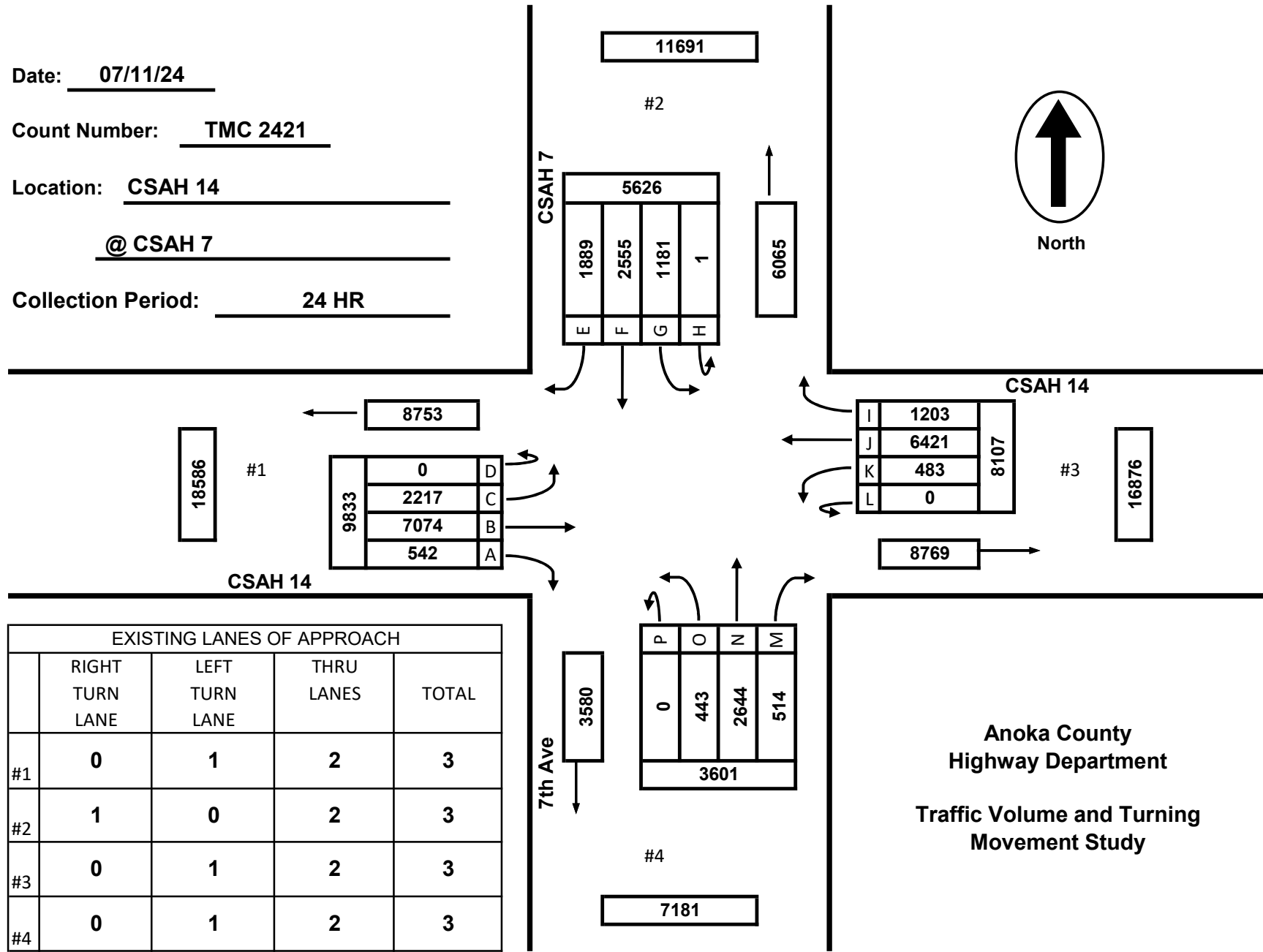
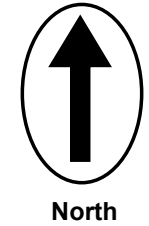


Date: 07/11/24

Count Number: TMC 2421

Location: CSAH 14  
@ CSAH 7

Collection Period: 24 HR



9833	0	D
	2217	C
	7074	B
	542	A

5626			
1889	2555	1181	1
E	F	G	H

I	1203	8107
J	6421	
K	483	
L	0	

P	O	N	M
0	443	2644	514
3601			

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

**Anoka County  
 Highway Department  
 Traffic Volume and Turning  
 Movement Study**

Date: 07/11/24

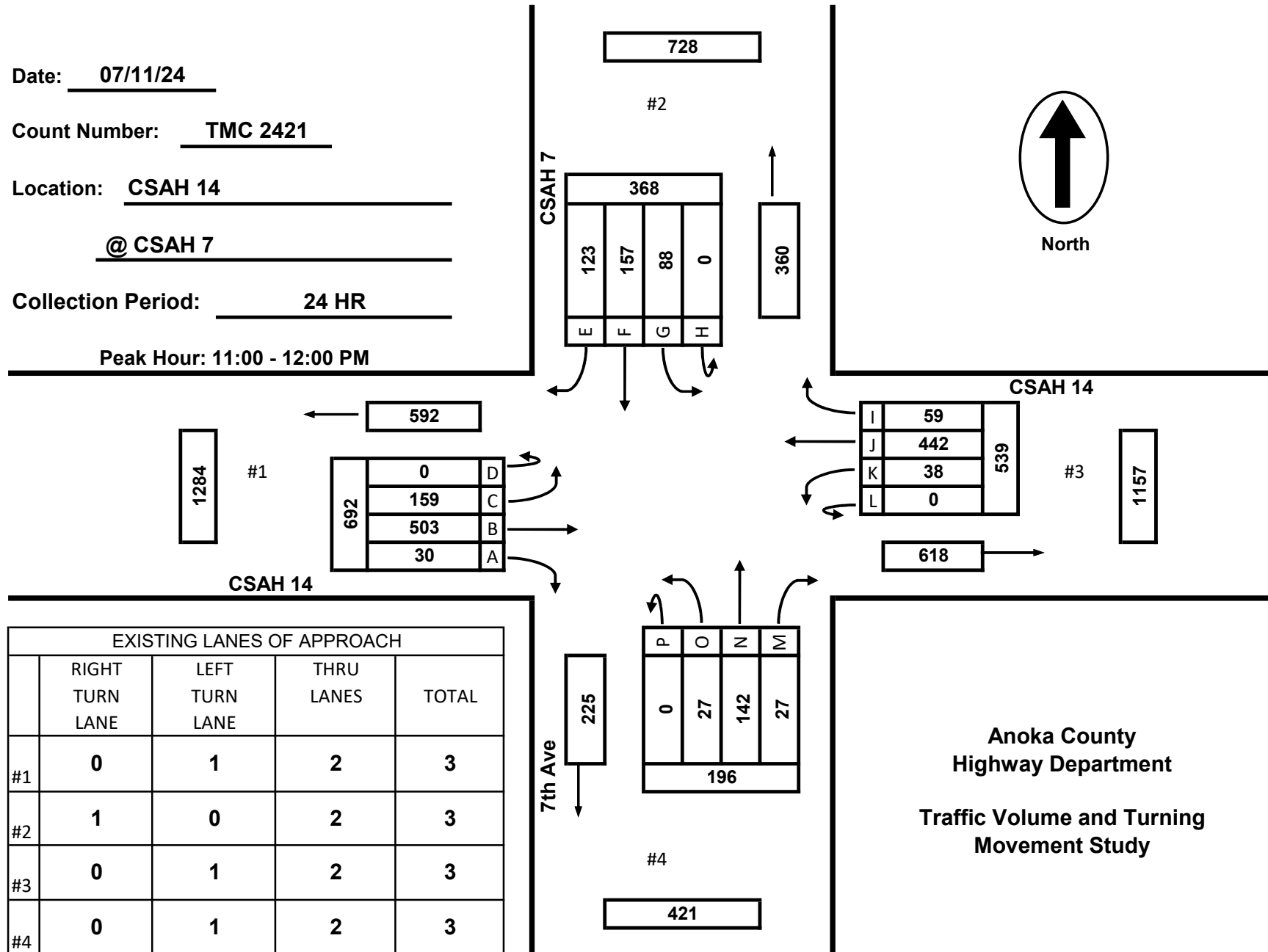
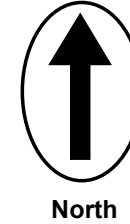
Count Number: TMC 2421

