**

SITE: 1

DATE: 03/10/2007

LOCATION: WORTLEY RD / MANCHESTER RD

DAY: WEDNESDAY

TIME	MOVEMENT 1		TOT	MOVEMENT 2		TOT
	LV	HV		LV	HV	
07:30	28	2	30	34	5	39
07:45	32	2	34	38	2	40
HH/TOT	60	4	64	72	7	79
08:00	31	3	34	35	3	38
08:15	24	3	27	43	5	48
08:30	24	3	27	36	4	40
08:45	25	4	29	46	4	50
H/TOT	104	13	117	160	16	176
09:00	19	1	20	32	1	33
09:15	38	2	40	49	5	54
HH/TOT	57	3	60	81	6	87
P/TOT	221	20	241	313	29	342

TIME	MOVEMENT 1		TOT	MOVEMENT 2		TOT
	LV	HV		LV	HV	
15:30	19	1	20	94	2	96
15:45	21	0	21	107	3	110
HH/TOT	40	1	41	201	5	206
16:00	17	2	19	97	1	98
16:15	17	1	18	101	1	102
16:30	23	0	23	95	2	97
16:45	32	2	34	88	4	92
H/TOT	89	5	94	381	8	389
17:00	28	2	30	95	6	101
17:15	32	1	33	106	2	108
17:30	27	0	27	121	1	122
17:45	31	0	31	124	1	125
H/TOT	118	3	121	446	10	456
P/TOT	247	9	256	1028	23	1051

CLASSIFIED TURNING COUNT

**DEEPCAR, SHEFFIELD
10871
OCTOBER 2007**

SITE: 1

DATE: 03/10/2007

LOCATION: WORTLEY RD / MANCHESTER RD

DAY: WEDNESDAY

TIME	MOVEMENT 3			MOVEMENT 4		
	LV	HV	TOT	LV	HV	TOT
07:30	93	2	95	141	4	145
07:45	95	3	98	128	7	135
HH/TOT	188	5	193	269	11	280
08:00	100	4	104	109	7	116
08:15	85	1	86	93	2	95
08:30	91	3	94	96	3	99
08:45	101	1	102	95	6	101
H/TOT	377	9	386	393	18	411
09:00	93	4	97	96	4	100
09:15	65	3	68	47	5	52
HH/TOT	158	7	165	143	9	152
P/TOT	723	21	744	805	38	843

TIME	MOVEMENT 3			MOVEMENT 4		
	LV	HV	TOT	LV	HV	TOT
15:30	52	2	54	50	3	53
15:45	57	3	60	52	2	54
HH/TOT	109	5	114	102	5	107
16:00	54	2	56	53	4	57
16:15	60	3	63	56	3	59
16:30	49	1	50	54	3	57
16:45	52	3	55	51	2	53
H/TOT	215	9	224	214	12	226
17:00	59	2	61	59	3	62
17:15	45	4	49	45	7	52
17:30	44	4	48	61	2	63
17:45	71	1	72	68	4	72
H/TOT	219	11	230	233	16	249
P/TOT	543	25	568	549	33	582

CLASSIFIED TURNING COUNT

**DEEPCAR, SHEFFIELD
10871
OCTOBER 2007**

SITE: 1

DATE: 03/10/2007

LOCATION: WORTLEY RD / MANCHESTER RD

DAY: WEDNESDAY

TIME	MOVEMENT 5		TOT	MOVEMENT 6		TOT
	LV	HV		LV	HV	
07:30	25	5	30	28	1	29
07:45	39	4	43	27	1	28
HH/TOT	64	9	73	55	2	57
08:00	42	2	44	33	0	33
08:15	51	3	54	36	0	36
08:30	34	3	37	29	5	34
08:45	31	4	35	30	2	32
H/TOT	158	12	170	128	7	135
09:00	40	1	41	24	1	25
09:15	29	6	35	14	1	15
HH/TOT	69	7	76	38	2	40
P/TOT	291	28	319	221	11	232

TIME	MOVEMENT 5		TOT	MOVEMENT 6		TOT
	LV	HV		LV	HV	
15:30	92	3	95	32	2	34
15:45	95	5	100	36	2	38
HH/TOT	187	8	195	68	4	72
16:00	91	3	94	34	3	37
16:15	93	4	97	41	1	42
16:30	85	3	88	29	3	32
16:45	90	3	93	37	4	41
H/TOT	359	13	372	141	11	152
17:00	93	7	100	21	2	23
17:15	98	3	101	28	0	28
17:30	75	3	78	22	0	22
17:45	109	6	115	26	1	27
H/TOT	375	19	394	97	3	100
P/TOT	921	40	961	306	18	324

CLASSIFIED TURNING COUNT

**DEEPCAR, SHEFFIELD
10871
OCTOBER 2007**

SITE: 1

DATE: 03/10/2007

LOCATION: WORTLEY RD / MANCHESTER RD

DAY: WEDNESDAY

TIME	TO ARM A		TOT	FROM ARM A		TOT
	LV	HV		LV	HV	
07:30	121	3	124	62	7	69
07:45	122	4	126	70	4	74
HH/TOT	243	7	250	132	11	143
08:00	133	4	137	66	6	72
08:15	121	1	122	67	8	75
08:30	120	8	128	60	7	67
08:45	131	3	134	71	8	79
H/TOT	505	16	521	264	29	293
09:00	117	5	122	51	2	53
09:15	79	4	83	87	7	94
HH/TOT	196	9	205	138	9	147
P/TOT	944	32	976	534	49	583

TIME	TO ARM A		TOT	FROM ARM A		TOT
	LV	HV		LV	HV	
15:30	84	4	88	113	3	116
15:45	93	5	98	128	3	131
HH/TOT	177	9	186	241	6	247
16:00	88	5	93	114	3	117
16:15	101	4	105	118	2	120
16:30	78	4	82	118	2	120
16:45	89	7	96	120	6	126
H/TOT	356	20	376	470	13	483
17:00	80	4	84	123	8	131
17:15	73	4	77	138	3	141
17:30	66	4	70	148	1	149
17:45	97	2	99	155	1	156
H/TOT	316	14	330	564	13	577
P/TOT	849	43	892	1275	32	1307

TO ARM A table is total of movements 3 + 6
FROM ARM A table is total of movements 1 + 2

CLASSIFIED TURNING COUNT

**DEEPCAR, SHEFFIELD
10871
OCTOBER 2007**

SITE: 1

DATE: 03/10/2007

LOCATION: WORTLEY RD / MANCHESTER RD

DAY: WEDNESDAY

TIME	TO ARM B		TOT	FROM ARM B		TOT
	LV	HV		LV	HV	
07:30	59	10	69	234	6	240
07:45	77	6	83	223	10	233
HH/TOT	136	16	152	457	16	473
08:00	77	5	82	209	11	220
08:15	94	8	102	178	3	181
08:30	70	7	77	187	6	193
08:45	77	8	85	196	7	203
H/TOT	318	28	346	770	27	797
09:00	72	2	74	189	8	197
09:15	78	11	89	112	8	120
HH/TOT	150	13	163	301	16	317
P/TOT	604	57	661	1528	59	1587

TIME	TO ARM B		TOT	FROM ARM B		TOT
	LV	HV		LV	HV	
15:30	186	5	191	102	5	107
15:45	202	8	210	109	5	114
HH/TOT	388	13	401	211	10	221
16:00	188	4	192	107	6	113
16:15	194	5	199	116	6	122
16:30	180	5	185	103	4	107
16:45	178	7	185	103	5	108
H/TOT	740	21	761	429	21	450
17:00	188	13	201	118	5	123
17:15	204	5	209	90	11	101
17:30	196	4	200	105	6	111
17:45	233	7	240	139	5	144
H/TOT	821	29	850	452	27	479
P/TOT	1949	63	2012	1092	58	1150

TO ARM B table is total of movements 2 + 5
FROM ARM B table is total of movements 3 + 4

CLASSIFIED TURNING COUNT

**DEEPCAR, SHEFFIELD
10871
OCTOBER 2007**

SITE: 1

DATE: 03/10/2007

LOCATION: WORTLEY RD / MANCHESTER RD

DAY: WEDNESDAY

TIME	TO ARM C		TOT	FROM ARM C		TOT
	LV	HV		LV	HV	
07:30	169	6	175	53	6	59
07:45	160	9	169	66	5	71
HH/TOT	329	15	344	119	11	130
08:00	140	10	150	75	2	77
08:15	117	5	122	87	3	90
08:30	120	6	126	63	8	71
08:45	120	10	130	61	6	67
H/TOT	497	31	528	286	19	305
09:00	115	5	120	64	2	66
09:15	85	7	92	43	7	50
HH/TOT	200	12	212	107	9	116
P/TOT	1026	58	1084	512	39	551

TIME	TO ARM C		TOT	FROM ARM C		TOT
	LV	HV		LV	HV	
15:30	69	4	73	124	5	129
15:45	73	2	75	131	7	138
HH/TOT	142	6	148	255	12	267
16:00	70	6	76	125	6	131
16:15	73	4	77	134	5	139
16:30	77	3	80	114	6	120
16:45	83	4	87	127	7	134
H/TOT	303	17	320	500	24	524
17:00	87	5	92	114	9	123
17:15	77	8	85	126	3	129
17:30	88	2	90	97	3	100
17:45	99	4	103	135	7	142
H/TOT	351	19	370	472	22	494
P/TOT	796	42	838	1227	58	1285

TO ARM C table is total of movements 1 + 4
FROM ARM C table is total of movement 5 + 6

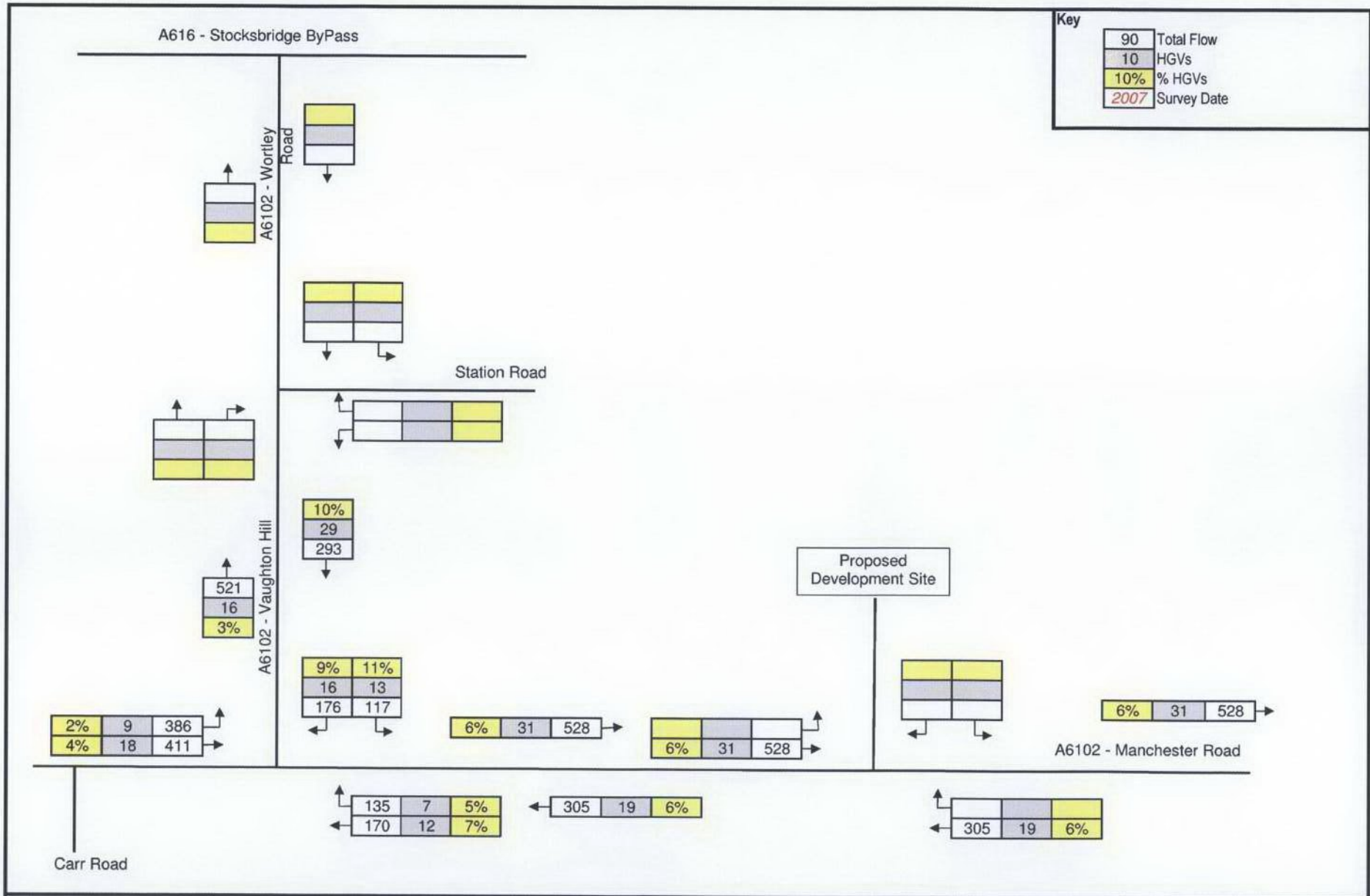
10871 SHEFFIELD										
SEPTEMBER 2007										
Site	Location	Direction	Start Date	End Date	Posted Speed Limit (PSL)	Total Vehicles	5 Day Ave.	7 Day Ave.	85%ile Speed	Mean Speed
Site No: 10871001	Manchester Road, Sheffield (Queue Sign)	Channel: Northbound	Tue 02-Oct-07	Mon 08-Oct-07	30	29156	4511	4165	45.3	39.3
		Channel: Southbound	Tue 02-Oct-07	Mon 08-Oct-07		30850	4780	4407	48.6	41.6

Appendix E

Traffic Distribution and Generation

Key

90	Total Flow
10	HGVs
10%	% HGVs
2007	Survey Date



Base Year 2007 Traffic Flows (AM)

