

The Residences at 130 Cambridgepark Drive

Cambridge,
Massachusetts

Technical Appendix

VHB/Vanasse Hangen Brustlin, Inc.

February 15, 2013

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130 Cambridgepark Drive

Transportation Impact Study

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Scoping Letter

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Vanasse Hangen Brustlin, Inc.

January 25, 2013

Ms. Susan Clippinger, Director
City of Cambridge, Traffic, Parking and Transportation Department
344 Broadway
Cambridge, MA 02139

Re: Proposed Residential Development, 130 Cambridgepark Drive, Cambridge, MA
Request for Transportation Impact Study (TIS) Scoping Determination

Dear Ms. Clippinger,

BRE/CPD, LLC, an Equity Office affiliate, and The McKinnon Company (the current site owner and developer, respectively) have retained VHB to prepare a Transportation Impact Study (TIS) for a proposed residential development on Cambridgepark Drive in Cambridge, MA.

The proposed project comprises a multi-family residential development with 200 units in a single building, supported by approximately 200 vehicle parking spaces and parking for 200 bicycles (the "Project"). The Project site is located on the south side of the 125 and 150 Cambridgepark Drive parcels. VHB proposes the following Scope for the TIS for your consideration:

- The TIS will comply with the Cambridge, Traffic, Parking and Transportation Department's TIS Guidelines.
- AM and PM peak hour traffic, pedestrian and bicycle turning movements counts (TMCs) have been collected on December 6, 2012 at the following proposed study area intersections:
 1. Alewife Brook Parkway at Route 2/16
 2. Alewife Brook Parkway at Cambridgepark Drive
 3. Alewife Brook Parkway at Rindge Avenue
 4. Cambridgepark Drive at Alewife Station Access Road
 5. Alewife Station Access Road and the Route 2 westbound access ramp
- In addition, 48-hour automatic traffic recorder (ATR) counts in 15-minute and 1-hour increments have been performed at the following locations:
 - A. Cambridgepark Drive, west of Alewife Station Access Road
 - B. Alewife Brook Parkway, north of Cambridgepark Drive

- The Existing (2013) conditions analysis will be based on the un-adjusted December 2012 counts.
- The ITE Land Use Code 220 (Apartments) average rate will be used for the trip generation analysis.
- The national Average Vehicle Occupancy (AVO) of 1.08 will be used to convert ITE vehicle trips to person trips and a local AVO of 1.10 will be used to convert the adjusted person trips to vehicle trips for the trip generation analysis.
- The mode split assumptions will be based on 2000 US Census Data for Census Tract 3549 provided by the City of Cambridge website, as shown below:

2000 Census Data (City of Cambridge Website)	
Mode	Percentage
Drive Alone	42.8%
Transit	36.8%
Rideshare	8.3%
Bike	3.4%
Walk	7.1%
Other	0.0%
Work at Home	1.6%

- The Project Generated trips associated with the Project will be assigned to the study area network based on 2000 Journey to Work Census Data for Tract 3549, as incorporated in the analysis for the Certified TIS for the 160 Cambridgepark Drive project.
- The 2018 Future traffic analysis will include a general background growth rate of 0.5% per year over a five year horizon and specific projects planned or under construction in the area, as follows:
 1. Residences at Route 2
 2. 70 Fawcett Street
 3. 160 Cambridgepark Drive
 4. Concord/Wheeler Mixed Use Project
 5. 70 Fawcett Street
 6. 165 Cambridgepark Drive
 7. Tyler Green
- A parking analysis will be performed to identify existing parking on the Project site, replacement of existing parking spaces eliminated by the Project, and parking supply to support the new residential use. The analysis will explore the opportunity for shared parking between the new residential use and the use of existing parking by nearby office buildings.
- The TIS will include crash data for the three most recent years available at the study area intersections.



We will be pleased to provide additional information or answer any questions you might have, and we look forward to receiving your confirmation of the scope for the TIS analysis.

Thank you for your assistance.

Very truly yours,

VANASSE HANGEN BRUSTLIN, INC.



R. David Black, Senior Project Manager

Cc: John Conley, Equity Office
Paul Filtzer, Equity Office
Rich McKinnon, The McKinnon Company
Kevin Renna, Goulston & Storrs



Traffic Counts

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Automatic Traffic Recorder Counts

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Accurate Counts
978-664-2565

Location : Alewife Brook Parkway
Location : North of Cambridge Park Drive
City/State: Cambridge, MA

Start Time	05-Dec-12 Wed	NB		Hour Totals		SB		Hour Totals		Combined Totals	
		Morning	Afternoon	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon
12:00		*	309			*	356				
12:15		*	324			*	325				
12:30		*	328			*	337				
12:45		*	319		0 1280	*	303		0 1321		0 2601
01:00		*	307			*	302				
01:15		*	344			*	297				
01:30		*	335			*	291				
01:45		*	349		0 1335	*	270		0 1160		0 2495
02:00		*	430			*	282				
02:15		*	395			*	302				
02:30		*	429			*	276				
02:45		*	436		0 1690	*	298		0 1158		0 2848
03:00		*	502			*	298				
03:15		*	490			*	282				
03:30		*	502			*	329				
03:45		*	453		0 1947	*	288		0 1197		0 3144
04:00		*	492			*	296				
04:15		*	475			*	283				
04:30		*	479			*	326				
04:45		*	464		0 1910	*	277		0 1182		0 3092
05:00		36	450			80	262				
05:15		34	467			129	257				
05:30		51	482			219	343				
05:45		60	472		181 1871	276	225		704 1087		885 2958
06:00		87	452			364	258				
06:15		102	475			460	237				
06:30		182	468			461	264				
06:45		247	457		618 1852	329	258		1614 1017		2232 2869
07:00		315	314			365	307				
07:15		317	297			326	283				
07:30		357	306			337	217				
07:45		328	281		1317 1198	295	197		1323 1004		2640 2202
08:00		344	315			349	197				
08:15		318	312			336	227				
08:30		355	285			320	167				
08:45		265	298		1282 1210	302	152		1307 743		2589 1953
09:00		303	268			395	151				
09:15		270	258			354	147				
09:30		297	257			380	121				
09:45		271	242		1141 1025	325	117		1454 536		2595 1561
10:00		259	253			371	115				
10:15		255	194			388	104				
10:30		261	215			362	113				
10:45		247	178		1022 840	346	98		1467 430		2489 1270
11:00		268	177			312	64				
11:15		292	133			318	50				
11:30		278	120			357	39				
11:45		299	105		1137 535	315	34		1302 187		2439 722
Total		6698	16693			9171	11022				15869 27715
Percent		28.6%	71.4%			45.4%	54.6%				36.4% 63.6%

Accurate Counts 978-664-2565

Location : Alewife Brook Parkway
 Location : North of Cambridge Park Drive
 City/State: Cambridge, MA

Start Time	06-Dec-12 Thu	NB		Hour Totals		SB		Hour Totals		Combined Totals	
		Morning	Afternoon	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon
12:00		104	321			28	285				
12:15		67	328			28	320				
12:30		49	316			20	319				
12:45		40	344	260	1309	9	295	85	1219	345	2528
01:00		39	320			12	285				
01:15		28	358			20	291				
01:30		23	349			12	294				
01:45		23	349	113	1376	6	298	50	1168	163	2544
02:00		4	359			14	303				
02:15		13	395			10	267				
02:30		12	436			11	310				
02:45		8	453	37	1643	12	314	47	1194	84	2837
03:00		18	458			8	313				
03:15		11	439			17	313				
03:30		12	499			11	297				
03:45		15	457	56	1853	20	292	56	1215	112	3068
04:00		16	475			18	329				
04:15		17	471			21	317				
04:30		15	477			47	352				
04:45		22	473	70	1896	56	299	142	1297	212	3193
05:00		28	495			77	313				
05:15		34	491			152	328				
05:30		46	485			202	366				
05:45		74	467	182	1938	302	280	733	1287	915	3225
06:00		106	448			352	304				
06:15		113	439			459	347				
06:30		200	442			438	288				
06:45		233	384	652	1713	369	324	1618	1263	2270	2976
07:00		289	337			408	312				
07:15		322	325			273	280				
07:30		344	323			311	253				
07:45		321	297	1276	1282	260	203	1252	1048	2528	2330
08:00		345	326			304	188				
08:15		314	302			214	185				
08:30		352	319			292	180				
08:45		303	318	1314	1265	318	164	1128	717	2442	1982
09:00		289	298			324	169				
09:15		279	338			309	174				
09:30		265	306			357	151				
09:45		266	244	1099	1186	333	144	1323	638	2422	1824
10:00		242	240			391	124				
10:15		249	220			373	116				
10:30		290	216			344	101				
10:45		303	190	1084	866	361	91	1469	432	2553	1298
11:00		267	138			320	72				
11:15		298	161			315	63				
11:30		320	128			327	66				
11:45		312	143	1197	570	311	32	1273	233	2470	803
Total		7340	16897			9176	11711			16516	28608
Percent		30.3%	69.7%			43.9%	56.1%			36.6%	63.4%

Accurate Counts

978-664-2565

Location : Cambridge Park Drive
 Location : West of 'T' Access Road
 City/State: Cambridge, MA

Start Time	05-Dec-12 Wed	WB		Hour Totals		EB		Hour Totals		Combined Totals	
		Morning	Afternoon	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon
12:00		*	26			*	48				
12:15		*	37			*	33				
12:30		*	17			*	27				
12:45		*	35	0	115	*	21	0	129	0	244
01:00		*	33			*	35				
01:15		*	22			*	33				
01:30		*	40			*	27				
01:45		*	23	0	118	*	29	0	124	0	242
02:00		*	30			*	39				
02:15		*	31			*	21				
02:30		*	16			*	30				
02:45		*	29	0	106	*	22	0	112	0	218
03:00		*	33			*	44				
03:15		*	24			*	47				
03:30		*	6			*	54				
03:45		*	6	0	69	*	76	0	221	0	290
04:00		*	18			*	67				
04:15		*	20			*	41				
04:30		*	13			*	77				
04:45		*	44	0	95	*	55	0	240	0	335
05:00		6	17			3	92				
05:15		9	11			2	81				
05:30		7	26			3	69				
05:45		16	27	38	81	1	61	9	303	47	384
06:00		26	5			4	72				
06:15		26	6			6	56				
06:30		64	40			9	42				
06:45		55	7	171	58	16	58	35	228	206	286
07:00		52	3			20	36				
07:15		58	7			18	34				
07:30		70	21			27	15				
07:45		78	9	258	40	26	24	91	109	349	149
08:00		102	8			31	23				
08:15		106	7			18	14				
08:30		106	2			49	11				
08:45		104	6	418	23	32	8	130	56	548	79
09:00		98	5			20	10				
09:15		74	5			19	11				
09:30		73	1			12	9				
09:45		75	6	320	17	19	2	70	32	390	49
10:00		53	6			20	9				
10:15		53	2			23	5				
10:30		46	2			11	5				
10:45		36	9	188	19	9	3	63	22	251	41
11:00		29	1			25	4				
11:15		26	2			28	3				
11:30		34	1			31	5				
11:45		27	1	116	5	31	0	115	12	231	17
Total		1509	746			513	1588			2022	2334
Percent		66.9%	33.1%			24.4%	75.6%			46.4%	53.6%

Accurate Counts

978-664-2565

Location : Cambridge Park Drive
 Location : West of 'T' Access Road
 City/State: Cambridge, MA

Start Time	06-Dec-12 Thu	WB		Hour Totals		EB		Hour Totals		Combined Totals	
		Morning	Afternoon	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon
12:00		2	31			1	41				
12:15		3	40			4	32				
12:30		1	21			0	22				
12:45		1	39	7	131	1	25	6	120	13	251
01:00		2	35			3	29				
01:15		1	40			1	37				
01:30		0	39			0	35				
01:45		0	25	3	139	1	28	5	129	8	268
02:00		0	23			0	39				
02:15		0	22			0	31				
02:30		0	32			1	47				
02:45		0	19	0	96	2	28	3	145	3	241
03:00		0	30			4	39				
03:15		0	18			0	58				
03:30		0	23			0	59				
03:45		3	19	3	90	1	54	5	210	8	300
04:00		7	29			0	54				
04:15		0	21			1	47				
04:30		10	30			2	65				
04:45		5	27	22	107	2	66	5	232	27	339
05:00		2	23			2	84				
05:15		4	12			0	71				
05:30		9	27			1	68				
05:45		14	38	29	100	6	52	9	275	38	375
06:00		16	25			1	65				
06:15		24	12			7	49				
06:30		31	15			20	49				
06:45		55	19	126	71	9	30	37	193	163	264
07:00		79	4			17	33				
07:15		57	10			15	22				
07:30		50	13			20	27				
07:45		57	1	243	28	23	22	75	104	318	132
08:00		75	5			15	15				
08:15		73	4			38	15				
08:30		71	7			44	5				
08:45		92	6	311	22	38	5	135	40	446	62
09:00		97	4			34	3				
09:15		104	8			21	9				
09:30		75	2			24	13				
09:45		78	5	354	19	14	8	93	33	447	52
10:00		50	3			18	10				
10:15		46	5			12	2				
10:30		39	3			20	4				
10:45		45	2	180	13	17	3	67	19	247	32
11:00		26	1			21	2				
11:15		34	4			23	0				
11:30		21	5			21	1				
11:45		31	3	112	13	22	5	87	8	199	21
Total		1390	829			527	1508			1917	2337
Percent		62.6%	37.4%			25.9%	74.1%			45.1%	54.9%

Accurate Counts

978-664-2565

Location : Cambridge Park Drive
 Location : West of 'T' Access Road
 City/State: Cambridge, MA

Start Time	07-Dec-12 Fri	WB		Hour Totals		EB		Hour Totals		Combined Totals	
		Morning	Afternoon	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon
12:00		2	*			0	*				
12:15		1	*			1	*				
12:30		1	*			2	*				
12:45		1	*	5	0	0	*	3	0	8	0
01:00		0	*			1	*				
01:15		0	*			1	*				
01:30		0	*			0	*				
01:45		0	*	0	0	0	*	2	0	2	0
02:00		0	*			0	*				
02:15		0	*			0	*				
02:30		1	*			2	*				
02:45		1	*	2	0	2	*	4	0	6	0
03:00		0	*			3	*				
03:15		3	*			0	*				
03:30		1	*			0	*				
03:45		2	*	6	0	1	*	4	0	10	0
04:00		4	*			1	*				
04:15		6	*			3	*				
04:30		4	*			2	*				
04:45		8	*	22	0	1	*	7	0	29	0
05:00		*	*	*	*	*	*	*	*	*	*
05:15		*	*	*	*	*	*	*	*	*	*
05:30		*	*	*	*	*	*	*	*	*	*
05:45		*	*	*	*	*	*	*	*	*	*
06:00		*	*	*	*	*	*	*	*	*	*
06:15		*	*	*	*	*	*	*	*	*	*
06:30		*	*	*	*	*	*	*	*	*	*
06:45		*	*	*	*	*	*	*	*	*	*
07:00		*	*	*	*	*	*	*	*	*	*
07:15		*	*	*	*	*	*	*	*	*	*
07:30		*	*	*	*	*	*	*	*	*	*
07:45		*	*	*	*	*	*	*	*	*	*
08:00		*	*	*	*	*	*	*	*	*	*
08:15		*	*	*	*	*	*	*	*	*	*
08:30		*	*	*	*	*	*	*	*	*	*
08:45		*	*	*	*	*	*	*	*	*	*
09:00		*	*	*	*	*	*	*	*	*	*
09:15		*	*	*	*	*	*	*	*	*	*
09:30		*	*	*	*	*	*	*	*	*	*
09:45		*	*	*	*	*	*	*	*	*	*
10:00		*	*	*	*	*	*	*	*	*	*
10:15		*	*	*	*	*	*	*	*	*	*
10:30		*	*	*	*	*	*	*	*	*	*
10:45		*	*	*	*	*	*	*	*	*	*
11:00		*	*	*	*	*	*	*	*	*	*
11:15		*	*	*	*	*	*	*	*	*	*
11:30		*	*	*	*	*	*	*	*	*	*
11:45		*	*	*	*	*	*	*	*	*	*
Total		35	0			20	0			55	0
Percent		100.0%	0.0%			100.0%	0.0%			100.0%	0.0%
Grand Total		2934	1575			1060	3096			3994	4671
Percent		65.1%	34.9%			25.5%	74.5%			46.1%	53.9%
ADT		ADT 4,332				AADT 4,332					

Turning Movement Counts

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Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Route 2 / T Exit
City/State : Cambridge, MA
Weather : Clear

File Name : 11810001
Site Code : 11810001
Start Date : 12/6/2012
Page No : 11

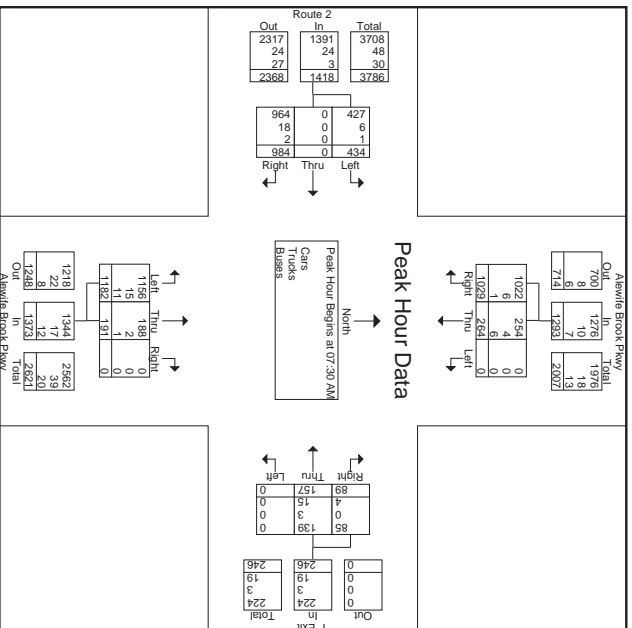
Start Time	Alewife Brook Pkwy				T' Exit				Alewife Brook Pkwy				Route 2			
	From North		From South		From East		From West		From South		From North		From West		From East	
	Left	Thru	Right	Thru	Left	Thru	Right	Thru	Left	Thru	Right	Thru	Left	Thru	Right	Thru
07:30 AM	0	54	193	0	0	43	23	312	41	0	98	0	98	0	290	1054
07:45 AM	0	70	334	0	0	47	24	294	56	0	118	0	118	0	248	2245
Total	0	124	527	0	0	90	47	606	97	0	216	0	216	0	538	4114
08:00 AM	0	78	255	0	0	37	26	301	48	0	108	0	108	0	261	1114
08:15 AM	0	62	247	0	0	30	16	275	46	0	110	0	110	0	185	971
08:30 AM	0	87	215	0	0	37	20	304	48	0	91	0	91	0	242	1044
08:45 AM	0	74	230	0	0	29	22	270	57	0	107	0	107	0	281	1070
Total	0	301	947	0	0	133	84	1150	199	0	416	0	416	0	969	4199
09:00 AM	0	98	200	0	0	23	22	220	59	0	103	0	103	0	252	977
09:15 AM	0	84	171	0	0	23	24	195	72	0	178	0	178	0	271	1018
Grand Total	0	607	1845	0	0	269	177	2171	427	0	913	0	913	0	2030	8439
Apprch %	0	24.8	75.2	0	0	60.3	39.7	83.6	16.4	0	31	0	31	0	69	69
Total %	0	7.2	21.9	0	0	3.2	2.1	25.7	5.1	0	10.8	0	10.8	0	24.1	24.1
Cars	0	586	1830	0	0	232	169	2111	420	0	897	0	897	0	1997	8242
% ADT	0	96.5	99.2	0	0	86.2	95.5	97.2	98.4	0	98.2	0	98.4	0	98.4	97.7
Trucks	0	11	14	0	0	3	3	0	5	0	15	0	15	0	28	119
% Trucks	0	1.8	0.8	0	0	1.1	0	0	1.2	0	1.6	0	1.6	0	5	1.4
Buses	0	10	1	0	0	34	8	8	2	0	2	0	2	0	4	14
% Buses	0	1.6	0.1	0	0	12.6	4.5	4.5	0.8	0	0.1	0	0.1	0	0.2	0.9

Start Time	Alewife Brook Pkwy				T' Exit				Alewife Brook Pkwy				Route 2			
	From North		From South		From East		From West		From South		From North		From West		From East	
	Left	Thru	Right	Thru	Left	Thru	Right	Thru	Left	Thru	Right	Thru	Left	Thru	Right	Thru
07:30 AM	0	54	193	0	43	23	66	312	41	0	353	0	98	0	290	1054
07:45 AM	0	78	334	0	47	24	71	294	56	0	350	0	118	0	248	1101
08:00 AM	0	62	255	0	37	26	63	301	48	0	360	0	108	0	261	1114
08:15 AM	0	62	247	0	30	16	46	275	46	0	110	0	110	0	205	971
Total	0	264	1029	0	157	89	246	1182	191	0	1375	0	434	0	984	4330
% ADT	0	20.4	79.6	0	63.8	36.2	246	86.1	13.9	0	30.6	0	30.6	0	69.4	43.0
PHE	.000	84.6	77.0	.000	.000	.856	866	947	.000	.000	972	.000	919	.000	848	914
Cars	0	254	1022	0	139	88.5	231	1156	188	0	1344	0	427	0	964	4235
% Cars	0	96.2	99.3	0	98.5	95.5	91.1	97.8	98.4	0	97.9	0	98.0	0	98.1	97.8
Trucks	0	7	10	0	3	0	3	1.5	2	0	1.7	0	6	0	24	54
% Trucks	0	1.5	0.6	0	1.0	0	1.2	1.3	1.0	0	1.2	0	1.4	0	1.8	1.7
Buses	0	6	1	0	15	4	19	11	1	0	12	0	2	0	3	7
% Buses	0	2.3	0.1	0	9.6	4.5	7.7	0.9	0.5	0	0.9	0	0.2	0	0.2	0.9

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Route 2 / T Exit
City/State : Cambridge, MA
Weather : Clear

File Name : 11810001
Site Code : 11810001
Start Date : 12/6/2012
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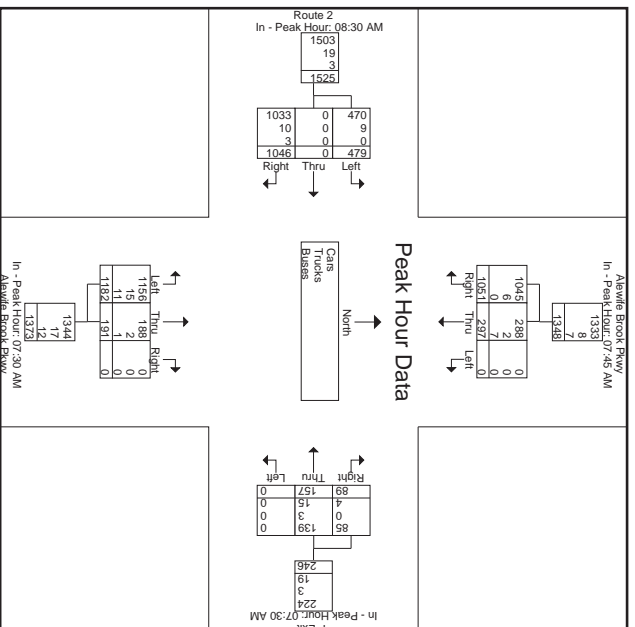
Peak Hour Analysis from 07:30 AM to 09:15 AM - Peak 1 of 1

Peak Hour for Each Approach Begins at:

	07:30 AM	07:30 AM	07:30 AM	07:30 AM	08:30 AM	08:30 AM
-10 mins.	70	334	404	43	23	312
+15 mins.	0	255	333	0	21	56
+30 mins.	0	62	247	0	37	48
+45 mins.	0	97	215	0	26	63
Total Volume	0	297	1051	0	157	391
% ADT	0	22	78	0	63.8	36.2
PHE	.000	85.3	78.7	.000	.856	866
Cars	0	258	1045	0	139	231
% Cars	0	97	99.4	0	88.5	95.5
Trucks	0	2	6	0	3	3

Accurate Counts
978-664-2565

% Buses	0	7	0	0.7	15	4	19	11	1	0	12	0	0	0.3	3
	0	2.4	0	0	9.6	4.5	7.7	0.9	0.5	0	0.9	0	0	0.3	0.2



Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street: Route 2 / T Exit
City/State : Cambridge, MA
Weather : Clear

File Name : 11810001
Site Code : 11810001
Start Date : 12/6/2012
Page No : 1

Groups/Printed - Buses

Start Time	Alewife Brook Pkwy From North			T Exit From East			Alewife Brook Pkwy From South			Route 2 From West			Int. Total
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	
07:30 AM	0	1	1	0	0	0	5	0	0	0	0	0	9
07:45 AM	0	3	3	0	6	6	1	1	0	0	0	0	11
Total	0	4	4	0	6	6	1	1	0	0	0	0	20
08:00 AM	0	0	0	0	0	0	2	1	0	0	0	0	11
08:15 AM	0	0	0	0	3	3	1	4	0	0	0	0	10
08:30 AM	0	0	0	0	4	4	0	3	0	0	0	0	10
08:45 AM	0	1	1	0	4	2	2	1	0	0	0	1	9
Total	0	5	5	0	17	17	5	9	0	0	0	1	40
09:00 AM	0	0	0	0	7	7	1	1	0	0	0	0	10
09:15 AM	0	0	0	0	4	4	1	1	0	0	0	0	8
Grand Total	0	10	10	0	34	34	8	17	2	0	0	1	8
Approch %	0	90.9	90.9	0	81	81	19	89.5	10.5	0	0	0	83.3
Total %	0	12.8	12.8	0	43.6	43.6	10.3	21.8	2.6	0	0	0	6.4

Start Time	Alewife Brook Pkwy From North			T Exit From East			Alewife Brook Pkwy From South			Route 2 From West			Int. Total
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	
07:45 AM	0	3	0	0	6	0	6	1	0	0	0	0	11
08:00 AM	0	1	0	0	2	0	4	1	0	0	1	0	11
08:15 AM	0	1	0	0	3	1	8	4	0	0	0	1	10
08:30 AM	0	2	0	0	4	0	4	3	0	0	3	0	10
08:45 AM	0	7	0	0	19	3	22	9	0	0	10	1	42
Total Volume	0	100	0	0	86.4	13.6	90	90	10	0	33.3	0	42
% App. Total	.000	.583	.000	.000	.792	.208	.688	.563	.237	.000	.625	.250	.955

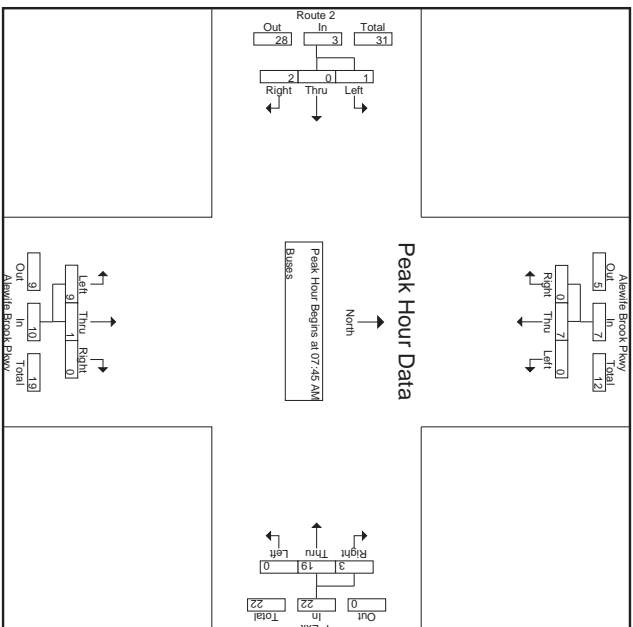
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1

Peak Hour for Entire Intersection Begins at 07:45 AM

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Route 2 / T Exit
City/State : Cambridge, MA
Weather : Clear

File Name : 11810001
Site Code : 11810001
Start Date : 12/6/2012
Page No : 2



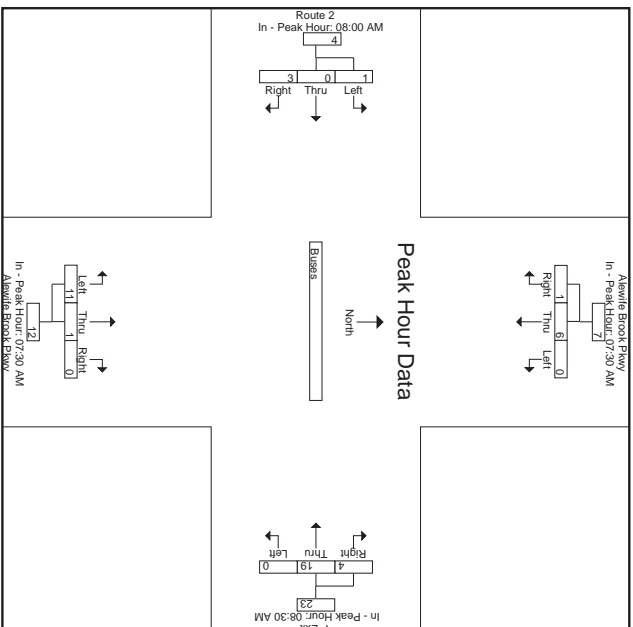
Peak Hour Analysis: From 07:30 AM to 09:15 AM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	07:30 AM	08:30 AM	07:30 AM	08:30 AM	08:00 AM	08:00 AM	07:30 AM	08:00 AM	08:00 AM
+0 mins.	0	1	2	4	0	0	5	0	1
+15 mins.	0	3	3	4	0	0	2	1	1
+30 mins.	0	1	0	7	0	0	1	0	1
+45 mins.	0	1	1	1	0	0	1	0	1
Total Volume	0	6	7	19	0	0	11	0	4
% ADP Total	0	86.7	14.3	82.6	0	0	91.7	8.3	3
FHE	.000	.350	.250	.079	.500	.000	.550	.250	.000
		.583	.000	.079	.500	.600	.250	.000	.750
									1.000

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Route 2 / T Exit
City/State : Cambridge, MA
Weather : Clear

File Name : 11810001
Site Code : 11810001
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Route 2 / T Exit
City/State : Cambridge, MA
Weather : Clear

File Name : 11810001
Site Code : 11810001
Start Date : 12/6/2012
Page No : 1

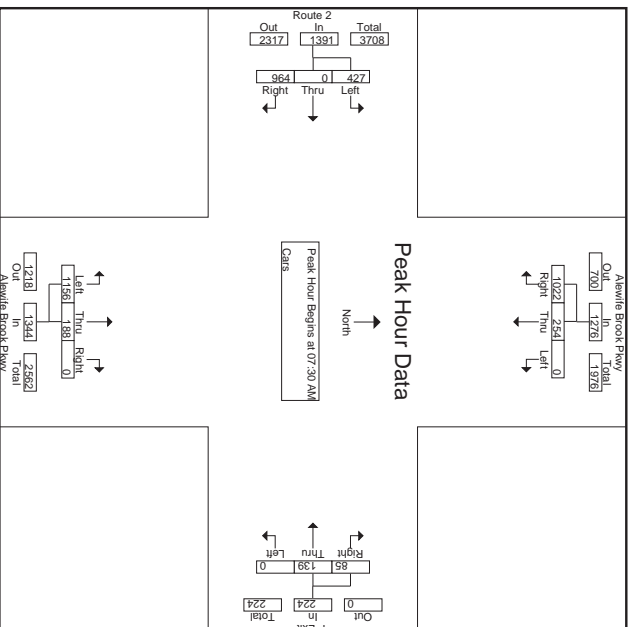
Start Time	Alewife Brook Pkwy From North			T Exit From East			Alewife Brook Pkwy From South			Route 2 From West			Int. Total
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	
07:30 AM	0	51	191	0	41	22	302	41	0	97	0	287	1032
07:45 AM	0	65	333	0	41	24	291	53	0	116	0	241	1164
Total	0	116	524	0	82	46	593	94	0	213	0	528	2196
08:00 AM	0	77	255	0	31	24	296	48	0	107	0	255	1093
08:15 AM	0	61	243	0	26	15	267	46	0	107	0	181	946
08:30 AM	0	85	214	0	33	20	295	47	0	91	0	238	1023
08:45 AM	0	71	226	0	25	20	263	57	0	101	0	279	1042
Total	0	294	938	0	115	79	1121	198	0	406	0	953	4104
09:00 AM	0	94	200	0	16	21	211	57	0	101	0	249	949
09:15 AM	0	82	168	0	19	23	186	71	0	177	0	267	993
Grand Total	0	586	1830	0	232	169	2111	420	0	897	0	1997	8242
Approach %	0	24.3	75.7	0	57.9	42.1	83.4	16.6	0	31	0	69	
Total %	0	7.1	22.2	0	2.8	2.1	25.6	5.1	0	10.9	0	24.2	

Start Time	Alewife Brook Pkwy From North			T Exit From East			Alewife Brook Pkwy From South			Route 2 From West			Int. Total
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	
07:30 AM	0	51	191	0	41	22	302	41	0	97	0	287	1032
07:45 AM	0	65	333	0	41	24	291	53	0	116	0	241	1164
08:00 AM	0	77	255	0	31	24	296	48	0	107	0	255	1093
08:15 AM	0	61	243	0	26	15	267	46	0	107	0	181	946
Total Volumes	0	254	1022	0	139	85	1156	188	0	427	0	964	4235
% App. Total	0	19.9	80.1	0	62.1	37.9	86	14	0	30.7	0	69.3	
PHF	.000	.825	.767	.802	.000	.848	.885	.862	.957	.887	.000	.977	9.20
App. Total				.802				.887		.977			9.20
Int. Total													840
App. Total													906

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Route 2 / T Exit
City/State : Cambridge, MA
Weather : Clear

File Name : 11810001
Site Code : 11810001
Start Date : 12/6/2012
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Peak Hour Analysis from 07:30 AM to 09:15 AM - Peak 1 of 1

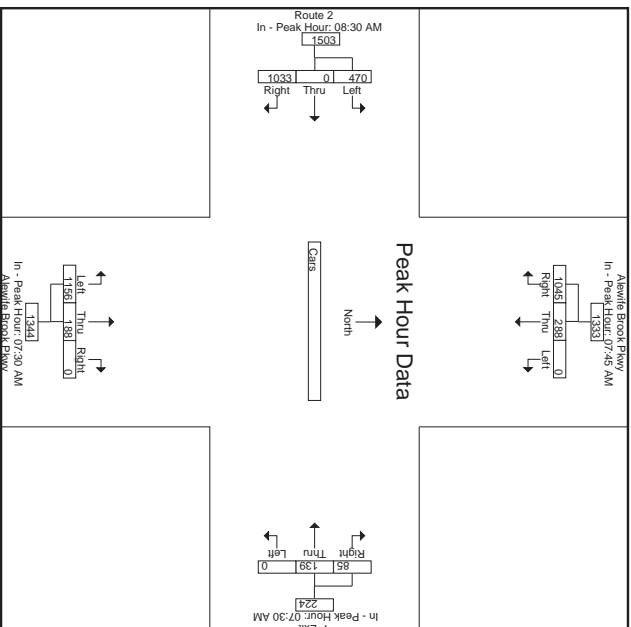
Peak Hour for Each Approach Begins at:

	07:45 AM	07:30 AM	07:30 AM	07:30 AM	07:30 AM	08:30 AM
-10 mins.	65	333	308	41	22	63
+15 mins.	77	255	329	0	24	66
+30 mins.	61	243	304	0	31	55
+45 mins.	0	0	214	0	20	41
Total Volumes	0	288	1045	0	139	224
% App. Total	0	21.6	78.4	0	62.1	37.9
PHF	.000	.847	.785	.837	.000	.848
App. Total				.848		.885
Int. Total						.862
App. Total						.957
Int. Total						.887
App. Total						.000
Int. Total						.977
App. Total						.884
Int. Total						.000
App. Total						.926
Int. Total						.846

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Route 2 / T Exit
City/State : Cambridge, MA
Weather : Clear

File Name : 11810001
Site Code : 11810001
Start Date : 12/6/2012
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Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Route 2 / T Exit
City/State : Cambridge, MA
Weather : Clear

File Name : 11810001
Site Code : 11810001
Start Date : 12/6/2012
Page No : 1

Groups Printed - Trucks

Start Time	Alewife Brook Pkwy From North			T Exit From East			Alewife Brook Pkwy From South			Route 2 From West			Int. Total
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	
07:30 AM	0	2	2	0	2	0	5	0	0	1	0	0	2
07:45 AM	0	2	1	0	0	0	2	2	0	2	0	0	1
Total	0	4	2	0	2	0	7	2	0	3	0	0	3
08:00 AM	0	0	0	0	0	0	4	0	0	1	0	0	5
08:15 AM	0	0	0	0	1	0	6	1	0	2	0	0	4
08:30 AM	0	0	1	0	0	0	6	1	0	0	0	0	3
08:45 AM	0	2	2	0	0	0	6	0	0	6	0	0	6
Total	0	2	2	0	1	0	20	1	0	9	0	0	13
09:00 AM	0	3	0	0	0	0	8	2	0	2	0	0	3
09:15 AM	0	2	3	0	0	0	8	0	0	1	0	0	3
Grand Total	0	11	14	0	0	0	43	5	0	15	0	0	28
Approch %	0	44	56	0	0	0	89.6	10.4	0	34.9	0	0	65.1
Total %	0	9.2	11.8	0	0	0	36.1	4.2	0	12.6	0	0	23.5

Start Time	Alewife Brook Pkwy From North			T Exit From East			Alewife Brook Pkwy From South			Route 2 From West			Int. Total
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	
08:30 AM	0	0	1	0	0	0	6	1	0	7	0	0	3
08:45 AM	0	2	4	0	0	0	6	0	0	6	6	0	7
09:00 AM	0	3	0	0	0	0	8	2	0	10	2	0	5
09:15 AM	0	2	3	0	0	0	8	0	0	8	1	0	4
Total Volume	0	7	8	0	0	0	28	3	0	31	9	0	19
% App. Total	0	46.7	53.3	0	0	0	90.3	9.7	0	47.4	0	0	52.6
PHF	.000	.583	.800	.000	.000	.000	.875	.375	.000	.775	.375	.000	.833
App. Total							625						679
Int. Total							.000						.855

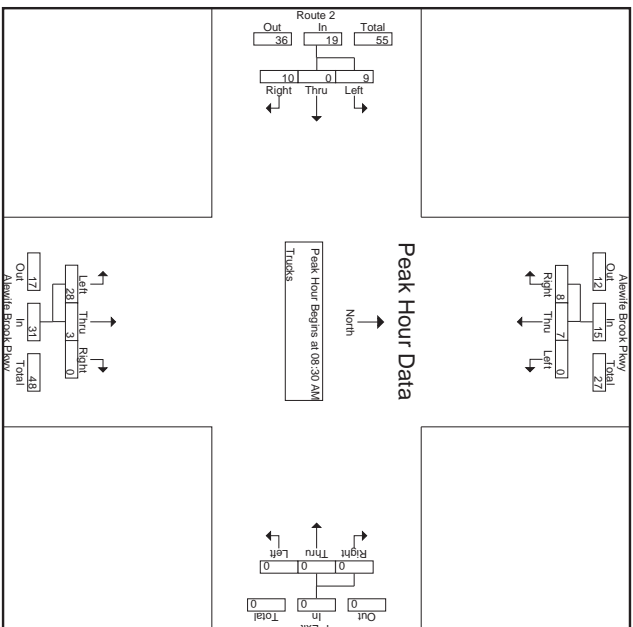
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1

Peak Hour for Entire Intersection Begins at 08:30 AM

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Route 2 / T Exit
City/State : Cambridge, MA
Weather : Clear

File Name : 11810001
Site Code : 11810001
Start Date : 12/6/2012
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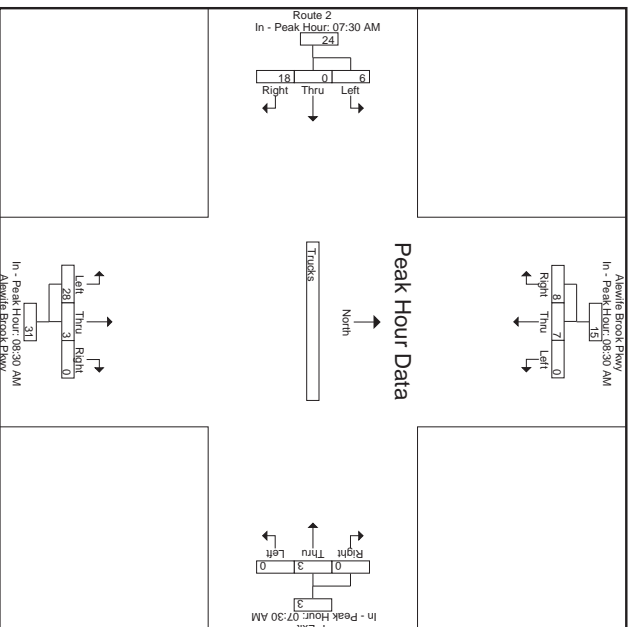
Peak Hour Analysis: From 07:30 AM to 09:15 AM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	08:30 AM	07:30 AM	08:30 AM	07:30 AM	08:30 AM	07:30 AM
+0 mins.	0	1	1	0	2	7
+15 mins.	0	4	6	0	6	9
+30 mins.	0	3	0	0	2	2
+45 mins.	0	3	0	0	8	6
Total Volume	0	7	13	0	28	24
% ADP Total	0	46.7	53.3	0	90.3	25
FHE	.000	.583	.500	.625	.375	.775
				.000	.375	.750
				.375	.000	.000
				.775	.000	.643

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Route 2 / T Exit
City/State : Cambridge, MA
Weather : Clear

File Name : 11810001
Site Code : 11810001
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Accurate Counts

978-664-2565

N/S Street : Alewife Brook Parkway
 E/W Street : Route 2 / T Exit
 City/State : Cambridge, MA
 Weather : Clear

File Name : 11810001
 Site Code : 11810001
 Start Date : 12/6/2012
 Page No : 1

Groups Printed - Peds

Start Time	T- Exit		T- East		From South		From West		Int. Total
	SB	NB	From East	NB	App. Total	App. Total	App. Total		
07:30 AM	0	0	0	0	0	0	0	0	
07:45 AM	1	0	0	0	0	0	0	1	
Total	1	0	0	0	0	0	0	1	
08:00 AM	0	0	0	0	0	0	0	0	
08:15 AM	1	0	1	0	1	0	0	1	
08:30 AM	1	0	1	0	1	0	0	1	
08:45 AM	1	0	1	0	1	0	0	1	
Total	3	0	3	0	3	0	0	3	
09:00 AM	0	0	0	0	0	0	0	0	
09:15 AM	0	0	0	0	0	0	0	0	
Grand Total	4	0	4	0	4	0	0	4	
Approch %	100	0	100	0	100	0	0	0	
Total %									

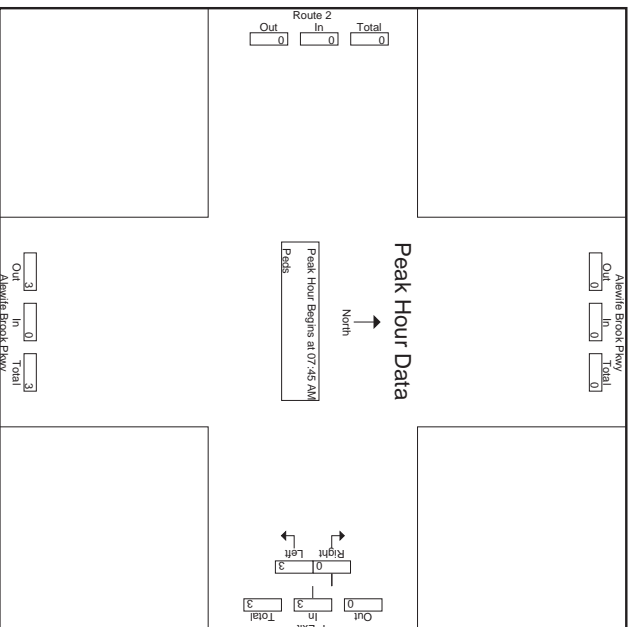
Start Time	From North		T- East		From South		From West		Int. Total
	App. Total	SB	From East	NB	App. Total	App. Total	App. Total		
07:30 AM to 09:15 AM - Peak 1 of 1									
07:45 AM	0	1	0	0	1	0	0	1	
08:00 AM	0	0	0	0	0	0	0	0	
08:15 AM	0	1	0	0	1	0	0	1	
08:30 AM	0	1	0	0	1	0	0	1	
Total Volume	0	3	0	0	3	0	0	3	
% App. Total	.000	100	.000	.000	.750	.000	.000	.750	
PHF									

Accurate Counts

978-664-2565

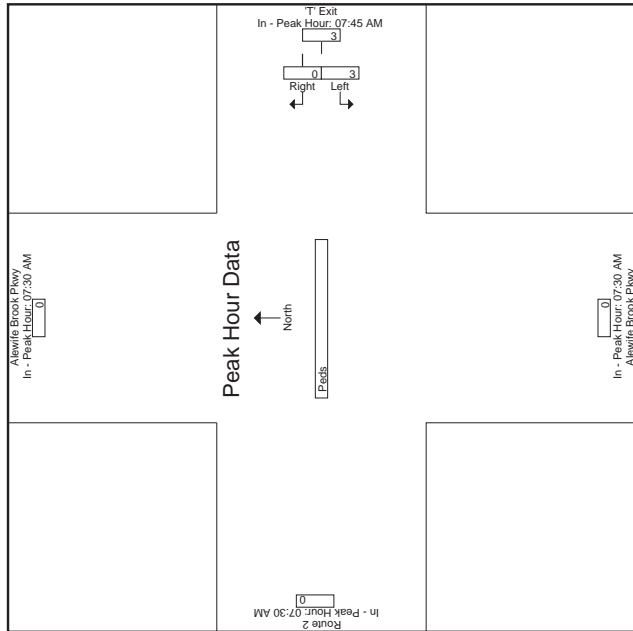
N/S Street : Alewife Brook Parkway
 E/W Street : Route 2 / T Exit
 City/State : Cambridge, MA
 Weather : Clear

File Name : 11810001
 Site Code : 11810001
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Peak Hour Analysis from 07:30 AM to 09:15 AM - Peak 1 of 1
 Peak Hour for Each Approach Begins at:

	07:30 AM	07:45 AM	07:30 AM	07:30 AM
-40 mins.	0	0	0	0
+15 mins.	0	1	0	0
+30 mins.	0	1	0	0
+45 mins.	0	1	1	0
Total Volume	0	3	3	0
% App. Total	.000	100	.000	.000
PHF		.750	.750	.000



Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Route 2 / T Exit
City/State : Cambridge, MA
Weather : Clear

File Name : 11810001
Site Code : 11810001
Start Date : 12/6/2012
Page No : 1

Groups Printed- Cars - Trucks - Buses

Start Time	Alewife Brook Pkwy From North			T' Exit From East			Alewife Brook Pkwy From South			Route 2 From West			Int. Total
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	
04:30 PM	0	83	219	0	112	83	367	84	0	162	0	255	1365
04:45 PM	0	65	187	0	122	73	410	76	0	135	0	237	1305
Total	0	148	406	0	234	156	777	160	0	297	0	492	2670
05:00 PM	0	86	198	0	111	102	406	71	0	157	0	235	1366
05:15 PM	0	88	199	0	111	79	453	76	0	140	0	229	1375
05:30 PM	0	94	205	0	122	89	394	79	0	141	0	309	1433
05:45 PM	0	89	191	0	136	104	445	80	0	110	0	209	1364
Total	0	357	793	0	480	374	1698	306	0	548	0	982	5538
06:00 PM	0	84	220	0	132	70	358	79	0	143	0	244	1330
06:15 PM	0	84	158	0	119	87	402	71	0	120	0	280	1321
Grand Total	0	673	1577	0	965	687	3235	616	0	1108	0	1998	10859
Apprch %	0	29.9	70.1	0	58.4	41.6	84	16	0	35.7	0	64.3	
Total %	0	6.2	14.5	0	8.9	6.3	29.8	5.7	0	10.2	0	18.4	
Cars	0	663	1573	0	945	678	3191	607	0	1104	0	1990	10751
% Cars	0	98.5	99.7	0	97.9	98.7	98.6	98.5	0	99.6	0	99.6	99
Trucks	0	1	3	0	0	0	10	4	0	4	0	4	26
% Trucks	0	0.1	0.2	0	0	0	0.3	0.6	0	0.4	0	0.2	0.2
Buses	0	9	1	0	20	9	34	5	0	0	0	4	82
% Buses	0	1.3	0.1	0	2.1	1.3	1.1	0.8	0	0	0	0.2	0.8

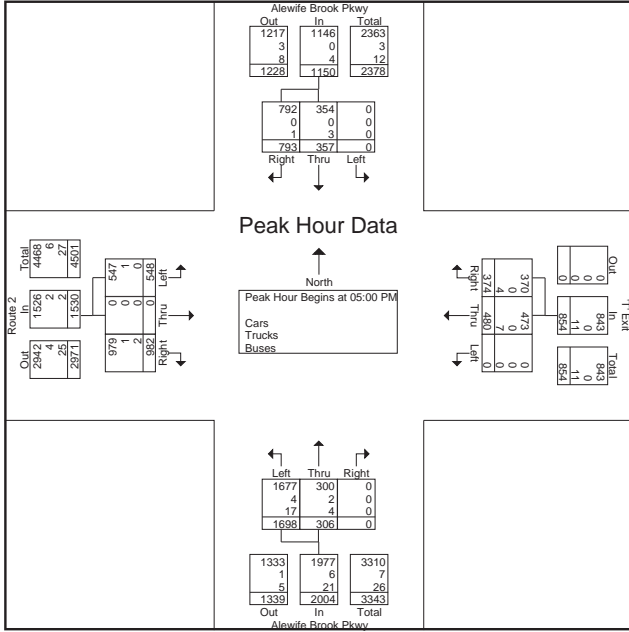
Start Time	Alewife Brook Pkwy From North				T' Exit From East			Alewife Brook Pkwy From South				Route 2 From West			Int. Total		
	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru		Right	App. Total
05:00 PM	0	86	198	284	0	111	102	213	406	71	0	477	157	0	235	392	1366
05:15 PM	0	88	199	287	0	111	79	190	453	76	0	529	140	0	229	369	1375
05:30 PM	0	94	205	299	0	122	89	211	394	79	0	473	141	0	309	450	1433
05:45 PM	0	89	191	280	0	136	104	240	445	80	0	525	110	0	209	319	1364
Total Volume	0	357	793	1150	0	480	374	854	1698	306	0	2004	548	0	982	1530	5538
% App. Total	0	31	69		0	56.2	43.8		84.7	15.3	0		35.8	0	64.2		
PHF	.000	.949	.967	.962	.000	.882	.899	.890	.937	.956	.000	.947	.873	.000	.794	.850	.966
Cars	0	354	792	1146	0	473	370	843	1677	300	0	1977	547	0	979	1526	5492
% Cars	0	99.2	99.9	99.7	0	98.5	98.9	98.7	98.8	98.0	0	98.7	99.8	0	99.7	99.7	99.2
Trucks	0	0	0	0	0	0	0	0	4	2	0	6	1	0	1	2	8
% Trucks	0	0	0	0	0	0	0	0	0.2	0.7	0	0.3	0.2	0	0.1	0.1	0.1
Buses	0	3	1	4	0	7	4	11	17	4	0	21	0	0	2	2	38
% Buses	0	0.8	0.1	0.3	0	1.5	1.1	1.3	1.0	1.3	0	1.0	0	0	0.2	0.1	0.7

Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1
Peak Hour for Entire Intersection Begins at 05:00 PM

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street: Route 2 / T Exit
City/State : Cambridge, MA
Weather : Clear

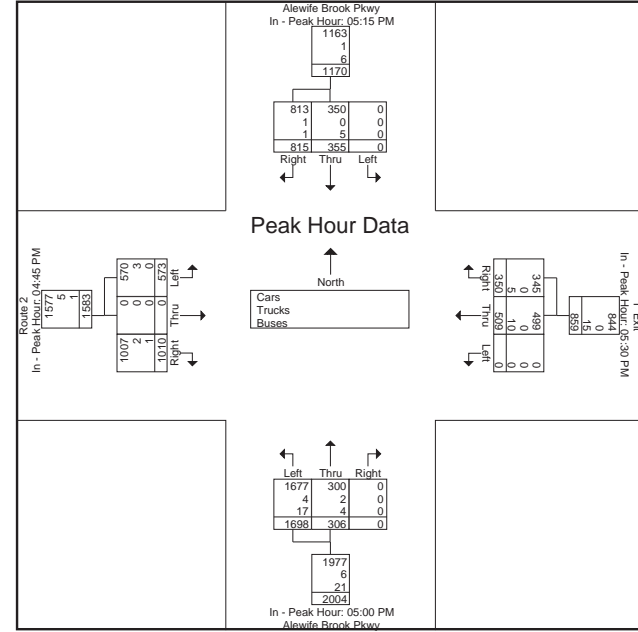
File Name : 11810001
Site Code : 11810001
Start Date : 12/6/2012
Page No : 2



Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street: Route 2 / T Exit
City/State : Cambridge, MA
Weather : Clear

File Name : 11810001
Site Code : 11810001
Start Date : 12/6/2012
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Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

Peak Hour for Each Approach Begins at:

	05:15 PM	05:30 PM	05:00 PM	04:45 PM
+0 mins.	0 88 199 287	0 122 89 211	406 71 0 477	135 0 237 372
+15 mins.	0 94 205 299	0 136 104 240	453 76 0 529	157 0 235 392
+30 mins.	0 89 191 280	0 132 70 202	394 79 0 473	140 0 229 369
+45 mins.	0 84 220 304	0 119 87 206	445 80 0 525	141 0 309 450
Total Volume	0 355 815 1170	0 509 350 859	1698 306 0 2004	573 0 1010 1583
% App. Total	0 30.3 69.7	0 59.3 40.7	84.7 15.3 0	36.2 0 63.8
PHF	.000 .944 .926 .962	.000 .936 .841 .895	.937 .956 .000 .947	.912 .000 .817 .879
Cars	0 350 813 1163	0 499 345 844	1677 300 0 1977	570 0 1007 1577
% Cars	0 98.6 99.8 99.4	0 98 98.6 98.3	98.8 98 0 98.7	99.5 0 99.7 99.6
Trucks	0 0 1 1	0 0 0 0	4 2 0 6	3 0 2 5
% Trucks	0 0 0.1 0.1	0 0 0 0	0.2 0.7 0 0.3	0.5 0 0.2 0.3
Buses	0 5 1 6	0 10 5 15	17 4 0 21	0 0 1 1
% Buses	0 1.4 0.1 0.5	0 2 1.4 1.7	1 1.3 0 1	0 0 0.1 0.1

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street: Route 2 / 'T' Exit
City/State : Cambridge, MA
Weather : Clear

File Name : 11810001
Site Code : 11810001
Start Date : 12/6/2012
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Groups Printed- Buses

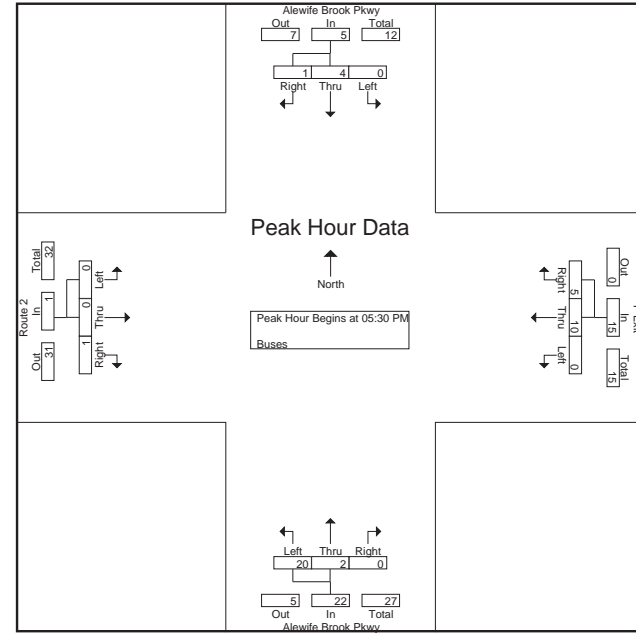
	Alewife Brook Pkwy From North			'T' Exit From East			Alewife Brook Pkwy From South			Route 2 From West			Int. Total
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	
Start Time													
04:30 PM	0	2	0	0	3	0	4	0	0	0	0	0	2
04:45 PM	0	1	0	0	3	2	1	0	0	0	0	0	0
Total	0	3	0	0	6	2	5	0	0	0	0	0	2
05:00 PM	0	1	0	0	4	1	4	1	0	0	0	0	0
05:15 PM	0	1	0	0	0	1	5	2	0	0	0	0	1
05:30 PM	0	1	0	0	1	1	5	0	0	0	0	0	0
05:45 PM	0	0	1	0	2	1	3	1	0	0	0	0	1
Total	0	3	1	0	7	4	17	4	0	0	0	0	2
06:00 PM	0	3	0	0	2	1	6	0	0	0	0	0	0
06:15 PM	0	0	0	0	5	2	6	1	0	0	0	0	0
Grand Total	0	9	1	0	20	9	34	5	0	0	0	0	4
Apprch %	0	90	10	0	69	31	87.2	12.8	0	0	0	0	100
Total %	0	11	1.2	0	24.4	11	41.5	6.1	0	0	0	0	4.9

	Alewife Brook Pkwy From North				'T' Exit From East				Alewife Brook Pkwy From South				Route 2 From West				Int. Total
	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	
Start Time																	
Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 05:30 PM																	
05:30 PM	0	1	0	1	0	1	1	2	5	0	0	5	0	0	0	0	8
05:45 PM	0	0	1	1	0	2	1	3	3	1	0	4	0	0	1	1	9
06:00 PM	0	3	0	3	0	2	1	3	6	0	0	6	0	0	0	0	12
06:15 PM	0	0	0	0	0	5	2	7	6	1	0	7	0	0	0	0	14
Total Volume	0	4	1	5	0	10	5	15	20	2	0	22	0	0	1	43	
% App. Total	0	80	20	417	0	66.7	33.3	15	90.9	9.1	0	100	0	0	100	43	
PHF	.000	.333	.250	.417	.000	.500	.625	.536	.833	.500	.000	.786	.000	.000	.250	.250	.768

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street: Route 2 / 'T' Exit
City/State : Cambridge, MA
Weather : Clear

File Name : 11810001
Site Code : 11810001
Start Date : 12/6/2012
Page No : 2



Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

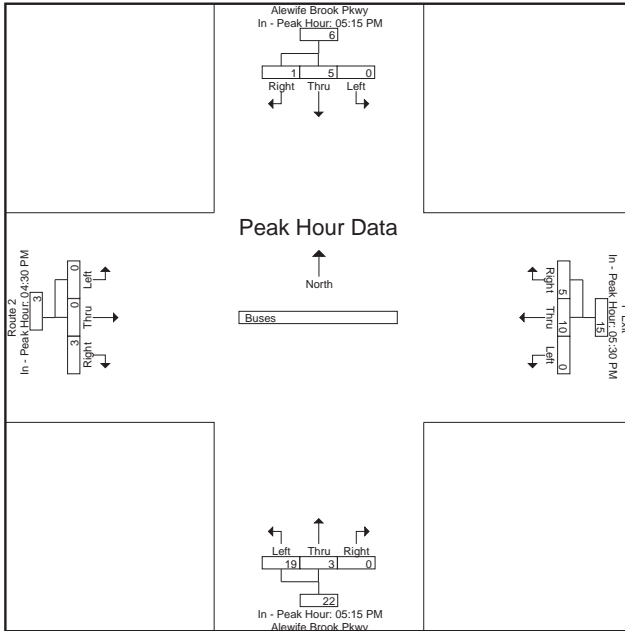
Peak Hour for Each Approach Begins at:

	05:15 PM	05:30 PM	05:45 PM	06:00 PM	06:15 PM
+0 mins.	0	1	0	1	0
+15 mins.	0	1	0	1	0
+30 mins.	0	0	1	1	0
+45 mins.	0	3	0	3	0
Total Volume	0	5	1	6	0
% App. Total	0	83.3	16.7	6	0
PHF	.000	.417	.250	.500	.000

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Route 2 / 'T' Exit
City/State : Cambridge, MA
Weather : Clear

File Name : 11810001
Site Code : 11810001
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Route 2 / 'T' Exit
City/State : Cambridge, MA
Weather : Clear

File Name : 11810001
Site Code : 11810001
Start Date : 12/6/2012
Page No : 1

Groups Printed- Cars

Start Time	Alewife Brook Pkwy From North			'T' Exit From East			Alewife Brook Pkwy From South			Route 2 From West			Int.	Total
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right		
04:30 PM	0	80	218	0	109	83	362	83	0	162	0	251	1348	
04:45 PM	0	64	186	0	119	71	407	75	0	133	0	236	1291	
Total	0	144	404	0	228	154	769	158	0	295	0	487	2639	
05:00 PM	0	85	198	0	107	101	402	70	0	157	0	234	1354	
05:15 PM	0	87	199	0	111	78	445	73	0	139	0	228	1360	
05:30 PM	0	93	205	0	121	88	389	79	0	141	0	309	1425	
05:45 PM	0	89	190	0	134	103	441	78	0	110	0	208	1353	
Total	0	354	792	0	473	370	1677	300	0	547	0	979	5492	
06:00 PM	0	81	219	0	130	69	351	79	0	142	0	244	1315	
06:15 PM	0	84	158	0	114	85	394	70	0	120	0	280	1305	
Grand Total	0	663	1573	0	945	678	3191	607	0	1104	0	1990	10751	
Apprch %	0	29.7	70.3	0	58.2	41.8	84	16	0	35.7	0	64.3		
Total %	0	6.2	14.6	0	8.8	6.3	29.7	5.6	0	10.3	0	18.5		

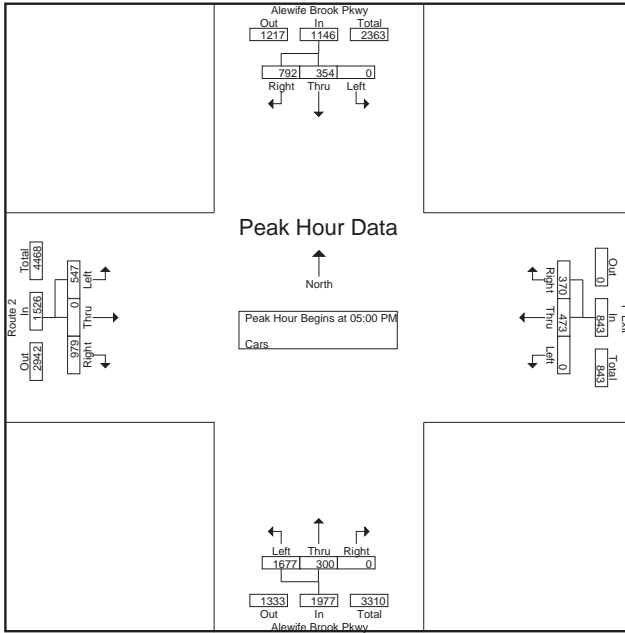
Start Time	Alewife Brook Pkwy From North				'T' Exit From East			Alewife Brook Pkwy From South				Route 2 From West				Int.	Total
	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right		
05:00 PM	0	85	198	283	0	107	101	208	402	70	0	472	157	0	234	391	1354
05:15 PM	0	87	199	286	0	111	78	189	445	73	0	518	139	0	228	367	1360
05:30 PM	0	93	205	298	0	121	88	209	389	79	0	468	141	0	309	450	1425
05:45 PM	0	89	190	279	0	134	103	237	441	78	0	519	110	0	208	318	1353
Total Volume	0	354	792	1146	0	473	370	843	1677	300	0	1977	547	0	979	1526	5492
% App. Total	0	30.9	69.1		0	56.1	43.9		84.8	15.2	0		35.8	0	64.2		
PHF	.000	.952	.966	.961	.000	.882	.898	.889	.942	.949	.000	.952	.871	.000	.792	.848	.964

Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1
Peak Hour for Entire Intersection Begins at 05:00 PM

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Route 2 / T Exit
City/State : Cambridge, MA
Weather : Clear

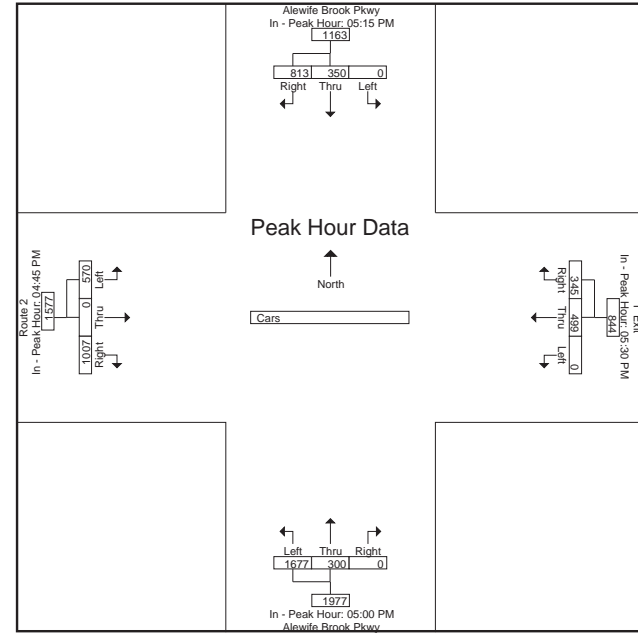
File Name : 11810001
Site Code : 11810001
Start Date : 12/6/2012
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Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Route 2 / T Exit
City/State : Cambridge, MA
Weather : Clear

File Name : 11810001
Site Code : 11810001
Start Date : 12/6/2012
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Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

Peak Hour for Each Approach Begins at:

	05:15 PM			05:30 PM			05:00 PM			04:45 PM						
+0 mins.	0	87	199	286	0	121	88	209	402	70	0	472	133	0	236	369
+15 mins.	0	93	205	298	0	134	103	237	445	73	0	518	157	0	234	391
+30 mins.	0	89	190	279	0	130	69	199	389	79	0	468	139	0	228	367
+45 mins.	0	81	219	300	0	114	85	199	441	78	0	519	141	0	309	450
Total Volume	0	350	813	1163	0	499	345	844	1677	300	0	1977	570	0	1007	1577
% App. Total	0	30.1	69.9		0	59.1	40.9		84.8	15.2	0		36.1	0	63.9	
PHF	.000	.941	.928	.969	.000	.931	.837	.890	.942	.949	.000	.952	.908	.000	.815	.876

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street: Route 2 / 'T' Exit
City/State : Cambridge, MA
Weather : Clear

File Name : 11810001
Site Code : 11810001
Start Date : 12/6/2012
Page No : 1

Groups Printed- Trucks

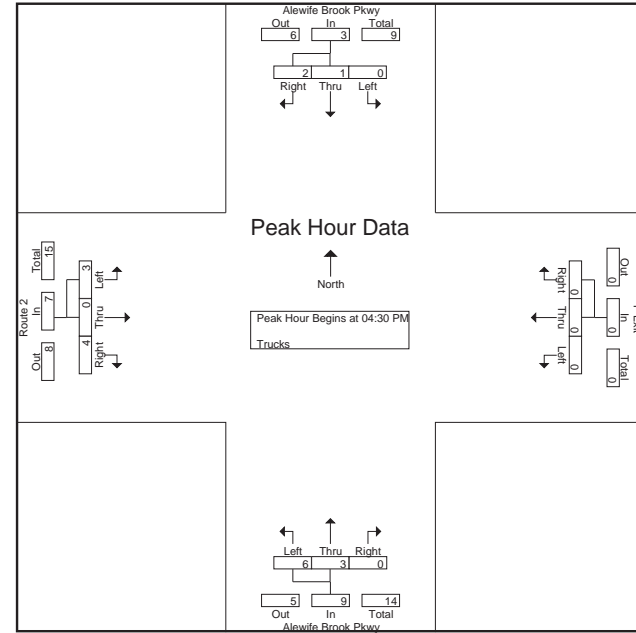
	Alewife Brook Pkwy From North			'T' Exit From East			Alewife Brook Pkwy From South			Route 2 From West			Int. Total
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	
Start Time													
04:30 PM	0	1	1	0	0	0	1	1	0	0	0	0	2
04:45 PM	0	0	1	0	0	0	2	1	0	2	0	1	7
Total	0	1	2	0	0	0	3	2	0	2	0	1	13
05:00 PM	0	0	0	0	0	0	0	0	0	0	0	1	1
05:15 PM	0	0	0	0	0	0	3	1	0	1	0	0	5
05:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
05:45 PM	0	0	0	0	0	0	1	1	0	0	0	0	2
Total	0	0	0	0	0	0	4	2	0	1	0	1	8
06:00 PM	0	0	1	0	0	0	1	0	0	1	0	0	3
06:15 PM	0	0	0	0	0	0	2	0	0	0	0	0	2
Grand Total	0	1	3	0	0	0	10	4	0	4	0	4	26
Apprch %	0	25	75	0	0	0	71.4	28.6	0	50	0	50	
Total %	0	3.8	11.5	0	0	0	38.5	15.4	0	15.4	0	15.4	

	Alewife Brook Pkwy From North				'T' Exit From East				Alewife Brook Pkwy From South				Route 2 From West				Int. Total
	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	
Start Time																	
Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 04:30 PM																	
04:30 PM	0	1	1	2	0	0	0	0	1	1	0	2	0	0	2	2	6
04:45 PM	0	0	1	1	0	0	0	0	2	1	0	3	2	0	1	3	7
05:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	1	1
05:15 PM	0	0	0	0	0	0	0	0	3	1	0	4	1	0	0	1	5
Total Volume	0	1	2	3	0	0	0	0	6	3	0	9	3	0	4	7	19
% App. Total	0	33.3	66.7		0	0	0		66.7	33.3	0		42.9	0	57.1		
PHF	.000	.250	.500	.375	.000	.000	.000	.000	.500	.750	.000	.563	.375	.000	.500	.583	.679

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street: Route 2 / 'T' Exit
City/State : Cambridge, MA
Weather : Clear

File Name : 11810001
Site Code : 11810001
Start Date : 12/6/2012
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Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

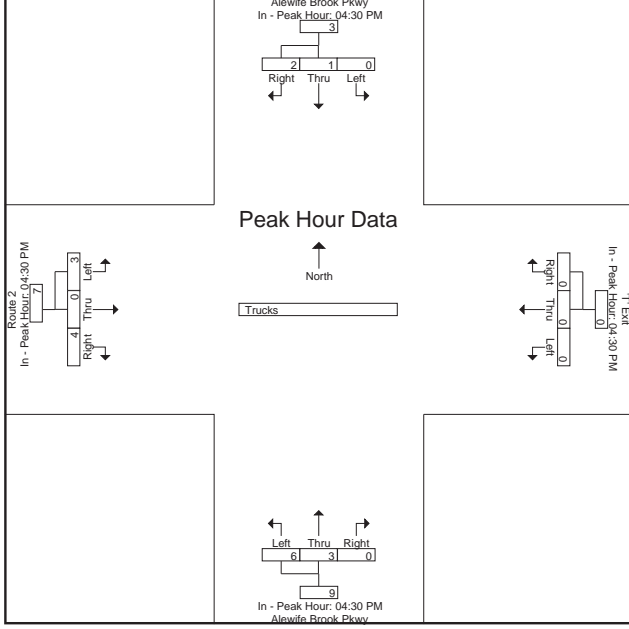
Peak Hour for Each Approach Begins at:

	04:30 PM				04:30 PM				04:30 PM				04:30 PM			
+0 mins.	0	1	1	2	0	0	0	0	1	1	0	2	0	0	2	2
+15 mins.	0	0	1	1	0	0	0	0	2	1	0	3	2	0	1	3
+30 mins.	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	1
+45 mins.	0	0	0	0	0	0	0	0	3	1	0	4	1	0	0	1
Total Volume	0	1	2	3	0	0	0	0	6	3	0	9	3	0	4	7
% App. Total	0	33.3	66.7		0	0	0		66.7	33.3	0		42.9	0	57.1	
PHF	.000	.250	.500	.375	.000	.000	.000	.000	.500	.750	.000	.563	.375	.000	.500	.583

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Route 2 / T' Exit
City/State : Cambridge, MA
Weather : Clear

File Name : 11810001
Site Code : 11810001
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Route 2 / T' Exit
City/State : Cambridge, MA
Weather : Clear

File Name : 11810001
Site Code : 11810001
Start Date : 12/6/2012
Page No : 1

Groups Printed: Peaks

Start Time	From East		From West		Int. Total
	SB	NB	SB	NB	
04:30 PM	1	0	0	1	1
04:45 PM	0	0	0	0	0
Total	1	0	0	1	1
05:00 PM	0	0	0	0	0
05:15 PM	0	0	0	0	0
05:30 PM	0	0	0	0	0
05:45 PM	0	0	0	0	0
Total	0	0	0	0	0
06:00 PM	0	0	0	0	0
06:15 PM	0	1	1	1	1
Grand Total	1	1	1	1	2
Approach %	50	50	50	50	
Total %	50	50	50	50	

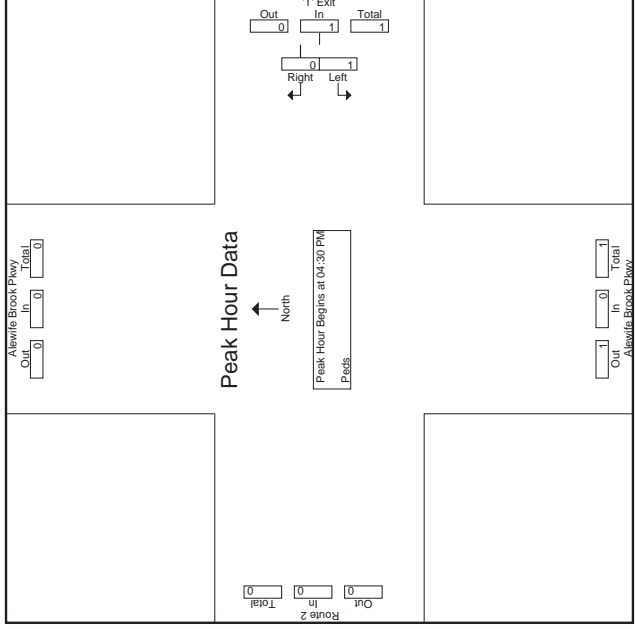
Start Time	From East		From West		Int. Total
	SB	NB	SB	NB	
04:30 PM	1	0	0	1	1
04:45 PM	0	0	0	0	0
05:00 PM	0	0	0	0	0
05:15 PM	0	0	0	0	0
Total Volume	1	0	0	1	1
% App. Total	100	0	0	250	.000
PHF	.250	.000	.000	.000	.250

Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1
Peak Hour for Entire Intersection Begins at 04:30 PM

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street: Route 2 / T Exit
City/State : Cambridge, MA
Weather : Clear

File Name : 11810001
Site Code : 11810001
Start Date : 12/6/2012
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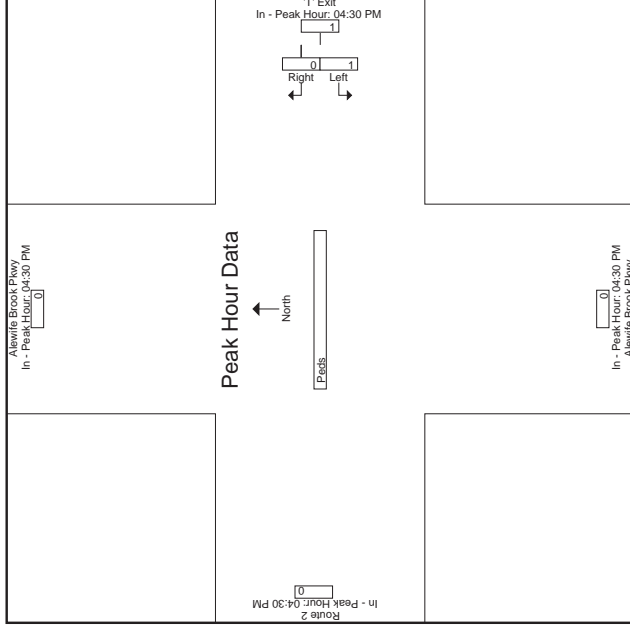
Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	04:30 PM	04:30 PM	04:30 PM	04:30 PM
-10 mins.	0	0	0	0
+15 mins.	0	0	1	0
-5 mins.	0	0	0	0
+15 mins.	0	0	0	0
Total Volume	0	1	1	0
% App. Volume	0.000	1.000	0.000	0.000
PHF	.000	.250	.250	.000
				.000

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street: Route 2 / T Exit
City/State : Cambridge, MA
Weather : Clear

File Name : 11810001
Site Code : 11810001
Start Date : 12/6/2012
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Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
Page No : 1

Groups Printed- Cars - Trucks - Buses

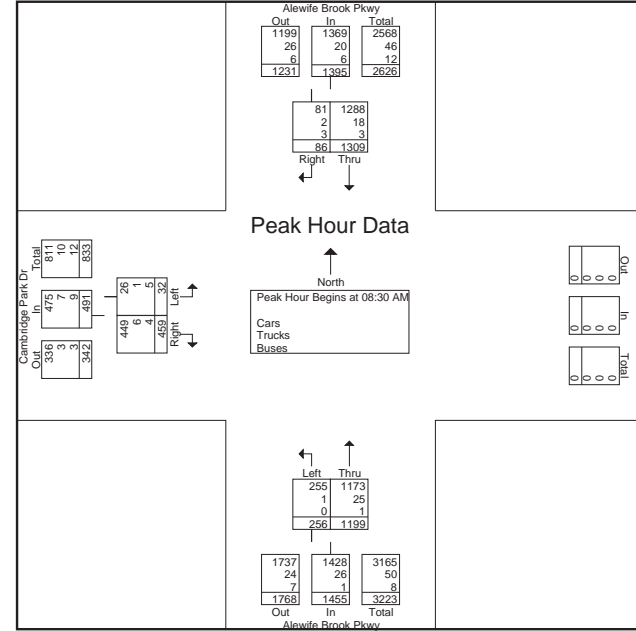
	Alewife Brook Pkwy From North		Alewife Brook Pkwy From South		Cambridge Park Dr From West		Int. Total
	Thru	Right	Left	Thru	Left	Right	
Start Time	Thru	Right	Left	Thru	Left	Right	Int. Total
07:30 AM	345	8	48	364	9	130	904
07:45 AM	287	23	57	337	7	96	807
Total	632	31	105	701	16	226	1711
08:00 AM	323	13	77	349	7	96	865
08:15 AM	238	15	61	313	8	86	721
08:30 AM	302	21	75	356	8	93	855
08:45 AM	334	29	63	274	8	108	816
Total	1197	78	276	1292	31	383	3257
09:00 AM	334	21	78	287	10	130	860
09:15 AM	339	15	40	282	6	128	810
Grand Total	2502	145	499	2562	63	867	6638
Approch %	94.5	5.5	16.3	83.7	6.8	93.2	
Total %	37.7	2.2	7.5	38.6	0.9	13.1	
Cars	2464	134	496	2514	50	850	6508
% Cars	98.5	92.4	99.4	98.1	79.4	98	
Trucks	33	3	2	44	1	10	93
% Trucks	1.3	2.1	0.4	1.7	1.6	1.2	1.4
Buses	5	8	1	4	12	7	37
% Buses	0.2	5.5	0.2	0.2	19	0.8	0.6

Start Time	Alewife Brook Pkwy From North			From East App. Total	Alewife Brook Pkwy From South			Cambridge Park Dr From West			Int. Total
	Thru	Right	App. Total		Left	Thru	App. Total	Left	Right	App. Total	
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1											
Peak Hour for Entire Intersection Begins at 08:30 AM											
08:30 AM	302	21	323	0	75	356	431	8	93	101	855
08:45 AM	334	29	363	0	63	274	337	8	108	116	816
09:00 AM	334	21	355	0	78	287	365	10	130	140	860
09:15 AM	339	15	354	0	40	282	322	6	128	134	810
Total Volume	1309	86	1395	0	256	1199	1455	32	459	491	3341
% App. Total	93.8	6.2			17.6	82.4		6.5	93.5		
PHF	.965	.741	.961	.000	.821	.842	.844	.800	.883	.877	.971
Cars	1288	81	1369	0	255	1173	1428	26	449	475	3272
% Cars	98.4	94.2	98.1	0	99.6	97.8	98.1	81.3	97.8	96.7	97.9
Trucks	18	2	20	0	1	25	26	1	6	7	53
% Trucks	1.4	2.3	1.4	0	0.4	2.1	1.8	3.1	1.3	1.4	1.6
Buses	3	3	6	0	0	1	1	5	4	9	16
% Buses	0.2	3.5	0.4	0	0	0.1	0.1	15.6	0.9	1.8	0.5

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
Page No : 2



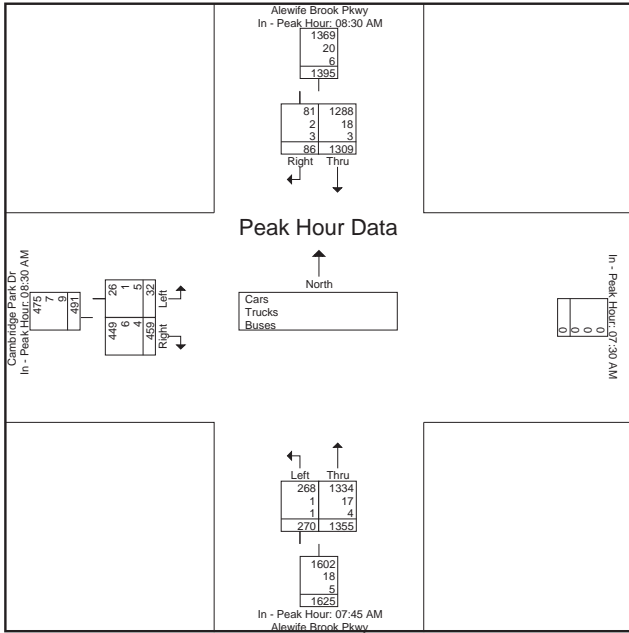
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	08:30 AM			07:30 AM	07:45 AM		08:30 AM		
+0 mins.	302	21	323	0	57	337	394	8	93
+15 mins.	334	29	363	0	77	349	426	8	108
+30 mins.	334	21	355	0	61	313	374	10	130
+45 mins.	339	15	354	0	75	356	431	6	128
Total Volume	1309	86	1395	0	270	1355	1625	32	459
% App. Total	93.8	6.2			16.6	83.4		6.5	93.5
PHF	.965	.741	.961	.000	.877	.952	.943	.800	.883
Cars	1288	81	1369	0	268	1334	1602	26	449
% Cars	98.4	94.2	98.1	0	99.3	98.5	98.6	81.2	97.8
Trucks	18	2	20	0	1	17	18	1	6
% Trucks	1.4	2.3	1.4	0	0.4	1.3	1.1	3.1	1.3
Buses	3	3	6	0	1	4	5	5	4
% Buses	0.2	3.5	0.4	0	0.4	0.3	0.3	15.6	0.9

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
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Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
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Groups Printed- Buses

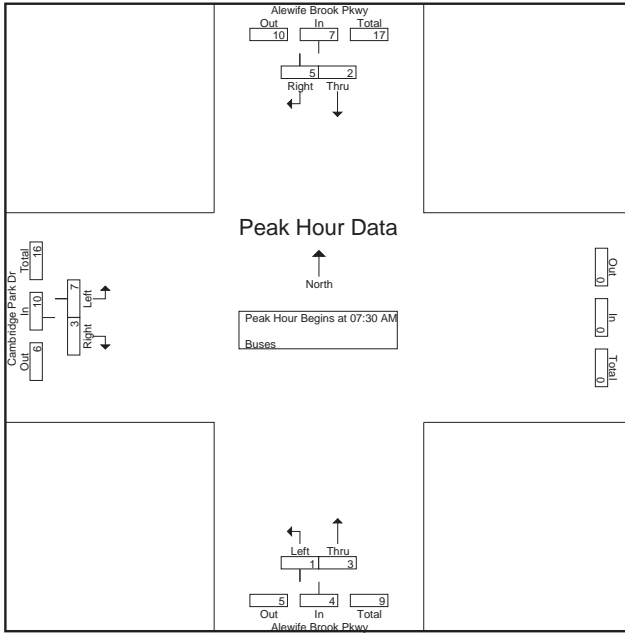
Start Time	Alewife Brook Pkwy From North		Alewife Brook Pkwy From South		Cambridge Park Dr From West		Int. Total
	Thru	Right	Left	Thru	Left	Right	
07:30 AM	0	1	0	0	5	1	7
07:45 AM	0	1	1	2	0	0	4
Total	0	2	1	2	5	1	11
08:00 AM	1	2	0	0	1	0	4
08:15 AM	1	1	0	1	1	2	6
08:30 AM	1	0	0	1	2	1	5
08:45 AM	0	2	0	0	2	2	6
Total	3	5	0	2	6	5	21
09:00 AM	1	1	0	0	1	1	4
09:15 AM	1	0	0	0	0	0	1
Grand Total	5	8	1	4	12	7	37
Approch %	38.5	61.5	20	80	63.2	36.8	
Total %	13.5	21.6	2.7	10.8	32.4	18.9	

Start Time	Alewife Brook Pkwy From North			From East	Alewife Brook Pkwy From South			Cambridge Park Dr From West			Int. Total
	Thru	Right	App. Total		App. Total	Left	Thru	App. Total	Left	Right	
07:30 AM	0	1	1	0	0	0	0	5	1	6	7
07:45 AM	0	1	1	0	1	2	3	0	0	0	4
08:00 AM	1	2	3	0	0	0	0	1	0	1	4
08:15 AM	1	1	2	0	0	1	1	1	2	3	6
Total Volume	2	5	7	0	1	3	4	7	3	10	21
% App. Total	28.6	71.4			25	75		70	30		
PHF	.500	.625	.583	.000	.250	.375	.333	.350	.375	.417	.750

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
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Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1

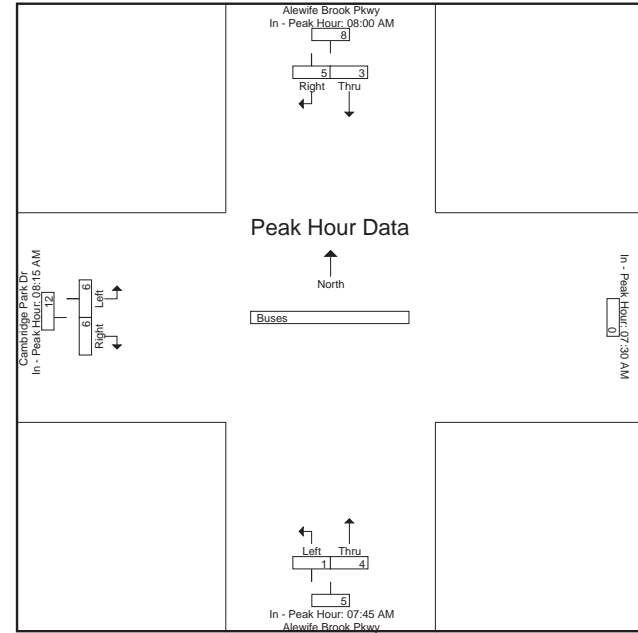
Peak Hour for Each Approach Begins at:

	08:00 AM			07:30 AM	07:45 AM			08:15 AM		
+0 mins.	1	2	3	0	1	2	3	1	2	3
+15 mins.	1	1	2	0	0	0	0	2	1	3
+30 mins.	1	0	1	0	0	1	1	2	2	4
+45 mins.	0	2	2	0	0	1	1	1	1	2
Total Volume	3	5	8	0	1	4	5	6	6	12
% App. Total	37.5	62.5			20	80		50	50	
PHF	.750	.625	.667	.000	.250	.500	.417	.750	.750	.750

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
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Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
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Groups Printed- Cars

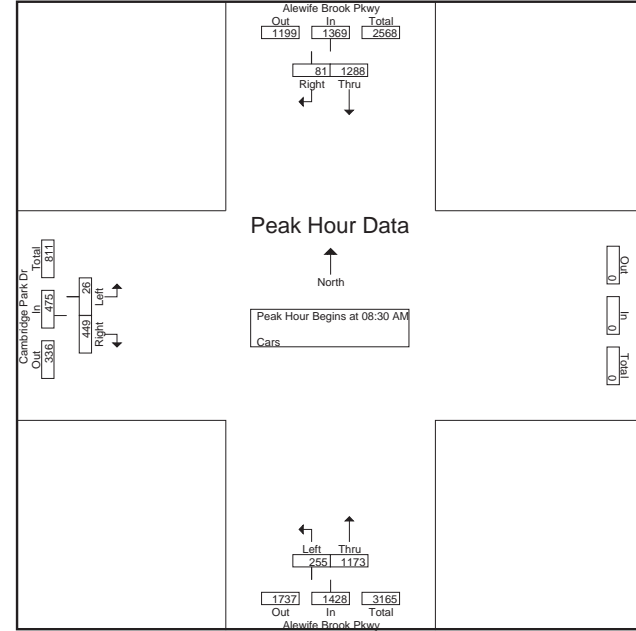
Start Time	Alewife Brook Pkwy From North		Alewife Brook Pkwy From South		Cambridge Park Dr From West		Int. Total
	Thru	Right	Left	Thru	Left	Right	
07:30 AM	342	7	48	357	4	129	887
07:45 AM	280	21	56	330	7	93	787
Total	622	28	104	687	11	222	1674
08:00 AM	317	11	77	349	6	95	855
08:15 AM	237	14	60	305	7	84	707
08:30 AM	295	21	75	350	6	91	838
08:45 AM	330	27	62	269	6	105	799
Total	1179	73	274	1273	25	375	3199
09:00 AM	328	19	78	279	8	128	840
09:15 AM	335	14	40	275	6	125	795
Grand Total	2464	134	496	2514	50	850	6508
Apprch %	94.8	5.2	16.5	83.5	5.6	94.4	
Total %	37.9	2.1	7.6	38.6	0.8	13.1	

Start Time	Alewife Brook Pkwy From North			From East	Alewife Brook Pkwy From South			Cambridge Park Dr From West			Int. Total
	Thru	Right	App. Total		Left	Thru	App. Total	Left	Right	App. Total	
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1											
Peak Hour for Entire Intersection Begins at 08:30 AM											
08:30 AM	295	21	316	0	75	350	425	6	91	97	838
08:45 AM	330	27	357	0	62	269	331	6	105	111	799
09:00 AM	328	19	347	0	78	279	357	8	128	136	840
09:15 AM	335	14	349	0	40	275	315	6	125	131	795
Total Volume	1288	81	1369	0	255	1173	1428	26	449	475	3272
% App. Total	94.1	5.9			17.9	82.1		5.5	94.5		
PHF	.961	.750	.959	.000	.817	.838	.840	.813	.877	.873	.974

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
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Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1

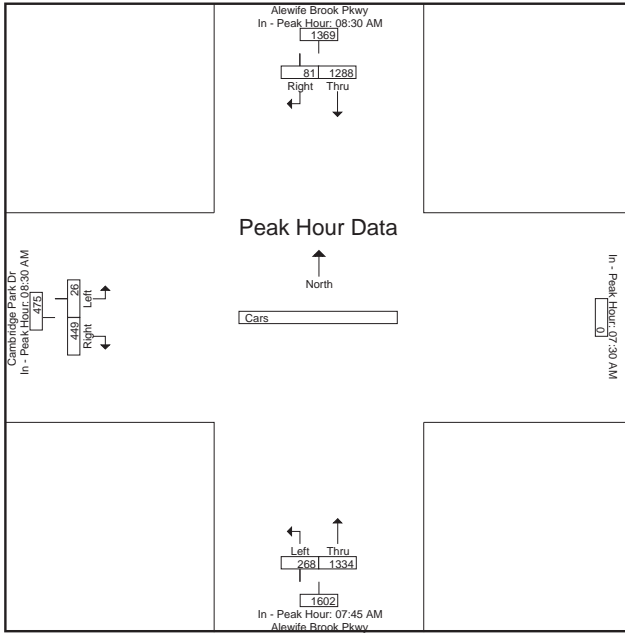
Peak Hour for Each Approach Begins at:

	08:30 AM	07:30 AM	07:45 AM	08:30 AM
+0 mins.	295	0	56	6
+15 mins.	330	0	77	6
+30 mins.	328	0	60	8
+45 mins.	335	0	75	6
Total Volume	1288	0	268	26
% App. Total	94.1	16.7	83.3	5.5
PHF	.961	.000	.870	.813

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
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Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
Page No : 1

Groups Printed- Trucks

Start Time	Alewife Brook Pkwy From North		Alewife Brook Pkwy From South		Cambridge Park Dr From West		Int. Total
	Thru	Right	Left	Thru	Left	Right	
07:30 AM	3	0	0	7	0	0	10
07:45 AM	7	1	0	5	0	3	16
Total	10	1	0	12	0	3	26
08:00 AM	5	0	0	0	0	1	6
08:15 AM	0	0	1	7	0	0	8
08:30 AM	6	0	0	5	0	1	12
08:45 AM	4	0	1	5	0	1	11
Total	15	0	2	17	0	3	37
09:00 AM	5	1	0	8	1	1	16
09:15 AM	3	1	0	7	0	3	14
Grand Total	33	3	2	44	1	10	93
Apprch %	91.7	8.3	4.3	95.7	9.1	90.9	
Total %	35.5	3.2	2.2	47.3	1.1	10.8	

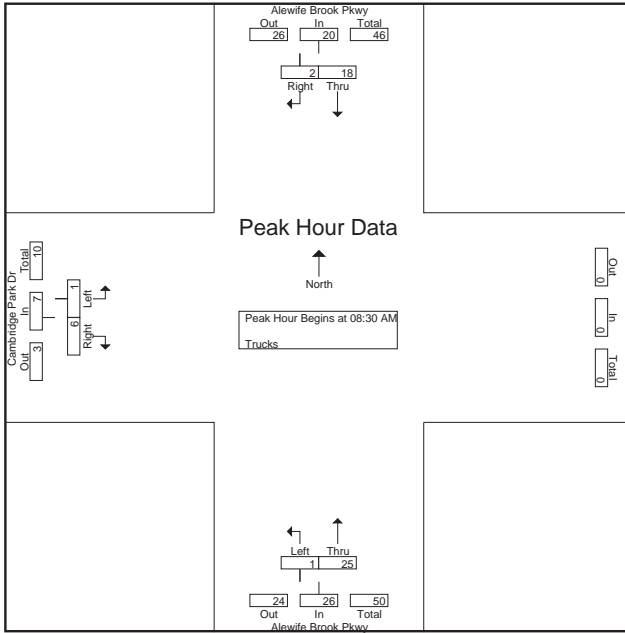
Start Time	Alewife Brook Pkwy From North			From East	Alewife Brook Pkwy From South			Cambridge Park Dr From West			Int. Total
	Thru	Right	App. Total		App. Total	Left	Thru	App. Total	Left	Right	
08:30 AM	6	0	6	0	0	5	5	0	1	1	12
08:45 AM	4	0	4	0	1	5	6	0	1	1	11
09:00 AM	5	1	6	0	0	8	8	1	1	2	16
09:15 AM	3	1	4	0	0	7	7	0	3	3	14
Total Volume	18	2	20	0	1	25	26	1	6	7	53
% App. Total	90	10			3.8	96.2		14.3	85.7		
PHF	.750	.500	.833	.000	.250	.781	.813	.250	.500	.583	.828

Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1
Peak Hour for Entire Intersection Begins at 08:30 AM

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

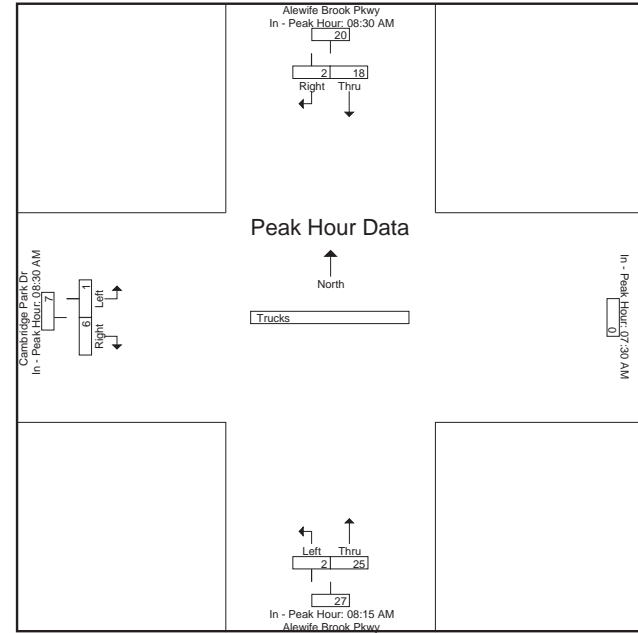
File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
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Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
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Start Date : 12/6/2012
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Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1

Peak Hour for Each Approach Begins at:

	08:30 AM			07:30 AM			08:15 AM			08:30 AM		
+0 mins.	6	0	6	0	1	7	8	0	1	1	1	
+15 mins.	4	0	4	0	0	5	5	0	1	1	1	
+30 mins.	5	1	6	0	1	5	6	1	1	1	2	
+45 mins.	3	1	4	0	0	8	8	0	3	3	3	
Total Volume	18	2	20	0	2	25	27	1	6	7	7	
% App. Total	90	10			7.4	92.6		14.3	85.7			
PHF	.750	.500	.833	.000	.500	.781	.844	.250	.500	.583		

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
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Groups Printed- Peds

Start Time	Alewife Brook Pkwy From North		From East		Alewife Brook Pkwy From South		Cambridge Park Dr From West		Int. Total
	EB	WB	SB	NB	WB	EB	NB	SB	
07:30 AM	0	0	0	4	0	0	0	0	4
07:45 AM	0	0	4	3	0	0	0	0	7
Total	0	0	4	7	0	0	0	0	11
08:00 AM	0	0	5	5	0	0	0	0	10
08:15 AM	0	0	7	3	0	0	0	0	10
08:30 AM	0	0	4	3	0	0	0	0	7
08:45 AM	0	1	2	8	0	1	0	0	12
Total	0	1	18	19	0	1	0	0	39
09:00 AM	0	0	5	1	0	0	0	0	6
09:15 AM	0	0	3	2	0	0	0	0	5
Grand Total	0	1	30	29	0	1	0	0	61
Apprch %	0	100	50.8	49.2	0	100	0	0	
Total %	0	1.6	49.2	47.5	0	1.6	0	0	

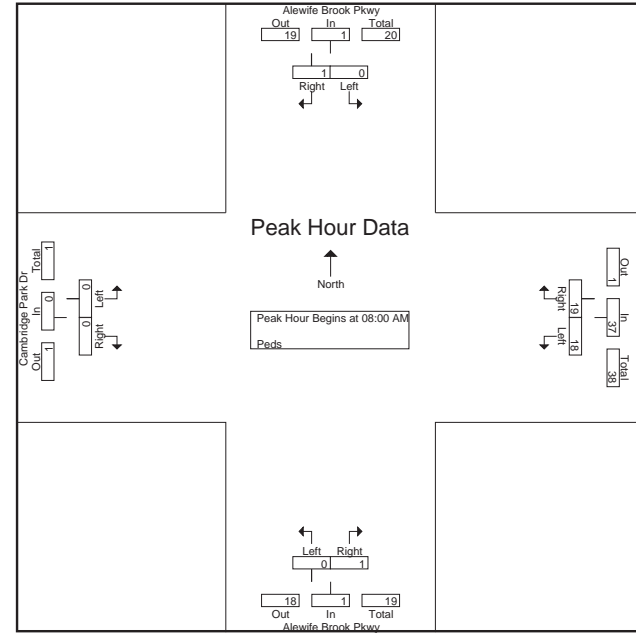
Start Time	Alewife Brook Pkwy From North			From East			Alewife Brook Pkwy From South			Cambridge Park Dr From West			Int. Total
	EB	WB	App. Total	SB	NB	App. Total	WB	EB	App. Total	NB	SB	App. Total	
08:00 AM	0	0	0	5	5	10	0	0	0	0	0	0	10
08:15 AM	0	0	0	7	3	10	0	0	0	0	0	0	10
08:30 AM	0	0	0	4	3	7	0	0	0	0	0	0	7
08:45 AM	0	1	1	2	8	10	0	1	1	0	0	0	12
Total Volume	0	1	1	18	19	37	0	1	1	0	0	0	39
% App. Total	0	100		48.6	51.4		0	100		0	0		
PHF	.000	.250	.250	.643	.594	.925	.000	.250	.250	.000	.000	.000	.813

Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1
Peak Hour for Entire Intersection Begins at 08:00 AM

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
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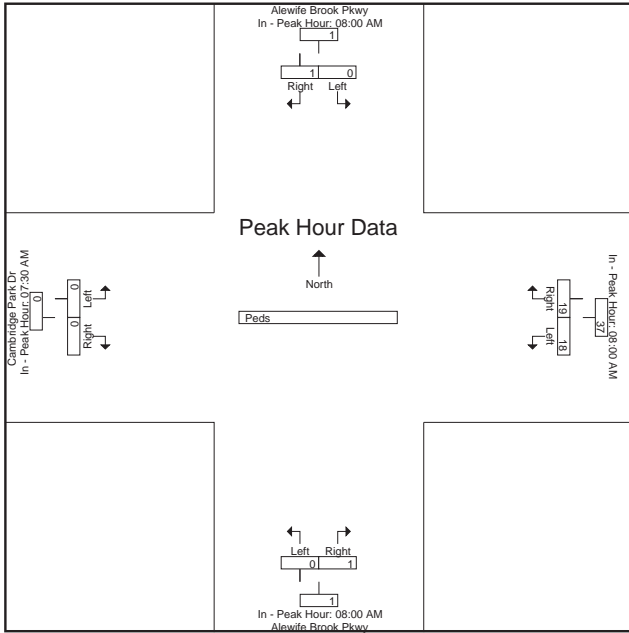
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	08:00 AM			08:00 AM			08:00 AM			07:30 AM		
+0 mins.	0	0	0	5	5	10	0	0	0	0	0	0
+15 mins.	0	0	0	7	3	10	0	0	0	0	0	0
+30 mins.	0	0	0	4	3	7	0	0	0	0	0	0
+45 mins.	0	1	1	2	8	10	0	1	1	0	0	0
Total Volume	0	1	1	18	19	37	0	1	1	0	0	0
% App. Total	0	100		48.6	51.4		0	100		0	0	
PHF	.000	.250	.250	.643	.594	.925	.000	.250	.250	.000	.000	.000

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
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Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
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Groups Printed- Bikes Street

Start Time	Alewife Brook Pkwy From North		Alewife Brook Pkwy From South		Cambridge Park Dr From West		Int. Total
	Thru	Right	Left	Thru	Left	Right	
07:30 AM	0	0	0	0	0	0	0
07:45 AM	0	0	0	0	0	0	0
Total	0	0	0	0	0	0	0
08:00 AM	0	0	0	0	0	0	0
08:15 AM	0	0	1	0	1	0	2
08:30 AM	0	0	0	0	0	1	1
08:45 AM	0	0	1	0	0	0	1
Total	0	0	2	0	1	1	4
09:00 AM	0	0	0	0	0	1	1
09:15 AM	0	0	0	0	1	0	1
Grand Total	0	0	2	0	2	2	6
Approch %	0	0	100	0	50	50	
Total %	0	0	33.3	0	33.3	33.3	

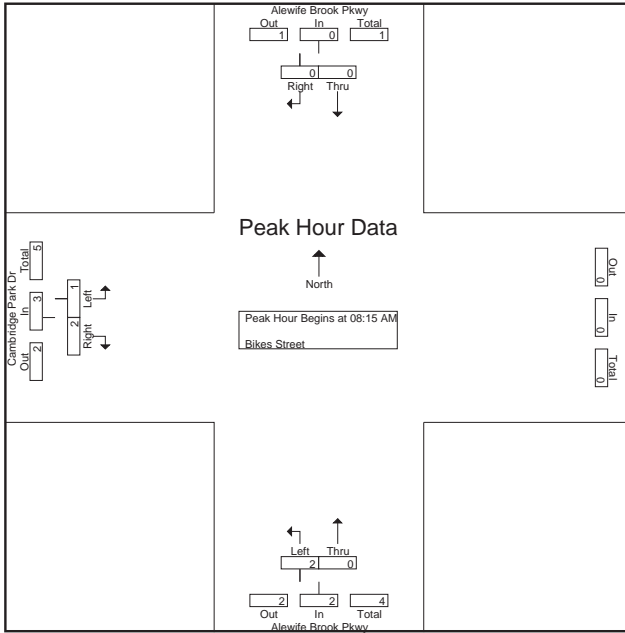
Start Time	Alewife Brook Pkwy From North			From East	Alewife Brook Pkwy From South			Cambridge Park Dr From West			Int. Total
	Thru	Right	App. Total		App. Total	Left	Thru	App. Total	Left	Right	
08:15 AM	0	0	0	0	1	0	1	1	0	1	2
08:30 AM	0	0	0	0	0	0	0	0	1	1	1
08:45 AM	0	0	0	0	1	0	1	0	0	0	1
09:00 AM	0	0	0	0	0	0	0	0	1	1	1
Total Volume	0	0	0	0	2	0	2	1	2	3	5
% App. Total	0	0			100	0		33.3	66.7		
PHF	.000	.000	.000	.000	.500	.000	.500	.250	.500	.750	.625

Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1
Peak Hour for Entire Intersection Begins at 08:15 AM

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
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Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1

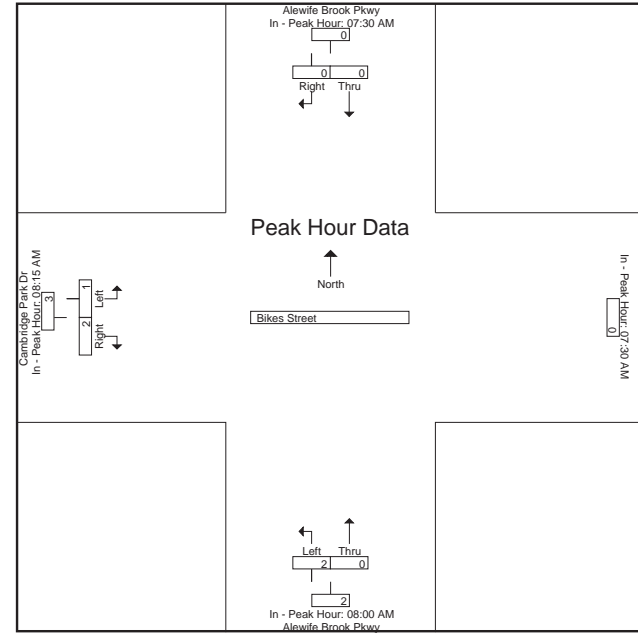
Peak Hour for Each Approach Begins at:

	07:30 AM			08:00 AM			08:15 AM		
+0 mins.	0	0	0	0	0	0	1	0	1
+15 mins.	0	0	0	0	1	0	1	0	1
+30 mins.	0	0	0	0	0	0	0	0	0
+45 mins.	0	0	0	0	1	0	1	0	1
Total Volume	0	0	0	0	2	0	2	1	3
% App. Total	0	0	0	0	100	0	33.3	66.7	
PHF	.000	.000	.000	.000	.500	.000	.500	.250	.750

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
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Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
Page No : 1

Groups Printed- Bikes SW

Start Time	Alewife Brook Pkwy From North		Alewife Brook Pkwy From South		Cambridge Park Dr From West		Int. Total
	Thru	Right	Left	Thru	Left	Right	
07:30 AM	0	0	0	0	0	0	0
07:45 AM	0	0	0	0	0	0	0
Total	0	0	0	0	0	0	0
08:00 AM	0	0	0	0	0	0	0
08:15 AM	0	0	0	0	0	0	0
08:30 AM	0	0	0	0	0	0	0
08:45 AM	0	0	1	0	0	1	2
Total	0	0	1	0	0	1	2
09:00 AM	0	0	0	0	0	0	0
09:15 AM	0	0	0	0	0	1	1
Grand Total	0	0	1	0	0	2	3
Approch %	0	0	100	0	0	100	
Total %	0	0	33.3	0	0	66.7	

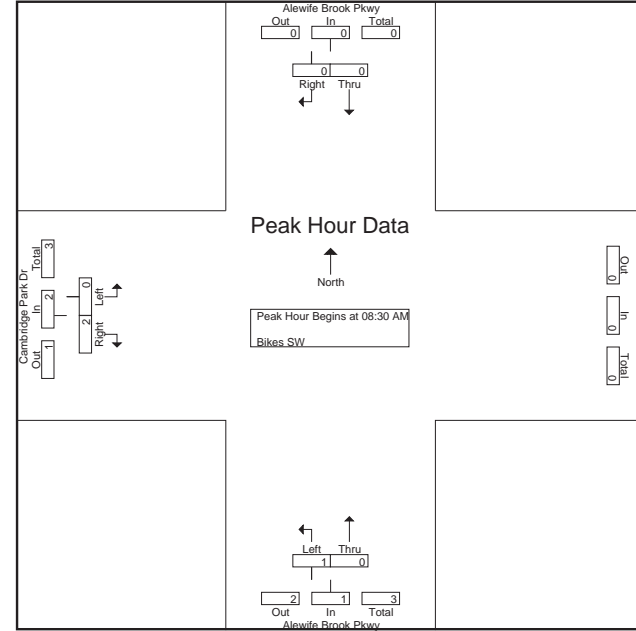
Start Time	Alewife Brook Pkwy From North			From East	Alewife Brook Pkwy From South			Cambridge Park Dr From West			Int. Total
	Thru	Right	App. Total		Left	Thru	App. Total	Left	Right	App. Total	
07:30 AM	0	0	0	0	0	0	0	0	0	0	0
07:45 AM	0	0	0	0	1	1	0	1	1	1	2
08:00 AM	0	0	0	0	0	0	0	0	0	0	0
08:15 AM	0	0	0	0	0	0	0	0	0	0	0
08:30 AM	0	0	0	0	0	0	0	0	1	1	1
08:45 AM	0	0	0	0	1	1	0	2	2	2	3
Total Volume	0	0	0	0	1	1	0	2	2	2	3
% App. Total	0	0	0	0	100	0	0	100	0	500	.375
PHF	.000	.000	.000	.000	.250	.000	.250	.000	.500	.500	.375

Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1
Peak Hour for Entire Intersection Begins at 08:30 AM

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
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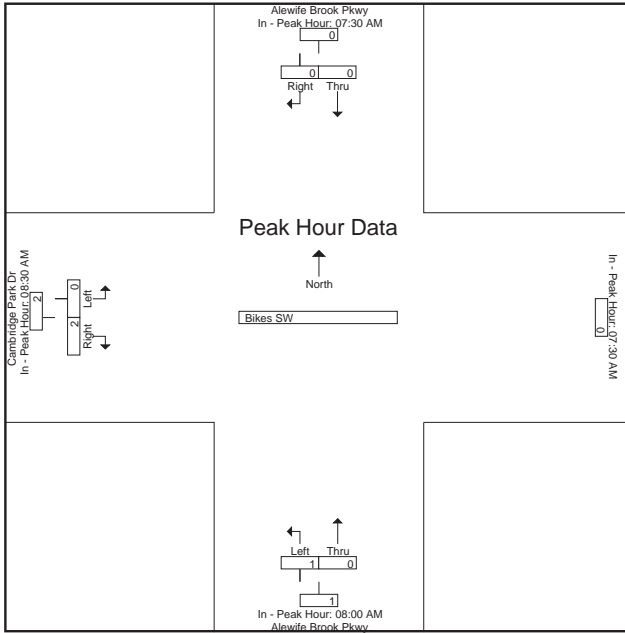
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	07:30 AM	07:30 AM	08:00 AM	08:30 AM
+0 mins.	0	0	0	0
+15 mins.	0	0	0	1
+30 mins.	0	0	0	0
+45 mins.	0	0	1	1
Total Volume	0	0	1	2
% App. Total	0	0	100	100
PHF	.000	.000	.250	.500

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
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Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
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Groups Printed- Cars - Trucks - Buses

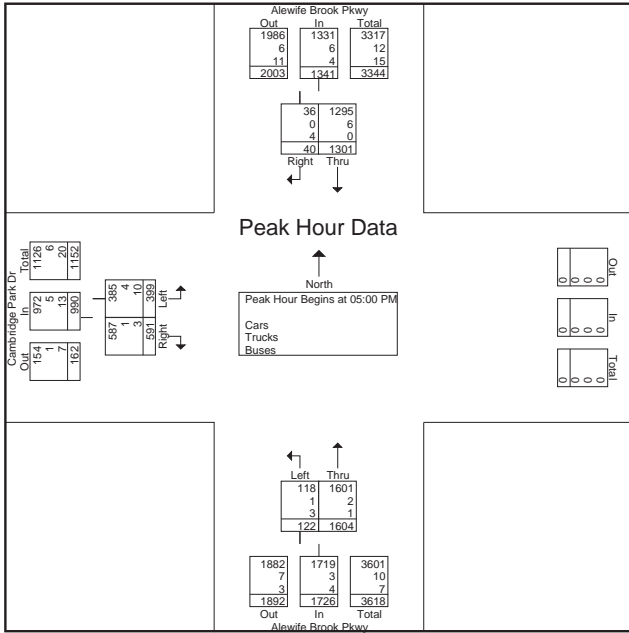
Start Time	Alewife Brook Pkwy From North		Alewife Brook Pkwy From South		Cambridge Park Dr From West		Int. Total
	Thru	Right	Left	Thru	Left	Right	
04:30 PM	315	6	24	371	65	102	883
04:45 PM	296	16	25	400	77	94	908
Total	611	22	49	771	142	196	1791
05:00 PM	315	11	33	448	96	164	1067
05:15 PM	292	9	24	359	108	168	960
05:30 PM	389	11	36	442	92	147	1117
05:45 PM	305	9	29	355	103	112	913
Total	1301	40	122	1604	399	591	4057
06:00 PM	305	11	32	358	101	178	985
06:15 PM	347	9	31	348	86	170	991
Grand Total	2564	82	234	3081	728	1135	7824
Approch %	96.9	3.1	7.1	92.9	39.1	60.9	91.3
Total %	32.8	1	3	39.4	9.3	14.5	40.57
Cars	2557	77	229	3076	706	1129	7774
% Cars	99.7	93.9	97.9	99.8	97	99.5	99.4
Trucks	6	0	1	4	4	1	16
% Trucks	0.2	0	0.4	0.1	0.5	0.1	0.2
Buses	1	5	4	1	18	5	34
% Buses	0	6.1	1.7	0	2.5	0.4	0.4

Start Time	Alewife Brook Pkwy From North			From East	Alewife Brook Pkwy From South			Cambridge Park Dr From West			Int. Total
	Thru	Right	App. Total		App. Total	Left	Thru	App. Total	Left	Right	
04:30 PM to 06:15 PM - Peak 1 of 1	315	11	326	0	33	448	481	96	164	260	1067
05:00 PM	315	11	326	0	33	448	481	96	164	260	1067
05:15 PM	292	9	301	0	24	359	383	108	168	276	960
05:30 PM	389	11	400	0	36	442	478	92	147	239	1117
05:45 PM	305	9	314	0	29	355	384	103	112	215	913
Total Volume	1301	40	1341	0	122	1604	1726	399	591	990	4057
% App. Total	97	3	100	0	7.1	92.9	99.8	40.3	59.7	99.5	99.4
PHF	.836	.909	.838	.000	.847	.895	.897	.924	.879	.897	.908
Cars	1295	36	1331	0	118	1601	1719	385	587	972	4022
% Cars	99.5	90.0	99.3	0	96.7	99.8	99.6	96.5	99.3	98.2	99.1
Trucks	6	0	6	0	1	2	3	4	1	5	14
% Trucks	0.5	0	0.4	0	0.8	0.1	0.2	1.0	0.2	0.5	0.3
Buses	0	4	4	0	3	1	4	10	3	13	21
% Buses	0	10.0	0.3	0	2.5	0.1	0.2	2.5	0.5	1.3	0.5

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

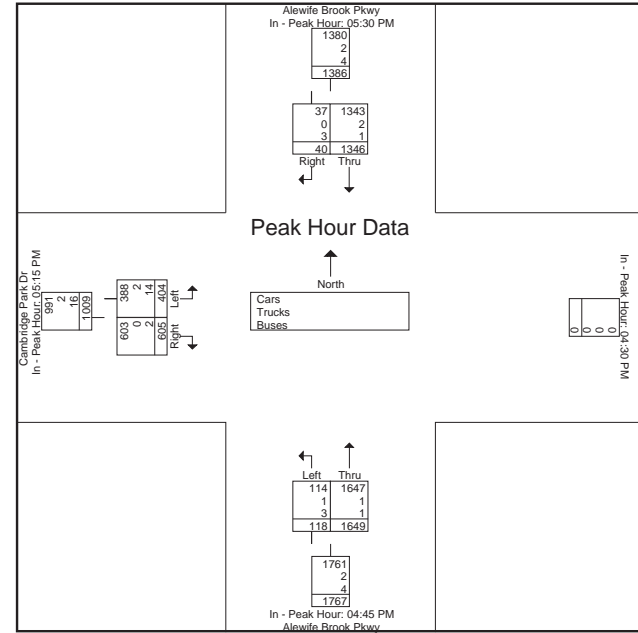
File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
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Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
Page No : 3



Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

Peak Hour for Each Approach Begins at:

	05:30 PM	04:30 PM	04:45 PM	05:15 PM
+0 mins.	389	11	400	0
+15 mins.	305	9	314	0
+30 mins.	305	11	316	0
+45 mins.	347	9	356	0
Total Volume	1346	40	1386	118
% App. Total	97.1	2.9	93.3	6.7
PHF	.865	.909	.866	.000
Cars	1343	37	1380	0
% Cars	99.8	92.5	99.6	0
Trucks	2	0	2	0
% Trucks	0.1	0	0.1	0
Buses	1	3	4	0
% Buses	0.1	7.5	0.3	0

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
Page No : 1

Groups Printed- Buses

Start Time	Alewife Brook Pkwy From North		Alewife Brook Pkwy From South		Cambridge Park Dr From West		Int. Total
	Thru	Right	Left	Thru	Left	Right	
04:30 PM	0	0	0	0	0	0	0
04:45 PM	0	0	0	0	0	0	0
Total	0	0	0	0	0	0	0
05:00 PM	0	1	1	1	2	1	6
05:15 PM	0	1	2	0	2	1	6
05:30 PM	0	1	0	0	3	0	4
05:45 PM	0	1	0	0	3	1	5
Total	0	4	3	1	10	3	21
06:00 PM	1	1	1	0	6	0	9
06:15 PM	0	0	0	0	2	2	4
Grand Total	1	5	4	1	18	5	34
Apprch %	16.7	83.3	80	20	78.3	21.7	
Total %	2.9	14.7	11.8	2.9	52.9	14.7	

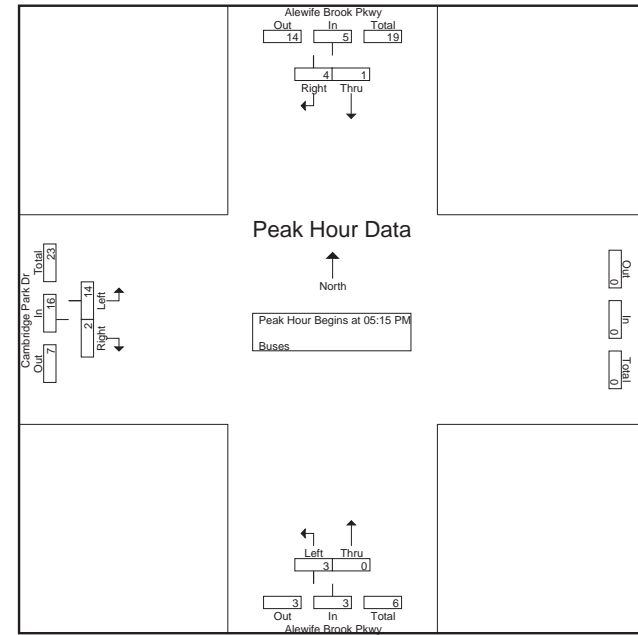
Start Time	Alewife Brook Pkwy From North			From East	Alewife Brook Pkwy From South			Cambridge Park Dr From West			Int. Total
	Thru	Right	App. Total		Left	Thru	App. Total	Left	Right	App. Total	
04:30 PM	0	0	0	0	0	0	0	0	0	0	0
04:45 PM	0	0	0	0	0	0	0	0	0	0	0
05:00 PM	0	1	1	0	2	2	2	1	3	6	6
05:15 PM	0	1	1	0	0	0	0	3	0	3	4
05:30 PM	0	1	1	0	0	0	0	3	1	4	4
05:45 PM	0	1	1	0	1	1	6	0	6	9	5
06:00 PM	1	1	2	0	3	3	14	2	16	24	9
Total Volume	1	4	5	0	3	3	14	2	16	24	
% App. Total	20	80	.625	.000	100	.000	87.5	12.5	.667		
PHF	.250	1.000	.625	.000	.375	.000	.375	.500	.667		

Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1
Peak Hour for Entire Intersection Begins at 05:15 PM

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
Page No : 2



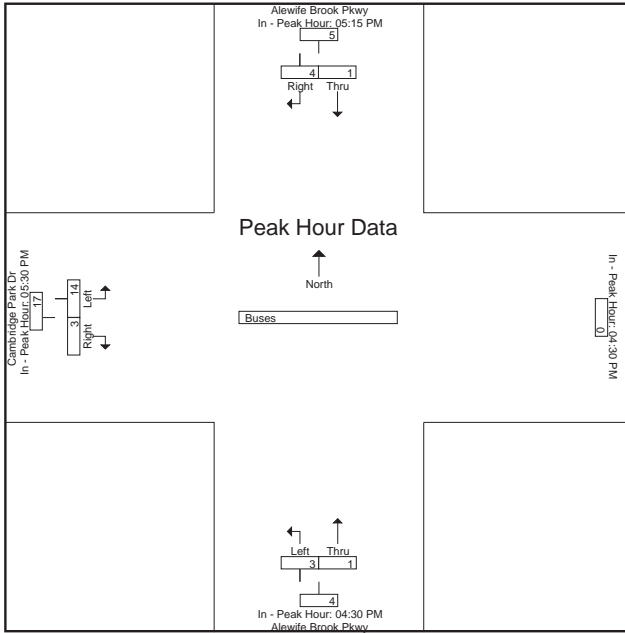
Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	05:15 PM	04:30 PM	04:30 PM	05:30 PM
+0 mins.	0	1	1	0
+15 mins.	0	1	1	0
+30 mins.	0	1	1	0
+45 mins.	1	1	2	2
Total Volume	1	4	5	0
% App. Total	20	80	.625	.000
PHF	.250	1.000	.625	.000

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
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Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
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Groups Printed- Cars

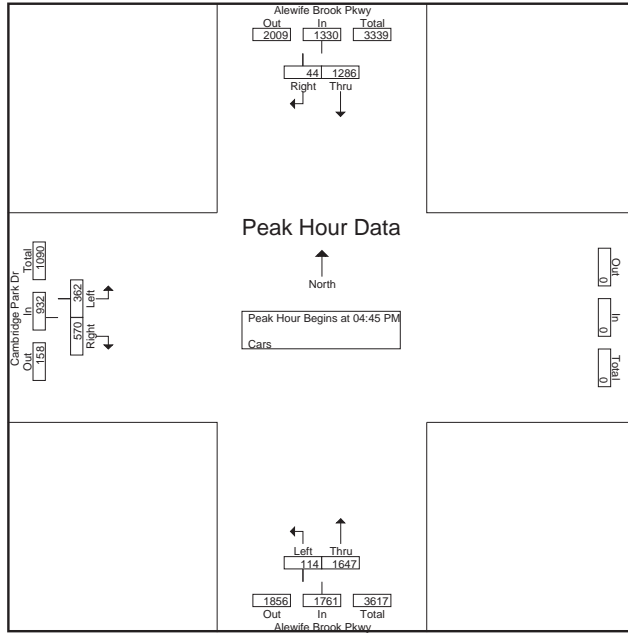
Start Time	Alewife Brook Pkwy From North		Alewife Brook Pkwy From South		Cambridge Park Dr From West		Int. Total
	Thru	Right	Left	Thru	Left	Right	
04:30 PM	315	6	24	371	65	102	883
04:45 PM	296	16	25	400	77	94	908
Total	611	22	49	771	142	196	1791
05:00 PM	312	10	32	447	92	162	1055
05:15 PM	291	8	21	358	106	167	951
05:30 PM	387	10	36	442	87	147	1109
05:45 PM	305	8	29	354	100	111	907
Total	1295	36	118	1601	385	587	4022
06:00 PM	304	10	31	358	95	178	976
06:15 PM	347	9	31	346	84	168	985
Grand Total	2557	77	229	3076	706	1129	7774
Approch %	97.1	2.9	6.9	93.1	38.5	61.5	
Total %	32.9	1	2.9	39.6	9.1	14.5	

Start Time	Alewife Brook Pkwy From North			From East	Alewife Brook Pkwy From South			Cambridge Park Dr From West			Int. Total
	Thru	Right	App. Total		Left	Thru	App. Total	Left	Right	App. Total	
04:45 PM	296	16	312	0	25	400	425	77	94	171	908
05:00 PM	312	10	322	0	32	447	479	92	162	254	1055
05:15 PM	291	8	299	0	21	358	379	106	167	273	951
05:30 PM	387	10	397	0	36	442	478	87	147	234	1109
Total Volume	1286	44	1330	0	114	1647	1761	362	570	932	4023
% App. Total	96.7	3.3	100.0	0.0	6.5	93.5	100.0	38.8	61.2	100.0	100.0
PHF	.831	.688	.838	.000	.792	.921	.919	.854	.853	.853	.907

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
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Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

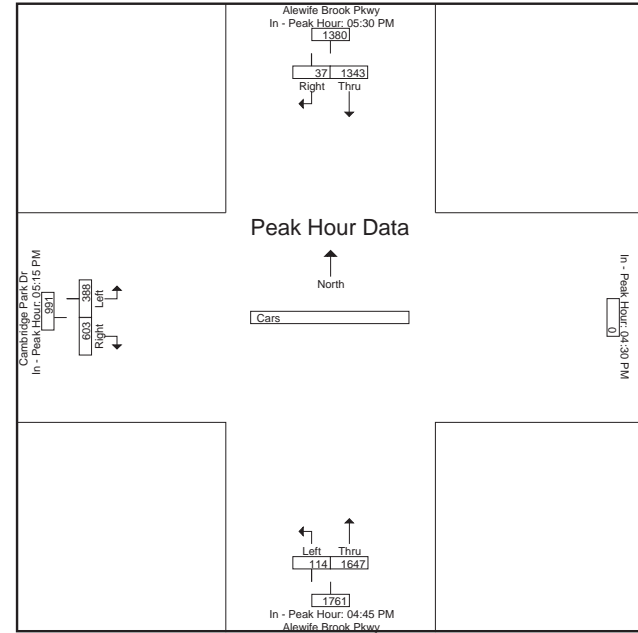
Peak Hour for Each Approach Begins at:

