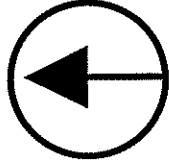


Date : 6/6/97 AM 6/5/97 PM

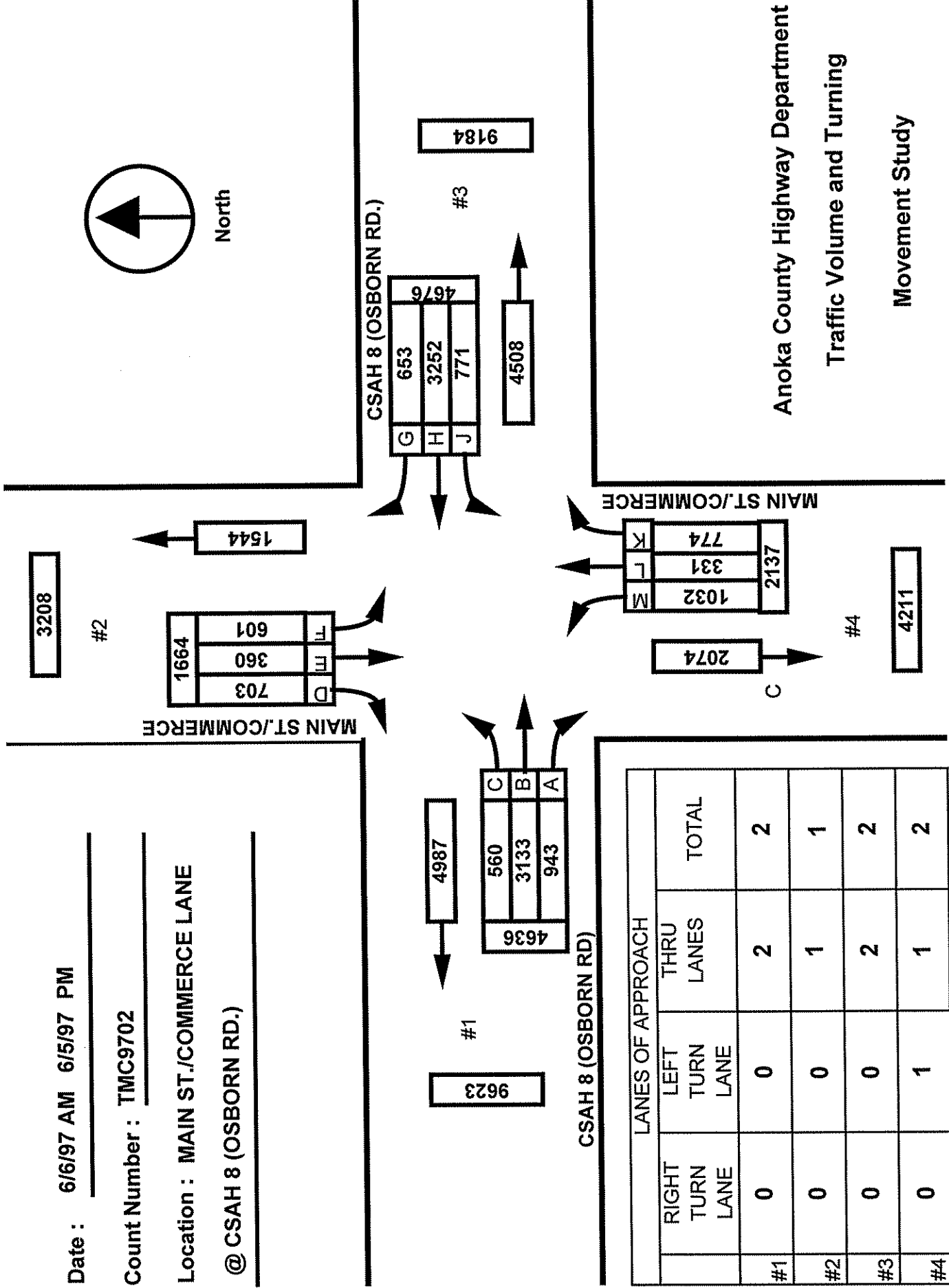
Count Number : TMC9702

Location : MAIN ST./COMMERCE LANE

@ CSAH 8 (OSBORN RD.)



North



	LANES OF APPROACH			TOTAL
	RIGHT TURN LANE	LEFT TURN LANE	THRU LANES	
#1	0	0	2	2
#2	0	0	1	1
#3	0	0	2	2
#4	0	1	1	2

Anoka County Highway Department  
 Traffic Volume and Turning  
 Movement Study

PETRA Software

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Horsham, PA.