Location: CSAH 14

@ CSAH 7

Collection Period: 24 HR

Peak Hour: 11:00 - 12:00 PM



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

Anoka County  
Highway Department  
Traffic Volume and Turning  
Movement Study

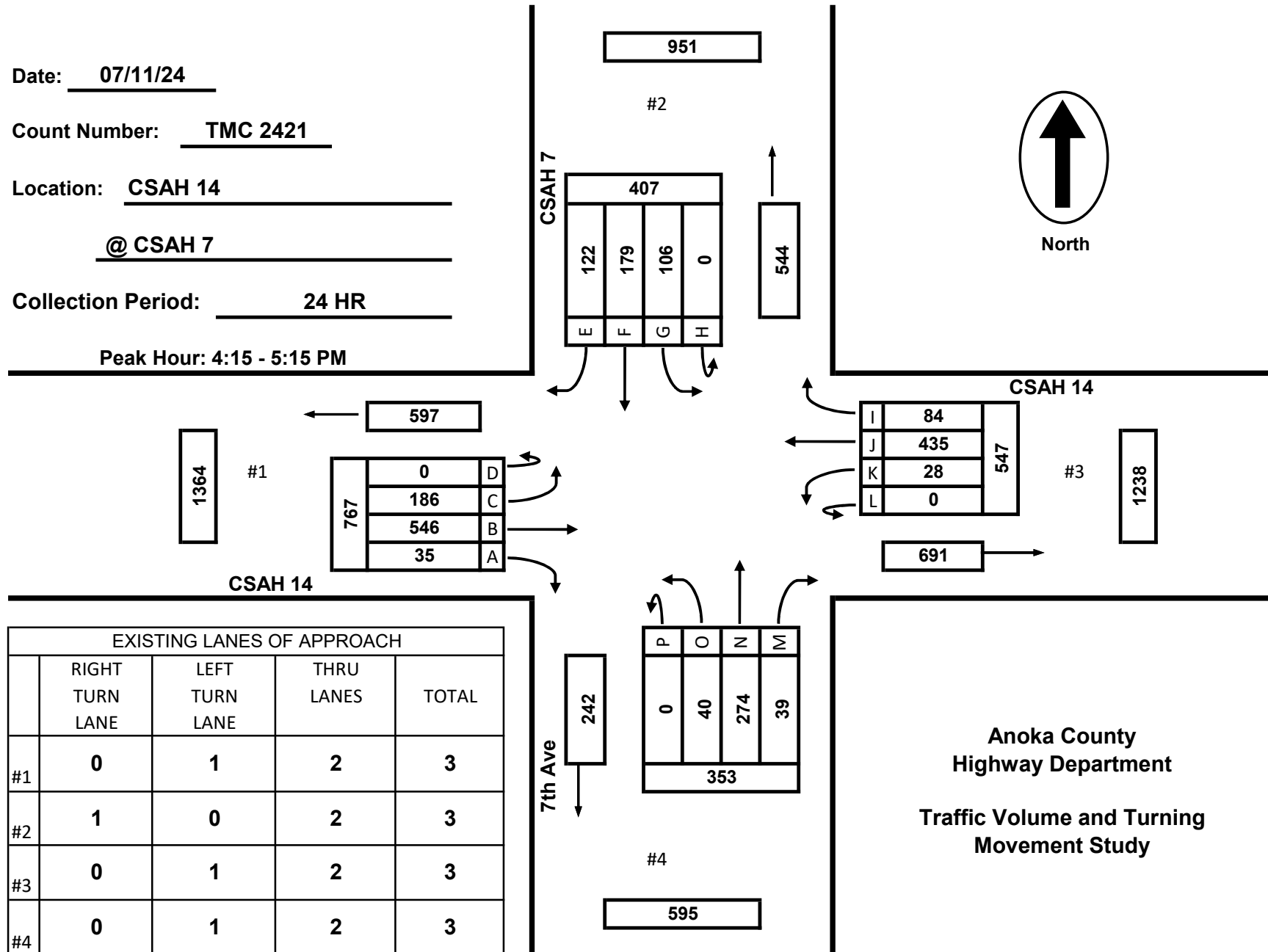
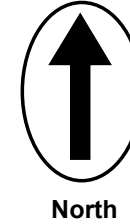
Date: 07/11/24

