



AUTOMATIC TRAFFIC RECORDERS

2006 - 2016

Prepared by

OFFICE OF SYSTEMS PLANNING

In Cooperation With

**UNITED STATES DEPARTMENT OF TRANSPORTATION
FEDERAL HIGHWAY ADMINISTRATION**

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INTRODUCTION

This report contains graphic comparisons of daily and monthly traffic collected on Iowa's highway system at 167 Permanent Continuous Automatic Traffic Recorder locations. Twenty (20) stations are located on the Rural Interstate system, seven (7) are on the Municipal Interstate system, seventy-eight (78) are on the Rural Primary system, twenty-three (23) are on the Municipal Primary system, twenty-six (26) are on the Rural Secondary system and thirteen (13) are on the Municipal Street system. The map on page 26 shows the general location of count sites. Specific descriptions of locations, along with an eleven year summary of AADT's for each station, start on page 19. Sites without an AADT for 2016 were not used not in the calculations or graphs.

The report compares travel trends from 1980 to present. Traffic is shown for rural, municipal and statewide travel.

Factors for estimating Design Hour Volumes from Annual Average Daily Traffic are shown by highway system. The values are developed from the straight-line relationships between Design Hour Volume and Annual Average Daily Traffic for the period of 2007 - 2016.

Information from the permanent traffic recorders indicates a 2.2% increase in statewide travel from 2015 to 2016. The estimated vehicle miles of travel for 2016 is 33.84 billion. Final 2016 traffic figures will be published near June 2017, when all traffic data collected during 2016 has been processed.

More travel occurs on Friday than any other day of the week on all road systems. Sunday is the lowest travel day on all systems except Rural Interstate. This is typical of other years.