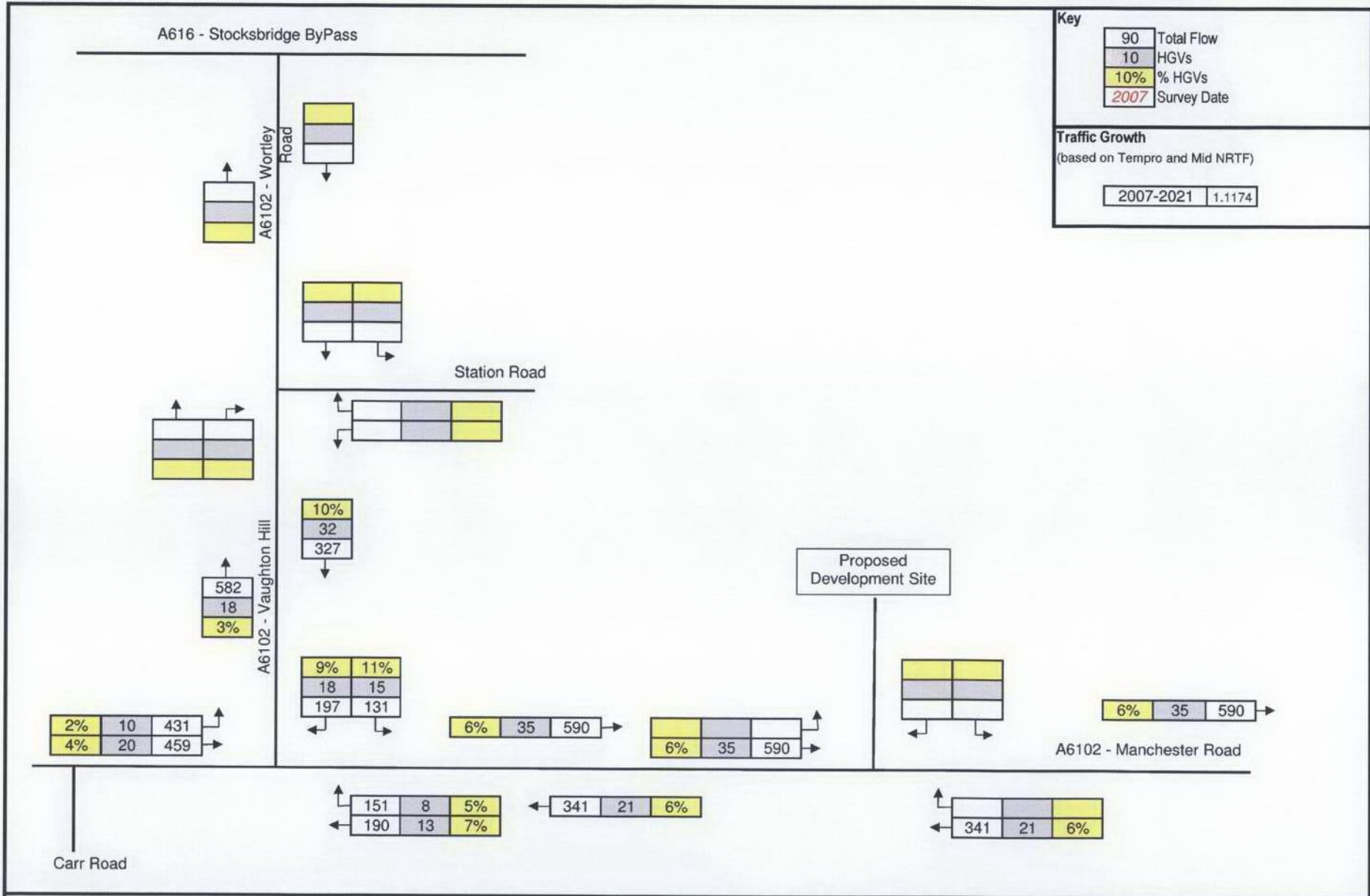
Figure 7a

Key

90	Total Flow
10	HGVs
10%	% HGVs
2007	Survey Date

Traffic Growth
(based on Tempo and Mid NRTF)

2007-2021	1.1174
-----------	--------



Background Traffic Opening Year 2021 (AM)

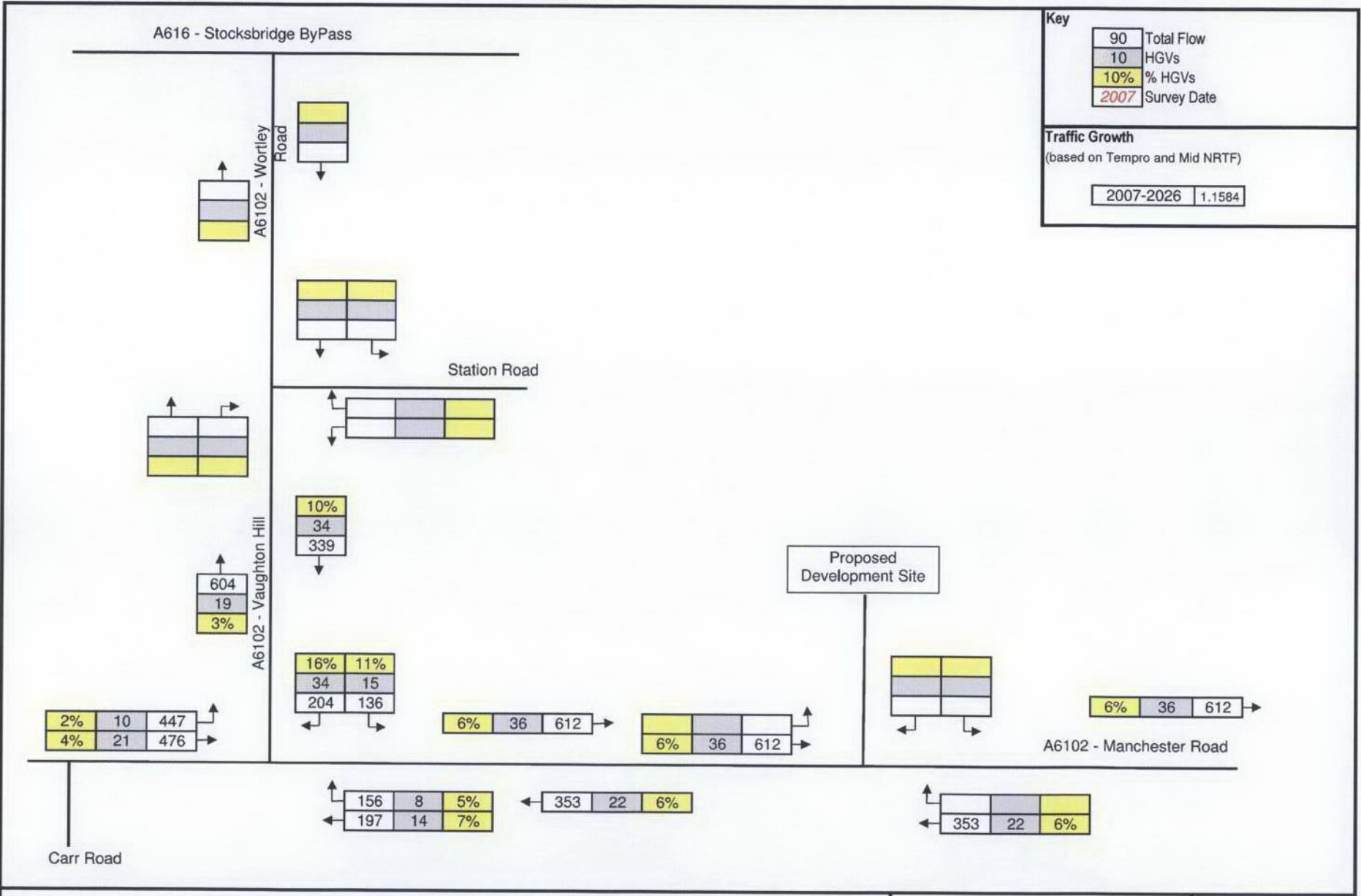
Figure 8a

Key

90	Total Flow
10	HGVs
10%	% HGVs
2007	Survey Date

Traffic Growth
(based on Tempro and Mid NRTF)

2007-2026	1.1584
-----------	--------

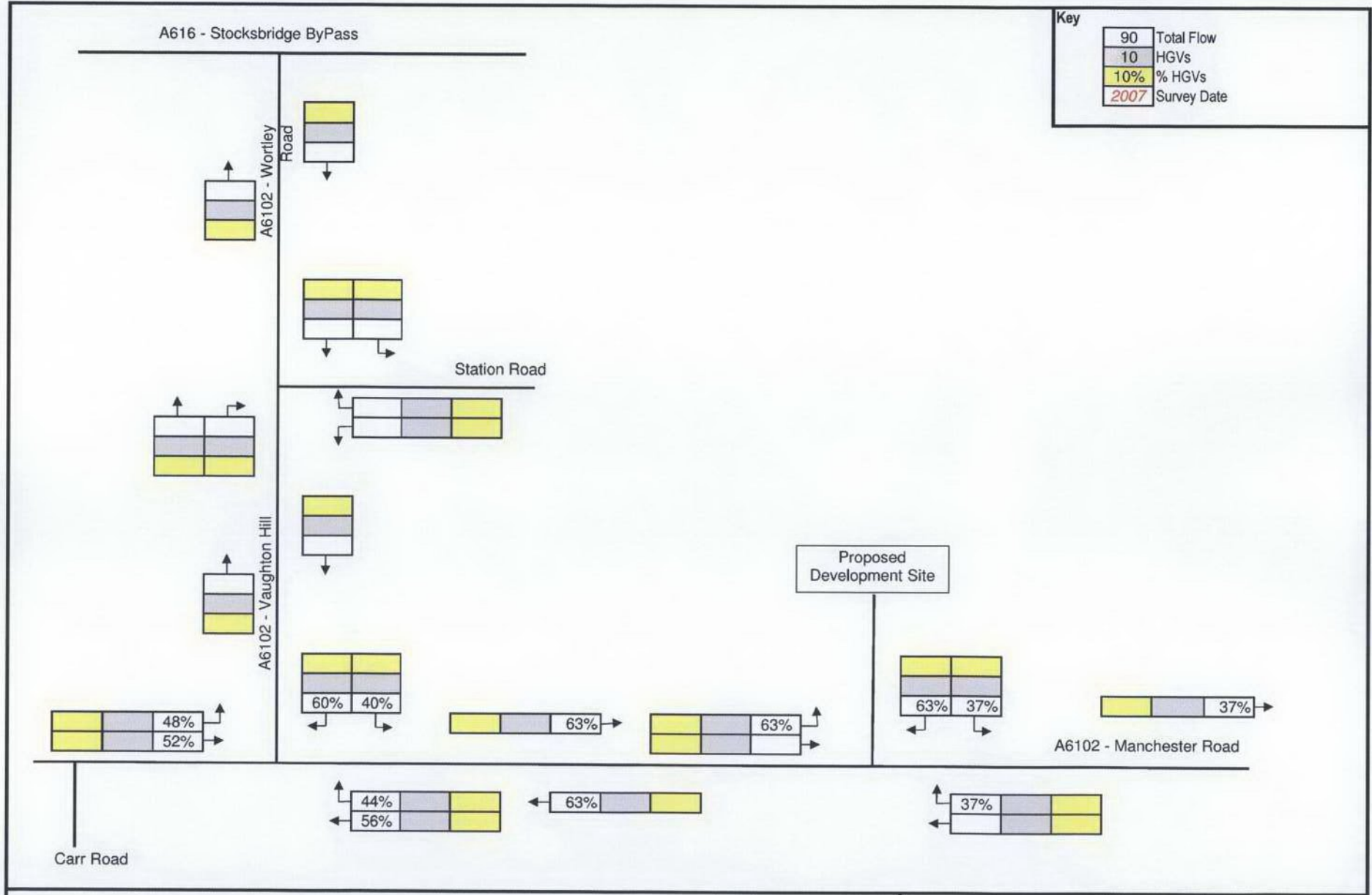


Background Traffic Design Year 2026 (AM)

Figure 9a

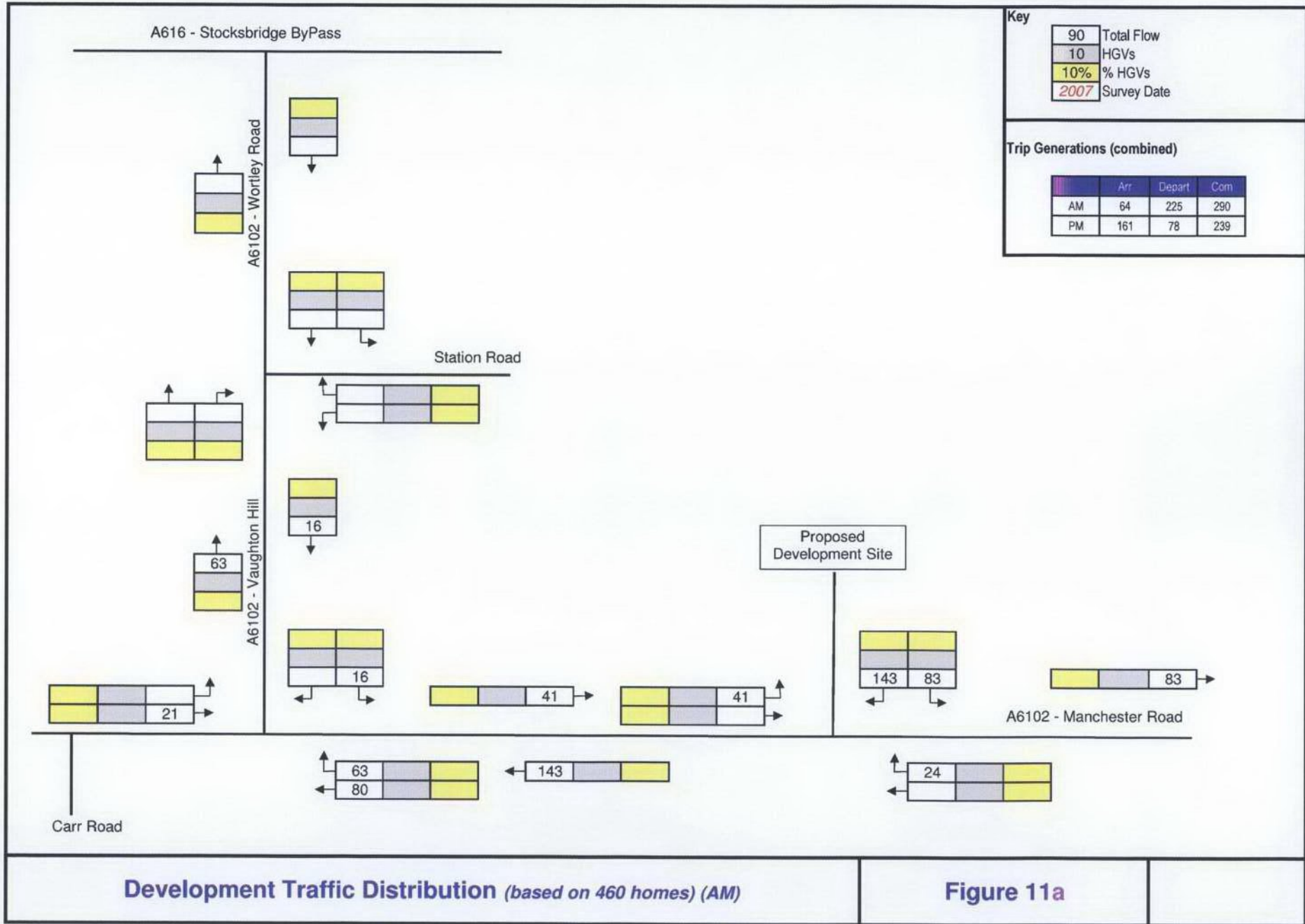
Key

90	Total Flow
10	HGVs
10%	% HGVs
2007	Survey Date



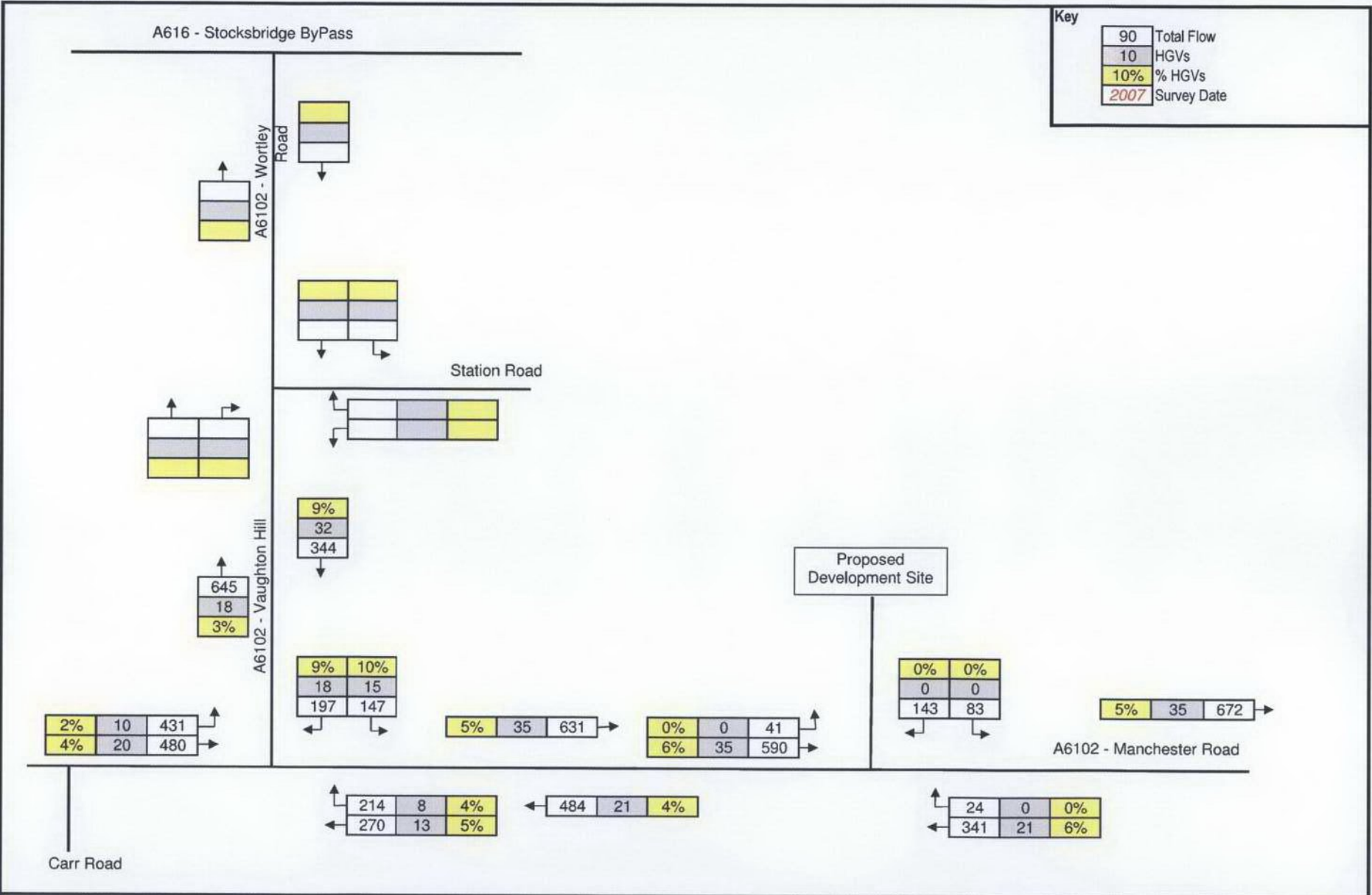
Development Traffic Percentage Distribution (%) (AM)