Weather :  
 Counted by: Marge and Janelle  
 Board # :  
 :her :

Study Name: TMC9702  
 Site Code : 97020202  
 Start Date: 06/06/97  
 Page : 1

Vehicle group 1

Start Time	Main St.				CSAH 8 (Osborne Rd.)				Commercer Lane				CSAH 8 (Osborne Rd.)				Intvl	Exclu	Inclu
	Southbound		Westbound		Northbound		Eastbound		Total	Total	Total								
	Left	Thru	Right	Other	Left	Thru	Right	Other				Left	Thru	Right	Other	Left	Thru	Right	Other
06/06/97																			
06:00	0	1	0	0	9	24	17	4	4	4	6	2	12	34	4	0	121	6	115
06:15	0	1	1	0	6	28	19	0	3	7	9	3	15	55	15	2	164	5	159
06:30	4	5	2	1	23	45	30	2	2	2	12	0	26	62	24	2	242	5	237
06:45	4	7	6	1	22	39	28	1	5	5	3	0	22	62	32	1	238	3	235
Hour	8	14	9	2	60	136	94	7	14	18	30	5	75	213	75	5	765	19	746
07:00	2	4	0	1	11	35	29	2	5	5	15	4	10	65	22	2	212	9	203
07:15	4	5	5	0	20	43	26	1	9	5	14	6	20	63	12	2	235	9	226
07:30	3	3	2	2	10	54	23	1	10	5	19	5	9	57	19	3	225	11	214
07:45	7	9	4	3	19	55	30	5	9	4	11	7	8	48	31	3	253	18	235
Hour	16	21	11	6	60	187	108	9	33	19	59	22	47	233	84	10	925	47	878
08:00	3	5	2	2	20	46	20	2	10	4	15	5	12	43	20	11	220	20	200
08:15	1	2	2	0	7	48	17	5	4	6	8	1	9	38	12	4	164	10	154
08:30	4	2	2	0	12	39	6	4	9	1	11	3	17	31	8	3	152	10	142
08:45	1	5	5	3	12	41	13	0	8	4	7	4	11	31	19	5	169	12	157
Hour	9	14	11	5	51	174	56	11	31	15	41	13	49	143	59	23	705	52	653
09:00	6	6	10	2	8	54	5	6	14	3	10	8	7	37	10	5	191	21	170
09:15	3	5	6	5	10	36	5	4	13	6	10	2	8	25	18	3	159	14	145
09:30	4	5	9	1	7	28	6	0	14	6	11	4	7	33	19	7	161	12	149
09:45	0	10	7	2	14	38	8	9	10	7	9	6	9	23	19	6	177	23	154
Hour	13	26	32	10	39	156	24	19	51	22	40	20	31	118	66	21	688	70	618
10:00	7	6	9	4	6	53	9	7	21	5	11	5	7	34	14	9	207	25	182
10:15	3	1	8	2	8	44	9	6	14	5	8	6	12	34	22	9	191	23	168
10:30	8	5	21	3	7	33	6	5	16	3	8	5	17	38	14	6	195	19	176
10:45	3	5	15	1	9	41	12	9	13	7	12	7	10	44	9	8	205	25	180
Hour	21	17	53	10	30	171	36	27	64	20	39	23	46	150	59	32	798	92	706
11:00	8	10	20	4	8	46	10	7	12	5	5	3	6	41	12	5	202	19	183
11:15	10	8	18	2	10	43	13	6	20	9	15	7	13	43	11	11	239	26	213
11:30	11	6	21	2	14	51	5	8	22	9	19	6	11	53	21	4	263	20	243
11:45	10	8	29	1	15	53	6	2	21	13	22	5	13	46	18	4	266	12	254
Hour	39	32	88	9	47	193	34	23	75	36	61	21	43	183	62	24	970	77	893
12:00	10	14	26	1	23	68	18	8	37	11	19	6	27	44	20	5	337	20	317
12:15	9	10	28	2	11	50	9	4	19	6	20	2	19	50	16	1	256	9	247
12:30	6	10	20	0	11	58	10	4	28	10	5	3	15	56	23	6	265	13	252
12:45	12	2	15	6	20	53	16	4	26	15	7	5	22	56	33	6	298	21	277
Hour	37	36	89	9	65	229	53	20	110	42	51	16	83	206	92	18	1156	63	1093

Weather :  
 Counted by: Marge and Janelle  
 Board # :  
 Ther :

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 Horsham, PA.