Count Number: TMC 2421

Location: CSAH 14  
@ CSAH 7

Collection Period: 24 HR

Peak Hour: 4:15 - 5:15 PM



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

**Anoka County  
Highway Department  
Traffic Volume and Turning  
Movement Study**

**TMC 2421 - CSAH 14 @ CSAH 7  
Anoka MN  
Thursday, July 11, 2024**

Time	Southbound CSAH 7						Westbound CSAH 14						Northbound 7th Ave						Eastbound CSAH 14						VEHICLE TOTAL
	U Turns	Left Turns	Straight Through	Right Turns	Crosswalk Crossings	Vehicle Approach Total	U Turns	Left Turns	Straight Through	Right Turns	Crosswalk Crossings	Vehicle Approach Total	U Turns	Left Turns	Straight Through	Right Turns	Crosswalk Crossings	Vehicle Approach Total	U Turns	Left Turns	Straight Through	Right Turns	Crosswalk Crossings	Vehicle Approach Total	
12:00 AM	0	2	2	3	0	7	0	1	10	2	0	13	0	0	3	2	0	5	0	3	7	0	0	10	35
12:15 AM	0	1	2	1	0	4	0	0	10	1	0	11	0	0	1	0	0	1	0	2	7	0	0	9	25
12:30 AM	0	1	2	0	0	3	0	0	8	0	0	8	0	0	1	0	0	1	0	2	12	1	1	15	27
12:45 AM	0	0	1	4	0	5	0	0	4	1	0	5	0	0	2	0	0	2	0	3	5	1	0	9	21
Hourly Total	0	4	7	8	0	19	0	1	32	4	0	37	0	0	7	2	0	9	0	10	31	2	1	43	108
1:00 AM	0	0	3	4	0	7	0	1	8	2	0	11	0	0	2	1	1	3	0	4	12	1	0	17	38
1:15 AM	0	2	4	0	0	6	0	0	2	1	0	3	0	0	2	1	0	3	0	0	8	1	0	9	21
1:30 AM	0	1	5	2	0	8	0	0	5	0	0	5	0	0	2	1	0	3	0	2	10	0	0	12	28
1:45 AM	0	1	1	0	1	2	0	0	3	0	0	3	0	1	1	0	0	2	0	2	8	0	0	10	17
Hourly Total	0	4	13	6	1	23	0	1	18	3	0	22	0	1	7	3	1	11	0	8	38	2	0	48	104
2:00 AM	1	0	1	2	0	4	0	1	4	2	0	7	0	1	5	0	0	6	0	4	2	0	0	6	23
2:15 AM	0	1	4	2	0	7	0	2	4	0	0	6	0	0	1	0	0	1	0	1	7	1	0	9	23
2:30 AM	0	0	3	0	0	3	0	1	5	0	0	6	0	0	1	1	0	2	0	4	2	0	0	6	17
2:45 AM	0	1	2	1	0	4	0	0	1	1	0	2	0	0	0	0	0	0	0	0	10	0	0	10	16
Hourly Total	1	2	10	5	0	18	0	4	14	3	0	21	0	1	7	1	0	9	0	9	21	1	0	31	79
3:00 AM	0	2	3	0	0	5	0	0	6	1	0	7	0	0	0	1	0	1	0	0	7	1	0	8	21
3:15 AM	0	0	4	0	0	4	0	0	3	2	0	5	0	0	2	0	0	2	0	1	3	0	0	4	15
3:30 AM	0	2	0	4	0	6	0	0	10	3	0	13	0	1	3	0	0	4	0	1	2	0	0	3	26
3:45 AM	0	0	1	2	0	3	0	0	8	0	0	8	0	1	5	0	0	6	0	1	4	0	0	5	22
Hourly Total	0	4	8	6	0	18	0	0	27	6	0	33	0	2	10	1	0	13	0	3	16	1	0	20	84
4:00 AM	0	0	2	4	0	6	0	0	8	2	0	10	0	1	2	0	0	3	0	3	8	1	0	12	31
4:15 AM	0	2	1	5	0	8	0	0	9	1	0	10	0	1	5	0	0	6	0	1	5	0	0	6	30
4:30 AM	0	3	3	8	0	14	0	0	14	4	0	18	0	0	7	0	1	7	0	2	9	0	0	11	50
4:45 AM	0	5	4	2	0	11	0	0	14	2	0	16	0	0	4	0	0	4	0	6	12	0	0	18	49
Hourly Total	0	10	10	19	0	39	0	0	45	9	0	54	0	2	18	0	1	20	0	12	34	1	0	47	160
5:00 AM	0	8	2	5	0	15	0	0	13	2	0	15	0	3	5	1	0	9	0	3	14	0	0	17	56
5:15 AM	0	3	9	10	0	22	0	1	45	6	0	52	0	3	8	3	1	14	0	6	17	0	0	23	111
5:30 AM	0	7	14	16	0	37	0	1	35	5	0	41	0	5	15	0	1	20	0	8	10	1	0	19	117
5:45 AM	0	9	26	12	0	47	0	1	29	10	1	40	0	3	17	1	0	21	0	17	25	0	0	42	150
Hourly Total	0	27	51	43	0	121	0	3	122	23	1	148	0	14	45	5	2	64	0	34	66	1	0	101	434
6:00 AM	0	8	18	18	0	44	0	1	55	13	0	69	0	4	14	6	0	24	0	11	28	0	0	39	176
6:15 AM	0	13	49	29	0	91	0	5	64	13	2	82	0	1	21	4	0	26	0	23	50	2	0	75	274
6:30 AM	0	13	48	37	0	98	0	4	85	7	0	96	0	8	23	6	0	37	0	18	45	2	0	65	296
6:45 AM	0	15	58	24	0	97	0	1	79	20	0	100	0	4	32	3	0	39	0	29	53	2	0	84	320
Hourly Total	0	49	173	108	0	330	0	11	283	53	2	347	0	17	90	19	0	126	0	81	176	6	0	263	1066
7:00 AM	0	11	38	26	0	75	0	1	88	33	2	122	0	6	24	3	0	33	0	9	50	5	0	64	294
7:15 AM	0	19	40	41	0	100	0	3	68	17	1	88	0	7	34	3	2	44	0	35	50	0	0	85	317
7:30 AM	0	10	44	23	0	77	0	4	89	7	0	100	0	14	44	3	0	61	0	42	61	5	1	108	346
7:45 AM	0	10	43	43	0	96	0	10	118	18	0	146	0	7	41	6	0	54	0	34	75	8	0	117	413
Hourly Total	0	50	165	133	0	348	0	18	363	75	3	456	0	34	143	15	2	192	0	120	236	18	1	374	1370