Figure 10a



Key

90	Total Flow
10	HGVs
10%	% HGVs
2007	Survey Date

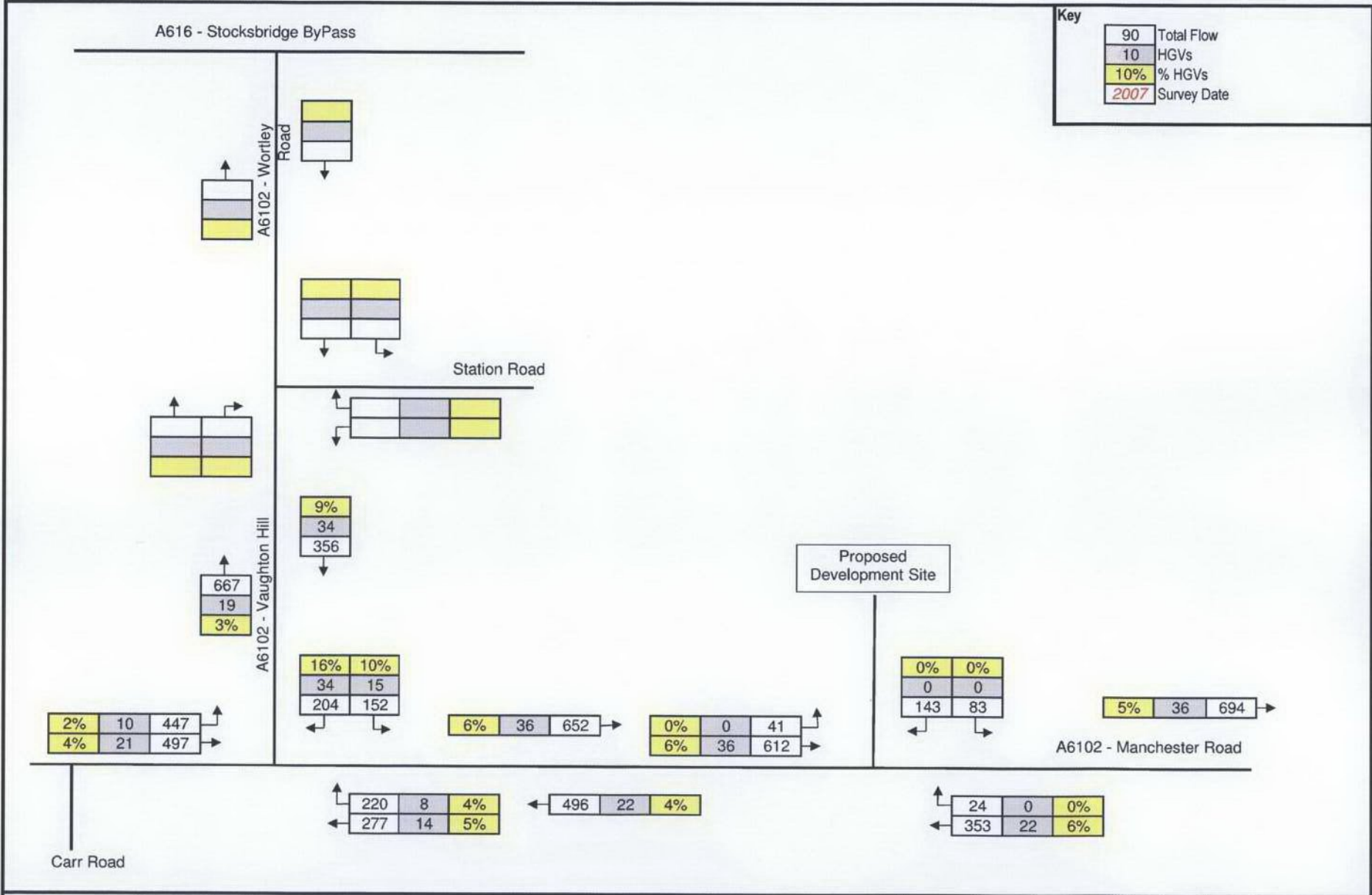


Opening Year 2021 with Development Traffic (AM)

Figure 12a

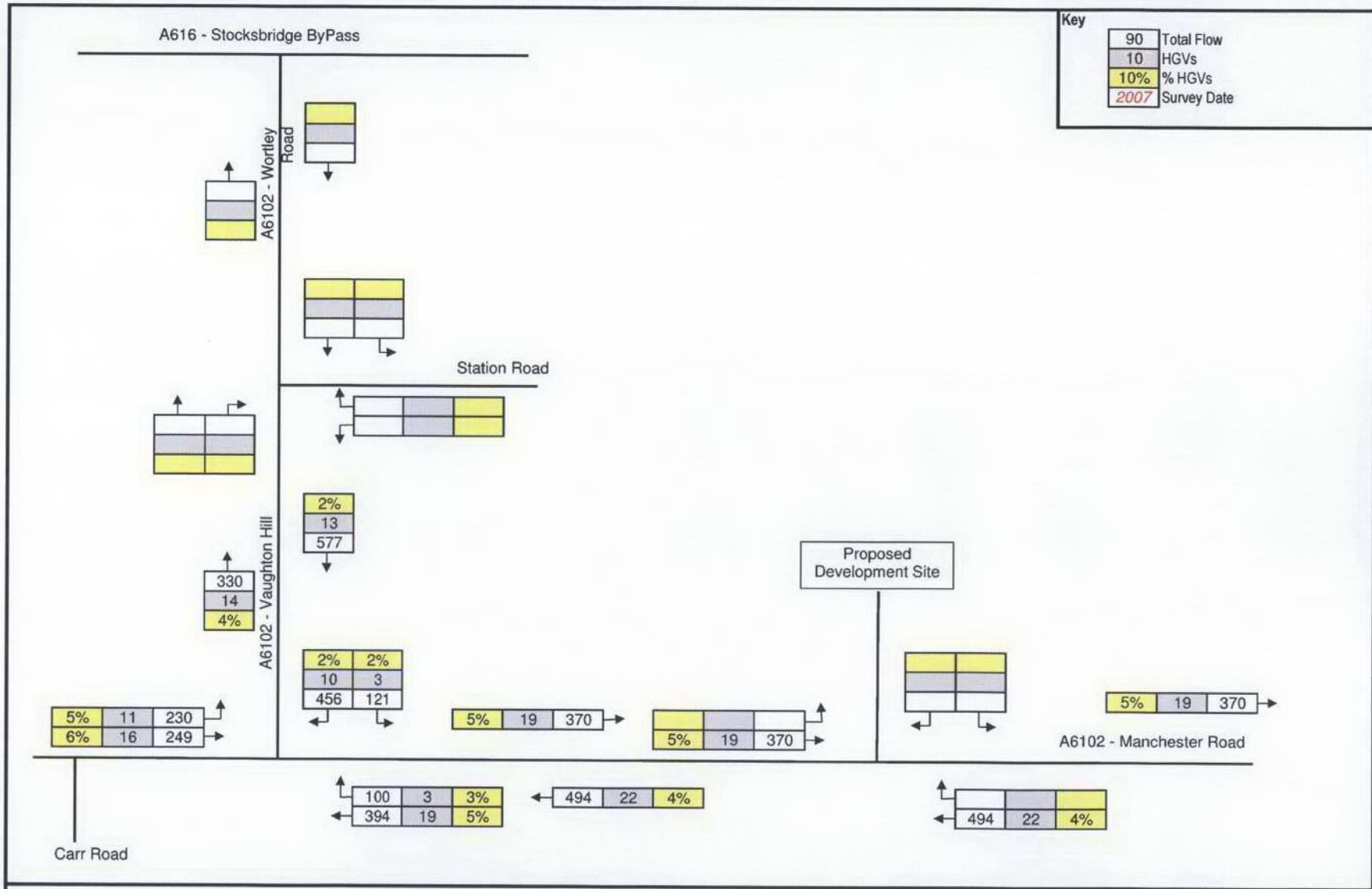
Key

90	Total Flow
10	HGVs
10%	% HGVs
2007	Survey Date



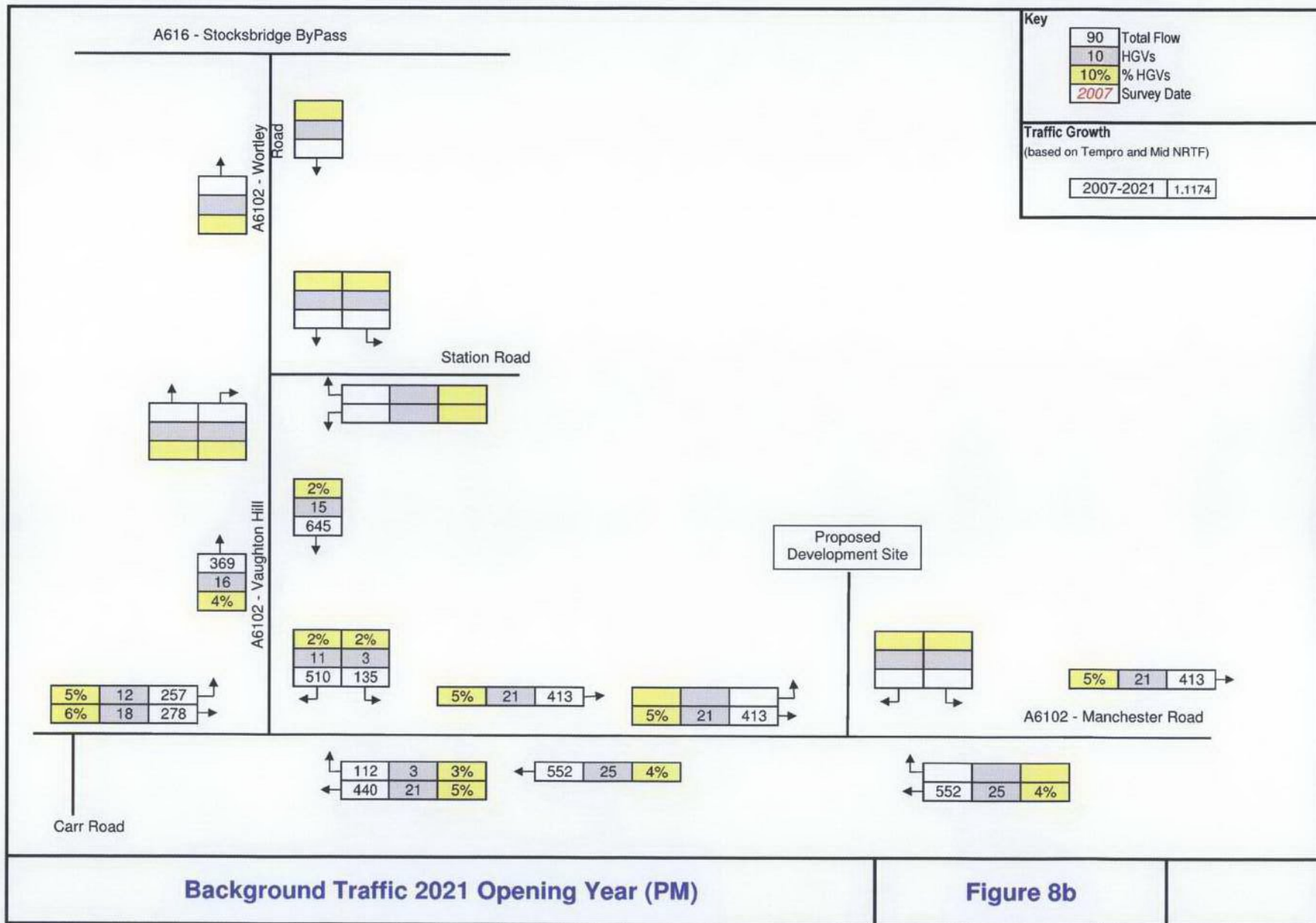
Design Year 2026 with Development Traffic (AM)