Study Name: TMC9702  
 Site Code : 97020202  
 Start Date: 06/06/97  
 Page : 2

Vehicle group 1

Start Time	Main St. Southbound				CSAH 8 (Osborne Rd.) Westbound				Commercer Lane Northbound				CSAH 8 (Osborne Rd.) Eastbound				Intvl	Exclu	Inclu
	Left	Thru	Right	Other	Left	Thru	Right	Other	Left	Thru	Right	Other	Left	Thru	Right	Other			
13:00	7	5	14	2	11	49	8	5	17	4	11	5	8	51	15	5	217	17	200
13:15	4	6	7	2	16	53	7	6	18	7	9	2	13	46	13	4	213	14	199
13:30	5	2	7	1	9	47	8	4	22	5	16	6	10	46	18	10	216	21	195
13:45	8	13	14	6	4	42	9	4	19	6	13	4	5	34	9	3	193	17	176
Hour	24	26	42	11	40	191	32	19	76	22	49	17	36	177	55	22	839	69	770
14:00	8	3	11	4	11	31	6	2	16	8	13	5	5	58	19	6	206	17	189
14:15	12	4	6	4	12	40	11	3	21	5	20	7	15	53	16	6	235	20	215
14:30	13	6	11	3	19	66	13	8	27	7	10	6	19	44	19	6	277	23	254
14:45	8	4	12	1	15	65	11	8	21	4	10	6	15	45	23	6	254	21	233
Hour	41	17	40	12	57	202	41	21	85	24	53	24	54	200	77	24	972	81	891
15:00	20	13	15	2	8	57	10	2	33	15	16	5	6	61	19	2	284	11	273
15:15	14	8	16	2	15	68	11	5	24	6	9	2	3	69	24	8	284	17	267
15:30	34	10	27	1	29	76	15	2	27	6	17	1	11	73	22	10	361	14	347
15:45	16	4	11	0	21	87	11	4	26	7	13	4	4	68	22	4	302	12	290
Hour	84	35	69	5	73	288	47	13	110	34	55	12	24	271	87	24	1231	54	1177
16:00	29	12	34	3	7	88	7	6	19	6	13	3	8	73	19	3	330	15	315
16:15	18	13	14	1	10	85	6	5	3	0	5	0	0	11	3	0	174	6	168
16:30	43	16	51	2	20	98	10	6	32	2	30	2	9	95	20	5	441	15	426
16:45	38	16	23	1	20	79	10	2	24	2	10	3	7	74	12	6	327	12	315
Hour	128	57	122	7	57	350	33	19	78	10	58	8	24	253	54	14	1272	48	1224
17:00	28	11	29	2	18	69	9	5	31	7	26	1	6	85	17	2	346	10	336
17:15	26	6	14	1	20	91	9	4	20	5	20	0	6	73	14	6	315	11	304
17:30	15	3	12	0	13	85	9	3	18	4	12	1	4	75	16	9	279	13	266
17:45	11	6	7	0	19	88	11	7	15	3	11	3	1	65	11	0	258	10	248
Hour	80	26	62	3	70	333	38	19	84	19	69	5	17	298	58	17	1198	44	1154
18:00	9	4	19	0	10	86	5	0	16	6	15	0	7	57	8	3	245	3	242
18:15	14	3	7	0	15	65	5	0	20	1	10	1	0	47	5	1	194	2	192
18:30	6	3	6	0	7	55	6	1	11	2	6	1	4	38	9	3	158	5	153
18:45	5	2	4	0	11	51	5	2	17	2	8	3	2	52	10	2	176	7	169
Hour	34	12	36	0	43	257	21	3	64	11	39	5	13	194	32	9	773	17	756
19:00	7	1	9	0	6	46	4	0	9	6	9	2	1	55	10	1	166	3	163
19:15	4	0	3	0	3	43	0	0	12	2	12	1	3	46	13	0	142	1	141
19:30	6	4	1	0	15	45	5	0	11	7	9	0	1	22	10	1	137	1	136
19:45	5	4	7	0	6	38	5	0	9	0	16	0	2	46	6	2	146	2	144
Hour	22	9	20	0	30	172	14	0	41	15	46	3	7	169	39	4	591	7	584

Weather :  
 Counted by: Marge and Janelle  
 Board # :  
 Ther :