**TMC 2421 - CSAH 14 @ CSAH 7  
Anoka MN  
Thursday, July 11, 2024**

Time	Southbound CSAH 7						Westbound CSAH 14						Northbound 7th Ave						Eastbound CSAH 14						VEHICLE TOTAL
	U Turns	Left Turns	Straight Through	Right Turns	Crosswalk Crossings	Vehicle Approach Total	U Turns	Left Turns	Straight Through	Right Turns	Crosswalk Crossings	Vehicle Approach Total	U Turns	Left Turns	Straight Through	Right Turns	Crosswalk Crossings	Vehicle Approach Total	U Turns	Left Turns	Straight Through	Right Turns	Crosswalk Crossings	Vehicle Approach Total	
8:00 AM	0	10	26	27	0	63	0	8	83	13	0	104	0	6	27	7	0	40	0	33	66	9	0	108	315
8:15 AM	0	14	42	25	0	81	0	6	88	6	0	100	0	7	25	9	1	41	0	19	50	11	0	80	302
8:30 AM	0	15	37	30	1	82	0	6	74	11	1	91	0	4	41	6	0	51	0	25	75	7	0	107	331
8:45 AM	0	15	39	31	1	85	0	8	85	17	7	110	0	12	31	7	0	50	0	27	78	4	0	109	354
Hourly Total	0	54	144	113	2	311	0	28	330	47	8	405	0	29	124	29	1	182	0	104	269	31	0	404	1302
9:00 AM	0	18	38	34	1	90	0	10	86	11	3	107	0	8	37	6	0	51	0	31	89	8	0	128	376
9:15 AM	0	14	42	32	2	88	0	6	76	16	0	98	0	7	43	13	0	63	0	22	94	6	0	122	371
9:30 AM	0	32	25	29	0	86	0	7	107	17	1	131	0	8	31	7	0	46	0	28	82	10	1	120	383
9:45 AM	0	25	57	29	0	111	0	18	78	20	1	116	0	3	31	5	0	39	0	43	94	9	0	146	412
Hourly Total	0	89	162	124	3	375	0	41	347	64	5	452	0	26	142	31	0	199	0	124	359	33	1	516	1542
10:00 AM	0	24	40	26	0	90	0	10	79	22	0	111	0	4	35	9	1	48	0	29	83	5	1	117	366
10:15 AM	0	19	31	28	0	78	0	6	101	19	0	126	0	10	26	5	0	41	0	35	94	12	0	141	386
10:30 AM	0	22	51	31	0	104	0	10	116	12	0	138	0	10	42	12	0	64	0	27	111	12	1	150	456
10:45 AM	0	21	45	29	0	95	0	12	110	18	0	140	0	9	42	11	0	62	0	30	92	13	2	135	432
Hourly Total	0	86	167	114	0	367	0	38	406	71	0	515	0	33	145	37	1	215	0	121	380	42	4	543	1640
11:00 AM	0	16	41	31	1	88	0	13	101	15	1	129	0	8	43	6	0	57	0	36	120	7	2	163	437
11:15 AM	0	17	33	30	0	80	0	10	121	17	1	148	0	5	32	8	0	45	0	37	126	7	0	170	443
11:30 AM	0	27	41	27	0	95	0	7	110	11	1	128	0	4	39	10	1	53	0	40	119	9	0	168	444
11:45 AM	0	28	42	35	0	105	0	8	110	16	0	134	0	10	28	3	0	41	0	46	138	7	0	191	471
Hourly Total	0	88	157	123	1	368	0	38	442	59	3	539	0	27	142	27	1	196	0	159	503	30	2	692	1795
12:00 PM	0	18	44	29	0	91	0	11	109	32	0	152	0	7	39	12	0	58	0	48	146	11	1	205	506
12:15 PM	0	23	44	26	1	93	0	13	144	18	3	175	0	10	53	8	0	71	0	24	137	12	0	173	512
12:30 PM	0	19	33	24	0	76	0	4	123	23	0	150	0	4	37	8	0	49	0	41	151	9	0	201	476
12:45 PM	0	32	52	43	1	127	0	8	128	24	0	160	0	5	30	5	0	40	0	27	146	7	0	180	507
Hourly Total	0	92	173	122	2	387	0	36	504	97	3	637	0	26	159	33	0	218	0	140	580	39	1	759	2001
1:00 PM	0	15	32	27	1	74	0	5	101	30	2	136	0	9	45	2	1	56	0	37	159	8	0	204	470
1:15 PM	0	20	32	23	0	75	0	9	93	16	0	118	0	4	38	12	0	54	0	36	108	7	1	151	398
1:30 PM	0	19	29	39	1	87	0	5	124	25	2	154	0	12	48	6	0	66	0	30	136	17	0	183	490
1:45 PM	0	16	35	23	0	74	0	8	112	16	1	136	0	5	47	7	0	59	0	37	128	6	0	171	440
Hourly Total	0	70	128	112	2	310	0	27	430	87	5	544	0	30	178	27	1	235	0	140	531	38	1	709	1798
2:00 PM	0	14	27	23	0	64	0	10	107	23	0	140	0	13	38	10	0	61	0	40	116	9	2	165	430
2:15 PM	0	15	48	27	0	90	0	10	111	20	0	141	0	7	45	4	1	56	0	48	131	14	0	193	480
2:30 PM	0	12	41	31	1	84	0	6	102	21	2	129	0	6	44	7	1	57	0	47	124	16	2	187	457
2:45 PM	0	22	47	34	2	103	0	3	93	23	0	119	0	3	55	5	0	63	0	42	119	11	0	172	457
Hourly Total	0	63	163	115	3	341	0	29	413	87	2	529	0	29	182	26	2	237	0	177	490	50	4	717	1824
3:00 PM	0	15	55	35	0	105	0	10	114	12	0	136	0	7	53	17	0	77	0	52	137	9	0	198	516
3:15 PM	0	27	42	32	1	101	0	6	111	33	2	150	0	1	55	10	2	66	0	49	122	9	0	180	497
3:30 PM	0	30	44	34	1	108	0	9	107	19	1	135	0	2	78	14	0	94	0	29	147	9	1	185	522
3:45 PM	0	17	45	23	0	85	0	10	111	27	0	148	0	11	63	14	0	88	0	42	107	12	0	161	482
Hourly Total	0	89	186	124	2	399	0	35	443	91	3	569	0	21	249	55	2	325	0	172	513	39	1	724	2017