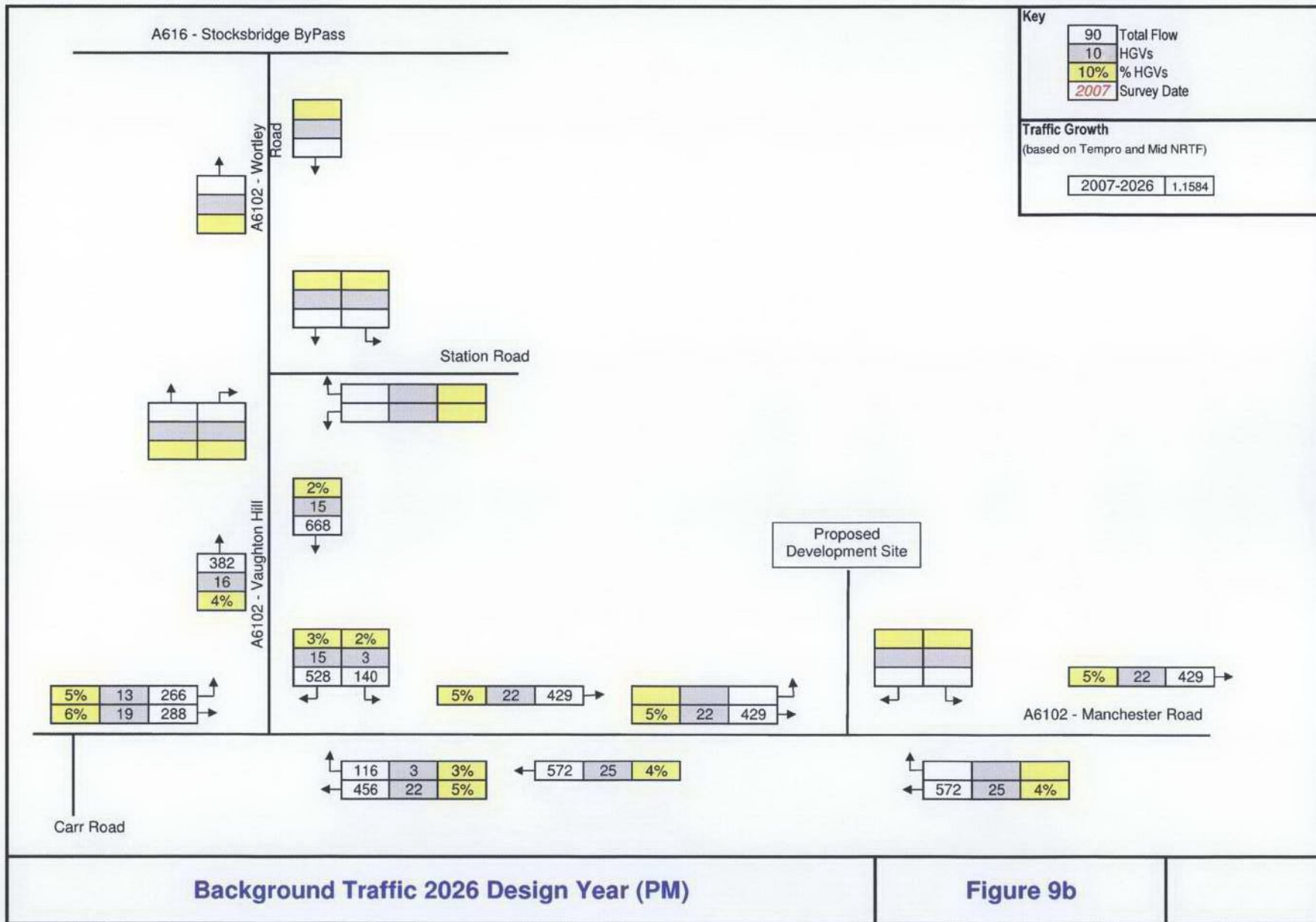
Figure 13a



Base Year 2007 Traffic Flows (PM)

Figure 7b





A616 - Stocksbridge ByPass

A6102 - Wortley Road

Station Road

A6102 - Vaughton Hill

Proposed Development Site

A6102 - Manchester Road

Carr Road

5%	13	266
6%	19	288

382
16
4%

2%
15
668

3%	2%
15	3
528	140

5%	22	429
----	----	-----

5%	22	429
----	----	-----

5%	22	429
----	----	-----

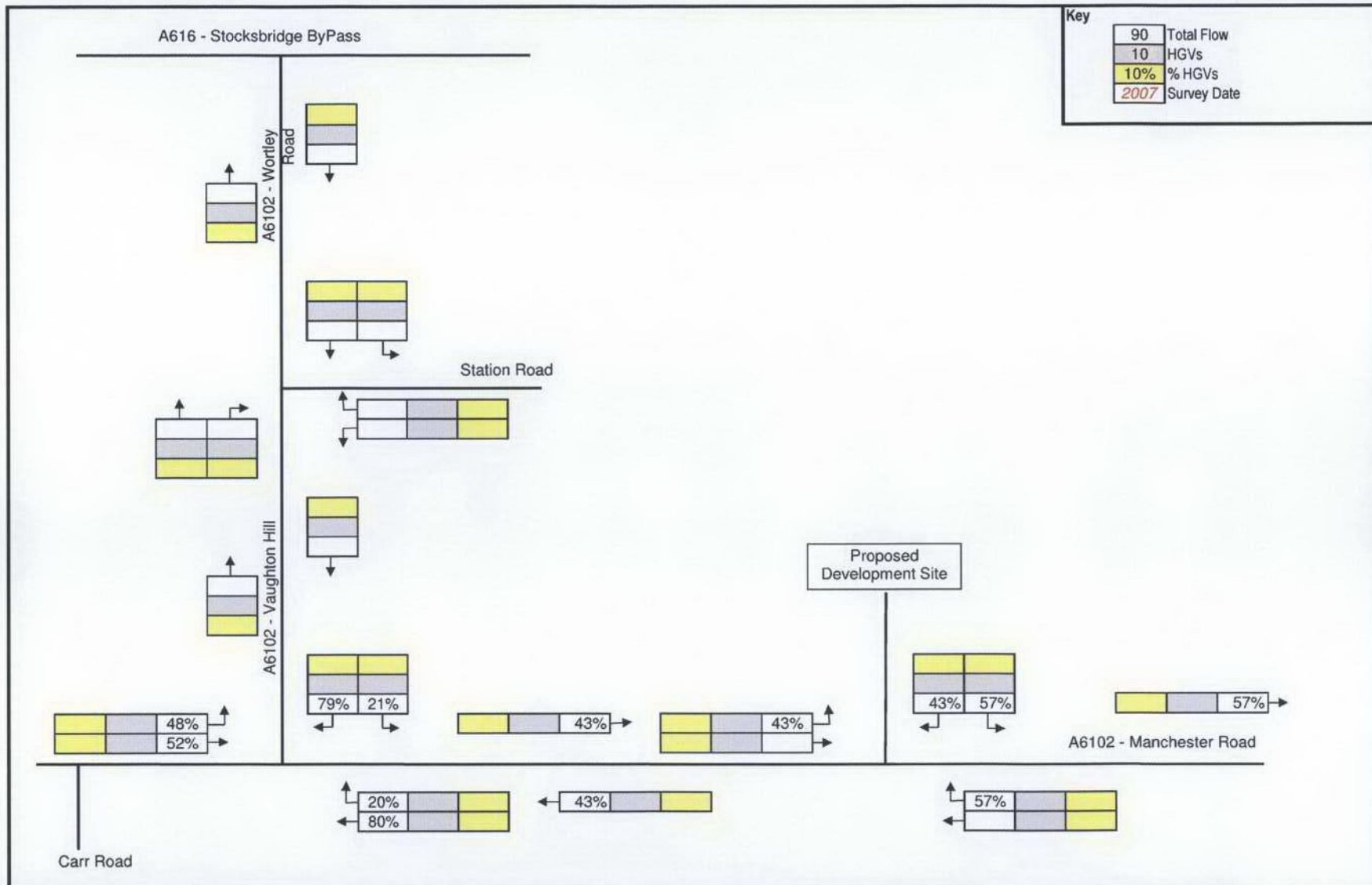
116	3	3%
456	22	5%

572	25	4%
-----	----	----

572	25	4%
-----	----	----

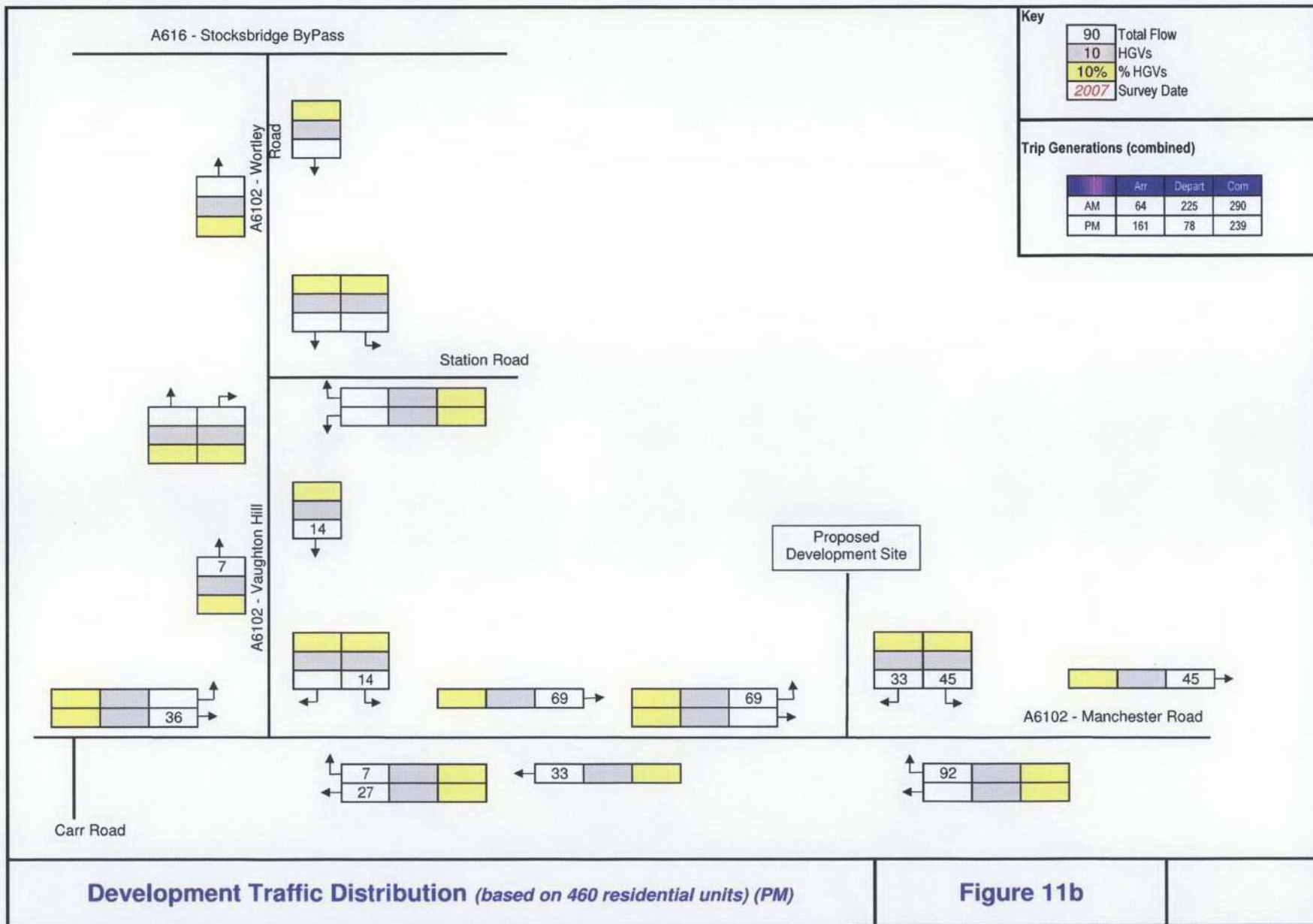
Background Traffic 2026 Design Year (PM)

Figure 9b



Development Traffic Percentage Distribution (%) (PM)