TRAFFIC VOLUME VARIATIONS

ON

IOWA ROAD SYSTEMS

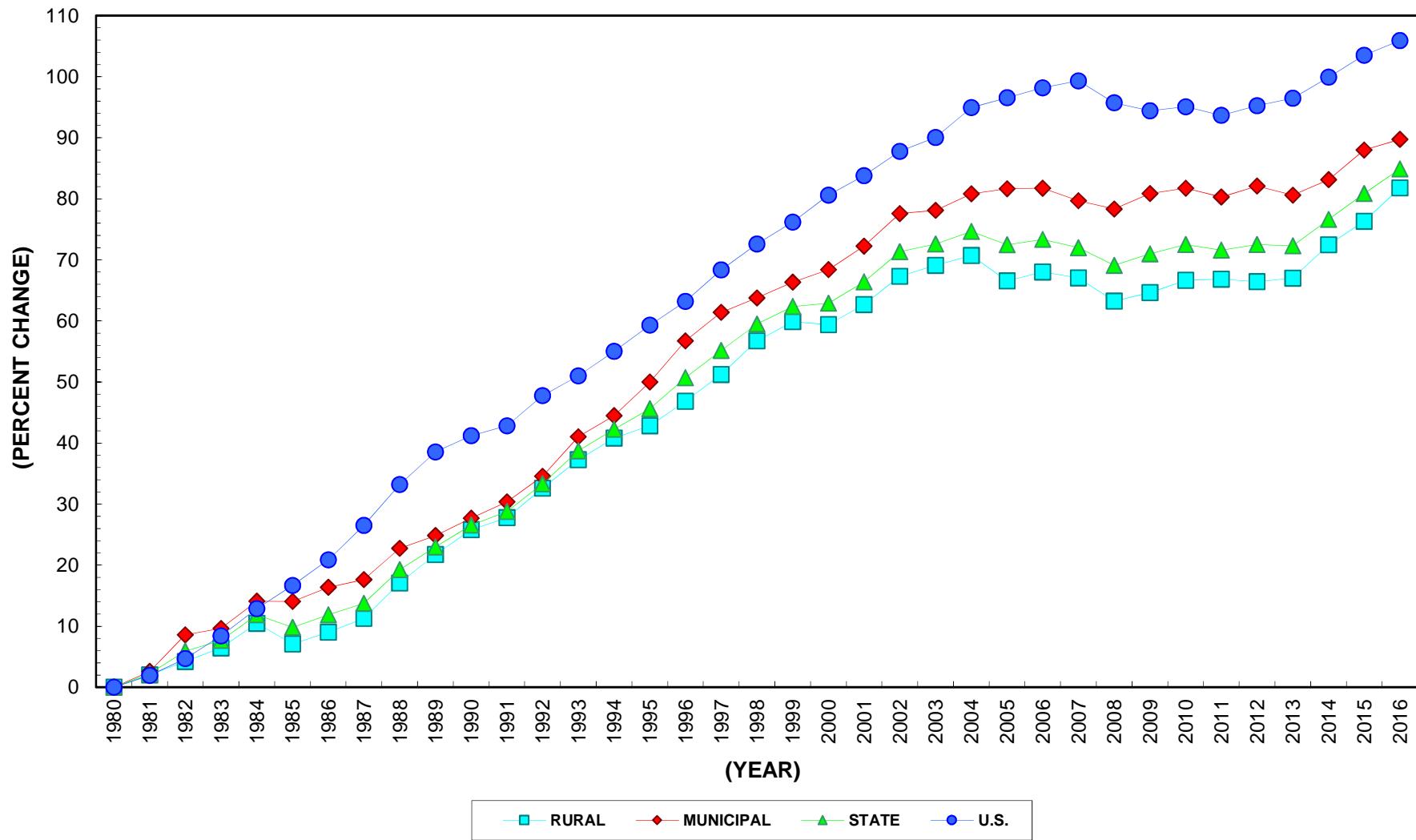
2016 COMPARED TO 2015

RURAL INTERSTATE	+ 3.6 %
RURAL PRIMARY	+ 3.0 %
RURAL SECONDARY	+ 2.7 %
RURAL TOTAL	+ 3.1 %
MUNICIPAL INTERSTATE	+ 2.2 %
MUNICIPAL PRIMARY	+ 1.8 %
MUNICIPAL STREETS	NO CHANGE
MUNICIPAL TOTAL	+ 0.9 %
STATE TOTAL	+ 2.2 %

Data collected at continuous automatic traffic recorder locations (see pages 19 – 25) were utilized to compute the above percentages. The rural, municipal and state totals were weighted based on estimated vehicle miles of travel.