**TMC 2421 - CSAH 14 @ CSAH 7  
Anoka MN  
Thursday, July 11, 2024**

Time	Southbound CSAH 7						Westbound CSAH 14						Northbound 7th Ave						Eastbound CSAH 14						VEHICLE TOTAL
	U Turns	Left Turns	Straight Through	Right Turns	Crosswalk Crossings	Vehicle Approach Total	U Turns	Left Turns	Straight Through	Right Turns	Crosswalk Crossings	Vehicle Approach Total	U Turns	Left Turns	Straight Through	Right Turns	Crosswalk Crossings	Vehicle Approach Total	U Turns	Left Turns	Straight Through	Right Turns	Crosswalk Crossings	Vehicle Approach Total	
4:00 PM	0	26	39	22	0	87	0	6	101	30	0	137	0	6	70	15	1	91	0	36	154	7	0	197	512
4:15 PM	0	32	45	21	0	98	0	8	117	18	0	143	0	13	75	11	0	99	0	44	133	9	0	186	526
4:30 PM	0	29	46	30	0	105	0	10	110	27	0	147	0	8	65	5	1	78	0	44	152	12	2	208	538
4:45 PM	0	19	42	37	0	98	0	6	104	15	0	125	0	8	54	10	0	72	0	40	137	5	1	182	477
Hourly Total	0	106	172	110	0	388	0	30	432	90	0	552	0	35	264	41	2	340	0	164	576	33	3	773	2053
5:00 PM	0	26	46	34	0	106	0	4	104	24	0	132	0	11	80	13	1	104	0	58	124	9	1	191	533
5:15 PM	0	29	33	30	2	92	0	10	120	16	0	146	0	5	50	12	0	67	0	38	131	9	0	178	483
5:30 PM	0	21	49	34	1	104	0	8	115	27	2	150	0	7	60	7	0	74	0	42	130	7	0	179	507
5:45 PM	0	27	46	33	0	106	0	12	121	15	1	148	0	4	42	13	0	59	0	47	133	8	2	188	501
Hourly Total	0	103	174	131	3	408	0	34	460	82	3	576	0	27	232	45	1	304	0	185	518	33	3	736	2024
6:00 PM	0	18	34	42	0	94	0	14	108	32	0	154	0	6	40	14	0	60	0	40	132	14	2	186	494
6:15 PM	0	20	54	33	0	107	0	7	91	15	0	113	0	6	35	8	0	49	0	32	139	10	2	181	450
6:30 PM	0	17	34	28	0	79	0	8	89	19	0	116	0	6	29	9	3	44	0	28	100	11	0	139	378
6:45 PM	0	14	43	24	0	81	0	8	97	12	0	117	0	11	29	15	0	55	0	19	101	10	6	130	383
Hourly Total	0	69	165	127	0	361	0	37	385	78	0	500	0	29	133	46	3	208	0	119	472	45	10	636	1705
7:00 PM	0	8	25	27	0	60	0	7	112	32	0	151	0	2	37	5	0	44	0	17	106	7	2	130	385
7:15 PM	0	11	25	24	0	60	0	2	86	16	2	104	0	9	28	5	0	42	0	30	95	8	0	133	339
7:30 PM	0	12	25	15	0	52	0	8	66	17	0	91	0	7	42	8	0	57	0	31	102	7	1	140	340
7:45 PM	0	5	29	20	0	54	0	14	66	7	0	87	0	6	30	9	2	45	0	16	94	6	0	116	302
Hourly Total	0	36	104	86	0	226	0	31	330	72	2	433	0	24	137	27	2	188	0	94	397	28	3	519	1366
8:00 PM	0	9	13	20	2	42	0	4	81	13	0	98	0	4	22	6	2	32	0	19	103	3	0	125	297
8:15 PM	0	12	27	18	0	57	0	4	61	11	0	76	0	2	29	6	0	37	0	20	81	5	0	106	276
8:30 PM	0	7	24	14	0	45	0	4	55	8	0	67	0	2	18	5	0	25	0	16	83	6	0	105	242
8:45 PM	0	6	15	14	0	35	0	6	65	4	1	75	0	3	22	4	2	29	0	23	87	6	0	116	255
Hourly Total	0	34	79	66	2	179	0	18	262	36	1	316	0	11	91	21	4	123	0	78	354	20	0	452	1070
9:00 PM	0	9	15	12	0	36	0	6	60	13	0	79	0	5	24	2	0	31	0	17	72	10	0	99	245
9:15 PM	0	4	17	18	2	39	0	5	44	9	1	58	0	4	18	1	2	23	0	14	59	8	1	81	201
9:30 PM	0	8	13	10	0	31	0	2	33	7	0	42	0	2	12	4	2	18	0	11	59	4	1	74	165
9:45 PM	0	1	15	12	0	28	0	0	27	11	0	38	0	3	7	1	0	11	0	12	39	0	0	51	128
Hourly Total	0	22	60	52	2	134	0	13	164	40	1	217	0	14	61	8	4	83	0	54	229	22	2	305	739
10:00 PM	0	5	14	6	0	25	0	1	27	6	0	34	0	3	16	4	0	23	0	21	49	3	0	73	155
10:15 PM	0	3	15	9	3	27	0	2	27	6	0	35	0	2	16	2	0	20	0	24	49	3	0	76	158
10:30 PM	0	4	8	4	0	16	0	4	28	2	0	34	0	0	12	3	0	15	0	16	60	7	0	83	148
10:45 PM	0	6	16	4	1	26	0	0	15	3	0	18	0	0	7	3	0	10	0	17	37	4	0	58	112
Hourly Total	0	18	53	23	4	94	0	7	97	17	0	121	0	5	51	12	0	68	0	78	195	17	0	290	573
11:00 PM	0	5	9	5	0	19	0	2	26	5	0	33	0	3	8	1	1	12	0	15	32	1	0	48	112
11:15 PM	0	1	8	6	0	15	0	0	17	1	0	18	0	2	6	2	2	10	0	8	20	4	2	32	75
11:30 PM	0	3	8	5	0	16	0	1	24	2	0	27	0	1	9	0	0	10	0	4	19	2	0	25	78
11:45 PM	0	3	6	3	0	12	0	0	5	1	0	6	0	0	4	0	0	4	0	4	19	3	0	26	48
Hourly Total	0	12	31	19	0	62	0	3	72	9	0	84	0	6	27	3	3	36	0	31	90	10	2	131	313
<b>DAILY TOTAL</b>	<b>1</b>	<b>1181</b>	<b>2555</b>	<b>1889</b>	<b>27</b>	<b>5626</b>	<b>0</b>	<b>483</b>	<b>6421</b>	<b>1203</b>	<b>42</b>	<b>8107</b>	<b>0</b>	<b>443</b>	<b>2644</b>	<b>514</b>	<b>33</b>	<b>3601</b>	<b>0</b>	<b>2217</b>	<b>7074</b>	<b>542</b>	<b>39</b>	<b>9833</b>	<b>27167</b>
<b>Cars</b>	<b>1</b>	<b>1127</b>	<b>2537</b>	<b>1873</b>	<b>22</b>	<b>5538</b>	<b>0</b>	<b>482</b>	<b>6302</b>	<b>1142</b>	<b>30</b>	<b>7926</b>	<b>0</b>	<b>439</b>	<b>2610</b>	<b>510</b>	<b>24</b>	<b>3559</b>	<b>0</b>	<b>2198</b>	<b>6964</b>	<b>539</b>	<b>32</b>	<b>9701</b>	<b>26724</b>
<b>Heavy Vehicles</b>	<b>0</b>	<b>54</b>	<b>18</b>	<b>16</b>	<b>5</b>	<b>88</b>	<b>0</b>	<b>1</b>	<b>119</b>	<b>61</b>	<b>12</b>	<b>181</b>	<b>0</b>	<b>4</b>	<b>34</b>	<b>4</b>	<b>9</b>	<b>42</b>	<b>0</b>	<b>19</b>	<b>110</b>	<b>3</b>	<b>7</b>	<b>132</b>	<b>443</b>
<b>Heavy Vehicle %</b>	<b>0.00%</b>	<b>4.57%</b>	<b>0.70%</b>	<b>0.85%</b>	<b>18.52%</b>	<b>1.56%</b>	<b>0.00%</b>	<b>0.21%</b>	<b>1.85%</b>	<b>5.07%</b>	<b>28.57%</b>	<b>2.23%</b>	<b>0.00%</b>	<b>0.90%</b>	<b>1.29%</b>	<b>0.78%</b>	<b>27.27%</b>	<b>1.17%</b>	<b>0.00%</b>	<b>0.86%</b>	<b>1.55%</b>	<b>0.55%</b>	<b>17.95%</b>	<b>1.34%</b>	<b>1.63%</b>

