

Quarterly report on traffic and speed monitoring: October – December 2019

a) Main Street, street lighting column 7, westbound vehicles, 8th October – 18th November 2019

For Project: Main St C7 Wbd
 Location/Name: Incoming Dir
 Report Generated: 18/11/2019 10:28:31
 Speed Intervals = 5 mph
 Time Intervals = 5 minutes

Traffic report from 08/10/2019 09:55:00 through 9/11/2019 10:10:00

[SID was in place until 18th November; battery ran out on 9th November]

85th Percentile Speed = 32.9 mph
 85th Percentile Vehicles = 22,619 counts
 Max Speed = 55.0 mph on 11/10/2019 18:35:00
 Total Vehicles = 26,611 counts
 AADT: 648.9

Volumes - weekly vehicle counts

	Time	5 Day	7 Day
Average Daily		847	777
AM peak	7:00 to 8:00	93	82
PM peak	3:00 to 4:00	81	68

Speed

Speed limit: 30 mph
 85th Percentile Speed: 32.9 mph
 Average Speed: 24.6 mph

	Mon	Tues	Wed	Thurs	Fri	Sat	Sun
Count over limit	1003	1160	1475	1401	1319	582	476
% over limit	24.8	33.7	32.0	31.2	28.6	20.0	18.9
Avg speeder	33.7	33.8	33.7	33.8	33.8	33.7	33.7

Storm episodes

Date	Time	Number of false vehicle counts
13.10	0530-0635	103
	0700-0945	778
14.10	1320-1340	37
	1410-1445	192
	1500-1730	860
	1850-1910	39
	1740-1750	28
20.10	2010-2030	27
	0325-0430	78
26.10	0500-0505	15
	0755-1225	642
	0855-1125	168
2.11	0855-1125	168
5.11	0930-1000	68
	1045-1115	43
7.11	0120-0450	363
8.11	0210-0455	712
Total		4153

= 15.6% of total vehicle counts

It is not possible to edit the raw data or delete selected days before analysis. The data set can be trimmed by setting new start and end dates, but if this is done the unselected data is permanently deleted. The period 15th to 25th October was selected, as offering the longest period without a severe storm event.

b) Main Street, street lighting column 7, westbound vehicles, 15th October – 25th October 2019

For Project: Main St C7 Wbd
 Location/Name: Incoming Dir
 Report Generated: 21/11/2019 07:43:40
 Speed Intervals = 5 mph
 Time Intervals = 5 minutes

Traffic report from 15/10/2019 09:55:00 through 25/10/2019 10:10:00

85th Percentile Speed = 33.6 mph
 85th Percentile Vehicles = 6,069 counts
 Max Speed = 55.0 mph on 17/10/2019 06:35:00
 Total Vehicles = 7,140 counts
 AADT: 713.3

Volumes - weekly vehicle counts

	Time	5 Day	7 Day
Average Daily		694	633
AM peak	7:00 to 8:00	104	79
PM peak	4:00 to 5:00	62	53

Speed

Speed limit: 30 mph
 85th Percentile Speed: 33.6 mph
 Average Speed: 27.7 mph

	Mon	Tues	Wed	Thurs	Fri	Sat	Sun
Count over limit	237	379	650	548	367	132	124
% over limit	30.9	35.4	33.5	37.9	38.4	25.4	28.1
Avg speeder	33.7	33.8	33.6	33.9	33.8	33.6	33.6

Storm episodes

Date	Time	Number of false vehicle counts
20.10	1740-1750	28
	2010-2030	27
Total		55

= 0.77% of total vehicle counts

c) Main Street, street lighting column 7, eastbound vehicles, 18th November to 16th December 2019

The recorded data set contained the following storm episodes:

Date	Time	Number of false vehicle counts
28.11	0000-0700	754
6.12	0400-0600	261
	1100-1600	741
8.12	0600-0800	54
9.12	0000-0200	71
10.12	1800-1900	447
11.12	1400-1500	218
12.12	1500-1700	33
13.12	0000-0300	678
14.12	1900-0200	286
Total		3543

= 14.83% of total vehicle counts

Listed below are three analyses –

- (d) the complete data set including all of the false vehicle counts listed above;
- (e) selected data from the period 18th November to 9th December, which includes five storm episodes with 1881 false vehicle counts (11%); and
- (f) selected data from the period 18th November to 27th November which does not include any storm episodes or false vehicle counts.