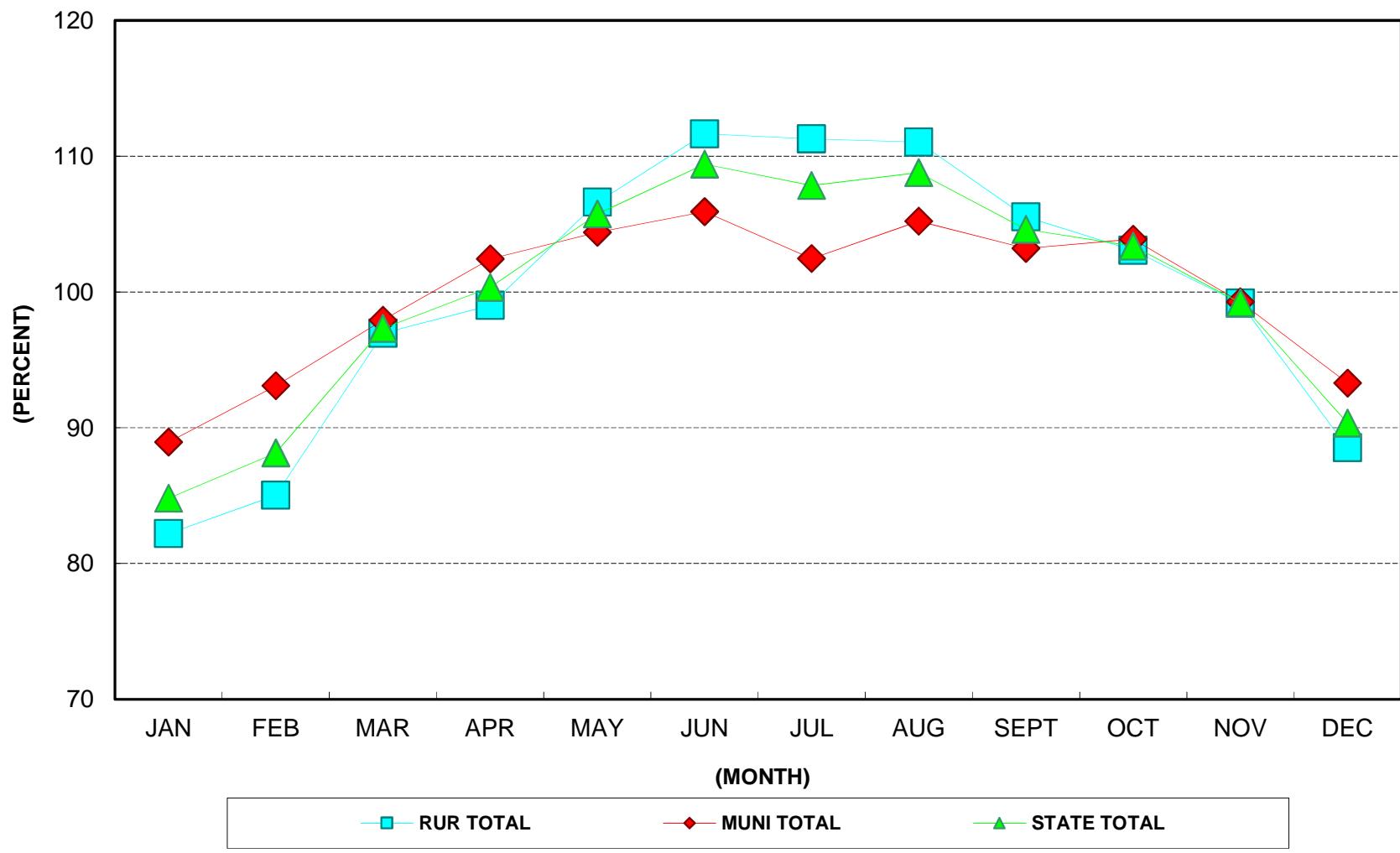
PERCENT CHANGE IN TRAFFIC

BASE YEAR 1980



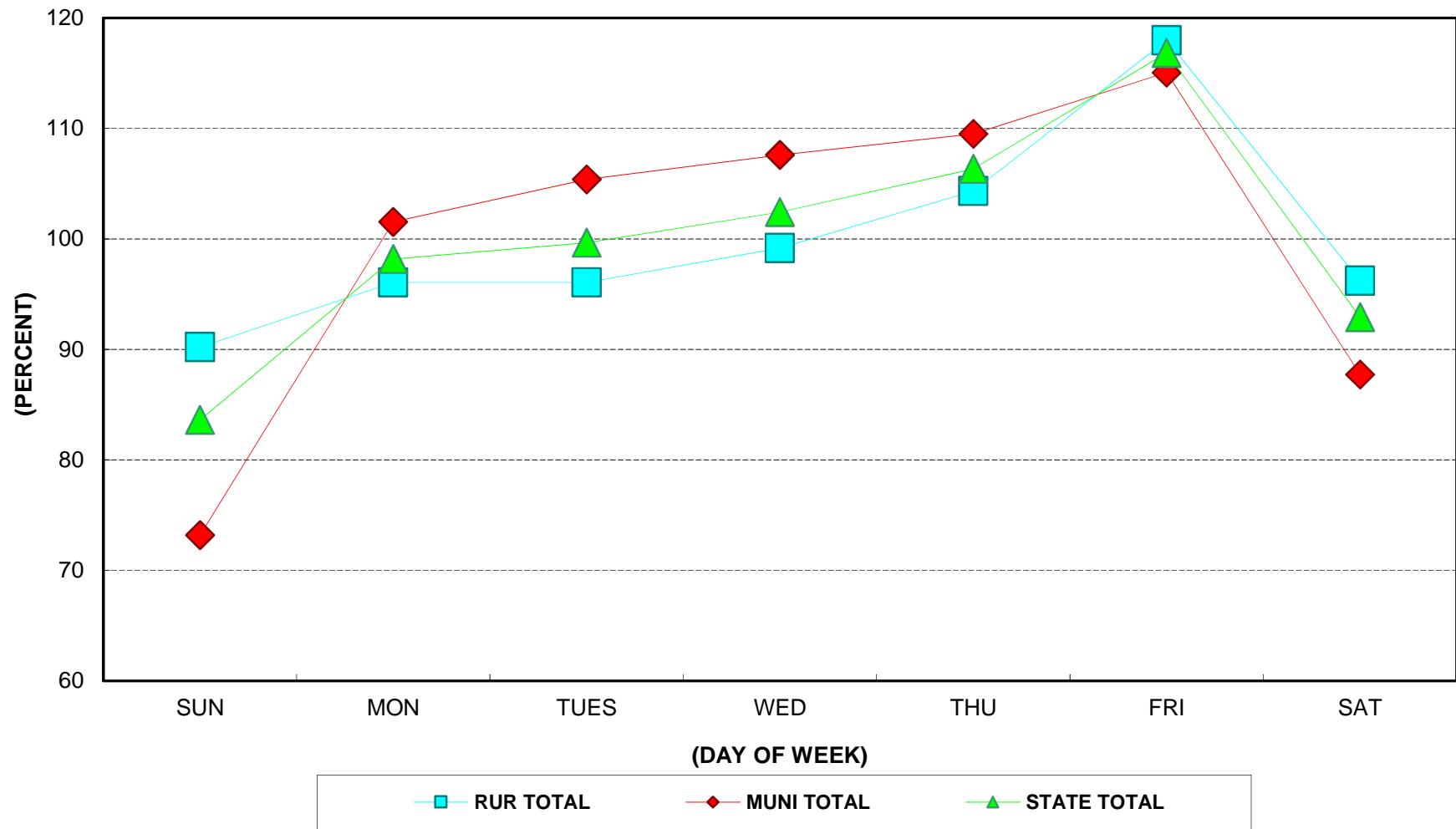
2016 MONTHLY TRAFFIC