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Study Name: TMC9702  
 Site Code : 97020202  
 Start Date: 06/06/97  
 Page : 3

Vehicle group 1

Start Time	Main St. Southbound				CSAH 8 (Osborne Rd.) Westbound				Comerce Lane Northbound				CSAH 8 (Osborne Rd.) Eastbound				Intvl	Exclu	Inclu
	Left	Thru	Right	Other	Left	Thru	Right	Other	Left	Thru	Right	Other	Left	Thru	Right	Other			
20:00	4	1	4	0	4	28	4	0	16	4	10	0	1	38	10	1	125	1	124
20:15	8	6	0	1	7	20	2	1	13	4	11	1	1	42	1	0	118	3	115
20:30	4	3	1	0	3	29	5	0	15	4	10	1	2	57	8	1	143	2	141
20:45	6	1	2	0	7	34	5	0	25	3	13	2	2	45	7	0	152	2	150
Hour	22	11	7	1	21	111	16	1	69	15	44	4	6	182	26	2	538	8	530
21:00	5	4	7	0	10	29	1	0	9	4	17	1	3	55	8	1	154	2	152
21:15	6	2	2	0	6	27	1	2	14	3	6	0	1	28	3	0	101	2	99
21:30	7	0	3	0	5	21	3	0	17	2	10	0	0	31	5	0	104	0	104
21:45	5	1	0	0	7	25	1	1	7	0	7	0	1	29	2	0	86	1	85
Hour	23	7	12	0	28	102	6	3	47	9	40	1	5	143	18	1	445	5	440
Total	601	360	703	90	771	3252	653	214	1032	331	774	199	560	3133	943	250	13866	753	13113
% Apr.	34.2	20.5	40.0	5.1	15.7	66.5	13.3	4.3	44.1	14.1	33.1	8.5	11.4	64.1	19.3	5.1	-	-	-
% Int.	4.3	2.5	5.0	0.6	5.5	23.4	4.7	1.5	7.4	2.3	5.5	1.4	4.0	22.5	6.8	1.8	-	-	-

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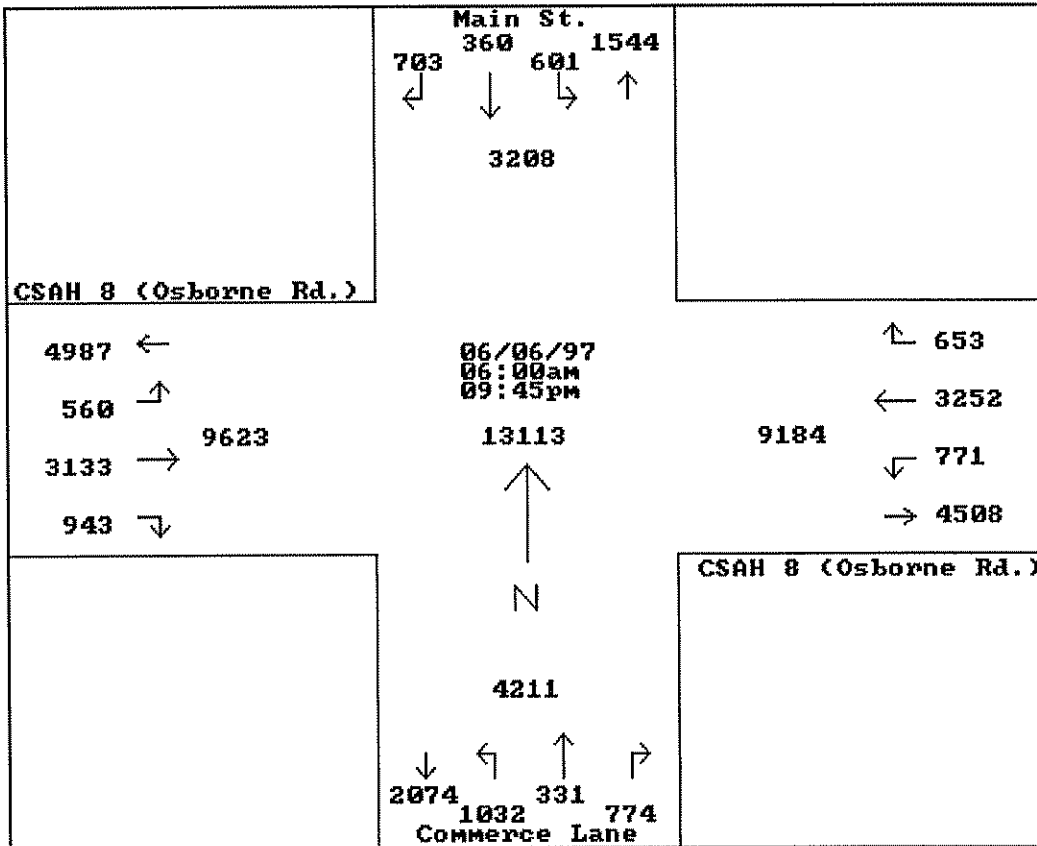
Study Name: TMC9702

