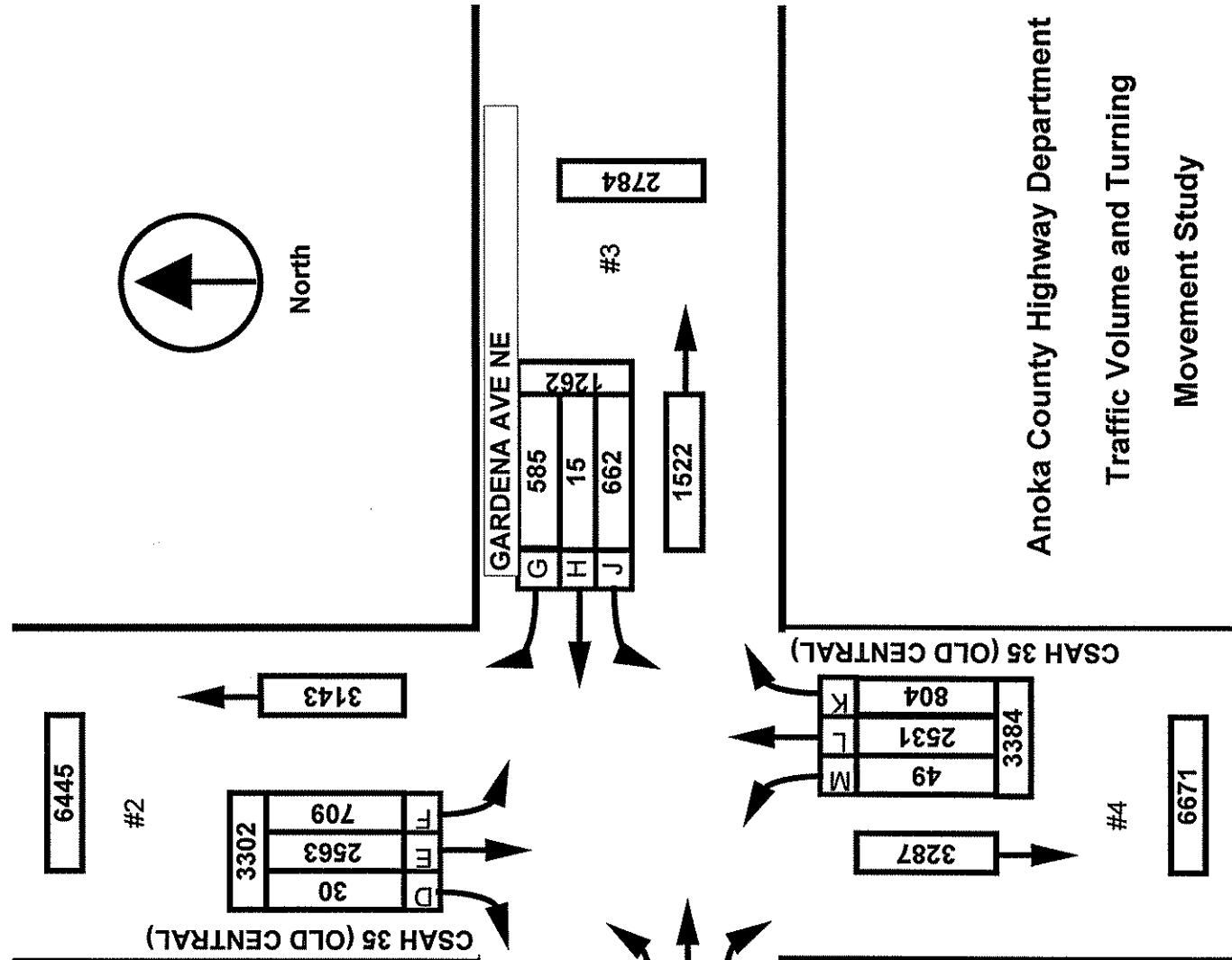


Date : 7/8/97AM 7/7/97PM

Count Number : TMC9720

Location CSAH 35 (OLD CENTRAL)