Figure 10b



A616 - Stocksbridge ByPass

A6102 - Wortley Road

A6102 - Vaughton Hill

Station Road

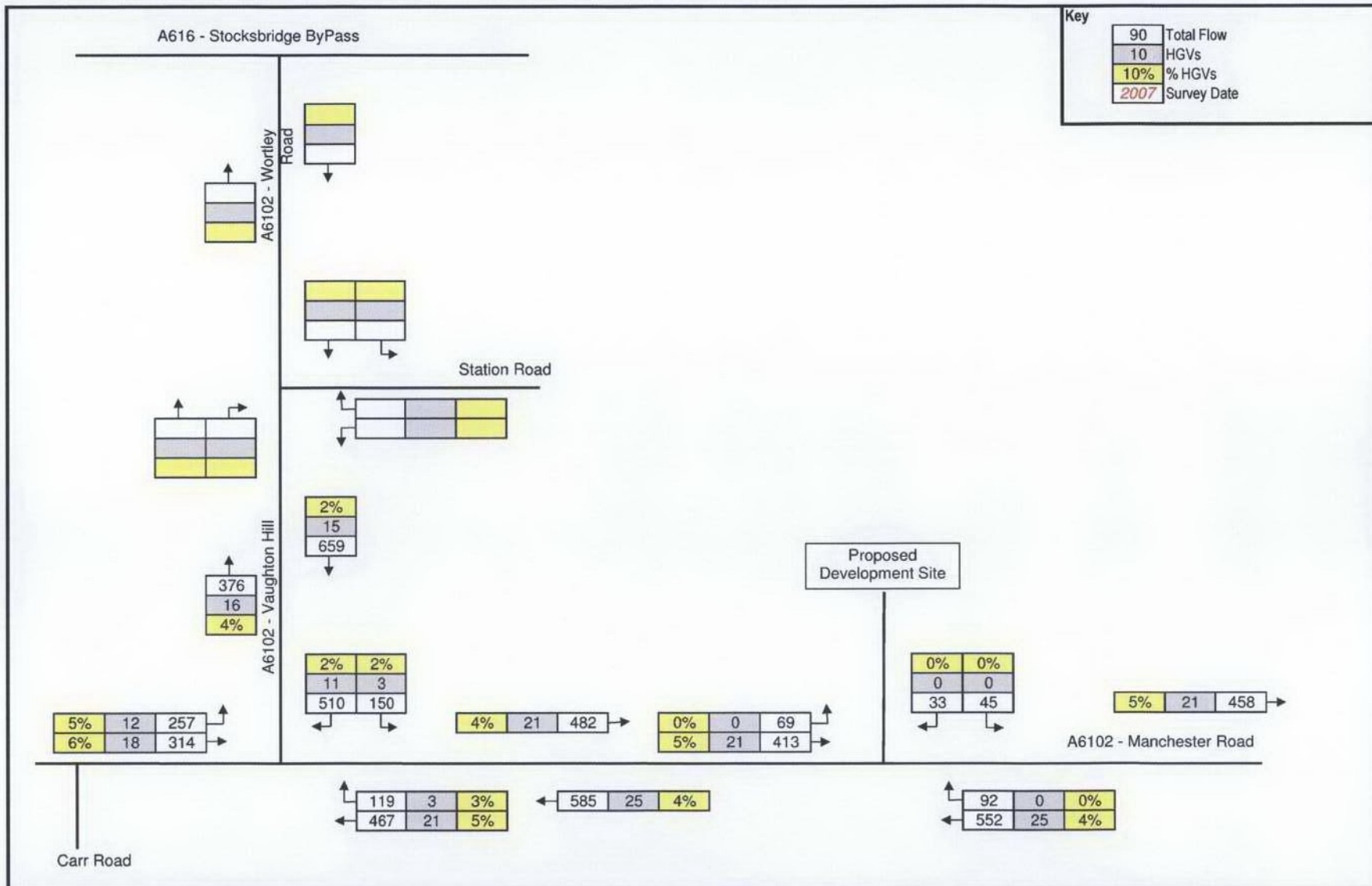
Proposed Development Site

A6102 - Manchester Road

Carr Road

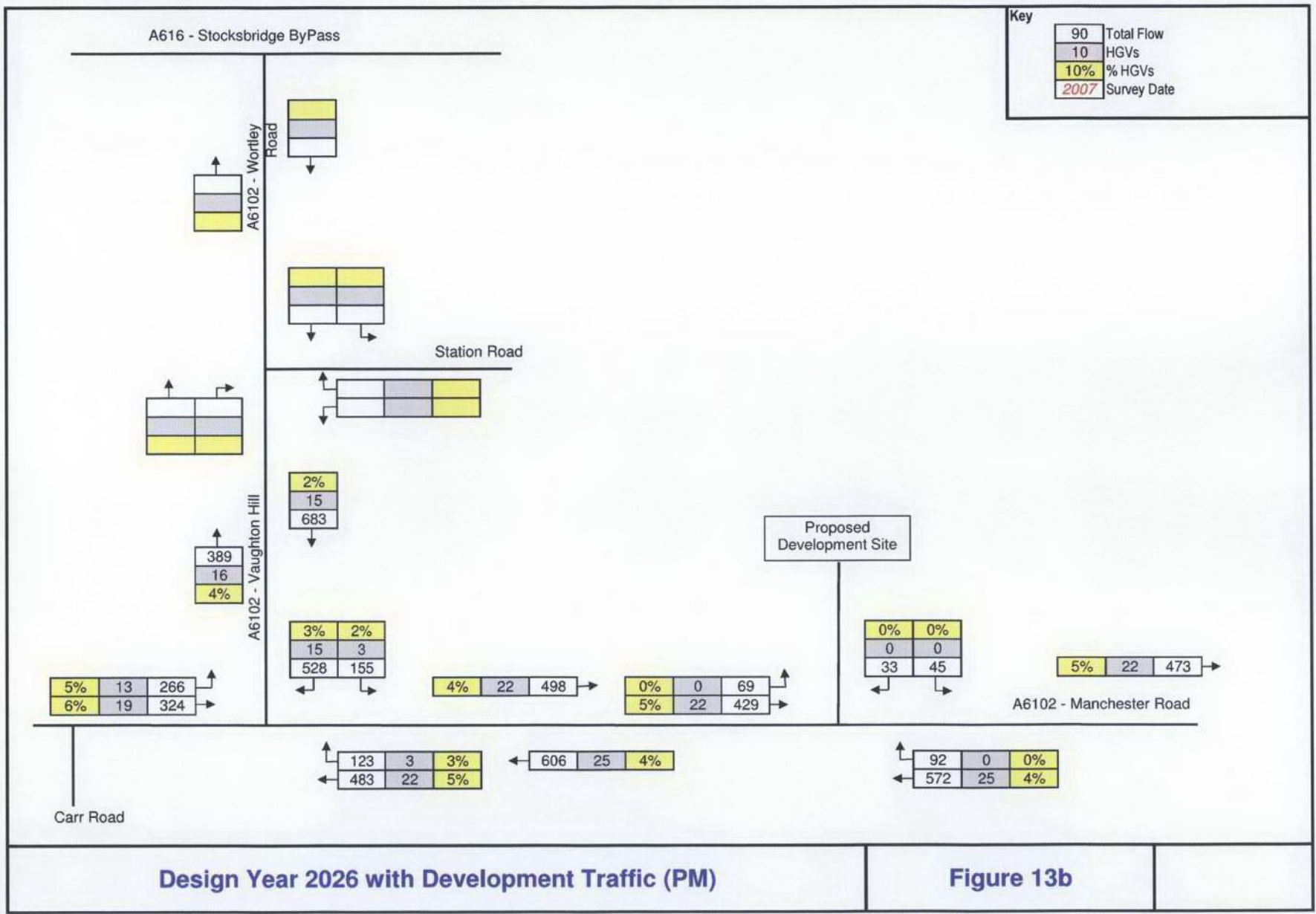
Development Traffic Distribution (based on 460 residential units) (PM)

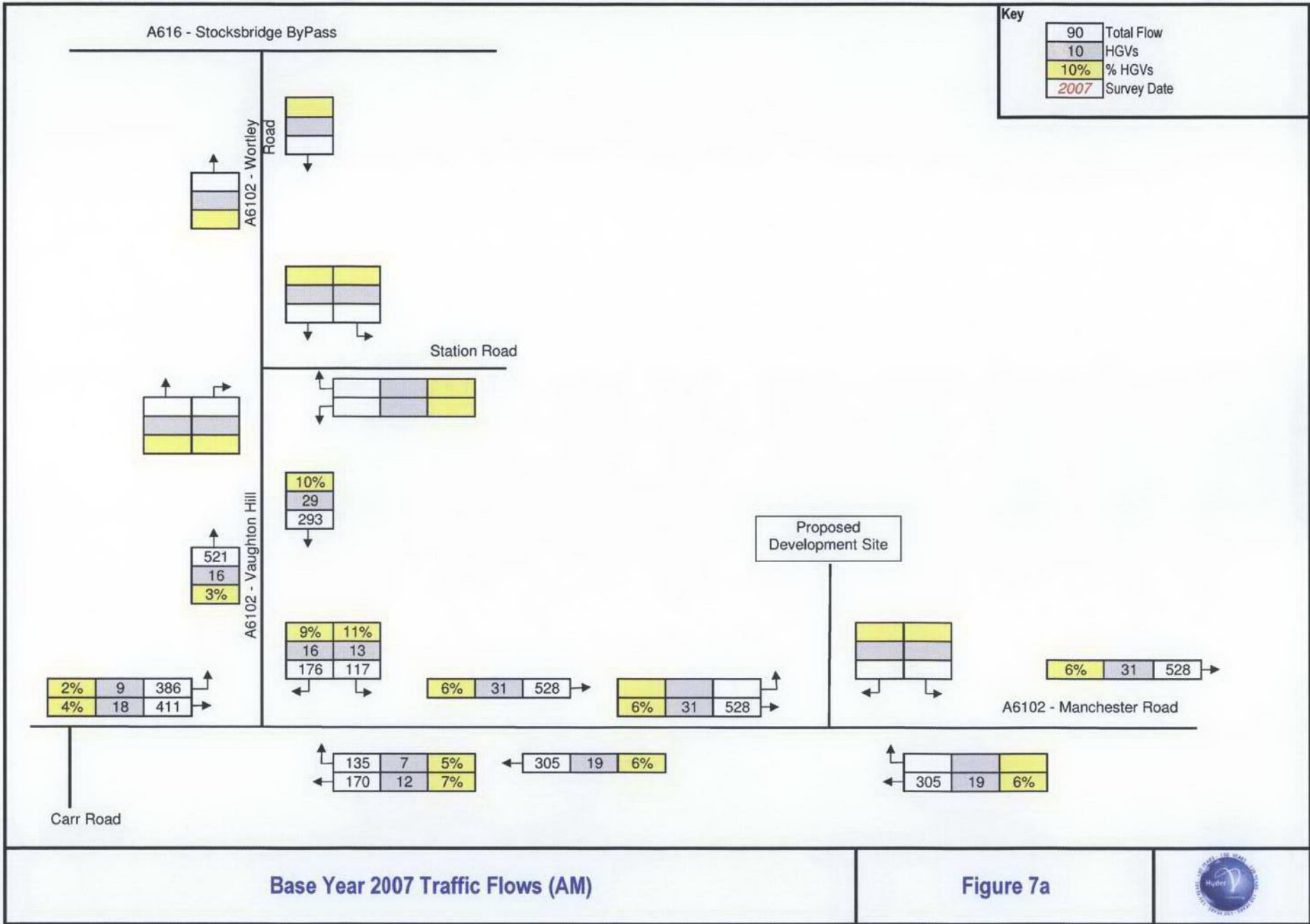
Figure 11b



Opening Year 2021 with Development Traffic (PM)

Figure 12b





A616 - Stocksbridge ByPass

A6102 - Wortley Road

Station Road

A6102 - Vaughton Hill

Proposed Development Site

A6102 - Manchester Road

Carr Road

2%	9	386
4%	18	411

521
16
3%

9%	16	176
11%	13	117

10%
29
293

6%	31	528
----	----	-----

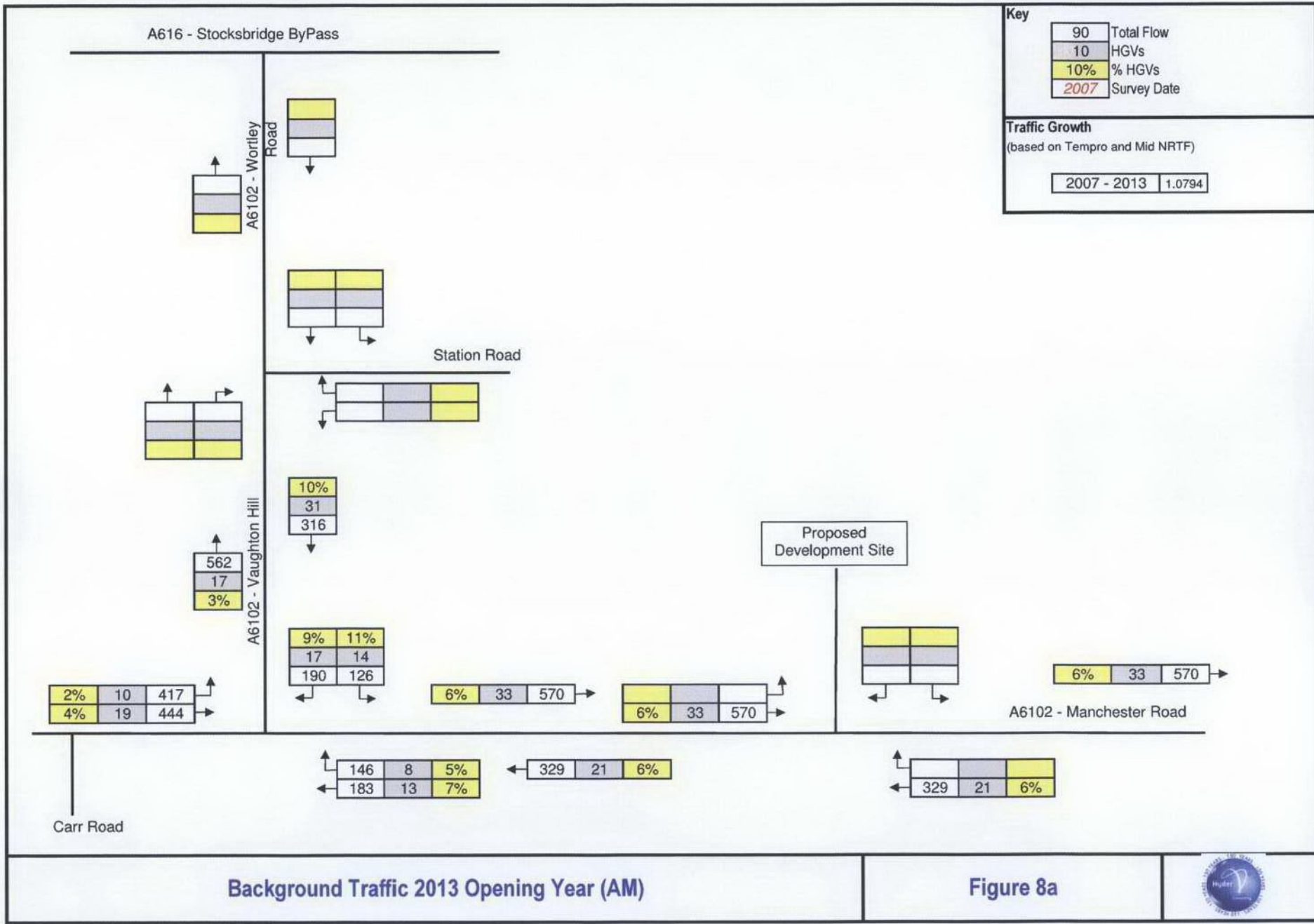
6%	31	528
----	----	-----

6%	31	528
----	----	-----

135	7	5%
170	12	7%

305	19	6%
-----	----	----

305	19	6%
-----	----	----



Background Traffic 2013 Opening Year (AM)

Figure 8a



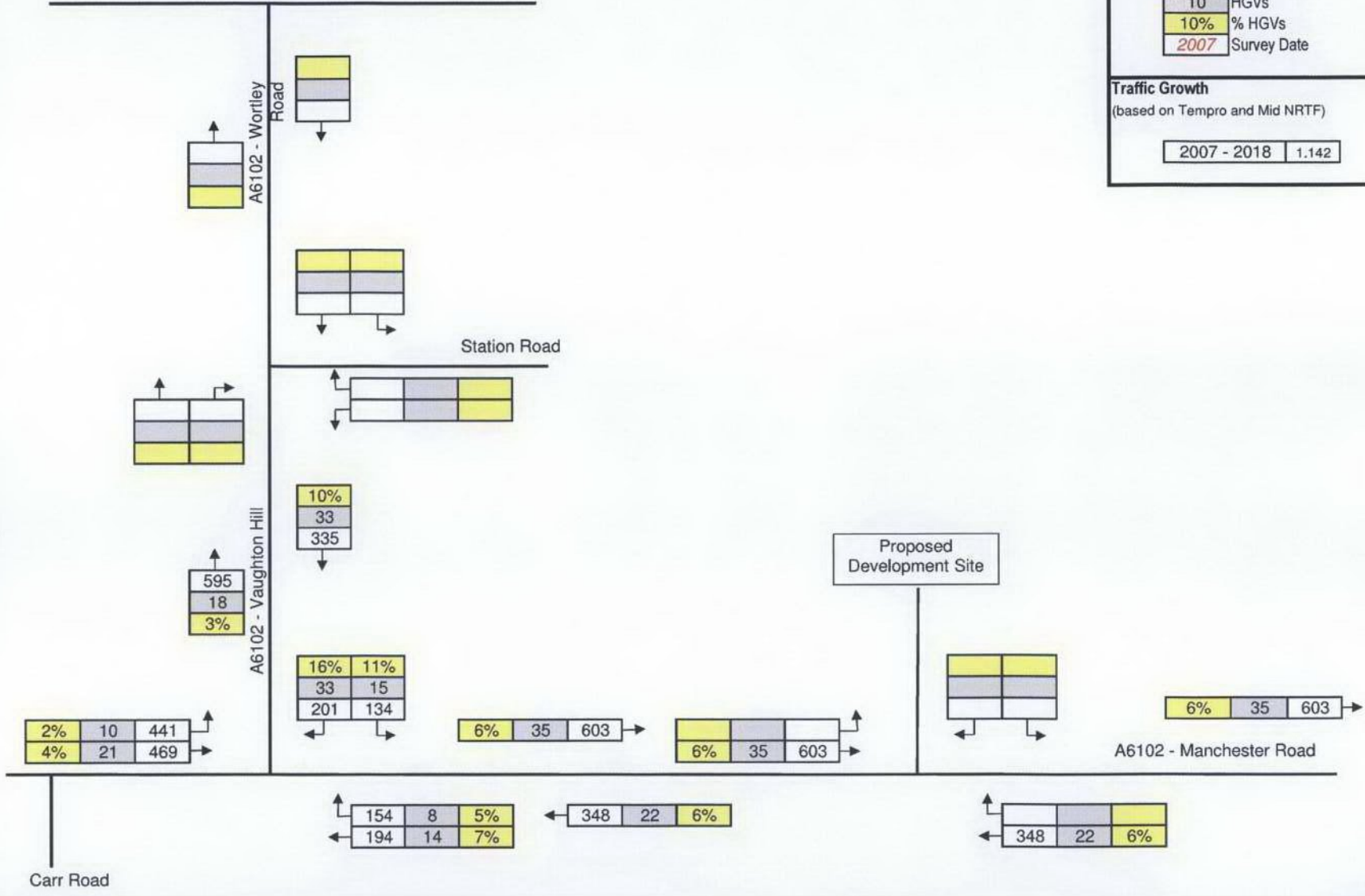
A616 - Stocksbridge ByPass

Key

90	Total Flow
10	HGVs
10%	% HGVs
2007	Survey Date

Traffic Growth
(based on Tempro and Mid NRTF)