Site Code : 97020202

Start Date: 06/06/97

Weather :  
Counted by: Marge and Janelle  
Board # :  
Other :

Southbound: Main St.  
Westbound: CSAH 8 (Osborne Rd.)  
Northbound: Commerce Lane  
Eastbound: CSAH 8 (Osborne Rd.)



or Street Approaches:

Lastbound:

CSAH 8 (Osborne Rd.)

Data File: C:\APPS\PETRA2\DATAFILE\TMC9702.PDF  
 Count Type: IMC. Channel: 0. Count Date: 6/ 6/97  
 Number of Lanes: 2  
 Approach Speed: 35  
 Total Approach Traffic: 4636

Westbound:

CSAH 8 (Osborne Rd.)

Data File: C:\APPS\PETRA2\DATAFILE\TMC9702.PDF  
 Count Type: IMC. Channel: 0. Count Date: 6/ 6/97  
 Number of Lanes: 2  
 Approach Speed: 35  
 Total Approach Traffic: 4676

Minor Street Approaches:

Northbound:

Commerce Lane

Data File: C:\APPS\PETRA2\DATAFILE\TMC9702.PDF  
 Count Type: IMC. Channel: 0. Count Date: 6/ 6/97  
 Number of Lanes: 2  
 Approach Speed: 0  
 Total Approach Traffic: 2137

Southbound:

Main St.

Data File: C:\APPS\PETRA2\DATAFILE\TMC9702.PDF  
 Count Type: IMC. Channel: 0. Count Date: 6/ 6/97  
 Number of Lanes: 2  
 Approach Speed: 0  
 Total Approach Traffic: 1664

Analysis of 8-Hour Volume Warrants (Criteria refers to high volume side street for that hour):

Hour	Main (Total)	Side			Warrant 1		Warrant 2		Warrant 8	
		Vol.	Dir.	Rank	Meets?	Criteria	Meets?	Criteria	Meets?	Criteria
0	0	0	S	17		200		100		160
1	0	0	S	18		200		100		160
2	0	0	S	19		200		100		160
3	0	0	S	20		200		100		160
4	0	0	S	21		200		100		160
5	0	0	S	22		200		100		160
6	653	62	N	16	MAIN	200		100		160
7	719	111	N	12	MAIN	200	SIDE	100		160
8	532	87	N	15		200		100		160
9	434	113	N	11		200	SIDE	100		160
10	492	123	N	9		200	SIDE	100		160
11	562	172	N	4		200	SIDE	100	SIDE	160
12	728	203	N	2	--BOTH--	200	SIDE	100	--BOTH--	160
13	531	147	N	7		200	SIDE	100		160
14	631	162	N	6	MAIN	200	SIDE	100	SIDE	160
15	790	199	N	3	MAIN	200	SIDE	100	--BOTH--	160
16	771	307	S	1	--BOTH--	200	SIDE	100	--BOTH--	160
17	814	172	N	5	MAIN	200	SIDE	100	--BOTH--	160
18	560	114	N	10		200	SIDE	100		160
19	431	102	N	13		200	SIDE	100		160
20	362	128	N	8		200	SIDE	100		160
21	302	96	N	14		200		100		160
22	0	0	S	23		200		100		160
23	0	0	S	24		200		100		160

## Warrant Summary:

Urban values apply.

## Warrant 1 - Minimum Vehicular Volumes

NOT SATISFIED. Required values reached for 2 hours. Criteria--Main St.: 600; Side St.: See Volume Summary.

## Warrant 2 - Interruption of Continuous Traffic

NOT SATISFIED. Required values reached for 0 hours. Criteria--Main St.: 900; Side St.: See Volume Summary.

## Warrant 3 - Minimum Pedestrian Volumes

NOT SATISFIED. Ped volumes too low. Criteria--190 Peds in peak hour, 100 peds in 4th high hour.