AS A % OF ANNUAL AVERAGE DAILY TRAFFIC



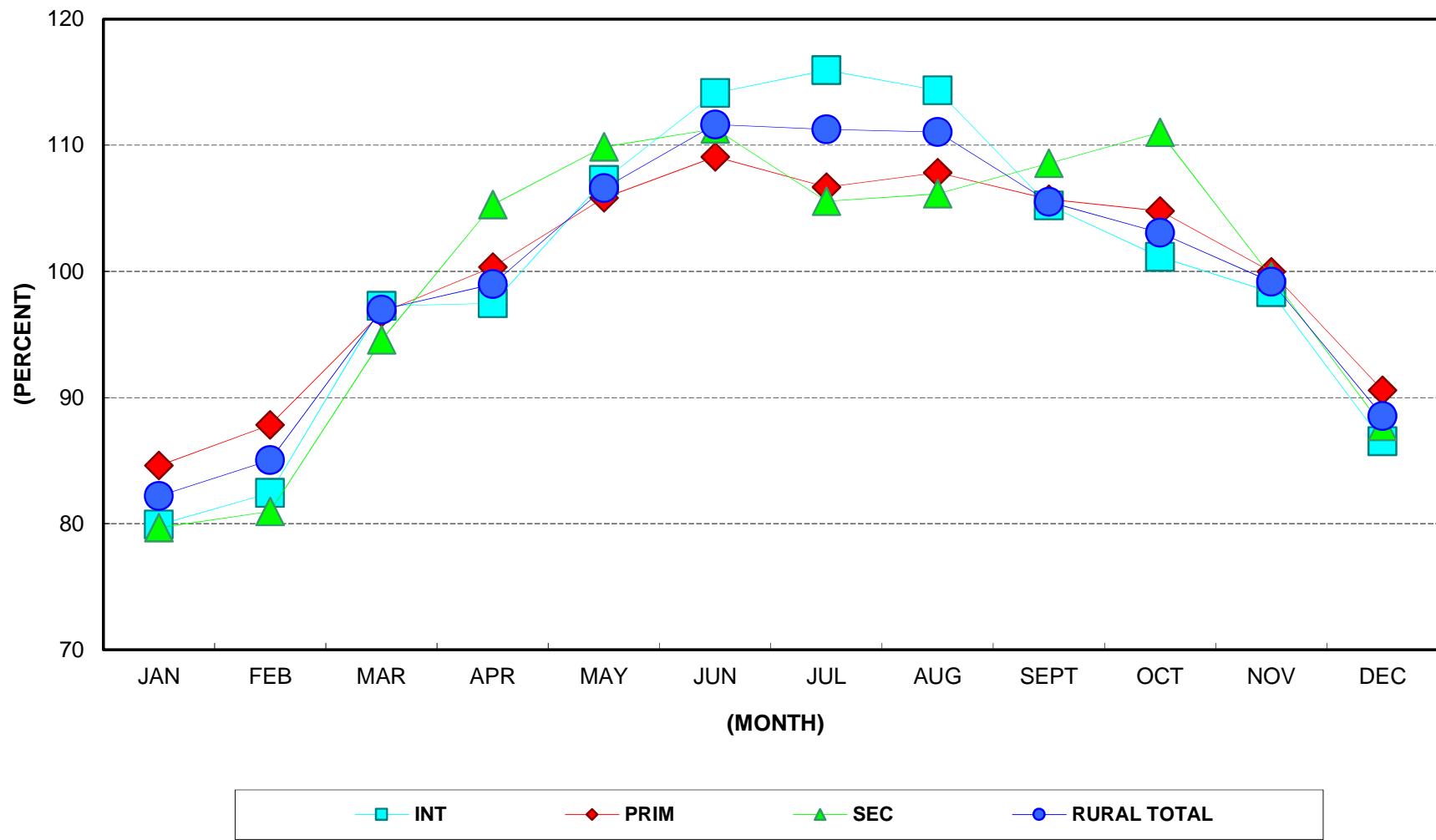
2016 DAY OF WEEK TRAFFIC

AS A % OF ANNUAL AVERAGE DAILY TRAFFIC