	05:30 PM		04:30 PM	04:45 PM		05:15 PM		
+0 mins.	387	10	397	0	25	400	425	106
+15 mins.	305	8	313	0	32	447	479	87
+30 mins.	304	10	314	0	21	358	379	100
+45 mins.	347	9	356	0	36	442	478	95
Total Volume	1343	37	1380	0	114	1647	1761	388
% App. Total	97.3	2.7		0	6.5	93.5		39.2
PHF	.868	.925	.869	.000	.792	.921	.919	.915
								.847
								.908

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
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Peak Hour Data

Cars

In - Peak Hour: 04:45 PM

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
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Groups Printed- Trucks

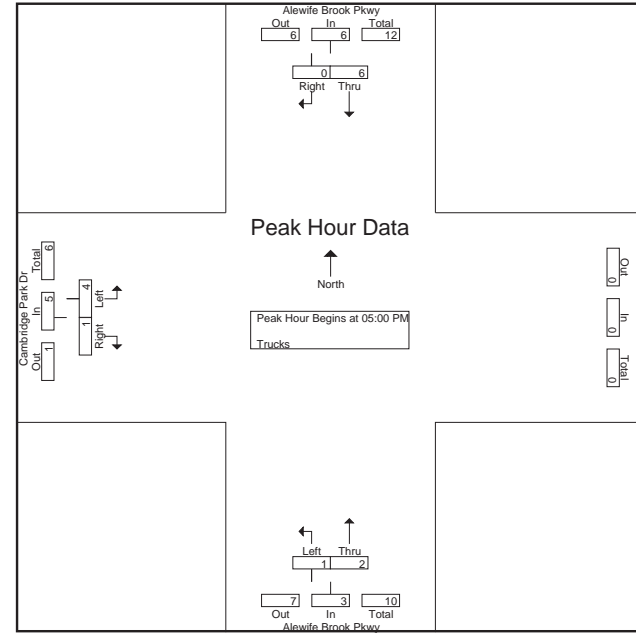
Start Time	Alewife Brook Pkwy From North		Alewife Brook Pkwy From South		Cambridge Park Dr From West		Int. Total
	Thru	Right	Left	Thru	Left	Right	
04:30 PM	0	0	0	0	0	0	0
04:45 PM	0	0	0	0	0	0	0
Total	0	0	0	0	0	0	0
05:00 PM	3	0	0	0	2	1	6
05:15 PM	1	0	1	1	0	0	3
05:30 PM	2	0	0	0	2	0	4
05:45 PM	0	0	0	1	0	0	1
Total	6	0	1	2	4	1	14
06:00 PM	0	0	0	0	0	0	0
06:15 PM	0	0	0	2	0	0	2
Grand Total	6	0	1	4	4	1	16
Apprch %	100	0	20	80	80	20	
Total %	37.5	0	6.2	25	25	6.2	

Start Time	Alewife Brook Pkwy From North			From East	Alewife Brook Pkwy From South			Cambridge Park Dr From West			Int. Total
	Thru	Right	App. Total		Left	Thru	App. Total	Left	Right	App. Total	
Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1											
Peak Hour for Entire Intersection Begins at 05:00 PM											
05:00 PM	3	0	3	0	0	0	0	2	1	3	6
05:15 PM	1	0	1	0	1	1	2	0	0	0	3
05:30 PM	2	0	2	0	0	0	0	2	0	2	4
05:45 PM	0	0	0	0	0	1	1	0	0	0	1
Total Volume	6	0	6	0	1	2	3	4	1	5	14
% App. Total	100	0			33.3	66.7		80	20		
PHF	.500	.000	.500	.000	.250	.500	.375	.500	.250	.417	.583

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
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Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

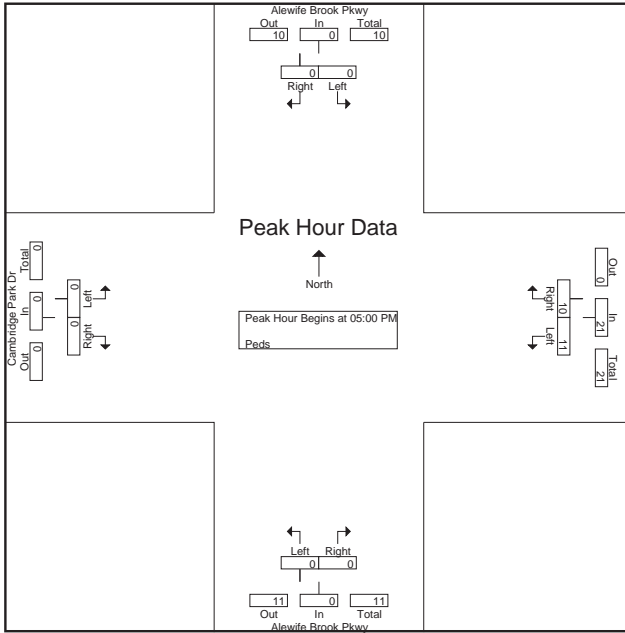
Peak Hour for Each Approach Begins at:

	04:45 PM			04:30 PM			05:00 PM			04:45 PM		
+0 mins.	0	0	0	0	0	0	0	0	0	0	0	
+15 mins.	3	0	3	0	0	1	1	2	2	1	3	
+30 mins.	1	0	1	0	0	0	0	0	0	0	0	
+45 mins.	2	0	2	0	0	0	1	1	2	0	2	
Total Volume	6	0	6	0	0	1	2	3	4	1	5	
% App. Total	100	0				33.3	66.7		80	20		
PHF	.500	.000	.500	.000	.000	.250	.500	.375	.500	.250	.417	

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
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Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

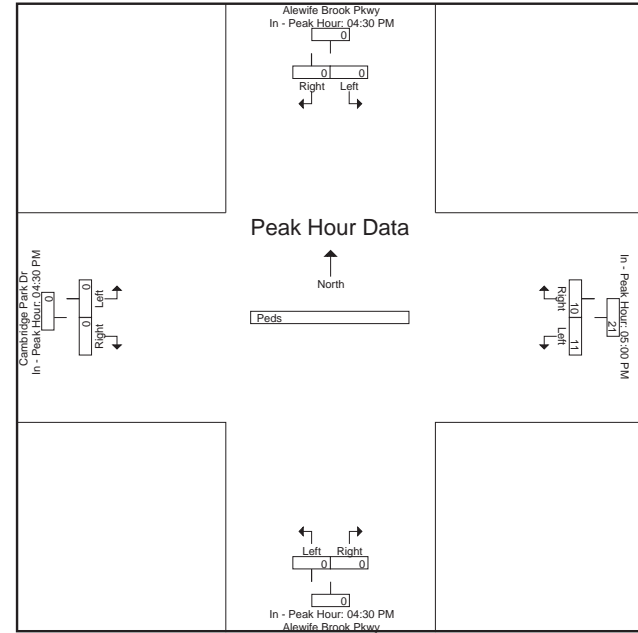
Peak Hour for Each Approach Begins at:

	04:30 PM			05:00 PM			04:30 PM			04:30 PM		
+0 mins.	0	0	0	1	2	3	0	0	0	0	0	0
+15 mins.	0	0	0	1	3	4	0	0	0	0	0	0
+30 mins.	0	0	0	4	4	8	0	0	0	0	0	0
+45 mins.	0	0	0	5	1	6	0	0	0	0	0	0
Total Volume	0	0	0	11	10	21	0	0	0	0	0	0
% App. Total	0	0	0	52.4	47.6		0	0	0	0	0	0
PHF	.000	.000	.000	.550	.625	.656	.000	.000	.000	.000	.000	.000

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
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Page No : 3



Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
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Groups Printed- Bikes Street

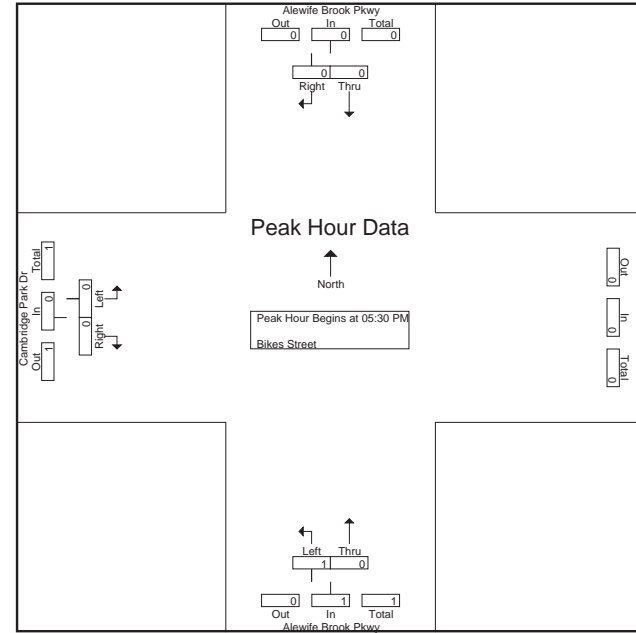
Start Time	Alewife Brook Pkwy From North		Alewife Brook Pkwy From South		Cambridge Park Dr From West		Int. Total
	Thru	Right	Left	Thru	Left	Right	
04:30 PM	0	0	0	0	0	0	0
04:45 PM	0	0	0	0	0	0	0
Total	0	0	0	0	0	0	0
05:00 PM	0	0	0	0	0	0	0
05:15 PM	0	0	0	0	0	0	0
05:30 PM	0	0	0	0	0	0	0
05:45 PM	0	0	0	0	0	0	0
Total	0	0	0	0	0	0	0
06:00 PM	0	0	0	0	0	0	0
06:15 PM	0	0	1	0	0	0	1
Grand Total	0	0	1	0	0	0	1
Apprch %	0	0	100	0	0	0	
Total %	0	0	100	0	0	0	

Start Time	Alewife Brook Pkwy From North			From East	Alewife Brook Pkwy From South			Cambridge Park Dr From West			Int. Total
	Thru	Right	App. Total	App. Total	Left	Thru	App. Total	Left	Right	App. Total	
Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1											
Peak Hour for Entire Intersection Begins at 05:30 PM											
05:30 PM	0	0	0	0	0	0	0	0	0	0	0
05:45 PM	0	0	0	0	0	0	0	0	0	0	0
06:00 PM	0	0	0	0	0	0	0	0	0	0	0
06:15 PM	0	0	0	0	1	0	1	0	0	0	1
Total Volume	0	0	0	0	1	0	1	0	0	0	1
% App. Total	0	0	0	0	100	0	250	0	0	0	250
PHF	.000	.000	.000	.000	.250	.000	.250	.000	.000	.000	.250

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
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Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

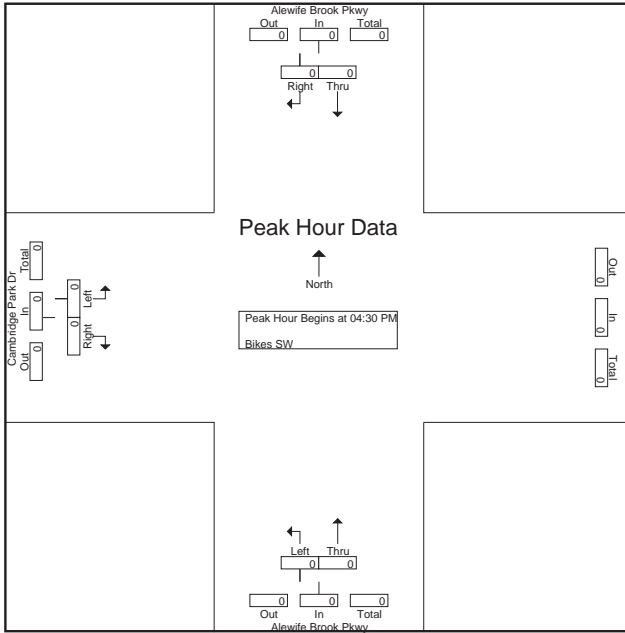
Peak Hour for Each Approach Begins at:

	04:30 PM	04:30 PM	05:30 PM	04:30 PM
+0 mins.	0	0	0	0
+15 mins.	0	0	0	0
+30 mins.	0	0	0	0
+45 mins.	0	0	1	1
Total Volume	0	0	1	1
% App. Total	0	0	100	0
PHF	.000	.000	.250	.000

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
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Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

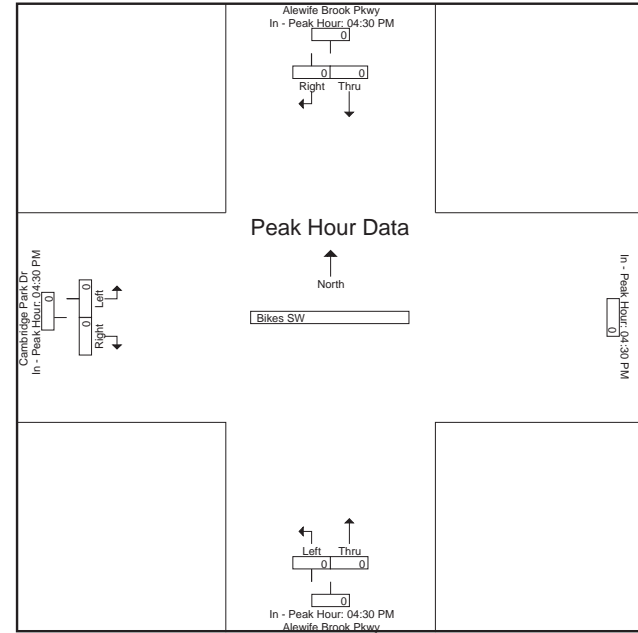
Peak Hour for Each Approach Begins at:

	04:30 PM			04:30 PM			04:30 PM			04:30 PM		
+0 mins.	0	0	0	0	0	0	0	0	0	0	0	0
+15 mins.	0	0	0	0	0	0	0	0	0	0	0	0
+30 mins.	0	0	0	0	0	0	0	0	0	0	0	0
+45 mins.	0	0	0	0	0	0	0	0	0	0	0	0
Total Volume	0	0	0	0	0	0	0	0	0	0	0	0
% App. Total	0	0	0	0	0	0	0	0	0	0	0	0
PHF	.000	.000	.000	.000	.000	.000	.000	.000	.000	.000	.000	.000

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810002
Site Code : 11810002
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 1

Groups Printed- Cars - Trucks - Buses

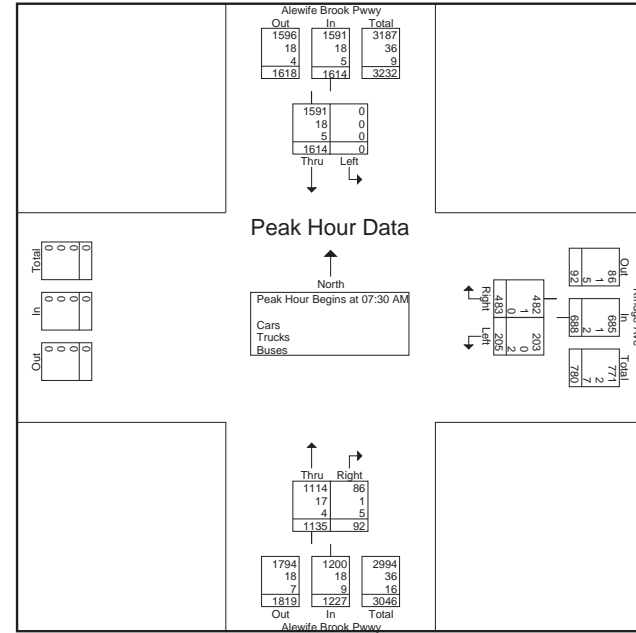
Start Time	Alewife Brook Pwvy From North		Rindge Ave From East		Alewife Brook Pwvy From South		Int. Total
	Left	Thru	Left	Right	Thru	Right	
07:30 AM	0	468	51	108	312	23	962
07:45 AM	0	397	57	126	264	18	862
Total	0	865	108	234	576	41	1824
08:00 AM	0	405	43	118	304	32	902
08:15 AM	0	344	54	131	255	19	803
08:30 AM	0	381	50	111	315	21	878
08:45 AM	0	436	54	116	217	33	856
Total	0	1566	201	476	1091	105	3439
09:00 AM	0	471	56	93	286	36	942
09:15 AM	0	459	37	67	250	36	849
Grand Total	0	3361	402	870	2203	218	7054
Apprch %	0	100	31.6	68.4	91	9	
Total %	0	47.6	5.7	12.3	31.2	3.1	
Cars	0	3307	400	869	2154	209	6939
% Cars	0	98.4	99.5	99.9	97.8	95.9	98.4
Trucks	0	42	0	1	44	1	88
% Trucks	0	1.2	0	0.1	2	0.5	1.2
Buses	0	12	2	0	5	8	27
% Buses	0	0.4	0.5	0	0.2	3.7	0.4

Start Time	Alewife Brook Pwvy From North			Rindge Ave From East			Alewife Brook Pwvy From South			From West	Int. Total
	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	App. Total	
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1											
Peak Hour for Entire Intersection Begins at 07:30 AM											
07:30 AM	0	468	468	51	108	159	312	23	335	0	962
07:45 AM	0	397	397	57	126	183	264	18	282	0	862
08:00 AM	0	405	405	43	118	161	304	32	336	0	902
08:15 AM	0	344	344	54	131	185	255	19	274	0	803
Total Volume	0	1614	1614	205	483	688	1135	92	1227	0	3529
% App. Total	0	100		29.8	70.2		92.5	7.5			
PHF	.000	.862	.862	.899	.922	.930	.909	.719	.913	.000	.917
Cars	0	1591	1591	203	482	685	1114	86	1200	0	3476
% Cars	0	98.6	98.6	99.0	99.8	99.6	98.1	93.5	97.8	0	98.5
Trucks	0	18	18	0	1	1	17	1	18	0	37
% Trucks	0	1.1	1.1	0	0.2	0.1	1.5	1.1	1.5	0	1.0
Buses	0	5	5	2	0	2	4	5	9	0	16
% Buses	0	0.3	0.3	1.0	0	0.3	0.4	5.4	0.7	0	0.5

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 2



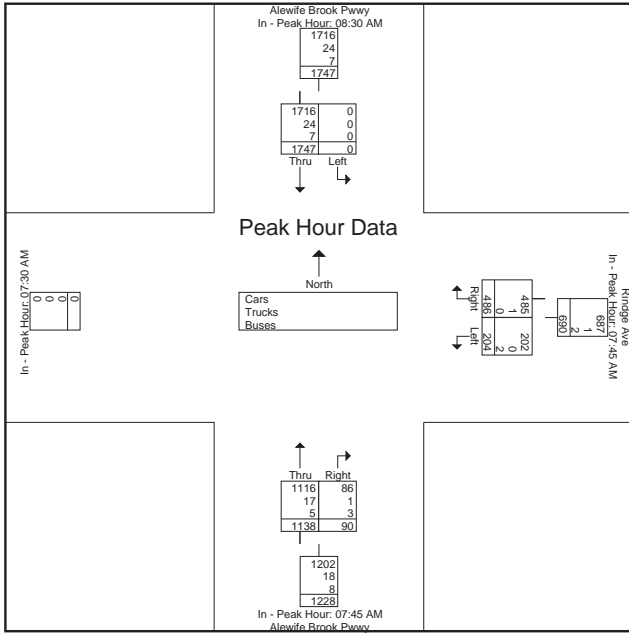
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	08:30 AM	07:45 AM	07:45 AM	07:45 AM	07:30 AM					
+0 mins.	0	381	381	57	126	183	264	18	282	0
+15 mins.	0	436	436	43	118	161	304	32	336	0
+30 mins.	0	471	471	54	131	185	255	19	274	0
+45 mins.	0	459	459	50	111	161	315	21	336	0
Total Volume	0	1747	1747	204	486	690	1138	90	1228	0
% App. Total	0	100		29.6	70.4		92.7	7.3		
PHF	.000	.927	.927	.895	.927	.932	.903	.703	.914	.000
Cars	0	1716	1716	202	485	687	1116	86	1202	0
% Cars	0	98.2	98.2	99	99.8	99.6	98.1	95.6	97.9	0
Trucks	0	24	24	0	1	1	17	1	18	0
% Trucks	0	1.4	1.4	0	0.2	0.1	1.5	1.1	1.5	0
Buses	0	7	7	2	0	2	5	3	8	0
% Buses	0	0.4	0.4	1	0	0.3	0.4	3.3	0.7	0

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 1

Groups Printed- Buses

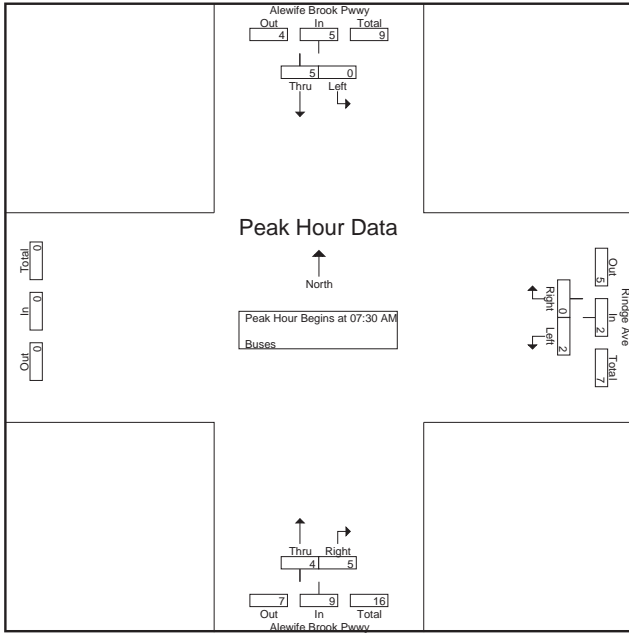
Start Time	Alewife Brook Pkwy From North		Rindge Ave From East		Alewife Brook Pkwy From South		Int. Total
	Left	Thru	Left	Right	Thru	Right	
07:30 AM	0	1	0	0	0	2	3
07:45 AM	0	0	1	0	2	1	4
Total	0	1	1	0	2	3	7
08:00 AM	0	1	0	0	1	1	3
08:15 AM	0	3	1	0	1	1	6
08:30 AM	0	2	0	0	1	0	3
08:45 AM	0	2	0	0	0	1	3
Total	0	8	1	0	3	3	15
09:00 AM	0	2	0	0	0	1	3
09:15 AM	0	1	0	0	0	1	2
Grand Total	0	12	2	0	5	8	27
Approch %	0	100	100	0	38.5	61.5	
Total %	0	44.4	7.4	0	18.5	29.6	

Start Time	Alewife Brook Pkwy From North			Rindge Ave From East			Alewife Brook Pkwy From South			From West	Int. Total
	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total		
07:30 AM	0	1	1	0	0	0	0	2	2	0	3
07:45 AM	0	0	0	1	0	1	2	1	3	0	4
08:00 AM	0	1	1	0	0	0	1	1	2	0	3
08:15 AM	0	3	3	1	0	1	1	1	2	0	6
Total Volume	0	5	5	2	0	2	4	5	9	0	16
% App. Total	0	100		100	0		44.4	55.6			
PHF	.000	.417	.417	.500	.000	.500	.500	.625	.750	.000	.667

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

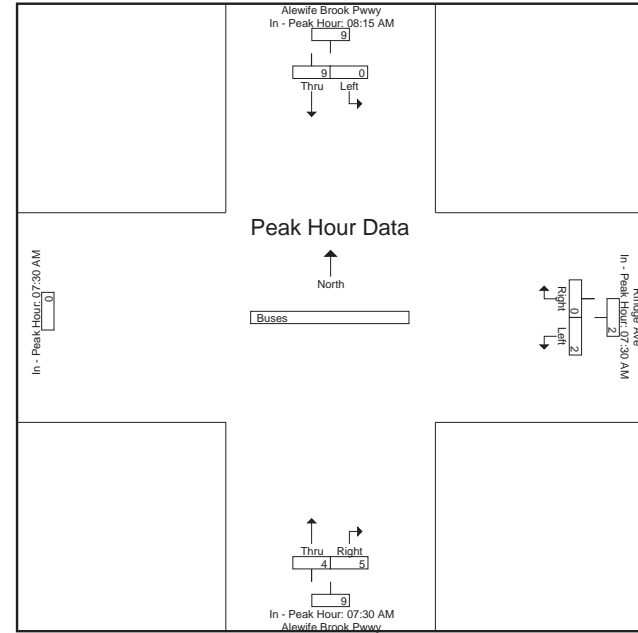
File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 2



Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 3



Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1

Peak Hour for Each Approach Begins at:

	08:15 AM		07:30 AM		07:30 AM		07:30 AM	
+0 mins.	0	3	3	0	0	0	2	0
+15 mins.	0	2	2	1	0	1	2	0
+30 mins.	0	2	2	0	0	0	1	0
+45 mins.	0	2	2	1	0	1	1	0
Total Volume	0	9	9	2	0	2	4	9
% App. Total	0	100	100	0	0	44.4	55.6	0
PHF	.000	.750	.750	.500	.000	.500	.625	.750

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 1

Groups Printed- Cars

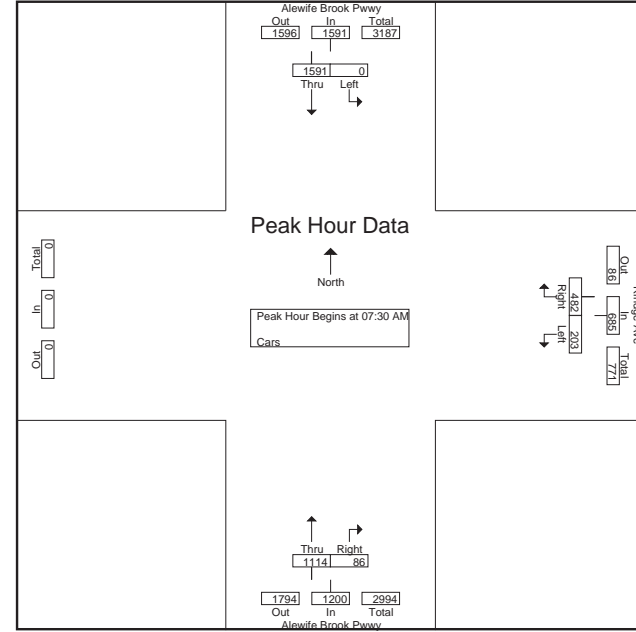
Start Time	Alewife Brook Pwvy From North		Rindge Ave From East		Alewife Brook Pwvy From South		Int. Total
	Left	Thru	Left	Right	Thru	Right	
07:30 AM	0	464	51	108	306	21	950
07:45 AM	0	389	56	125	259	17	846
Total	0	853	107	233	565	38	1796
08:00 AM	0	398	43	118	302	30	891
08:15 AM	0	340	53	131	247	18	789
08:30 AM	0	372	50	111	308	21	862
08:45 AM	0	429	54	116	211	32	842
Total	0	1539	200	476	1068	101	3384
09:00 AM	0	463	56	93	278	35	925
09:15 AM	0	452	37	67	243	35	834
Grand Total	0	3307	400	869	2154	209	6939
Apprch %	0	100	31.5	68.5	91.2	8.8	
Total %	0	47.7	5.8	12.5	31	3	

Start Time	Alewife Brook Pwvy From North			Rindge Ave From East			Alewife Brook Pwvy From South			From West	Int. Total
	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	App. Total	
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1											
Peak Hour for Entire Intersection Begins at 07:30 AM											
07:30 AM	0	464	464	51	108	159	306	21	327	0	950
07:45 AM	0	389	389	56	125	181	259	17	276	0	846
08:00 AM	0	398	398	43	118	161	302	30	332	0	891
08:15 AM	0	340	340	53	131	184	247	18	265	0	789
Total Volume	0	1591	1591	203	482	685	1114	86	1200	0	3476
% App. Total	0	100		29.6	70.4		92.8	7.2			
PHF	.000	.857	.857	.906	.920	.931	.910	.717	.904	.000	.915

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
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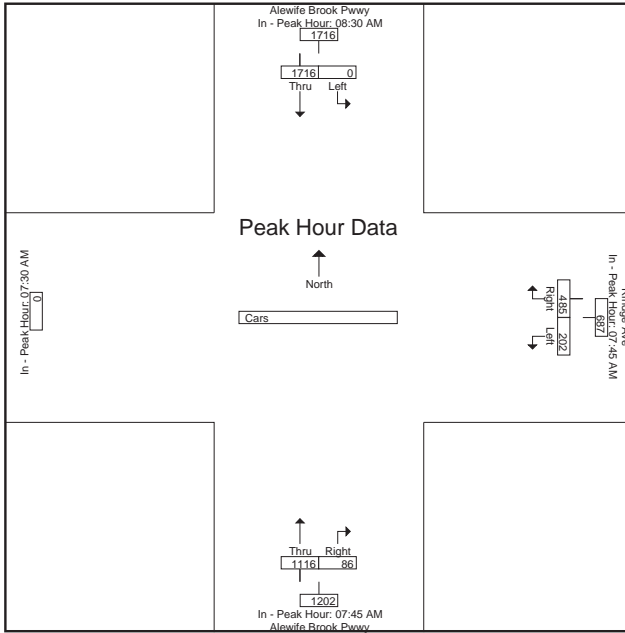
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	08:30 AM	07:45 AM	07:45 AM	07:45 AM	07:45 AM	07:30 AM					
+0 mins.	0	372	372	56	125	181	259	17	276	07:30 AM	0
+15 mins.	0	429	429	43	118	161	302	30	332	0	
+30 mins.	0	463	463	53	131	184	247	18	265	0	
+45 mins.	0	452	452	50	111	161	308	21	329	0	
Total Volume	0	1716	1716	202	485	687	1116	86	1202	0	
% App. Total	0	100		29.4	70.6		92.8	7.2			
PHF	.000	.927	.927	.902	.926	.933	.906	.717	.905	.000	

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 1

Groups Printed- Trucks

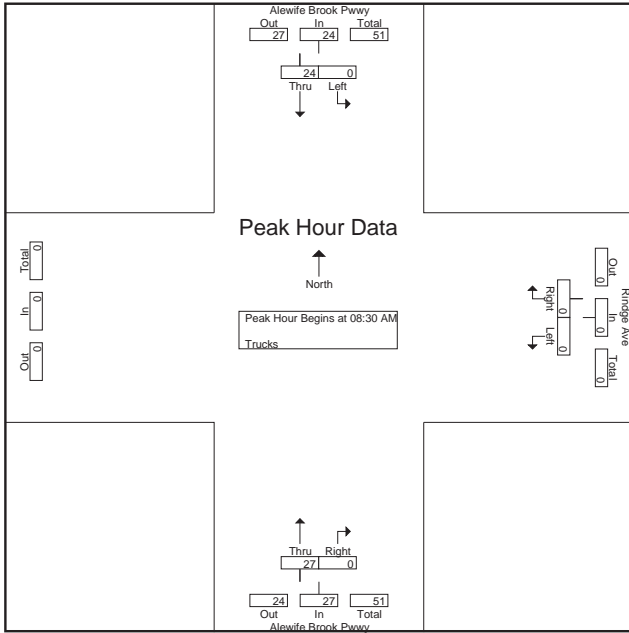
Start Time	Alewife Brook Pkwy From North		Rindge Ave From East		Alewife Brook Pkwy From South		Int. Total
	Left	Thru	Left	Right	Thru	Right	
07:30 AM	0	3	0	0	6	0	9
07:45 AM	0	8	0	1	3	0	12
Total	0	11	0	1	9	0	21
08:00 AM	0	6	0	0	1	1	8
08:15 AM	0	1	0	0	7	0	8
08:30 AM	0	7	0	0	6	0	13
08:45 AM	0	5	0	0	6	0	11
Total	0	19	0	0	20	1	40
09:00 AM	0	6	0	0	8	0	14
09:15 AM	0	6	0	0	7	0	13
Grand Total	0	42	0	1	44	1	88
Approch %	0	100	0	100	97.8	2.2	
Total %	0	47.7	0	1.1	50	1.1	

Start Time	Alewife Brook Pkwy From North			Rindge Ave From East			Alewife Brook Pkwy From South			From West	Int. Total
	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	App. Total	
08:30 AM	0	7	7	0	0	0	6	0	6	0	13
08:45 AM	0	5	5	0	0	0	6	0	6	0	11
09:00 AM	0	6	6	0	0	0	8	0	8	0	14
09:15 AM	0	6	6	0	0	0	7	0	7	0	13
Total Volume	0	24	24	0	0	0	27	0	27	0	51
% App. Total	0	100		0	0		100	0			
PHF	.000	.857	.857	.000	.000	.000	.844	.000	.844	.000	.911

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

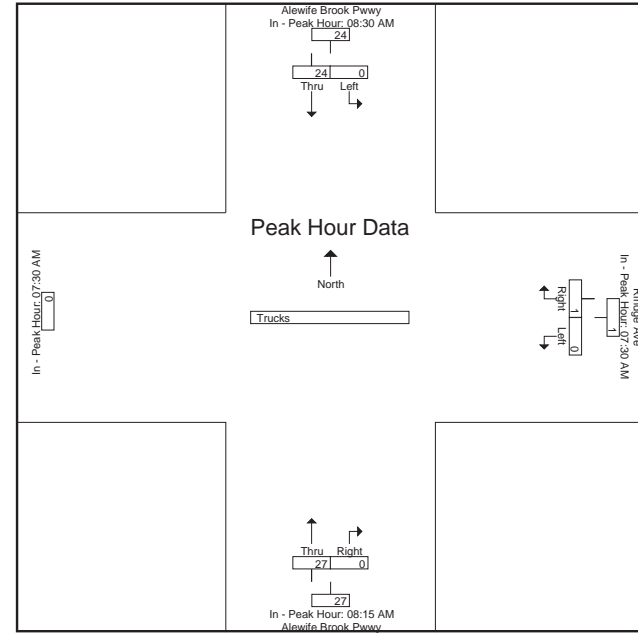
File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 2



Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
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Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1

Peak Hour for Each Approach Begins at:

	08:30 AM		07:30 AM		08:15 AM		07:30 AM	
+0 mins.	0	7	7	0	0	0	7	0
+15 mins.	0	5	5	0	1	1	6	0
+30 mins.	0	6	6	0	0	0	6	0
+45 mins.	0	6	6	0	0	0	8	0
Total Volume	0	24	24	0	1	1	27	0
% App. Total	0	100	100	0	100	100	0	0
PHF	.000	.857	.857	.000	.250	.250	.844	.000

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 1

Groups Printed- Peds

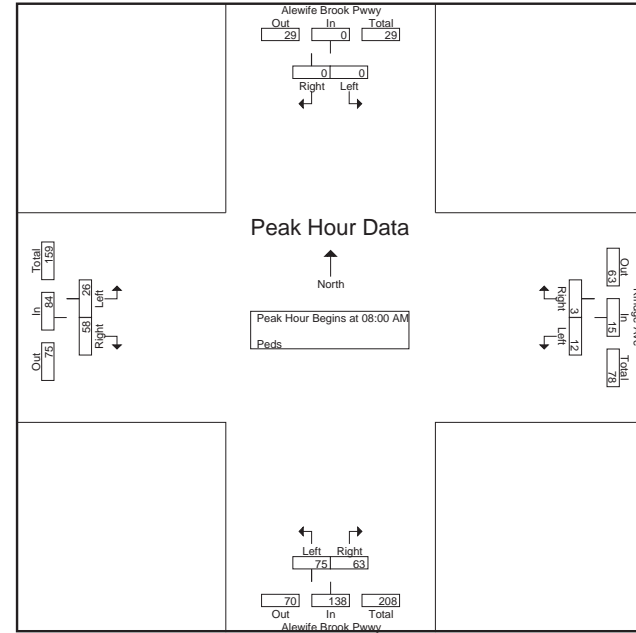
Start Time	Alewife Brook Pwvy From North		Rindge Ave From East		Alewife Brook Pwvy From South			From West		Int. Total
	EB	WB	SB	NB	WB	EB	SB	NB		
07:30 AM	0	0	1	1	21	2	5	6	36	
07:45 AM	0	1	2	0	11	6	2	11	33	
Total	0	1	3	1	32	8	7	17	69	
08:00 AM	0	0	1	1	23	9	5	10	49	
08:15 AM	0	0	8	0	17	27	5	15	72	
08:30 AM	0	0	1	0	25	8	3	9	46	
08:45 AM	0	0	2	2	10	19	13	24	70	
Total	0	0	12	3	75	63	26	58	237	
09:00 AM	0	0	4	0	18	5	9	11	47	
09:15 AM	0	0	0	1	7	6	4	10	28	
Grand Total	0	1	19	5	132	82	46	96	381	
Apprch %	0	100	79.2	20.8	61.7	38.3	32.4	67.6		
Total %	0	0.3	5	1.3	34.6	21.5	12.1	25.2		

Start Time	Alewife Brook Pwvy From North			Rindge Ave From East			Alewife Brook Pwvy From South			From West			Int. Total
	EB	WB	App. Total	SB	NB	App. Total	WB	EB	App. Total	SB	NB	App. Total	
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1													
Peak Hour for Entire Intersection Begins at 08:00 AM													
08:00 AM	0	0	0	1	1	2	23	9	32	5	10	15	49
08:15 AM	0	0	0	8	0	8	17	27	44	5	15	20	72
08:30 AM	0	0	0	1	0	1	25	8	33	3	9	12	46
08:45 AM	0	0	0	2	2	4	10	19	29	13	24	37	70
Total Volume	0	0	0	12	3	15	75	63	138	26	58	84	237
% App. Total	0	0	0	80	20	469	54.3	45.7	784	31	69	823	
PHF	.000	.000	.000	.375	.375	.469	.750	.583	.784	.500	.604	.568	.823

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 2



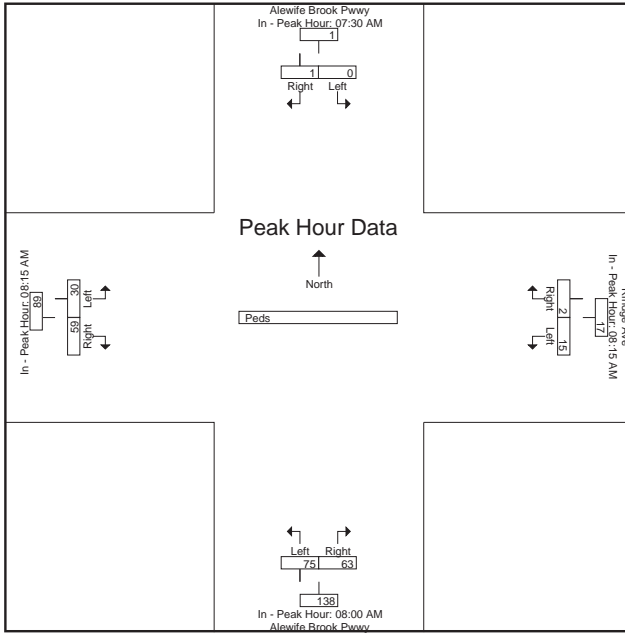
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	07:30 AM			08:15 AM			08:00 AM			08:15 AM		
+0 mins.	0	0	0	8	0	8	23	9	32	5	15	20
+15 mins.	0	1	1	1	0	1	17	27	44	3	9	12
+30 mins.	0	0	0	2	2	4	25	8	33	13	24	37
+45 mins.	0	0	0	4	0	4	10	19	29	9	11	20
Total Volume	0	1	1	15	2	17	75	63	138	30	59	89
% App. Total	0	100		88.2	11.8		54.3	45.7		33.7	66.3	
PHF	.000	.250	.250	.469	.250	.531	.750	.583	.784	.577	.615	.601

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 1

Groups Printed- Bikes Street

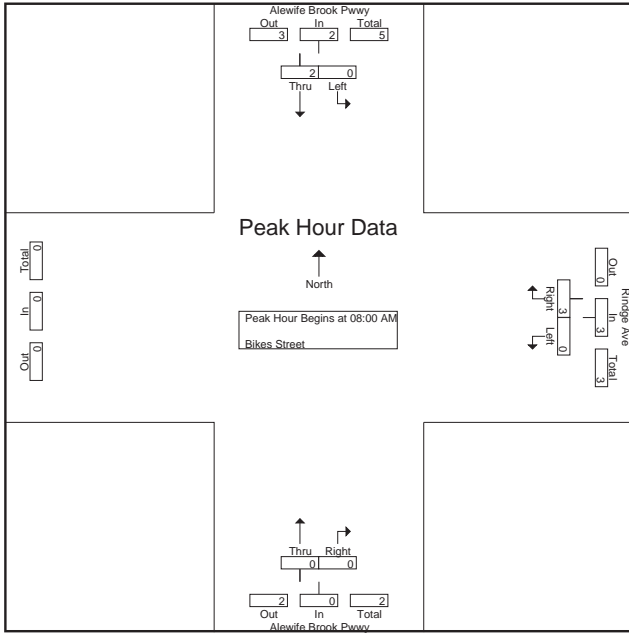
Start Time	Alewife Brook Pkwy From North		Rindge Ave From East		Alewife Brook Pkwy From South		Int. Total
	Left	Thru	Left	Right	Thru	Right	
07:30 AM	0	0	0	0	0	0	0
07:45 AM	0	0	0	0	0	0	0
Total	0	0	0	0	0	0	0
08:00 AM	0	1	0	0	0	0	1
08:15 AM	0	0	0	1	0	0	1
08:30 AM	0	1	0	0	0	0	1
08:45 AM	0	0	0	2	0	0	2
Total	0	2	0	3	0	0	5
09:00 AM	0	0	0	0	0	0	0
09:15 AM	0	0	0	0	0	1	1
Grand Total	0	2	0	3	0	1	6
Apprch %	0	100	0	100	0	100	
Total %	0	33.3	0	50	0	16.7	

Start Time	Alewife Brook Pkwy From North			Rindge Ave From East			Alewife Brook Pkwy From South			From West	Int. Total
	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total		
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1											
Peak Hour for Entire Intersection Begins at 08:00 AM											
08:00 AM	0	1	1	0	0	0	0	0	0	0	1
08:15 AM	0	0	0	0	1	1	0	0	0	0	1
08:30 AM	0	1	1	0	0	0	0	0	0	0	1
08:45 AM	0	0	0	0	2	2	0	0	0	0	2
Total Volume	0	2	2	0	3	3	0	0	0	0	5
% App. Total	0	100		0	100		0	0			
PHF	.000	.500	.500	.000	.375	.375	.000	.000	.000	.000	.625

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 2



Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1

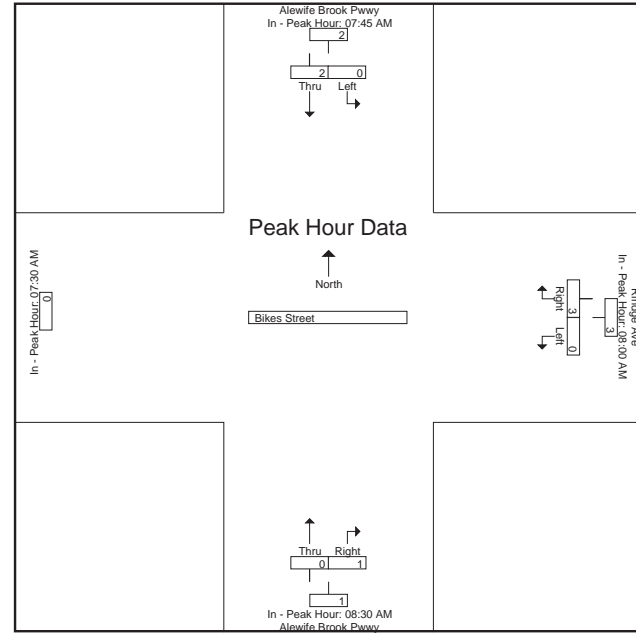
Peak Hour for Each Approach Begins at:

	07:45 AM	08:00 AM	08:30 AM	07:30 AM
+0 mins.	0	0	0	0
+15 mins.	0	1	1	0
+30 mins.	0	0	0	0
+45 mins.	0	1	2	1
Total Volume	0	2	3	1
% App. Total	0	100	100	100
PHF	.000	.500	.375	.250

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
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Groups Printed- Bikes SW

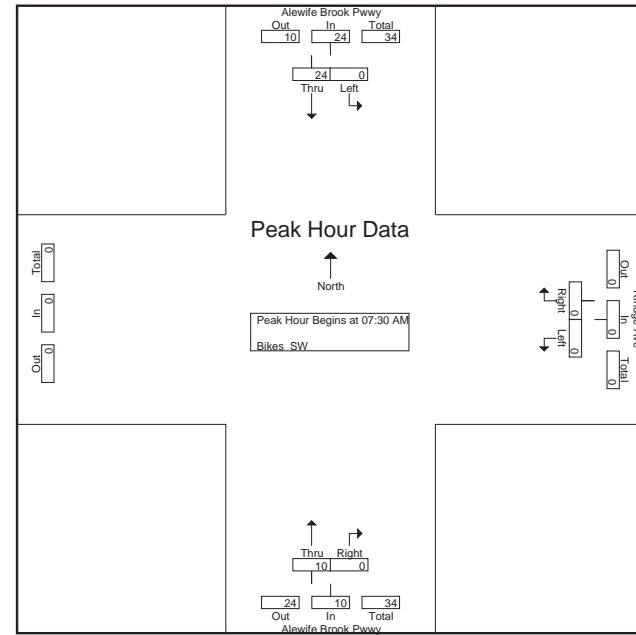
Start Time	Alewife Brook Pwwy From North		Rindge Ave From East		Alewife Brook Pwwy From South		Int. Total
	Left	Thru	Left	Right	Thru	Right	
07:30 AM	0	2	0	0	6	0	8
07:45 AM	0	5	0	0	1	0	6
Total	0	7	0	0	7	0	14
08:00 AM	0	12	0	0	1	0	13
08:15 AM	0	5	0	0	2	0	7
08:30 AM	1	4	0	0	0	0	5
08:45 AM	0	4	0	0	1	0	5
Total	1	25	0	0	4	0	30
09:00 AM	0	7	0	0	2	0	9
09:15 AM	0	1	0	0	1	0	2
Grand Total	1	40	0	0	14	0	55
Apprch %	2.4	97.6	0	0	100	0	
Total %	1.8	72.7	0	0	25.5	0	

Start Time	Alewife Brook Pwwy From North			Rindge Ave From East			Alewife Brook Pwwy From South			From West	Int. Total
	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total		
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1											
Peak Hour for Entire Intersection Begins at 07:30 AM											
07:30 AM	0	2	2	0	0	0	6	0	6	0	8
07:45 AM	0	5	5	0	0	0	1	0	1	0	6
08:00 AM	0	12	12	0	0	0	1	0	1	0	13
08:15 AM	0	5	5	0	0	0	2	0	2	0	7
Total Volume	0	24	24	0	0	0	10	0	10	0	34
% App. Total	0	100		0	0		100	0			
PHF	.000	.500	.500	.000	.000	.000	.417	.000	.417	.000	.654

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
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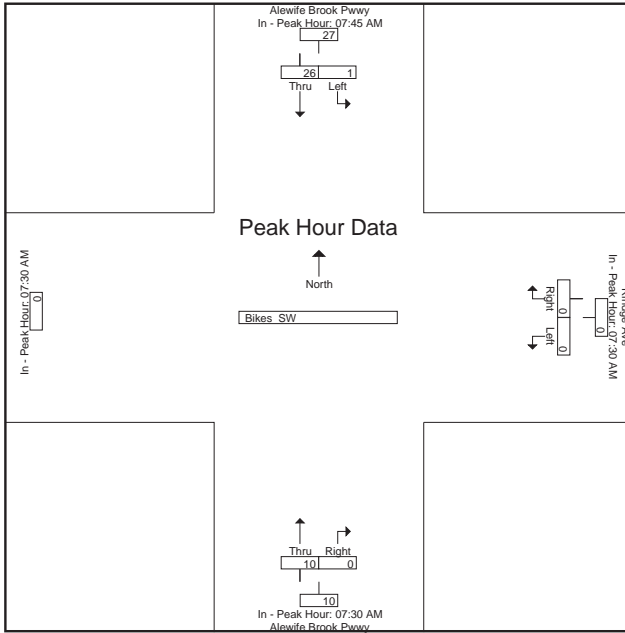
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	07:45 AM			07:30 AM			07:30 AM			07:30 AM
+0 mins.	0	5	5	0	0	0	6	0	6	0
+15 mins.	0	12	12	0	0	0	1	0	1	0
+30 mins.	0	5	5	0	0	0	1	0	1	0
+45 mins.	1	4	5	0	0	0	2	0	2	0
Total Volume	1	26	27	0	0	0	10	0	10	0
% App. Total	3.7	96.3		0	0		100	0		
PHF	.250	.542	.563	.000	.000	.000	.417	.000	.417	.000

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
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Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 1

Groups Printed- Cars - Trucks - Buses

Start Time	Alewife Brook Pkwy From North		Rindge Ave From East		Alewife Brook Pkwy From South		Int. Total
	Left	Thru	Left	Right	Thru	Right	
04:30 PM	0	401	41	87	314	65	908
04:45 PM	0	403	38	85	336	76	938
Total	0	804	79	172	650	141	1846
05:00 PM	0	467	37	84	387	63	1038
05:15 PM	0	464	52	95	299	55	965
05:30 PM	0	511	38	76	394	60	1079
05:45 PM	0	439	44	92	304	65	944
Total	0	1881	171	347	1384	243	4026
06:00 PM	0	487	41	87	313	58	986
06:15 PM	0	504	35	89	281	69	978
Grand Total	0	3676	326	695	2628	511	7836
Approch %	0	100	31.9	68.1	83.7	16.3	
Total %	0	46.9	4.2	8.9	33.5	6.5	
Cars	0	3663	321	690	2621	509	7804
% Cars	0	99.6	98.5	99.3	99.7	99.6	99.6
Trucks	0	7	0	1	5	1	14
% Trucks	0	0.2	0	0.1	0.2	0.2	0.2
Buses	0	6	5	4	2	1	18
% Buses	0	0.2	1.5	0.6	0.1	0.2	0.2

Start Time	Alewife Brook Pkwy From North			Rindge Ave From East			Alewife Brook Pkwy From South			From West	Int. Total
	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total		
05:00 PM	0	467	467	37	84	121	387	63	450	0	1038
05:15 PM	0	464	464	52	95	147	299	55	354	0	965
05:30 PM	0	511	511	38	76	114	394	60	454	0	1079
05:45 PM	0	439	439	44	92	136	304	65	369	0	944
Total Volume	0	1881	1881	171	347	518	1384	243	1627	0	4026
% App. Total	0	100		33	67		85.1	14.9			
PHF	.000	.920	.920	.822	.913	.881	.878	.935	.896	.000	.933
Cars	0	1871	1871	169	343	512	1380	241	1621	0	4004
% Cars	0	99.5	99.5	98.8	98.8	98.8	99.7	99.2	99.6	0	99.5
Trucks	0	7	7	0	0	0	3	1	4	0	11
% Trucks	0	0.4	0.4	0	0	0	0.2	0.4	0.2	0	0.3
Buses	0	3	3	2	4	6	1	1	2	0	11
% Buses	0	0.2	0.2	1.2	1.2	1.2	0.1	0.4	0.1	0	0.3

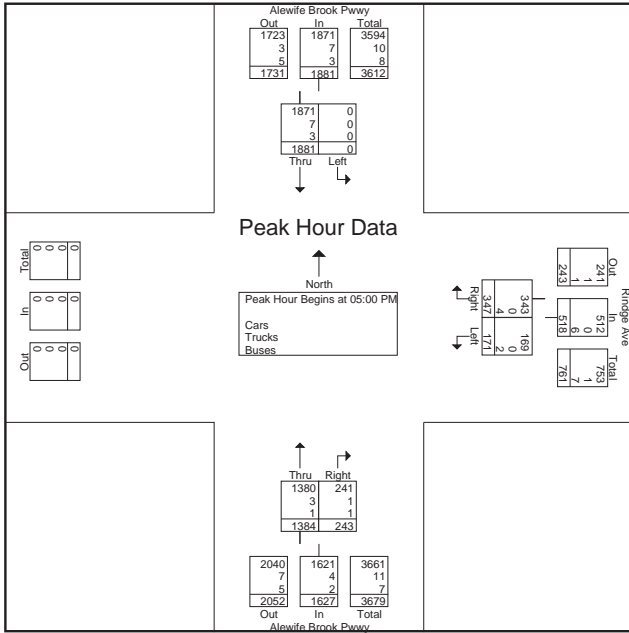
Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

Peak Hour for Entire Intersection Begins at 05:00 PM

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
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Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

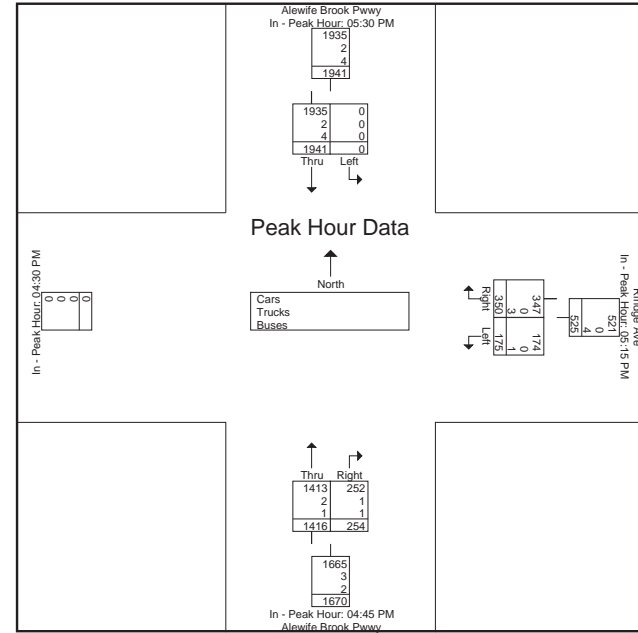
Peak Hour for Each Approach Begins at:

	05:30 PM	05:15 PM	04:45 PM	04:30 PM
+0 mins.	0	511	95	147
+15 mins.	0	439	38	76
+30 mins.	0	487	44	92
+45 mins.	0	504	41	87
Total Volume	0	1941	175	350
% App. Total	0	100	33.3	66.7
PHF	.000	.950	.841	.921
Cars	0	1935	174	347
% Cars	0	99.7	99.4	99.2
Trucks	0	2	0	0
% Trucks	0	0.1	0	0
Buses	0	4	1	3
% Buses	0	0.2	0.6	0.9

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
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Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 1

Groups Printed- Buses

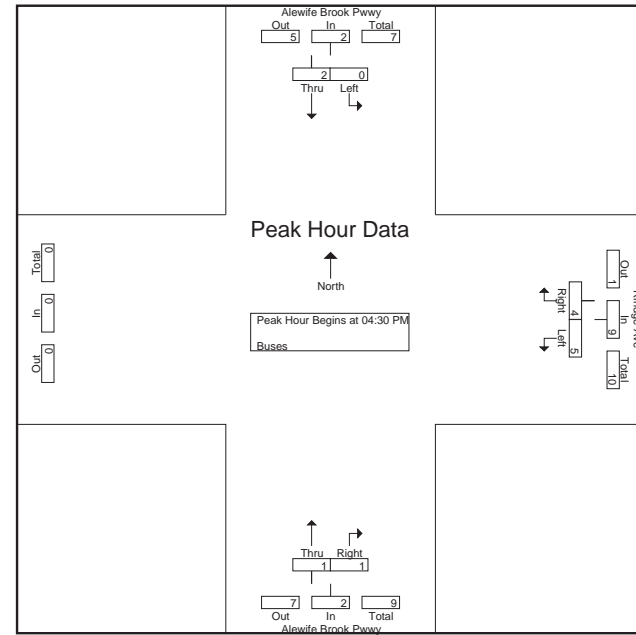
Start Time	Alewife Brook Pwvy From North		Rindge Ave From East		Alewife Brook Pwvy From South		Int. Total
	Left	Thru	Left	Right	Thru	Right	
04:30 PM	0	0	0	0	0	0	0
04:45 PM	0	0	3	0	0	0	3
Total	0	0	3	0	0	0	3
05:00 PM	0	1	1	1	1	1	5
05:15 PM	0	1	1	3	0	0	5
05:30 PM	0	0	0	0	0	0	0
05:45 PM	0	1	0	0	0	0	1
Total	0	3	2	4	1	1	11
06:00 PM	0	1	0	0	1	0	2
06:15 PM	0	2	0	0	0	0	2
Grand Total	0	6	5	4	2	1	18
Apprch %	0	100	55.6	44.4	66.7	33.3	
Total %	0	33.3	27.8	22.2	11.1	5.6	

Start Time	Alewife Brook Pwvy From North			Rindge Ave From East			Alewife Brook Pwvy From South			From West	Int. Total
	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	App. Total	
Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1											
Peak Hour for Entire Intersection Begins at 04:30 PM											
04:30 PM	0	0	0	0	0	0	0	0	0	0	0
04:45 PM	0	0	0	3	0	3	0	0	0	0	3
05:00 PM	0	1	1	1	1	2	1	1	2	0	5
05:15 PM	0	1	1	1	3	4	0	0	0	0	5
Total Volume	0	2	2	5	4	9	1	1	2	0	13
% App. Total	0	100		55.6	44.4		50	50			
PHF	.000	.500	.500	.417	.333	.563	.250	.250	.250	.000	.650

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
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Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

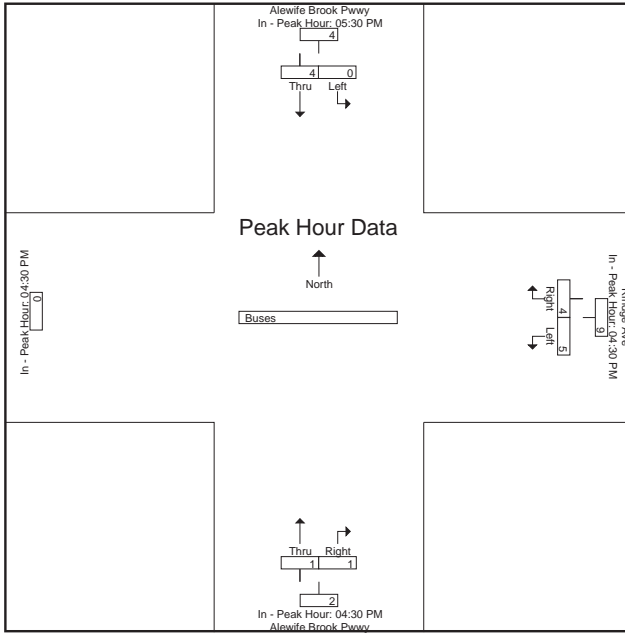
Peak Hour for Each Approach Begins at:

	05:30 PM	04:30 PM	04:30 PM	04:30 PM	04:30 PM
+0 mins.	0	0	0	0	0
+15 mins.	0	1	1	3	0
+30 mins.	0	1	1	1	1
+45 mins.	0	2	2	1	3
Total Volume	0	4	4	5	4
% App. Total	0	100		55.6	44.4
PHF	.000	.500	.500	.417	.333

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
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Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 1

Groups Printed- Cars

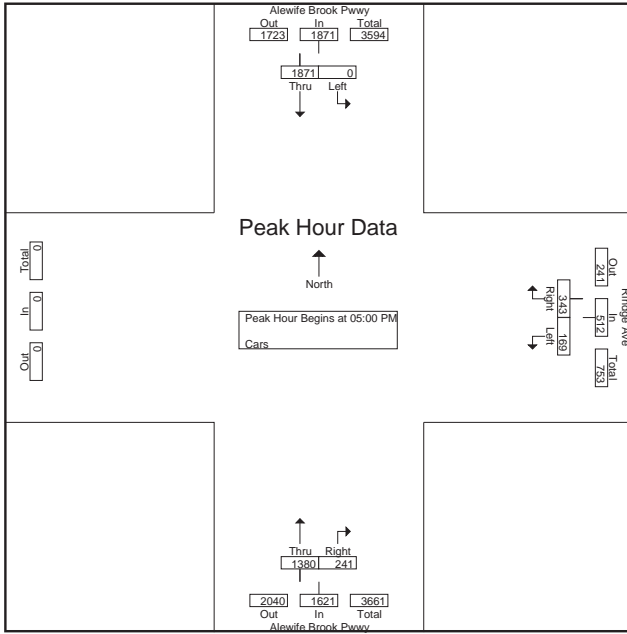
Start Time	Alewife Brook Pkwy From North		Rindge Ave From East		Alewife Brook Pkwy From South		Int. Total
	Left	Thru	Left	Right	Thru	Right	
04:30 PM	0	401	41	87	314	65	908
04:45 PM	0	403	35	84	336	76	934
Total	0	804	76	171	650	141	1842
05:00 PM	0	463	36	83	386	62	1030
05:15 PM	0	461	51	92	297	54	955
05:30 PM	0	509	38	76	394	60	1077
05:45 PM	0	438	44	92	303	65	942
Total	0	1871	169	343	1380	241	4004
06:00 PM	0	486	41	87	312	58	984
06:15 PM	0	502	35	89	279	69	974
Grand Total	0	3663	321	690	2621	509	7804
Approch %	0	100	31.8	68.2	83.7	16.3	
Total %	0	46.9	4.1	8.8	33.6	6.5	

Start Time	Alewife Brook Pkwy From North			Rindge Ave From East			Alewife Brook Pkwy From South			From West	Int. Total
	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	App. Total	
05:00 PM	0	463	463	36	83	119	386	62	448	0	1030
05:15 PM	0	461	461	51	92	143	297	54	351	0	955
05:30 PM	0	509	509	38	76	114	394	60	454	0	1077
05:45 PM	0	438	438	44	92	136	303	65	368	0	942
Total Volume	0	1871	1871	169	343	512	1380	241	1621	0	4004
% App. Total	0	100		33	67		85.1	14.9			
PHF	.000	.919	.919	.828	.932	.895	.876	.927	.893	.000	.929

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

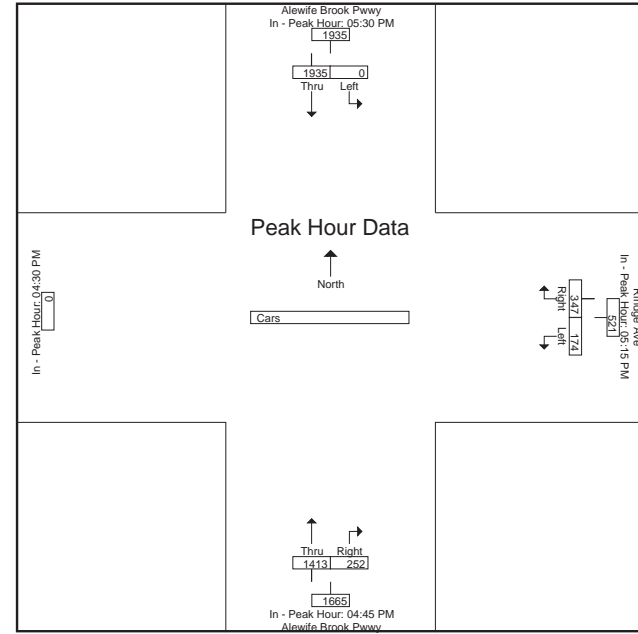
File Name : 11810003
Site Code : 11810003
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Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
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Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

Peak Hour for Each Approach Begins at:

	05:30 PM	05:15 PM	04:45 PM	04:30 PM
+0 mins.	0	51	92	143
+15 mins.	0	438	38	76
+30 mins.	0	486	44	92
+45 mins.	0	502	41	87
Total Volume	0	1935	174	347
% App. Total	0	100	33.4	66.6
PHF	.000	.950	.853	.943

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
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Groups Printed- Trucks