## Warrant 4 - School Crossing

NOT APPLICABLE. Gap data has not been defined.

## Warrant 5 - Progressive Movement

NOT SATISFIED. Adjacent signals closer than 1000 feet and/or not part of coordinated system.

## Warrant 6 - Accident Experience

NOT SATISFIED. Volumes do not meet 80% of Warrants 1, 2, or 3.

Correctable Accidents: 7; Right Angle Accidents: 7; Left Turn Accidents: 0; Other Accidents: 0.

## Warrant 7 - Systems Warrant

NOT SATISFIED. At least one street has no major approaches. Peak hour total entering volume: 1224.

- Approaches which are part of the principal through traffic roadway network.
- Approaches which include rural or suburban highways outside, entering or traversing a city.
- Approaches which appear as a major route in an official transportation plan.

## Warrant 8 - Combination of Warrants

NOT SATISFIED. Required values reached for 4 hours. Criteria--Main: 720; Side: See Volume Summary.

## Warrant 9 - Four Hour Volumes

NOT SATISFIED. Required values reached for 1 hours.

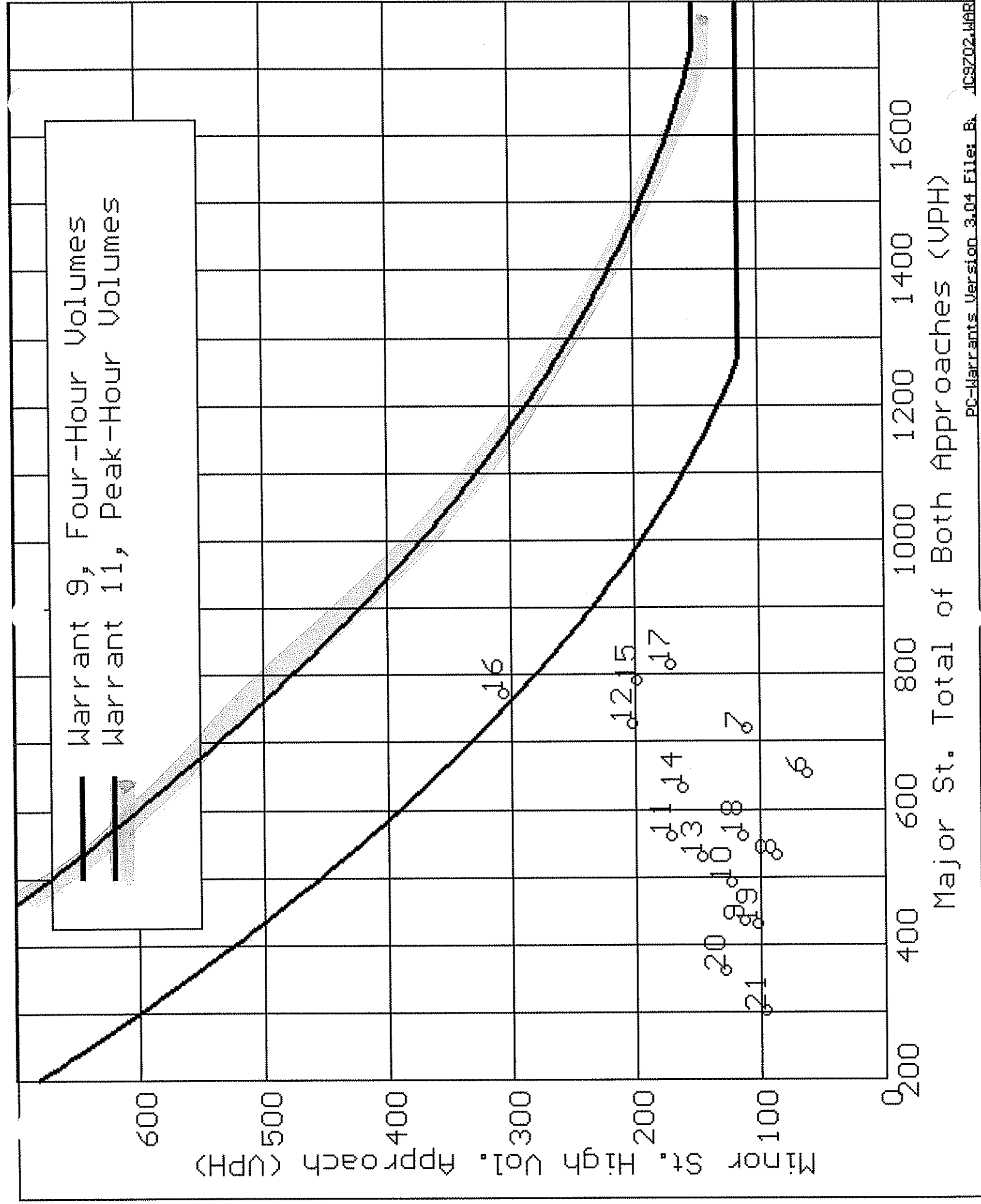
## Warrant 10 - Peak Hour Delay

NOT SATISFIED. Peak hour (1600 hours) volume not adequate.