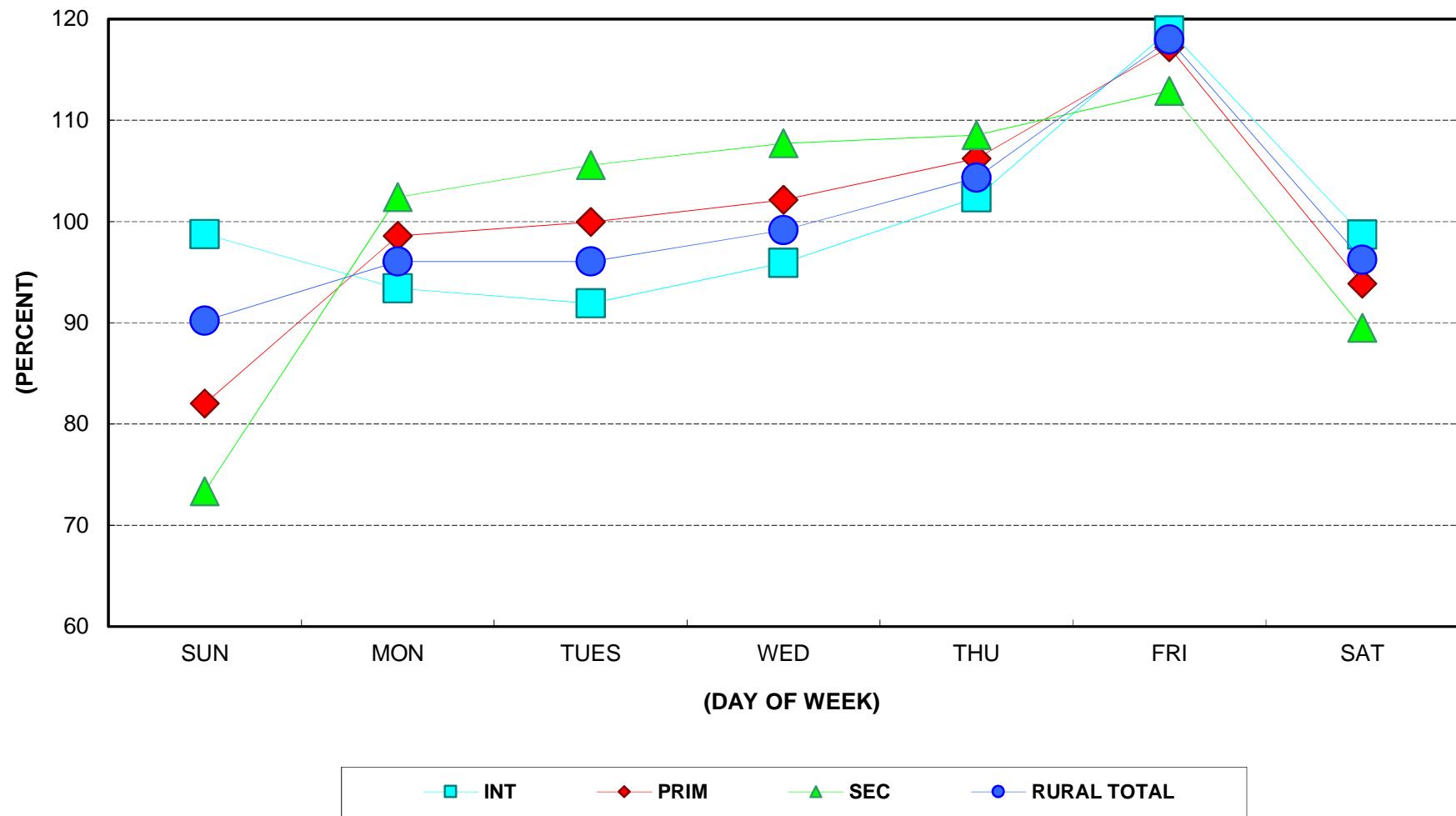
2016 RURAL MONTHLY TRAFFIC

AS A % OF ANNUAL AVERAGE DAILY TRAFFIC



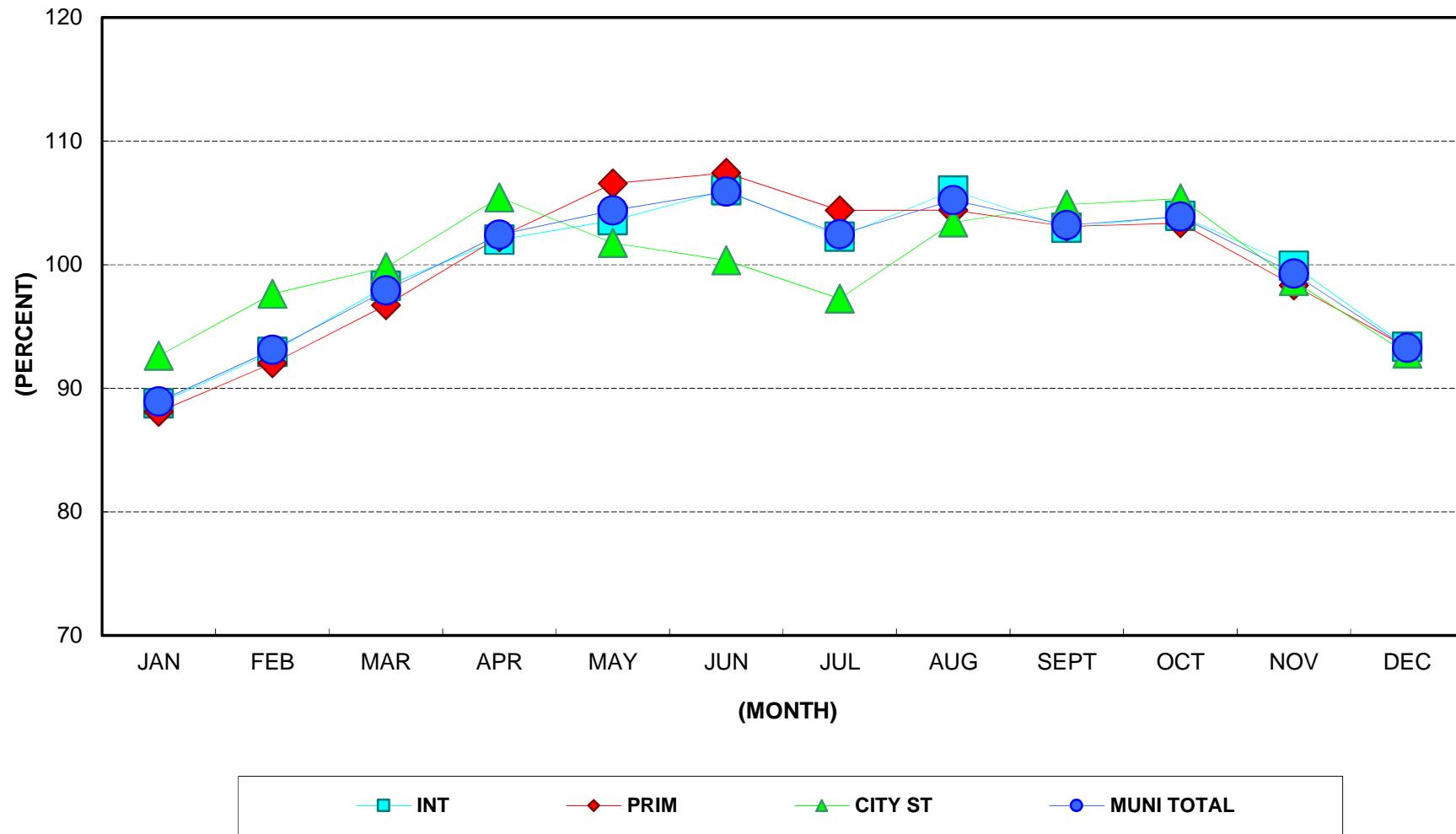