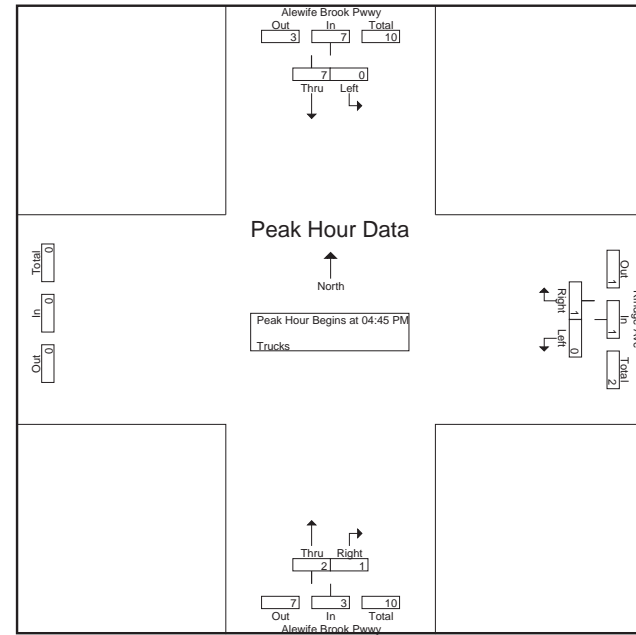
Start Time	Alewife Brook Pwvy From North		Rindge Ave From East		Alewife Brook Pwvy From South		Int. Total
	Left	Thru	Left	Right	Thru	Right	
04:30 PM	0	0	0	0	0	0	0
04:45 PM	0	0	0	1	0	0	1
Total	0	0	0	1	0	0	1
05:00 PM	0	3	0	0	0	0	3
05:15 PM	0	2	0	0	2	1	5
05:30 PM	0	2	0	0	0	0	2
05:45 PM	0	0	0	0	1	0	1
Total	0	7	0	0	3	1	11
06:00 PM	0	0	0	0	0	0	0
06:15 PM	0	0	0	0	2	0	2
Grand Total	0	7	0	1	5	1	14
Apprch %	0	100	0	100	83.3	16.7	
Total %	0	50	0	7.1	35.7	7.1	

Start Time	Alewife Brook Pwvy From North			Rindge Ave From East			Alewife Brook Pwvy From South			From West	Int. Total
	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	App. Total	
Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1											
Peak Hour for Entire Intersection Begins at 04:45 PM											
04:45 PM	0	0	0	0	1	1	0	0	0	0	1
05:00 PM	0	3	3	0	0	0	0	0	0	0	3
05:15 PM	0	2	2	0	0	0	2	1	3	0	5
05:30 PM	0	2	2	0	0	0	0	0	0	0	2
Total Volume	0	7	7	0	1	1	2	1	3	0	11
% App. Total	0	100	100	0	100	100	66.7	33.3	250	0	550
PHF	.000	.583	.583	.000	.250	.250	.250	.250	.250	.000	.550

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
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Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

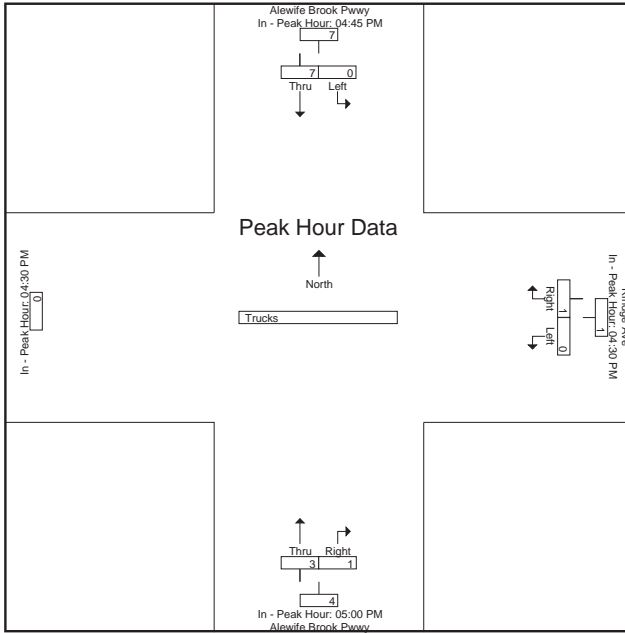
Peak Hour for Each Approach Begins at:

	04:45 PM	04:30 PM	05:00 PM	04:30 PM
+0 mins.	0	0	0	0
+15 mins.	0	3	3	0
+30 mins.	0	2	2	0
+45 mins.	0	2	2	0
Total Volume	0	7	7	0
% App. Total	0	100	100	0
PHF	.000	.583	.583	.000

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
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Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
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Groups Printed- Peds

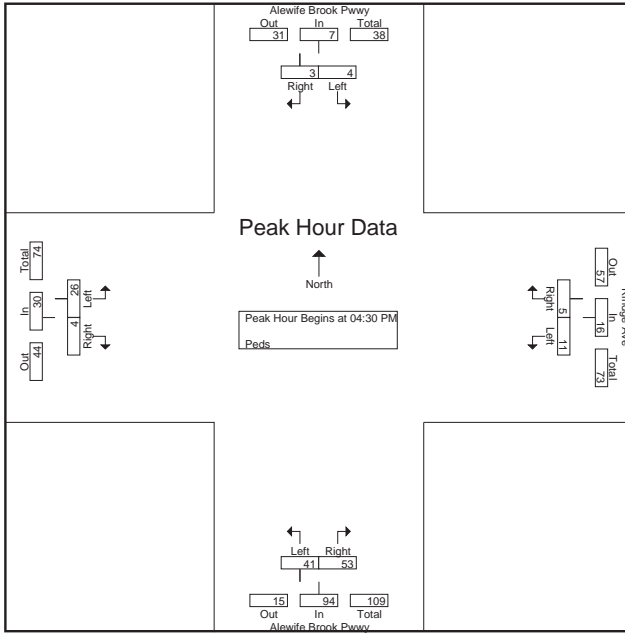
Start Time	Alewife Brook Pwvy From North		Rindge Ave From East		Alewife Brook Pwvy From South			From West		Int. Total
	EB	WB	SB	NB	WB	EB	SB	NB		
04:30 PM	0	0	3	3	11	17	3	1	38	
04:45 PM	0	0	0	1	7	9	4	0	21	
Total	0	0	3	4	18	26	7	1	59	
05:00 PM	4	1	4	0	13	11	13	2	48	
05:15 PM	0	2	4	1	10	16	6	1	40	
05:30 PM	0	1	0	1	5	18	10	0	35	
05:45 PM	0	0	0	1	4	12	0	0	17	
Total	4	4	8	3	32	57	29	3	140	
06:00 PM	0	0	0	0	7	23	4	0	34	
06:15 PM	0	0	1	1	6	20	7	0	35	
Grand Total	4	4	12	8	63	126	47	4	268	
Apprch %	50	50	60	40	33.3	66.7	92.2	7.8		
Total %	1.5	1.5	4.5	3	23.5	47	17.5	1.5		

Start Time	Alewife Brook Pwvy From North			Rindge Ave From East			Alewife Brook Pwvy From South			From West			Int. Total
	EB	WB	App. Total	SB	NB	App. Total	WB	EB	App. Total	SB	NB	App. Total	
04:30 PM	0	0	0	3	3	6	11	17	28	3	1	4	38
04:45 PM	0	0	0	0	1	1	7	9	16	4	0	4	21
05:00 PM	4	1	5	4	0	4	13	11	24	13	2	15	48
05:15 PM	0	2	2	4	1	5	10	16	26	6	1	7	40
Total Volume	4	3	7	11	5	16	41	53	94	26	4	30	147
% App. Total	57.1	42.9	.350	68.8	31.2	.688	43.6	56.4	.839	86.7	13.3	500	.766
PHF	.250	.375	.350	.688	.417	.667	.788	.779	.839	.500	.500	.500	.766

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 2



Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

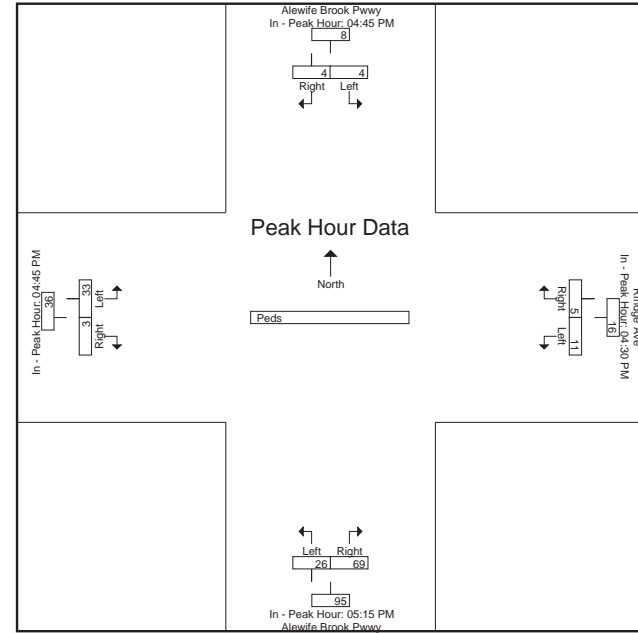
Peak Hour for Each Approach Begins at:

	04:45 PM			04:30 PM			05:15 PM			04:45 PM		
+0 mins.	0	0	0	3	3	6	10	16	26	4	0	4
+15 mins.	4	1	5	0	1	1	5	18	23	13	2	15
+30 mins.	0	2	2	4	0	4	4	12	16	6	1	7
+45 mins.	0	1	1	4	1	5	7	23	30	10	0	10
Total Volume	4	4	8	11	5	16	26	69	95	33	3	36
% App. Total	50	50		68.8	31.2		27.4	72.6		91.7	8.3	
PHF	.250	.500	.400	.688	.417	.667	.650	.750	.792	.635	.375	.600

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 1

Groups Printed- Bikes Street

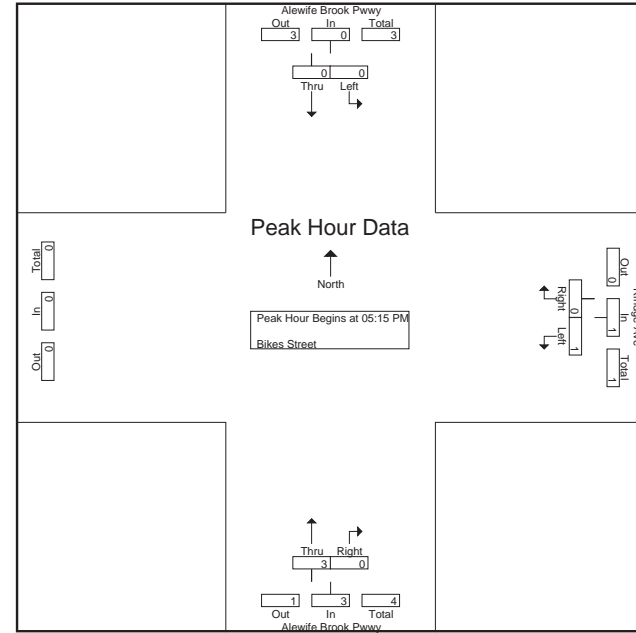
Start Time	Alewife Brook Pwvy From North		Rindge Ave From East		Alewife Brook Pwvy From South		Int. Total
	Left	Thru	Left	Right	Thru	Right	
04:30 PM	0	0	1	0	0	0	1
04:45 PM	0	0	0	0	0	0	0
Total	0	0	1	0	0	0	1
05:00 PM	0	0	0	0	0	0	0
05:15 PM	0	0	1	0	1	0	2
05:30 PM	0	0	0	0	0	0	0
05:45 PM	0	0	0	0	0	0	0
Total	0	0	1	0	1	0	2
06:00 PM	0	0	0	0	2	0	2
06:15 PM	0	0	1	0	0	0	1
Grand Total	0	0	3	0	3	0	6
Apprch %	0	0	100	0	100	0	
Total %	0	0	50	0	50	0	

Start Time	Alewife Brook Pwvy From North			Rindge Ave From East			Alewife Brook Pwvy From South			From West	Int. Total
	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total		
Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1											
Peak Hour for Entire Intersection Begins at 05:15 PM											
05:15 PM	0	0	0	1	0	1	1	0	1	0	2
05:30 PM	0	0	0	0	0	0	0	0	0	0	0
05:45 PM	0	0	0	0	0	0	0	0	0	0	0
06:00 PM	0	0	0	0	0	0	2	0	2	0	2
Total Volume	0	0	0	1	0	1	3	0	3	0	4
% App. Total	0	0	0	100	0	100	100	0	100	0	100
PHF	.000	.000	.000	.250	.000	.250	.375	.000	.375	.000	.500

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 2



Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

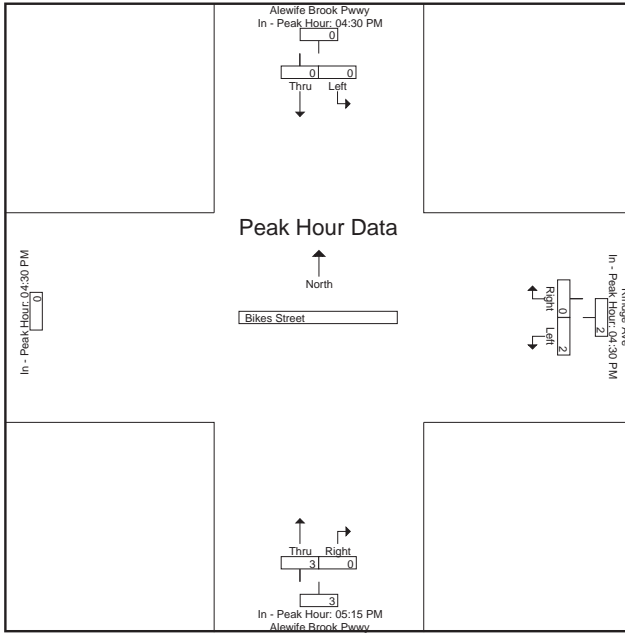
Peak Hour for Each Approach Begins at:

	04:30 PM	04:30 PM	04:30 PM	05:15 PM	05:15 PM	05:15 PM	04:30 PM
+0 mins.	0	0	0	1	0	1	0
+15 mins.	0	0	0	0	0	0	0
+30 mins.	0	0	0	0	0	0	0
+45 mins.	0	0	0	1	0	1	2
Total Volume	0	0	0	2	0	2	3
% App. Total	0	0	0	100	0	100	100
PHF	.000	.000	.000	.500	.000	.500	.375

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 1

Groups Printed- Bikes SW

Start Time	Alewife Brook Pkwy From North		Rindge Ave From East		Alewife Brook Pkwy From South		Int. Total
	Left	Thru	Left	Right	Thru	Right	
04:30 PM	0	0	0	0	0	0	0
04:45 PM	0	0	0	0	0	0	0
Total	0	0	0	0	0	0	0
05:00 PM	0	0	0	0	0	0	0
05:15 PM	0	0	0	0	1	0	1
05:30 PM	1	0	0	0	0	0	1
05:45 PM	0	1	0	0	2	0	3
Total	1	1	0	0	3	0	5
06:00 PM	0	0	0	0	2	1	3
06:15 PM	0	1	1	0	5	0	7
Grand Total	1	2	1	0	10	1	15
Approch %	33.3	66.7	100	0	90.9	9.1	
Total %	6.7	13.3	6.7	0	66.7	6.7	

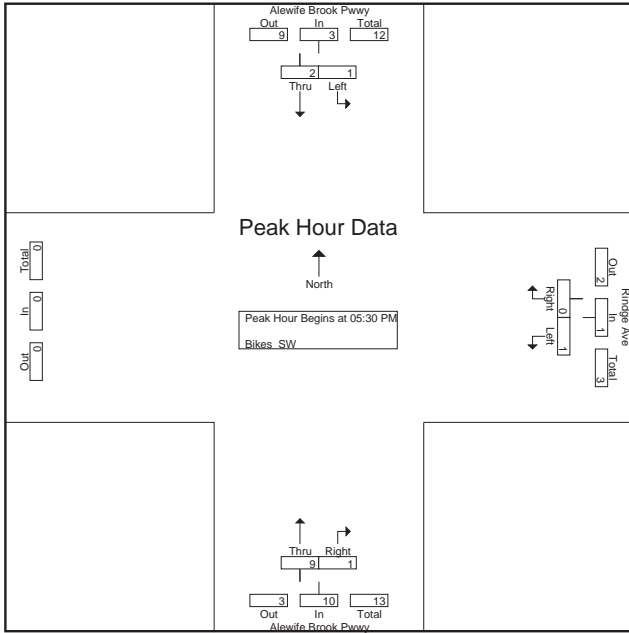
Start Time	Alewife Brook Pkwy From North			Rindge Ave From East			Alewife Brook Pkwy From South			From West	Int. Total
	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	App. Total	
05:30 PM	1	0	1	0	0	0	0	0	0	0	1
05:45 PM	0	1	1	0	0	0	2	0	2	0	3
06:00 PM	0	0	0	0	0	0	2	1	3	0	3
06:15 PM	0	1	1	1	0	1	5	0	5	0	7
Total Volume	1	2	3	1	0	1	9	1	10	0	14
% App. Total	33.3	66.7		100	0		90	10			
PHF	.250	.500	.750	.250	.000	.250	.450	.250	.500	.000	.500

Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1
Peak Hour for Entire Intersection Begins at 05:30 PM

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 2



Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

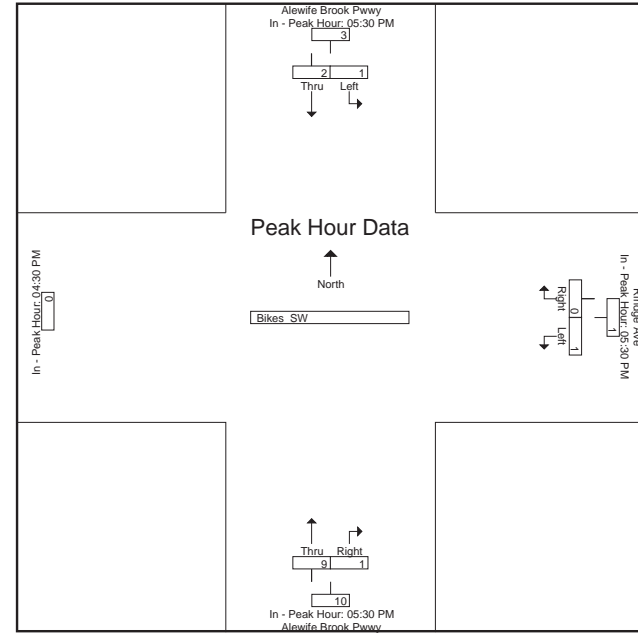
Peak Hour for Each Approach Begins at:

	05:30 PM			05:30 PM			05:30 PM			04:30 PM		
+0 mins.	1	0	1	0	0	0	0	0	0	0	0	
+15 mins.	0	1	1	0	0	0	2	0	2	0	0	
+30 mins.	0	0	0	0	0	0	2	1	3	0	0	
+45 mins.	0	1	1	1	0	1	5	0	5	0	0	
Total Volume	1	2	3	1	0	1	9	1	10	0	0	
% App. Total	33.3	66.7		100	0		90	10				
PHF	.250	.500	.750	.250	.000	.250	.450	.250	.500		.000	

Accurate Counts
978-664-2565

N/S Street : Alewife Brook Parkway
E/W Street : Rindge Avenue
City/State : Cambridge, MA
Weather : Clear

File Name : 11810003
Site Code : 11810003
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : 'T'-Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 1

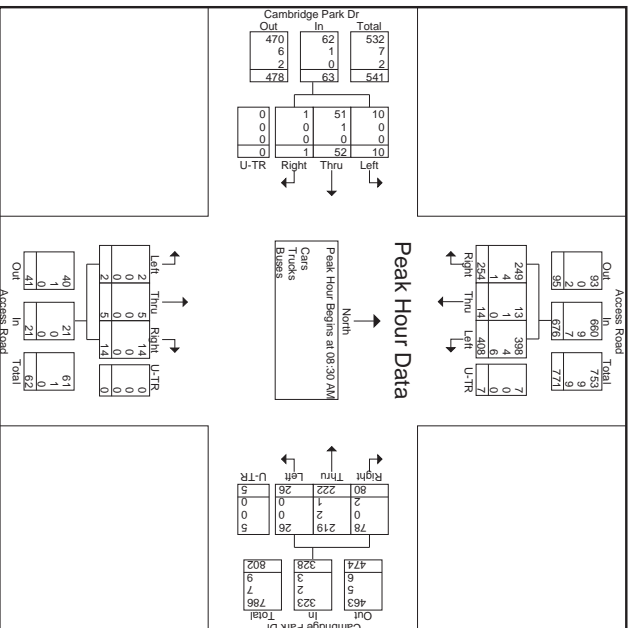
Start Time	Access Road			Cambridge Park Dr			Access Road			Cambridge Park Dr			Int. Total		
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right			
07:30 AM	131	17	36	0	2	33	20	1	0	0	4	8	0	0	261
07:45 AM	104	19	35	2	4	35	36	0	1	1	4	5	0	0	257
Total	235	36	71	2	6	68	56	1	1	1	5	13	0	0	518
08:00 AM	81	19	40	5	4	47	34	3	0	0	5	9	0	0	259
08:15 AM	71	11	48	5	7	49	26	0	0	0	4	4	0	0	239
08:30 AM	77	5	55	3	7	57	23	1	0	0	3	8	0	0	253
08:45 AM	94	7	68	2	6	59	21	0	1	1	2	2	0	0	273
Total	323	42	211	11	24	212	104	4	1	1	13	25	0	0	1024
09:00 AM	118	1	71	0	10	61	23	4	1	1	4	0	0	0	310
09:15 AM	119	1	60	2	3	45	13	0	0	0	0	0	0	0	264
Grand Total	795	80	413	15	43	386	196	9	3	3	19	42	0	0	2116
Apprch %	61	6.1	31.7	1.2	6.8	60.9	30.9	1.4	4.7	29.7	65.6	2	0	0	20.9
Total %	37.6	3.8	19.5	0.7	2	18.2	9.3	0.4	0.1	0.9	4.3	0.9	0	0	1.1
% Cars	777	76	405	15	43	381	191	9	9	3	17	42	0	0	222
% Trucks	95	95	98.1	100	100	98.7	97.4	100	100	100	89.5	100	0	0	97.7
% Buses	7	1	7	0	0	4	0	0	0	0	1	0	0	0	2
% Trucks	0.9	1.2	1.7	0	0	0	0	0	0	0	5.3	0	0	0	4.4
% Buses	1.1	3	1	0	0	1	5	0	0	0	1	0	0	0	1.1
% Buses	1.4	3.8	0.2	0	0	0.3	2.6	0	0	0	5.3	0	0	0	2.3

Start Time	Access Road			Cambridge Park Dr			Access Road			Cambridge Park Dr			Int. Total		
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right			
08:30 AM	77	55	3	140	7	57	23	1	88	0	3	8	0	0	253
08:45 AM	94	7	68	2	171	10	61	23	4	98	1	4	0	4	12
09:00 AM	118	1	71	0	190	3	45	13	61	1	1	0	0	6	16
09:15 AM	119	1	60	2	182	3	45	13	61	1	0	0	0	21	21
Total Volume	408	14	254	7	683	26	222	80	333	2	5	14	0	21	63
% App. Total	80.7	2	57.2	1	7.8	66.7	24	1.5	33.3	0	9.5	6.7	0	10	1100
% Trucks	857	500	894	883	899	650	910	870	849	500	417	438	0	477	887
% Cars	398	13	249	7	667	26	219	78	5	328	2	5	14	21	62
% Buses	97.5	92.9	98.0	100	97.7	100	98.6	97.5	100	98.5	100	100	0	100	1078
% Trucks	4	1	4	0	9	0	2	0	0	0	0	0	0	0	98.4
% Buses	1.0	7.1	1.6	0	1.3	0	0.9	0	0.6	0	0	0	0	1	1.2
% Trucks	6	1	1	0	7	0	1	2	3	0	0	0	0	0	1.6
% Buses	1.5	0	0.4	0	1.0	0	0.5	2.5	0.9	0	0	0	0	0	10
% Buses	0	0	0	0	0	0	0	0	0.9	0	0	0	0	0	0.9

Accurate Counts
978-664-2565

N/S Street : 'T'-Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 2



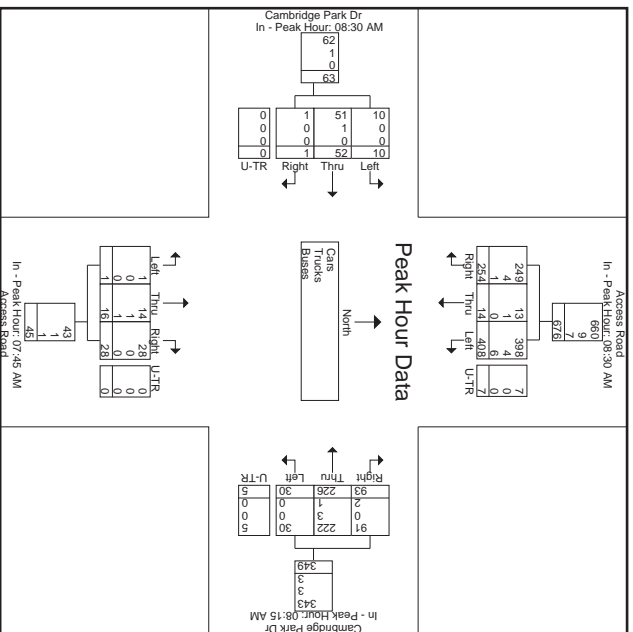
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1

Peak Hour for Each Approach Begins at:

	08:30 AM	08:45 AM	09:00 AM	09:15 AM	09:30 AM	09:45 AM	10:00 AM	10:15 AM	10:30 AM	10:45 AM	11:00 AM	11:15 AM	11:30 AM	11:45 AM	12:00 AM
-40 mins	77	5	55	3	140	49	26	0	82	4	5	0	10	0	14
+15 mins	94	7	68	2	171	7	57	23	1	86	0	3	9	0	12
+30 mins	118	1	71	0	190	6	59	21	0	86	0	10	0	0	16
+45 mins	119	1	60	2	182	3	45	13	4	98	1	4	0	0	21
Total Volume	408	14	254	7	683	30	226	93	5	334	1	16	28	0	63
% App. Total	50.7	2	37.2	1	68.3	8.5	63.8	26.3	1.4	81.4	2.2	35.6	62.2	0	15.9
PHE	857	500	894	883	899	650	910	870	849	500	417	438	0	477	887
Cars	398	13	249	7	667	26	219	78	5	328	2	5	14	21	62
Trucks	4	1	4	0	9	0	2	0	0	0	0	0	0	0	98.4
Buses	6	1	1	0	7	0	1	2	3	0	0	0	0	0	1.6
% Trucks	1.0	7.1	1.6	0	1.3	0	0.9	0	0.6	0	0	0	0	0	1.9
% Buses	6	1	1	0	7	0	1	2	3	0	0	0	0	0	1.6
% Buses	1.5	0	0.4	0	1.0	0	0.5	2.5	0.9	0	0	0	0	0	1.0
% Buses	0	0	0	0	0	0	0	0	0.9	0	0	0	0	0	0.9

Accurate Counts
978-664-2565

% Buses	6	0	1	0	0	7	0	1	2	0	3	0	1	1	0	0	0	0	0
% Buses	1.5	0	0.4	0	0	1.7	0	0.4	2.2	0	0.8	0	6.2	0	0	0	0	0	0



Accurate Counts
978-664-2565

N/S Street : T-Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 1

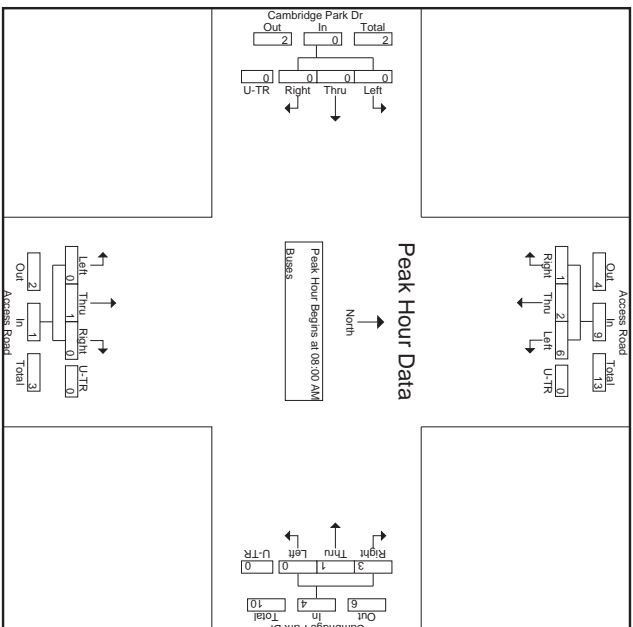
Start Time	Access Road From North				Cambridge Park Dr From East				Access Road From South				Cambridge Park Dr From West				Inc. Total	
	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR		
07:30 AM	3	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	6
07:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	6
Total	3	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	12
08:00 AM	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3
08:15 AM	2	1	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	4
08:30 AM	3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	4
08:45 AM	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3
Total	6	2	1	0	0	0	1	3	0	1	0	0	0	0	0	0	0	14
09:00 AM	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2
09:15 AM	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1
Grand Total	11	3	1	0	0	0	1	5	0	1	0	0	0	0	0	0	0	23
Appch %	73.3	20	6.7	0	0	0	16.7	83.3	0	0	0	0	0	100	0	0	0	0
Total %	47.8	13	4.3	0	0	0	21.7	0	0	4.3	0	0	0	4.3	0	0	0	0

Start Time	Access Road From North				Cambridge Park Dr From East				Access Road From South				Cambridge Park Dr From West				Inc. Total	
	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR		
08:00 AM	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3
08:15 AM	2	1	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	4
08:30 AM	3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	4
08:45 AM	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3
Total Volume	6	2	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	14
% App. Total	66.7	22.2	11.1	0	0	0	25	75	0	100	0	0	0	0	0	0	0	0
PHF	500	500	250	.000	.000	.750	.000	.500	.000	.250	.000	.000	.250	.000	.000	.000	.000	.875

Accurate Counts
978-664-2565

N/S Street : 'T' Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 2



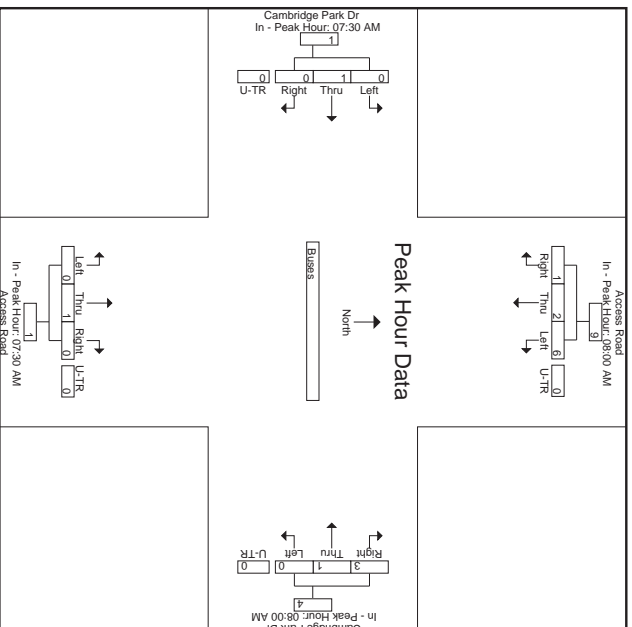
Peak Hour Analysis: From 07:30 AM to 09:15 AM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	08:00 AM	08:30 AM	07:30 AM	07:30 AM	07:30 AM	07:30 AM
-40 mins:	0	1	0	2	0	0
+15 mins:	2	1	0	0	0	0
+30 mins:	3	0	0	0	0	0
+45 mins:	1	0	0	1	0	0
Total Volume	6	2	1	3	1	1
% App. Total	66.7	22.2	11.1	0	100	0
HH	.500	.500	.250	.000	.250	.000

Accurate Counts
978-664-2565

N/S Street : 'T' Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : 'T'-Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 1

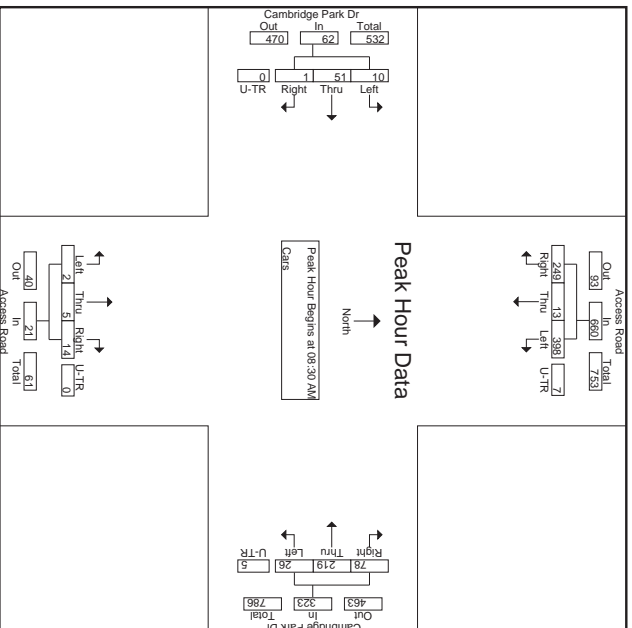
Start Time	Access Road				Cambridge Park Dr				Access Road				Cambridge Park Dr				Imp. Total
	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	
07:30 AM	127	16	35	0	2	33	19	1	0	0	8	0	3	7	0	0	252
07:45 AM	102	19	35	2	4	34	56	0	1	1	4	5	0	6	0	0	252
Total	229	35	70	2	6	67	55	1	1	1	5	13	0	13	0	0	504
08:00 AM	81	18	38	5	4	47	32	3	0	0	4	9	0	9	0	0	252
08:15 AM	69	10	48	1	7	48	26	0	0	0	3	6	0	3	12	0	233
08:30 AM	74	5	55	3	7	56	23	1	0	0	3	8	0	10	0	0	248
08:45 AM	92	6	66	2	6	58	20	0	1	1	1	2	0	9	0	0	266
Total	316	39	207	11	24	209	101	4	1	1	11	25	0	40	0	0	999
09:00 AM	116	1	71	0	10	60	22	4	1	1	1	4	0	14	1	0	306
09:15 AM	116	1	57	2	2	57	13	0	0	0	0	0	0	18	0	0	258
Grand Total	777	76	405	15	43	381	191	9	3	3	17	42	0	85	1	0	2067
Appph %	61	6	31.8	1.2	6.9	61.1	30.6	1.4	4.8	4.8	27.4	67.7	0	78.7	0.9	0	0
Total %	37.6	3.7	19.6	0.7	2.1	18.4	9.2	0.4	0.1	0.1	0.8	2	0	4.1	0	0	0

Start Time	Access Road				Cambridge Park Dr				Access Road				Cambridge Park Dr				Imp. Total
	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	
08:30 AM	74	5	55	3	7	56	23	1	87	0	3	8	0	0	0	0	248
08:45 AM	92	6	66	2	6	58	20	2	166	1	2	0	0	4	0	0	266
09:00 AM	116	1	71	0	10	60	22	4	96	1	1	4	0	6	0	0	306
09:15 AM	116	1	57	2	2	45	13	0	61	0	0	0	0	3	18	0	258
Total Volume	396	13	249	7	26	219	78	5	328	0	5	14	0	21	0	0	1078
% App. Total	59.7	1.9	37.3	1	7.9	66.8	23.8	1.5	7.9	0	23.8	66.7	0	16.1	82.3	1.6	0
PHF	.858	.542	.877	.883	.887	.650	.913	.848	.313	.854	.500	.417	.438	.000	.477	.833	.738

Accurate Counts
978-664-2565

N/S Street : 'T'-Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 2



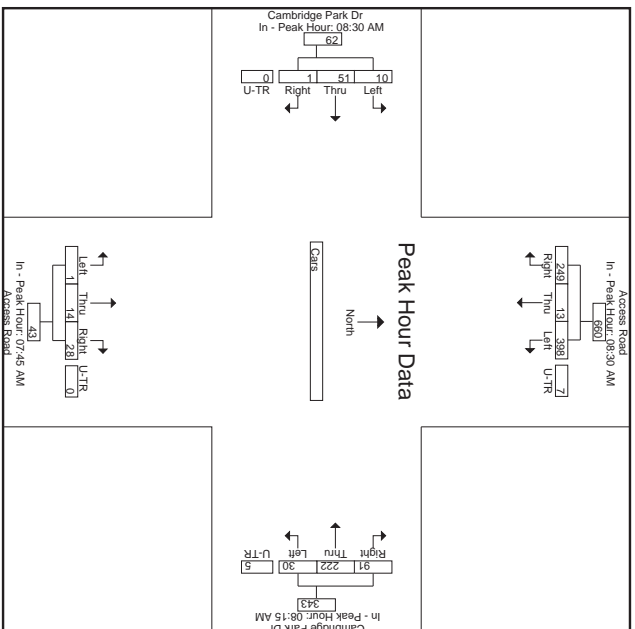
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	08:30 AM				08:15 AM				07:45 AM				08:30 AM			
-40 mins	74	5	55	3	137	48	26	0	81	4	5	0	10	0	0	13
+15 mins	92	6	66	2	166	56	23	1	87	9	0	13	9	0	12	
+30 mins	116	1	71	0	188	58	20	2	84	6	0	9	1	1	16	
+45 mins	116	1	57	2	176	60	22	4	96	3	8	0	11	3	18	
Total Volume	396	13	249	7	667	30	222	91	348	0	14	28	0	43	62	
% App. Total	59.7	1.9	37.3	1	8.6	63.8	26.1	1.2	2.3	37.6	65.1	0	16.1	82.3	1.6	0
PHF	.858	.542	.877	.883	.887	.750	.925	.875	.313	.906	.250	.875	.778	.000	.827	.833

Accurate Counts
978-664-2565

N/S Street : 'T'-Access Road
E/W Street: Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : 'T'-Access Road
E/W Street: Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 1

Groups Printed - Trucks

Start Time	Access Road From North				Cambridge Park Dr From East				Access Road From South				Cambridge Park Dr From West				Int. Total
	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	
07:30 AM	1	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0
07:45 AM	2	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0
Total	3	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0
08:00 AM	0	0	0	2	0	0	0	0	0	0	0	0	0	1	0	0	0
08:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
08:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
08:45 AM	1	1	1	1	0	0	0	0	0	0	0	0	1	2	0	0	0
Total	1	1	1	3	0	0	0	0	0	0	0	0	1	2	0	0	0
09:00 AM	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
09:15 AM	2	0	0	3	0	0	0	0	0	0	0	0	0	0	0	0	0
Grand Total	7	1	1	7	0	0	0	0	0	0	0	0	2	4	0	0	0
Appch %	46.7	6.7	6.7	46.7	0	0	0	0	0	0	0	0	33.3	66.7	0	0	0
Total %	26.9	3.8	3.8	26.9	0	0	0	0	0	0	0	0	7.7	15.4	0	0	0

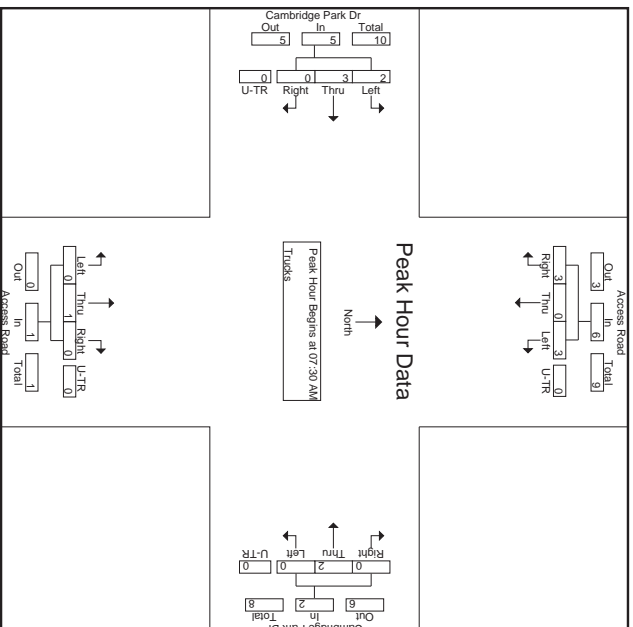
Start Time	Access Road From North				Cambridge Park Dr From East				Access Road From South				Cambridge Park Dr From West				Int. Total
	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	
07:30 AM	1	0	1	0	0	0	0	0	0	0	0	0	1	0	0	0	1
07:45 AM	2	0	0	0	0	1	0	0	0	0	0	0	0	2	0	0	2
08:00 AM	0	0	2	0	0	0	0	0	0	0	0	0	1	0	0	0	1
08:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Total Volume	3	0	3	0	0	1	0	0	0	0	0	0	2	3	0	0	5
% App. Total	50	0	50	0	0	100	0	0	0	0	0	0	100	60	0	0	14
PHF	.375	.000	.375	.000	.000	.500	.000	.000	.000	.250	.000	.000	.250	.375	.000	.000	.625

Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1
 Peak Hour for Entire Intersection Begins at 07:30 AM

Accurate Counts
978-664-2565

N/S Street : 'T' Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 2



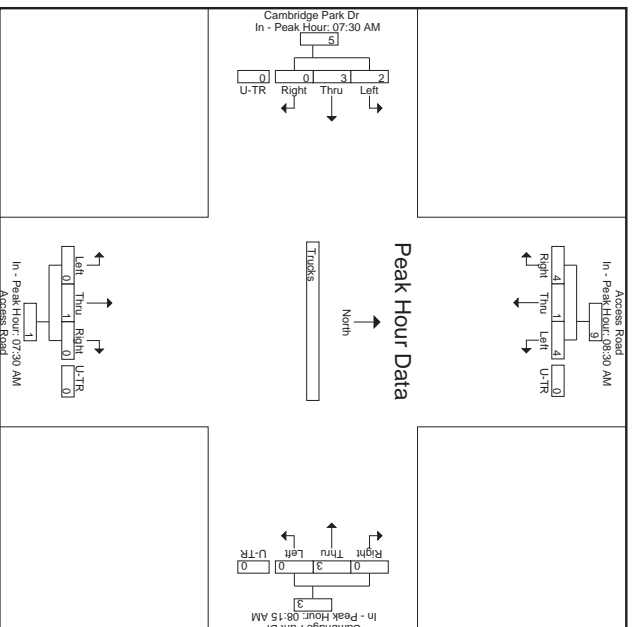
Peak Hour Analysis: From 07:30 AM to 09:15 AM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	08:30 AM	08:15 AM	07:30 AM	07:30 AM	07:30 AM	07:30 AM	07:30 AM	07:30 AM	07:30 AM	07:30 AM	07:30 AM
-40 mins:	0	0	0	0	0	0	0	0	0	0	0
+15 mins:	1	1	0	0	0	0	0	0	0	0	2
+30 mins:	0	0	0	0	0	0	0	0	0	0	1
+45 mins:	2	5	0	0	0	0	0	0	0	0	1
Total Volume:	444	9	0	0	0	0	0	0	0	0	5
% AFD: Total	44.4	44.4	0	0	0	0	0	0	0	0	0
HH	.500	.250	.333	.000	.450	.000	.750	.000	.000	.250	.000

Accurate Counts
978-664-2565

N/S Street : 'T' Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : 'T'-Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 1

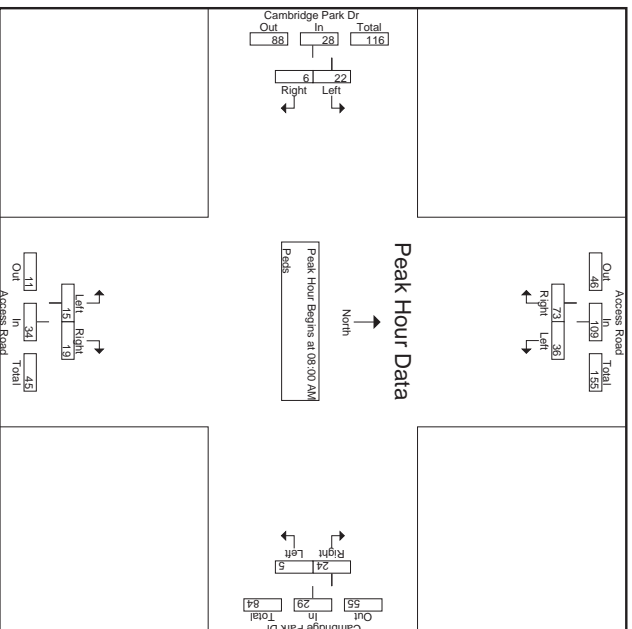
Start Time	Access Road			Cambridge Park Dr			Access Road			Cambridge Park Dr			Int. Total
	From North	WB	SB	From East	NB	SB	From South	WB	EB	From West	NB	SB	
07:30 AM	7	13	0	0	3	0	0	4	4	4	4	2	33
07:45 AM	9	9	2	2	10	1	10	1	10	7	3	1	41
Total	16	22	2	2	13	1	10	10	10	11	7	3	74
08:00 AM	5	15	2	2	6	2	2	8	8	5	5	1	44
08:15 AM	12	16	3	3	7	2	2	3	3	4	4	1	48
08:30 AM	14	18	0	0	4	1	1	5	5	5	5	1	48
08:45 AM	5	24	0	0	7	7	3	3	3	8	8	3	60
Total	36	73	5	5	24	15	15	19	19	22	22	6	200
09:00 AM	5	8	0	0	3	6	6	6	6	6	6	0	34
09:15 AM	13	10	2	2	4	2	2	3	3	5	5	5	44
Grand Total	113	113	9	9	44	24	24	38	38	40	40	14	44
Appch %	38.3	61.7	17	17	83	38.7	61.3	61.3	61.3	74.1	74.1	25.9	352
Total %	19.9	32.1	2.6	2.6	12.5	6.8	6.8	10.8	10.8	11.4	11.4	4	4

Start Time	Access Road			Cambridge Park Dr			Access Road			Cambridge Park Dr			Int. Total
	From North	WB	SB	From East	NB	SB	From South	WB	EB	From West	NB	SB	
08:00 AM	5	15	2	6	8	2	8	10	10	5	5	1	6
08:15 AM	12	16	3	7	10	2	2	3	3	4	4	1	5
08:30 AM	14	18	0	4	4	1	1	5	5	8	8	1	6
08:45 AM	5	24	0	7	7	10	19	3	3	13	13	3	11
Total Volume	36	73	5	24	29	15	19	34	34	22	22	6	60
% App. Total	33	67	17.2	82.8	44.1	44.1	55.9	78.6	78.6	21.4	21.4	6	28
PHF	.643	.760	.852	.417	.857	.725	.375	.594	.654	.688	.688	.500	636

Accurate Counts
978-664-2565

N/S Street : 'T'-Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 2



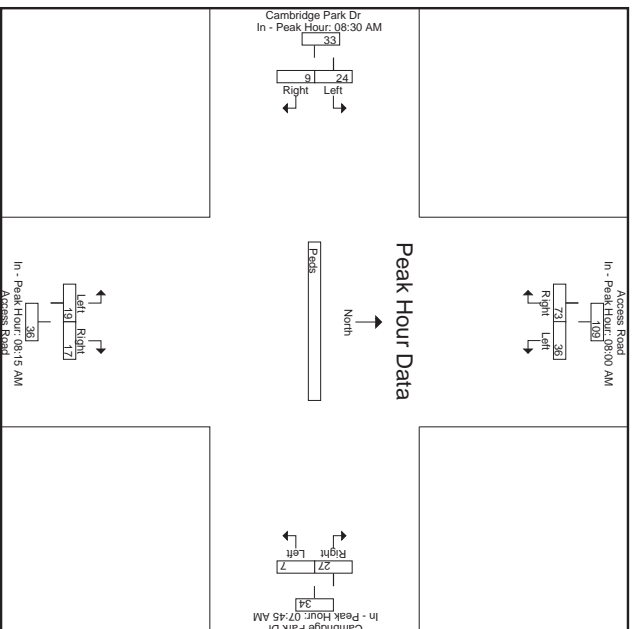
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1
Peak Hour for Each Approach Begins at

	08:00 AM	07:45 AM	08:15 AM	08:30 AM
-40 mins.	5	15	20	5
+15 mins.	12	28	28	6
+30 mins.	14	18	32	10
+45 mins.	5	24	29	7
Total Volume	36	73	109	34
% App. Total	33	67	109	20.6
PHF	.643	.760	.852	.675

Accurate Counts
978-664-2565

N/S Street : 'T' Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : 'T' Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 1

Start Time	Access Road			Cambridge Park Dr			Access Road			Cambridge Park Dr			Int. Total
	From North	Thru	Right	From East	Thru	Right	From South	Thru	Right	From West	Thru	Right	
07:30 AM	1	0	0	0	2	1	0	0	0	3	0	0	7
07:45 AM	2	0	0	0	2	1	0	0	0	3	0	0	10
Total	3	0	0	0	4	2	0	0	0	6	0	0	17
08:00 AM	1	0	0	0	1	0	0	0	0	3	1	0	7
08:15 AM	1	1	0	2	2	1	0	0	0	4	4	0	15
08:30 AM	3	0	0	0	2	0	0	0	0	6	3	0	18
08:45 AM	0	0	0	2	2	2	0	0	0	6	3	0	18
Total	5	1	0	7	7	3	0	0	0	15	8	0	47
09:00 AM	1	0	0	0	1	0	0	0	0	1	2	0	10
09:15 AM	0	0	0	0	1	0	0	0	0	0	0	0	2
Grand Total	9	1	0	13	13	4	0	0	0	21	12	0	76
Approch %	34.6	3.8	0	76.5	23.5	5.3	0	0	0	63.6	36.4	0	0
Total %	11.8	1.3	0	17.1	5.3	0	0	0	0	27.6	15.8	0	0

Start Time	Access Road			Cambridge Park Dr			Access Road			Cambridge Park Dr			Int. Total
	From North	Thru	Right	From East	Thru	Right	From South	Thru	Right	From West	Thru	Right	
07:45 AM	2	0	3	2	0	2	0	0	0	1	2	0	10
08:00 AM	1	0	2	1	0	1	0	0	0	3	1	0	7
08:15 AM	1	1	2	2	1	3	0	0	0	4	4	0	8
08:30 AM	3	0	4	2	0	2	0	0	0	6	3	0	18
Total	7	1	10	7	1	8	0	0	0	14	10	0	24
% App. Total	38.9	5.6	55.6	87.5	12.5	8	0	0	0	58.3	41.7	0	50
PHF	.583	.250	.625	.643	.000	.667	.000	.000	.000	.583	.625	.000	.694

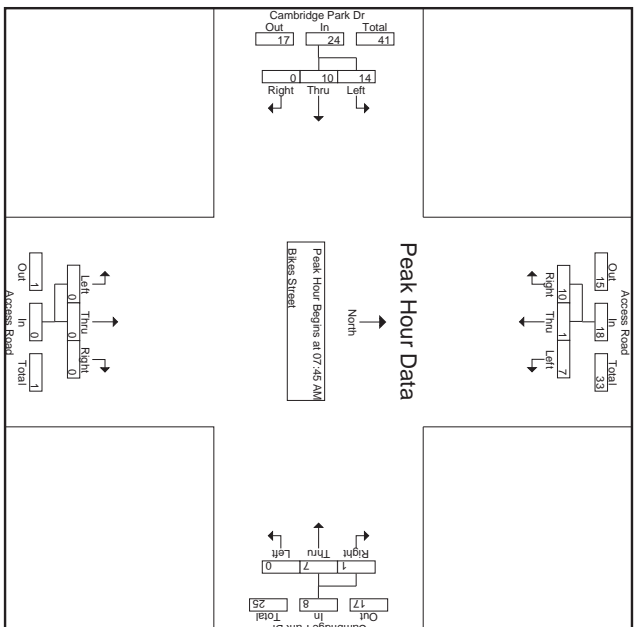
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1

Peak Hour for Entire Intersection Begins at 07:45 AM

Accurate Counts
978-664-2565

N/S Street : 'T'-Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 2



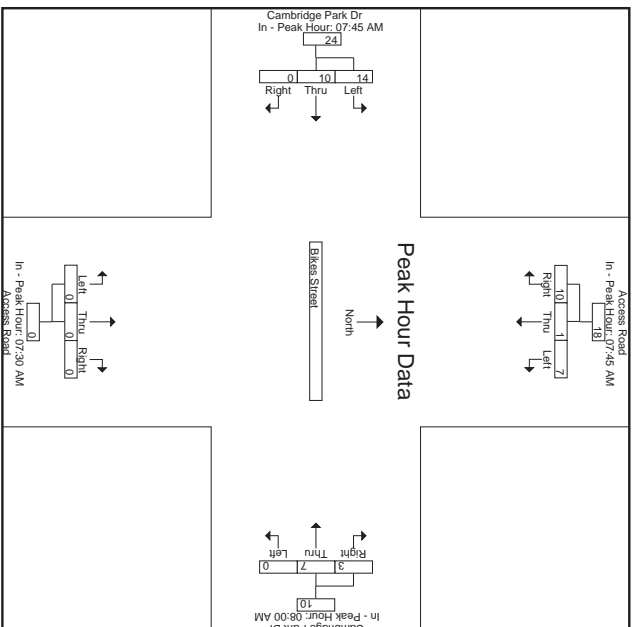
Peak Hour Analysis: From 07:30 AM to 09:15 AM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	07:45 AM	08:00 AM	07:30 AM	07:45 AM
+0 mins.	2	0	3	2
+15 mins.	1	0	1	1
+30 mins.	1	1	2	4
+45 mins.	3	4	2	6
Total Volume	7	5	8	14
% ADPT Total	38.9	5.6	53.6	11.7
FTH	.583	.250	.625	.625

Accurate Counts
978-664-2565

N/S Street : 'T'-Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : 'T' Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 1

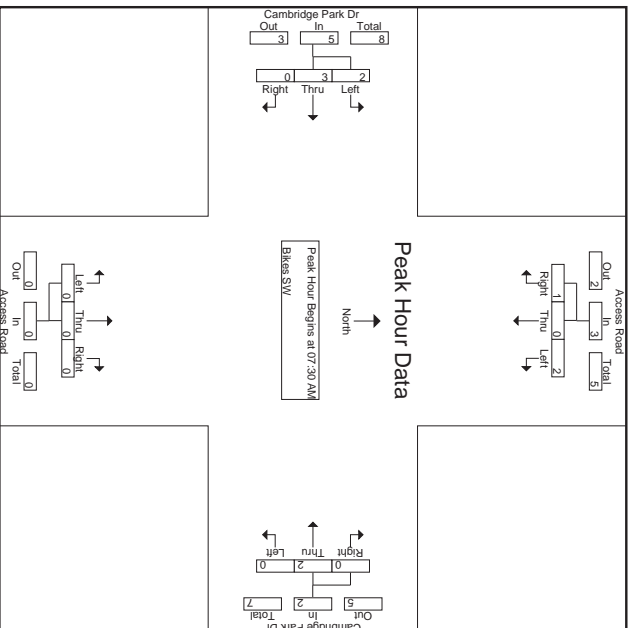
Start Time	Access Road From North			Cambridge Park Dr From East			Access Road From South			Cambridge Park Dr From West			Int. Total
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	
07:30 AM	1	0	0	0	0	0	0	0	0	1	2	0	4
07:45 AM	0	0	1	0	0	0	0	0	0	1	0	0	3
Total	1	0	1	0	0	0	0	0	0	2	2	0	7
08:00 AM	1	0	0	0	0	0	0	0	0	0	1	0	2
08:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	1
08:30 AM	2	0	0	0	0	0	0	0	0	1	0	0	3
08:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
Total	3	0	0	0	0	0	0	0	0	3	1	0	9
09:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	2
09:15 AM	1	0	0	0	0	0	0	0	0	0	1	0	2
Grand Total	5	0	0	0	0	0	0	0	0	5	4	0	20
Approch %	83.3	0	0	0	0	0	0	0	0	55.6	44.4	0	0
Total %	25	0	0	0	0	0	0	0	0	25	20	0	0

Start Time	Access Road From North			Cambridge Park Dr From East			Access Road From South			Cambridge Park Dr From West			Int. Total
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	
07:30 AM	1	0	0	0	0	0	0	0	0	1	2	0	4
07:45 AM	0	0	1	0	0	0	0	0	0	0	1	0	1
08:00 AM	1	0	0	0	0	0	0	0	0	0	0	0	2
08:15 AM	0	0	0	0	1	0	0	0	0	0	0	0	1
Total	2	0	1	0	2	0	0	0	0	2	3	0	5
Total Volume	667	0	333	0	100	0	0	0	0	40	60	0	10
% Appr. Total	.800	.000	.250	.750	.000	.500	.000	.000	.000	.500	.375	.000	.625

Accurate Counts
978-664-2565

N/S Street : 'T' Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

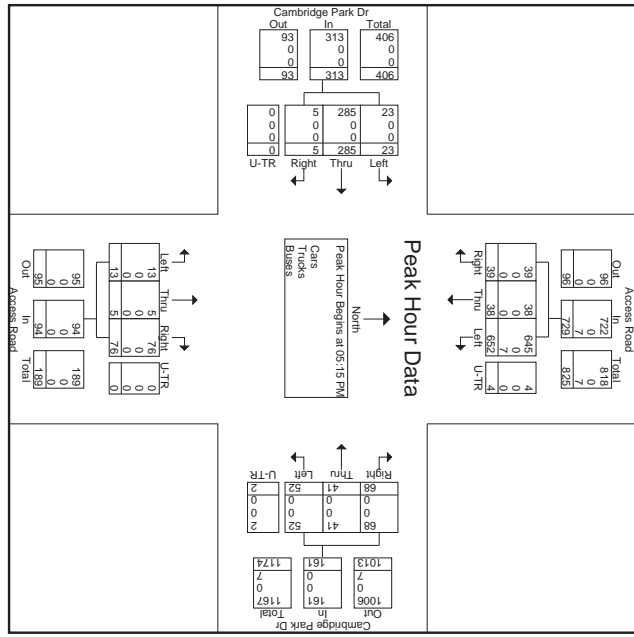
File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 2



Peak Hour Analysis from 07:30 AM to 09:15 AM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	07:30 AM	08:15 AM	07:30 AM	07:30 AM
-10 mins.	0	1	1	0
+15 mins.	1	0	0	0
+30 mins.	0	0	0	0
+45 mins.	0	0	0	0
Total Volume	2	2	2	0
% Appr. Total	3	4	4	0
FHE	.375	.000	.250	.500

Accurate Counts
 978-664-2565

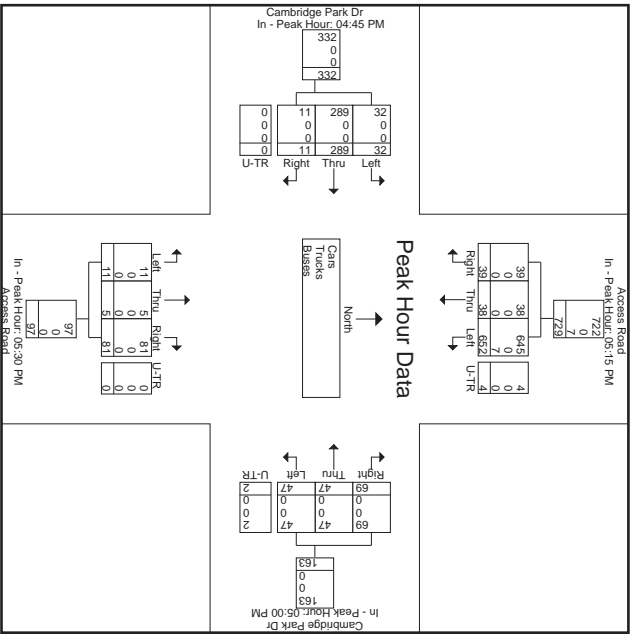


Peak Hour Analysis: From 04:30 PM to 06:15 PM - Peak 1 of 1
 Peak Hour for Each Approach Begins at:

	05:00 PM	05:30 PM	05:30 PM	04:45 PM															
-40 mins.	183	11	2	1	199	7	11	20	39	3	1	16	0	20	12	65	1	0	78
+15 mins.	144	6	21	0	171	10	8	18	37	5	1	24	0	30	8	79	7	0	84
+30 mins.	129	9	2	2	149	13	14	14	40	0	1	19	0	21	8	71	7	0	80
+45 mins.	121	12	7	7	214	17	15	17	42	2	2	22	0	20	4	74	2	0	80
Total Volume	632	38	30	4	733	47	44	60	163	113	5	81	0	97	32	287	17	0	352
% App. Total	80.0	5.2	3.8	0.5	92.5	6.2	5.8	7.6	20.8	14.3	0.6	10.3	0	12.5	4.0	36.3	3.3	0	44.3
ETH	.800	.202	.463	.500	.856	.077	.753	.863	.580	.842	.530	.624	.000	.808	.667	.915	.305	.000	.883
% Cars	98.5	100	100	100	99	100	100	100	100	100	100	100	100	100	100	100	100	100	100
Trucks	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0

Accurate Counts
 978-664-2565

Buses	7	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
% Buses	1.1	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0



Accurate Counts
978-664-2565

N/S Street : 'T'-Access Road
E/W Street: Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 1

Start Time	Access Road				Cambridge Park Dr				Access Road				Cambridge Park Dr				In. Total
	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	
04:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
04:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Total	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
05:00 PM	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2
05:15 PM	3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3
05:30 PM	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2
05:45 PM	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1
Total	8	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	8
06:00 PM	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1
06:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Grand Total	9	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	10
Appph %	100	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Total %	90	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0

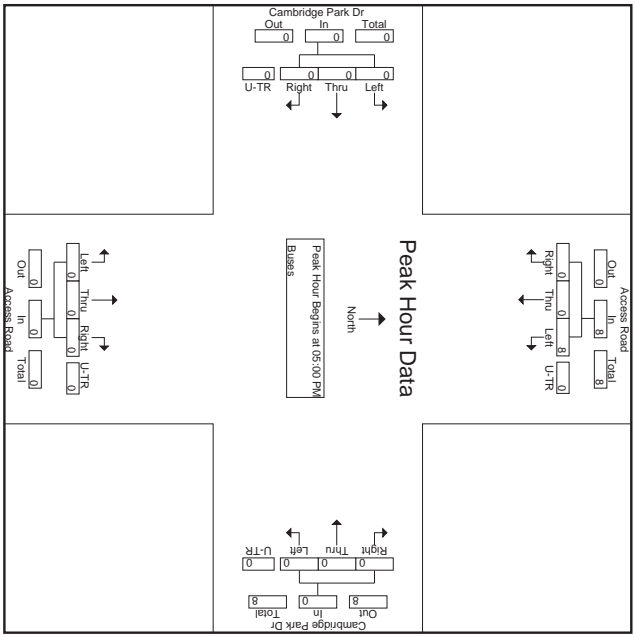
Start Time	Access Road				Cambridge Park Dr				Access Road				Cambridge Park Dr				In. Total
	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	
05:00 PM	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2
05:15 PM	3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3
05:30 PM	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2
05:45 PM	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1
Total Volume	8	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	8
% App. Total	100	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
PHF	.667	.000	.000	.000	.667	.000	.000	.000	.000	.000	.000	.000	.000	.000	.000	.000	.667

Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1
Peak Hour for Entire Intersection Begins at 05:00 PM

Accurate Counts
978-664-2565

N/S Street : 'T'-Access Road
E/W Street: Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 2



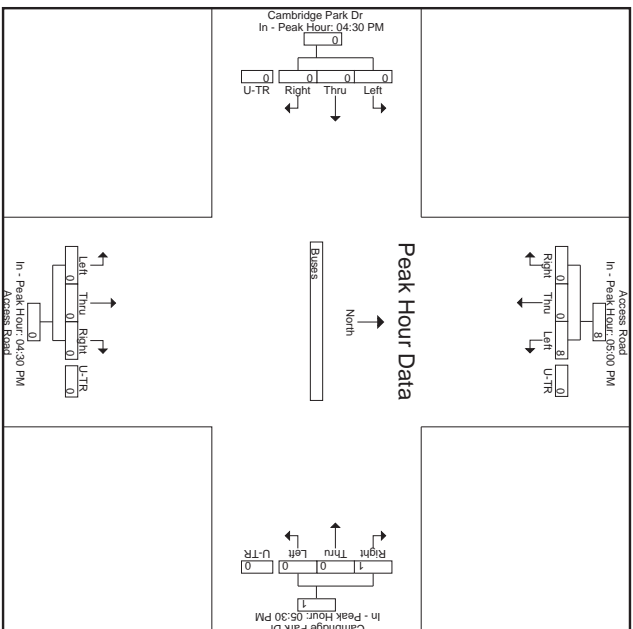
Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1
Peak Hour for Busb Approach Begins at:

	05:00 PM	05:30 PM	05:45 PM	06:00 PM	PHF
-40 mins	0	0	0	0	
+15 mins	2	0	0	0	
+30 mins	3	0	0	0	
+45 mins	1	0	0	0	
Total Volume	8	0	0	0	
% App. Total	100	0	0	0	
PHF	.667	.000	.000	.000	.667

Accurate Counts
978-664-2565

N/S Street : 'T'-Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : 'T'-Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 1

Start Time	Access Road				Cambridge Park Dr From East				Access Road				Cambridge Park Dr From West				Int. Total
	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	
04:30 PM	104	4	6	2	6	15	15	3	0	0	1	11	12	55	2	0	256
04:45 PM	90	5	5	1	6	13	19	1	2	2	3	16	12	65	0	0	239
Total	194	9	11	3	12	28	34	4	2	2	4	27	24	120	3	0	475
05:00 PM	175	6	3	3	7	11	20	1	1	0	0	12	8	79	7	0	333
05:15 PM	182	11	2	1	10	8	18	1	4	2	17	0	8	71	1	0	336
05:30 PM	142	6	21	0	13	13	14	0	3	1	16	0	4	74	2	0	309
05:45 PM	128	9	9	2	17	15	17	0	5	1	24	0	8	66	1	0	302
Total	627	32	35	6	47	47	69	2	13	4	69	0	28	290	11	0	1280
06:00 PM	193	12	7	1	12	5	19	1	1	1	19	0	3	74	1	0	349
06:15 PM	172	14	4	0	13	6	18	1	2	2	22	0	1	54	0	0	309
Grand Total	1186	67	57	10	84	86	140	8	18	11	137	0	56	538	15	0	2413
Apprch %	89.8	5.1	4.3	0.8	26.4	27	44	2.5	10.8	6.6	82.5	0	9.2	88.3	2.5	0	
Total %	49.2	2.8	2.4	0.4	3.5	3.6	5.8	0.3	0.7	0.5	5.7	0	2.3	22.3	0.6	0	

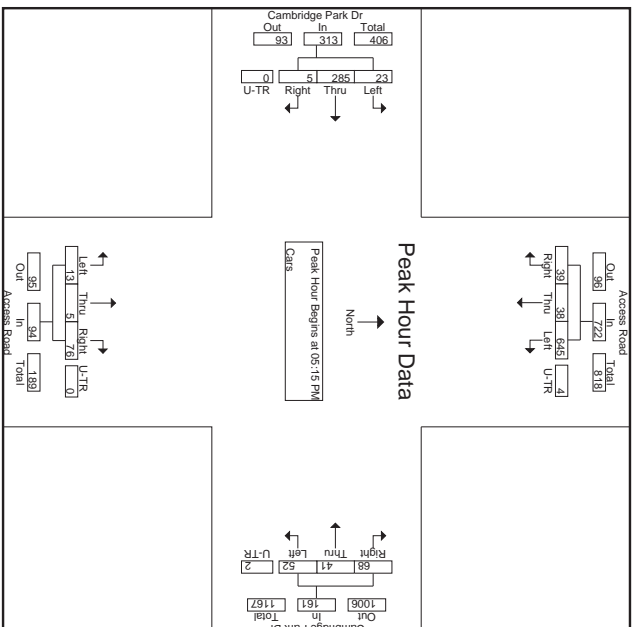
Start Time	Access Road From North				Cambridge Park Dr From East				Access Road From South				Cambridge Park Dr From West				Int. Total		
	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR			
05:15 PM	182	11	2	1	10	8	18	1	37	4	2	17	0	23	8	1	336		
05:30 PM	142	6	21	0	169	13	14	0	40	3	1	16	0	20	4	0	80		
05:45 PM	128	9	9	2	148	17	15	0	49	5	1	24	0	30	8	0	302		
06:00 PM	193	12	7	1	213	12	5	19	37	1	1	19	0	21	3	0	349		
Total Volume	645	38	39	4	726	52	41	68	163	13	5	76	0	94	23	285	5	1296	
% Appr. Total	88.8	5.2	5.4	0.6	31.9	25.2	41.7	1.2	63	13.8	5.3	80.9	0	7.3	91.1	1.6	0		
PHF	835	792	464	800	852	765	683	895	832	650	625	792	0	783	719	963	625	0	928

Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1
Peak Hour for Entire Intersection Begins at 05:15 PM

Accurate Counts
978-664-2565

N/S Street : 'T' Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 2



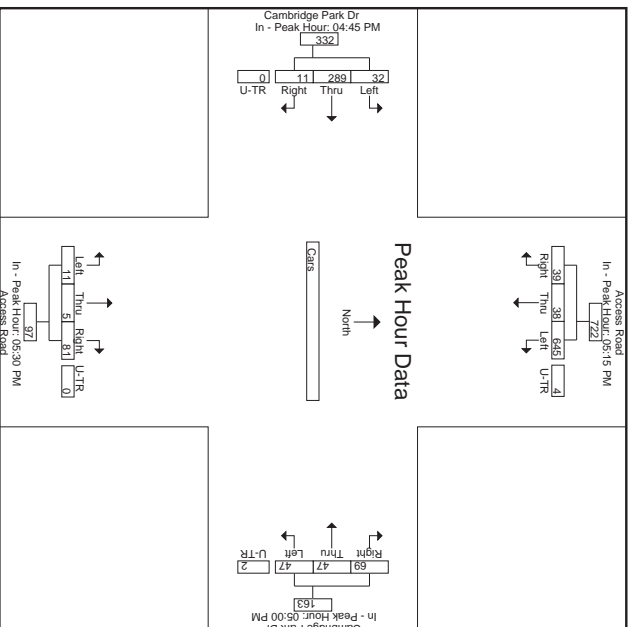
Peak Hour Analysis: From 04:30 PM to 06:15 PM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	05:15 PM	05:30 PM	05:45 PM	06:00 PM	06:15 PM	Total	% App. Total FHV
-40 mins-	102	11	2	1	196	7	.833
+15 mins-	132	6	21	0	169	10	.854
+30 mins-	138	9	2	2	148	13	.832
+45 mins-	103	12	7	1	123	17	.832
Total Volume	645	38	39	4	726	47	.832
% App. Total FHV	88.4	5.2	5.4	0.6	28.3	6.5	.832

Accurate Counts
978-664-2565

N/S Street : 'T' Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : 'T'-Access Road
E/W Street: Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 1

Start Time	Access Road				Cambridge Park Dr				Access Road				Cambridge Park Dr				
	From North		From South		From East		From West		From North		From South		From East		From West		
	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	
04:30 PM	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
04:45 PM	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Total	2	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
05:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
05:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
05:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
05:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Total	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
06:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
06:15 PM	1	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Grand Total	3	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1
Appch %	75	25	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Total %	60	20	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0

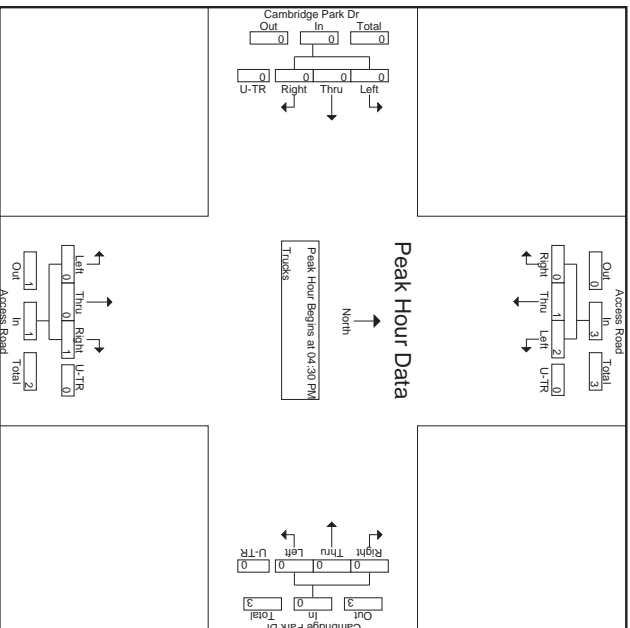
Start Time	Access Road				Cambridge Park Dr				Access Road				Cambridge Park Dr				
	From North		From South		From East		From West		From North		From South		From East		From West		
	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	Left	Thru	Right	U-TR	
04:30 PM	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
04:45 PM	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
05:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
05:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
05:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Total Volume	2	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
% App. Total	66.7	33.3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
PHF	.250	.250	.000	.000	.000	.000	.000	.000	.000	.250	.000	.250	.000	.000	.000	.000	.000

Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

Accurate Counts
978-664-2565

N/S Street : 'T'-Access Road
E/W Street: Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 2



Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

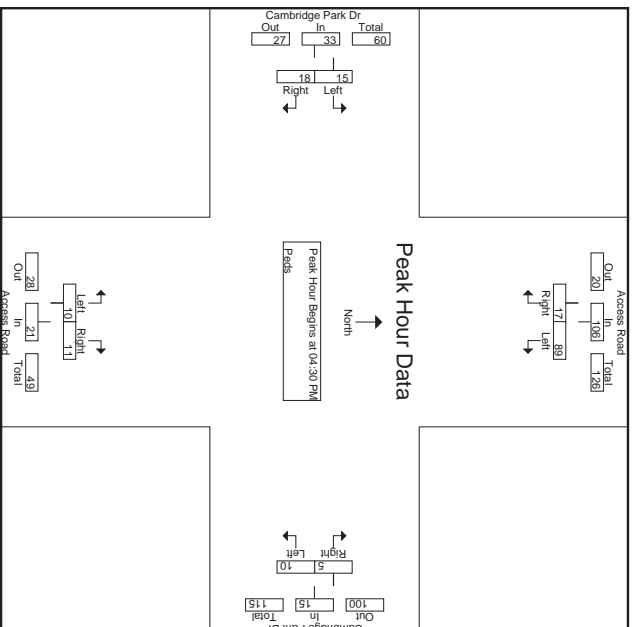
Peak Hour for Each Approach Begins at:

	04:30 PM	04:30 PM	04:30 PM	04:30 PM	04:30 PM	04:30 PM	04:30 PM
-40 mins	2	0	0	0	0	0	0
-15 mins	1	0	0	0	0	0	0
+30 mins	0	0	0	0	0	0	0
+45 mins	0	0	0	0	0	0	0
Total Volume	2	1	0	0	0	0	0
% App. Total	66.7	33.3	0.0	0.0	0.0	0.0	0.0
PHF	.250	.250	.000	.000	.375	.000	.000

Accurate Counts
978-664-2565

N/S Street : 'T' Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 2



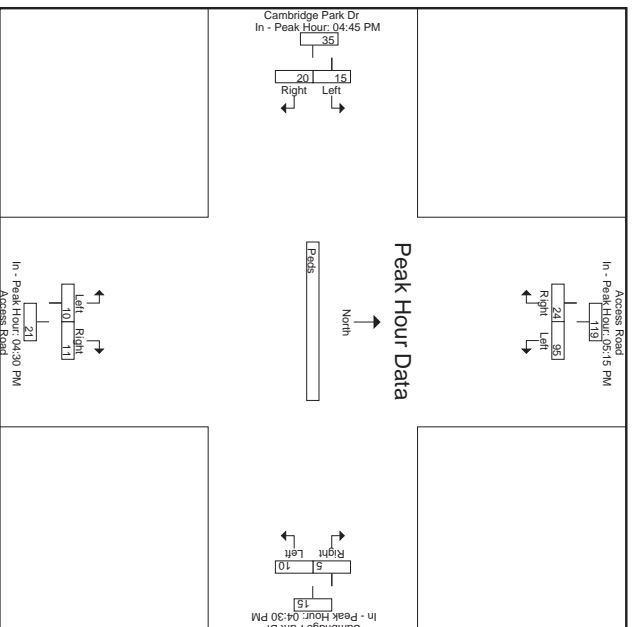
Peak Hour Analysis: From 04:30 PM to 06:15 PM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	03:15 PM	04:30 PM	04:30 PM	04:30 PM	04:45 PM	
-10 mins.	26	1	27	7	2	9
+15 mins.	33	11	44	7	0	0
+30 mins.	13	8	21	2	2	2
+45 mins.	23	4	22	1	4	4
Total Volume	798	24	119	10	15	15
% Appr. Total	79.8	2.02	66.7	66.7	47.6	47.6
FHE	.720	.585	.676	.667	33.3	47.6
				.57	.417	.417
						.550
						.477
						.625
						.875

Accurate Counts
978-664-2565

N/S Street : 'T' Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

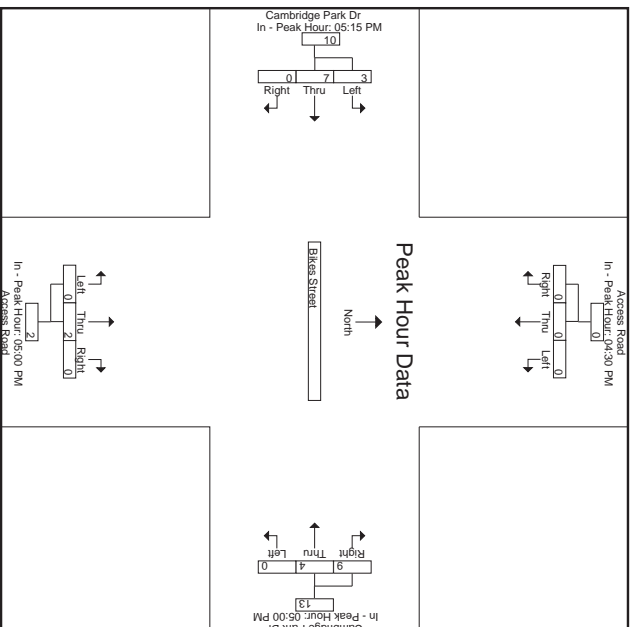
File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : 'T' Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : 'T' Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 1

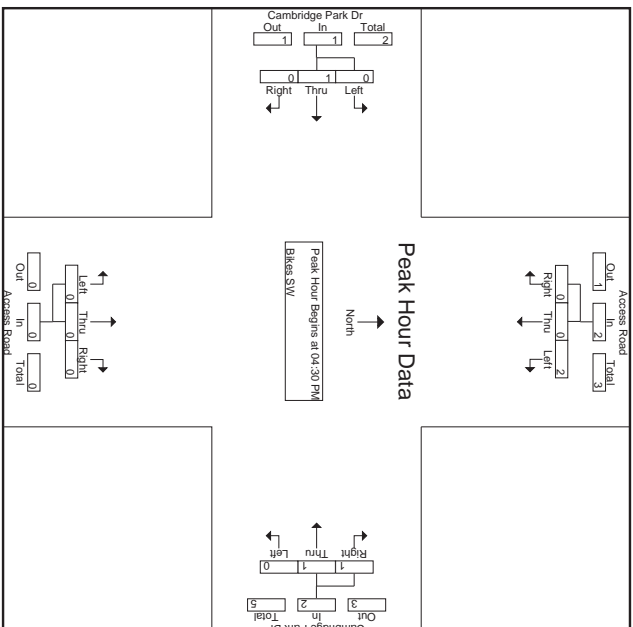
Start Time	Access Road						Cambridge Park Dr						Access Road						Cambridge Park Dr						Int. Total	
	From North			U-TR			From East			U-TR			From South			U-TR			From West			U-TR				
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right		
04:30 PM	2	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3
04:45 PM	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1
Total	2	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	4
05:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1
05:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
05:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
05:45 PM	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1
Total	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2
06:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
06:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Grand Total	2	0	0	0	0	0	0	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	6
Approch %	100	0	0	0	0	0	0	0	66.7	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Total %	33.3	0	0	0	0	0	0	0	33.3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0

Start Time	Access Road						Cambridge Park Dr						Access Road						Cambridge Park Dr						Int. Total		
	From North			U-TR			From East			U-TR			From South			U-TR			From West			U-TR					
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right		Left	Thru
04:30 PM	2	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3
04:45 PM	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1
05:00 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1
05:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Total Volume	2	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	5
% App. Total	100	0	0	0	0	0	0	0	50	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	
PHF	.250	.000	.000	.000	.000	.000	.000	.000	.250	.250	.250	.000	.500	.000	.000	.000	.000	.000	.000	.000	.000	.000	.000	.000	.000	.250	.417

Accurate Counts
978-664-2565

N/S Street : 'T' Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 2



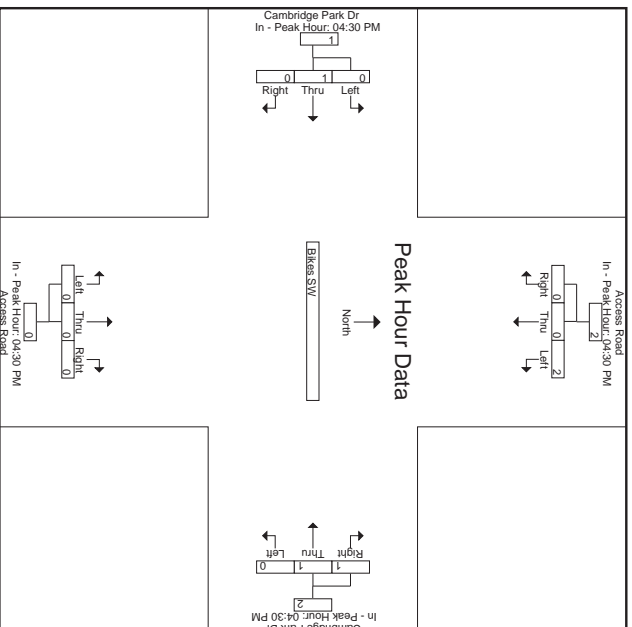
Peak Hour Analysis: From 04:30 PM to 06:15 PM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	04:30 PM	04:30 PM	04:30 PM	04:30 PM	04:30 PM	04:30 PM	04:30 PM
+0 mins.	2	0	0	1	0	0	0
+15 mins.	0	0	0	1	0	0	0
+30 mins.	0	0	0	0	0	0	0
+45 mins.	0	0	0	0	0	0	0
Total Volume	2	0	0	1	0	0	0
% ADP: Total	100	0	0	50	0	0	0
FHE	.250	.000	.000	.250	.250	.000	.000

Accurate Counts
978-664-2565

N/S Street : 'T' Access Road
E/W Street : Cambridge Park Drive
City/State : Cambridge, MA
Weather : Clear

File Name : 11810004
Site Code : 11810004
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 1

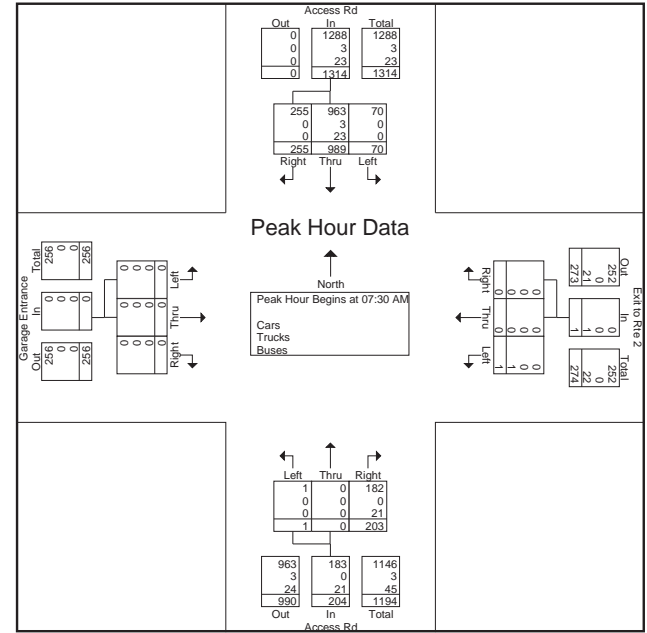
Start Time	Access Rd From North			Exit to Rte 2 From East			Access Rd From South			Garage Entrance From West			Int. Total
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	
07:30 AM	23	320	54	1	0	0	0	0	49	0	0	0	447
07:45 AM	22	236	48	0	0	0	0	0	53	0	0	0	359
Total	45	556	102	1	0	0	0	0	102	0	0	0	806
08:00 AM	14	231	73	0	0	0	1	0	50	0	0	0	369
08:15 AM	11	202	80	0	0	0	0	0	51	0	0	0	344
08:30 AM	16	222	57	0	0	0	0	0	38	0	0	0	333
08:45 AM	24	205	61	0	0	0	0	0	41	0	0	0	331
Total	65	860	271	0	0	0	1	0	180	0	0	0	1377
09:00 AM	17	168	39	0	0	1	2	0	33	0	0	0	260
09:15 AM	26	176	11	0	0	0	0	0	30	0	0	0	243
Grand Total	153	1760	423	1	0	1	3	0	345	0	0	0	2686
Apprch %	6.5	75.3	18.1	50	0	50	0.9	0	99.1	0	0	0	
Total %	5.7	65.5	15.7	0	0	0	0.1	0	12.8	0	0	0	
Cars	153	1709	423	0	0	0	2	0	304	0	0	0	2591
% Cars	100	97.1	100	0	0	0	66.7	0	88.1	0	0	0	96.5
Trucks	0	8	0	0	0	0	1	0	1	0	0	0	10
% Trucks	0	0.5	0	0	0	0	33.3	0	0.3	0	0	0	0.4
Buses	0	43	0	1	0	1	0	0	40	0	0	0	85
% Buses	0	2.4	0	100	0	100	0	0	11.6	0	0	0	3.2

Start Time	Access Rd From North				Exit to Rte 2 From East				Access Rd From South				Garage Entrance From West				Int. Total
	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 07:30 AM																	
07:30 AM	23	320	54	397	1	0	0	1	0	0	49	49	0	0	0	0	447
07:45 AM	22	236	48	306	0	0	0	0	0	0	53	53	0	0	0	0	359
08:00 AM	14	231	73	318	0	0	0	0	1	0	50	51	0	0	0	0	369
08:15 AM	11	202	80	293	0	0	0	0	0	0	51	51	0	0	0	0	344
Total Volume	70	989	255	1314	1	0	0	1	1	0	203	204	0	0	0	0	1519
% App. Total	5.3	75.3	19.4		100	0	0		0.5	0	99.5		0	0	0		
PHF	.761	.773	.797	.827	.250	.000	.000	.250	.250	.000	.958	.962	.000	.000	.000	.000	.850
Cars	70	963	255	1288	0	0	0	0	1	0	182	183	0	0	0	0	1471
% Cars	100	97.4	100	98.0	0	0	0	0	100	0	89.7	89.7	0	0	0	0	96.8
Trucks	0	3	0	3	0	0	0	0	0	0	0	0	0	0	0	0	3
% Trucks	0	0.3	0	0.2	0	0	0	0	0	0	0	0	0	0	0	0	0.2
Buses	0	23	0	23	1	0	0	1	0	0	21	21	0	0	0	0	45
% Buses	0	2.3	0	1.8	100	0	0	100	0	0	10.3	10.3	0	0	0	0	3.0

Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 2



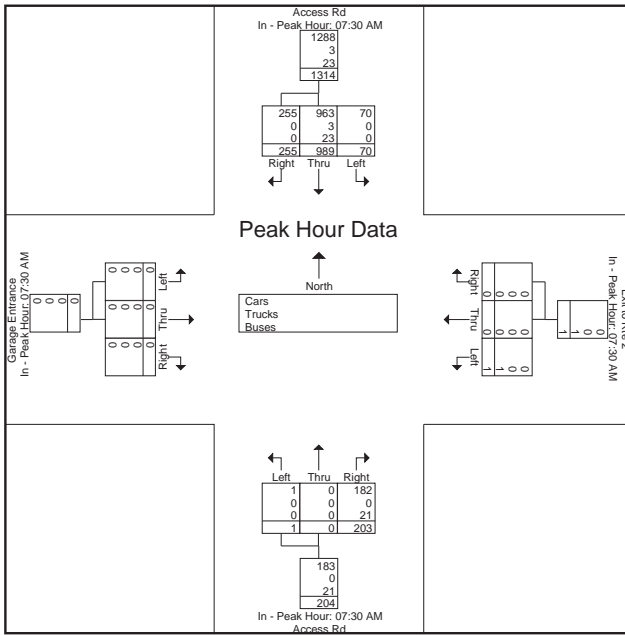
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	07:30 AM				07:30 AM				07:30 AM				07:30 AM				
+0 mins.	23	320	54	397	1	0	0	1	0	0	49	49	0	0	0	0	0
+15 mins.	22	236	48	306	0	0	0	0	0	0	53	53	0	0	0	0	0
+30 mins.	14	231	73	318	0	0	0	0	1	0	50	51	0	0	0	0	0
+45 mins.	11	202	80	293	0	0	0	0	0	0	51	51	0	0	0	0	0
Total Volume	70	989	255	1314	1	0	0	1	1	0	203	204	0	0	0	0	0
% App. Total	5.3	75.3	19.4		100	0	0		0.5	0	99.5		0	0	0		
PHF	.761	.773	.797	.827	.250	.000	.000	.250	.250	.000	.958	.962	.000	.000	.000	.000	.850
Cars	70	963	255	1288	0	0	0	0	1	0	182	183	0	0	0	0	0
% Cars	100	97.4	100	98	0	0	0	0	100	0	89.7	89.7	0	0	0	0	0
Trucks	0	3	0	3	0	0	0	0	0	0	0	0	0	0	0	0	0
% Trucks	0	0.3	0	0.2	0	0	0	0	0	0	0	0	0	0	0	0	0
Buses	0	23	0	23	1	0	0	1	0	0	21	21	0	0	0	0	0
% Buses	0	2.3	0	1.8	100	0	0	100	0	0	10.3	10.3	0	0	0	0	0

Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 1

Groups Printed- Buses

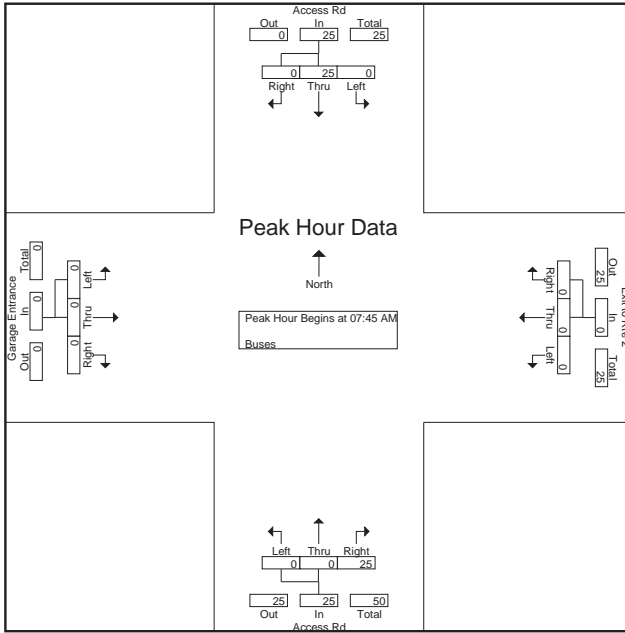
Start Time	Access Rd From North			Exit to Rte 2 From East			Access Rd From South			Garage Entrance From West			Int. Total
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	
07:30 AM	0	4	0	1	0	0	0	0	1	0	0	0	6
07:45 AM	0	6	0	0	0	0	0	0	8	0	0	0	14
Total	0	10	0	1	0	0	0	0	9	0	0	0	20
08:00 AM	0	4	0	0	0	0	0	0	7	0	0	0	11
08:15 AM	0	9	0	0	0	0	0	0	5	0	0	0	14
08:30 AM	0	6	0	0	0	0	0	0	5	0	0	0	11
08:45 AM	0	5	0	0	0	0	0	0	4	0	0	0	9
Total	0	24	0	0	0	0	0	0	21	0	0	0	45
09:00 AM	0	4	0	0	0	1	0	0	4	0	0	0	9
09:15 AM	0	5	0	0	0	0	0	0	6	0	0	0	11
Grand Total	0	43	0	1	0	1	0	0	40	0	0	0	85
Apprch %	0	100	0	50	0	50	0	0	100	0	0	0	
Total %	0	50.6	0	1.2	0	1.2	0	0	47.1	0	0	0	

Start Time	Access Rd From North				Exit to Rte 2 From East			Access Rd From South				Garage Entrance From West				Int. Total	
	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right		App. Total
07:30 AM	0	6	0	6	0	0	0	0	0	0	8	8	0	0	0	0	14
08:00 AM	0	4	0	4	0	0	0	0	0	0	7	7	0	0	0	0	11
08:15 AM	0	9	0	9	0	0	0	0	0	0	5	5	0	0	0	0	14
08:30 AM	0	6	0	6	0	0	0	0	0	0	5	5	0	0	0	0	11
Total Volume	0	25	0	25	0	0	0	0	0	0	25	25	0	0	0	0	50
% App. Total	0	100	0		0	0	0		0	0	100		0	0	0		
PHF	.000	.694	.000	.694	.000	.000	.000	.000	.000	.000	.781	.781	.000	.000	.000	.000	.893

Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

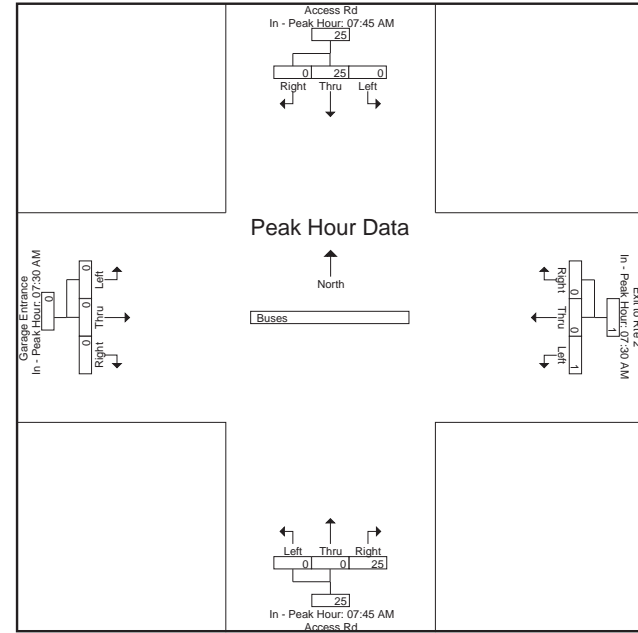
File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 2



Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 3



Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1

Peak Hour for Each Approach Begins at:

	07:45 AM				07:30 AM				07:30 AM							
+0 mins.	0	6	0	6	1	0	0	1	0	0	8	8	0	0	0	0
+15 mins.	0	4	0	4	0	0	0	0	0	0	7	7	0	0	0	0
+30 mins.	0	9	0	9	0	0	0	0	0	0	5	5	0	0	0	0
+45 mins.	0	6	0	6	0	0	0	0	0	0	5	5	0	0	0	0
Total Volume	0	25	0	25	1	0	0	1	0	0	25	25	0	0	0	0
% App. Total	0	100	0	100	0	0	0	0	0	0	100	100	0	0	0	0
PHF	.000	.694	.000	.694	.250	.000	.000	.250	.000	.000	.781	.781	.000	.000	.000	.000

Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 1

Groups Printed- Cars

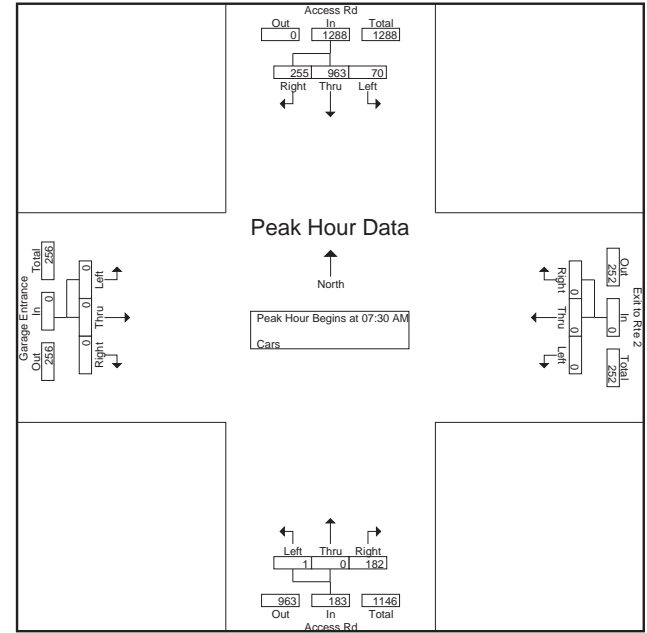
Start Time	Access Rd From North			Exit to Rte 2 From East			Access Rd From South			Garage Entrance From West			Int. Total
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	
07:30 AM	23	315	54	0	0	0	0	0	48	0	0	0	440
07:45 AM	22	230	48	0	0	0	0	0	45	0	0	0	345
Total	45	545	102	0	0	0	0	0	93	0	0	0	785
08:00 AM	14	227	73	0	0	0	1	0	43	0	0	0	358
08:15 AM	11	191	80	0	0	0	0	0	46	0	0	0	328
08:30 AM	16	215	57	0	0	0	0	0	33	0	0	0	321
08:45 AM	24	199	61	0	0	0	0	0	37	0	0	0	321
Total	65	832	271	0	0	0	1	0	159	0	0	0	1328
09:00 AM	17	162	39	0	0	0	1	0	28	0	0	0	247
09:15 AM	26	170	11	0	0	0	0	0	24	0	0	0	231
Grand Total	153	1709	423	0	0	0	2	0	304	0	0	0	2591
Apprch %	6.7	74.8	18.5	0	0	0	0.7	0	99.3	0	0	0	
Total %	5.9	66	16.3	0	0	0	0.1	0	11.7	0	0	0	

Start Time	Access Rd From North				Exit to Rte 2 From East				Access Rd From South				Garage Entrance From West				Int. Total
	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 07:30 AM																	
07:30 AM	23	315	54	392	0	0	0	0	0	0	48	48	0	0	0	0	440
07:45 AM	22	230	48	300	0	0	0	0	0	0	45	45	0	0	0	0	345
08:00 AM	14	227	73	314	0	0	0	0	1	0	43	44	0	0	0	0	358
08:15 AM	11	191	80	282	0	0	0	0	0	0	46	46	0	0	0	0	328
Total Volume	70	963	255	1288	0	0	0	1	0	182	183	0	0	0	0	0	1471
% App. Total	5.4	74.8	19.8		0	0	0		0.5	0	99.5		0	0	0		
PHF	.761	.764	.797	.821	.000	.000	.000	.000	.250	.000	.948	.953	.000	.000	.000	.000	.836

Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 2



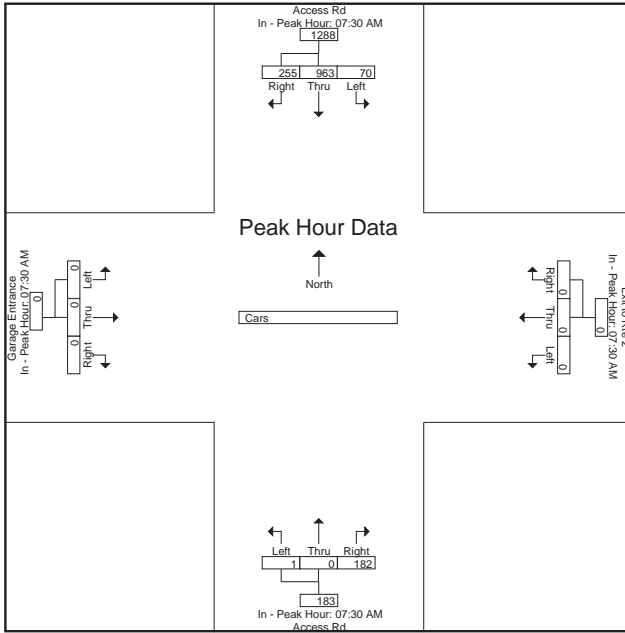
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	07:30 AM				07:30 AM				07:30 AM				07:30 AM				
+0 mins.	23	315	54	392	0	0	0	0	0	0	0	48	48	0	0	0	0
+15 mins.	22	230	48	300	0	0	0	0	0	0	0	45	45	0	0	0	0
+30 mins.	14	227	73	314	0	0	0	0	0	0	0	43	44	0	0	0	0
+45 mins.	11	191	80	282	0	0	0	0	0	0	0	46	46	0	0	0	0
Total Volume	70	963	255	1288	0	0	0	0	1	0	182	183	0	0	0	0	0
% App. Total	5.4	74.8	19.8		0	0	0		0.5	0	99.5		0	0	0	0	
PHF	.761	.764	.797	.821	.000	.000	.000	.000	.250	.000	.948	.953	.000	.000	.000	.000	.000

Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 1

Groups Printed- Trucks

Start Time	Access Rd From North			Exit to Rte 2 From East			Access Rd From South			Garage Entrance From West			Int. Total
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	
07:30 AM	0	1	0	0	0	0	0	0	0	0	0	0	1
07:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
Total	0	1	0	0	0	0	0	0	0	0	0	0	1
08:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
08:15 AM	0	2	0	0	0	0	0	0	0	0	0	0	2
08:30 AM	0	1	0	0	0	0	0	0	0	0	0	0	1
08:45 AM	0	1	0	0	0	0	0	0	0	0	0	0	1
Total	0	4	0	0	0	0	0	0	0	0	0	0	4
09:00 AM	0	2	0	0	0	0	1	0	1	0	0	0	4
09:15 AM	0	1	0	0	0	0	0	0	0	0	0	0	1
Grand Total	0	8	0	0	0	0	1	0	1	0	0	0	10
Apprch %	0	100	0	0	0	0	50	0	50	0	0	0	
Total %	0	80	0	0	0	0	10	0	10	0	0	0	

Start Time	Access Rd From North				Exit to Rte 2 From East				Access Rd From South				Garage Entrance From West				Int. Total
	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	
07:30 AM	0	1	0	1	0	0	0	0	0	0	0	0	0	0	0	0	1
08:15 AM	0	2	0	2	0	0	0	0	0	0	0	0	0	0	0	0	2
08:30 AM	0	1	0	1	0	0	0	0	0	0	0	0	0	0	0	0	1
08:45 AM	0	1	0	1	0	0	0	0	0	0	0	0	0	0	0	0	1
09:00 AM	0	2	0	2	0	0	0	0	1	0	1	2	0	0	0	0	4
Total Volume	0	6	0	6	0	0	0	0	1	0	1	2	0	0	0	0	8
% App. Total	0	100	0		0	0	0		50	0	50		0	0	0		
PHF	.000	.750	.000	.750	.000	.000	.000	.000	.250	.000	.250	.250	.000	.000	.000	.000	.500

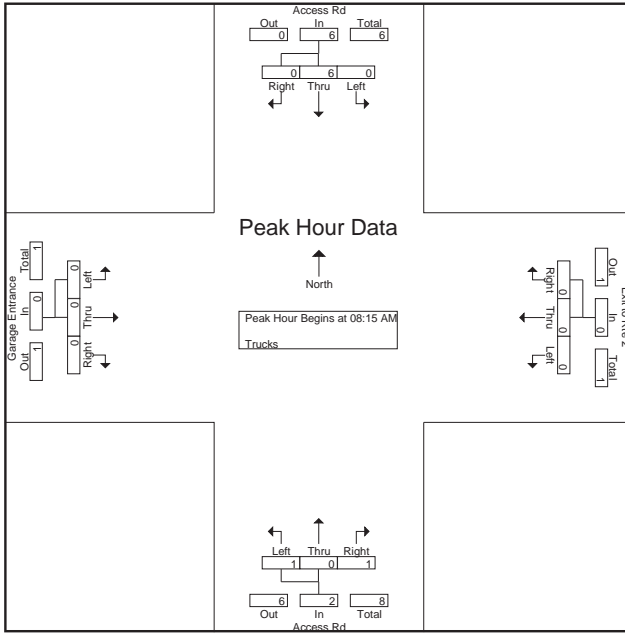
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1

Peak Hour for Entire Intersection Begins at 08:15 AM

Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street: Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

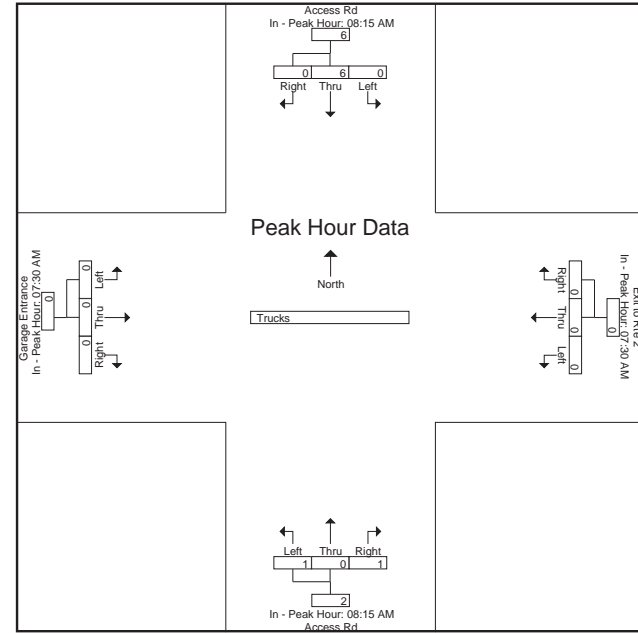
File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 2



Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street: Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 3



Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1

Peak Hour for Each Approach Begins at:

	08:15 AM				07:30 AM				08:15 AM				07:30 AM			
+0 mins.	0	2	0	2	0	0	0	0	0	0	0	0	0	0	0	0
+15 mins.	0	1	0	1	0	0	0	0	0	0	0	0	0	0	0	0
+30 mins.	0	1	0	1	0	0	0	0	0	0	0	0	0	0	0	0
+45 mins.	0	2	0	2	0	0	0	0	1	0	1	2	0	0	0	0
Total Volume	0	6	0	6	0	0	0	0	1	0	1	2	0	0	0	0
% App. Total	0	100	0	0	0	0	0	0	50	0	50	0	0	0	0	0
PHF	.000	.750	.000	.750	.000	.000	.000	.000	.250	.000	.250	.250	.000	.000	.000	.000

Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 1

Groups Printed- Peds

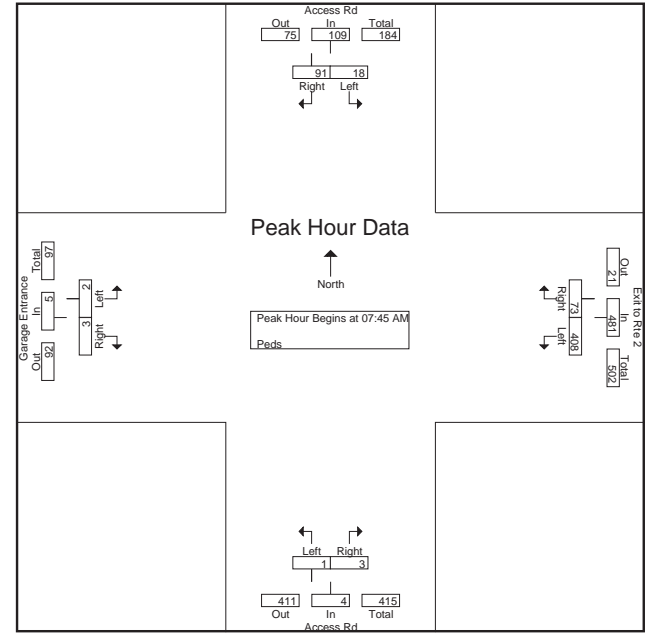
Start Time	Access Rd From North		Exit to Rte 2 From East		Access Rd From South		Garage Entrance From West		Int. Total
	WB	EB	SB	NB	WB	EB	SB	NB	
07:30 AM	1	2	42	6	0	0	0	0	51
07:45 AM	7	16	81	17	0	0	0	1	122
Total	8	18	123	23	0	0	0	1	173
08:00 AM	4	22	93	17	1	0	2	2	141
08:15 AM	6	18	129	16	0	3	0	0	172
08:30 AM	1	35	105	23	0	0	0	0	164
08:45 AM	2	22	61	13	1	0	0	2	101
Total	13	97	388	69	2	3	2	4	578
09:00 AM	3	16	51	15	0	0	1	2	88
09:15 AM	1	9	43	11	0	0	1	0	65
Grand Total	25	140	605	118	2	3	4	7	904
Approch %	15.2	84.8	83.7	16.3	40	60	36.4	63.6	
Total %	2.8	15.5	66.9	13.1	0.2	0.3	0.4	0.8	

Start Time	Access Rd From North			Exit to Rte 2 From East			Access Rd From South			Garage Entrance From West			Int. Total
	WB	EB	App. Total	SB	NB	App. Total	WB	EB	App. Total	SB	NB	App. Total	
07:30 AM	1	2	3	42	6	48	0	0	0	0	0	0	51
07:45 AM	7	16	23	81	17	98	0	0	0	0	1	1	122
08:00 AM	4	22	26	93	17	110	1	0	1	2	2	4	141
08:15 AM	6	18	24	129	16	145	0	3	3	0	0	0	172
08:30 AM	1	35	36	105	23	128	0	0	0	0	0	0	164
Total Volume	18	91	109	408	73	481	1	3	4	2	3	5	599
% App. Total	16.5	83.5		84.8	15.2		25	75		40	60		
PHF	.643	.650	.757	.791	.793	.829	.250	.250	.333	.250	.375	.313	.871

Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 2



Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1

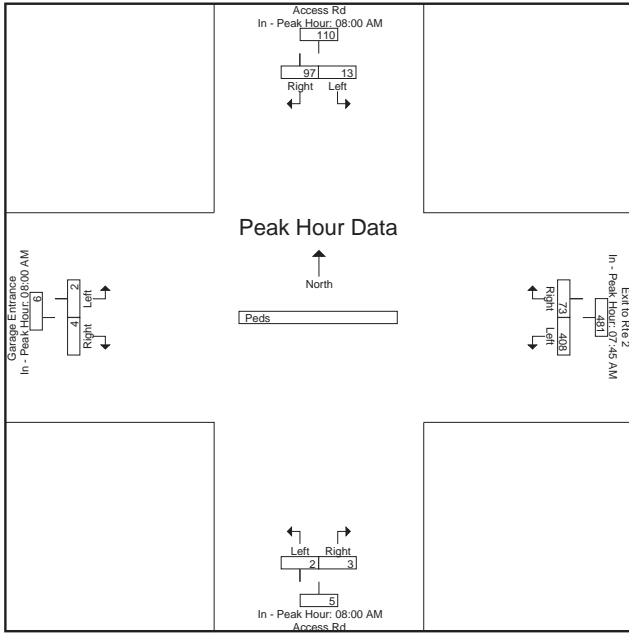
Peak Hour for Each Approach Begins at:

	08:00 AM			07:45 AM			08:00 AM			08:00 AM		
+0 mins.	4	22	26	81	17	98	1	0	1	2	2	4
+15 mins.	6	18	24	93	17	110	0	3	3	0	0	0
+30 mins.	1	35	36	129	16	145	0	0	0	0	0	0
+45 mins.	2	22	24	105	23	128	1	0	1	0	2	2
Total Volume	13	97	110	408	73	481	2	3	5	2	4	6
% App. Total	11.8	88.2		84.8	15.2		40	60		33.3	66.7	
PHF	.542	.693	.764	.791	.793	.829	.500	.250	.417	.250	.500	.375

Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 1

Groups Printed- Bikes Street

Start Time	Access Rd From North			Exit to Rte 2 From East			Access Rd From South			Garage Entrance From West			Int. Total
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	
07:30 AM	0	1	0	0	0	0	0	0	0	0	0	0	1
07:45 AM	0	1	0	0	0	0	0	0	0	0	0	0	1
Total	0	2	0	0	0	0	0	0	0	0	0	0	2
08:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
08:15 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
08:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
08:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
Total	0	0	0	0	0	0	0	0	0	0	0	0	0
09:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
09:15 AM	0	1	0	4	0	0	0	0	0	0	0	0	5
Grand Total	0	3	0	4	0	0	0	0	0	0	0	0	7
Apprch %	0	100	0	100	0	0	0	0	0	0	0	0	0
Total %	0	42.9	0	57.1	0	0	0	0	0	0	0	0	0

Start Time	Access Rd From North			Exit to Rte 2 From East			Access Rd From South			Garage Entrance From West			Int. Total
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	
08:30 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
08:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
09:00 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
09:15 AM	0	1	0	4	0	0	4	0	0	0	0	0	5
Total Volume	0	1	0	4	0	0	4	0	0	0	0	0	5
% App. Total	0	100	0	100	0	0	0	0	0	0	0	0	0
PHF	.000	.250	.000	.250	.000	.000	.250	.000	.000	.000	.000	.000	.250

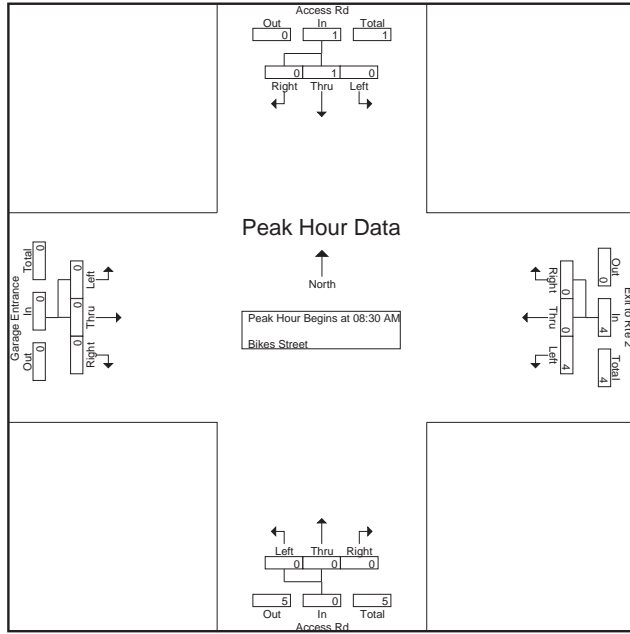
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1

Peak Hour for Entire Intersection Begins at 08:30 AM

Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street: Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 2



Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1

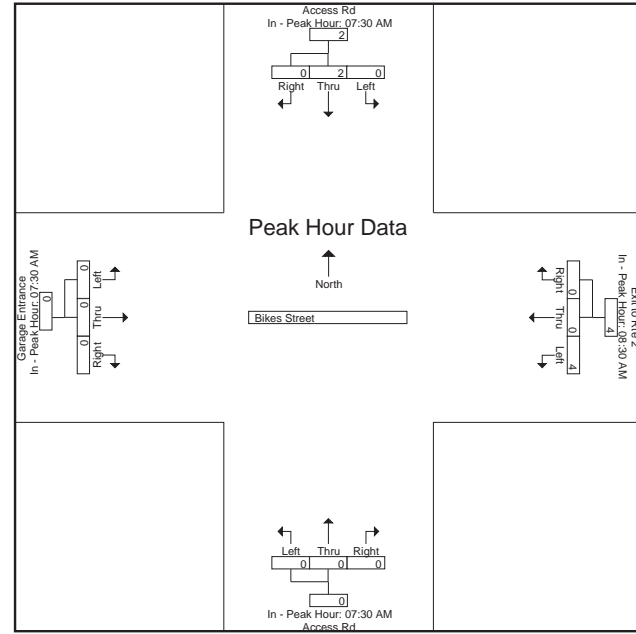
Peak Hour for Each Approach Begins at:

	07:30 AM				08:30 AM				07:30 AM				07:30 AM			
+0 mins.	0	1	0	1	0	0	0	0	0	0	0	0	0	0	0	0
+15 mins.	0	1	0	1	0	0	0	0	0	0	0	0	0	0	0	0
+30 mins.	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
+45 mins.	0	0	0	0	4	0	0	4	0	0	0	0	0	0	0	0
Total Volume	0	2	0	2	4	0	0	4	0	0	0	0	0	0	0	0
% App. Total	0	100	0	0	100	0	0	0	0	0	0	0	0	0	0	0
PHF	.000	.500	.000	.500	.250	.000	.000	.250	.000	.000	.000	.000	.000	.000	.000	.000

Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street: Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 1

Groups Printed- Bikes SW

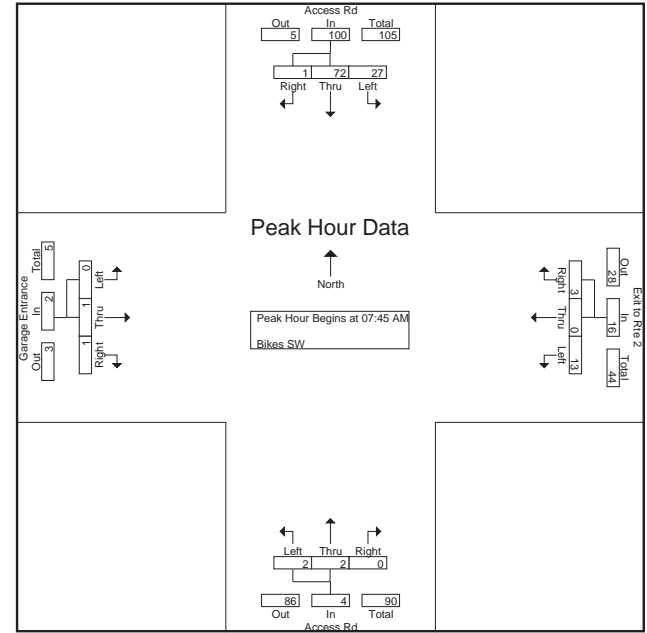
Start Time	Access Rd From North			Exit to Rte 2 From East			Access Rd From South			Garage Entrance From West			Int. Total
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	
07:30 AM	4	6	0	0	0	1	0	1	0	0	0	1	13
07:45 AM	6	15	0	3	0	0	0	0	0	0	0	1	25
Total	10	21	0	3	0	1	0	1	0	0	0	2	38
08:00 AM	8	26	0	2	0	1	0	0	0	0	0	0	37
08:15 AM	7	18	1	6	0	1	1	2	0	0	1	0	37
08:30 AM	6	13	0	2	0	1	1	0	0	0	0	0	23
08:45 AM	7	7	0	0	0	2	0	0	0	0	0	0	16
Total	28	64	1	10	0	5	2	2	0	0	1	0	113
09:00 AM	2	3	0	1	0	1	0	1	0	0	0	0	8
09:15 AM	4	5	0	1	0	1	1	0	0	0	0	0	12
Grand Total	44	93	1	15	0	8	3	4	0	0	1	2	171
Apprch %	31.9	67.4	0.7	65.2	0	34.8	42.9	57.1	0	0	33.3	66.7	
Total %	25.7	54.4	0.6	8.8	0	4.7	1.8	2.3	0	0	0.6	1.2	

Start Time	Access Rd From North				Exit to Rte 2 From East				Access Rd From South				Garage Entrance From West				Int. Total
	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 07:45 AM																	
07:45 AM	6	15	0	21	3	0	0	3	0	0	0	0	0	0	1	1	25
08:00 AM	8	26	0	34	2	0	1	3	0	0	0	0	0	0	0	0	37
08:15 AM	7	18	1	26	6	0	1	7	1	2	0	3	0	1	0	1	37
08:30 AM	6	13	0	19	2	0	1	3	1	0	0	1	0	0	0	0	23
Total Volume	27	72	1	100	13	0	3	16	2	2	0	4	0	1	1	2	122
% App. Total	27	72	1	100	81.2	0	18.8	100	50	50	0	100	0	50	50	0	100
PHF	.844	.692	.250	.735	.542	.000	.750	.571	.500	.250	.000	.333	.000	.250	.250	.500	.824

Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 2



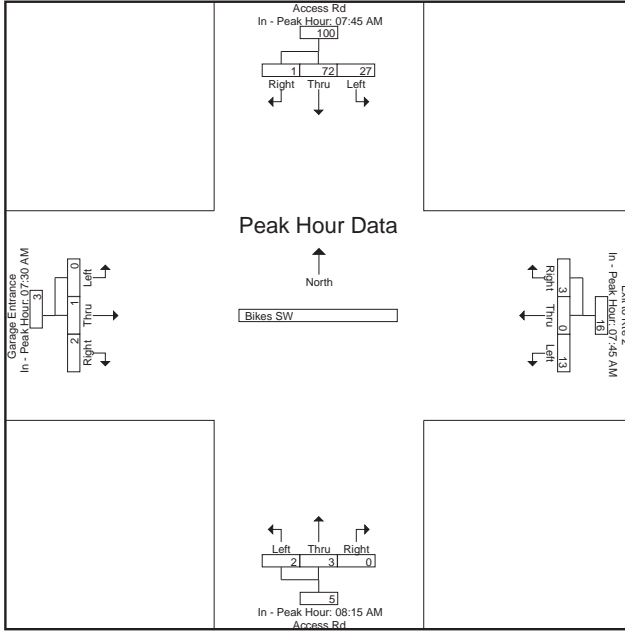
Peak Hour Analysis From 07:30 AM to 09:15 AM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	07:45 AM				07:45 AM				08:15 AM				07:30 AM			
+0 mins.	6	15	0	21	3	0	0	3	1	2	0	3	0	0	1	1
+15 mins.	8	26	0	34	2	0	1	3	1	0	0	1	0	0	1	1
+30 mins.	7	18	1	26	6	0	1	7	0	0	0	0	0	0	0	0
+45 mins.	6	13	0	19	2	0	1	3	0	1	0	1	0	1	0	1
Total Volume	27	72	1	100	13	0	3	16	2	3	0	5	0	1	2	3
% App. Total	27	72	1	100	81.2	0	18.8	100	40	60	0	100	0	33.3	66.7	100
PHF	.844	.692	.250	.735	.542	.000	.750	.571	.500	.375	.000	.417	.000	.250	.500	.750

Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 1

Groups Printed- Cars - Trucks - Buses

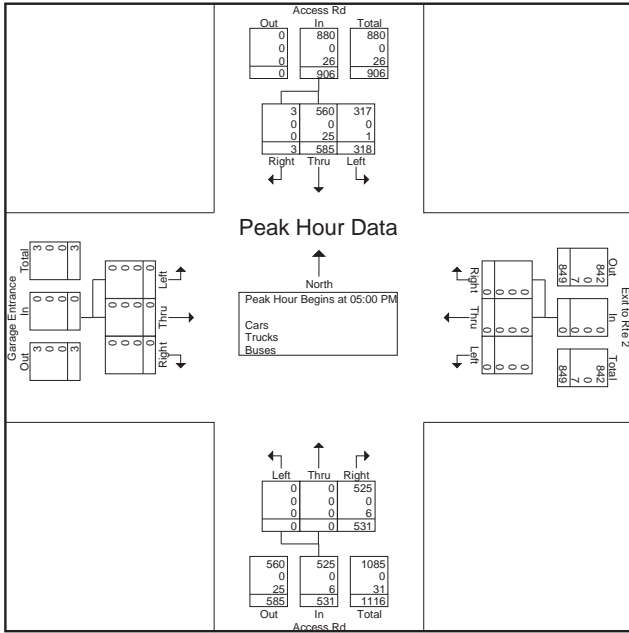
Start Time	Access Rd From North			Exit to Rte 2 From East			Access Rd From South			Garage Entrance From West			Int. Total
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	
04:30 PM	67	112	1	0	0	0	0	0	144	0	0	0	324
04:45 PM	50	107	0	0	0	0	0	0	117	0	0	0	274
Total	117	219	1	0	0	0	0	0	261	0	0	0	598
05:00 PM	90	146	0	0	0	0	0	0	142	0	0	0	378
05:15 PM	80	159	0	0	0	0	0	0	131	0	0	0	370
05:30 PM	60	149	3	0	0	0	0	0	118	0	0	0	330
05:45 PM	88	131	0	0	0	0	0	0	140	0	0	0	359
Total	318	585	3	0	0	0	0	0	531	0	0	0	1437
06:00 PM	66	157	1	0	0	0	0	0	130	0	0	0	354
06:15 PM	65	185	1	0	0	0	0	0	107	0	0	0	358
Grand Total	566	1146	6	0	0	0	0	0	1029	0	0	0	2747
Approch %	32.9	66.7	0.3	0	0	0	0	0	100	0	0	0	
Total %	20.6	41.7	0.2	0	0	0	0	0	37.5	0	0	0	
Cars	564	1098	6	0	0	0	0	0	1009	0	0	0	2677
% Cars	99.6	95.8	100	0	0	0	0	0	98.1	0	0	0	97.5
Trucks	0	4	0	0	0	0	0	0	0	0	0	0	4
% Trucks	0	0.3	0	0	0	0	0	0	0	0	0	0	0.1
Buses	2	44	0	0	0	0	0	0	20	0	0	0	66
% Buses	0.4	3.8	0	0	0	0	0	0	1.9	0	0	0	2.4

Start Time	Access Rd From North				Exit to Rte 2 From East				Access Rd From South				Garage Entrance From West				Int. Total
	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	
Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 05:00 PM																	
05:00 PM	90	146	0	236	0	0	0	0	0	0	142	142	0	0	0	0	378
05:15 PM	80	159	0	239	0	0	0	0	0	0	131	131	0	0	0	0	370
05:30 PM	60	149	3	212	0	0	0	0	0	0	118	118	0	0	0	0	330
05:45 PM	88	131	0	219	0	0	0	0	0	0	140	140	0	0	0	0	359
Total Volume	318	585	3	906	0	0	0	0	0	0	531	531	0	0	0	0	1437
% App. Total	35.1	64.6	0.3		0	0	0		0	0	100		0	0	0		
PHF	.883	.920	.250	.948	.000	.000	.000	.000	.000	.000	.935	.935	.000	.000	.000	.000	.950
Cars	317	560	3	880	0	0	0	0	0	0	525	525	0	0	0	0	1405
% Cars	99.7	95.7	100	97.1	0	0	0	0	0	0	98.9	98.9	0	0	0	0	97.8
Trucks	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
% Trucks	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Buses	1	25	0	26	0	0	0	0	0	0	6	6	0	0	0	0	32
% Buses	0.3	4.3	0	2.9	0	0	0	0	0	0	1.1	1.1	0	0	0	0	2.2

Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

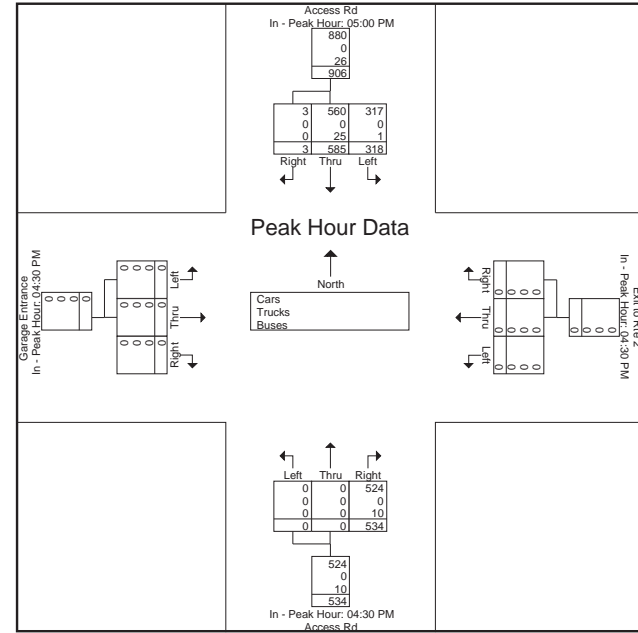
File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 2



Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 3



Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

Peak Hour for Each Approach Begins at:

	05:00 PM			04:30 PM			04:30 PM			04:30 PM		
+0 mins.	90	146	0	236	0	0	0	0	0	0	0	0
+15 mins.	80	159	0	239	0	0	0	0	0	117	117	0
+30 mins.	60	149	3	212	0	0	0	0	0	142	142	0
+45 mins.	88	131	0	219	0	0	0	0	0	131	131	0
Total Volume	318	585	3	906	0	0	0	0	0	534	534	0
% App. Total	35.1	64.6	0.3	0	0	0	0	0	0	100	100	0
PHF	.883	.920	.250	.948	.000	.000	.000	.000	.000	.927	.927	.000
Cars	317	560	3	880	0	0	0	0	0	524	524	0
% Cars	99.7	95.7	100	97.1	0	0	0	0	0	98.1	98.1	0
Trucks	0	0	0	0	0	0	0	0	0	0	0	0
% Trucks	0	0	0	0	0	0	0	0	0	0	0	0
Buses	1	25	0	26	0	0	0	0	0	10	10	0
% Buses	0.3	4.3	0	2.9	0	0	0	0	0	1.9	1.9	0

Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 1

Groups Printed- Buses

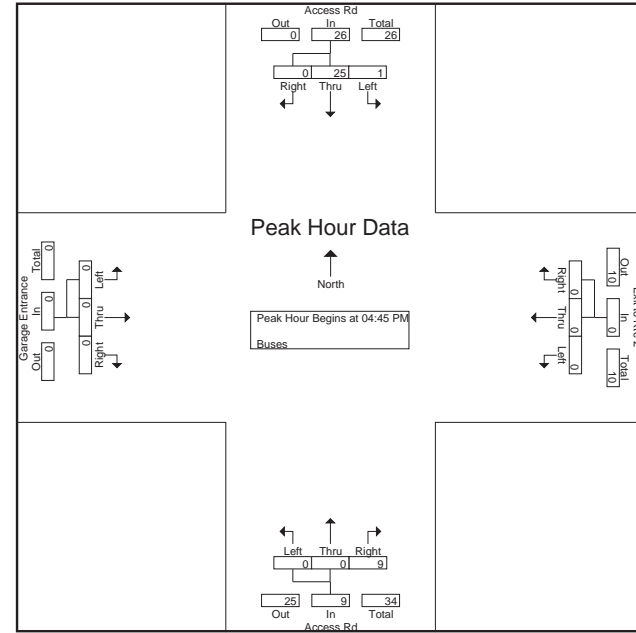
Start Time	Access Rd From North			Exit to Rte 2 From East			Access Rd From South			Garage Entrance From West			Int. Total
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	
04:30 PM	0	0	0	0	0	0	0	0	2	0	0	0	2
04:45 PM	0	7	0	0	0	0	0	0	4	0	0	0	11
Total	0	7	0	0	0	0	0	0	6	0	0	0	13
05:00 PM	0	6	0	0	0	0	0	0	3	0	0	0	9
05:15 PM	0	8	0	0	0	0	0	0	1	0	0	0	9
05:30 PM	1	4	0	0	0	0	0	0	1	0	0	0	6
05:45 PM	0	7	0	0	0	0	0	0	1	0	0	0	8
Total	1	25	0	0	0	0	0	0	6	0	0	0	32
06:00 PM	0	7	0	0	0	0	0	0	4	0	0	0	11
06:15 PM	1	5	0	0	0	0	0	0	4	0	0	0	10
Grand Total	2	44	0	0	0	0	0	0	20	0	0	0	66
Apprch %	4.3	95.7	0	0	0	0	0	0	100	0	0	0	
Total %	3	66.7	0	0	0	0	0	0	30.3	0	0	0	

Start Time	Access Rd From North				Exit to Rte 2 From East				Access Rd From South				Garage Entrance From West				Int. Total
	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	
Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 04:45 PM																	
04:45 PM	0	7	0	7	0	0	0	0	0	0	4	4	0	0	0	0	11
05:00 PM	0	6	0	6	0	0	0	0	0	0	3	3	0	0	0	0	9
05:15 PM	0	8	0	8	0	0	0	0	0	0	1	1	0	0	0	0	9
05:30 PM	1	4	0	5	0	0	0	0	0	0	1	1	0	0	0	0	6
Total Volume	1	25	0	26	0	0	0	0	0	0	9	9	0	0	0	0	35
% App. Total	3.8	96.2	0		0	0	0		0	0	100		0	0	0		
PHF	.250	.781	.000	.813	.000	.000	.000	.000	.000	.000	.563	.563	.000	.000	.000	.000	.795

Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 2



Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

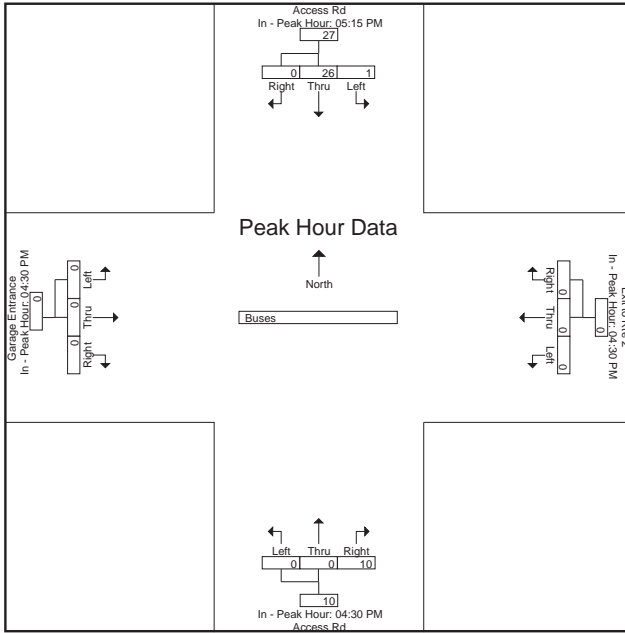
Peak Hour for Each Approach Begins at:

	05:15 PM				04:30 PM				04:30 PM				04:30 PM			
+0 mins.	0	8	0	8	0	0	0	0	0	0	2	2	0	0	0	0
+15 mins.	1	4	0	5	0	0	0	0	0	0	4	4	0	0	0	0
+30 mins.	0	7	0	7	0	0	0	0	0	0	3	3	0	0	0	0
+45 mins.	0	7	0	7	0	0	0	0	0	0	1	1	0	0	0	0
Total Volume	1	26	0	27	0	0	0	0	0	0	10	10	0	0	0	0
% App. Total	3.7	96.3	0		0	0	0		0	0	100		0	0	0	
PHF	.250	.813	.000	.844	.000	.000	.000	.000	.000	.000	.625	.625	.000	.000	.000	.000

Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 1

Groups Printed- Cars

Start Time	Access Rd From North			Exit to Rte 2 From East			Access Rd From South			Garage Entrance From West			Int. Total
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	
04:30 PM	67	110	1	0	0	0	0	0	142	0	0	0	320
04:45 PM	50	99	0	0	0	0	0	0	113	0	0	0	262
Total	117	209	1	0	0	0	0	0	255	0	0	0	582
05:00 PM	90	140	0	0	0	0	0	0	139	0	0	0	369
05:15 PM	80	151	0	0	0	0	0	0	130	0	0	0	361
05:30 PM	59	145	3	0	0	0	0	0	117	0	0	0	324
05:45 PM	88	124	0	0	0	0	0	0	139	0	0	0	351
Total	317	560	3	0	0	0	0	0	525	0	0	0	1405
06:00 PM	66	149	1	0	0	0	0	0	126	0	0	0	342
06:15 PM	64	180	1	0	0	0	0	0	103	0	0	0	348
Grand Total	564	1098	6	0	0	0	0	0	1009	0	0	0	2677
Apprch %	33.8	65.8	0.4	0	0	0	0	0	100	0	0	0	
Total %	21.1	41	0.2	0	0	0	0	0	37.7	0	0	0	

Start Time	Access Rd From North			Exit to Rte 2 From East			Access Rd From South			Garage Entrance From West			Int. Total	
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right		
05:00 PM	90	140	0	230	0	0	0	0	139	139	0	0	0	369
05:15 PM	80	151	0	231	0	0	0	0	130	130	0	0	0	361
05:30 PM	59	145	3	207	0	0	0	0	117	117	0	0	0	324
05:45 PM	88	124	0	212	0	0	0	0	139	139	0	0	0	351
Total Volume	317	560	3	880	0	0	0	0	525	525	0	0	0	1405
% App. Total	36	63.6	0.3		0	0	0	0	100		0	0	0	
PHF	.881	.927	.250	.952	.000	.000	.000	.000	.944	.944	.000	.000	.000	.952

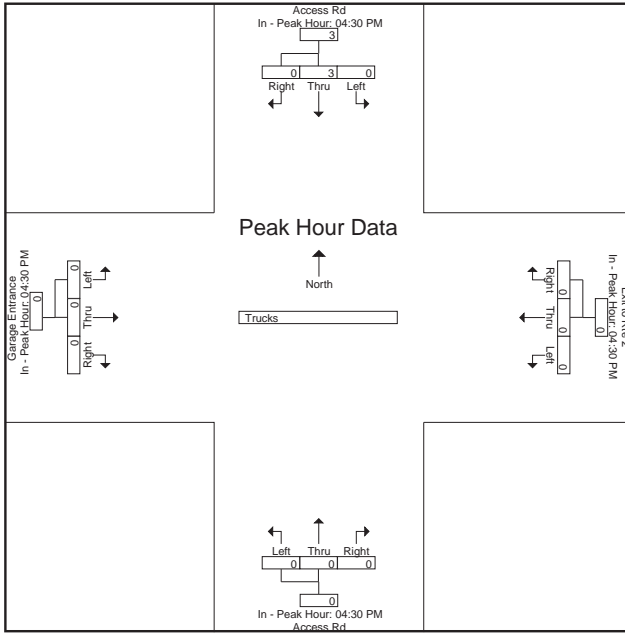
Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

Peak Hour for Entire Intersection Begins at 05:00 PM

Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
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Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 1

Groups Printed- Peds

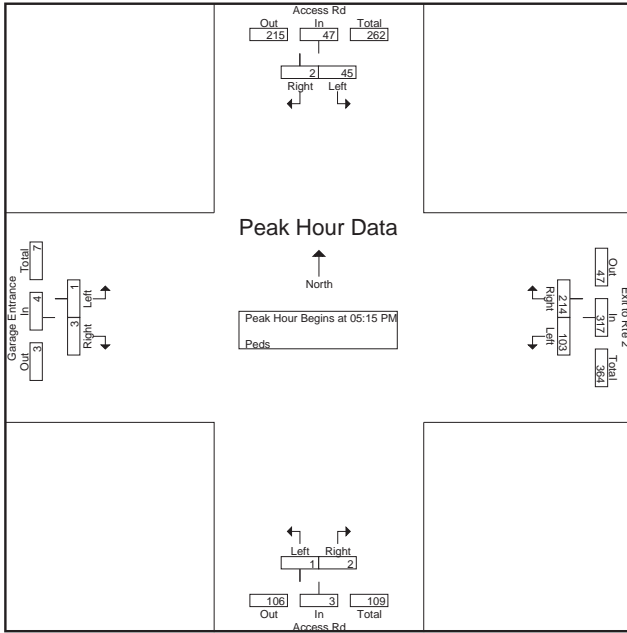
Start Time	Access Rd From North		Exit to Rte 2 From East		Access Rd From South		Garage Entrance From West		Int. Total
	WB	EB	SB	NB	WB	EB	SB	NB	
04:30 PM	2	1	16	19	0	4	0	2	44
04:45 PM	1	0	17	23	0	0	0	1	42
Total	3	1	33	42	0	4	0	3	86
05:00 PM	1	7	21	54	0	0	1	0	84
05:15 PM	14	1	29	35	0	0	1	0	80
05:30 PM	12	0	27	56	0	0	0	3	98
05:45 PM	9	0	23	56	0	2	0	0	90
Total	36	8	100	201	0	2	2	3	352
06:00 PM	10	1	24	67	1	0	0	0	103
06:15 PM	6	1	9	49	0	0	0	1	66
Grand Total	55	11	166	359	1	6	2	7	607
Apprch %	83.3	16.7	31.6	68.4	14.3	85.7	22.2	77.8	
Total %	9.1	1.8	27.3	59.1	0.2	1	0.3	1.2	

Start Time	Access Rd From North			Exit to Rte 2 From East			Access Rd From South			Garage Entrance From West			Int. Total
	WB	EB	App. Total	SB	NB	App. Total	WB	EB	App. Total	SB	NB	App. Total	
05:15 PM	14	1	15	29	35	64	0	0	0	1	0	1	80
05:30 PM	12	0	12	27	56	83	0	0	0	0	3	3	98
05:45 PM	9	0	9	23	56	79	0	2	2	0	0	0	90
06:00 PM	10	1	11	24	67	91	1	0	1	0	0	0	103
Total Volume	45	2	47	103	214	317	1	2	3	1	3	4	371
% App. Total	95.7	4.3		32.5	67.5		33.3	66.7		25	75		
PHF	.804	.500	.783	.888	.799	.871	.250	.250	.375	.250	.250	.333	.900

Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 2



Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

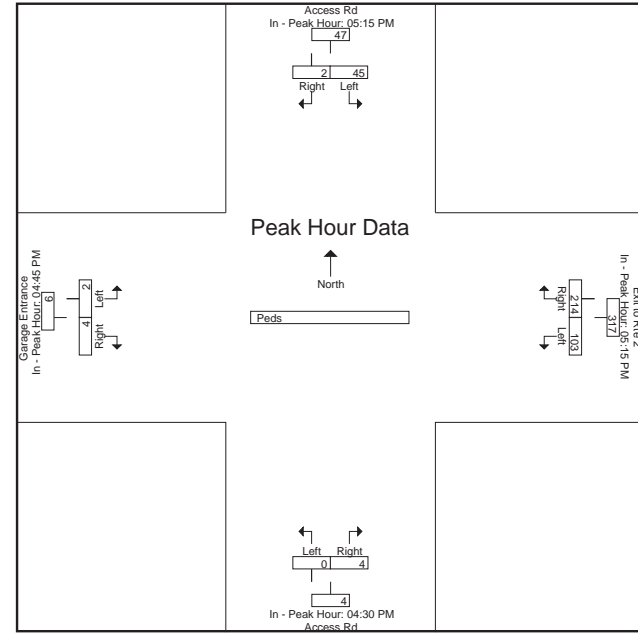
Peak Hour for Each Approach Begins at:

	05:15 PM			05:15 PM			04:30 PM			04:45 PM		
+0 mins.	14	1	15	29	35	64	0	4	4	0	1	1
+15 mins.	12	0	12	27	56	83	0	0	0	1	0	1
+30 mins.	9	0	9	23	56	79	0	0	0	1	0	1
+45 mins.	10	1	11	24	67	91	0	0	0	0	3	3
Total Volume	45	2	47	103	214	317	0	4	4	2	4	6
% App. Total	95.7	4.3		32.5	67.5		0	100		33.3	66.7	
PHF	.804	.500	.783	.888	.799	.871	.000	.250	.250	.500	.333	.500

Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 1

Groups Printed- Bikes Street

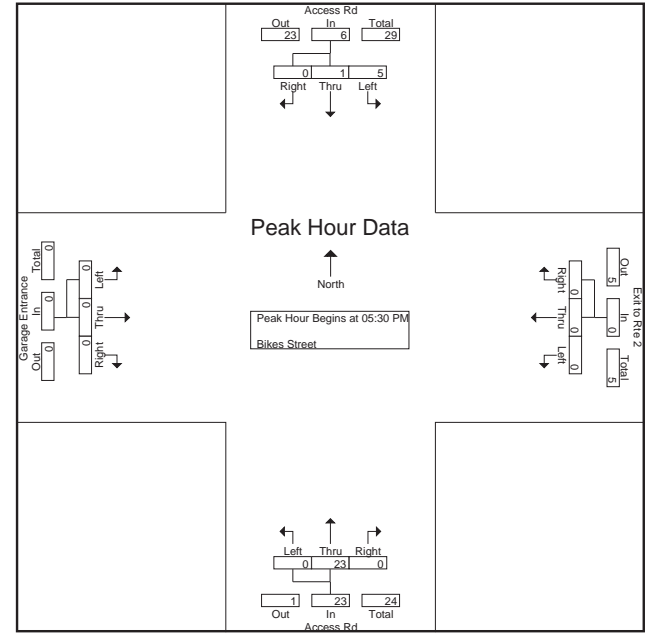
Start Time	Access Rd From North			Exit to Rte 2 From East			Access Rd From South			Garage Entrance From West			Int. Total
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	
04:30 PM	0	0	0	0	0	0	0	4	0	0	0	0	4
04:45 PM	0	0	0	0	0	0	0	2	0	0	0	0	2
Total	0	0	0	0	0	0	0	6	0	0	0	0	6
05:00 PM	0	1	0	0	0	0	0	5	0	0	0	0	6
05:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
05:30 PM	1	0	0	0	0	0	0	4	0	0	0	0	5
05:45 PM	1	0	0	0	0	0	0	11	0	0	0	0	12
Total	2	1	0	0	0	0	0	20	0	0	0	0	23
06:00 PM	2	0	0	0	0	0	0	4	0	0	0	0	6
06:15 PM	1	1	0	0	0	0	0	4	0	0	0	0	6
Grand Total	5	2	0	0	0	0	0	34	0	0	0	0	41
Apprch %	71.4	28.6	0	0	0	0	0	100	0	0	0	0	0
Total %	12.2	4.9	0	0	0	0	0	82.9	0	0	0	0	0

Start Time	Access Rd From North				Exit to Rte 2 From East				Access Rd From South				Garage Entrance From West				Int. Total
	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	
Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 05:30 PM																	
05:30 PM	1	0	0	1	0	0	0	0	0	4	0	4	0	0	0	0	5
05:45 PM	1	0	0	1	0	0	0	0	0	11	0	11	0	0	0	0	12
06:00 PM	2	0	0	2	0	0	0	0	4	0	4	0	0	0	0	0	6
06:15 PM	1	1	0	2	0	0	0	0	4	0	4	0	0	0	0	0	6
Total Volume	5	1	0	6	0	0	0	0	23	0	23	0	0	0	0	0	29
% App. Total	83.3	16.7	0		0	0	0		100	0			0	0	0		
PHF	.625	.250	.000	.750	.000	.000	.000	.000	.000	.523	.000	.523	.000	.000	.000	.000	.604

Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 2



Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

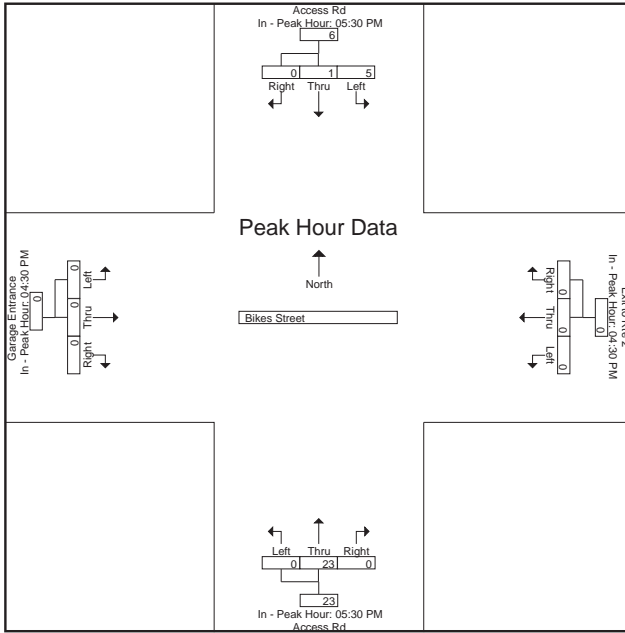
Peak Hour for Each Approach Begins at:

	05:30 PM	04:30 PM	05:30 PM	04:30 PM
+0 mins.	1 0 0 1	0 0 0 0	0 4 0 4	0 0 0 0
+15 mins.	1 0 0 1	0 0 0 0	0 11 0 11	0 0 0 0
+30 mins.	2 0 0 2	0 0 0 0	0 4 0 4	0 0 0 0
+45 mins.	1 1 0 2	0 0 0 0	0 4 0 4	0 0 0 0
Total Volume	5 1 0 6	0 0 0 0	0 23 0 23	0 0 0 0
% App. Total	83.3 16.7 0	0 0 0 0	0 100 0 100	0 0 0 0
PHF	.625 .250 .000 .750	.000 .000 .000 .000	.000 .523 .000 .523	.000 .000 .000 .000

Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 1

Groups Printed- Bikes SW

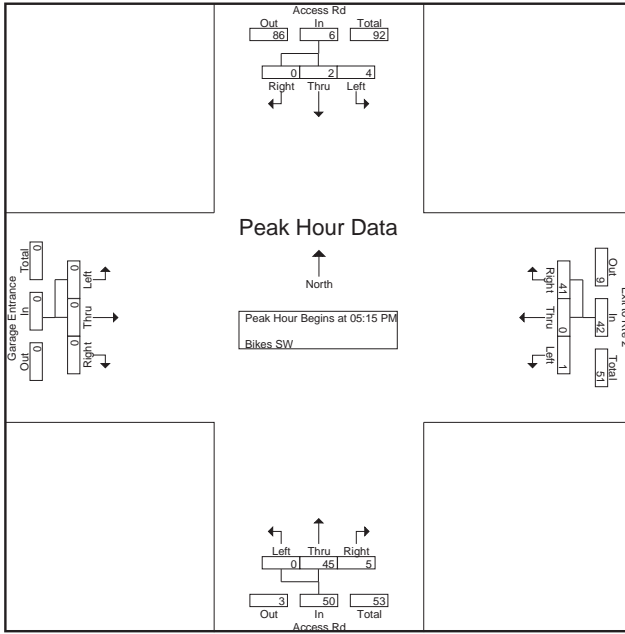
Start Time	Access Rd From North			Exit to Rte 2 From East			Access Rd From South			Garage Entrance From West			Int. Total
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	
04:30 PM	0	1	0	1	0	1	0	10	0	0	0	0	13
04:45 PM	3	0	0	0	0	4	0	3	0	0	0	0	10
Total	3	1	0	1	0	5	0	13	0	0	0	0	23
05:00 PM	2	0	0	0	0	6	0	8	0	0	0	0	16
05:15 PM	0	1	0	0	0	12	0	14	0	0	0	0	27
05:30 PM	0	0	0	0	0	7	0	5	1	0	0	0	13
05:45 PM	2	1	0	1	0	14	0	10	1	0	0	0	29
Total	4	2	0	1	0	39	0	37	2	0	0	0	85
06:00 PM	2	0	0	0	0	8	0	16	3	0	0	0	29
06:15 PM	0	1	0	0	0	5	0	11	1	0	0	0	18
Grand Total	9	4	0	2	0	57	0	77	6	0	0	0	155
Apprch %	69.2	30.8	0	3.4	0	96.6	0	92.8	7.2	0	0	0	
Total %	5.8	2.6	0	1.3	0	36.8	0	49.7	3.9	0	0	0	

Start Time	Access Rd From North				Exit to Rte 2 From East				Access Rd From South				Garage Entrance From West				Int. Total
	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	
04:30 PM	0	1	0	1	0	0	12	12	0	14	0	14	0	0	0	0	27
05:30 PM	0	0	0	0	0	0	7	7	0	5	1	6	0	0	0	0	13
05:45 PM	2	1	0	3	1	0	14	15	0	10	1	11	0	0	0	0	29
06:00 PM	2	0	0	2	0	0	8	8	0	16	3	19	0	0	0	0	29
Total Volume	4	2	0	6	1	0	41	42	0	45	5	50	0	0	0	0	98
% App. Total	66.7	33.3	0		2.4	0	97.6		0	90	10		0	0	0		
PHF	.500	.500	.000	.500	.250	.000	.732	.700	.000	.703	.417	.658	.000	.000	.000	.000	.845

Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 2



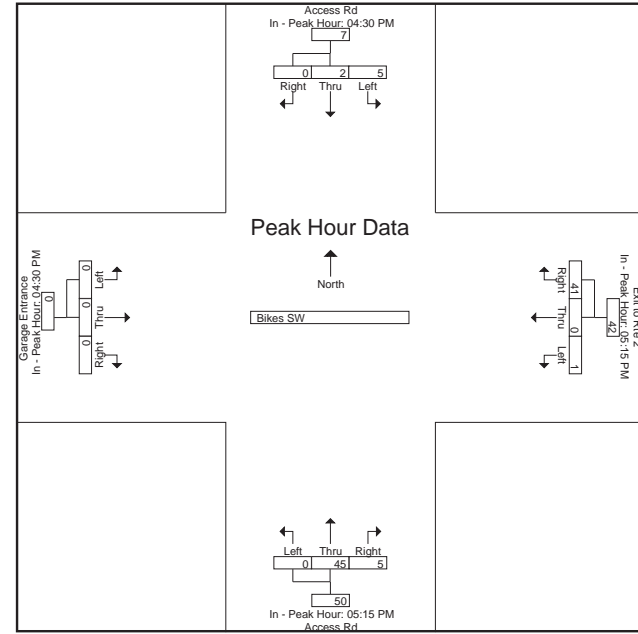
Peak Hour Analysis From 04:30 PM to 06:15 PM - Peak 1 of 1

Peak Hour for Each Approach Begins at:	04:30 PM			05:15 PM			05:15 PM			04:30 PM							
+0 mins.	0	1	0	1	0	0	12	12	0	14	0	14	0	0	0	0	0
+15 mins.	3	0	0	3	0	0	7	7	0	5	1	6	0	0	0	0	0
+30 mins.	2	0	0	2	1	0	14	15	0	10	1	11	0	0	0	0	0
+45 mins.	0	1	0	1	0	0	8	8	0	16	3	19	0	0	0	0	0
Total Volume	5	2	0	7	1	0	41	42	0	45	5	50	0	0	0	0	0
% App. Total	71.4	28.6	0	7	2.4	0	97.6	42	0	90	10	50	0	0	0	0	0
PHF	.417	.500	.000	.583	.250	.000	.732	.700	.000	.703	.417	.658	.000	.000	.000	.000	.000

Accurate Counts
978-664-2565

N/S Street : Alewife 'T' Access Road
E/W Street : Garage / Exit to Route 2
City/State : Cambridge, MA
Weather : Clear

File Name : 11810005
Site Code : 11810005
Start Date : 12/6/2012
Page No : 3



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Synchro Results

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Existing Conditions

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Lane Group	WBT	SWR
Lane Group Flow (vph)	1471	1336
v/c Ratio	1.04	1.52
Control Delay	43.8	266.0
Queue Delay	68.9	0.0
Total Delay	112.7	266.0
Queue Length 50th (ft)	~368	~1456
Queue Length 95th (ft)	m32	#1367
Internal Link Dist (ft)	89	
Turn Bay Length (ft)		
Base Capacity (vph)	1417	878
Starvation Cap Reductn	193	0
Spillback Cap Reductn	0	0
Storage Cap Reductn	0	0
Reduced v/c Ratio	1.20	1.52

Intersection Summary
 ~ Volume exceeds capacity, queue is theoretically infinite.
 Queue shown is maximum after two cycles.
 # 95th percentile volume exceeds capacity, queue may be longer.
 Queue shown is maximum after two cycles.
 m Volume for 95th percentile queue is metered by upstream signal.



Movement	EBL	EBT	WBT	WBR	SWL	SWR
Lane Configurations			↑↑			↑
Volume (vph)	0	0	1363	0	0	1029
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900
Total Lost time (s)			2.5			4.5
Lane Util. Factor			0.95			1.00
Frt			1.00			0.86
Flt Protected			1.00			1.00
Satd. Flow (prot)			3505			1627
Flt Permitted			1.00			1.00
Satd. Flow (perm)			3505			1627
Peak-hour factor, PHF	0.92	0.92	0.94	0.92	0.92	0.77
Adj. Flow (vph)	0	0	1471	0	0	1336
RTOR Reduction (vph)	0	0	0	0	0	3
Lane Group Flow (vph)	0	0	1471	0	0	1333
Heavy Vehicles (%)	2%	2%	3%	2%	2%	1%
Turn Type			1 2			custom
Protected Phases						
Permitted Phases						3 4
Actuated Green, G (s)			46.0			64.0
Effective Green, g (s)			46.5			64.5
Actuated g/C Ratio			0.39			0.54
Clearance Time (s)						
Lane Grp Cap (vph)			1358			875
v/s Ratio Prot			c0.42			c0.82
v/c Ratio Perm			1.08			1.52
Uniform Delay, d1			36.8			27.8
Progression Factor			0.63			1.00
Incremental Delay, d2			38.9			241.3
Delay (s)			62.2			269.0
Level of Service			E			F
Approach Delay (s)			0.0			269.0
Approach LOS			A			F

Intersection Summary	
HCM Average Control Delay	160.6 HCM Level of Service F
HCM Volume to Capacity ratio	1.32
Actuated Cycle Length (s)	120.0 Sum of lost time (s) 7.0
Intersection Capacity Utilization	109.0% ICU Level of Service H
Analysis Period (min)	15
c Critical Lane Group	

	EBL	WBR	SBT	NWT
Lane Group Flow (vph)	472	210	312	1273
v/c Ratio	0.82	0.71	0.30	1.43
Control Delay	59.2	27.9	32.2	232.3
Queue Delay	0.0	23.2	0.0	240.8
Total Delay	59.2	51.1	32.2	473.0
Queue Length 50th (ft)	182	143	96	-702
Queue Length 95th (ft)	#258	214	126	#839
Internal Link Dist (ft)			106	210
Turn Bay Length (ft)				
Base Capacity (vph)	579	297	1048	891
Starvation Cap Reductn	0	0	0	0
Spillback Cap Reductn	0	81	0	243
Storage Cap Reductn	0	0	0	0
Reduced v/c Ratio	0.82	0.97	0.30	1.96

Intersection Summary
 ~ Volume exceeds capacity, queue is theoretically infinite.
 # 95th percentile volume exceeds capacity, queue may be longer.
 Queue shown is maximum after two cycles.
 Queue shown is maximum after two cycles.

Movement	EBL	WBR	SBT	NWT
Lane Configurations	↔	↔	↔	↔
Volume (vph)	434	174	265	1209
Ideal Flow (vphpl)	1900	1900	1900	1900
Lane Width	9	12	11	12
Total Lost time (s)	4.5	4.5	4.5	4.5
Lane Util. Factor	0.97	1.00	0.95	0.95
Flt	1.00	0.86	1.00	1.00
Flt Protected	0.95	1.00	1.00	1.00
Satd. Flow (prot)	3090	950	3355	2850
Flt Permitted	0.95	1.00	1.00	1.00
Satd. Flow (perm)	3090	950	3355	2850
Peak-hour factor, PHF	0.92	0.83	0.85	0.95
Adj. Flow (vph)	472	210	312	1273
RTOR Reduction (vph)	0	0	0	0
Lane Group Flow (vph)	472	210	312	1273
Heavy Vehides (%)	2%	12%	4%	2%
Turn Type	Prot custom			
Protected Phases	4			
Permitted Phases	2 2 3 2			
Actuated Green, G (s)	22.0 37.0 37.0 37.0			
Effective Green, g (s)	22.5 37.5 37.5 37.5			
Actuated g/C Ratio	0.19 0.31 0.31 0.31			
Clearance Time (s)	5.0 5.0 5.0 5.0			
Lane Grp Cap (vph)	579 297 1048 891			
v/s Ratio Prot	c0.15 c0.09 c0.45			
v/c Ratio Perm	0.82 0.71 0.30 1.43			
Uniform Delay, d1	46.8 36.4 31.3 41.2			
Progression Factor	1.00 0.38 1.00 1.00			
Incremental Delay, d2	12.0 13.0 0.7 199.4			
Delay (s)	58.7 26.8 32.0 240.7			
Level of Service	E C C F			
Approach Delay (s)	32.0 240.7			
Approach LOS	C C F			
Intersection Summary				
HCM Average Control Delay	154.3			HCM Level of Service F
HCM Volume to Capacity ratio	0.85			
Actuated Cycle Length (s)	120.0			
Intersection Capacity Utilization	79.5%			Sum of lost time (s) 22.5
Analysis Period (min)	15			ICU Level of Service D
c Critical Lane Group				

Queues
3: Alewife Brook Parkway & Route 2

1/16/2013

	SBT	SER
Lane Group	312	1161
Lane Group Flow (vph)	0.29	0.60
v/c Ratio	4.7	7.9
Control Delay	0.2	0.0
Queue Delay	4.9	7.9
Total Delay	6	144
Queue Length 50th (ft)	8	176
Queue Length 95th (ft)	189	
Internal Link Dist (ft)		
Turn Bay Length (ft)		
Base Capacity (vph)	1085	1948
Starvation Cap Reductn	282	0
Spillback Cap Reductn	0	0
Storage Cap Reductn	0	0
Reduced v/c Ratio	0.39	0.60

Intersection Summary

HCM Signalized Intersection Capacity Analysis
3: Alewife Brook Parkway & Route 2

1/15/2013

	NBL	NBT	SBT	SBR	SEL	SER
Movement						
Lane Configurations						
Volume (vph)	0	0	265	0	0	987
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900
Total Lost time (s)			4.5			2.5
Lane Util. Factor			0.95			0.88
Flt Protected			1.00			0.85
Flt Permitted			1.00			1.00
Satd. Flow (prot)			3471			2787
Satd. Flow (perm)			3471			2787
Peak-hour factor, PHF	0.92	0.92	0.85	0.92	0.92	0.85
Adj. Flow (vph)	0	0	312	0	0	1161
RTOR Reduction (vph)	0	0	0	0	0	223
Lane Group Flow (vph)	0	0	312	0	0	938
Heavy Vehicles (%)	2%	2%	4%	2%	2%	2%
Turn Type						custom
Protected Phases			3			1 2 4
Permitted Phases						
Actuated Green, G (s)			37.0			73.0
Effective Green, g (s)			37.5			69.0
Actuated g/C Ratio			0.31			0.58
Clearance Time (s)			5.0			
Lane Grp Cap (vph)			1085			1603
v/s Ratio Prot			c0.09			c0.34
v/c Ratio Perm			0.29			0.59
Uniform Delay, d1			31.2			16.3
Progression Factor			0.13			1.00
Incremental Delay, d2			0.6			1.6
Delay (s)			4.7			17.9
Level of Service			A			B
Approach Delay (s)		0.0	4.7		17.9	
Approach LOS		A	A		B	
Intersection Summary						
HCM Average Control Delay			15.1		HCM Level of Service	B
HCM Volume to Capacity ratio			0.46			
Actuated Cycle Length (s)			120.0		Sum of lost time (s)	9.5
Intersection Capacity Utilization			49.9%		ICU Level of Service	A
Analysis Period (min)			15			
c Critical Lane Group						

HCM Unsignalized Intersection Capacity Analysis
 8: Alewife Access Road & Route 2 Ramp

1/15/2013

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		Stop		Stop				Yield			Yield	
Sign Control												
Volume (vph)	0	0	0	0	0	0	0	0	203	70	989	225
Peak Hour Factor	0.92	0.92	0.92	0.92	0.92	0.92	0.96	0.96	0.96	0.83	0.83	0.83
Hourly flow rate (vph)	0	0	0	0	0	0	0	0	211	84	1192	271
Direction, Lane #	NB 1 SB 1											
Volume Total (vph)	211 1547											
Volume Left (vph)	0 84											
Volume Right (vph)	211 271											
Hadj (s)	-0.43 -0.06											
Departure Headway (s)	3.2 3.8											
Degree Utilization, x	0.19 1.65											
Capacity (veh/h)	1121 947											
Control Delay (s)	6.9 308.8											
Approach Delay (s)	6.9 308.8											
Approach LOS	A F											
Intersection Summary												
Delay	272.5											
HCM Level of Service	F											
Intersection Capacity Utilization	98.1%											
Analysis Period (min)	15											
ICU Level of Service	F											

Queues
 4: Route 2 & Alewife Brook Parkway

1/16/2013

Lane Group	WBT	WBR	NBT	NBR
Lane Group Flow (vph)	200	114	229	
v/c Ratio	0.28	0.16	0.12	
Control Delay	25.5	4.7	14.0	
Queue Delay	0.4	0.0	0.0	
Total Delay	25.8	4.7	14.0	
Queue Length 50th (ft)	103	0	44	
Queue Length 95th (ft)	154	33	61	
Internal Link Dist (ft)	93		133	
Turn Bay Length (ft)		200		
Base Capacity (vph)	704	700	1839	
Starvation Cap Reductn	0	0	0	
Spillback Cap Reductn	188	0	0	
Storage Cap Reductn	0	0	0	
Reduced v/c Ratio	0.39	0.16	0.12	
Intersection Summary				

HCM Signalized Intersection Capacity Analysis
4: Route 2 & Alewife Brook Parkway

1/15/2013

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (vph)	0	0	0	174	99	0	195	0	0	0	0	0
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	12	12	12	12	14	12	11	12	12	12	12	12
Total Lost time (s)				2.5	3.0		4.5					
Lane Util. Factor				1.00	1.00		0.95					
Flt				1.00	0.85		1.00					
Satd. Flow (prot)				1743	1580		3421					
Flt Permitted				1.00	1.00		1.00					
Satd. Flow (perm)				1743	1580		3421					
Peak-hour factor, PHF	0.92	0.92	0.92	0.87	0.87	0.85	0.85	0.85	0.85	0.92	0.92	0.92
Adj. Flow (vph)	0	0	0	200	114	0	229	0	0	0	0	0
RTOR Reduction (vph)	0	0	0	0	70	0	0	0	0	0	0	0
Lane Group Flow (vph)	0	0	0	200	44	0	229	0	0	0	0	0
Heavy Vehicles (%)	2%	2%	2%	9%	9%	2%	2%	2%	2%	2%	2%	2%
Turn Type				Prot								
Protected Phases				1.2	1.2		3.4					
Permitted Phases												
Actuated Green, G (s)				46.0	46.0		64.0					
Effective Green, g (s)				46.5	46.0		64.5					
Actuated g/C Ratio				0.39	0.38		0.54					
Clearance Time (s)												
Lane Grp Cap (vph)				675	606		1839					
v/s Ratio Prot				c0.11	0.03		c0.07					
v/c Ratio				0.30	0.07		0.12					
Uniform Delay, d1				25.4	23.5		13.8					
Progression Factor				1.00	1.00		1.00					
Incremental Delay, d2				1.1	0.2		0.1					
Delay (s)				26.5	23.7		13.9					
Level of Service				C	C		B					
Approach Delay (s)				25.5			13.9					0.0
Approach LOS				C			B					A
Intersection Summary												
HCM Average Control Delay				20.6								C
HCM Volume to Capacity ratio				0.19								
Actuated Cycle Length (s)				120.0								7.0
Intersection Capacity Utilization				24.6%								A
Analysis Period (min)				15								
c Critical Lane Group												

Queues
5: Cambridgepark Drive & Alewife Brook Parkway

1/16/2013

Lane Group	EBL	NBL	NBT	SBT	SBR
Lane Group Flow (vph)	573	253	1415	1340	66
v/c Ratio	0.73	0.81	0.59	0.82	0.05
Control Delay	26.9	31.1	6.2	30.7	0.1
Queue Delay	0.6	8.0	20.0	1.8	0.0
Total Delay	27.6	39.1	26.1	32.5	0.1
Queue Length 50th (ft)	212	107	115	423	0
Queue Length 95th (ft)	220	m114	m140	#662	0
Internal Link Dist (ft)	395		156	383	
Turn Bay Length (ft)					50
Base Capacity (vph)	1006	312	2415	1640	1372
Starvation Cap Reductn	0	35	1035	0	0
Spillback Cap Reductn	164	0	0	161	0
Storage Cap Reductn	0	0	0	0	0
Reduced v/c Ratio	0.68	0.91	1.03	0.91	0.05
Intersection Summary					
# 95th percentile volume exceeds capacity, queue may be longer.					
Queue shown is maximum after two cycles.					
m Volume for 95th percentile queue is metered by upstream signal.					

HCM Signalized Intersection Capacity Analysis
 5: Cambridgepark Drive & Alewife Brook Parkway

1/15/2013

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations	WV		W	W	W	W
Volume (vph)	31	422	245	1373	1193	59
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900
Lane Width	11	12	12	12	11	8
Total Lost time (s)	4.0	4.0	4.0	4.0	3.0	3.0
Lane Util. Factor	0.55	1.00	0.95	0.95	1.00	1.00
Flt	0.86	1.00	1.00	1.00	1.00	0.85
Flt Protected	1.00	0.95	1.00	1.00	1.00	1.00
Satd. Flow (prot)	2252	1787	3600	3200	3200	1372
Flt Permitted	1.00	0.09	1.00	1.00	1.00	1.00
Satd. Flow (perm)	2252	173	3600	3200	3200	1372
Peak-hour factor, PHF	0.79	0.79	0.97	0.97	0.89	0.89
Adj. Flow (vph)	39	534	253	1415	1340	66
RTOR Reduction (vph)	191	0	0	0	0	0
Lane Group Flow (vph)	382	0	253	1415	1340	66
Heavy Vehicles (%)	3%	3%	1%	1%	2%	2%
Turn Type	D:P+P					
Protected Phases	3.4	2	1.2	1.2	1	Free
Permitted Phases	1					
Actuated Green, G (s)	30.5	74.5	79.5	60.5	120.0	Free
Effective Green, g (s)	31.5	76.5	80.5	61.5	120.0	Free
Actuated g/C Ratio	0.26	0.64	0.67	0.51	1.00	1.00
Clearance Time (s)	5.0					
Vehicle Extension (s)	3.0					
Lane Grp Cap (vph)	591	312	2415	1640	1372	1372
v/s Ratio Prot	c0.17	c0.10	0.39	c0.42		
v/s Ratio Perm	0.41					
v/c Ratio	0.65	0.81	0.59	0.82	0.05	0.05
Uniform Delay, d1	39.3	36.6	10.7	24.5	0.0	0.0
Progression Factor	1.00	0.76	0.52	1.00	1.00	1.00
Incremental Delay, d2	2.4	1.5	0.0	4.6	0.1	0.1
Delay (s)	41.7	29.2	5.6	29.2	0.1	0.1
Level of Service	D	C	A	C	A	A
Approach Delay (s)	41.7	9.2	27.8			
Approach LOS	D	A	C			

Intersection Summary	
HCM Average Control Delay	21.5 HCM Level of Service C
HCM Volume to Capacity ratio	0.77
Actuated Cycle Length (s)	120.0 Sum of lost time (s) 12.0
Intersection Capacity Utilization	70.9% ICU Level of Service C
Analysis Period (min)	15
c Critical Lane Group	

Queues
 6: Rindge Ave. & Alewife Brook Parkway

1/16/2013

	WBL	WBR	NBT	SBT
Lane Group Flow (vph)	220	519	1348	1878
v/c Ratio	0.94	1.07	1.00	0.87
Control Delay	98.2	78.6	46.0	17.5
Queue Delay	0.0	9.6	6.3	20.8
Total Delay	98.2	88.1	52.3	38.3
Queue Length 50th (ft)	171	-197	467	744
Queue Length 95th (ft)	#326	#415	#774	#866
Internal Link Dist (ft)	628		2121	156
Turn Bay Length (ft)	100			
Base Capacity (vph)	233	484	1345	2147
Starvation Cap Reductn	0	0	0	335
Spillback Cap Reductn	0	11	29	0
Storage Cap Reductn	0	0	0	0
Reduced v/c Ratio	0.94	1.10	1.02	1.04

Intersection Summary
 ~ Volume exceeds capacity, queue is theoretically infinite.
 Queue shown is maximum after two cycles.
 # 95th percentile volume exceeds capacity, queue may be longer.
 Queue shown is maximum after two cycles.

HCM Signalized Intersection Capacity Analysis
6: Rindge Ave. & Alewife Brook Parkway

1/15/2013

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Volume (vph)	205	483	1135	92	0	1615
Ideal Flow (vphpl)	1800	1800	1800	1800	1900	1900
Lane Width	10	9	11	12	12	11
Total Lost time (s)	4.0	4.0	4.0	4.0	4.0	4.0
Lane Util. Factor	1.00	1.00	0.95	0.95	0.95	0.95
Flt	1.00	0.85	0.99	1.00	1.00	1.00
Flt Protected	0.95	1.00	1.00	1.00	1.00	1.00
Satd. Flow (prot)	1747	1377	2000	3200	3200	3200
Flt Permitted	0.95	1.00	1.00	1.00	1.00	1.00
Satd. Flow (perm)	1747	1377	2000	3200	3200	3200
Peak-hour factor, PHF	0.93	0.93	0.91	0.91	0.86	0.86
Adj. Flow (vph)	220	519	1247	101	0	1878
RTOR Reduction (vph)	0	301	4	0	0	0
Lane Group Flow (vph)	220	218	1344	0	0	1878
Heavy Vehicles (%)	0%	0%	2%	2%	2%	2%
Turn Type	Prot					
Protected Phases	3	3	1,2			1,2
Permitted Phases						
Actuated Green, G (s)	15.0	15.0	79.5			79.5
Effective Green, g (s)	16.0	16.0	80.5			80.5
Actuated g/C Ratio	0.13	0.13	0.67			0.67
Clearance Time (s)	5.0	5.0				
Vehicle Extension (s)	3.0	3.0				
Lane Grp Cap (vph)	233	184	1342			2147
v/s Ratio Prot	0.13	c0.16	c0.67			0.59
v/s Ratio Perm						
v/c Ratio	0.94	1.19	1.00			0.87
Uniform Delay, d1	51.6	52.0	19.8			15.7
Progression Factor	1.00	1.00	1.00			0.78
Incremental Delay, d2	43.3	125.4	25.0			2.9
Delay (s)	94.9	177.4	44.7			15.1
Level of Service	F	F	D			B
Approach Delay (s)	152.9	F	44.7			15.1
Approach LOS	F	F	D			B

Intersection Summary	
HCM Average Control Delay	50.8 HCM Level of Service D
HCM Volume to Capacity ratio	1.03
Actuated Cycle Length (s)	120.0 Sum of lost time (s) 23.5
Intersection Capacity Utilization	74.4% ICU Level of Service D
Analysis Period (min)	15
c Critical Lane Group	

Queues
7: Cambridgepark Drive & Cambridgepark Place

1/16/2013

Lane Group	EBT	WBT	WBR	NBT	SBL	SBT
Lane Group Flow (vph)	64	218	136	55	373	356
v/c Ratio	0.16	0.45	0.31	0.13	0.59	0.48
Control Delay	25.9	30.5	6.9	14.1	27.0	16.0
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	25.9	30.5	6.9	14.1	27.0	16.0
Queue Length 50th (ft)	27	102	0	8	174	110
Queue Length 95th (ft)	53	158	36	30	247	170
Internal Link Dist (ft)	145	395		322	442	
Turn Bay Length (ft)						
Base Capacity (vph)	404	482	434	439	635	738
Starvation Cap Reductn	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0
Reduced v/c Ratio	0.16	0.45	0.31	0.13	0.59	0.48

Intersection Summary

HCM Signalized Intersection Capacity Analysis
7: Cambridgepark Drive & Cambridgepark Place

1/15/2013

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (vph)	14	38	0	21	164	116	1	14	28	387	66	159
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	12	11	12	12	11	11	12	14	12	12	12	12
Total Lost time (s)	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	7.0	1.0	1.0	1.0
Lane Util. Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.95	0.95	0.95	0.95
Fpb, ped/bikes	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Fpb, ped/bikes	0.97	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Flt Protected	0.99	0.99	1.00	0.99	1.00	1.00	1.00	1.00	0.95	0.95	0.99	0.99
Satd. Flow (prot)	1571	1781	1209	1781	1209	1685	1685	1685	1681	1559	1559	1559
Flt Permitted	0.91	0.97	1.00	0.97	1.00	1.00	1.00	1.00	0.95	0.99	0.99	0.99
Satd. Flow (perm)	1454	1736	1209	1736	1209	1685	1685	1685	1681	1559	1559	1559
Peak-hour factor, PHF	0.81	0.81	0.85	0.85	0.85	0.85	0.77	0.77	0.77	0.84	0.84	0.84
Adj. Flow (vph)	17	47	0	25	193	136	1	18	36	461	79	189
RTOR Reduction (vph)	0	0	0	0	0	98	0	27	0	0	45	0
Lane Group Flow (vph)	0	64	0	0	218	38	0	28	0	373	311	0
Conf. Peds. (#/hr)	86	26	26	26	86	21	9	33	33	33	33	21
Conf. Bikes (#/hr)	10	10	10	10	10	10	10	10	10	10	10	10
Heavy Vehicles (%)	12%	12%	12%	2%	2%	2%	5%	5%	5%	2%	2%	2%
Turn Type	Perm	Perm	Perm	Perm	Perm	Perm	Split	Split	Split	Split	Split	Split
Protected Phases	4	4	4	4	4	4	3	3	3	2	2	2
Permitted Phases	4	4	4	4	4	4	3	3	3	2	2	2
Actuated Green, G (s)	21.0	21.0	21.0	21.0	21.0	21.0	18.0	18.0	18.0	36.0	36.0	36.0
Effective Green, g (s)	25.0	25.0	25.0	25.0	25.0	25.0	22.0	22.0	22.0	34.0	34.0	40.0
Actuated g/C Ratio	0.28	0.28	0.28	0.28	0.28	0.28	0.24	0.24	0.24	0.38	0.38	0.44
Clearance Time (s)	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0
Lane Grp Cap (vph)	404	482	336	482	336	412	412	412	635	635	635	635
v/s Ratio Prot	0.04	0.16	0.16	0.13	0.03	c0.13	0.03	c0.13	c0.22	0.20	0.20	0.20
v/s Ratio Perm	0.16	0.45	0.45	0.45	0.11	0.11	0.07	0.07	0.59	0.45	0.45	0.45
Uniform Delay, d1	24.6	26.8	24.2	26.8	24.2	26.1	26.1	26.1	22.4	22.4	17.3	17.3
Progression Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Incremental Delay, d2	0.8	3.0	0.7	3.0	0.7	0.3	0.3	0.3	4.0	4.0	2.1	2.1
Delay (s)	25.4	29.9	24.9	29.9	24.9	26.4	26.4	26.4	26.3	26.3	19.4	19.4
Level of Service	C	C	C	C	C	C	C	C	C	C	B	B
Approach Delay (s)	25.4	28.0	24.9	28.0	24.9	26.4	26.4	26.4	26.3	26.3	23.0	23.0
Approach LOS	C	C	C	C	C	C	C	C	C	C	B	B
Intersection Summary												
HCM Average Control Delay	24.7 HCM Level of Service C											
HCM Volume to Capacity ratio	0.39											
Actuated Cycle Length (s)	90.0 Sum of lost time (s) 9.0											
Intersection Capacity Utilization	59.2% ICU Level of Service B											
Analysis Period (min)	15											
c Critical Lane Group												

HCM Signalized Intersection Capacity Analysis
7: Cambridgepark Drive & Cambridgepark Drive

1/15/2013

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (vph)	0	0	0	0	0	0	0	0	0	203	70	225
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	12	11	12	12	12	12	12	12	12	12	12	12
Total Lost time (s)	0	0	0	0	0	0	0	0	0	0	0	0
Lane Util. Factor	0.92	0.92	0.92	0.92	0.92	0.92	0.96	0.96	0.96	0.83	0.83	0.83
Fpb, ped/bikes	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Fpb, ped/bikes	0.97	1.00	1.00	0.97	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Flt Protected	0.99	0.99	1.00	0.99	1.00	1.00	1.00	1.00	0.95	0.95	0.99	0.99
Satd. Flow (prot)	1571	1781	1209	1781	1209	1685	1685	1685	1681	1559	1559	1559
Flt Permitted	0.91	0.97	1.00	0.97	1.00	1.00	1.00	1.00	0.95	0.99	0.99	0.99
Satd. Flow (perm)	1454	1736	1209	1736	1209	1685	1685	1685	1681	1559	1559	1559
Peak-hour factor, PHF	0.81	0.81	0.85	0.85	0.85	0.85	0.77	0.77	0.77	0.84	0.84	0.84
Adj. Flow (vph)	17	47	0	25	193	136	1	18	36	461	79	189
RTOR Reduction (vph)	0	0	0	0	0	98	0	27	0	0	45	0
Lane Group Flow (vph)	0	64	0	0	218	38	0	28	0	373	311	0
Conf. Peds. (#/hr)	86	26	26	26	86	21	9	33	33	33	33	21
Conf. Bikes (#/hr)	10	10	10	10	10	10	10	10	10	10	10	10
Heavy Vehicles (%)	12%	12%	12%	2%	2%	2%	5%	5%	5%	2%	2%	2%
Turn Type	Perm	Perm	Perm	Perm	Perm	Perm	Split	Split	Split	Split	Split	Split
Protected Phases	4	4	4	4	4	4	3	3	3	2	2	2
Permitted Phases	4	4	4	4	4	4	3	3	3	2	2	2
Actuated Green, G (s)	21.0	21.0	21.0	21.0	21.0	21.0	18.0	18.0	18.0	36.0	36.0	36.0
Effective Green, g (s)	25.0	25.0	25.0	25.0	25.0	25.0	22.0	22.0	22.0	34.0	34.0	40.0
Actuated g/C Ratio	0.28	0.28	0.28	0.28	0.28	0.28	0.24	0.24	0.24	0.38	0.38	0.44
Clearance Time (s)	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0
Lane Grp Cap (vph)	404	482	336	482	336	412	412	412	635	635	635	635
v/s Ratio Prot	0.04	0.16	0.16	0.13	0.03	c0.13	0.03	c0.13	c0.22	0.20	0.20	0.20
v/s Ratio Perm	0.16	0.45	0.45	0.45	0.11	0.11	0.07	0.07	0.59	0.45	0.45	0.45
Uniform Delay, d1	24.6	26.8	24.2	26.8	24.2	26.1	26.1	26.1	22.4	22.4	17.3	17.3
Progression Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Incremental Delay, d2	0.8	3.0	0.7	3.0	0.7	0.3	0.3	0.3	4.0	4.0	2.1	2.1
Delay (s)	25.4	29.9	24.9	29.9	24.9	26.4	26.4	26.4	26.3	26.3	19.4	19.4
Level of Service	C	C	C	C	C	C	C	C	C	C	B	B
Approach Delay (s)	25.4	28.0	24.9	28.0	24.9	26.4	26.4	26.4	26.3	26.3	23.0	23.0
Approach LOS	C	C	C	C	C	C	C	C	C	C	B	B
Intersection Summary												
HCM Average Control Delay	24.7 HCM Level of Service C											
HCM Volume to Capacity ratio	0.39											
Actuated Cycle Length (s)	90.0 Sum of lost time (s) 9.0											
Intersection Capacity Utilization	59.2% ICU Level of Service B											
Analysis Period (min)	15											
c Critical Lane Group												



Lane Group	WBT	SWR
Lane Group Flow (vph)	2346	818
v/c Ratio	1.09	1.43
Control Delay	59.6	235.1
Queue Delay	50.3	0.0
Total Delay	109.9	235.1
Queue Length 50th (ft)	~343	~862
Queue Length 95th (ft)	m70	#1108
Internal Link Dist (ft)	89	
Turn Bay Length (ft)		
Base Capacity (vph)	2144	572
Starvation Cap Reductn	203	0
Spillback Cap Reductn	0	0
Storage Cap Reductn	0	0
Reduced v/c Ratio	1.21	1.43

Intersection Summary
 ~ Volume exceeds capacity, queue is theoretically infinite.
 Queue shown is maximum after two cycles.
 # 95th percentile volume exceeds capacity, queue may be longer.
 Queue shown is maximum after two cycles.
 m Volume for 95th percentile queue is metered by upstream signal.



Movement	EBL	EBT	WBT	WBR	SWL	SWR
Lane Configurations			↑↑			↑
Volume (vph)	0	0	2182	0	0	793
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900
Total Lost time (s)			2.0			4.5
Lane Util. Factor			0.95			1.00
Frt			1.00			0.86
Flt Protected			1.00			1.00
Satd. Flow (prot)			3574			1644
Flt Permitted			1.00			1.00
Satd. Flow (perm)			3574			1644
Peak-hour factor, PHF		0.92	0.92	0.92	0.92	0.97
Adj. Flow (vph)		0	2346	0	0	818
RTOR Reduction (vph)		0	0	0	0	3
Lane Group Flow (vph)		0	2346	0	0	815
Heavy Vehicles (%)		2%	2%	1%	2%	0%

Turn Type	Protected Phases	1 2	custom
Permitted Phases	Actuated Green, G (s)	69.0	3.4
Effective Green, g (s)	Actuated g/C Ratio	70.0	41.0
Actuated g/C Ratio	Clearance Time (s)	0.58	41.5
Clearance Time (s)	Lane Grp Cap (vph)	2065	0.35
Lane Grp Cap (vph)	v/s Ratio Prot	c0.66	569
v/s Ratio Prot	v/s Ratio Perm	1.13	c0.50
v/c Ratio	Uniform Delay, d1	25.0	1.43
Uniform Delay, d1	Progression Factor	0.56	39.2
Progression Factor	Incremental Delay, d2	57.0	1.00
Incremental Delay, d2	Delay (s)	71.1	204.3
Delay (s)	Level of Service	E	243.6
Level of Service	Approach Delay (s)	0.0	F
Approach Delay (s)	Approach LOS	A	243.6
Approach LOS	Intersection Summary		
Intersection Summary	HCM Average Control Delay	115.7	HCM Level of Service
HCM Average Control Delay	HCM Volume to Capacity ratio	1.22	F
HCM Volume to Capacity ratio	Actuated Cycle Length (s)	120.0	Sum of lost time (s)
Actuated Cycle Length (s)	Intersection Capacity Utilization	116.5%	6.5
Intersection Capacity Utilization	Analysis Period (min)	15	H
Analysis Period (min)	c Critical Lane Group		
c Critical Lane Group			

Queues
2: Route 2 & Alewife Brook Parkway

1/16/2013



	EBL	WBR	SBT	NWT
Lane Group	630	545	376	1811
Lane Group Flow (vph)	1.10	1.13	0.82	1.25
v/c Ratio	113.9	90.4	65.6	146.8
Control Delay	0.0	127.0	0.0	145.7
Queue Delay	113.9	217.4	65.6	292.5
Total Delay	~286	~491	151	~1167
Queue Length 50th (ft)	#381	#673	#225	#1344
Queue Length 95th (ft)	106	210		
Internal Link Dist (ft)				
Turn Bay Length (ft)				
Base Capacity (vph)	572	483	461	1449
Starvation Cap Reductn	0	0	0	0
Spillback Cap Reductn	0	99	0	299
Storage Cap Reductn	0	0	0	0
Reduced v/c Ratio	1.10	1.42	0.82	1.57

Intersection Summary

- ~ Volume exceeds capacity, queue is theoretically infinite.
- # 95th percentile volume exceeds capacity, queue may be longer.
- Queue shown is maximum after two cycles.
- Queue shown is maximum after two cycles.

HCM Signalized Intersection Capacity Analysis
2: Route 2 & Alewife Brook Parkway

1/15/2013



Movement	EBL	WBR	SBT	NWT
Lane Configurations	↔	↔	↔	↔
Volume (vph)	548	480	357	1702
Ideal Flow (vphpl)	1900	1900	1900	1900
Lane Width	9	12	11	12
Total Lost time (s)	4.0	4.0	4.0	4.0
Lane Util. Factor	0.97	1.00	0.95	0.75
Flt	1.00	0.86	1.00	1.00
Flt Protected	0.95	1.00	1.00	1.00
Satd. Flow (prot)	3120	950	3455	2850
Flt Permitted	0.95	1.00	1.00	1.00
Satd. Flow (perm)	3120	950	3455	2850
Peak-hour factor, PHF	0.87	0.88	0.95	0.94
Adj. Flow (vph)	630	545	376	1811
RTOR Reduction (vph)	0	0	0	0
Lane Group Flow (vph)	630	545	376	1811
Heavy Vehides (%)	1%	2%	1%	1%
Turn Type	Prot custom			
Protected Phases	4			
Permitted Phases	2 2 3 2			
Actuated Green, G (s)	21.0 60.0 15.0 60.0			
Effective Green, g (s)	22.0 61.0 16.0 61.0			
Actuated g/C Ratio	0.18 0.51 0.13 0.51			
Clearance Time (s)	5.0 5.0 5.0 5.0			
Lane Grp Cap (vph)	572 483 461 1449			
v/s Ratio Prot	c0.20 c0.11			
v/c Ratio	1.10 1.13 0.82 1.25			
Uniform Delay, d1	49.0 29.5 50.6 29.5			
Progression Factor	1.00 0.37 1.00 1.00			
Incremental Delay, d2	68.4 74.2 14.7 118.3			
Delay (s)	117.4 85.2 65.2 147.8			
Level of Service	F F E F			
Approach Delay (s)	65.2 147.8			
Approach LOS	E F			

Intersection Summary

HCM Average Control Delay	122.7	HCM Level of Service	F
HCM Volume to Capacity ratio	1.15		
Actuated Cycle Length (s)	120.0	Sum of lost time (s)	21.0
Intersection Capacity Utilization	115.6%	ICU Level of Service	H
Analysis Period (min)	15		

c Critical Lane Group

Queues
3: Alewife Brook Parkway & Route 2

1/16/2013

	SBT	SER
Lane Group	376	1246
Lane Group Flow (vph)	0.79	0.54
v/c Ratio	34.0	4.6
Control Delay	0.1	0.0
Queue Delay	34.1	4.6
Total Delay	40	138
Queue Length 50th (ft)	m/76	135
Queue Length 95th (ft)	189	
Internal Link Dist (ft)		
Turn Bay Length (ft)	477	2317
Base Capacity (vph)	2	0
Starvation Cap Reductn	0	0
Spillback Cap Reductn	0	0
Storage Cap Reductn	0.79	0.54
Reduced v/c Ratio		

Intersection Summary
m Volume for 95th percentile queue is metered by upstream signal.