@ GARDENA AVE NE



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

Anoka County Highway Department  
 Traffic Volume and Turning  
 Movement Study

PETRA Software

Weather : RAINY AND 65  
 Counted by: SARAH AND JANELLE  
 Board # :  
 :her :

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Study Name: TMC9720  
 Site Code : 97200202  
 Start Date: 07/08/97  
 Page : 1

Vehicle group 1

Start Time	CSAH 35 (OLD CENTRAL) Southbound				GARDENA AVE NE Westbound				CSAH 35 (OLD CENTRAL) Northbound				PARK ENTRANCE Eastbound				Intvl	Exclu	Inclu
	Left	Thru	Right	Other	Left	Thru	Right	Other	Left	Thru	Right	Other	Left	Thru	Right	Other			
07/08/97																			
06:00	4	48	1	2	9	0	9	0	0	42	8	2	0	0	0	0	125	4	121
06:15	4	35	0	2	12	0	5	0	0	27	5	2	1	0	0	0	93	4	89
06:30	10	53	1	1	4	0	5	1	0	43	7	1	0	0	1	0	127	3	124
06:45	4	43	0	2	13	0	6	1	0	52	4	1	0	0	0	0	126	4	122
Hour	22	179	2	7	38	0	25	2	0	164	24	6	1	0	1	0	471	15	456
07:00	14	55	0	4	19	0	6	0	1	61	11	2	2	0	0	1	176	7	169
07:15	8	35	0	3	9	0	6	0	0	62	18	3	3	0	0	1	148	7	141
07:30	4	36	2	0	11	0	8	0	1	52	8	3	1	0	0	0	126	3	123
07:45	10	33	1	3	19	0	12	2	0	41	12	0	0	0	1	0	134	5	129
Hour	36	159	3	10	58	0	32	2	2	216	49	8	6	0	1	2	584	22	562
08:00	8	46	1	2	14	0	8	3	0	28	10	1	1	0	2	0	124	6	118
08:15	4	38	0	2	17	1	6	2	0	30	9	2	0	1	0	0	112	6	106
08:30	6	33	0	2	3	6	5	0	2	33	5	6	0	0	1	1	103	9	94
08:45	8	38	0	2	4	1	5	0	0	29	9	2	0	2	0	0	100	4	96
Hour	26	155	1	8	38	8	24	5	2	120	33	11	1	3	3	1	439	25	414
09:00	8	23	2	1	16	1	11	0	0	20	8	1	1	1	1	0	94	2	92
09:15	8	32	1	5	6	1	9	0	1	34	9	3	0	1	2	1	113	9	104
09:30	7	37	2	3	8	0	6	1	2	23	8	2	0	0	5	2	106	8	98
09:45	6	36	0	0	9	0	5	0	0	27	16	0	0	0	1	0	100	0	100
Hour	29	128	5	9	39	2	31	1	3	104	41	6	1	2	9	3	413	19	394
10:00	9	42	0	2	13	0	12	3	3	37	12	2	0	0	6	1	142	8	134
10:15	13	29	0	0	12	0	8	1	0	34	17	4	0	0	0	0	118	5	113
10:30	14	48	1	1	5	0	3	0	2	40	15	2	1	0	0	0	132	3	129
10:45	3	50	2	1	14	0	5	0	1	43	11	1	1	0	3	1	136	3	133
Hour	39	169	3	4	44	0	28	4	6	154	55	9	2	0	9	2	528	19	509
11:00	8	63	0	1	11	0	8	2	3	43	17	0	1	0	4	1	162	4	158
11:15	10	42	1	3	11	1	5	0	3	60	12	2	0	0	3	0	153	5	148
11:30	17	37	1	2	13	0	4	0	0	52	14	5	2	0	0	0	147	7	140
11:45	6	40	1	0	9	0	1	0	2	47	12	2	1	0	0	0	121	2	119
Hour	41	182	3	6	44	1	18	2	8	202	55	9	4	0	7	1	583	18	565
12:00	10	42	0	3	9	0	3	1	3	62	17	2	1	1	3	0	157	6	151
12:15	8	44	4	1	15	0	13	1	0	47	13	3	1	0	1	0	151	5	146
12:30	7	40	2	3	8	0	6	3	0	62	11	3	0	1	4	1	151	10	141
12:45	16	33	0	2	14	1	5	3	3	44	12	0	1	1	2	1	138	6	132
Hour	41	159	6	9	46	1	27	8	6	215	53	8	3	3	10	2	597	27	570