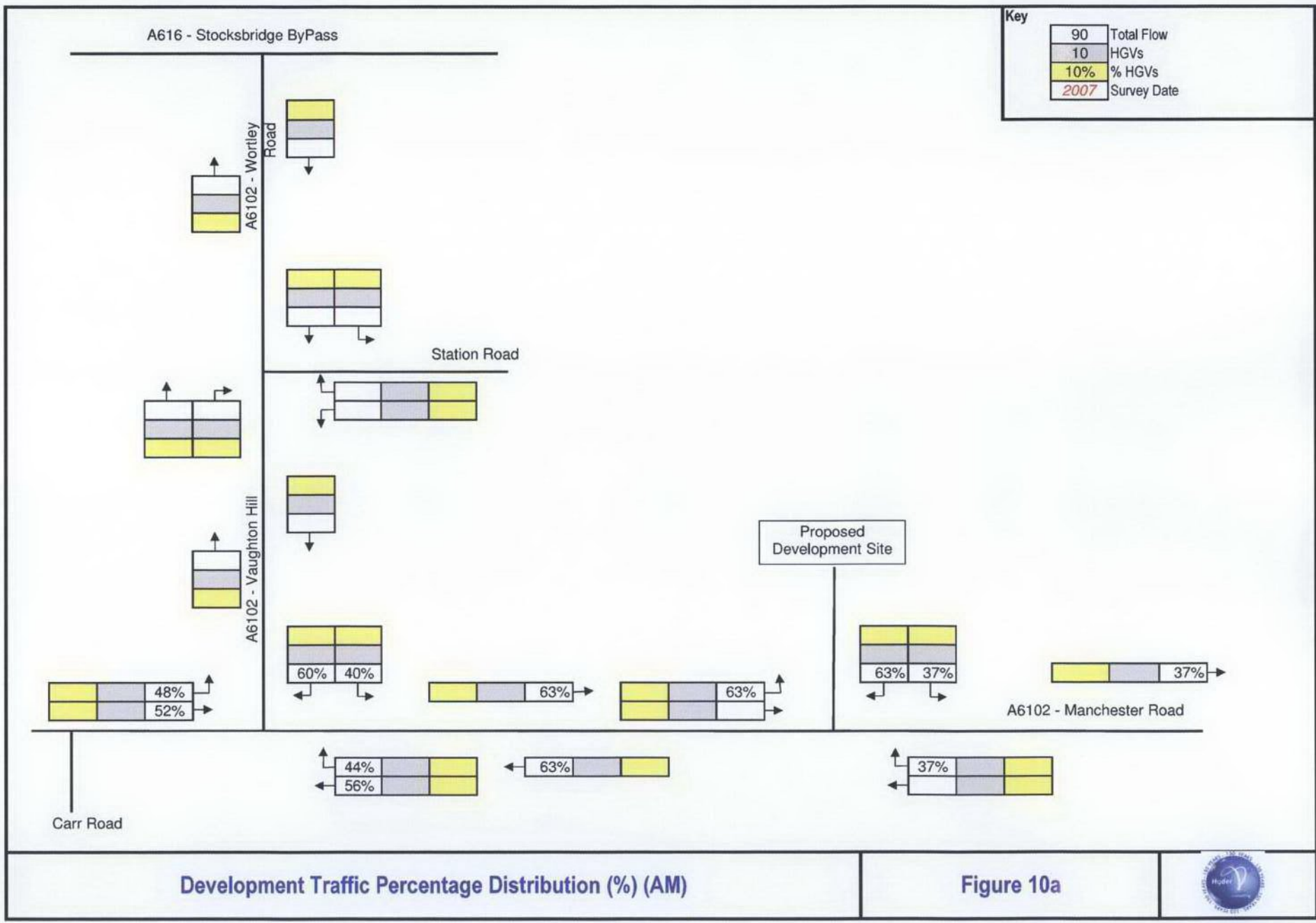
2007 - 2018	1.142
-------------	-------



Background Traffic 2018 Design Year (AM)

Figure 9a





A616 - Stocksbridge ByPass

A6102 - Wortley Road

Station Road

A6102 - Vaughton Hill

Proposed Development Site

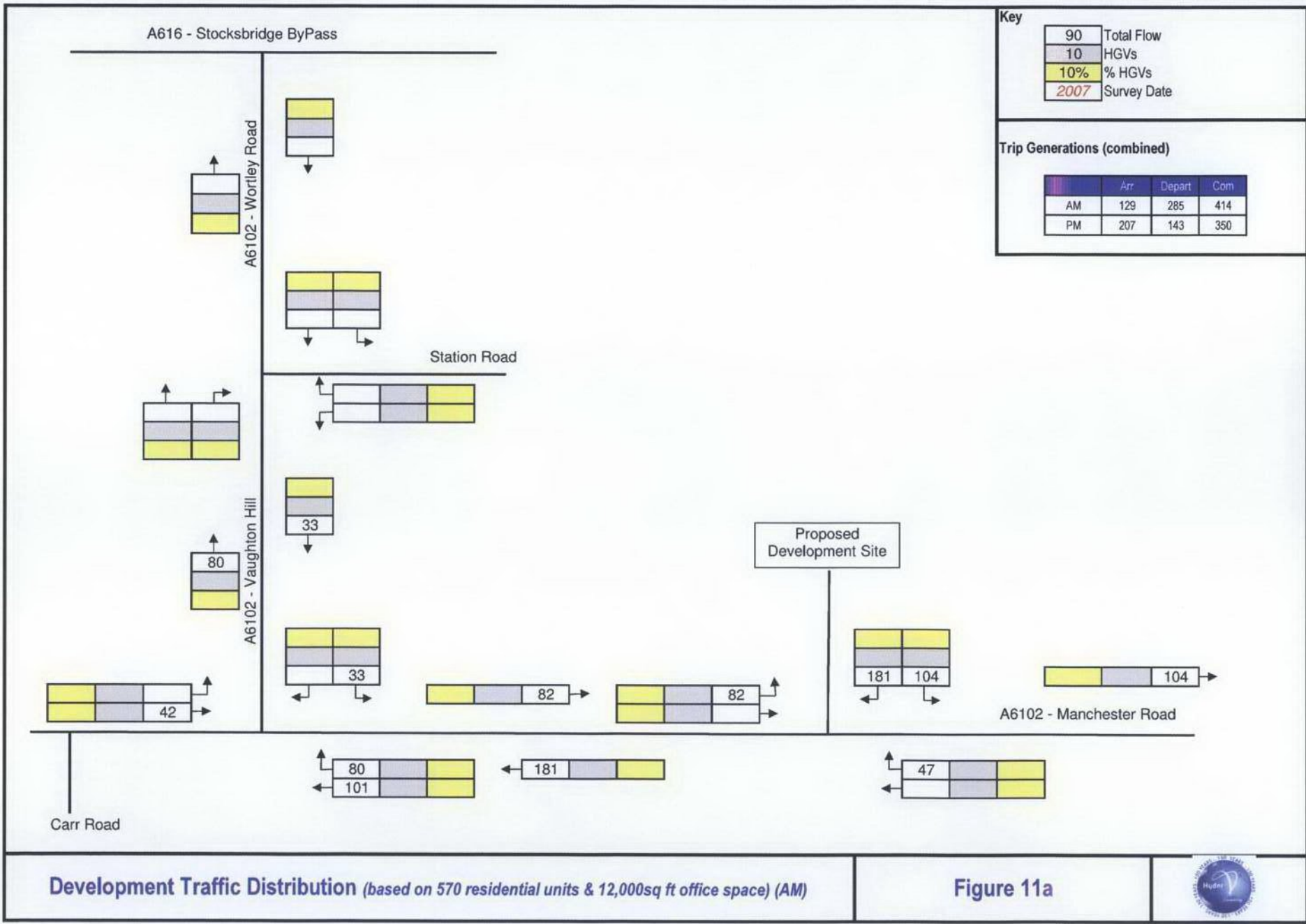
Carr Road

A6102 - Manchester Road

Development Traffic Percentage Distribution (%) (AM)

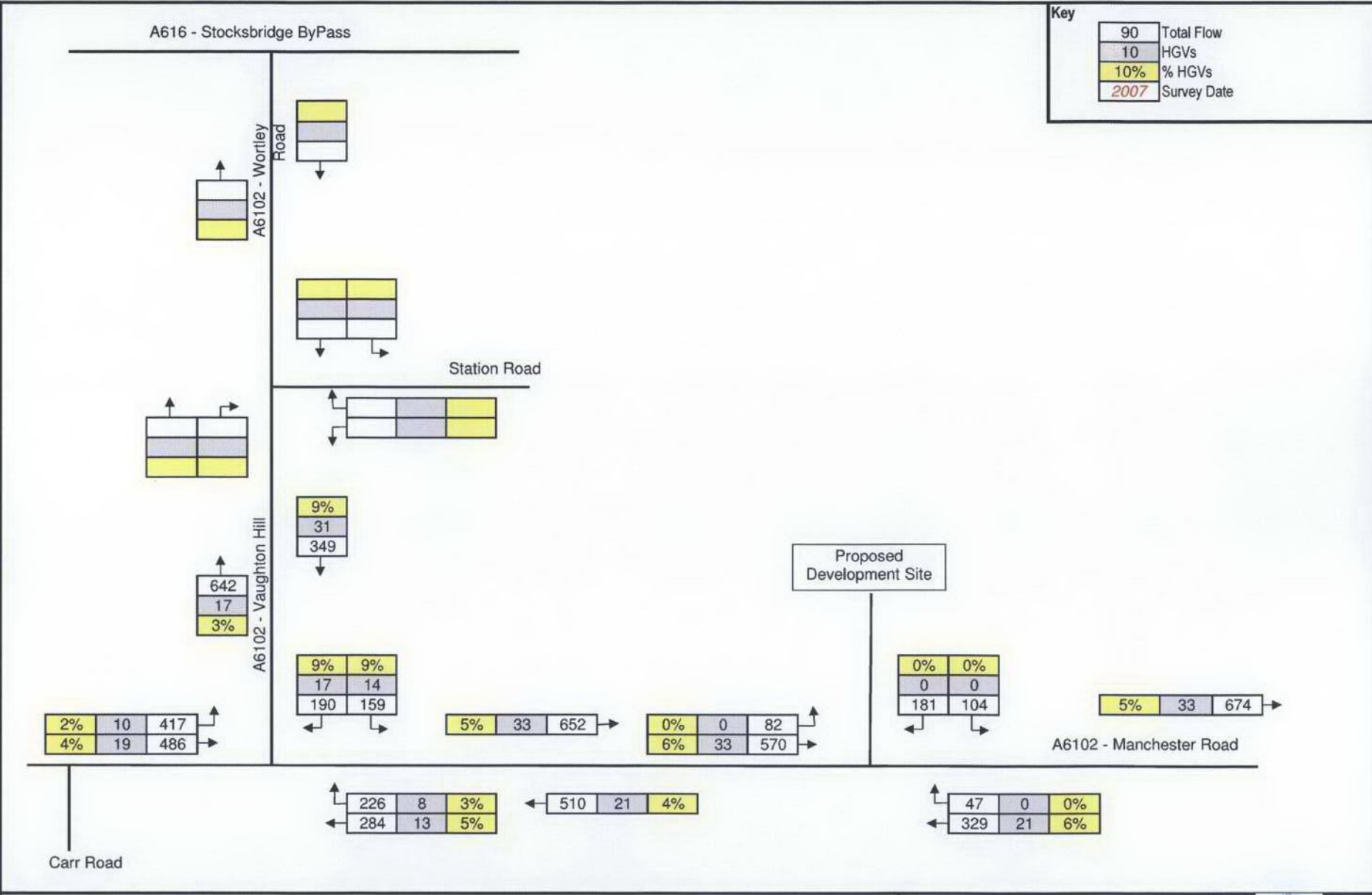
Figure 10a





Key

90	Total Flow
10	HGVs
10%	% HGVs
2007	Survey Date



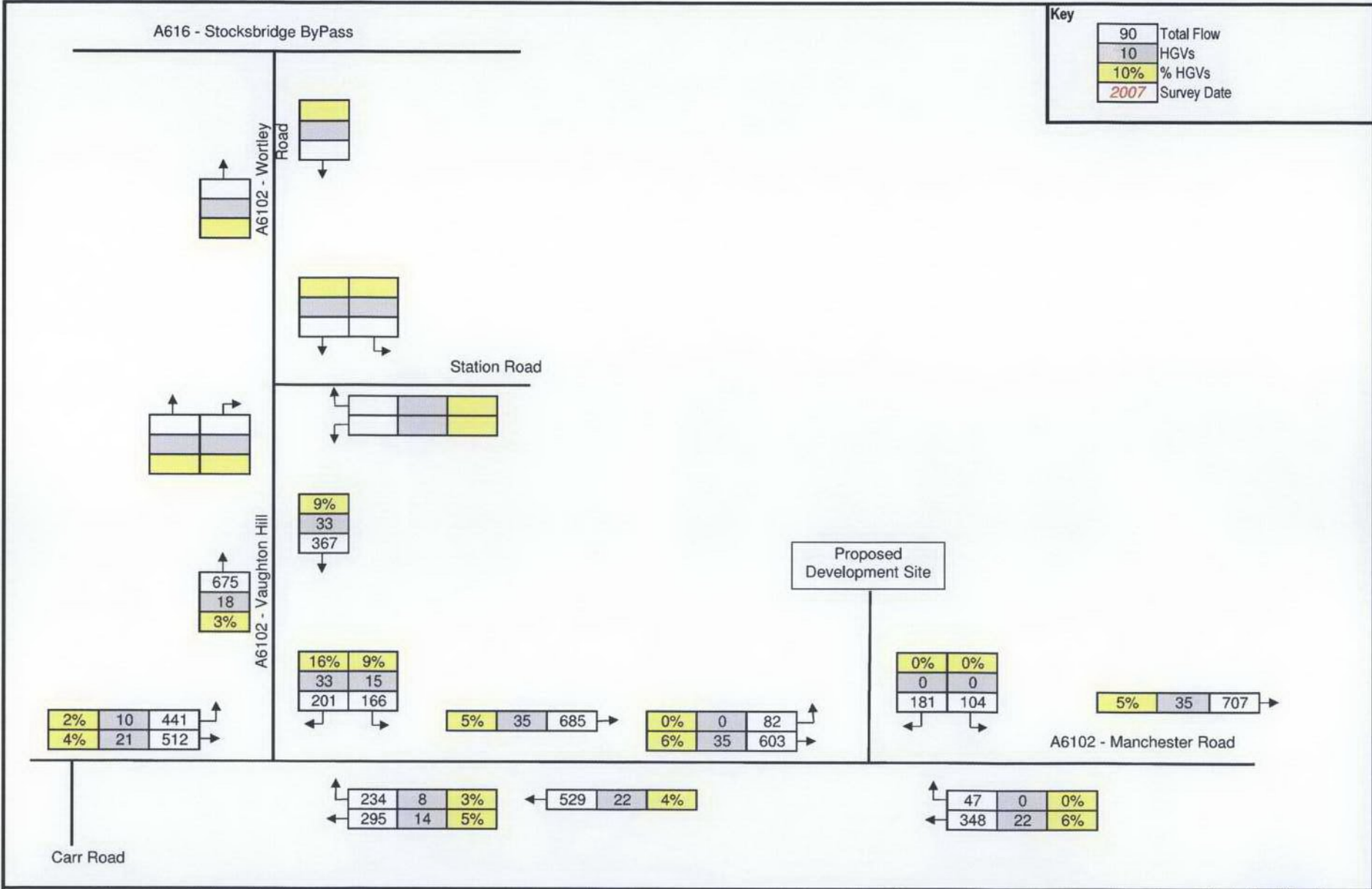
Opening Year 2013 with Development Traffic (AM)