A comparison of	(d)	with	(f)	shows:
85 th percentile speed	32.6		33.0	
Weekday vehicle count	937		721	
7-day vehicle count	830		642	
Average speed	24.6		27.5	

The percentage of vehicles exceeding the speed limit is greater in (iii), but the average speed of speeding vehicles is very similar. This would be expected. The results for (ii) are intermediate between (i) and (iii).

d) Complete data set 18th November to 16th December

For Project: Main St C7 Ebd
 Location/Name: Incoming Dir
 Report Generated: 16/12/2019 10:37:40
 Speed Intervals = 5 mph
 Time Intervals = 5 minutes

Traffic report from 18/11/2019 11:00:00 through 16/12/2019 10:10:00

85th Percentile Speed = 32.6 mph
 85th Percentile Vehicles = 20,306 counts
 Max Speed = 55.0 mph on 21/11/2019 18:15:00
 Total Vehicles = 23,890 counts
 AADT: 854.3

Volumes - weekly vehicle counts

	Time	5 Day	7 Day
Average Daily		937	830
AM peak	8:00 to 9:00	89	69
PM peak	4:00 to 5:00	107	89

Speed

Speed limit: 30 mph
 85th Percentile Speed: 32.6 mph
 Average Speed: 24.6 mph

	Mon	Tues	Wed	Thur	Fri	Sat	Sun
Count over limit	861	894	907	1073	1021	673	541
% over limit	27.5	24.6	25.4	25.8	20.9	29.4	24.4
Avg speeder	33.6	33.7	33.7	33.8	33.9	34.1	34.0

e) Selected data 18th November to 9th December

For Project: Main St C7 Ebd
 Location/Name: Incoming Dir
 Report Generated: 16/12/2019 20:39:22
 Speed Intervals = 5 mph
 Time Intervals = 5 minutes

Traffic report from 18/11/2019 11:00:00 through 09/12/2019 10:10:00

85th Percentile Speed = 32.7 mph
 85th Percentile Vehicles = 14,491 counts
 Max Speed = 55.0 mph on 21/11/2019 18:15:00
 Total Vehicles = 17,048 counts
 AADT: 813.2

Volumes - weekly vehicle counts

	Time	5 Day	7 Day
Average Daily		883	783
AM peak	8:00 to 9:00	91	71
PM peak	4:00 to 5:00	112	92

Speed

Speed limit: 30 mph
 85th Percentile Speed: 32.7 mph
 Average Speed: 25.3 mph

	Mon	Tues	Wed	Thurs	Fri	Sat	Sun
Count over limit	645	678	674	830	720	477	445
% over limit	27.5	28.9	26.7	25.3	21.6	30.6	27.0

f) Selected data 18th to 27th November

For Project: Main St C7 Ebd
 Location/Name: Incoming Dir
 Report Generated: 16/12/2019 20:41:45
 Speed Intervals = 5 mph
 Time Intervals = 5 minutes

Traffic report from 18/11/2019 11:00:00 through 27/11/2019 11:00:00

85th Percentile Speed = 33.0 mph
 85th Percentile Vehicles = 5,497 counts
 Max Speed = 55.0 mph on 21/11/2019 18:15:00
 Total Vehicles = 6,467 counts
 AADT: 718.6

Volumes - weekly vehicle counts

	Time	5 Day	7 Day
Average Daily		721	642
AM peak	8:00 to 9:00	98	76
PM peak	3:00 to 4:00	93	78

Speed

Speed limit: 30 mph
 85th Percentile Speed: 33.0 mph
 Average Speed: 27.5 mph

	Mon	Tues	Wed	Thurs	Fri	Sat	Sun
Count over limit	362	422	288	270	213	159	133
% over limit	27.7	27.4	26.3	31.9	26.8	32.9	33.1
Avg speeder	33.6	33.8	33.8	33.9	33.7	33.9	33.7

C J Peat
 17th December 2019