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Horsham, PA.

Weather : RAINY AND 65  
 Counted by: SARAH AND JANELLE  
 Board # :  
 :her :

Study Name: TMC9720  
 Site Code : 97200202  
 Start Date: 07/08/97  
 Page : 2

Vehicle group 1

Start Time	CSAH 35 (OLD CENTRAL) Southbound				GARDENA AVE NE Westbound				CSAH 35 (OLD CENTRAL) Northbound				PARK ENTRANCE Eastbound				Intvl	Exclu	Inclu
	Left	Thru	Right	Other	Left	Thru	Right	Other	Left	Thru	Right	Other	Left	Thru	Right	Other			
13:00	10	42	0	2	10	0	6	4	2	46	12	1	1	0	4	0	140	7	133
13:15	13	38	0	3	9	0	9	1	1	39	17	1	0	0	1	0	132	5	127
13:30	15	36	1	1	7	1	9	1	1	40	14	2	3	0	1	0	132	4	128
13:45	10	31	0	2	3	0	14	4	2	53	14	2	2	0	1	1	139	9	130
Hour	48	147	1	8	29	1	38	10	6	178	57	6	6	0	7	1	543	25	518
14:00	12	46	0	0	11	0	9	1	1	48	5	3	0	0	0	0	136	4	132
14:15	9	37	1	3	8	0	16	2	3	32	12	0	1	0	4	0	128	5	123
14:30	13	46	0	3	8	0	17	2	1	21	8	0	1	0	0	0	120	5	115
14:45	17	58	1	6	15	0	6	0	1	34	5	2	0	0	0	0	145	8	137
Hour	51	187	2	12	42	0	48	5	6	135	30	5	2	0	4	0	529	22	507
15:00	10	37	1	1	12	0	11	0	0	40	8	2	0	0	0	0	122	3	119
15:15	17	46	0	0	11	0	8	0	1	34	17	0	0	0	2	0	136	0	136
15:30	7	36	0	1	14	0	18	0	0	62	12	2	0	0	0	0	152	3	149
15:45	14	49	0	2	6	0	17	0	0	60	18	1	0	0	0	0	167	3	164
Hour	48	168	1	4	43	0	54	0	1	196	55	5	0	0	2	0	577	9	568
16:00	17	58	1	1	10	0	16	1	0	48	27	2	0	0	0	0	181	4	177
16:15	25	82	0	1	14	0	12	0	0	88	21	0	0	0	0	0	243	1	242
16:30	18	71	0	0	13	0	17	1	2	78	24	1	0	0	0	0	225	2	223
16:45	24	88	0	1	14	0	16	1	0	83	17	3	0	0	1	0	248	5	243
Hour	84	299	1	3	51	0	61	3	2	297	89	6	0	0	1	0	897	12	885
17:00	18	61	1	1	8	0	15	0	0	56	20	0	0	0	2	0	182	1	181
17:15	12	74	1	0	8	0	10	0	1	58	19	2	0	0	0	0	185	2	183
17:30	24	53	0	1	10	1	15	2	2	47	11	0	0	0	0	0	166	3	163
17:45	13	61	0	1	17	0	23	0	0	50	23	2	0	1	1	0	192	3	189
Hour	67	249	2	3	43	1	63	2	3	211	73	4	0	1	3	0	725	9	716
18:00	16	52	0	2	16	0	9	0	0	54	18	1	1	0	3	0	172	3	169
18:15	12	40	0	1	13	1	13	0	1	30	13	2	0	0	1	0	127	3	124
18:30	11	36	0	0	15	0	15	0	0	21	14	1	0	0	0	0	113	1	112
18:45	8	30	0	0	15	0	9	1	0	30	15	0	0	0	0	0	108	1	107
Hour	47	158	0	3	59	1	46	1	1	135	60	4	1	0	4	0	520	8	512
19:00	9	24	0	1	8	0	9	0	0	11	4	0	0	0	0	0	66	1	65
19:15	14	24	0	0	12	0	15	0	0	12	9	0	0	0	0	0	86	0	86
19:30	10	28	0	0	10	0	9	0	0	11	4	0	0	0	0	0	72	0	72
19:45	12	33	0	0	7	0	10	0	0	25	12	0	0	0	0	0	99	0	99
Hour	45	109	0	1	37	0	43	0	0	59	29	0	0	0	0	0	323	1	322