**TMC 2421 - CSAH 14 @ CSAH 7**  
**Anoka MN**  
**Thursday, July 11, 2024**  
**AM Peak Hour**

Time	Southbound						Westbound						Northbound						Eastbound						VEHICLE TOTAL
	U Turns	Left Turns	Straight Through	Right Turns	Crosswalk Crossings	Vehicle Approach Total	U Turns	Left Turns	Straight Through	Right Turns	Crosswalk Crossings	Vehicle Approach Total	U Turns	Left Turns	Straight Through	Right Turns	Crosswalk Crossings	Vehicle Approach Total	U Turns	Left Turns	Straight Through	Right Turns	Crosswalk Crossings	Vehicle Approach Total	
11:00 AM	0	16	41	31	1	88	0	13	101	15	1	129	0	8	43	6	0	57	0	36	120	7	2	163	437
11:15 AM	0	17	33	30	0	80	0	10	121	17	1	148	0	5	32	8	0	45	0	37	126	7	0	170	443
11:30 AM	0	27	41	27	0	95	0	7	110	11	1	128	0	4	39	10	1	53	0	40	119	9	0	168	444
11:45 AM	0	28	42	35	0	105	0	8	110	16	0	134	0	10	28	3	0	41	0	46	138	7	0	191	471
Peak Hour Total	0	88	157	123	1	368	0	38	442	59	3	539	0	27	142	27	1	196	0	159	503	30	2	692	1795
PHF	0.000	0.786	0.935	0.879	0.250	0.876	0.000	0.731	0.913	0.868	0.750	0.910	0.000	0.675	0.826	0.675	0.250	0.860	0.000	0.864	0.911	0.833	0.250	0.906	0.953

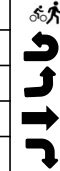
**PM Peak Hour**

Time	Southbound						Westbound						Northbound						Eastbound						VEHICLE TOTAL
	U Turns	Left Turns	Straight Through	Right Turns	Crosswalk Crossings	Vehicle Approach Total	U Turns	Left Turns	Straight Through	Right Turns	Crosswalk Crossings	Vehicle Approach Total	U Turns	Left Turns	Straight Through	Right Turns	Crosswalk Crossings	Vehicle Approach Total	U Turns	Left Turns	Straight Through	Right Turns	Crosswalk Crossings	Vehicle Approach Total	
4:15 PM	0	32	45	21	0	98	0	8	117	18	0	143	0	13	75	11	0	99	0	44	133	9	0	186	526
4:30 PM	0	29	46	30	0	105	0	10	110	27	0	147	0	8	65	5	1	78	0	44	152	12	2	208	538
4:45 PM	0	19	42	37	0	98	0	6	104	15	0	125	0	8	54	10	0	72	0	40	137	5	1	182	477
5:00 PM	0	26	46	34	0	106	0	4	104	24	0	132	0	11	80	13	1	104	0	58	124	9	1	191	533
Peak Hour Total	0	106	179	122	0	407	0	28	435	84	0	547	0	40	274	39	2	353	0	186	546	35	4	767	2074
PHF	0.000	0.828	0.973	0.824	0.000	0.960	0.000	0.700	0.929	0.778	0.000	0.930	0.000	0.769	0.856	0.750	0.500	0.849	0.000	0.802	0.898	0.729	0.500	0.922	0.964

Total Vehicles On Leg				11691			
Vehicles Entering Intersection		5626		Vehicles Exiting Intersection		6065	
<b>Southbound</b>							
Cars	1873	2537	1127	1	22		
Heavy	16	18	54	0	5		
<b>Total</b>	<b>1889</b>	<b>2555</b>	<b>1181</b>	<b>1</b>	<b>27</b>		

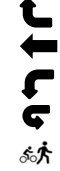


Total Vehicles on Leg 18586	Eastbound	Vehicles Entering Intersection	9833
		Cars	32
		Heavy	7
		<b>Total</b>	<b>39</b>
		Vehicles Exiting Intersection	8753
Cars	0		
Heavy	0		
<b>Total</b>	<b>0</b>		
Cars	2198		
Heavy	19		
<b>Total</b>	<b>2217</b>		
Cars	6964		
Heavy	110		
<b>Total</b>	<b>7074</b>		
Cars	539		
Heavy	3		
<b>Total</b>	<b>542</b>		

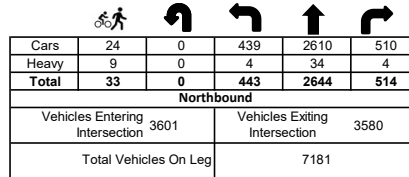


Daily Volumes

Cars	1142	61	<b>1203</b>
Heavy	6302	119	<b>6421</b>
<b>Total</b>	<b>482</b>	<b>1</b>	<b>483</b>
Cars	0	0	<b>0</b>
Heavy	30	12	<b>42</b>



Cars	24	0	439	2610	510
Heavy	9	0	4	34	4
<b>Total</b>	<b>33</b>	<b>0</b>	<b>443</b>	<b>2644</b>	<b>514</b>
<b>Northbound</b>					
Vehicles Entering Intersection			3601		
Vehicles Exiting Intersection			3580		
Total Vehicles On Leg			7181		







# ANOKA COUNTY HIGHWAY

## PC - WARRANTS

### TRAFFIC SIGNAL WARRANT ANALYSIS

Study Name: TMC 2421

Study Date : 07/16/2024

## Signal Warrants - Summary

### Major Street Approaches

**Eastbound: CSAH 14**

Number of Lanes : 2+

Total Approach Volume: 9,833

**Westbound: CSAH 14**

Number of Lanes :2+

Total Approach Volume: 8,107

### Minor Street Approaches

**Northbound: 7th Ave**

Number of Lanes :2+

Total Approach Volume: 3,601

**Southbound: CSAH 7**

Number of Lanes :2+

Total Approach Volume: 3,737

### Warrant Summary (Urban Values Apply)

**Warrant 1 - Eight Hour Vehicular Volumes.....Satisfied**

**Warrant 1A - Minimum Vehicular Volume.....Satisfied**

Required volumes reached for 13 hours, 8 are needed

**Warrant 1B - Interruption of Continuous Traffic.....Satisfied**

Required volumes reached for 11 hours, 8 are needed

**Warrant 1C - Combination of Warrants.....Satisfied**

Required 1A volumes reached for 14 hours, 8 are needed

Required 1B volumes reached for 14 hours, 8 are needed

**Warrant 2 - Four Hour Volumes.....Satisfied**

Number of hours (10) volumes exceed minimum >= minimum required (4).

**Warrant 3 - Peak Hour.....Satisfied**

**Warrant 3A - Peak Hour Delay.....Satisfied**

Number of one hour periods (56) volumes exceed minimum >= required (1). Delay data not evaluated.

**Warrant 3B - Peak Hour Volumes.....Satisfied**

Volumes exceed minimums for at least one hour period.