Criteria--Main St.: 800 (4 approaches), 650 (3 approaches); Side St.: 150.

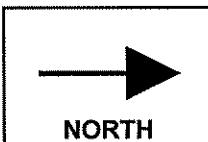
## Warrant 11 - Peak Hour Volume

NOT SATISFIED.



Major St. Total of Both Approaches (UPH)

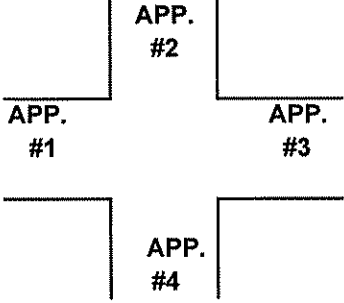




**COUNT LOCATION:** TMC 9702 CSAH 8 (OSBORNE RD)  
MAIN ST / COMMERCE BLVD

**DATE:** 6/6/97

APP. #1=NB MAIN ST /  
 COMMERCE BLVD  
 APP. #2 =EB CSAH 8  
 (OSBORNE RD)  
 APP. #3=SB MAIN ST /  
 COMMERCE BLVD  
 APP. #4=WB CSAH 8  
 (OSBORNE RD)



HEAVY VEHICLE- ANY VEHICLE HAVING MORE THAN  
 FOUR TIRES TOUCHING THE PAVEMENT  
 A. TRUCKS- A HEAVY VEHICLE INVOLVED PRIMARILY  
 IN THE TRANSPORT OF GOODS OR IN THE DELIVERY  
 OF A SERVICE.  
 B. RV- A HEAVY VEHICLE OPERATED BY A PRIVATE  
 MOTORIST AND INVOLVED IN THE TRANSPORT OF  
 RECREATIONAL EQUIPMENT OR FACILITIES.  
 C. BUSES- A HEAVY VEHICLE INVOLVED IN THE  
 TRANSPORTATION OF GROUPS OF PEOPLE.

TIME	PEDESTRIANS					HEAVY VEHICLES		
	APP. #1	APP. #2	APP. #3	APP. #4	15 MIN TOT	TRUCKS	RV	BUS
6:00-6:15AM			1	1	2	6		
6:15-6:30			1		1	4		
6:30-6:45			2		2	5		
6:45-7:00	1		3	2	6	4		
<b>HOURLY TOTAL</b>					<b>11</b>	<b>HOURLY TOTAL</b>		<b>19</b>
7:00-7:15		1	1	1	3	9		
7:15-7:30	1	1	1		3	9		
7:30-7:45			1		1	13		
7:45-8:00			1		1	18		
<b>HOURLY TOTAL</b>					<b>8</b>	<b>HOURLY TOTAL</b>		<b>49</b>
8:00-8:15			1		1	20		
8:15-8:30		1	1		2	9		1
8:30-8:45						9		
8:45-9:00						10		
<b>HOURLY TOTAL</b>					<b>3</b>	<b>HOURLY TOTAL</b>		<b>49</b>
9:00-9:15						21		
9:15-9:30	2				2	13		
9:30-9:45				1	1	12		
9:45-10:00						24		
<b>HOURLY TOTAL</b>					<b>3</b>	<b>HOURLY TOTAL</b>		<b>70</b>
10:00-10:15			1	1	2	25		
10:15-10:30						22		1
10:30-10:45	2	2	2		6	17		1
10:45-11:00						26		
<b>HOURLY TOTAL</b>					<b>8</b>	<b>HOURLY TOTAL</b>		<b>92</b>
11:00-11:15	2	2			4	26		
11:15-11:30			4		4	28		
11:30-11:45						21		
11:45-12:00			4		4	11		
<b>HOURLY TOTAL</b>					<b>12</b>	<b>HOURLY TOTAL</b>		<b>86</b>
12:00-12:15		1	3		4	18	1	
12:15-12:30				1	1	9		
12:30-12:45				2	2	12		
12:45-1:00	3				3	14		
<b>HOURLY TOTAL</b>					<b>10</b>	<b>HOURLY TOTAL</b>		<b>54</b>
1:00-1:15			4		4	15		
1:15-1:30						7	1	
1:30-1:45	2		5	2	9	25		2
1:45-2:00			3	1	4	16		1
<b>HOURLY TOTAL</b>					<b>17</b>	<b>HOURLY TOTAL</b>		<b>67</b>