Weather : RAINY AND 65  
 Counted by: SARAH AND JANELLE  
 Board # :  
 her :

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 Horsham, PA.

Study Name: TMC9720  
 Site Code : 97200202  
 Start Date: 07/08/97  
 Page : 3

Vehicle group 1

Start Time	CSAH 35 (OLD CENTRAL) Southbound				GARDENA AVE NE Westbound				CSAH 35 (OLD CENTRAL) Northbound				PARK ENTRANCE Eastbound				Intvl	Exclu	Inclu	
	Left	Thru	Right	Other	Left	Thru	Right	Other	Left	Thru	Right	Other	Left	Thru	Right	Other				Total
20:00	13	18	0	0	9	0	9	0	0	17	10	0	0	0	0	0	0	76	0	76
20:15	9	23	0	0	5	0	4	0	0	24	21	0	0	0	0	0	0	86	0	86
20:30	17	12	0	0	8	0	8	0	0	24	24	0	0	0	0	0	0	93	0	93
20:45	13	13	0	0	13	0	11	0	1	21	12	0	0	0	0	0	0	84	0	84
Hour	52	66	0	0	35	0	32	0	1	86	67	0	0	0	0	0	0	339	0	339
21:00	15	12	0	0	5	0	3	0	0	19	15	0	0	0	0	0	0	69	0	69
21:15	7	14	0	0	5	0	6	0	0	19	4	0	0	0	0	0	0	55	0	55
21:30	4	13	0	0	2	0	5	0	1	13	7	1	0	0	1	0	0	47	1	46
21:45	7	10	0	0	4	0	1	0	1	8	8	0	0	0	0	0	0	39	0	39
Hour	33	49	0	0	16	0	15	0	2	59	34	1	0	0	1	0	0	210	1	209
Total	709	2563	30	87	662	15	585	45	49	2531	804	88	27	9	62	12	0	8278	232	8046
% Apr.	20.9	75.6	0.8	2.5	50.6	1.1	44.7	3.4	1.4	72.8	23.1	2.5	24.5	8.1	56.3	10.9	-	-	-	-
% Int.	8.5	30.9	0.3	1.0	7.9	0.1	7.0	0.5	0.5	30.5	9.7	1.0	0.3	0.1	0.7	0.1	-	-	-	-