2016 RURAL DAY OF WEEK TRAFFIC

AS A % OF ANNUAL AVERAGE DAILY TRAFFIC



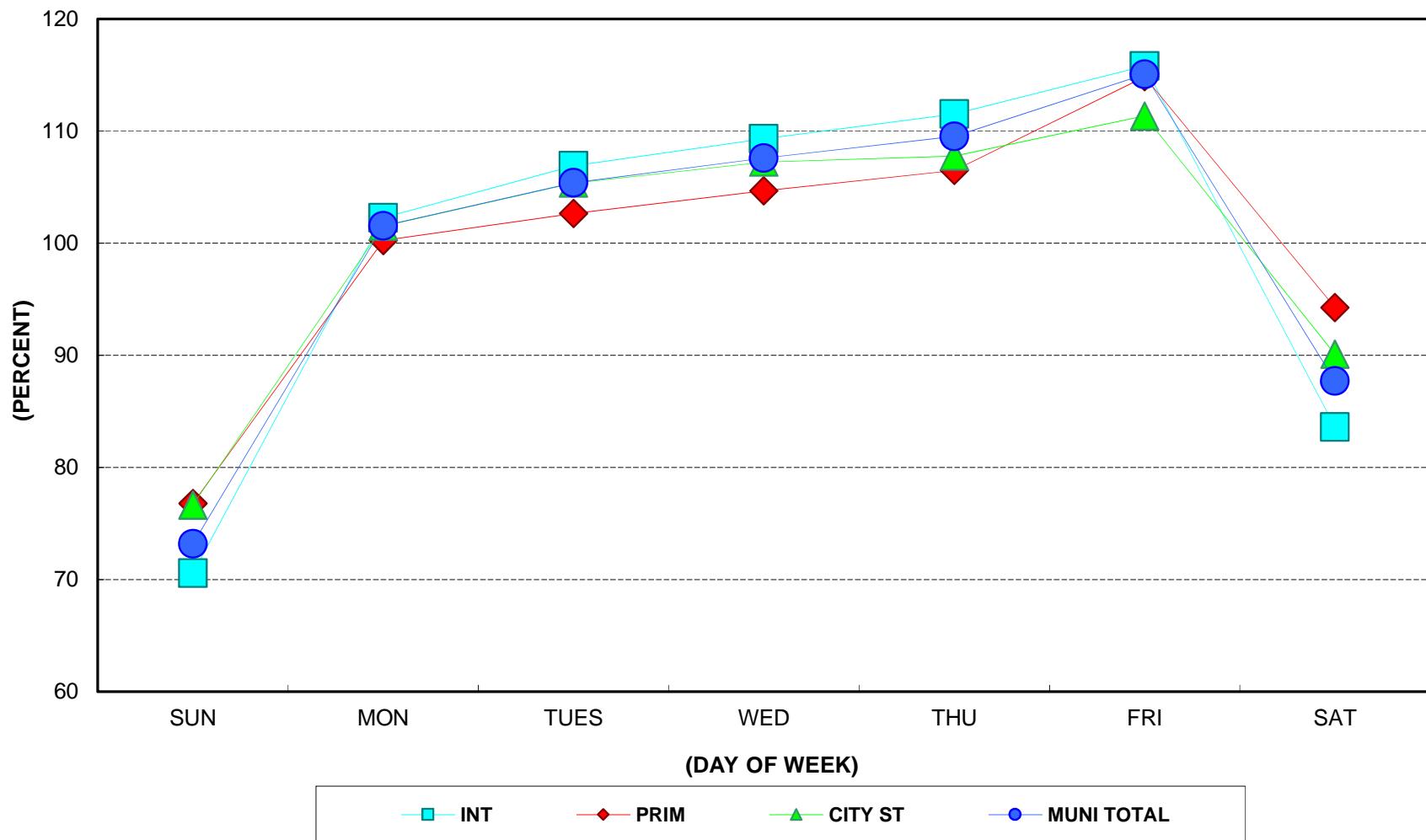
2016 MUNICIPAL MONTHLY TRAFFIC