Figure 12a



Key

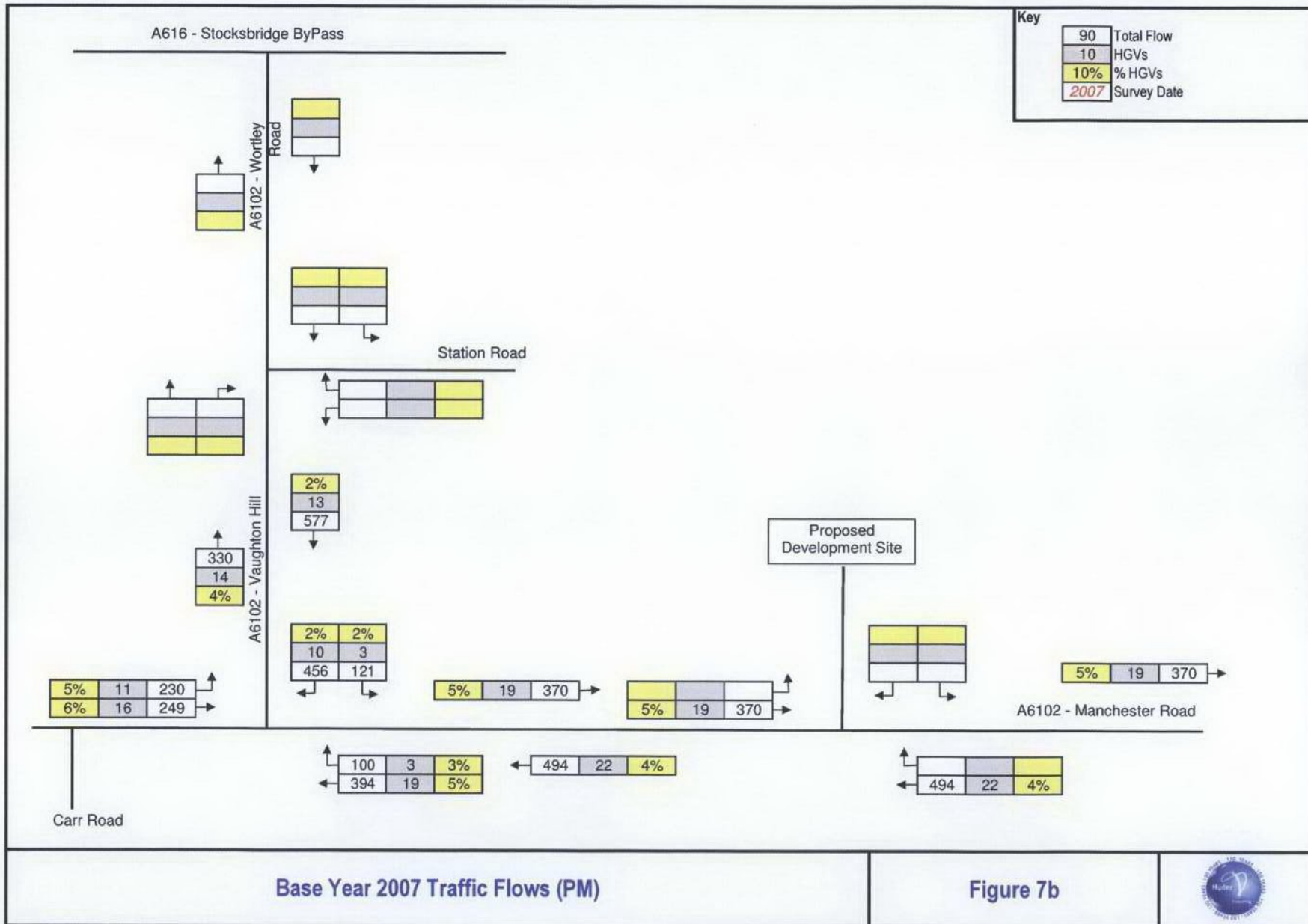
90	Total Flow
10	HGVs
10%	% HGVs
2007	Survey Date

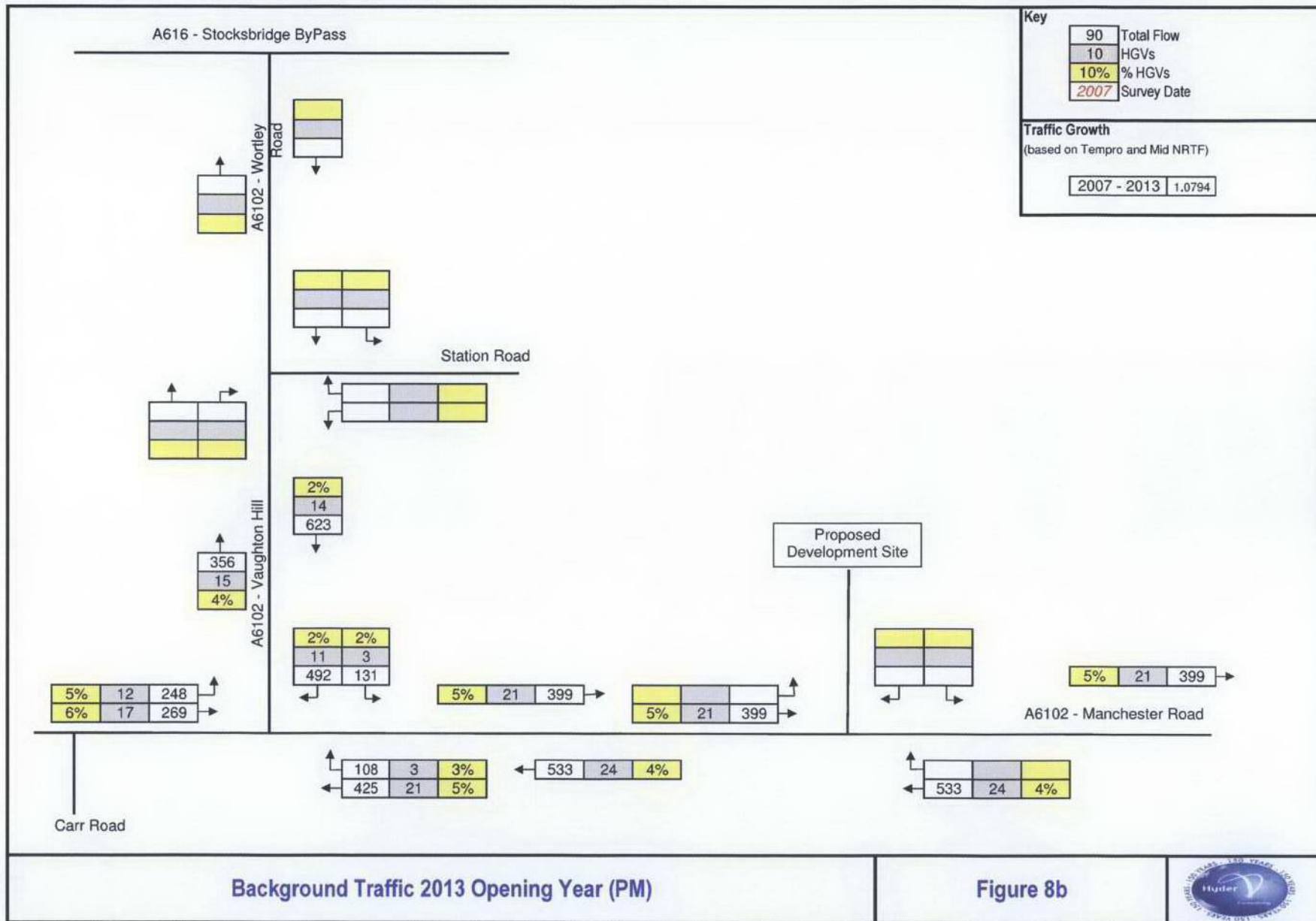


Design Year 2018 with Development Traffic (AM)

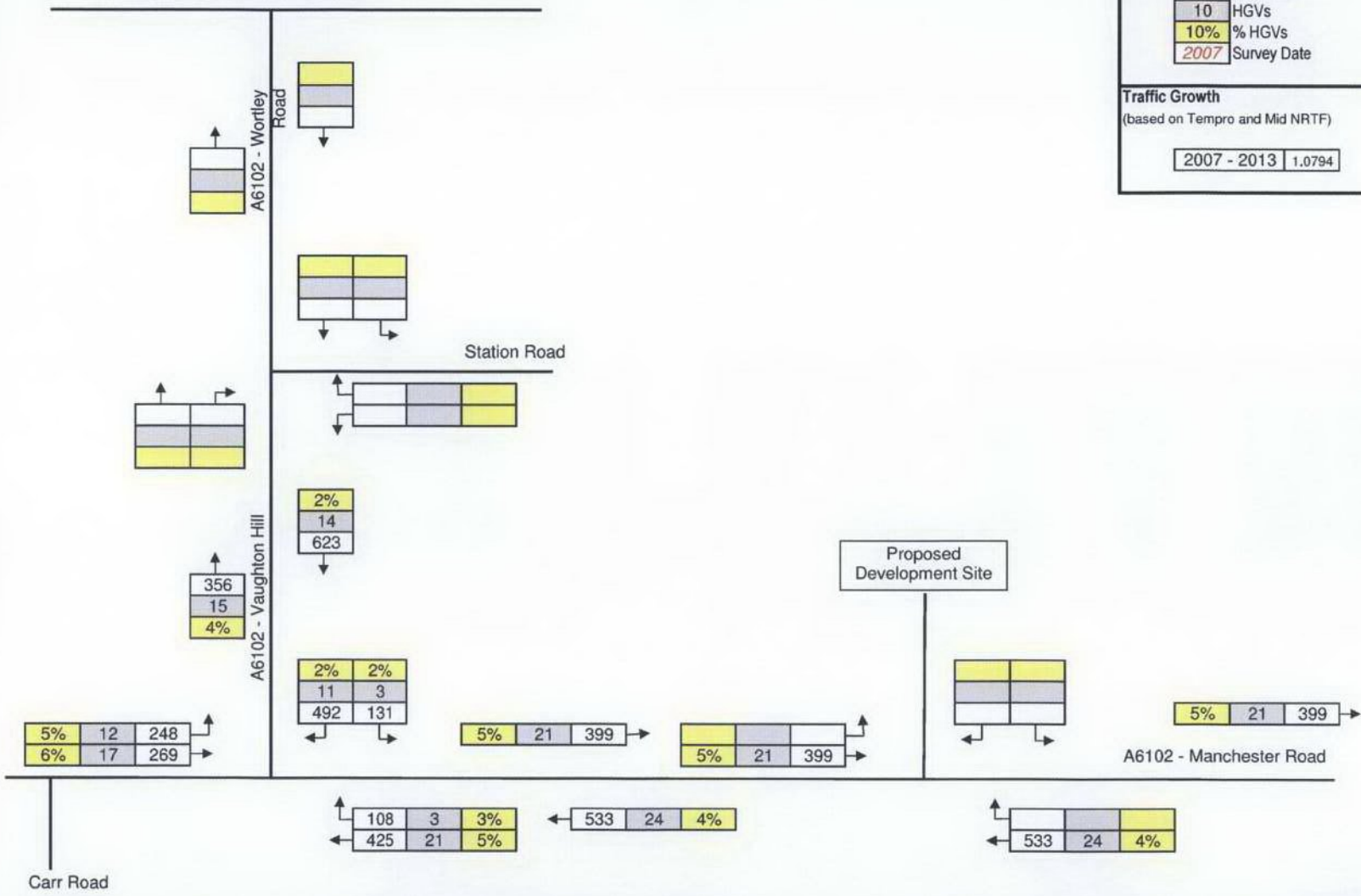
Figure 13a







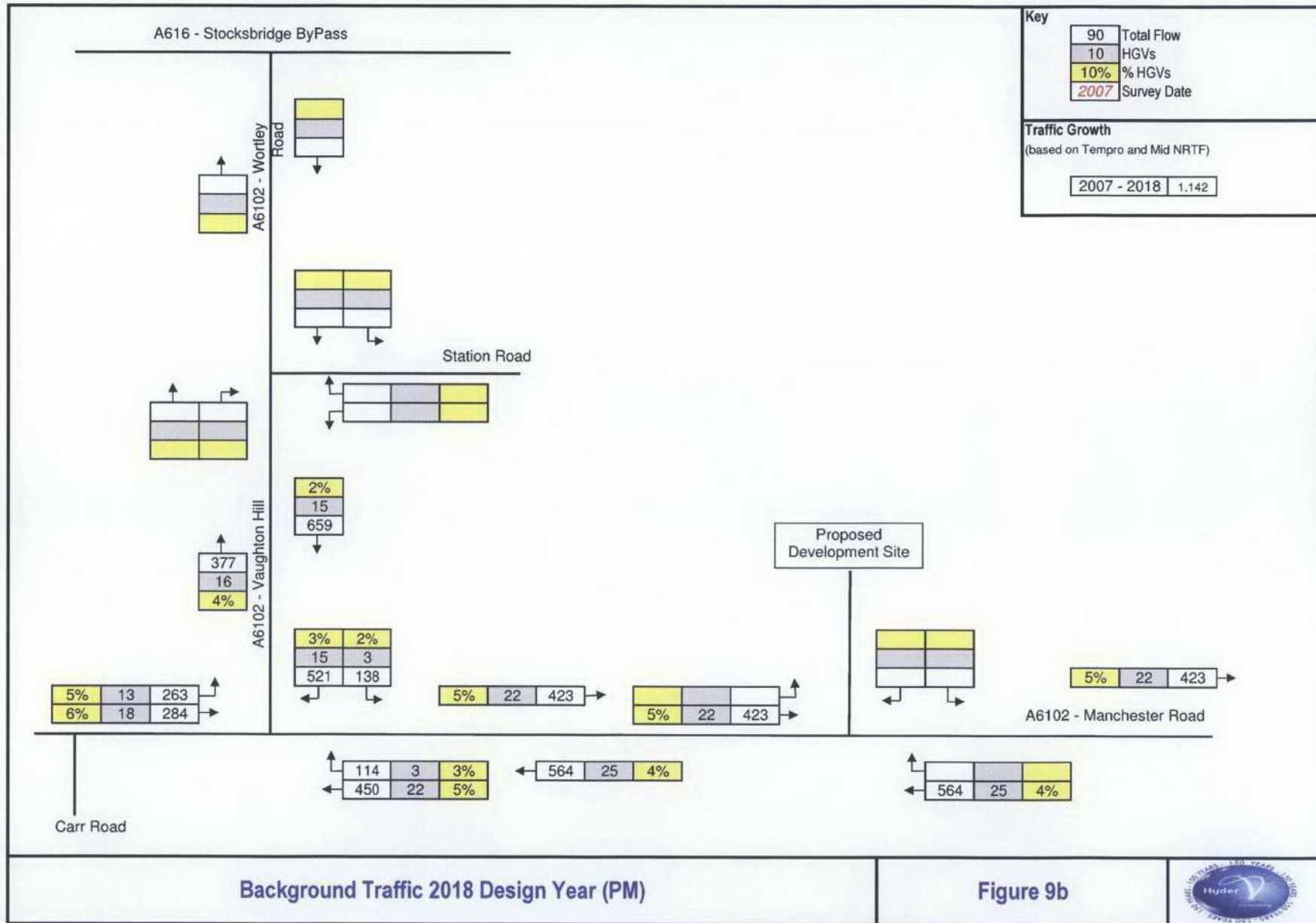
A616 - Stocksbridge ByPass



Background Traffic 2013 Opening Year (PM)