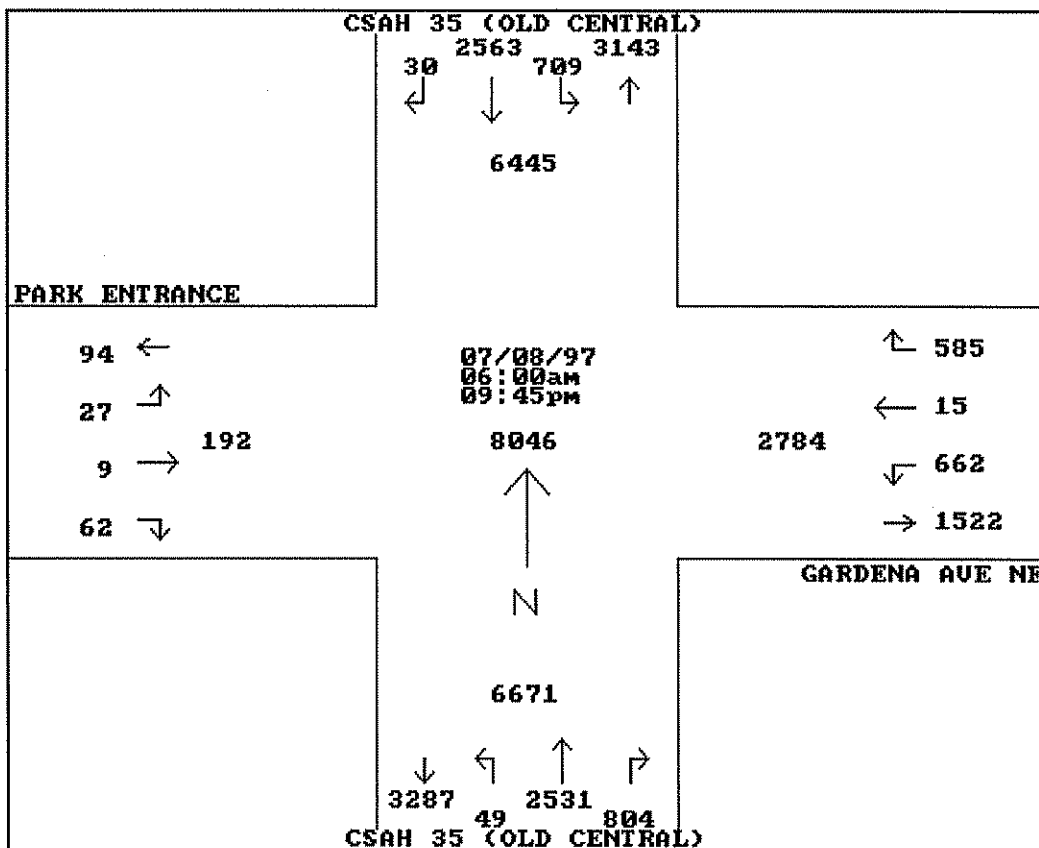
PETRA Software

Weather : RAINY AND 65  
Counted by: SARAH AND JANELLE  
Board # :  
Other :

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Study Name: TMC9720  
Site Code : 97200202  
Start Date: 07/08/97

Southbound: CSAH 35 (OLD CENTRAL)  
Westbound: GARDENA AVE NE  
Northbound: CSAH 35 (OLD CENTRAL)  
Eastbound: PARK ENTRANCE



Major Street Approaches:

Northbound:

CSAH 35 (OLD CENTRAL)

Data File: C:\APPS\PETRA2\DATAFILE\TMC9720.PDF  
 Count Type: IMC. Channel: 0. Count Date: 7/ 8/97  
 Number of Lanes: 1  
 Approach Speed: 35  
 Total Approach Traffic: 3384

Southbound:

CSAH 35 (OLD CENTRAL)

Data File: C:\APPS\PETRA2\DATAFILE\TMC9720.PDF  
 Count Type: IMC. Channel: 0. Count Date: 7/ 8/97  
 Number of Lanes: 1  
 Approach Speed: 35  
 Total Approach Traffic: 3302

Minor Street Approaches:

Eastbound:

PARK ENTRANCE

Data File: C:\APPS\PETRA2\DATAFILE\TMC9720.PDF  
 Count Type: IMC. Channel: 0. Count Date: 7/ 8/97  
 Number of Lanes: 1  
 Approach Speed: 0  
 Total Approach Traffic: 98

Westbound:

GARDENA AVE NE

Data File: C:\APPS\PETRA2\DATAFILE\TMC9720.PDF  
 Count Type: IMC. Channel: 0. Count Date: 7/ 8/97  
 Number of Lanes: 1  
 Approach Speed: 30  
 Total Approach Traffic: 1262

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

Hour	Main		Side			Warrant 1		Warrant 2		Warrant 8	
	Begin	(Total)	Vol.	Dir.	Rank	Meets?	Criteria	Meets?	Criteria	Meets?	Criteria
0		0	0	W	17		150		75		120
1		0	0	W	18		150		75		120
2		0	0	W	19		150		75		120
3		0	0	W	20		150		75		120
4		0	0	W	21		150		75		120
5		0	0	W	22		150		75		120
6		391	63	W	14		150		75		120
7		465	90	W	5		150	SIDE	75		120
8		337	70	W	11		150		75		120
9		310	72	W	9		150		75		120
10		426	72	W	10		150		75		120
11		491	63	W	15		150		75		120
12		480	74	W	8		150		75		120
13		437	68	W	12		150		75		120
14		411	90	W	6		150	SIDE	75		120
15		469	97	W	4		150	SIDE	75		120
16		772	112	W	1	MAIN	150	--BOTH--	75	MAIN	120
17		605	107	W	2	MAIN	150	SIDE	75	MAIN	120
18		401	106	W	3		150	SIDE	75		120
19		242	80	W	7		150	SIDE	75		120
20		272	67	W	13		150		75		120
21		177	31	W	16		150		75		120
22		0	0	W	23		150		75		120
23		0	0	W	24		150		75		120

## Warrant Summary:

Urban values apply.

## Warrant 1 - Minimum Vehicular Volumes

NOT SATISFIED. Required values reached for 0 hours. Criteria--Main St.: 500; Side St.: See Volume Summary.

## Warrant 2 - Interruption of Continuous Traffic

NOT SATISFIED. Required values reached for 1 hours. Criteria--Main St.: 750; 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. 0 correctable accidents is fewer than required 5.

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

## Warrant 7 - Systems Warrant

NOT SATISFIED. Peak hour total entering volume 885 does not meet criteria of 1000

- 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 0 hours. Criteria--Main: 600; Side: See Volume Summary.

## Warrant 9 - Four Hour Volumes

NOT SATISFIED. Required values reached for 0 hours.