AS A % OF ANNUAL AVERAGE DAILY TRAFFIC

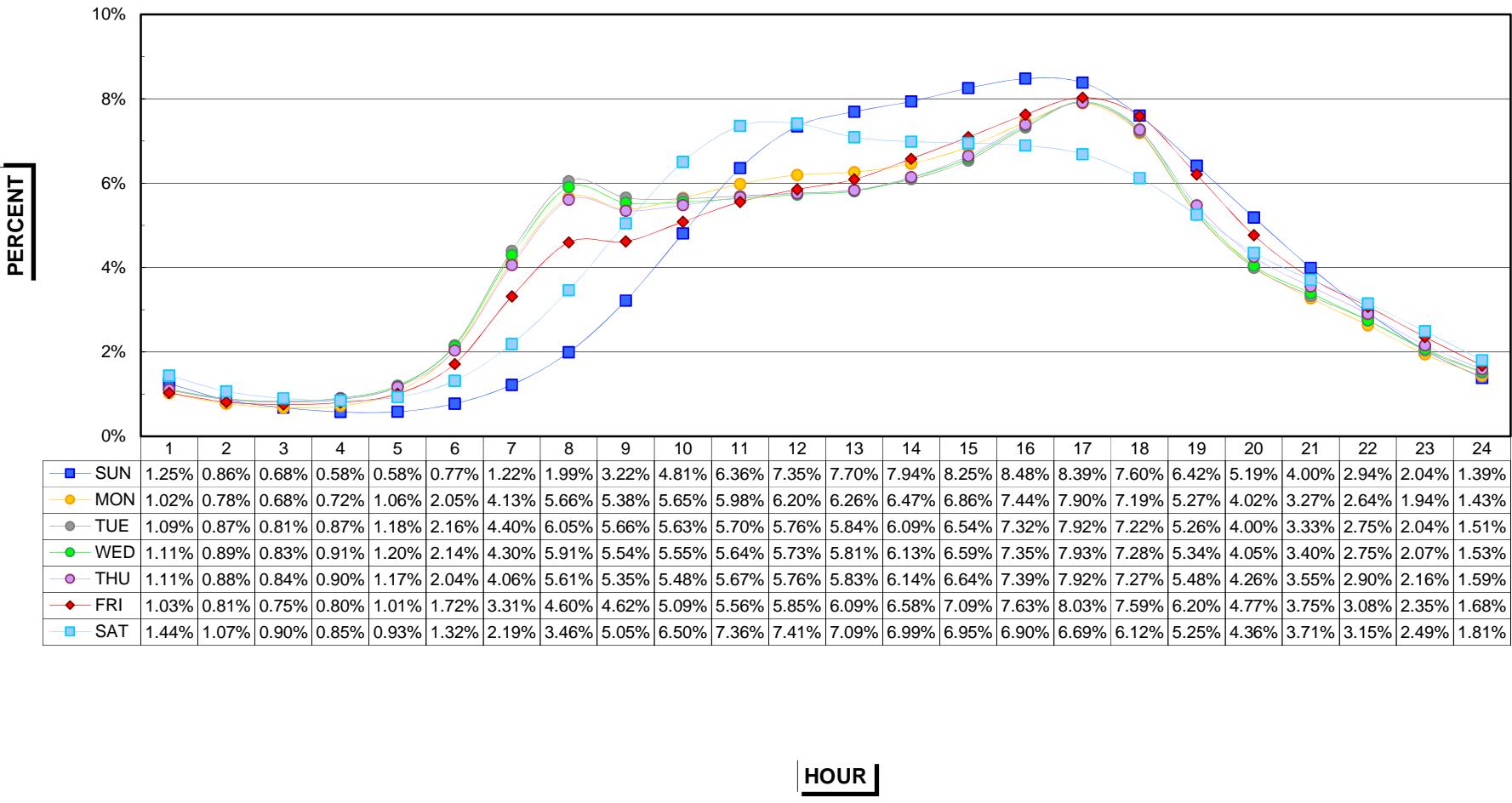


2016 MUNICIPAL DAY OF WEEK TRAFFIC

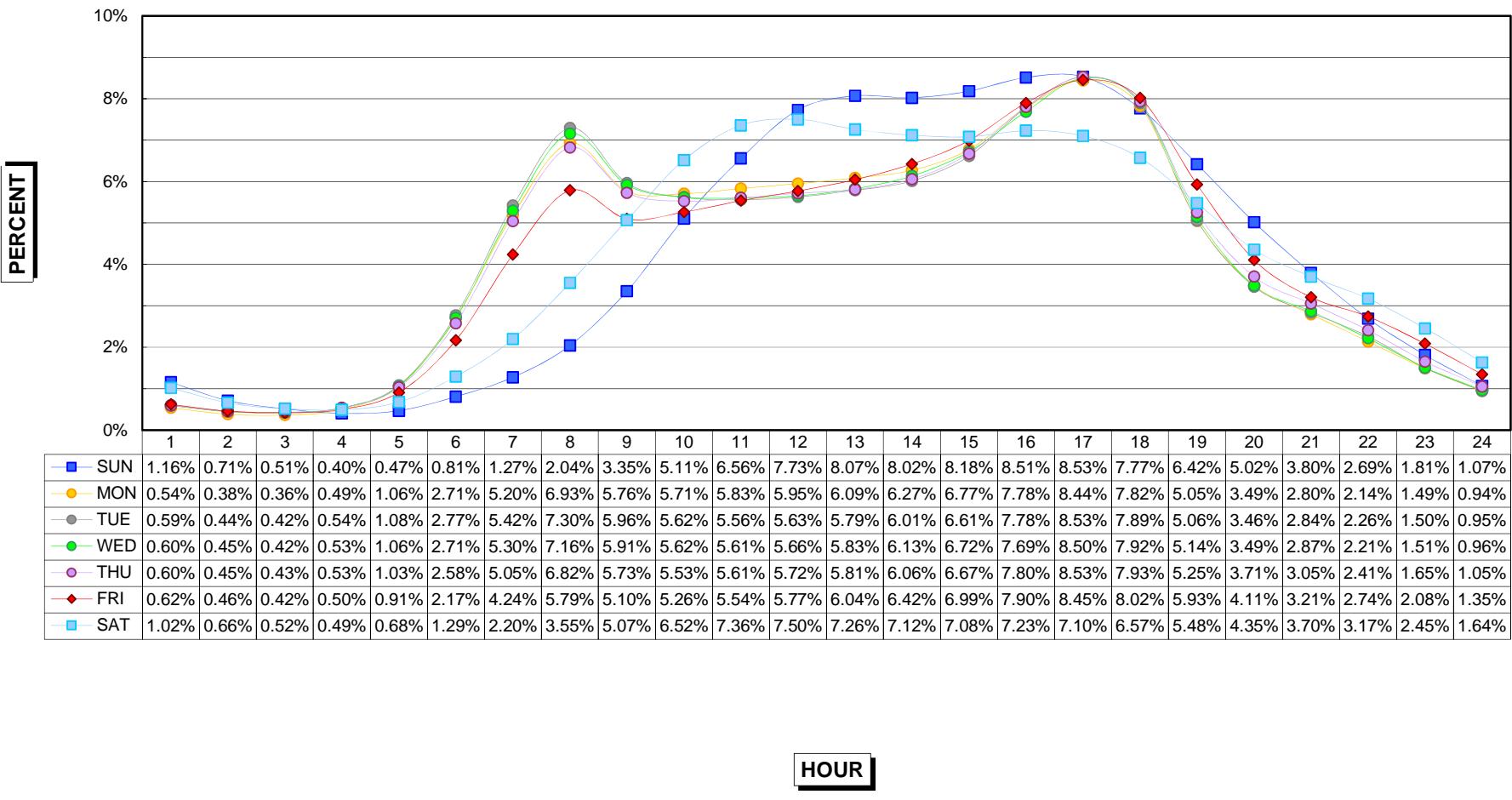