HCM Signalized Intersection Capacity Analysis
3: Alewife Brook Parkway & Route 2

1/15/2013

Movement	NBL	NBT	SBT	SBR	SEL	SER
Lane Configurations			↑↑			↑↑
Volume (vph)	0	0	357	0	0	984
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900
Total Lost time (s)			4.0			2.5
Lane Util. Factor			0.95			0.88
Flt Protected			1.00			0.85
Flt Permitted			1.00			1.00
Satd. Flow (prot)			3574			2842
Satd. Flow (perm)			3574			2842
Peak-hour factor, PHF			0.92			0.92
Adj. Flow (vph)			0			1246
RTOR Reduction (vph)			0			0
Lane Group Flow (vph)			0			1236
Heavy Vehicles (%)			2%			0%
Turn Type						custom
Protected Phases			3			1 2 4
Permitted Phases						
Actuated Green, G (s)			15.0			95.0
Effective Green, g (s)			16.0			91.0
Actuated g/C Ratio			0.13			0.76
Clearance Time (s)			5.0			
Lane Grp Cap (vph)			477			2155
v/s Ratio Prot			c0.11			c0.43
v/c Ratio Perm			0.79			0.57
Uniform Delay, d1			50.4			6.2
Progression Factor			0.52			1.00
Incremental Delay, d2			7.2			1.1
Delay (s)			33.3			7.3
Level of Service			C			A
Approach Delay (s)			0.0			7.3
Approach LOS			A			A
Intersection Summary						
HCM Average Control Delay			13.3			HCM Level of Service B
HCM Volume to Capacity ratio			0.58			
Actuated Cycle Length (s)			120.0			Sum of lost time (s) 9.0
Intersection Capacity Utilization			51.0%			ICU Level of Service A
Analysis Period (min)			15			
c Critical Lane Group						

Queues
4: Route 2 & Alewife Brook Parkway

1/16/2013

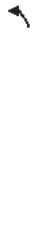


Lane Group	WBT	WBR	NBT
Lane Group Flow (vph)	539	420	319
v/c Ratio	0.75	0.50	0.33
Control Delay	26.2	5.1	30.2
Queue Delay	4.5	0.0	0.0
Total Delay	30.8	5.1	30.2
Queue Length 50th (ft)	498	38	95
Queue Length 95th (ft)	762	117	135
Internal Link Dist (ft)	93		133
Turn Bay Length (ft)	200		
Base Capacity (vph)	715	845	968
Starvation Cap Reductn	0	0	0
Spillback Cap Reductn	114	0	0
Storage Cap Reductn	0	0	0
Reduced v/c Ratio	0.90	0.50	0.33

Intersection Summary

HCM Signalized Intersection Capacity Analysis
4: Route 2 & Alewife Brook Parkway

1/15/2013



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBR
Lane Configurations											
Volume (vph)	0	0	0	0	480	374	0	306	0	0	0
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	12	12	12	12	14	14	12	11	12	12	12
Total Lost time (s)				2.5	3.0			4.5			
Lane Util. Factor				*0.58	*0.75			0.95			
Flt				1.00	0.85			1.00			
Flt Protected				1.00	1.00			1.00			
Satd. Flow (prot)				1200	1200			2800			
Flt Permitted				1.00	1.00			1.00			
Satd. Flow (perm)				1200	1200			2800			
Peak-hour factor, PHF	0.92	0.92	0.92	0.89	0.89	0.77	0.96	0.77	0.92	0.92	0.92
Adj. Flow (vph)	0	0	0	539	420	0	319	0	0	0	0
RTOR Reduction (vph)	0	0	0	0	140	0	0	0	0	0	0
Lane Group Flow (vph)	0	0	0	539	280	0	319	0	0	0	0
Heavy Vehicles (%)	2%	2%	2%	1%	1%	0%	1%	0%	2%	2%	2%
Turn Type	Prot										
Protected Phases	1 2 1 2										
Permitted Phases											
Actuated Green, G (s)	69.0 69.0 41.0										
Effective Green, g (s)	69.5 69.0 41.5										
Actuated g/C Ratio	0.58 0.58 0.35										
Clearance Time (s)											
Lane Grp Cap (vph)	695 690 968										
v/s Ratio Prot	c0.45 0.23 c0.11										
v/c Ratio	0.78 0.41 0.33										
Uniform Delay, d1	19.3 14.1 29.0										
Progression Factor	1.00 1.00 1.00										
Incremental Delay, d2	8.3 1.8 0.9										
Delay (s)	27.6 15.9 29.9										
Level of Service	C B C										
Approach Delay (s)	0.0 22.5 29.9										
Approach LOS	A C C										
Intersection Summary											
HCM Average Control Delay	24.3 HCM Level of Service C										
HCM Volume to Capacity ratio	0.60										
Actuated Cycle Length (s)	120.0 Sum of lost time (s) 7.0										
Intersection Capacity Utilization	40.8% ICU Level of Service A										
Analysis Period (min)	15										
c Critical Lane Group											

Queues
5: Cambridgepark Drive & Alewife Brook Parkway

1/16/2013



	EBL	NBL	NBT	SBT	SBR
Lane Group	1100	136	1788	1549	48
Lane Group Flow (vph)	1.28	0.89	1.09	1.08	0.03
v/c Ratio	163.6	34.8	56.4	82.1	0.1
Control Delay	179.2	1.7	258.4	19.7	0.0
Queue Delay	342.8	36.5	314.8	101.8	0.1
Total Delay	-535	46	-800	-703	0
Queue Length 50th (ft)	#669	m19	m114	#745	0
Queue Length 95th (ft)	395		156	383	
Internal Link Dist (ft)					50
Turn Bay Length (ft)					
Base Capacity (vph)	858	153	1643	1440	1386
Starvation Cap Reductn	0	2	571	0	0
Spillback Cap Reductn	204	0	0	60	0
Storage Cap Reductn	0	0	0	0	0
Reduced v/c Ratio	1.68	0.90	1.67	1.12	0.03

Intersection Summary
 ~ Volume exceeds capacity, queue is theoretically infinite.
 Queue shown is maximum after two cycles.
 # 95th percentile volume exceeds capacity, queue may be longer.
 Queue shown is maximum after two cycles.
 m Volume for 95th percentile queue is metered by upstream signal.

HCM Signalized Intersection Capacity Analysis
 5: Cambridgepark Drive & Alewife Brook Parkway

1/15/2013



Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations	WV		W	W	W	W
Volume (vph)	389	591	122	1609	1301	40
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900
Lane Width	11	12	12	12	11	8
Total Lost time (s)	4.0	4.0	4.0	4.0	4.0	3.0
Lane Util. Factor	0.97	1.00	1.00	0.95	0.95	1.00
Flt	0.91	1.00	1.00	1.00	1.00	0.85
Flt Protected	0.98	0.98	0.95	1.00	1.00	1.00
Satd. Flow (prot)	1774	1805	1805	3400	3600	1386
Flt Permitted	0.98	0.08	1.00	1.00	1.00	1.00
Satd. Flow (perm)	1774	158	3400	3600	1386	
Peak-hour factor, PHF	0.90	0.90	0.90	0.90	0.84	0.84
Adj. Flow (vph)	443	657	136	1788	1549	48
RTOR Reduction (vph)	60	0	0	0	0	0
Lane Group Flow (vph)	1040	0	136	1788	1549	48
Heavy Vehicles (%)	2%	2%	0%	0%	1%	1%
Turn Type	D,P+P					
Protected Phases	3.4	2	1.2	1	Free	
Permitted Phases	1					
Actuated Green, G (s)	53.0	52.0	57.0	47.0	120.0	Free
Effective Green, g (s)	54.0	54.0	58.0	48.0	120.0	120.0
Actuated g/C Ratio	0.45	0.45	0.48	0.40	1.00	1.00
Clearance Time (s)	5.0					
Vehicle Extension (s)	3.0					
Lane Grp Cap (vph)	798	153	1643	1440	1386	
v/s Ratio Prot	c0.59	0.04	c0.53	0.43		
v/s Ratio Perm	0.35	0.89	1.09	1.08	0.03	0.03
v/c Ratio	1.30	0.89	1.09	1.08	0.03	0.03
Uniform Delay, d1	33.0	53.4	31.0	36.0	0.0	0.0
Progression Factor	1.00	0.56	0.40	1.00	1.00	1.00
Incremental Delay, d2	145.6	6.1	40.9	47.0	0.0	0.0
Delay (s)	178.6	36.2	53.3	83.0	0.0	0.0
Level of Service	F	D	D	F	F	A
Approach Delay (s)	178.6		52.1	80.5		
Approach LOS	F		D	F		

Intersection Summary	
HCM Average Control Delay	92.0 HCM Level of Service F
HCM Volume to Capacity ratio	1.19
Actuated Cycle Length (s)	120.0 Sum of lost time (s) 8.0
Intersection Capacity Utilization	82.8% ICU Level of Service E
Analysis Period (min)	15
c Critical Lane Group	

Queues
6: Rindge Ave. & Alewife Brook Parkway

1/16/2013

	WBL	WBR	NBT	SBT
Lane Group	194	394	1808	2057
Lane Group Flow (vph)	0.53	0.68	1.85	1.23
v/c Ratio	48.5	13.2	409.6	124.2
Control Delay	0.0	2.2	57.3	54.8
Queue Delay	48.5	15.4	466.9	178.9
Total Delay	135	25	-1188	-1071
Queue Length 50th (ft)	207	120	#1338	m#664
Queue Length 95th (ft)	628	100	2121	156
Internal Link Dist (ft)	100			
Turn Bay Length (ft)	364	580	978	1670
Base Capacity (vph)	0	0	0	151
Starvation Cap Reductn	0	86	63	0
Spillback Cap Reductn	0	0	0	0
Storage Cap Reductn	0.53	0.80	1.98	1.35
Reduced v/c Ratio				

Intersection Summary

- ~ Volume exceeds capacity, queue is theoretically infinite. Queue shown is maximum after two cycles.
- # 95th percentile volume exceeds capacity, queue may be longer. Queue shown is maximum after two cycles.
- m Volume for 95th percentile queue is metered by upstream signal.

HCM Signalized Intersection Capacity Analysis
6: Rindge Ave. & Alewife Brook Parkway

1/15/2013

Movement	WBL	WBR	NBT	SBL	SBT
Lane Configurations	↔	↔	↔	↔	↔
Volume (vph)	171	347	1384	243	1892
Ideal Flow (vphpl)	1900	1900	1900	1900	1900
Lane Width	10	9	11	12	11
Total Lost time (s)	4.0	4.0	4.0	4.0	4.0
Lane Util. Factor	1.00	1.00	*0.90	1.00	0.95
Frpb, ped/bikes	1.00	1.00	1.00	1.00	1.00
Flt, ped/bikes	1.00	1.00	0.98	1.00	1.00
Flt Protected	0.95	1.00	1.00	1.00	1.00
Satd. Flow (prot)	1747	1439	2000		3455
Flt Permitted	0.95	1.00	1.00	1.00	1.00
Satd. Flow (perm)	1747	1439	2000		3455
Peak-hour factor, PHF	0.88	0.88	0.90	0.90	0.92
Adj. Flow (vph)	194	394	1538	270	2057
RTOR Reduction (vph)	0	280	11	0	0
Lane Group Flow (vph)	194	114	1797	0	2057
Confl. Bikes (#/hr)		4			
Heavy Vehicles (%)	1%	1%	0%	0%	1%
Turn Type	Prot	Prot			
Protected Phases	3	3	1 2		1 2
Permitted Phases					
Actuated Green, G (s)	24.0	24.0	57.0		57.0
Effective Green, g (s)	25.0	25.0	58.0		58.0
Actuated g/C Ratio	0.21	0.21	0.48		0.48
Clearance Time (s)	5.0	5.0			
Vehicle Extension (s)	3.0	3.0			
Lane Grp Cap (vph)	364	300	967		1670
v/s Ratio Prot	c0.11	0.08	c0.90		0.60
v/s Ratio Perm					
v/c Ratio	0.53	0.38	1.86		1.23
Uniform Delay, d1	42.3	40.8	31.0		31.0
Progression Factor	1.00	1.00	1.00		0.50
Incremental Delay, d2	1.5	0.8	390.3		104.8
Delay (s)	43.8	41.6	421.3		120.3
Level of Service	D	D	F		F
Approach Delay (s)	42.3		421.3		120.3
Approach LOS	D		F		F
Intersection Summary					
HCM Average Control Delay			232.2		HCM Level of Service F
HCM Volume to Capacity ratio			1.46		
Actuated Cycle Length (s)			120.0		Sum of lost time (s) 37.0
Intersection Capacity Utilization			74.2%		ICU Level of Service D
Analysis Period (min)			15		

c Critical Lane Group

Queues
7: Cambridgepark Drive & Alewife Access Road

1/16/2013

	EBT	WBT	WBR	NBT	SBL	SBT
Lane Group	374	114	82	121	396	399
Lane Group Flow (vph)	0.53	0.21	0.16	0.24	0.91	0.73
v/c Ratio	24.0	19.0	5.0	10.0	60.4	36.0
Control Delay	0.0	0.0	0.0	0.0	0.0	0.0
Queue Delay	24.0	19.0	5.0	10.0	60.4	36.0
Total Delay	158	42	0	11	230	207
Queue Length 50th (ft)	237	73	23	32	#403	315
Queue Length 95th (ft)	145	395		322	523	
Internal Link Dist (ft)						
Turn Bay Length (ft)						
Base Capacity (vph)	700	543	504	497	434	545
Starvation Cap Reductn	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0
Reduced v/c Ratio	0.53	0.21	0.16	0.24	0.91	0.73

Intersection Summary
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

HCM Signalized Intersection Capacity Analysis
7: Cambridgepark Drive & Alewife Access Road

1/15/2013

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		4			4			4			4	
Volume (vph)	28	290	11	49	47	69	13	4	70	641	32	35
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	12	11	12	12	11	11	12	14	12	12	12	12
Total Lost time (s)	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0
Lane Util. Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.98	0.99	0.95	0.95	0.95
Flpb, ped/bikes	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.98	0.99	1.00	1.00	0.99
Flt	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.89	0.89	1.00	1.00	0.99
Flt Protected	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.99	0.99	0.95	0.95	0.96
Satd. Flow (prot)	1787	1787	1783	1138	1732	1732	1732	1732	1698	1698	1680	1680
Flt Permitted	0.97	0.74	1.00	0.99	0.99	0.99	0.99	0.99	0.95	0.95	0.96	0.96
Satd. Flow (perm)	1745	1356	1138	1732	1732	1732	1732	1732	1698	1680	1680	1680
Peak-hour factor, PHF	0.88	0.88	0.84	0.84	0.84	0.84	0.72	0.72	0.72	0.89	0.89	0.89
Adj. Flow (vph)	32	330	12	58	56	82	18	6	97	720	36	39
RTOR Reduction (vph)	0	1	0	0	0	49	0	73	0	0	4	0
Lane Group Flow (vph)	0	373	0	0	114	33	0	48	0	396	395	0
Confl. Peds. (#/hr)	118	11	11	11	118	32	11	11	11	11	11	32
Confl. Bikes (#/hr)	4	4	4	4	4	4	4	4	4	4	4	4
Heavy Vehicles (%)	0%	0%	0%	0%	0%	0%	1%	1%	1%	1%	1%	1%
Turn Type	Perm	Perm	Perm	Perm	Perm	Perm	Split	Split	Split	Split	Split	Split
Protected Phases	6	6	6	6	6	6	4	4	4	2	2	2
Permitted Phases	6	6	6	6	6	6	4	4	4	2	2	2
Actuated Green, G (s)	32.0	32.0	32.0	32.0	32.0	32.0	18.0	18.0	18.0	25.0	25.0	25.0
Effective Green, g (s)	36.0	36.0	36.0	36.0	36.0	36.0	22.0	22.0	22.0	23.0	23.0	23.0
Actuated g/C Ratio	0.40	0.40	0.40	0.40	0.40	0.40	0.24	0.24	0.24	0.26	0.26	0.32
Clearance Time (s)	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0
Lane Grp Cap (vph)	698	542	455	423	423	423	434	434	434	541	541	541
v/s Ratio Prot	c0.21	0.08	0.03	0.03	0.03	0.03	c0.03	c0.03	c0.23	0.24	0.24	0.24
v/c Ratio Perm	0.53	0.21	0.07	0.11	0.11	0.11	0.11	0.11	0.91	0.73	0.73	0.73
Uniform Delay, d1	20.6	17.7	16.7	16.7	16.7	16.7	26.4	26.4	32.5	27.0	27.0	27.0
Progression Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Incremental Delay, d2	2.9	0.9	0.3	0.5	0.5	0.5	26.0	26.0	26.0	8.4	8.4	8.4
Delay (s)	23.5	18.6	17.0	17.0	17.0	17.0	27.0	27.0	58.6	35.4	35.4	35.4
Level of Service	C	B	B	B	B	B	C	C	E	D	D	D
Approach Delay (s)	23.5	17.9	17.9	17.9	17.9	17.9	27.0	27.0	47.0	47.0	47.0	47.0
Approach LOS	C	B	B	B	B	B	C	C	D	D	D	D

Intersection Summary	Value	Unit
HCM Average Control Delay	35.6	HCM Level of Service
HCM Volume to Capacity ratio	0.52	
Actuated Cycle Length (s)	90.0	Sum of lost time (s)
Intersection Capacity Utilization	59.2%	ICU Level of Service
Analysis Period (min)	15	

c Critical Lane Group

HCM Signalized Intersection Capacity Analysis

Alewife Access Road & Route Ramp

1/15/2013

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		Stop		Stop				field			field	
Sign Control												
Volume (vph)	0	0	0	0	0	0	0	0	534	320	565	3
Peak Hour Factor	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.93	0.92	0.87	0.87
Hourly flow rate (vph)	0	0	0	0	0	0	0	0	574	348	672	3
Direction, Lane #	NB 1 SB 1											
Volume Total (vph)	574 1024											
Volume Left (vph)	0 348											
Volume Right (vph)	574 3											
Hadj (s)	-0.53 0.12											
Departure Headway (s)	3.2 4.0											
Degree Utilization, x	0.51 1.14											
Capacity (veh/h)	1116 904											
Control Delay (s)	9.5 94.6											
Approach LOS	A F											
Intersection Summary												
Delay	64.0											
HCM Level of Service	F											
Intersection Capacity Utilization	97.1%											
Analysis Period (min)	15											
ICU Level of Service	F											

Build Conditions

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Queues
1: Route 2 & Route 16

2/12/2013

Lane Group	WBT	SWR
Lane Group Flow (vph)	1476	1336
v/c Ratio	1.04	1.52
Control Delay	45.3	266.0
Queue Delay	69.5	0.0
Total Delay	114.8	266.0
Queue Length 50th (ft)	-370	-1456
Queue Length 95th (ft)	m33	#1367
Internal Link Dist (ft)		
Turn Bay Length (ft)	89	
Base Capacity (vph)	1417	878
Starvation Cap Reductn	193	0
Spillback Cap Reductn	0	0
Storage Cap Reductn	0	0
Reduced v/c Ratio	1.21	1.52

- Volume exceeds capacity, queue is theoretically infinite.
Queue shown is maximum after two cycles.

95th percentile volume exceeds capacity, queue may be longer.

Queue shown is maximum after two cycles.

m Volume for 95th percentile queue is metered by upstream signal.

Intersection Summary

HCM Signalized Intersection Capacity Analysis
1: Route 2 & Route 16

2/12/2013

Movement	EBL	EBT	WBT	WBR	SWL	SWR
Lane Configurations			↕↕			↕
Volume (vph)	0	0	1387	0	0	1029
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900
Total Lost time (s)			2.5			4.5
Lane Util. Factor			0.95			1.00
Frt Protected			1.00			0.86
Flt Protected			1.00			1.00
Satd. Flow (prot)			3505			1627
Flt Permitted			1.00			1.00
Satd. Flow (perm)			3505			1627
Peak-hour factor, PHF	0.92	0.92	0.94	0.92	0.92	0.77
Adj. Flow (vph)	0	0	1476	0	0	1336
RTOR Reduction (vph)	0	0	0	0	0	3
Lane Group Flow (vph)	0	0	1476	0	0	1333
Heavy Vehicles (%)	2%	2%	3%	2%	2%	1%
Turn Type			1 2			custom
Protected Phases						
Permitted Phases						3 4
Actuated Green, G (s)			46.0			64.0
Effective Green, g (s)			46.5			64.5
Actuated g/C Ratio			0.39			0.54
Clearance Time (s)						
Lane Grp Cap (vph)			1358			875
v/s Ratio Prot			c0.42			c0.82
v/s Ratio Perm						
v/c Ratio			1.09			1.52
Uniform Delay, d1			36.8			27.8
Progression Factor			0.63			1.00
Incremental Delay, d2			40.5			241.3
Delay (s)			63.8			269.0
Level of Service			E			F
Approach Delay (s)		0.0	63.8		269.0	
Approach LOS		A	E		F	
Intersection Summary						
HCM Average Control Delay			161.3			HCM Level of Service
HCM Volume to Capacity ratio			1.32			F
Actuated Cycle Length (s)			120.0			Sum of lost time (s)
Intersection Capacity Utilization			109.1%			ICU Level of Service
Analysis Period (min)			15			H
c Critical Lane Group						

Queues
2: Route 2 & Alewife Brook Parkway

HCM Signalized Intersection Capacity Analysis
2: Route 2 & Alewife Brook Parkway

	EBL	WBR	SBT	NWT
Lane Group	472	212	313	1275
Lane Group Flow (vph)	0.82	0.71	0.30	1.43
v/c Ratio	59.2	28.4	32.2	233.2
Control Delay	0.0	26.0	0.0	246.7
Queue Delay	59.2	54.4	32.2	479.9
Total Delay	182	145	96	~703
Queue Length 50th (ft)	#258	216	127	#841
Queue Length 95th (ft)				
Internal Link Dist (ft)			106	210
Turn Bay Length (ft)				
Base Capacity (vph)	579	297	1048	891
Starvation Cap Reductn	0	0	0	0
Spillback Cap Reductn	0	82	0	247
Storage Cap Reductn	0	0	0	0
Reduced v/c Ratio	0.82	0.99	0.30	1.98

Movement	EBL	WBR	SBT	NWT
Lane Configurations	↔	↔	↔	↔
Volume (vph)	434	176	266	1211
Ideal Flow (vphpl)	1900	1900	1900	1900
Lane Width	9	12	11	12
Total Lost time (s)	4.5	4.5	4.5	4.5
Lane Util. Factor	0.97	1.00	0.95	0.95
Flt	1.00	0.86	1.00	1.00
Flt Protected	0.95	1.00	1.00	1.00
Satd. Flow (prot)	3090	950	3355	2850
Flt Permitted	0.95	1.00	1.00	1.00
Satd. Flow (perm)	3090	950	3355	2850
Peak-hour factor, PHF	0.92	0.83	0.85	0.95
Adj. Flow (vph)	472	212	313	1275
RTOR Reduction (vph)	0	0	0	0
Lane Group Flow (vph)	472	212	313	1275
Heavy Vehicles (%)	2%	12%	4%	2%
Turn Type	Prot	custom		
Protected Phases	4		3	
Permitted Phases		2		2
Actuated Green, G (s)	22.0	37.0	37.0	37.0
Effective Green, g (s)	22.5	37.5	37.5	37.5
Actuated g/C Ratio	0.19	0.31	0.31	0.31
Clearance Time (s)	5.0	5.0	5.0	5.0
Lane Grp Cap (vph)	579	297	1048	891
v/s Ratio Prot	c0.15		c0.09	
v/s Ratio Perm	0.82	0.71	0.30	1.43
v/c Ratio	46.8	36.5	31.3	41.2
Uniform Delay, d1	1.00	0.38	1.00	1.00
Progression F actor	12.0	13.4	0.7	200.4
Incremental Delay, d2	58.7	27.2	32.0	241.7
Delay (s)	E	C	C	F
Level of Service				
Approach Delay (s)			32.0	241.7
Approach LOS			C	F

Intersection Summary

HCM Average Control Delay	154.8	HCM Level of Service	F
HCM Volume to Capacity ratio	0.85		
Actuated Cycle Length (s)	120.0	Sum of lost time (s)	22.5
Intersection Capacity Utilization	79.7%	ICU Level of Service	D
Analysis Period (min)	15		

c Critical Lane Group

Intersection Summary

HCM Average Control Delay	154.8	HCM Level of Service	F
HCM Volume to Capacity ratio	0.85		
Actuated Cycle Length (s)	120.0	Sum of lost time (s)	22.5
Intersection Capacity Utilization	79.7%	ICU Level of Service	D
Analysis Period (min)	15		

c Critical Lane Group

Queues
3: Alewife Brook Parkway & Route 2

2/12/2013

	SBT	SER
Lane Group	313	1161
Lane Group Flow (vph)	0.29	0.60
v/c Ratio	4.7	7.9
Control Delay	0.2	0.0
Queue Delay	4.9	7.9
Total Delay	6	145
Queue Length 50th (ft)	8	177
Queue Length 95th (ft)	189	
Internal Link Dist (ft)		
Turn Bay Length (ft)		
Base Capacity (vph)	1085	1947
Starvation Cap Reductin	281	0
Spillback Cap Reductin	0	0
Storage Cap Reductin	0	0
Reduced v/c Ratio	0.39	0.60

Intersection Summary

HCM Signalized Intersection Capacity Analysis
3: Alewife Brook Parkway & Route 2

2/12/2013

Movement	NBL	NBT	SBT	SBR	SEL	SER
Lane Configurations			↑↑			↑↑
Volume (vph)	0	0	266	0	0	987
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900
Total Lost time (s)			4.5			2.5
Lane Util. Factor			0.95			0.88
Flt Protected			1.00			0.85
Flt Permitted			1.00			1.00
Satd. Flow (prot)			3471			2787
Satd. Flow (perm)			3471			2787
Peak-hour factor, PHF	0.92	0.92	0.85	0.92	0.92	0.85
Adj. Flow (vph)	0	0	313	0	0	1161
RTOR Reduction (vph)	0	0	0	0	0	222
Lane Group Flow (vph)	0	0	313	0	0	939
Heavy Vehicles (%)	2%	2%	4%	2%	2%	2%
Turn Type			3			custom
Protected Phases			1 2 4			
Permitted Phases						
Actuated Green, G (s)			37.0			73.0
Effective Green, g (s)			37.5			69.0
Actuated g/C Ratio			0.31			0.58
Clearance Time (s)			5.0			
Lane Grp Cap (vph)			1085			1603
v/s Ratio Prot.			c0.09			c0.34
v/s Ratio Perm						
v/c Ratio			0.29			0.59
Uniform Delay, d1			31.2			16.3
Progression Factor			0.13			1.00
Incremental Delay, d2			0.7			1.6
Delay (s)			4.7			17.9
Level of Service			A			B
Approach Delay (s)	0.0	4.7	17.9			
Approach LOS	A	A				B
Intersection Summary						
HCM Average Control Delay			15.1			HCM Level of Service B
HCM Volume to Capacity ratio			0.46			
Actuated Cycle Length (s)			120.0			Sum of lost time (s) 9.5
Intersection Capacity Utilization			49.9%			ICU Level of Service A
Analysis Period (min)			15			
c Critical Lane Group						

4: Route 2 & Alewife Brook Parkway

2/12/2013



Lane Group	WBT	WBR	NBT
Lane Group Flow (vph)	202	123	239
v/c Ratio	0.29	0.17	0.13
Control Delay	25.5	4.6	14.0
Queue Delay	0.4	0.0	0.0
Total Delay	25.9	4.6	14.0
Queue Length 50th (ft)	104	0	46
Queue Length 95th (ft)	156	34	64
Internal Link Dist (ft)	93		133
Turn Bay Length (ft)	200		
Base Capacity (vph)	704	706	1839
Starvation Cap Reductn	0	0	0
Spillback Cap Reductn	187	0	0
Storage Cap Reductn	0	0	0
Reduced v/c Ratio	0.39	0.17	0.13

Intersection Summary

HCM Signalized Intersection Capacity Analysis

4: Route 2 & Alewife Brook Parkway

2/12/2013



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBR
Lane Configurations											
Volume (vph)	0	0	0	0	176	107	0	203	0	0	0
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	12	12	12	12	14	12	11	12	12	12	12
Total Lost time (s)				2.5	3.0			4.5			
Lane Util. Factor				1.00	1.00			0.95			
Flt				1.00	0.85			1.00			
Flt Protected				1.00	1.00			1.00			
Satd. Flow (prot)				1743	1580			3421			
Flt Permitted				1.00	1.00			1.00			
Satd. Flow (perm)				1743	1580			3421			
Peak-hour factor, PHF	0.92	0.92	0.87	0.87	0.87	0.85	0.85	0.85	0.85	0.92	0.92
Adj. Flow (vph)	0	0	0	0	202	123	0	239	0	0	0
RTOR Reduction (vph)	0	0	0	0	0	76	0	0	0	0	0
Lane Group Flow (vph)	0	0	0	0	202	47	0	239	0	0	0
Heavy Vehicles (%)	2%	2%	2%	9%	9%	2%	2%	2%	2%	2%	2%
Turn Type					Prot						
Protected Phases					1 2			3 4			
Permitted Phases											
Actuated Green, G (s)					46.0	46.0		64.0			
Effective Green, g (s)					46.5	46.0		64.5			
Actuated g/C Ratio					0.39	0.38		0.54			
Clearance Time (s)											
Lane Grp Cap (vph)					675	606		1839			
v/s Ratio Prot					c0.12	0.03		c0.07			
v/c Ratio					0.30	0.08		0.13			
Uniform Delay, d1					25.5	23.5		13.8			
Progression F factor					1.00	1.00		1.00			
Incremental Delay, d2					1.1	0.3		0.1			
Delay (s)					26.6	23.8		13.9			
Level of Service					C	C		B			
Approach Delay (s)					25.5			13.9			0.0
Approach LOS					A			B			A
Intersection Summary											
HCM Average Control Delay					20.6						C
HCM Volume to Capacity ratio					0.20						
Actuated Cycle Length (s)					120.0						7.0
Intersection Capacity Utilization					24.7%						A
Analysis Period (min)					15						
c Critical Lane Group											

2/12/2013
 Queues
 5: Cambridgepark Drive & Alewife Brook Parkway

	EBL	NBL	NBT	SBT	SBR
Lane Group	EBL	NBL	NBT	SBT	SBR
Lane Group Flow (vph)	618	261	1415	1340	67
v/c Ratio	0.76	0.86	0.60	0.84	0.05
Control Delay	28.2	34.8	7.0	33.5	0.1
Queue Delay	1.6	14.6	22.7	3.1	0.0
Total Delay	29.8	49.4	29.7	36.7	0.1
Queue Length 50th (ft)	240	127	132	455	0
Queue Length 95th (ft)	244	m126	m142	#693	0
Internal Link Dist (ft)	395		156	383	
Turn Bay Length (ft)					50
Base Capacity (vph)	1006	302	2356	1588	1372
Starvation Cap Reductn	0	34	987	0	0
Spillback Cap Reductn	219	0	0	161	0
Storage Cap Reductn	0	0	0	0	0
Reduced v/c Ratio	0.79	0.97	1.03	0.94	0.05
Intersection Summary					
#	95th percentile volume exceeds capacity, queue may be longer.				
	Queue shown is maximum after two cycles.				
m	Volume for 95th percentile queue is metered by upstream signal.				

2/12/2013
 HCM Signalized Intersection Capacity Analysis
 5: Cambridgepark Drive & Alewife Brook Parkway

	EBL	EBR	NBL	NBT	SBT	SBR
Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations	WV					
Volume (vph)	40	448	253	1373	1193	60
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900
Lane Width	11	12	12	12	11	8
Total Lost time (s)	4.0	4.0	4.0	4.0	4.0	3.0
Lane Util. Factor	0.55	1.00	0.95	0.95	1.00	1.00
Flt	0.86	1.00	1.00	1.00	1.00	0.85
Flt Protected	1.00	1.00	0.95	1.00	1.00	1.00
Satd. Flow (prot)	2252	1787	3600	3200	1372	1372
Flt Permitted	1.00	0.08	1.00	1.00	1.00	1.00
Satd. Flow (perm)	2252	158	3600	3200	1372	1372
Peak-hour factor, PHF	0.79	0.79	0.97	0.97	0.89	0.89
Adj. Flow (vph)	51	567	261	1415	1340	67
RTOR Reduction (vph)	187	0	0	0	0	0
Lane Group Flow (vph)	431	0	261	1415	1340	67
Heavy Vehicles (%)	3%	3%	1%	1%	2%	2%
Turn Type	D,P+P					
Protected Phases	3 4		2	1 2	1	
Permitted Phases	1					
Actuated Green, G (s)	32.5		72.5	77.5	58.5	120.0
Effective Green, g (s)	33.5		74.5	78.5	59.5	120.0
Actuated g/C Ratio	0.28		0.62	0.65	0.50	1.00
Clearance Time (s)	5.0					
Vehicle Extension (s)	3.0					
Lane Grp Cap (vph)	629		302	2355	1587	1372
v/s Ratio Prot	c0.11					
v/s Ratio Perm	c0.43					
v/c Ratio	0.69		0.86	0.60	0.84	0.05
Uniform Delay, d1	38.6		38.7	11.8	26.2	0.0
Progression Factor	1.00		0.76	0.53	1.00	1.00
Incremental Delay, d2	3.1		2.5	0.0	5.7	0.1
Delay (s)	41.7		32.1	6.3	31.9	0.1
Level of Service	D		C	A	C	A
Approach Delay (s)	41.7					
Approach LOS	D					
Intersection Summary						
HCM Average Control Delay	23.2					
HCM Volume to Capacity ratio	0.81					
Actuated Cycle Length (s)	120.0					
Intersection Capacity Utilization	72.4%					
Analysis Period (min)	15					
c Critical Lane Group	C					

Queues
6: Rindge Ave. & Alewife Brook Parkway

2/12/2013



Movement	WBL	WBR	NBT	SBT
Lane Group	220	527	1350	1908
Lane Configurations	0.94	1.09	1.03	0.91
Volume (vph)	98.2	84.3	54.6	20.7
v/c Ratio	0.0	15.9	13.8	39.7
Control Delay	98.2	100.2	68.3	60.5
Queue Delay	171	-210	-584	815
Total Delay	#326	#429	#796	#925
Queue Length 50th (ft)	628	2121	156	
Queue Length 95th (ft)	100			
Internal Link Dist (ft)	233	484	1313	2094
Turn Bay Length (ft)	0	0	0	337
Base Capacity (vph)	0	17	46	0
Starvation Cap Reductn	0	0	0	0
Spillback Cap Reductn	0	0	0	0
Storage Cap Reductn	0.94	1.13	1.07	1.09
Reduced v/c Ratio				

Intersection Summary
 - Volume exceeds capacity, queue is theoretically infinite.
 Queue shown is maximum after two cycles.
 # 95th percentile volume exceeds capacity, queue may be longer.
 Queue shown is maximum after two cycles.

HCM Signalized Intersection Capacity Analysis
 6: Rindge Ave. & Alewife Brook Parkway

2/12/2013



Movement	WBL	WBR	NBT	SBL	SBT
Lane Configurations	205	490	1137	92	1641
Volume (vph)	1800	1800	1800	1800	1900
Ideal Flow (vphpl)	10	9	11	12	11
Lane Width	4.0	4.0	4.0	4.0	4.0
Total Lost time (s)	1.00	1.00	0.95		0.95
Lane Util. Factor	1.00	0.85	0.99		1.00
Flt Permitted	0.95	1.00	1.00		1.00
Flt Protected	1.747	1377	2000		3200
Satd. Flow (prot)	0.95	1.00	1.00		1.00
Satd. Flow (perm)	1.747	1377	2000		3200
Peak-hour factor, PHF	0.93	0.93	0.91	0.91	0.86
Adj. Flow (vph)	220	527	1249	101	1908
RTOR Reduction (vph)	0	301	4	0	0
Lane Group Flow (vph)	220	226	1346	0	1908
Heavy Vehicles (%)	0%	0%	2%	2%	2%
Turn Type	Prot				
Protected Phases	3 3 1 2				
Permitted Phases					
Actuated Green, G (s)	15.0	15.0	77.5		77.5
Effective Green, g (s)	16.0	16.0	78.5		78.5
Actuated g/C Ratio	0.13	0.13	0.65		0.65
Clearance Time (s)	5.0	5.0			
Vehicle Extension (s)	3.0	3.0			
Lane Grp Cap (vph)	233	184	1308		2093
v/s Ratio Prot	0.13	c0.16	c0.67		0.60
v/s Ratio Perm					
v/c Ratio	0.94	1.23	1.03		0.91
Uniform Delay, d1	51.6	52.0	20.8		17.8
Progression Factor	1.00	1.00	1.00		0.79
Incremental Delay, d2	43.3	141.6	32.7		4.2
Delay (s)	94.9	193.6	53.4		18.2
Level of Service	F	F	D		B
Approach Delay (s)	164.5	53.4	18.2		18.2
Approach LOS	F	D	B		B

Intersection Summary
 HCM Average Control Delay 57.3 HCM Level of Service E
 HCM Volume to Capacity ratio 1.06
 Actuated Cycle Length (s) 120.0 Sum of lost time (s) 25.5
 Intersection Capacity Utilization 75.0% ICU Level of Service D
 Analysis Period (min) 15
 Critical Lane Group

2/12/2013
 Queue
 7: Cambridgepark Drive & Cambridgepark Place

	EBT	WBT	WBR	NBT	SBL	SBT
Lane Group	119	229	136	55	378	354
Lane Group Flow (vph)	0.30	0.48	0.31	0.13	0.60	0.48
v/c Ratio	28.1	31.0	6.9	14.1	27.2	15.7
Control Delay	0.0	0.0	0.0	0.0	0.0	0.0
Queue Delay	28.1	31.0	6.9	14.1	27.2	15.7
Total Delay	53	108	0	8	177	107
Queue Length 50th (ft)	88	166	36	30	250	167
Queue Length 95th (ft)	145	395		322	442	442
Internal Link Dist (ft)						
Turn Bay Length (ft)						
Base Capacity (vph)	403	481	434	439	635	739
Starvation Cap Reductn	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0
Reduced v/c Ratio	0.30	0.48	0.31	0.13	0.60	0.48

Intersection Summary

2/12/2013
 HCM Signalized Intersection Capacity Analysis
 7: Cambridgepark Drive & Cambridgepark Place

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		4			4			4			4	
Volume (vph)	23	74	0	21	173	116	1	14	28	387	66	161
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	12	11	12	12	11	11	12	14	12	12	12	12
Total Lost time (s)	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0
Lane Util. Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.95	0.95	0.95
Flpb, ped/bikes	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.97
Flpb, ped/bikes	1.00	0.97	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.92
Flt	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.92
Flt Protected	0.99	0.99	1.00	0.99	1.00	1.00	1.00	1.00	1.00	0.95	0.95	0.99
Satd. Flow (prot)	1580	1783	1209	1783	1209	1685	1685	1685	1685	1681	1556	1556
Flt Permitted	0.91	0.97	1.00	0.97	1.00	1.00	1.00	1.00	1.00	0.95	0.95	0.99
Satd. Flow (perm)	1451	1731	1209	1731	1209	1685	1685	1685	1685	1681	1556	1556
Peak-hour factor, PHF	0.81	0.81	0.81	0.85	0.85	0.85	0.77	0.77	0.77	0.84	0.84	0.84
Adj. Flow (vph)	28	91	0	25	204	136	1	18	36	461	79	192
RTOR Reduction (vph)	0	0	0	0	0	98	0	27	0	0	0	47
Lane Group Flow (vph)	0	119	0	0	229	38	0	28	0	378	307	0
Confl. Peds. (#/hr)	86	26	26	26	86	21	9	33	33	33	33	21
Confl. Bikes (#/hr)	10	10	10	10	10	9	9	33	33	33	33	21
Heavy Vehicles (%)	12%	12%	12%	2%	2%	2%	5%	5%	5%	2%	2%	2%
Turn Type	Perm	Perm	Perm	Perm	Perm	Perm	Split	Split	Split	Split	Split	Split
Protected Phases	4	4	4	4	4	4	3	3	3	2	2	2
Permitted Phases	4	4	4	4	4	4	3	3	3	2	2	2
Actuated Green, G (s)	21.0	21.0	21.0	21.0	21.0	21.0	18.0	18.0	18.0	36.0	36.0	36.0
Effective Green, g (s)	25.0	25.0	25.0	25.0	25.0	25.0	22.0	22.0	22.0	34.0	34.0	40.0
Actuated g/C Ratio	0.28	0.28	0.28	0.28	0.28	0.28	0.24	0.24	0.24	0.38	0.38	0.44
Clearance Time (s)	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0
Lane Grp Cap (vph)	403	481	336	481	336	412	412	412	412	635	692	692
v/s Ratio Prot	0.08	c0.13	0.03	c0.13	0.03	c0.22	c0.22	c0.22	c0.22	0.20	0.20	0.20
v/c Ratio Perm	0.30	0.48	0.11	0.48	0.11	0.07	0.07	0.07	0.07	0.60	0.44	0.44
Uniform Delay, d1	25.6	27.0	24.2	27.0	24.2	26.1	26.1	26.1	26.1	22.5	17.3	17.3
Progression F actor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Incremental Delay, d2	1.9	3.4	0.7	3.4	0.7	0.3	0.3	0.3	0.3	4.1	2.1	2.1
Delay (s)	27.4	30.4	24.9	30.4	24.9	26.4	26.4	26.4	26.4	26.6	19.4	19.4
Level of Service	C	C	C	C	C	C	C	C	C	C	C	B
Approach Delay (s)	27.4	28.4	28.4	28.4	28.4	26.4	26.4	26.4	26.4	23.1	23.1	23.1
Approach LOS	C	C	C	C	C	C	C	C	C	C	C	C
Intersection Summary												
HCM Average Control Delay	25.1 HCM Level of Service C											
HCM Volume to Capacity ratio	0.41											
Actuated Cycle Length (s)	90.0 Sum of last time (s) 9.0											
Intersection Capacity Utilization	59.2% ICU Level of Service B											
Analysis Period (min)	15											
c Critical Lane Group												

HCM Unsignalized Intersection Capacity Analysis

8: Alewife Access Road & Route 2 Ramp

2/12/2013

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Sign Control	Stop						Yield			Yield		
Volume (vph)	0	0	0	0	0	0	0	0	212	70	991	225
Peak Hour Factor	0.92	0.92	0.92	0.92	0.92	0.92	0.96	0.96	0.96	0.83	0.83	0.83
Hourly flow rate (vph)	0	0	0	0	0	0	0	0	221	84	1194	271
Direction, Lane #	NB.1 SB.1											
Volume Total (vph)	221						1549			271		
Volume Left (vph)	0						84			0		
Volume Right (vph)	221						271			271		
HadJ (s)	-0.43						-0.06			0.00		
Departure Headway (s)	3.2						3.8			3.8		
Degree Utilization, x	0.20						1.65			0.20		
Capacity (veh/h)	1121						947			1121		
Control Delay (s)	7.0						310.0			7.0		
Approach Delay (s)	7.0						310.0			7.0		
Approach LOS	A						F			A		
Intersection Summary												
Delay	272.2											
HCM Level of Service	F											
Intersection Capacity Utilization	98.8%											
Analysis Period (min)	15											

Queues
1: Route 2 & Route 16

2/12/2013

	WBT	SWR
Lane Group	2348	818
Lane Group Flow (vph)	1.70	1.43
v/c Ratio	60.0	235.1
Control Delay	50.4	0.0
Queue Delay	110.4	235.1
Total Delay	-344	-862
Queue Length 50th (ft)	m70	#1108
Queue Length 95th (ft)	89	
Internal Link Dist (ft)		
Turn Bay Length (ft)		
Base Capacity (vph)	2144	572
Starvation Cap Reductin	203	0
Spillback Cap Reductin	0	0
Storage Cap Reductin	0	0
Reduced v/c Ratio	1.21	1.43

Intersection Summary

- Volume exceeds capacity, queue is theoretically infinite. Queue shown is maximum after two cycles.
- # 95th percentile volume exceeds capacity, queue may be longer. Queue shown is maximum after two cycles.
- m Volume for 95th percentile queue is metered by upstream signal.

HCM Signalized Intersection Capacity Analysis
1: Route 2 & Route 16

2/12/2013

	EBL	EBT	WBT	WBR	SWL	SWR
Movement						
Lane Configurations						
Volume (vph)	0	0	2184	0	0	793
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900
Total Lost time (s)			2.0			4.5
Lane Util. Factor			0.95			1.00
Frt Protected			1.00			0.86
Flt Protected			1.00			1.00
Satd. Flow (prot)			3574			1644
Flt Permitted			1.00			1.00
Satd. Flow (perm)			3574			1644
Peak-hour factor, PHF	0.92	0.92	0.93	0.92	0.92	0.97
Adj. Flow (vph)	0	0	2348	0	0	818
RTOR Reduction (vph)	0	0	0	0	0	3
Lane Group Flow (vph)	0	0	2348	0	0	815
Heavy Vehicles (%)	2%	2%	1%	2%	2%	0%
Turn Type			1 2			custom
Protected Phases						
Permitted Phases						3 4
Actuated Green, G (s)			69.0			41.0
Effective Green, g (s)			70.0			41.5
Actuated g/C Ratio			0.58			0.35
Clearance Time (s)						
Lane Grp Cap (vph)			2065			569
v/s Ratio Prot.			c0.66			c0.50
v/s Ratio Perm						1.43
v/c Ratio			1.13			1.43
Uniform Delay, d1			25.0			39.2
Progression Factor			0.56			1.00
Incremental Delay, d2			57.4			204.3
Delay (s)			71.6			243.6
Level of Service			E			F
Approach Delay (s)			0.0			243.6
Approach LOS			A			F

Intersection Summary

HCM Average Control Delay	116.0	HCM Level of Service	F
HCM Volume to Capacity ratio	1.22		
Actuated Cycle Length (s)	120.0	Sum of lost time (s)	6.5
Intersection Capacity Utilization	116.6%	ICU Level of Service	H
Analysis Period (min)	15		
c Critical Lane Group			

Queues
2: Route 2 & Alewife Brook Parkway

2/12/2013



Movement	EBL	WBR	SBT	NWT
Lane Group	630	547	380	1812
Lane Group Flow (vph)	1.10	1.13	0.82	1.25
v/c Ratio	113.9	92.0	66.4	147.1
Control Delay	0.0	129.3	0.0	145.8
Queue Delay	113.9	221.3	66.4	292.9
Total Delay	-286	-493	153	-1168
Queue Length 50th (ft)	#381	#679	#228	#1344
Queue Length 95th (ft)				
Internal Link Dist (ft)			106	210
Turn Bay Length (ft)				
Base Capacity (vph)	572	483	461	1449
Starvation Cap Reductin	0	0	0	0
Spillback Cap Reductin	0	100	0	299
Storage Cap Reductin	0	0	0	0
Reduced v/c Ratio	1.10	1.43	0.82	1.58

Intersection Summary
 - Volume exceeds capacity, queue is theoretically infinite.
 # 95th percentile volume exceeds capacity, queue may be longer.
 Queue shown is maximum after two cycles.
 Queue shown is maximum after two cycles.

HCM Signalized Intersection Capacity Analysis
 2: Route 2 & Alewife Brook Parkway

2/12/2013



Movement	EBL	WBR	SBT	NWT
Lane Configurations	↔	↔	↔	↔
Volume (vph)	548	481	361	1703
Ideal Flow (vphpl)	1900	1900	1900	1900
Lane Width	9	12	11	12
Total Lost time (s)	4.0	4.0	4.0	4.0
Lane Util. Factor	0.97	1.00	0.95	0.75
Flt	1.00	0.86	1.00	1.00
Flt Protected	0.95	1.00	1.00	1.00
Satd. Flow (prot)	3120	950	3455	2850
Flt Permitted	0.95	1.00	1.00	1.00
Satd. Flow (perm)	3120	950	3455	2850
Peak-hour factor, PHF	0.87	0.88	0.95	0.94
Adj. Flow (vph)	630	547	380	1812
RTOR Reduction (vph)	0	0	0	0
Lane Group Flow (vph)	630	547	380	1812
Heavy Vehicles (%)	1%	2%	1%	1%
Turn Type	Prot. custom			
Protected Phases	4			
Permitted Phases	2			
Actuated Green, G (s)	21.0	60.0	15.0	60.0
Effective Green, g (s)	22.0	61.0	16.0	61.0
Actuated g/C Ratio	0.18	0.51	0.13	0.51
Clearance Time (s)	5.0	5.0	5.0	5.0
Lane Grp Cap (vph)	572	483	461	1449
v/s Ratio Prot	c0.20			
v/s Ratio Perm	0.58			
v/c Ratio	1.10	1.13	0.82	1.25
Uniform Delay, d1	490	295	50.6	295
Progression F actor	1.00	0.37	1.00	1.00
Incremental Delay, d2	68.4	75.8	15.3	118.6
Delay (s)	117.4	86.9	66.0	148.1
Level of Service	F	F	E	F
Approach Delay (s)	66.0			
Approach LOS	E			

Intersection Summary	
HCM Average Control Delay	123.2
HCM Level of Service	F
HCM Volume to Capacity ratio	1.15
Actuated Cycle Length (s)	120.0
Sum of lost time (s)	21.0
Intersection Capacity Utilization	115.8%
ICU Level of Service	H
Analysis Period (min)	15

c Critical Lane Group

Queues
3: Alewife Brook Parkway & Route 2

2/12/2013



Lane Group	SBT	SER
Lane Group Flow (vph)	380	1246
v/c Ratio	0.80	0.54
Control Delay	34.6	4.6
Queue Delay	0.1	0.0
Total Delay	34.7	4.6
Queue Length 50th (ft)	41	138
Queue Length 95th (ft)	m/6	136
Internal Link Dist (ft)	189	
Turn Bay Length (ft)		
Base Capacity (vph)	477	2317
Starvation Cap Reductin	2	0
Spillback Cap Reductin	0	0
Storage Cap Reductin	0	0
Reduced v/c Ratio	0.80	0.54

Intersection Summary
m Volume for 95th percentile queue is metered by upstream signal.

HCM Signalized Intersection Capacity Analysis
3: Alewife Brook Parkway & Route 2

2/12/2013



Movement	NBL	NBT	SBT	SBR	SEL	SER
Lane Configurations			↑↑			↑↑
Volume (vph)	0	0	361	0	0	984
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900
Total Lost time (s)			4.0			2.5
Lane Util. Factor			0.95			0.88
Flt Protected			1.00			0.85
Flt Permitted			1.00			1.00
Satd. Flow (prot)			3574			2842
Satd. Flow (perm)			3574			2842
Peak-hour factor, PHF			0.92			0.96
Adj. Flow (vph)			0			380
RTOR Reduction (vph)			0			0
Lane Group Flow (vph)			0			380
Heavy Vehicles (%)			2%			1%
Turn Type						3
Protected Phases						1 2 4
Permitted Phases						custom
Actuated Green, G (s)						15.0
Effective Green, g (s)						16.0
Actuated g/C Ratio						0.13
Clearance Time (s)						5.0
Lane Grp Cap (vph)						477
v/s Ratio Prot.						c0.11
v/s Ratio Perm						0.80
Uniform Delay, d1						50.4
Progression Factor						0.52
Incremental Delay, d2						7.4
Delay (s)						33.8
Level of Service						C
Approach Delay (s)						0.0
Approach LOS						A

Intersection Summary
HCM Average Control Delay 13.5 HCM Level of Service B
HCM Volume to Capacity ratio 0.59
Actuated Cycle Length (s) 120.0 Sum of lost time (s) 9.0
Intersection Capacity Utilization 51.1% ICU Level of Service A
Analysis Period (min) 15
c Critical Lane Group

4: Route 2 & Alewife Brook Parkway

2/12/2013



Lane Group	WBT	WBR	NBT
Lane Group Flow (vph)	540	425	323
v/c Ratio	0.76	0.50	0.33
Control Delay	26.3	5.4	30.2
Queue Delay	4.7	0.0	0.0
Total Delay	31.0	5.4	30.2
Queue Length 50th (ft)	500	44	96
Queue Length 95th (ft)	763	126	137
Internal Link Dist (ft)	93		133
Turn Bay Length (ft)	200		
Base Capacity (vph)	715	843	968
Starvation Cap Reductn	0	0	0
Spillback Cap Reductn	115	0	0
Storage Cap Reductn	0	0	0
Reduced v/c Ratio	0.90	0.50	0.33

Intersection Summary

HCM Signalized Intersection Capacity Analysis
4: Route 2 & Alewife Brook Parkway

2/12/2013



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBR
Lane Configurations											
Volume (vph)	0	0	0	0	481	378	0	310	0	0	0
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	12	12	12	12	14	12	11	12	12	12	12
Total Lost time (s)				2.5	3.0			4.5			
Lane Util. Factor				*0.58	*0.75			0.95			
Flt				1.00	0.85			1.00			
Flt Protected				1.00	1.00			1.00			
Satd. Flow (prot)				1200	1200			2800			
Flt Permitted				1.00	1.00			1.00			
Satd. Flow (perm)				1200	1200			2800			
Peak-hour factor, PHF	0.92	0.92	0.92	0.89	0.89	0.77	0.96	0.77	0.92	0.92	0.92
Adj. Flow (vph)	0	0	0	540	425	0	323	0	0	0	0
RTOR Reduction (vph)	0	0	0	0	138	0	0	0	0	0	0
Lane Group Flow (vph)	0	0	0	540	287	0	323	0	0	0	0
Heavy Vehicles (%)	2%	2%	2%	1%	1%	0%	1%	0%	2%	2%	2%

Turn Type

Protected Phases	1.2	1.2						3.4			
Permitted Phases											
Actuated Green, G (s)				69.0	69.0			41.0			
Effective Green, g (s)				69.5	69.0			41.5			
Actuated g/C Ratio				0.58	0.58			0.35			
Clearance Time (s)											

Lane Grp Cap (vph)

Lane Grp Cap (vph)	695	690						968			
v/s Ratio Prot	c0.45	0.24						c0.12			
v/c Ratio	0.78	0.42						0.33			
Uniform Delay, d1	19.3	14.2						290			
Progression F actor	1.00	1.00						1.00			
Incremental Delay, d2	8.3	1.8						0.9			
Delay (s)	27.7	16.1						30.0			

Level of Service

Level of Service	C	B						C			
Approach Delay (s)	0.0							30.0			0.0
Approach LOS	A							C			A

Intersection Summary

HCM Average Control Delay	24.4										
HCM Level of Service											C
HCM Volume to Capacity ratio	0.60										
Actuated Cycle Length (s)	120.0										7.0
Intersection Capacity Utilization	41.0%										A
Analysis Period (min)	15										

c Critical Lane Group

Queues
5: Cambridgepark Drive & Alewife Brook Parkway

2/12/2013

	EBL	NBL	NBT	SBT	SBR
Lane Group	1121	173	1788	1549	52
Lane Group Flow (vph)	1.31	1.13	1.09	1.08	0.04
v/c Ratio	174.0	95.5	56.9	82.1	0.0
Control Delay	188.7	0.0	268.3	19.7	0.0
Queue Delay	362.7	95.5	325.3	101.8	0.0
Total Delay	-552	-99	-800	-703	0
Queue Length 50th (ft)	#688	m37	m121	#745	0
Queue Length 95th (ft)	395	156	383		
Internal Link Dist (ft)					50
Turn Bay Length (ft)					
Base Capacity (vph)	858	153	1643	1440	1386
Starvation Cap Reductn	0	0	585	0	0
Spillback Cap Reductn	209	0	0	60	0
Storage Cap Reductn	0	0	0	0	0
Reduced v/c Ratio	1.73	1.13	1.69	1.12	0.04

Intersection Summary
 - Volume exceeds capacity, queue is theoretically infinite.
 Queue shown is maximum after two cycles.
 # 95th percentile volume exceeds capacity, queue may be longer.
 Queue shown is maximum after two cycles.
 m Volume for 95th percentile queue is metered by upstream signal.

HCM Signalized Intersection Capacity Analysis
5: Cambridgepark Drive & Alewife Brook Parkway

2/12/2013

	EBL	EBR	NBL	NBT	SBT	SBR
Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations	404	605	156	1609	1301	44
Volume (vph)	1900	1900	1900	1900	1900	1900
Ideal Flow (vphpl)	11	12	12	12	11	8
Lane Width	4.0	4.0	4.0	4.0	4.0	3.0
Total Lost time (s)	0.97	1.00	0.95	0.95	1.00	1.00
Lane Util. Factor	0.91	1.00	1.00	1.00	1.00	0.85
Flt Protected	0.98	0.95	1.00	1.00	1.00	1.00
Satd. Flow (prot)	1774	1805	3400	3600	1386	
Flt Permitted	0.98	0.08	1.00	1.00	1.00	1.00
Satd. Flow (perm)	1774	158	3400	3600	1386	
Peak-hour factor, PHF	0.90	0.90	0.90	0.90	0.84	0.84
Adj. Flow (vph)	449	672	173	1788	1549	52
RTOR Reduction (vph)	60	0	0	0	0	0
Lane Group Flow (vph)	1061	0	173	1788	1549	52
Heavy Vehicles (%)	2%	2%	0%	0%	1%	1%
Turn Type	D,P+P					
Protected Phases	3.4	2	1.2	1		Free
Permitted Phases		1				Free
Actuated Green, G (s)	53.0	52.0	57.0	47.0	120.0	
Effective Green, g (s)	54.0	54.0	58.0	48.0	120.0	
Actuated g/C Ratio	0.45	0.45	0.48	0.40	1.00	
Clearance Time (s)		5.0	5.0			
Vehicle Extension (s)		3.0			3.0	
Lane Grp Cap (vph)	798	153	1643	1440	1386	
v/s Ratio Prot	c0.60	0.06	c0.53	0.43		
v/s Ratio Perm	c0.45				0.04	
v/c Ratio	1.33	1.13	1.09	1.08	0.04	
Uniform Delay, d1	33.0	53.9	31.0	36.0	0.0	
Progression Factor	1.00	0.58	0.42	1.00	1.00	
Incremental Delay, d2	156.9	66.9	40.9	47.0	0.1	
Delay (s)	189.9	98.2	54.0	83.0	0.1	
Level of Service	F	F	D	F	A	
Approach Delay (s)	189.9		57.9	80.3		
Approach LOS	F		E	F		

Intersection Summary	
HCM Average Control Delay	97.1 HCM Level of Service F
HCM Volume to Capacity ratio	1.21
Actuated Cycle Length (s)	120.0 Sum of lost time (s) 8.0
Intersection Capacity Utilization	85.3% ICU Level of Service E
Analysis Period (min)	15
c Critical Lane Group	

Queues
6: Rindge Ave. & Alewife Brook Parkway

2/12/2013



	WBL	WBR	NBT	SBT
Lane Group	194	424	1816	2072
Lane Group Flow (vph)	0.53	0.73	1.86	1.24
v/c Ratio	48.5	16.8	413.2	128.4
Control Delay	0.0	3.7	58.5	54.8
Queue Delay	48.5	20.4	471.7	183.2
Total Delay	135	46	-1196	-1084
Queue Length 50th (ft)	207	157	#1345	m#665
Queue Length 95th (ft)	628		2121	156
Internal Link Dist (ft)	100			
Turn Bay Length (ft)	364	580	978	1670
Base Capacity (vph)	0	0	0	150
Starvation Cap Reductn	0	87	64	0
Spillback Cap Reductn	0	0	0	0
Storage Cap Reductn	0.53	0.86	1.99	1.36

Intersection Summary
 - Volume exceeds capacity, queue is theoretically infinite.
 Queue shown is maximum after two cycles.
 # 95th percentile volume exceeds capacity, queue may be longer.
 Queue shown is maximum after two cycles.
 m Volume for 95th percentile queue is metered by upstream signal.

HCM Signalized Intersection Capacity Analysis
6: Rindge Ave. & Alewife Brook Parkway

2/12/2013



Movement	WBL	WBR	NBT	SBT
Lane Configurations	↔	↔	↔	↔
Volume (vph)	171	373	1391	243
Volume (vph)	1900	1900	1900	1900
Ideal Flow (vphpl)	10	9	11	12
Lane Width	4.0	4.0	4.0	4.0
Total Lost time (s)	1.00	1.00	0.90	0.95
Lane Util. Factor	1.00	1.00	1.00	1.00
Frpb, ped/bikes	1.00	1.00	1.00	1.00
Frpb, ped/bikes	1.00	0.85	0.98	1.00
Flt	0.95	1.00	1.00	1.00
Flt Protected	1747	1439	2000	3455
Satd. Flow (perm)	1747	1439	2000	3455
Peak-hour factor, PHF	0.88	0.88	0.90	0.90
Adj. Flow (vph)	194	424	1546	270
RTOR Reduction (vph)	0	280	11	0
Lane Group Flow (vph)	194	144	1805	0
Conf. Bikes (#/hr)	4			
Heavy Vehicles (%)	1%	1%	0%	1%
Turn Type	Prot			
Protected Phases	3	3	1	2
Permitted Phases				
Actuated Green, G (s)	24.0	24.0	57.0	57.0
Effective Green, g (s)	25.0	25.0	58.0	58.0
Actuated g/C Ratio	0.21	0.21	0.48	0.48
Clearance Time (s)	5.0	5.0		
Vehicle Extension (s)	3.0	3.0		
Lane Grp Cap (vph)	364	300	967	1670
v/s Ratio Prot	c0.11	0.10	c0.90	0.60
v/s Ratio Perm				
v/c Ratio	0.53	0.48	1.87	1.24
Uniform Delay, d1	42.3	41.8	31.0	31.0
Progression Factor	1.00	1.00	1.00	0.51
Incremental Delay, d2	1.5	1.2	394.0	108.8
Delay (s)	43.8	43.0	425.0	124.5
Level of Service	D	D	F	F
Approach Delay (s)	43.2	425.0	124.5	
Approach LOS	D	F	F	

Intersection Summary
 HCM Average Control Delay 234.5 HCM Level of Service F
 HCM Volume to Capacity ratio 1.47
 Actuated Cycle Length (s) 120.0 Sum of last time (s) 37.0
 Intersection Capacity Utilization 76.0% ICU Level of Service D
 Analysis Period (min) 15
 c Critical Lane Group

Queues
7: Cambridgepark Drive & Alewife Access Road

2/12/2013

	EBT	WBT	WBR	NBT	SBL	SBT
Lane Group	401	159	82	121	403	399
Lane Group Flow (vph)	0.58	0.28	0.16	0.24	0.93	0.73
v/c Ratio	25.1	19.9	5.0	10.0	63.2	35.9
Control Delay	0.0	0.0	0.0	0.0	0.0	0.0
Queue Delay	25.1	19.9	5.0	10.0	63.2	35.9
Total Delay	173	60	0	11	235	206
Queue Length 50th (ft)	258	98	23	32	412	314
Queue Length 95th (ft)	145	395		322	523	523
Internal Link Dist (ft)						
Turn Bay Length (ft)						
Base Capacity (vph)	694	570	504	497	434	545
Starvation Cap Reductin	0	0	0	0	0	0
Spillback Cap Reductin	0	0	0	0	0	0
Storage Cap Reductin	0	0	0	0	0	0
Reduced v/c Ratio	0.58	0.28	0.16	0.24	0.93	0.73

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

Intersection Summary

Protected Phases	6	6	6	6	4	2
Permitted Phases	6	6	6	6	4	2
Actuated Green, G (s)	32.0	32.0	32.0	32.0	18.0	25.0
Effective Green, g (s)	36.0	36.0	36.0	36.0	22.0	23.0
Actuated g/C Ratio	0.40	0.40	0.40	0.40	0.24	0.26
Clearance Time (s)	5.0	5.0	5.0	5.0	5.0	5.0
Lane Grp Cap (vph)	692	570	455	423	434	539
v/s Ratio Prot	c0.23	0.11	0.03	0.03	c0.03	c0.24
v/c Ratio Perm	0.58	0.28	0.07	0.11	0.93	0.73
Uniform Delay, d1	21.1	18.2	16.7	26.4	32.7	27.0
Progression F actor	1.00	1.00	1.00	1.00	1.00	1.00
Incremental Delay, d2	3.5	1.2	0.3	0.5	28.6	8.5
Delay (s)	24.6	19.5	17.0	27.0	61.3	35.5
Level of Service	C	B	B	C	E	D
Approach Delay (s)	24.6	18.6		27.0	48.4	
Approach LOS	C	B		C	D	

Intersection Summary	
HCM Average Control Delay	36.1 HCM Level of Service D
HCM Volume to Capacity ratio	0.54
Actuated Cycle Length (s)	90.0 Sum of last time (s) 9.0
Intersection Capacity Utilization	60.5% ICU Level of Service B
Analysis Period (min)	15

c Critical Lane Group

HCM Signalized Intersection Capacity Analysis
7: Cambridgepark Drive & Alewife Access Road

2/12/2013

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		4			4			4			4	
Volume (vph)	33	309	11	49	85	69	13	4	70	641	32	41
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	12	11	12	12	11	11	12	14	12	12	12	12
Total Lost time (s)	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0
Lane Util. Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.98	1.00	0.95	0.95	0.95
Frb, ped/bikes	1.00	1.00	1.00	1.00	1.00	1.00	0.98	1.00	1.00	1.00	1.00	0.99
Frb, ped/bikes	1.00	1.00	1.00	1.00	1.00	1.00	0.89	1.00	1.00	1.00	1.00	0.98
Flt	1.00	1.00	1.00	1.00	1.00	1.00	0.99	1.00	1.00	1.00	1.00	0.96
Flt Protected	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Satd. Flow (prot)	1787	1787	1787	1787	1787	1787	1732	1732	1698	1674	1698	1674
Flt Permitted	0.96	0.78	1.00	0.99	0.99	0.99	0.99	0.99	0.95	0.96	0.95	0.96
Satd. Flow (perm)	1731	1425	1138	1732	1732	1732	1732	1732	1698	1674	1698	1674
Peak-hour factor, PHF	0.88	0.88	0.88	0.84	0.84	0.84	0.72	0.72	0.72	0.89	0.89	0.89
Adj. Flow (vph)	38	351	12	58	101	82	18	6	97	720	36	46
RTOR Reduction (vph)	0	1	0	0	0	49	0	73	0	0	5	0
Lane Group Flow (vph)	0	400	0	0	159	33	0	48	0	403	394	0
Conf. Peds. (#/hr)	118	11	11	11	118	32	11	11	11	11	11	32
Conf. Bikes (#/hr)	4	4	4	4	4	5	2	2	2	2	2	2
Heavy Vehicles (%)	0%	0%	0%	0%	0%	0%	1%	1%	1%	1%	1%	1%

Turn Type	Perm	Perm	Perm	Perm	Perm	Split	Split
Protected Phases	6	6	6	6	4	4	2
Permitted Phases	6	6	6	6	4	4	2
Actuated Green, G (s)	32.0	32.0	32.0	32.0	18.0	25.0	25.0
Effective Green, g (s)	36.0	36.0	36.0	36.0	22.0	23.0	29.0
Actuated g/C Ratio	0.40	0.40	0.40	0.40	0.24	0.26	0.32
Clearance Time (s)	5.0	5.0	5.0	5.0	5.0	5.0	5.0
Lane Grp Cap (vph)	692	570	455	423	434	539	539
v/s Ratio Prot	c0.23	0.11	0.03	0.03	c0.03	c0.24	0.24
v/c Ratio Perm	0.58	0.28	0.07	0.11	0.93	0.73	0.73
Uniform Delay, d1	21.1	18.2	16.7	26.4	32.7	27.0	27.0
Progression F actor	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Incremental Delay, d2	3.5	1.2	0.3	0.5	28.6	8.5	8.5
Delay (s)	24.6	19.5	17.0	27.0	61.3	35.5	35.5
Level of Service	C	B	B	C	E	D	D
Approach Delay (s)	24.6	18.6		27.0	48.4		48.4
Approach LOS	C	B		C	D		D

Intersection Summary	
HCM Average Control Delay	36.1 HCM Level of Service D
HCM Volume to Capacity ratio	0.54
Actuated Cycle Length (s)	90.0 Sum of last time (s) 9.0
Intersection Capacity Utilization	60.5% ICU Level of Service B
Analysis Period (min)	15

c Critical Lane Group

HCM Unsignalized Intersection Capacity Analysis

8: Alewife Access Road & Route 2 Ramp

2/12/2013

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		Stop		Stop				Yield			Yield	
Sign Control												
Volume (vph)	0	0	0	0	0	0	0	0	539	320	591	3
Peak Hour Factor	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.93	0.92	0.87	0.87
Hourly flow rate (vph)	0	0	0	0	0	0	0	0	580	348	679	3
Direction, Lane #	NB,1 SB,1											
Volume Total (vph)	580 1031											
Volume Left (vph)	0 348											
Volume Right (vph)	580 3											
Hadj (s)	-0.53 0.12											
Departure Headway (s)	3.2 4.0											
Degree Utilization, x	0.52 1.15											
Capacity (veh/h)	1116 905											
Control Delay (s)	9.5 97.4											
Approach Delay (s)	9.5 97.4											
Approach LOS	A F											
Intersection Summary												
Delay	65.8											
HCM Level of Service	F											
Intersection Capacity Utilization	97.7%											
ICU Level of Service	F											
Analysis Period (min)	15											

Future Conditions

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Queues

1: Route 2 & Route 16

2/12/2013



Lane Group	WBT	SWR
Lane Group Flow (vph)	1533	1378
v/c Ratio	0.70	1.00
Control Delay	4.3	54.7
Queue Delay	2.4	0.0
Total Delay	6.7	54.7
Queue Length 50th (ft)	31	584
Queue Length 95th (ft)	m.30	535
Internal Link Dist (ft)	89	
Turn Bay Length (ft)		
Base Capacity (vph)	2203	1380
Starvation Cap Reductin	514	0
Spillback Cap Reductin	0	0
Storage Cap Reductin	0	0
Reduced v/c Ratio	0.91	1.00

Intersection Summary
m Volume for 95th percentile queue is metered by upstream signal.