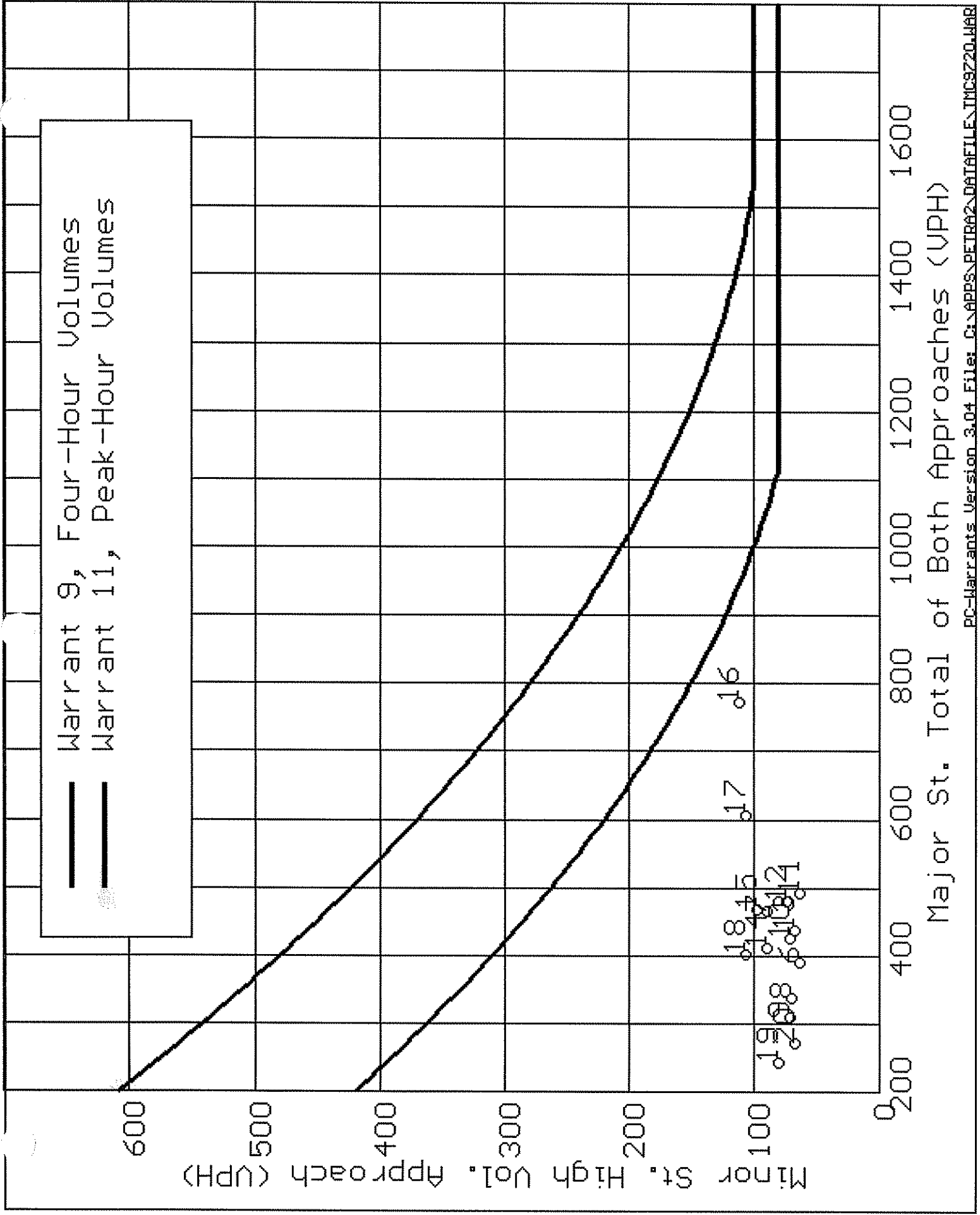
## Warrant 10 - Peak Hour Delay

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

Criteria--Main St.: 800 (4 approaches), 650 (3 approaches); Side St.: 100.

## Warrant 11 - Peak Hour Volume

NOT SATISFIED.







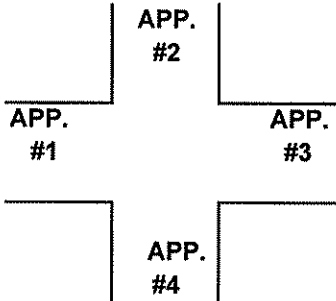
**NORTH**

**COUNT LOCATION:** TMC 9720 CSAH 35 (OLD CENTRAL)  
@ GARDENA AVE NE

**DATE:**

7/8/97

APP. #1=SB CSAH 35  
(OLD CENTRAL)  
APP. #2 =WB GARDENA  
AVE NE  
APP. #3=NB CSAH 35  
(OLD CENTRAL)  
APP. #4=  
PARK ENTRANCE