Figure 8b





A616 - Stocksbridge ByPass

A6102 - Wortley Road

Station Road

A6102 - Vaughton Hill

Proposed Development Site

A6102 - Manchester Road

Carr Road

5%	13	263
6%	18	284

377
16
4%

2%
15
659

3%	2%
15	3
521	138

5%	22	423
----	----	-----

5%	22	423
----	----	-----

5%	22	423
----	----	-----

114	3	3%
450	22	5%

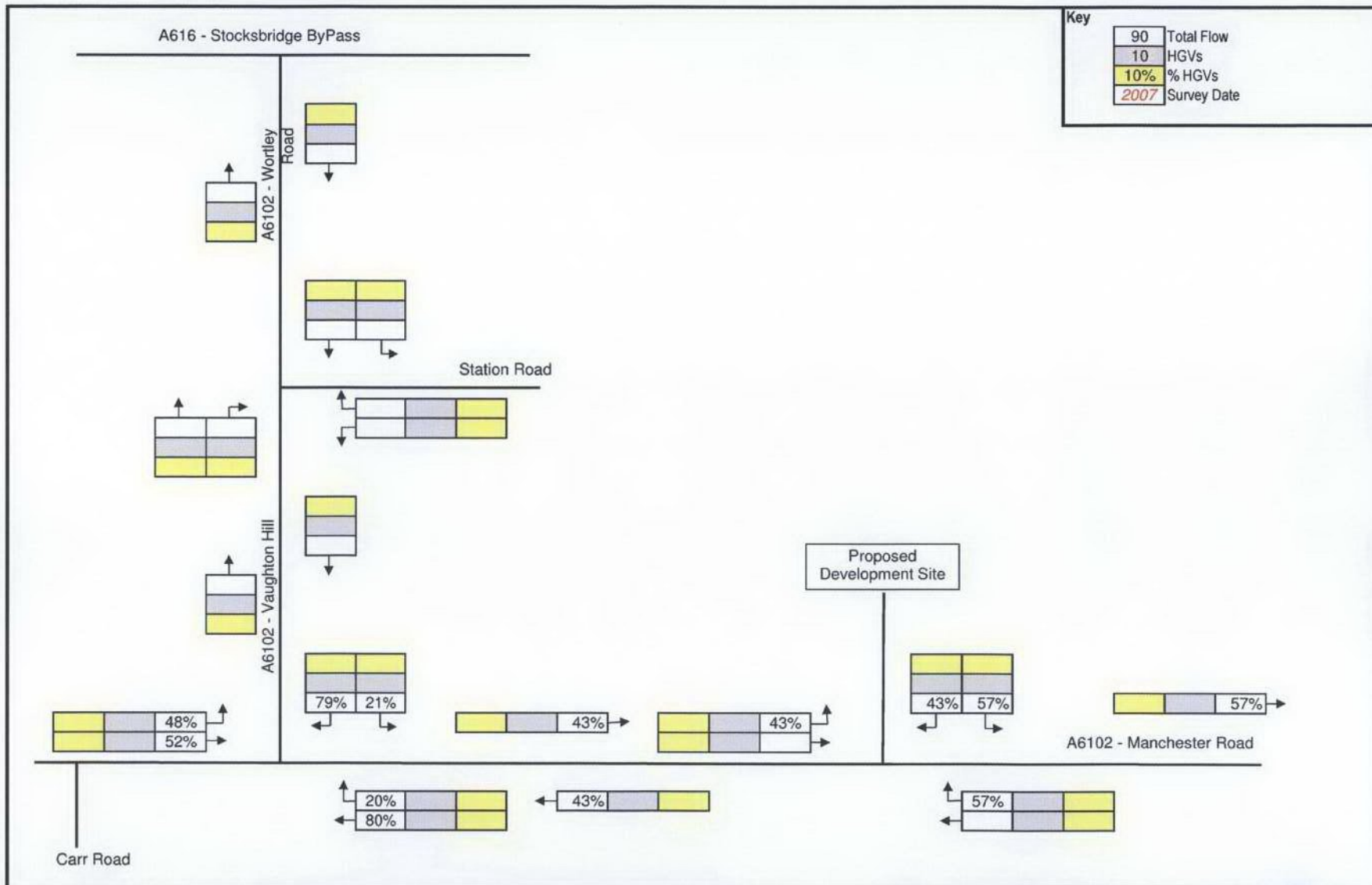
564	25	4%
-----	----	----

564	25	4%
-----	----	----

Background Traffic 2018 Design Year (PM)

Figure 9b

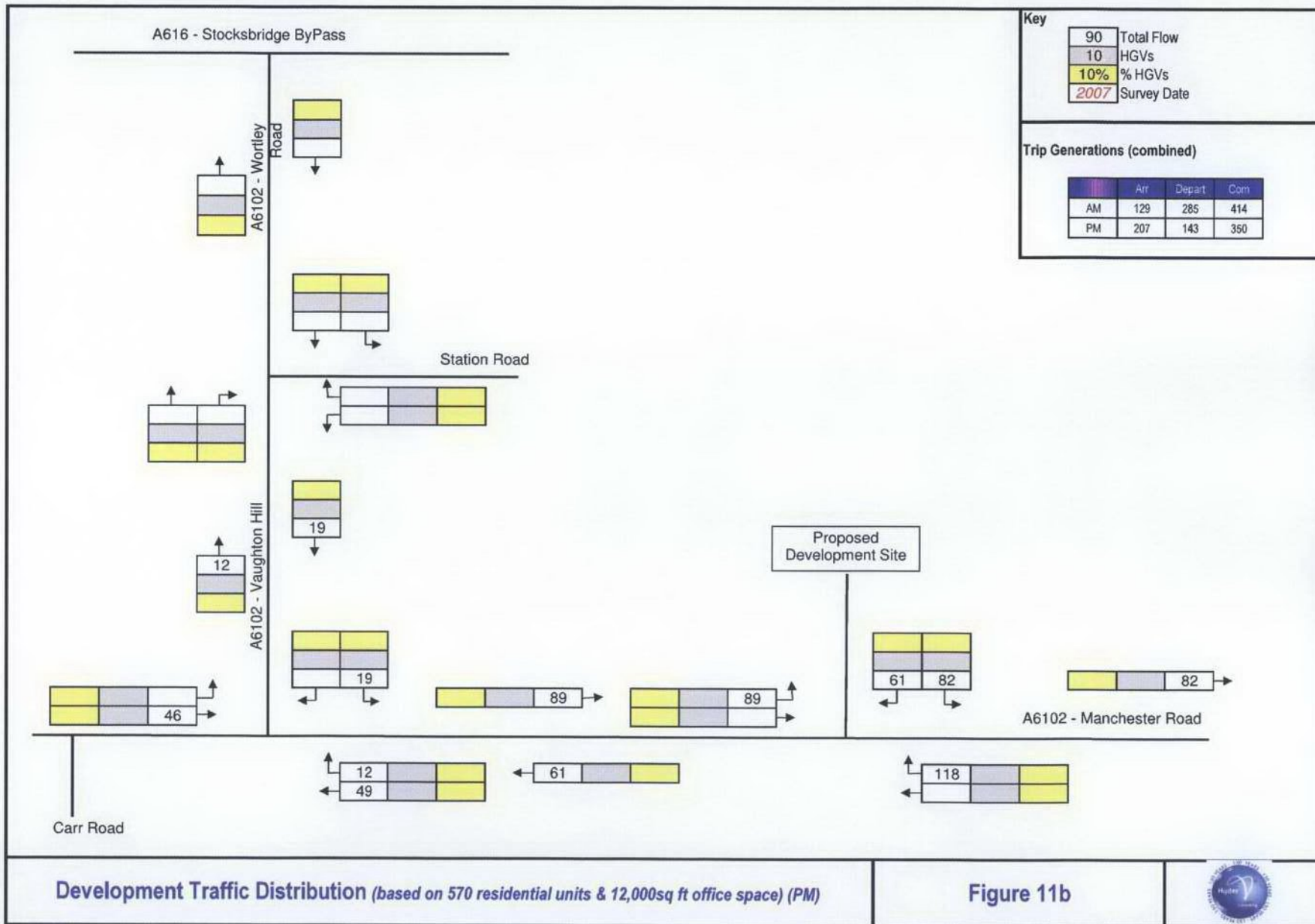


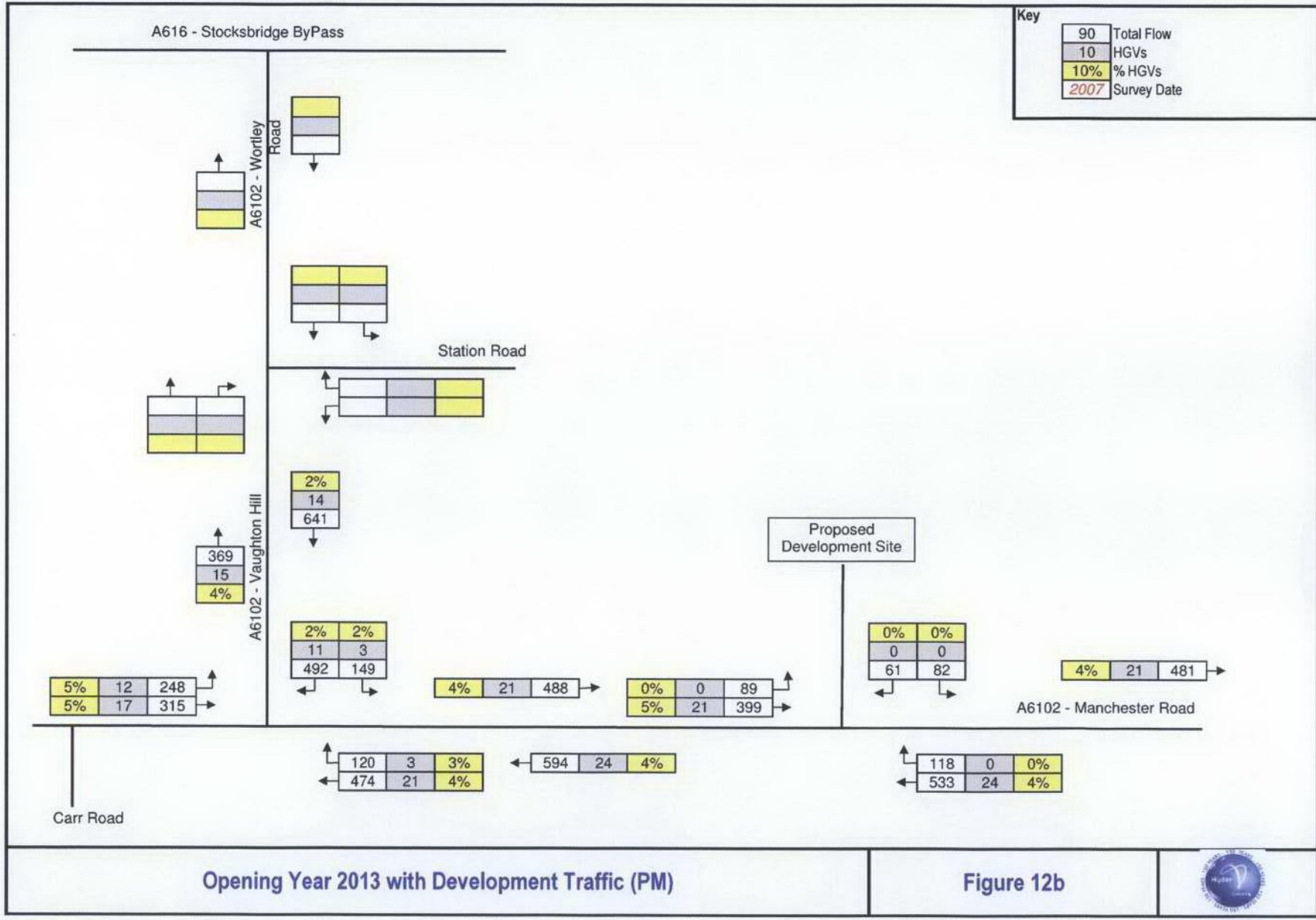


Development Traffic Percentage Distribution (%) (PM)

Figure 10b







A616 - Stocksbridge ByPass

A6102 - Wortley Road

Station Road

Proposed Development Site

A6102 - Vaughton Hill

A6102 - Manchester Road

Carr Road

Opening Year 2013 with Development Traffic (PM)

Figure 12b



5%	12	248
5%	17	315

2%	14	641
----	----	-----

2%	11	3
2%	492	149

4%	21	488
----	----	-----

0%	0	89
5%	21	399

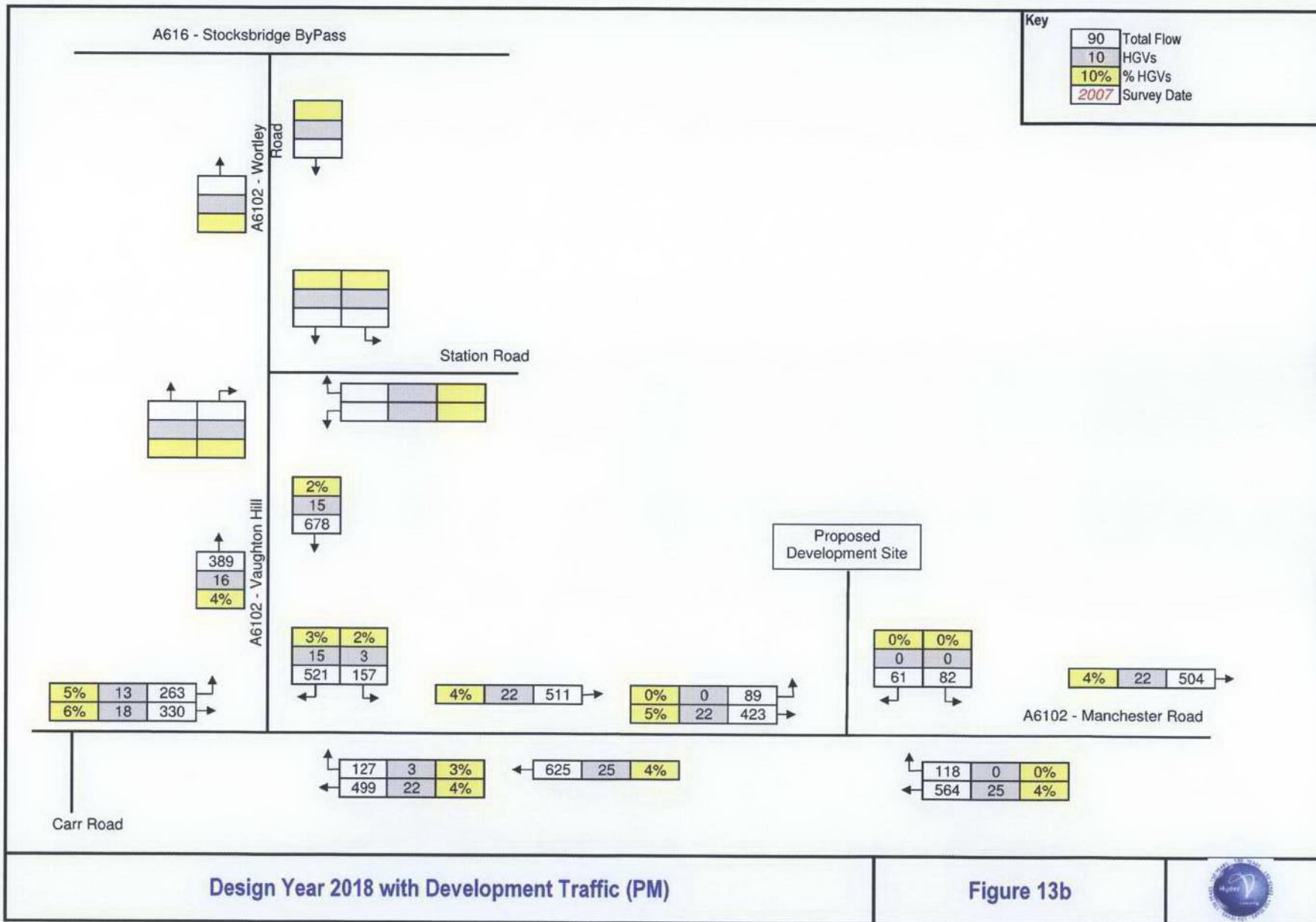
0%	0
0%	0
61	82

4%	21	481
----	----	-----

120	3	3%
474	21	4%

594	24	4%
-----	----	----

118	0	0%
533	24	4%



A616 - Stocksbridge ByPass

A6102 - Wortley Road

Station Road

A6102 - Vaughton Hill

Proposed Development Site

A6102 - Manchester Road

Carr Road

5%	13	263
6%	18	330

389
16
4%

2%
15
678

3%	2%
15	3
521	157

4%	22	511
----	----	-----

0%	0	89
5%	22	423

0%	0%
0	0
61	82

4%	22	504
----	----	-----

127	3	3%
499	22	4%

625	25	4%
-----	----	----

118	0	0%
564	25	4%