**Warrant 4 - Pedestrian Volumes.....Not Evaluated**

**Warrant 5 - School Crossing.....Not Evaluated**

**Warrant 6 - Coordinated Signal System.....Not Evaluated**

**Warrant 7 - Crash Experience.....Not Evaluated**

**Warrant 8 - Roadway Network.....Not Evaluated**

**Warrant 9 - Intersection Near a Grade Crossing.....Not Evaluated**

# ANOKA COUNTY HIGHWAY

## PC - WARRANTS

### TRAFFIC SIGNAL WARRANT ANALYSIS

Study Name: TMC 2421

Study Date : 07/16/2024

## Warrant 1A - Minimum Volumes

#### Description

Intended for sites where the volume of intersecting traffic is the principal reason for consideration of a signal installation.

#### Summary

13 one hour periods meet minimums.  
Warrant IS met.

#### Site Data Required

Rural Settings Apply = **False**  
 Number of Major Lanes = **2 or more**  
 Number of Minor Lanes = **2 or more**

#### Volume Requirements

Veh/Hr Major = **600**

Veh/Hr Minor = **200**

Time	Major Road				Total	Minor Road		Met?
	Major EB	+	Major WB	=		Minor NB	Minor SB	
12:15 - 13:15	758	+	621	=	1379	216	250	Yes
17:15 - 18:15	731	+	598	=	1329	260	257	Yes
16:15 - 17:15	767	+	547	=	1314	353	285	Yes
11:15 - 12:15	734	+	562	=	1296	197	250	Yes
15:15 - 16:15	723	+	570	=	1293	339	270	Yes
14:15 - 15:15	750	+	525	=	1275	253	255	Yes
13:15 - 14:15	670	+	548	=	1218	240	192	Yes
10:15 - 11:15	589	+	533	=	1122	224	246	Yes
18:15 - 19:15	580	+	497	=	1077	192	215	Yes
09:15 - 10:15	505	+	456	=	961	196	259	Yes
08:15 - 09:15	424	+	408	=	832	193	218	Yes
07:00 - 08:00	374	+	456	=	830	192	215	Yes
06:00 - 07:00	263	+	347	=	610	126	222	Yes
19:15 - 20:15	514	+	380	=	894	176	129	No
19:30 - 20:30	487	+	352	=	839	171	132	No
08:00 - 09:00	404	+	405	=	809	182	198	No
19:45 - 20:45	452	+	328	=	780	139	126	No
20:00 - 21:00	452	+	316	=	768	123	113	No
20:15 - 21:15	426	+	297	=	723	122	115	No
20:30 - 21:30	401	+	279	=	680	108	97	No
20:45 - 21:45	370	+	254	=	624	101	87	No
21:00 - 22:00	305	+	217	=	522	83	82	No
05:45 - 06:45	221	+	287	=	508	108	184	No
21:15 - 22:15	279	+	172	=	451	75	77	No
21:45 - 22:45	283		141		424	69	65	No

# ANOKA COUNTY HIGHWAY

## PC - WARRANTS

### TRAFFIC SIGNAL WARRANT ANALYSIS

Study Name: TMC 2421

Study Date : 07/16/2024

## Warrant 1B - Interruption of Continuous Traffic

#### Description

Intended for sites where the volume of the major street is so heavy that traffic on the minor street suffers excessive delay or hazard.

#### Summary

11 one hour periods meet minimums.  
Warrant IS met.

#### Site Data Required

Rural Settings Apply = **False**  
 Number of Major Lanes = **2 or more**  
 Number of Minor Lanes = **2 or more**

#### Volume Requirements

Veh/Hr Major = **900**

Veh/Hr Minor = **100**

Time	Major Road				Total	Minor Road		Met?
	Major EB	+	Major WB	=		Minor NB	Minor SB	
11:45 - 12:45	770	+	611	=	1381	219	251	Yes
15:45 - 16:45	752	+	575	=	1327	356	279	Yes
12:45 - 13:45	718	+	568	=	1286	216	231	Yes
16:45 - 17:45	730	+	553	=	1283	317	265	Yes
14:45 - 15:45	735	+	540	=	1275	300	282	Yes
13:45 - 14:45	716	+	546	=	1262	233	208	Yes
17:45 - 18:45	694	+	531	=	1225	212	250	Yes
10:45 - 11:45	636	+	545	=	1181	217	241	Yes
09:45 - 10:45	554	+	491	=	1045	192	269	Yes
18:45 - 19:45	533	+	463	=	996	198	163	Yes
08:45 - 09:45	479	+	446	=	925	210	223	Yes
08:30 - 09:30	466	+	406	=	872	215	218	No
07:30 - 08:30	413	+	450	=	863	196	199	No
07:15 - 08:15	418	+	438	=	856	199	202	No
07:45 - 08:45	412	+	441	=	853	186	197	No
08:15 - 09:15	424	+	408	=	832	193	218	No
07:00 - 08:00	374	+	456	=	830	192	215	No
08:00 - 09:00	404	+	405	=	809	182	198	No
19:45 - 20:45	452	+	328	=	780	139	126	No
20:00 - 21:00	452	+	316	=	768	123	113	No
06:45 - 07:45	341	+	410	=	751	177	235	No
20:15 - 21:15	426	+	297	=	723	122	115	No
06:30 - 07:30	298	+	406	=	704	153	242	No
06:15 - 07:15	288	+	400	=	688	135	245	No
20:30 - 21:30	401		279		680	108	97	No

# ANOKA COUNTY HIGHWAY

## PC - WARRANTS

### TRAFFIC SIGNAL WARRANT ANALYSIS

Study Name: TMC 2421

Study Date : 07/16/2024

## Warrant 1C Combination of Warrants

#### Description

Intended for sites where the traffic volumes don't meet individual warrants but where Warrants 1A and 1B are both met to 80% of their stated values.

#### Summary

14 hours meet 1A minimums.  
14 hours meet 1B minimums.  
Warrant IS met.

#### Site Data Required

Rural Settings Apply = **False**  
Number of Major Lanes = **2 or more**  
Number of Minor Lanes = **2 or more**

#### Volume Requirements

Warrant 1A 1B  
Veh/Hr Major = **480 720**  
  
Veh/Hr Minor = **160 80**

#### Major Road CSAH 14

#### Minor Road 7th Ave

Time	Major EB	+	Major WB	=	Total	Minor NB	Minor SB	Met1A?
11:45 - 12:45	770	+	611	=	1381	219	251	Yes
15:45 - 16:45	752	+	575	=	1327	356	279	Yes
12:45 - 13:45	718	+	568	=	1286	216	231	Yes
16:45 - 17:45	730	+	553	=	1283	317	265	Yes
14:45 - 15:45	735	+	540	=	1275	300	282	Yes
13:45 - 14:45	716	+	546	=	1262	233	208	Yes
17:45 - 18:45	694	+	531	=	1225	212	250	Yes
10:45 - 11:45	636	+	545	=	1181	217	241	Yes
09:45 - 10:45	554	+	491	=	1045	192	269	Yes
18:45 - 19:45	533	+	463	=	996	198	163	Yes
08:45 - 09:45	479	+	446	=	925	210	223	Yes
07:45 - 08:45	412		441		853	186	197	Yes