- 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								3
6:15-6:30						2		2
6:30-6:45						1	1	1
6:45-7:00						2		2
<b>HOURLY TOTAL</b>						<b>HOURLY TOTAL</b>		<b>14</b>
7:00-7:15						3		2
7:15-7:30						4		1
7:30-7:45						1		1
7:45-8:00						4		1
<b>HOURLY TOTAL</b>						<b>HOURLY TOTAL</b>		<b>17</b>
8:00-8:15						5		1
8:15-8:30						4		2
8:30-8:45				1	1	8		1
8:45-9:00						5		1
<b>HOURLY TOTAL</b>					<b>1</b>	<b>HOURLY TOTAL</b>		<b>27</b>
9:00-9:15						1		1
9:15-9:30						5		
9:30-9:45						8		
9:45-10:00		2			2			
<b>HOURLY TOTAL</b>					<b>2</b>	<b>HOURLY TOTAL</b>		<b>15</b>
10:00-10:15						7		1
10:15-10:30						4		
10:30-10:45				3	3	2		1
10:45-11:00						1		
<b>HOURLY TOTAL</b>					<b>3</b>	<b>HOURLY TOTAL</b>		<b>16</b>
11:00-11:15				1	1	3	1	
11:15-11:30						5		
11:30-11:45						5		2
11:45-12:00		2			2	2		
<b>HOURLY TOTAL</b>					<b>3</b>	<b>HOURLY TOTAL</b>		<b>18</b>
12:00-12:15				1	1	6		
12:15-12:30						5		
12:30-12:45						8		
12:45-1:00								
<b>HOURLY TOTAL</b>					<b>1</b>	<b>HOURLY TOTAL</b>		<b>19</b>
1:00-1:15								
1:15-1:30								1
1:30-1:45								
1:45-2:00								
<b>HOURLY TOTAL</b>						<b>HOURLY TOTAL</b>		<b>1</b>



**NORTH**

**COUNT LOCATION:** TMC 9720 CSAH 35 (OLD CENTRAL)  
@ GARDENA AVE NE

**DATE:**

7/7/97

APP. #1=SB CSAH 35  
(OLD CENTRAL)

APP. #2 =WB GARDENA  
AVE NE

APP. #3=NB CSAH 35  
(OLD CENTRAL)

APP. #4=  
PARK ENTRANCE

APP.  
#2

APP.  
#1

APP.  
#3

APP.  
#4

- 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	3		1
2:15-2:30						4		1
2:30-2:45						5		
2:45-3:00						7		1
<b>HOURLY TOTAL</b>					<b>1</b>	<b>HOURLY TOTAL</b>		<b>22</b>
3:00-3:15						2		
3:15-3:30				1	1			1
3:30-3:45						2		
3:45-4:00						2		
<b>HOURLY TOTAL</b>					<b>1</b>	<b>HOURLY TOTAL</b>		<b>7</b>
4:00-4:15		1			1		1	2
4:15-4:30				1	1		1	
4:30-4:45						1		2
4:45-5:00						2		3
<b>HOURLY TOTAL</b>					<b>2</b>	<b>HOURLY TOTAL</b>		<b>12</b>
5:00-5:15						1		2
5:15-5:30								
5:30-5:45								1
5:45-6:00	1				1	1		2
<b>HOURLY TOTAL</b>					<b>1</b>	<b>HOURLY TOTAL</b>		<b>7</b>
6:00-6:15						3		
6:15-6:30						2		1
6:30-6:45						1		
6:45-7:00								1
<b>HOURLY TOTAL</b>						<b>HOURLY TOTAL</b>		<b>8</b>
7:00-7:15								
7:15-7:30								1
7:30-7:45								
7:45-8:00								
<b>HOURLY TOTAL</b>						<b>HOURLY TOTAL</b>		<b>1</b>
8:00-8:15								
8:15-8:30								
8:30-8:45								
8:45-9:00		4			4			
<b>HOURLY TOTAL</b>					<b>4</b>	<b>HOURLY TOTAL</b>		
9:00-9:15								
9:15-9:30								
9:30-9:45						1		
9:45-10:00								
<b>HOURLY TOTAL</b>						<b>HOURLY TOTAL</b>		<b>1</b>