HCM Signalized Intersection Capacity Analysis
1: Route 2 & Route 16

2/12/2013



Movement	EBL	EBT	WBT	WBR	SWL	SWR
Lane Configurations			←←←	→→→		←←
Volume (vph)	0	0	1441	0	0	1061
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900
Total Lost time (s)			4.5			4.5
Lane Util. Factor			0.91			0.88
Frt Protected			1.00			0.85
Flt Protected			1.00			1.00
Satd. Flow (prot)			5036			2814
Flt Permitted			1.00			1.00
Satd. Flow (perm)			5036			2814
Peak-hour factor, PHF		0.92	0.94	0.92	0.92	0.77
Adj. Flow (vph)		0	1533	0	0	1378
RTOR Reduction (vph)		0	0	0	0	8
Lane Group Flow (vph)		0	1533	0	0	1370
Heavy Vehicles (%)		2%	3%	2%	2%	1%
Turn Type			2			custom
Protected Phases						3 4
Permitted Phases						
Actuated Green, G (s)			52.0			58.0
Effective Green, g (s)			52.5			58.5
Actuated g/C Ratio			0.44			0.49
Clearance Time (s)			5.0			
Lane Grp Cap (vph)			2203			1372
v/s Ratio Prot.			c0.30			c0.49
v/s Ratio Perm						
v/c Ratio			0.70			1.00
Uniform Delay, d1			27.3			30.7
Progression Factor			0.14			1.00
Incremental Delay, d2			0.5			24.0
Delay (s)			4.3			54.7
Level of Service			A			D
Approach Delay (s)		0.0	4.3		54.7	
Approach LOS		A	A		D	

Intersection Summary	
HCM Average Control Delay	28.1 HCM Level of Service C
HCM Volume to Capacity ratio	0.86
Actuated Cycle Length (s)	120.0 Sum of lost time (s) 9.0
Intersection Capacity Utilization	72.5% ICU Level of Service C
Analysis Period (min)	15
c Critical Lane Group	

Queues
2: Route 2 & Alewife Brook Parkway



Movement	EBL	WBR	SBT	NWT
Lane Group Flow (vph)	503	223	329	1322
v/c Ratio	0.80	0.54	0.40	1.06
Control Delay	55.9	11.4	39.6	76.5
Queue Delay	0.0	0.0	0.0	0.0
Total Delay	55.9	11.4	39.6	76.5
Queue Length 50th (ft)	192	56	112	-592
Queue Length 95th (ft)	#258	78	147	#731
Internal Link Dist (ft)			106	210
Turn Bay Length (ft)				
Base Capacity (vph)	631	416	825	1247
Starvation Cap Reductn	0	0	0	0
Spillback Cap Reductn	0	0	0	0
Storage Cap Reductn	0	0	0	0
Reduced v/c Ratio	0.80	0.54	0.40	1.06

Intersection Summary
 - Volume exceeds capacity, queue is theoretically infinite.
 # 95th percentile volume exceeds capacity, queue may be longer.
 Queue shown is maximum after two cycles.
 Queue shown is maximum after two cycles.

HCM Signalized Intersection Capacity Analysis
2: Route 2 & Alewife Brook Parkway



Movement	EBL	WBR	SBT	NWT
Lane Configurations	↔	↔	↔	↔
Volume (vph)	463	185	280	1256
Ideal Flow (vphpl)	1900	1900	1900	1900
Lane Width	9	12	11	12
Total Lost time (s)	4.5	4.5	4.5	4.5
Lane Util. Factor	0.97	1.00	0.95	0.95
Flt	1.00	0.86	1.00	1.00
Flt Protected	0.95	1.00	1.00	1.00
Satd. Flow (prot)	3090	950	3355	2850
Flt Permitted	0.95	1.00	1.00	1.00
Satd. Flow (perm)	3090	950	3355	2850
Peak-hour factor, PHF	0.92	0.83	0.85	0.95
Adj. Flow (vph)	503	223	329	1322
RTOR Reduction (vph)	0	0	0	0
Lane Group Flow (vph)	503	223	329	1322
Heavy Vehicles (%)	2%	12%	4%	2%
Turn Type	Prot. custom			
Protected Phases	4			
Permitted Phases	2			
Actuated Green, G (s)	24.0			
Effective Green, g (s)	24.5			
Actuated g/C Ratio	0.20			
Clearance Time (s)	5.0			
Lane Grp Cap (vph)	631			
v/s Ratio Prot	c0.16			
v/c Ratio	0.80			
Uniform Delay, d1	45.4			
Progression Factor	1.00			
Incremental Delay, d2	10.1			
Delay (s)	55.5			
Level of Service	E			
Approach Delay (s)	39.3			
Approach LOS	D			

Intersection Summary	
HCM Average Control Delay	60.9
HCM Volume to Capacity ratio	0.82
Actuated Cycle Length (s)	120.0
Intersection Capacity Utilization	82.3%
Analysis Period (min)	15

c Critical Lane Group

Queues
3: Alewife Brook Parkway & Route 2

2/12/2013

	SBT	SER
Lane Group	329	1216
Lane Group Flow (vph)	0.39	0.61
v/c Ratio	5.7	8.6
Control Delay	0.2	0.0
Queue Delay	5.9	8.6
Total Delay	7	187
Queue Length 50th (ft)	9	218
Queue Length 95th (ft)	189	
Internal Link Dist (ft)		
Turn Bay Length (ft)		
Base Capacity (vph)	853	1999
Starvation Cap Reductio	99	0
Spillback Cap Reductio	0	0
Storage Cap Reductio	0	0
Reduced v/c Ratio	0.44	0.61

Intersection Summary

HCM Signalized Intersection Capacity Analysis
3: Alewife Brook Parkway & Route 2

2/12/2013

	NBL	NBT	SBT	SBR	SEL	SER
Movement						
Lane Configurations			↑↑			↑↑
Volume (vph)	0	0	280	0	0	1034
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900
Total Lost time (s)			4.5			4.5
Lane Util. Factor			0.95			0.88
Flt Protected			1.00			0.85
Flt Permitted			1.00			1.00
Satd. Flow (prot)			3471			2787
Satd. Flow (perm)			3471			2787
Peak-hour factor, PHF		0.92	0.85	0.92	0.92	0.85
Adj. Flow (vph)		0	329	0	0	1216
RTOR Reduction (vph)		0	0	0	0	107
Lane Group Flow (vph)		0	329	0	0	1109
Heavy Vehicles (%)		2%	2%	4%	2%	2%
Turn Type						custom
Protected Phases			3			2 4
Permitted Phases						
Actuated Green, G (s)			29.0			81.0
Effective Green, g (s)			29.5			81.5
Actuated g/C Ratio			0.25			0.68
Clearance Time (s)			5.0			
Lane Grp Cap (vph)			853			1893
v/s Ratio Prot.			c0.09			c0.40
v/s Ratio Perm						
v/c Ratio			0.39			0.59
Uniform Delay, d1			37.7			10.3
Progression Factor			0.12			1.00
Incremental Delay, d2			1.2			1.3
Delay (s)			5.7			11.6
Level of Service			A			B
Approach Delay (s)		0.0	5.7		11.6	
Approach LOS		A	A		B	
Intersection Summary						
HCM Average Control Delay			10.3		HCM Level of Service	B
HCM Volume to Capacity ratio			0.53			
Actuated Cycle Length (s)			120.0		Sum of lost time (s)	9.0
Intersection Capacity Utilization			52.0%		ICU Level of Service	A
Analysis Period (min)			15			
c Critical Lane Group						

Queues

4: Route 2 & Alewife Brook Parkway

2/12/2013



	WBT	WBR	NBT	NBR
Lane Group	213	151	286	
Lane Group Flow (vph)	0.28	0.14	0.34	
v/c Ratio	22.9	1.3	38.6	
Control Delay	0.0	0.0	0.0	
Queue Delay	22.9	1.3	38.6	
Total Delay	104	0	96	
Queue Length 50th (ft)	154	19	128	
Queue Length 95th (ft)	93		133	
Internal Link Dist (ft)	200			
Turn Bay Length (ft)	763	1116	841	
Base Capacity (vph)	0	0	0	
Starvation Cap Reductn	36	0	0	
Spillback Cap Reductn	0	0	0	
Storage Cap Reductn	0.29	0.14	0.34	
Reduced v/c Ratio				
Intersection Summary				

HCM Signalized Intersection Capacity Analysis
4: Route 2 & Alewife Brook Parkway

2/12/2013



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBT	SBR
Lane Configurations											
Volume (vph)	0	0	0	0	185	131	0	243	0	0	0
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	12	12	12	12	14	12	11	12	12	12	12
Total Lost time (s)	4.5			5.0			4.5				
Lane Util. Factor	1.00			1.00			0.95				
Flt	1.00			0.85			1.00				
Flt Protected	1.00			1.00			1.00				
Satd. Flow (prot)	1743			1580			3421				
Flt Permitted	1.00			1.00			1.00				
Satd. Flow (perm)	1743			1580			3421				
Peak-hour factor, PHF	0.92	0.92	0.87	0.87	0.87	0.85	0.85	0.85	0.92	0.92	0.92
Adj. Flow (vph)	0	0	0	0	213	151	0	286	0	0	0
RTOR Reduction (vph)	0	0	0	0	49	0	0	0	0	0	0
Lane Group Flow (vph)	0	0	0	0	213	102	0	286	0	0	0
Heavy Vehicles (%)	2%	2%	2%	9%	2%	9%	2%	2%	2%	2%	2%
Turn Type											
Protected Phases	2			2.4			3				
Permitted Phases											
Actuated Green, G (s)	52.0			81.0			29.0				
Effective Green, g (s)	52.5			81.0			29.5				
Actuated g/C Ratio	0.44			0.68			0.25				
Clearance Time (s)	5.0			5.0			5.0				
Lane Grp Cap (vph)	763			1067			841				
v/s Ratio Prot	c0.12			c0.06			c0.08				
v/c Ratio	0.28			0.10			0.34				
Uniform Delay, d1	21.6			6.8			37.2				
Progression F actor	1.00			1.00			1.00				
Incremental Delay, d2	0.9			0.2			1.1				
Delay (s)	22.5			7.0			38.3				
Level of Service	C			A			D				
Approach Delay (s)	16.1			38.3			0.0				
Approach LOS	A			B			D				
Intersection Summary											
HCM Average Control Delay	25.9			HCM Level of Service			C				
HCM Volume to Capacity ratio	0.26										
Actuated Cycle Length (s)	120.0			Sum of lost time (s)			14.0				
Intersection Capacity Utilization	25.6%			ICU Level of Service			A				
Analysis Period (min)	15										
c Critical Lane Group											

Queues
5: Cambridgepark Drive & Alewife Brook Parkway

2/12/2013

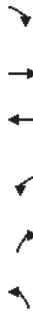


	EBL	NBL	NBT	SBT	SBR
Lane Group	763	293	1476	1403	73
Lane Group Flow (vph)	0.83	0.95	0.66	0.97	0.05
v/c Ratio	41.6	42.6	8.9	51.5	0.1
Control Delay	12.2	59.7	62.6	22.3	0.0
Queue Delay	53.8	102.4	71.6	73.8	0.1
Total Delay	367	169	154	-561	0
Queue Length 50th (ft)	356	m138	m139	#7777	0
Internal Link Dist (ft)	395		156	383	
Turn Bay Length (ft)					50
Base Capacity (vph)	1025	307	2223	1443	1372
Starvation Cap Reductn	4	51	920	0	0
Spillback Cap Reductn	247	0	0	111	0
Storage Cap Reductn	0	0	0	0	0
Reduced v/c Ratio	0.98	1.14	1.13	1.05	0.05

Intersection Summary
 - Volume exceeds capacity, queue is theoretically infinite.
 Queue shown is maximum after two cycles.
 # 95th percentile volume exceeds capacity, queue may be longer.
 Queue shown is maximum after two cycles.
 m Volume for 95th percentile queue is metered by upstream signal.

HCM Signalized Intersection Capacity Analysis
5: Cambridgepark Drive & Alewife Brook Parkway

2/12/2013



Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations	WV		W	W	W	W
Volume (vph)	68	535	284	1432	1249	65
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900
Lane Width	11	12	12	12	11	8
Total Lost time (s)	3.6	3.6	3.6	3.6	3.6	3.0
Lane Util. Factor	0.55	1.00	0.95	0.95	0.95	1.00
Flt	0.87	1.00	1.00	1.00	1.00	0.85
Flt Protected	0.99	0.95	1.00	1.00	1.00	1.00
Satd. Flow (prot)	2252	1787	3600	3200	1372	
Flt Permitted	0.99	0.07	1.00	1.00	1.00	1.00
Satd. Flow (perm)	2252	139	3600	3200	1372	
Peak-hour factor, PHF	0.79	0.79	0.97	0.97	0.89	0.89
Adj. Flow (vph)	86	677	293	1476	1403	73
RTOR Reduction (vph)	188	0	0	0	0	0
Lane Group Flow (vph)	575	0	293	1476	1403	73
Heavy Vehicles (%)	3%	3%	1%	1%	2%	2%
Turn Type	D,P+P					
Protected Phases	3.4		2	1.2	1	Free
Permitted Phases			1			Free
Actuated Green, G (s)	37.7		68.5	73.1	53.1	120.0
Effective Green, g (s)	38.7		70.5	74.1	54.1	120.0
Actuated g/C Ratio	0.32		0.59	0.62	0.45	1.00
Clearance Time (s)			4.6		4.6	
Vehicle Extension (s)			3.0		3.0	
Lane Grp Cap (vph)	726		307	2223	1443	1372
v/s Ratio Prot	c0.26		c0.13	0.41	c0.44	
v/s Ratio Perm	0.43		0.43		0.05	
v/c Ratio	0.79		0.95	0.66	0.97	0.05
Uniform Delay, d1	37.0		44.6	14.9	32.2	0.0
Progression Factor	1.49		0.76	0.54	1.00	1.00
Incremental Delay, d2	5.1		7.5	0.1	17.9	0.1
Delay (s)	60.1		41.2	8.1	50.2	0.1
Level of Service	E		D	A	D	A
Approach Delay (s)	60.1		13.6	47.7		
Approach LOS	E		B	D	D	

Intersection Summary	
HCM Average Control Delay	35.0 HCM Level of Service C
HCM Volume to Capacity ratio	0.91
Actuated Cycle Length (s)	120.0 Sum of lost time (s) 10.8
Intersection Capacity Utilization	79.2% ICU Level of Service D
Analysis Period (min)	15
c Critical Lane Group	

Queues
6: Rindge Ave. & Alewife Brook Parkway

2/12/2013



	WBL	WBR	NBT	SBT
Lane Group	226	560	1415	2074
Lane Group Flow (vph)	0.95	1.16	1.14	1.05
v/c Ratio	97.6	110.2	98.3	49.6
Control Delay	0.0	28.2	28.7	101.9
Queue Delay	97.6	138.4	127.0	151.6
Total Delay	176	-268	-686	-965
Queue Length 50th (ft)	#331	#491	#865	m# 1081
Queue Length 95th (ft)	628	2121	1556	
Internal Link Dist (ft)	100			
Turn Bay Length (ft)	239	484	1239	1976
Base Capacity (vph)	0	0	0	360
Starvation Cap Reductn	0	26	67	0
Spillback Cap Reductn	0	0	0	0
Storage Cap Reductn	0.95	1.22	1.21	1.28

Intersection Summary
 - Volume exceeds capacity, queue is theoretically infinite.
 Queue shown is maximum after two cycles.
 # 95th percentile volume exceeds capacity, queue may be longer.
 Queue shown is maximum after two cycles.
 m Volume for 95th percentile queue is metered by upstream signal.

HCM Signalized Intersection Capacity Analysis
6: Rindge Ave. & Alewife Brook Parkway

2/12/2013



	WBL	WBR	NBT	SBL	SBT
Movement	↙	↘	↑	↙	↘
Lane Configurations	↙	↘	↑	↙	↘
Volume (vph)	210	521	1194	94	1784
Ideal Flow (vphpl)	1800	1800	1800	1800	1900
Lane Width	10	9	11	12	11
Total Lost time (s)	3.6	3.6	3.6		3.6
Lane Util. Factor	1.00	1.00	0.95		0.95
Flt	1.00	0.85	0.99		1.00
Flt Protected	0.95	1.00	1.00		1.00
Satd. Flow (prot)	1747	1377	2000		3200
Flt Permitted	0.95	1.00	1.00		1.00
Satd. Flow (perm)	1747	1377	2000		3200
Peak-hour factor, PHF	0.93	0.93	0.91	0.91	0.86
Adj. Flow (vph)	226	560	1312	103	2074
RTOR Reduction (vph)	0	296	4	0	0
Lane Group Flow (vph)	226	264	1411	0	2074
Heavy Vehicles (%)	0%	0%	2%	2%	2%
Turn Type	Prot				
Protected Phases	3 3 1 2				
Permitted Phases					
Actuated Green, G (s)	15.4	15.4	73.1		73.1
Effective Green, g (s)	16.4	16.4	74.1		74.1
Actuated g/C Ratio	0.14	0.14	0.62		0.62
Clearance Time (s)	4.6	4.6			
Vehicle Extension (s)	3.0	3.0			
Lane Grp Cap (vph)	239	188	1235		1976
v/s Ratio Prot	0.13	c0.19	c0.71		0.65
v/s Ratio Perm					
v/c Ratio	0.95	1.40	1.14		1.05
Uniform Delay, d1	51.4	51.8	23.0		23.0
Progression Factor	1.00	1.00	1.00		0.82
Incremental Delay, d2	43.0	210.4	74.2		28.6
Delay (s)	94.3	262.2	97.1		47.3
Level of Service	F	F	F		D
Approach Delay (s)	213.9	97.1	47.3		D
Approach LOS	F	F	F		D

Intersection Summary
 HCM Average Control Delay 94.4 HCM Level of Service F
 HCM Volume to Capacity ratio 1.19
 Actuated Cycle Length (s) 120.0 Sum of lost time (s) 29.5
 Intersection Capacity Utilization 78.7% ICU Level of Service D
 Analysis Period (min) 15
 Critical Lane Group

Queues
7: Cambridgepark Drive & Cambridgepark Place

	EBT	WBT	WBR	NBT	SBL	SBT
Lane Group	283	267	140	57	388	368
Lane Group Flow (vph)	0.66	0.46	0.31	0.21	0.53	0.48
v/c Ratio	42.4	14.1	1.3	22.5	28.4	18.9
Control Delay	0.0	0.0	0.0	0.0	0.0	0.0
Queue Delay	42.4	14.1	1.3	22.5	28.4	18.9
Total Delay	185	71	0	13	228	156
Queue Length 50th (ft)	248	m/6	m0	40	300	220
Queue Length 95th (ft)	145	395		322	442	
Internal Link Dist (ft)						
Turn Bay Length (ft)						
Base Capacity (vph)	428	586	445	278	728	767
Starvation Cap Reductn	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0
Reduced v/c Ratio	0.66	0.46	0.31	0.21	0.53	0.48

Intersection Summary
m Volume for 95th percentile queue is metered by upstream signal.

HCM Signalized Intersection Capacity Analysis
7: Cambridgepark Drive & Cambridgepark Place

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations	4	4	4	4	4	4	4	4	4	4	4	4
Volume (vph)	51	178	0	22	205	119	1	14	29	397	68	170
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	12	11	12	12	11	11	12	14	12	12	12	12
Total Lost time (s)	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0
Lane Util. Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.95	0.95	0.95
Flpb, ped/bikes	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Flpb, ped/bikes	0.97	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Flt	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Flt Protected	0.99	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.95	0.99	0.99
Satd. Flow (prot)	1575	1786	1034	1786	1034	1636	1636	1681	1509	1681	1509	1509
Flt Permitted	0.79	0.96	1.00	0.96	1.00	1.00	1.00	0.95	0.99	0.95	0.99	0.99
Satd. Flow (perm)	1253	1715	1034	1715	1034	1636	1636	1681	1509	1681	1509	1509
Peak-hour factor, PHF	0.81	0.81	0.85	0.85	0.85	0.85	0.77	0.77	0.77	0.84	0.84	0.84
Adj. Flow (vph)	63	220	0	26	241	140	1	18	38	473	81	202
RTOR Reduction (vph)	0	0	0	0	0	92	0	32	0	0	0	37
Lane Group Flow (vph)	0	283	0	0	267	48	0	25	0	388	331	0
Confl. Peds. (#/hr)	86	26	26	26	86	21	9	33	33	33	33	21
Confl. Bikes (#/hr)	10	10	10	10	10	9	9	9	9	9	9	9
Heavy Vehicles (%)	12%	12%	12%	2%	2%	2%	5%	5%	5%	2%	2%	2%
Turn Type	Perm	Perm	Perm	Perm	Perm	Perm	Split	Split	Split	Split	Split	Split
Protected Phases	4	4	4	4	4	4	6	6	6	2	2	2
Permitted Phases	4	4	4	4	4	4	6	6	6	2	2	2
Actuated Green, G (s)	37.0	37.0	37.0	37.0	37.0	37.0	14.0	14.0	14.0	54.0	54.0	54.0
Effective Green, g (s)	41.0	41.0	41.0	41.0	41.0	41.0	18.0	18.0	18.0	52.0	52.0	52.0
Actuated/C Ratio	0.34	0.34	0.34	0.34	0.34	0.34	0.15	0.15	0.15	0.43	0.43	0.43
Clearance Time (s)	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0
Lane Grp Cap (vph)	428	586	353	586	353	245	60.02	60.02	60.02	728	728	729
v/s Ratio Prot	c0.23	0.16	0.05	0.16	0.05	0.16	c0.23	c0.23	c0.23	0.22	0.22	0.22
v/s Ratio Perm	0.66	0.46	0.14	0.46	0.14	0.10	0.10	0.10	0.10	0.53	0.45	0.45
Uniform Delay, d1	33.6	30.8	27.3	30.8	27.3	44.0	44.0	44.0	44.0	25.1	20.5	20.5
Progression F actor	1.00	0.39	0.00	0.39	0.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Incremental Delay, d2	7.8	1.8	0.6	1.8	0.6	0.8	0.8	0.8	0.8	2.8	2.0	2.0
Delay (s)	41.4	13.8	0.6	13.8	0.6	44.8	44.8	44.8	44.8	27.8	22.6	22.6
Level of Service	D	B	A	B	A	D	D	D	D	C	C	C
Approach Delay (s)	41.4	9.3	9.3	9.3	9.3	44.8	44.8	44.8	44.8	25.3	25.3	25.3
Approach LOS	D	A	A	A	A	D	D	D	D	C	C	C
Intersection Summary												
HCM Average Control Delay	24.7 HCM Level of Service C											
HCM Volume to Capacity ratio	0.50											
Actuated Cycle Length (s)	120.0 Sum of lost time (s) 9.0											
Intersection Capacity Utilization	63.5% ICU Level of Service B											
Analysis Period (min)	15											
c Critical Lane Group												

HCM Unsignalized Intersection Capacity Analysis

8: Alewife Access Road & Route 2 Ramp

2/12/2013

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Sign Control		Stop		Stop				Yield			Yield	
Volume (vph)	0	0	0	0	0	0	0	0	245	72	1021	231
Peak Hour Factor	0.92	0.92	0.92	0.92	0.92	0.92	0.96	0.96	0.96	0.83	0.83	0.83
Hourly flow rate (vph)	0	0	0	0	0	0	0	0	255	87	1230	278
Direction, Lane #	NB.1			SB.1								
Volume Total (vph)	255			1595								
Volume Left (vph)	0			87								
Volume Right (vph)	255			278								
Hadj (s)	-0.43			-0.06								
Departure Headway (s)	3.2			3.8								
Degree Utilization, x	0.23			1.70								
Capacity (veh/h)	1122			948								
Control Delay (s)	7.1			331.6								
Approach Delay (s)	7.1			331.6								
Approach LOS	A			F								
Intersection Summary												
Delay	286.9											
HCM Level of Service	F											
Intersection Capacity Utilization	102.9%											
Analysis Period (min)	15											
ICU Level of Service	G											

Queues
1: Route 2 & Route 16

2/12/2013

	WBT	SWR
Lane Group	2439	858
Lane Group Flow (vph)	0.95	0.73
v/c Ratio	6.1	28.8
Control Delay	109.9	0.0
Queue Delay	116.0	28.8
Total Delay	47	254
Queue Length 50th (ft)	m.36	334
Queue Length 95th (ft)	89	
Internal Link Dist (ft)		
Turn Bay Length (ft)		
Base Capacity (vph)	2568	1181
Starvation Cap Reductin	615	0
Spillback Cap Reductin	0	0
Storage Cap Reductin	0	0
Reduced v/c Ratio	1.25	0.73

Intersection Summary
m Volume for 95th percentile queue is metered by upstream signal.

HCM Signalized Intersection Capacity Analysis
1: Route 2 & Route 16

2/12/2013

	EBL	EBT	WBT	WBR	SWL	SWR
Movement						
Lane Configurations			↑↑↑			↑↑
Volume (vph)	0	0	2268	0	0	832
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900
Total Lost time (s)			4.0			4.5
Lane Util. Factor			0.91			0.88
Flt Protected			1.00			0.85
Flt Permitted			1.00			1.00
Satd. Flow (prot)			5136			2842
Satd. Flow (perm)			5136			2842
Peak-hour factor, PHF	0.92	0.92	0.93	0.92	0.92	0.97
Adj. Flow (vph)	0	0	2439	0	0	858
RTOR Reduction (vph)	0	0	0	0	0	1
Lane Group Flow (vph)	0	0	2439	0	0	857
Heavy Vehicles (%)	2%	2%	1%	2%	2%	0%
Turn Type			2			custom
Protected Phases						3 4
Permitted Phases						
Actuated Green, G (s)			49.0			41.0
Effective Green, g (s)			50.0			41.5
Actuated g/C Ratio			0.50			0.42
Clearance Time (s)			5.0			
Lane Grp Cap (vph)			2568			1179
v/s Ratio Prot.			c0.47			c0.30
v/s Ratio Perm						
v/c Ratio			0.95			0.73
Uniform Delay, d1			23.8			24.5
Progression Factor			0.16			1.00
Incremental Delay, d2			1.1			3.9
Delay (s)			4.9			28.4
Level of Service			A			C
Approach Delay (s)			0.0	4.9	28.4	
Approach LOS			A	A	C	
Intersection Summary						
HCM Average Control Delay			11.0			HCM Level of Service B
HCM Volume to Capacity ratio			0.85			
Actuated Cycle Length (s)			100.0			Sum of lost time (s) 8.5
Intersection Capacity Utilization			80.0%			ICU Level of Service D
Analysis Period (min)			15			
c Critical Lane Group						

Queues

2: Route 2 & Alewife Brook Parkway

2/12/2013



Lane Group	EBL	WBR	SBT	NWT
Lane Group Flow (vph)	659	564	416	1885
v/c Ratio	0.96	1.19	0.75	1.32
Control Delay	65.5	105.8	49.7	175.6
Queue Delay	0.0	14.4	0.0	17.1
Total Delay	65.5	120.2	49.7	192.7
Queue Length 50th (ft)	215	-428	134	-1042
Queue Length 95th (ft)	#309	m#474	#189	#1218
Internal Link Dist (ft)			106	210
Turn Bay Length (ft)				
Base Capacity (vph)	686	475	553	1425
Starvation Cap Reductn	0	0	0	0
Spillback Cap Reductn	0	13	0	40
Storage Cap Reductn	0	0	0	0
Reduced v/c Ratio	0.96	1.22	0.75	1.36

Intersection Summary

- Volume exceeds capacity, queue is theoretically infinite.
- # 95th percentile volume exceeds capacity, queue may be longer.
- m Volume for 95th percentile queue is metered by upstream signal.

HCM Signalized Intersection Capacity Analysis
2: Route 2 & Alewife Brook Parkway

2/12/2013



Movement	EBL	WBR	SBT	NWT
Lane Configurations	↔	↔	↔	↔
Volume (vph)	573	496	395	1772
Ideal Flow (vphpl)	1900	1900	1900	1900
Lane Width	9	12	11	12
Total Lost time (s)	4.0	4.0	4.0	4.0
Lane Util. Factor	0.97	1.00	0.95	0.75
Flt	1.00	0.86	1.00	1.00
Flt Protected	0.95	1.00	1.00	1.00
Satd. Flow (prot)	3120	950	3455	2850
Flt Permitted	0.95	1.00	1.00	1.00
Satd. Flow (perm)	3120	950	3455	2850
Peak-hour factor, PHF	0.87	0.88	0.95	0.94
Adj. Flow (vph)	659	564	416	1885
RTOR Reduction (vph)	0	0	0	0
Lane Group Flow (vph)	659	564	416	1885
Heavy Vehicles (%)	1%	2%	1%	1%
Turn Type	Prot. custom			
Protected Phases	4			
Permitted Phases	2			
Actuated Green, G (s)	21.0			
Effective Green, g (s)	22.0			
Actuated g/C Ratio	0.22			
Clearance Time (s)	5.0			
Lane Grp Cap (vph)	686			
v/s Ratio Prot	c0.21			
v/c Ratio Perm	0.59			
v/c Ratio	0.96			
Uniform Delay, d1	38.6			
Progression F actor	1.00			
Incremental Delay, d2	26.0			
Delay (s)	64.5			
Level of Service	E			
Approach Delay (s)	49.2			
Approach LOS	D			

Intersection Summary

HCM Average Control Delay	127.3	HCM Level of Service	F
HCM Volume to Capacity ratio	1.13		
Actuated Cycle Length (s)	100.0	Sum of lost time (s)	12.0
Intersection Capacity Utilization	120.3%	ICU Level of Service	H
Analysis Period (min)	15		

c Critical Lane Group

Queues
3: Alewife Brook Parkway & Route 2

2/12/2013

	SBT	SER
Lane Group	416	1295
Lane Group Flow (vph)	0.73	0.60
v/c Ratio	23.8	6.6
Control Delay	0.0	0.0
Queue Delay	23.9	6.6
Total Delay	26	163
Queue Length 50th (ft)	m/6	165
Queue Length 95th (ft)	189	
Internal Link Dist (ft)		
Turn Bay Length (ft)		
Base Capacity (vph)	572	2160
Starvation Cap Reductin	2	0
Spillback Cap Reductin	0	0
Storage Cap Reductin	0	0
Reduced v/c Ratio	0.73	0.60

Intersection Summary

m Volume for 95th percentile queue is metered by upstream signal.

HCM Signalized Intersection Capacity Analysis
3: Alewife Brook Parkway & Route 2

2/12/2013

Movement	NBL	NBT	SBT	SBR	SEL	SER
Lane Configurations						
Volume (vph)	0	0	395	0	0	1023
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900
Total Lost time (s)			4.0			4.5
Lane Util. Factor			0.95			0.88
Flt Protected			1.00			0.85
Flt Permitted			1.00			1.00
Satd. Flow (prot)			3574			2842
Satd. Flow (perm)			3574			2842
Peak-hour factor, PHF		0.92	0.95	0.96	0.92	0.79
Adj. Flow (vph)		0	416	0	0	1295
RTOR Reduction (vph)		0	0	0	0	14
Lane Group Flow (vph)		0	416	0	0	1281
Heavy Vehicles (%)		2%	2%	1%	0%	2%
Turn Type						custom
Protected Phases			3			2 4
Permitted Phases						
Actuated Green, G (s)			15.0			75.0
Effective Green, g (s)			16.0			75.5
Actuated g/C Ratio			0.16			0.76
Clearance Time (s)			5.0			
Lane Grp Cap (vph)			572			2146
v/s Ratio Prot.			c0.12			c0.45
v/s Ratio Perm						
v/c Ratio			0.73			0.60
Uniform Delay, d1			39.9			5.5
Progression Factor			0.46			1.00
Incremental Delay, d2			5.1			1.2
Delay (s)			23.6			6.7
Level of Service			C			A
Approach Delay (s)		0.0	23.6		6.7	A
Approach LOS		A	C		A	
Intersection Summary						
HCM Average Control Delay			10.8			HCM Level of Service B
HCM Volume to Capacity ratio			0.62			
Actuated Cycle Length (s)			100.0			Sum of lost time (s) 8.5
Intersection Capacity Utilization			53.8%			ICU Level of Service A
Analysis Period (min)			15			
c Critical Lane Group						

Queues
4: Route 2 & Alewife Brook Parkway

2/12/2013



Lane Group	WBT	WBR	NBT
Lane Group Flow (vph)	557	448	351
v/c Ratio	0.94	0.49	0.81
Control Delay	50.0	6.4	56.6
Queue Delay	19.1	0.0	0.0
Total Delay	69.1	6.4	56.6
Queue Length 50th (ft)	553	106	115
Queue Length 95th (ft)	#934	177	#186
Internal Link Dist (ft)	93		133
Turn Bay Length (ft)		200	
Base Capacity (vph)	594	913	434
Starvation Cap Reductn	0	0	0
Spillback Cap Reductn	53	0	0
Storage Cap Reductn	0	0	0
Reduced v/c Ratio	1.03	0.49	0.81

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

HCM Signalized Intersection Capacity Analysis
4: Route 2 & Alewife Brook Parkway

2/12/2013



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (vph)	0	0	0	0	496	399	0	337	0	0	0	0
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	12	12	12	12	14	12	11	12	12	12	12	12
Total Lost time (s)				4.5	5.0			4.5				
Lane Util. Factor				*0.58	*0.75			0.95				
Flt				1.00	0.85			1.00				
Flt Protected				1.00	1.00			1.00				
Satd. Flow (prot)				1200	1200			2800				
Flt Permitted				1.00	1.00			1.00				
Satd. Flow (perm)				1200	1200			2800				
Peak-hour factor, PHF	0.92	0.92	0.92	0.89	0.89	0.77	0.96	0.77	0.92	0.92	0.92	0.92
Adj. Flow (vph)	0	0	0	557	448	0	351	0	0	0	0	0
RTOR Reduction (vph)	0	0	0	0	13	0	0	0	0	0	0	0
Lane Group Flow (vph)	0	0	0	557	435	0	351	0	0	0	0	0
Heavy Vehicles (%)	2%	2%	2%	1%	1%	0%	1%	0%	2%	2%	2%	2%
Turn Type				custom								
Protected Phases				2	2.4			3				
Permitted Phases												
Actuated Green, G (s)				49.0	75.0			15.0				
Effective Green, g (s)				49.5	75.0			15.5				
Actuated g/C Ratio				0.50	0.75			0.16				
Clearance Time (s)				5.0				5.0				
Lane Grp Cap (vph)				594	900			434				
v/s Ratio Prot				c0.46	c0.36			c0.13				
v/c Ratio				0.94	0.48			0.81				
Uniform Delay, d1				23.8	4.9			40.8				
Progression F actor				1.00	1.00			1.00				
Incremental Delay, d2				24.4	1.9			14.9				
Delay (s)				48.2	6.8			55.8				
Level of Service				D	A			E				
Approach Delay (s)				29.7				55.8				0.0
Approach LOS				A				E				A
Intersection Summary												
HCM Average Control Delay				36.5								D
HCM Volume to Capacity ratio				0.82								
Actuated Cycle Length (s)				100.0								14.0
Intersection Capacity Utilization				42.9%								A
Analysis Period (min)				15								
c Critical Lane Group												

Queues
5: Cambridgepark Drive & Alewife Brook Parkway

2/12/2013

	EBL	NBL	NBT	SBT	SBR
Lane Group Flow (vph)	1210	287	1868	1621	67
v/c Ratio	1.27	1.37	1.24	1.35	0.05
Control Delay	157.1	192.9	125.4	192.2	0.1
Queue Delay	316.9	0.0	273.3	203.3	0.0
Total Delay	474.0	192.9	398.7	395.5	0.1
Queue Length 50th (ft)	-494	-185	-762	-715	0
Queue Length 95th (ft)	m#586	m53	m116	#767	0
Internal Link Dist (ft)	395		156	383	
Turn Bay Length (ft)					50
Base Capacity (vph)	952	210	1510	1202	1386
Starvation Cap Reductn	0	0	498	0	0
Spillback Cap Reductn	340	0	0	302	0
Storage Cap Reductn	0	0	0	0	0
Reduced v/c Ratio	1.98	1.37	1.85	1.80	0.05

Intersection Summary

- Volume exceeds capacity, queue is theoretically infinite.
- Queue shown is maximum after two cycles.
- # 95th percentile volume exceeds capacity, queue may be longer.
- Queue shown is maximum after two cycles.
- m Volume for 95th percentile queue is metered by upstream signal.

HCM Signalized Intersection Capacity Analysis
5: Cambridgepark Drive & Alewife Brook Parkway

2/12/2013

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations	W	W	W	W	W	W
Volume (vph)	428	661	258	1681	1362	56
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900
Lane Width	11	12	12	12	11	8
Total Lost time (s)	3.6	3.6	3.6	3.6	3.6	3.0
Lane Util. Factor	0.97	1.00	1.00	0.95	0.95	1.00
Flt	0.91	1.00	1.00	1.00	1.00	0.85
Flt Protected	0.98	0.95	1.00	1.00	1.00	1.00
Satd. Flow (prot)	1774	1805	3400	3600	1386	
Flt Permitted	0.98	0.12	1.00	1.00	1.00	1.00
Satd. Flow (perm)	1774	228	3400	3600	1386	
Peak-hour factor, PHF	0.90	0.90	0.90	0.90	0.84	0.84
Adj. Flow (vph)	476	734	287	1868	1621	67
RTOR Reduction (vph)	93	0	0	0	0	0
Lane Group Flow (vph)	1117	0	287	1868	1621	67
Heavy Vehicles (%)	2%	2%	0%	0%	1%	1%
Turn Type	D,P+P					
Protected Phases	3.4	2	1.2	1		Free
Permitted Phases		1				Free
Actuated Green, G (s)	47.4	38.8	43.4	32.4	100.0	
Effective Green, g (s)	48.4	40.8	44.4	33.4	100.0	
Actuated g/C Ratio	0.48	0.41	0.44	0.33	1.00	
Clearance Time (s)		4.6		4.6		
Vehicle Extension (s)		3.0		3.0		
Lane Grp Cap (vph)	859	210	1510	1202	1386	
v/s Ratio Prot	c0.63	0.10	c0.55	0.45		
v/s Ratio Perm		c0.46				0.05
v/c Ratio	1.30	1.37	1.24	1.35	0.05	
Uniform Delay, d1	25.8	43.1	27.8	33.3	0.0	
Progression Factor	1.54	0.62	0.49	1.00	1.00	
Incremental Delay, d2	140.2	167.8	107.2	162.5	0.1	
Delay (s)	180.1	194.5	120.8	195.8	0.1	
Level of Service	F	F	F	F	F	A
Approach Delay (s)	180.1		130.6	188.0		
Approach LOS	F		F	F		F

Intersection Summary

HCM Average Control Delay	161.6	HCM Level of Service	F
HCM Volume to Capacity ratio	1.30		
Actuated Cycle Length (s)	100.0	Sum of lost time (s)	7.2
Intersection Capacity Utilization	95.1%	ICU Level of Service	F
Analysis Period (min)	15		
c Critical Lane Group			

Queues
6: Rindge Ave. & Alewife Brook Parkway

	WBL	WBR	NBT	SBT
Lane Group	199	522	1923	2182
Lane Group Flow (vph)	0.59	0.84	2.13	1.42
v/c Ratio	44.6	21.8	535.1	209.4
Control Delay	0.0	57.1	41.1	95.3
Queue Delay	44.6	78.9	576.2	304.7
Total Delay	116	54	-1102	-1032
Queue Length 50th (ft)	186	#226	#1251	m#643
Queue Length 95th (ft)	628		2121	156
Internal Link Dist (ft)	100			
Turn Bay Length (ft)	339	622	901	1534
Starvation Cap Reductn	0	0	0	199
Spillback Cap Reductn	0	154	37	0
Storage Cap Reductn	0	0	0	0
Reduced v/c Ratio	0.59	1.12	2.23	1.63

Intersection Summary

- Volume exceeds capacity, queue is theoretically infinite.
Queue shown is maximum after two cycles.
- # 95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.
- m Volume for 95th percentile queue is metered by upstream signal.

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations	↔	↔	↔	↔	↔	↔
Volume (vph)	175	459	1480	251	0	2007
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900
Lane Width	10	9	11	12	12	11
Total Lost time (s)	3.6	3.6	3.6	3.6	3.6	3.6
Lane Util. Factor	1.00	1.00	0.90	0.90	0.95	0.95
Flpb, ped/bikes	1.00	1.00	1.00	1.00	1.00	1.00
Fltb, ped/bikes	1.00	1.00	1.00	1.00	1.00	1.00
Flt	1.00	0.85	0.98	1.00	1.00	1.00
Flt Protected	0.95	1.00	1.00	1.00	1.00	1.00
Satd. Flow (prot)	1747	1439	2000	2000	3455	3455
Flt Permitted	0.95	1.00	1.00	1.00	1.00	1.00
Satd. Flow (perm)	1747	1439	2000	2000	3455	3455
Peak-hour factor, PHF	0.88	0.88	0.90	0.90	0.92	0.92
Adj. Flow (vph)	199	522	1644	279	0	2182
RTOR Reduction (vph)	0	343	13	0	0	0
Lane Group Flow (vph)	199	179	1910	0	0	2182
Conf. Bikes (#/hr)		4				
Heavy Vehicles (%)	1%	1%	0%	0%	1%	1%
Turn Type	Prot	Prot	1 2	1 2		
Protected Phases	3	3	1 2	1 2		
Permitted Phases						
Actuated Green, G (s)	18.4	18.4	43.4	43.4		
Effective Green, g (s)	19.4	19.4	44.4	44.4		
Actuated g/C Ratio	0.19	0.19	0.44	0.44		
Clearance Time (s)	4.6	4.6				
Vehicle Extension (s)	3.0	3.0				
Lane Grp Cap (vph)	339	279	888			1534
v/s Ratio Prot	0.11	c0.12	c0.96			0.63
v/c Ratio Perm						
v/c Ratio	0.59	0.64	2.15			1.42
Uniform Delay, d1	36.7	37.1	27.8			27.8
Progression Factor	1.00	1.00	1.00			0.47
Incremental Delay, d2	2.6	5.0	521.8			190.4
Delay (s)	39.2	42.1	549.6			203.5
Level of Service	D	D	F			F
Approach Delay (s)	41.3	549.6	203.5			
Approach LOS	D	F	F			F
Intersection Summary						
HCM Average Control Delay			317.2		HCM Level of Service	F
HCM Volume to Capacity ratio			1.69			
Actuated Cycle Length (s)			100.0		Sum of lost time (s)	36.2
Intersection Capacity Utilization			84.0%		ICU Level of Service	E
Analysis Period (min)			15			

c Critical Lane Group

Queues
7: Cambridgepark Drive & Alewife Access Road

2/12/2013

	EBT	WBT	WBR	NBT	SBL	SBT
Lane Group	489	295	85	124	421	421
Lane Group Flow (vph)	0.66	0.44	0.16	0.27	0.99	0.81
v/c Ratio	27.3	7.9	0.7	11.4	80.3	44.8
Control Delay	0.0	0.0	0.0	0.0	0.0	0.0
Queue Delay	27.3	7.9	0.7	11.4	80.3	44.8
Total Delay	238	62	1	12	283	253
Queue Length 50th (ft)	342	m53	m1	35	#481	#409
Internal Link Dist (ft)	145	395		322	523	
Turn Bay Length (ft)						
Base Capacity (vph)	742	671	529	458	425	521
Starvation Cap Reductn	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0
Reduced v/c Ratio	0.66	0.44	0.16	0.27	0.99	0.81

Intersection Summary

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

m Volume for 95th percentile queue is measured by upstream signal.

HCM Signalized Intersection Capacity Analysis
7: Cambridgepark Drive & Alewife Access Road

2/12/2013

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		4			4			4			4	
Volume (vph)	48	371	11	50	197	71	13	4	72	657	33	60
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width	12	11	12	12	11	11	12	14	12	12	12	12
Total Lost time (s)	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0
Lane Util. Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.97	1.00	1.00	0.99	1.00
Flpb, ped/bikes	1.00	0.98	1.00	1.00	1.00	1.00	1.00	0.89	1.00	1.00	0.98	1.00
Flt	1.00	0.99	0.99	0.99	1.00	1.00	0.99	0.99	0.95	0.96	0.95	0.96
Flt Protected		1789		1815	1095		1728		1698	1659		
Satd. Flow (perm)	1682	1523	1095	1728	1698	1659						
Peak-hour factor, PHF	0.88	0.88	0.88	0.84	0.84	0.84	0.72	0.72	0.72	0.89	0.89	0.89
Adj. Flow (vph)	55	422	12	60	235	85	18	6	100	738	37	67
RTOR Reduction (vph)	0	1	0	0	0	48	0	78	0	0	0	7
Lane Group Flow (vph)	0	488	0	0	295	37	0	46	0	421	414	0
Conf. Peds. (#/hr)	118	11	11	11	118	32	11	11	11	11	11	32
Conf. Bikes (#/hr)	4				5				2			
Heavy Vehicles (%)	0%	0%	0%	0%	0%	0%	1%	1%	1%	1%	1%	1%
Turn Type	Perm	Perm	Perm	Perm	Perm	Perm	Split	Split	Split	Split	Split	Split
Protected Phases	6	6	6	6	6	6	4	4	4	2	2	2
Permitted Phases	6	6	6	6	6	6	4	4	4	2	2	2
Actuated Green, G (s)	40.0	40.0	40.0	40.0	40.0	40.0	18.0	18.0	18.0	27.0	27.0	27.0
Effective Green, g (s)	44.0	44.0	44.0	44.0	44.0	44.0	22.0	22.0	22.0	25.0	25.0	31.0
Actuated/C Ratio	0.44	0.44	0.44	0.44	0.44	0.44	0.22	0.22	0.22	0.25	0.25	0.31
Clearance Time (s)	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0
Lane Grp Cap (vph)	740	670	482	380	482	380	425	514	425	514	425	514
v/s Ratio Prot	c0.29	0.19	0.03	c0.03	0.03	c0.25	0.25	0.25	0.25	0.25	0.25	0.25
v/c Ratio Perm	0.66	0.44	0.08	0.12	0.08	0.12	0.99	0.81	0.99	0.81	0.99	0.81
Uniform Delay, d1	22.1	19.4	16.2	31.3	16.2	31.3	37.4	31.7	37.4	31.7	37.4	31.7
Progression Factor	1.00	0.39	0.16	1.00	0.39	0.16	1.00	1.00	1.00	1.00	1.00	1.00
Incremental Delay, d2	4.6	0.2	0.0	0.7	0.2	0.0	41.4	12.7	41.4	12.7	41.4	12.7
Delay (s)	26.7	7.7	2.7	31.9	7.7	2.7	78.8	44.4	78.8	44.4	78.8	44.4
Level of Service	C	A	A	C	A	A	E	E	E	D	E	D
Approach Delay (s)	26.7	6.6	6.6	31.9	6.6	6.6	61.6	61.6	61.6	61.6	61.6	61.6
Approach LOS	C	A	A	C	A	A	E	E	E	D	E	D
Intersection Summary												
HCM Average Control Delay	38.9 HCM Level of Service D											
HCM Volume to Capacity ratio	0.61											
Actuated Cycle Length (s)	100.0 Sum of lost time (s) 9.0											
Intersection Capacity Utilization	78.2% ICU Level of Service D											
Analysis Period (min)	15											

c Critical Lane Group

HCM Unsignalized Intersection Capacity Analysis

8: Alewife Access Road & Route 2 Ramp

2/12/2013

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Sign Control		Stop			Stop						Yield	
Volume (vph)	0	0	0	0	0	0	0	0	566	328	624	3
Peak Hour Factor	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.93	0.92	0.87	0.87
Hourly flow rate (vph)	0	0	0	0	0	0	0	0	609	357	717	3
Direction, Lane #	NB.1 SB.1											
Volume Total (vph)	609 1077											
Volume Left (vph)	0 357											
Volume Right (vph)	609 3											
HadJ (s)	-0.53 0.12											
Departure Headway (s)	3.2 4.0											
Degree Utilization, x	0.54 1.20											
Capacity (veh/h)	1117 908											
Control Delay (s)	9.9 117.4											
Approach Delay (s)	9.9 117.4											
Approach LOS	A F											
Intersection Summary												
Delay	78.6											
HCM Level of Service	F											
Intersection Capacity Utilization	101.5%											
ICU Level of Service	G											
Analysis Period (min)	15											

Crash Data Reports

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130 CPD Crash Data

	Concord Tpke / Alewife Brook Pkwy	Alewife Brook Pkwy / Cambridge Park Dr	Alewife Brook Pkwy / Rindge Ave	Cambridge Park Dr / Alewife Station Access Rd	Route 2 Ramp / Alewife Station Access Rd
Year					
2008	37	8	18	2	0
2009	23	12	14	1	0
2010	23	5	8	1	1
Total	83	25	40	4	1
Average	27.67	8.33	13.33	1.33	1.00

Collision Type					
Angle	19	3	3	3	0
Head-on	2	0	2	0	0
Rear-end	46	18	29	1	1
Rear-to-Rear	1	0	0	0	0
Sideswipe, opposite direction	2	0	0	0	0
Sideswipe, same direction	9	2	1	0	0
Single vehicle crash	4	1	3	0	0
Unknown	0	0	0	0	0
Not reported	0	1	2	0	0
Total	83	25	40	4	1

Crash Severity					
Fatal injury	1	0	0	0	0
Non-fatal injury	23	3	12	1	0
Property damage only (none injured)	56	22	25	3	1
Not Reported	3	0	3	0	0
Unknown	0	0	0	0	0
Total	83	25	40	4	1

Time of Day					
Weekday, 7:00 AM - 9:00 AM	13	8	4	0	0
Weekday, 4:00 PM - 6:00 PM	8	5	0	0	1
Saturday, 11:00 AM - 2:00 PM	1	0	3	0	0
Weekday, other time	43	11	23	3	0
Weekend, other time	18	1	10	1	0
Total	83	25	40	4	1

Pavement Conditions					
Dry	65	23	33	3	0
Wet	17	2	6	1	1
Snow	1	0	1	0	0
Ice	0	0	0	0	0
Sand, mud, dirt, oil, gravel	0	0	0	0	0
Water (standing, moving)	0	0	0	0	0
Slush	0	0	0	0	0
Other	0	0	0	0	0
Unknown	0	0	0	0	0
Not reported	0	0	0	0	0
Total	83	25	40	4	1

Non Motorist (Bike, Pedestrian)					
Total	0	0	3	0	0

MassHighway Crash Rates					

INTERSECTION CRASH RATE WORKSHEET

CITY/TOWN : Cambridge, MA COUNT DATE : December 2012

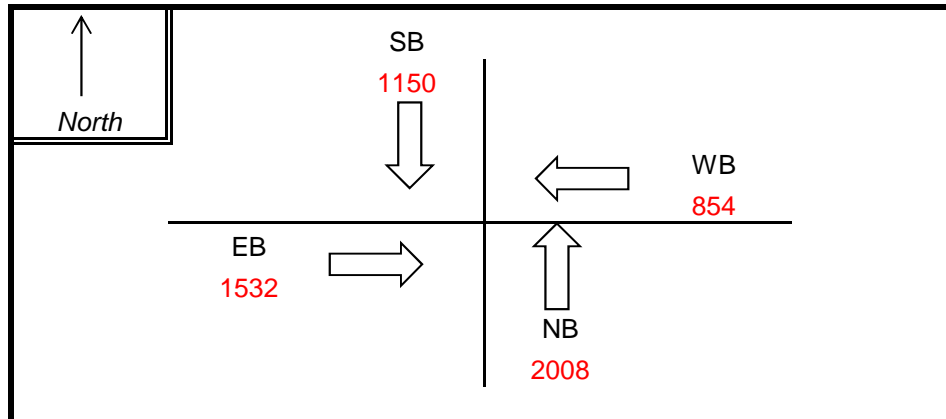
DISTRICT : 6 UNSIGNALIZED : SIGNALIZED :

~ INTERSECTION DATA ~

MAJOR STREET : Concord Turnpike

MINOR STREET(S) : Alewife Brook Parkway

**INTERSECTION
 DIAGRAM
 (Label Approaches)**



PEAK HOUR VOLUMES

APPROACH :	1	2	3	4	5	Total Peak Hourly Approach Volume
DIRECTION :	NB	SB	WB	EB		
PEAK HOURLY VOLUMES (AM/PM) :	2,008	1,150	854	1,532		5,544

" K " FACTOR : INTERSECTION ADT (V) = TOTAL DAILY APPROACH VOLUME :

TOTAL # OF CRASHES : # OF YEARS : AVERAGE # OF CRASHES PER YEAR (A) :

CRASH RATE CALCULATION : RATE = $\frac{(A * 1,000,000)}{(V * 365)}$

Comments : _____

Project Title & Date: 130 CPD \ January 4th 2013

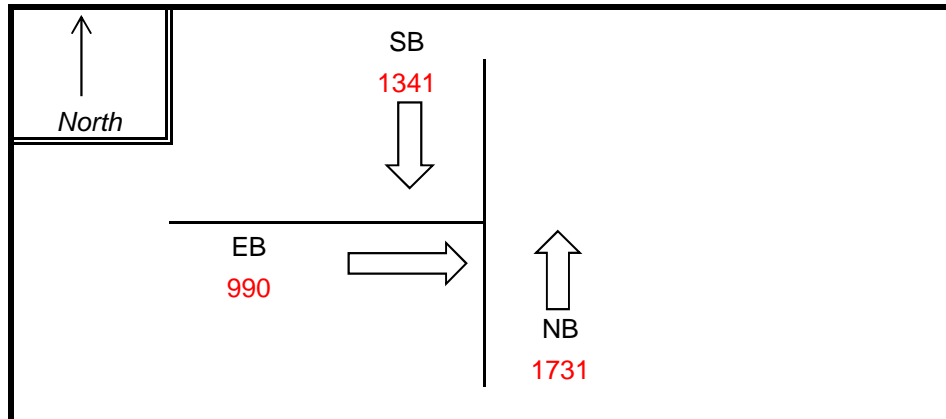
INTERSECTION CRASH RATE WORKSHEET

CITY/TOWN : Cambridge, MA COUNT DATE : December 2012
 DISTRICT : 6 UNSIGNALIZED : SIGNALIZED :

~ INTERSECTION DATA ~

MAJOR STREET : Alewif Brook Parkway
 MINOR STREET(S) : Cambridge Park Drive

**INTERSECTION
 DIAGRAM**
 (Label Approaches)



PEAK HOUR VOLUMES

APPROACH :	1	2	3	4	5	Total Peak Hourly Approach Volume
DIRECTION :	NB	SB	EB			
PEAK HOURLY VOLUMES (AM/PM) :	1,731	1,341	990			4,062

" K " FACTOR : 0.090 INTERSECTION ADT (V) = TOTAL DAILY APPROACH VOLUME : 45,133

TOTAL # OF CRASHES : 25 # OF YEARS : 3 AVERAGE # OF CRASHES PER YEAR (A) : 8.33

CRASH RATE CALCULATION : 0.51 RATE = $\frac{(A * 1,000,000)}{(V * 365)}$

Comments : _____
 Project Title & Date: 130 CPD \ January 4th 2013

INTERSECTION CRASH RATE WORKSHEET

CITY/TOWN : Cambridge, MA COUNT DATE : December 2012

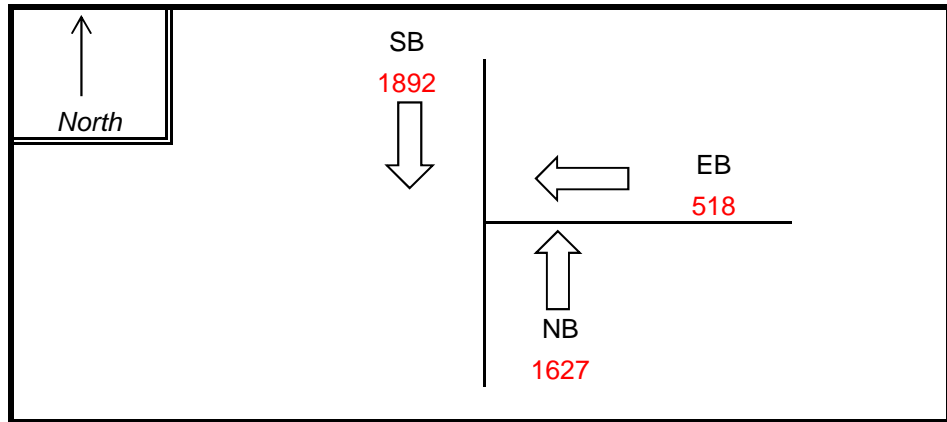
DISTRICT : 6 UNSIGNALIZED : SIGNALIZED :

~ INTERSECTION DATA ~

MAJOR STREET : Alewife Brook Parkway

MINOR STREET(S) : Rindge Avenue

**INTERSECTION
 DIAGRAM
 (Label Approaches)**



PEAK HOUR VOLUMES

APPROACH :	1	2	3	4	5	Total Peak Hourly Approach Volume
DIRECTION :	NB	SB	EB			
PEAK HOURLY VOLUMES (AM/PM) :	1,627	1,892	518			4,037

" K " FACTOR : INTERSECTION ADT (V) = TOTAL DAILY APPROACH VOLUME :

TOTAL # OF CRASHES : # OF YEARS : AVERAGE # OF CRASHES PER YEAR (A) :

CRASH RATE CALCULATION :

0.81

$$\text{RATE} = \frac{(A * 1,000,000)}{(V * 365)}$$

Comments : _____

Project Title & Date: 130 CPD \ January 4th 2013

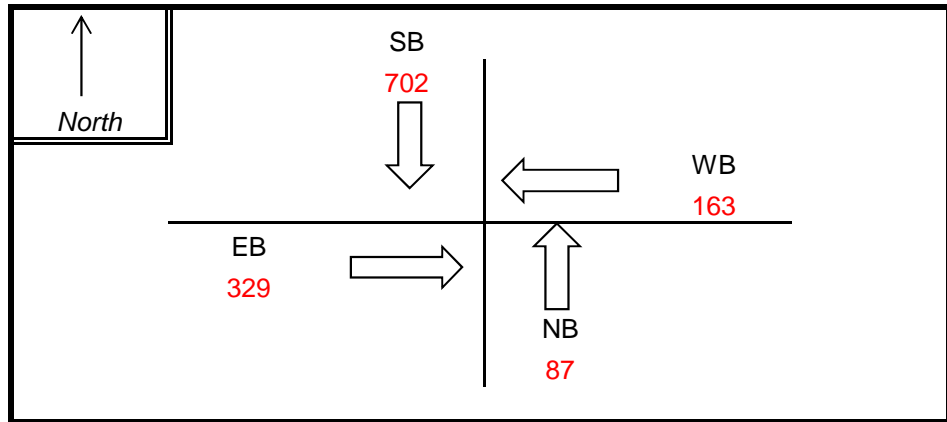
INTERSECTION CRASH RATE WORKSHEET

CITY/TOWN : Cambridge, MA COUNT DATE : December 2012
 DISTRICT : 6 UNSIGNALIZED : SIGNALIZED :

~ INTERSECTION DATA ~

MAJOR STREET : Cambridge Park Drive
 MINOR STREET(S) : Alewife Station Access Road

**INTERSECTION
 DIAGRAM
 (Label Approaches)**



PEAK HOUR VOLUMES

APPROACH :	1	2	3	4	5	Total Peak Hourly Approach Volume
DIRECTION :	NB	SB	EB	WB		
PEAK HOURLY VOLUMES (AM/PM) :	87	702	329	163		1,281

" K " FACTOR : INTERSECTION ADT (V) = TOTAL DAILY APPROACH VOLUME :

TOTAL # OF CRASHES : # OF YEARS : AVERAGE # OF CRASHES PER YEAR (A) :

CRASH RATE CALCULATION : RATE = $\frac{(A * 1,000,000)}{(V * 365)}$

Comments : _____
 Project Title & Date: 130 CPD \ January 4th 2013