Time	Major EB	+	Major WB	=	Total	Minor NB	Minor SB	Met1B?
11:45 - 12:45	770	+	611	=	1381	219	251	Yes
15:45 - 16:45	752	+	575	=	1327	356	279	Yes
12:45 - 13:45	718	+	568	=	1286	216	231	Yes
16:45 - 17:45	730	+	553	=	1283	317	265	Yes
14:45 - 15:45	735	+	540	=	1275	300	282	Yes
13:45 - 14:45	716	+	546	=	1262	233	208	Yes
17:45 - 18:45	694	+	531	=	1225	212	250	Yes
10:45 - 11:45	636	+	545	=	1181	217	241	Yes
09:45 - 10:45	554	+	491	=	1045	192	269	Yes
18:45 - 19:45	533	+	463	=	996	198	163	Yes
08:45 - 09:45	479	+	446	=	925	210	223	Yes
07:45 - 08:45	412		441		853	186	197	Yes

# ANOKA COUNTY HIGHWAY

## PC - WARRANTS

### TRAFFIC SIGNAL WARRANT ANALYSIS

Study Name: TMC 2421

Study Date : 07/16/2024

## Warrant 2 - Four Hour Volumes

#### Description

Intended for sites where the volume of intersecting traffic during any four hours of the day is the principal reason for consideration of a signal installation.

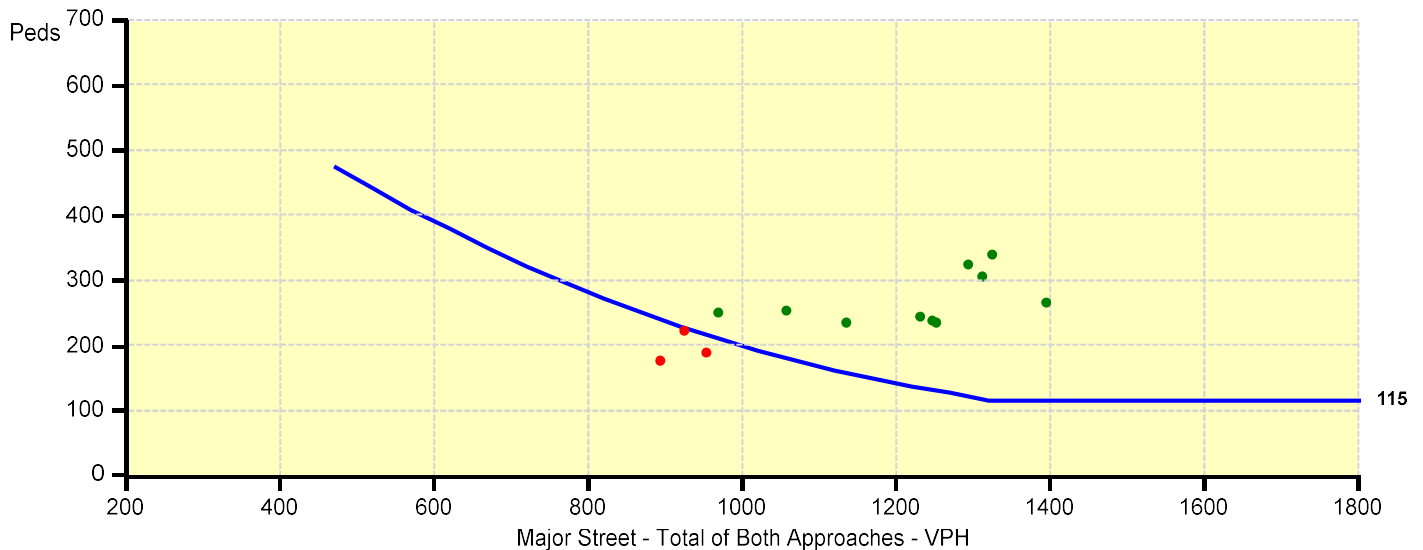
#### Summary

10 one hour periods meet minimums.  
Warrant IS met.

#### Site Data Required

Rural Settings Apply = **False**  
 Number of Major Lanes = **2 or more**  
 Number of Minor Lanes = **2 or more**

Time	Major Road CSAH 14				Total	Minor Road 7th Ave		Met?
	Major EB	+	Major WB	=		Minor NB	Minor SB	
12:00 - 13:00	759	+	637	=	1396	218	265	Yes
16:00 - 17:00	773	+	552	=	1325	340	278	Yes
17:00 - 18:00	736	+	576	=	1312	304	277	Yes
15:00 - 16:00	724	+	569	=	1293	325	275	Yes
13:00 - 14:00	709	+	544	=	1253	235	198	Yes
14:00 - 15:00	717	+	529	=	1246	237	226	Yes
11:00 - 12:00	692	+	539	=	1231	196	245	Yes
18:00 - 19:00	636	+	500	=	1136	208	234	Yes
10:00 - 11:00	543	+	515	=	1058	215	253	Yes
09:00 - 10:00	516	+	452	=	968	199	251	Yes
19:00 - 20:00	519	+	433	=	952	188	140	No
08:45 - 09:45	479	+	446	=	925	210	223	No



# ANOKA COUNTY HIGHWAY

## PC - WARRANTS

### TRAFFIC SIGNAL WARRANT ANALYSIS

Study Name: TMC 2421

Study Date : 07/16/2024

## Warrant 3B - Peak Hour Volumes

#### Description

Intended for sites where the volume of intersecting traffic during one hour of the day is the principal reason for consideration of a signal installation.

#### Summary

16 one hour periods meet minimums.  
Warrant IS met.

#### Site Data Required

Rural Settings Apply = **False**  
 Number of Major Lanes = **2 or more**  
 Number of Minor Lanes = **2 or more**

Time	Major Road CSAH 14				Total	Minor Road 7th Ave		Met?
	Major EB	+	Major WB	=		Minor NB	Minor SB	
12:00 - 13:00	759	+	637	=	1396	218	265	Yes
11:45 - 12:45	770	+	611	=	1381	219	251	Yes
12:15 - 13:15	758	+	621	=	1379	216	250	Yes
17:15 - 18:15	731	+	598	=	1329	260	257	Yes
15:45 - 16:45	752	+	575	=	1327	356	279	Yes
11:30 - 12:30	737	+	589	=	1326	223	267	Yes
16:00 - 17:00	773	+	552	=	1325	340	278	Yes
16:15 - 17:15	767	+	547	=	1314	353	285	Yes
17:00 - 18:00	736	+	576	=	1312	304	277	Yes
16:30 - 17:30	759	+	550	=	1309	321	270	Yes
17:30 - 18:30	734	+	565	=	1299	242	269	Yes
15:00 - 16:00	724	+	569	=	1293	325	275	Yes