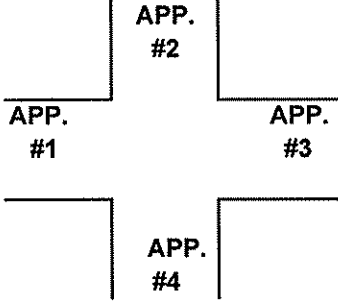


**NORTH**

**COUNT LOCATION:** TMC 9702 CSAH 8 (OSBORNE RD)  
MAIN ST / COMMERCE BLVD

**DATE:** 6/6/97

APP. #1=SB MAIN ST /  
 COMMERCE BLVD  
 APP. #2 =WB CSAH 8  
 (OSBORNE RD)  
 APP. #3=NB MAIN ST /  
 COMMERCE BLVD  
 APP. #4=EB CSAH 8  
 (OSBORNE RD)



- HEAVY VEHICLE- ANY VEHICLE HAVING MORE THAN FOUR TIRES TOUCHING THE PAVEMENT
- A. TRUCKS- A HEAVY VEHICLE INVOLVED PRIMARILY IN THE TRANSPORT OF GOODS OR IN THE DELIVERY OF A SERVICE.
  - B. RV- A HEAVY VEHICLE OPERATED BY A PRIVATE MOTORIST AND INVOLVED IN THE TRANSPORT OF RECREATIONAL EQUIPMENT OR FACILITIES.
  - C. BUSES- A HEAVY VEHICLE INVOLVED IN THE TRANSPORTATION OF GROUPS OF PEOPLE.

TIME	PEDESTRIANS					HEAVY VEHICLES		
	APP. #1	APP. #2	APP. #3	APP. #4	15 MIN TOT	TRUCKS	RV	BUS
2:00-2:15PM			1		1	17		
2:15-2:30						19		
2:30-2:45		2	1	1	4	24		
2:45-3:00						19		2
<b>HOURLY TOTAL</b>					<b>5</b>	<b>HOURLY TOTAL</b>		<b>81</b>
3:00-3:15	2	2	5		9	11		
3:15-3:30						16		
3:30-3:45				4	4	14		
3:45-4:00				1	1	11		
<b>HOURLY TOTAL</b>					<b>14</b>	<b>HOURLY TOTAL</b>		<b>52</b>
4:00-4:15	2				2	8		1
4:15-4:30	1				1	18		
4:30-4:45	2				2	13	1	
4:45-5:00		1			1	12		
<b>HOURLY TOTAL</b>					<b>6</b>	<b>HOURLY TOTAL</b>		<b>53</b>
5:00-5:15		1			1	9		
5:15-5:30	1	1			2	11		
5:30-5:45						13		
5:45-6:00		1			1	10		
<b>HOURLY TOTAL</b>					<b>4</b>	<b>HOURLY TOTAL</b>		<b>43</b>
6:00-6:15	1				1	3		
6:15-6:30		2			2	2		
6:30-6:45		1			1	5		
6:45-7:00	4				4	6	1	
<b>HOURLY TOTAL</b>					<b>8</b>	<b>HOURLY TOTAL</b>		<b>17</b>
7:00-7:15						3		
7:15-7:30			2	2	4	1		
7:30-7:45	1			3	4	1		
7:45-8:00						2		
<b>HOURLY TOTAL</b>					<b>8</b>	<b>HOURLY TOTAL</b>		<b>7</b>
8:00-8:15			1	1	2	1		
8:15-8:30	4				4	3		
8:30-8:45		1			1	2		
8:45-9:00		1	5	2	8	2		
<b>HOURLY TOTAL</b>					<b>15</b>	<b>HOURLY TOTAL</b>		<b>8</b>
9:00-9:15			1	1	2	2		
9:15-9:30						2		
9:30-9:45			1		1			
9:45-10:00				1	1	1		
<b>HOURLY TOTAL</b>					<b>4</b>	<b>HOURLY TOTAL</b>		<b>5</b>