AS A % OF ANNUAL AVERAGE DAILY TRAFFIC



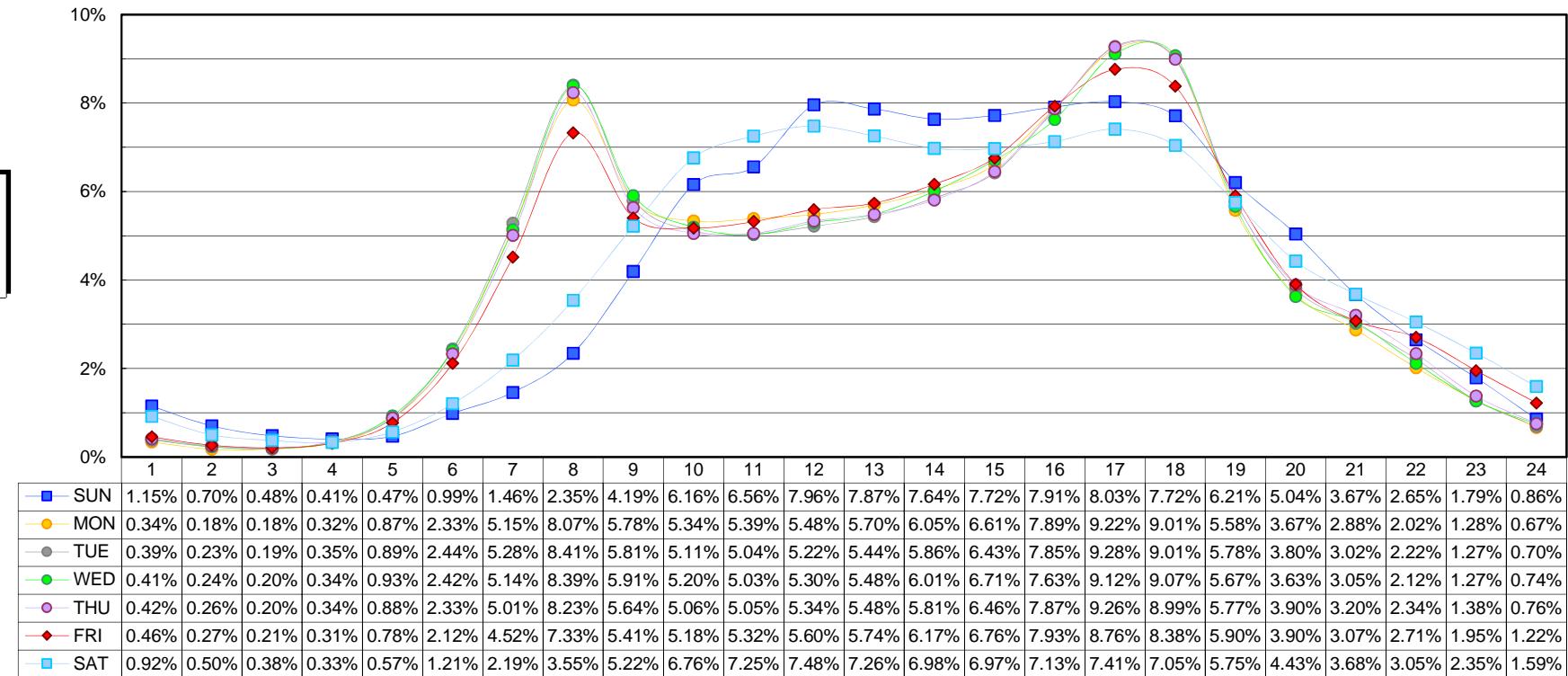
HOURLY DISTRIBUTION OF DAILY TRAFFIC 2016 RURAL INTERSTATE



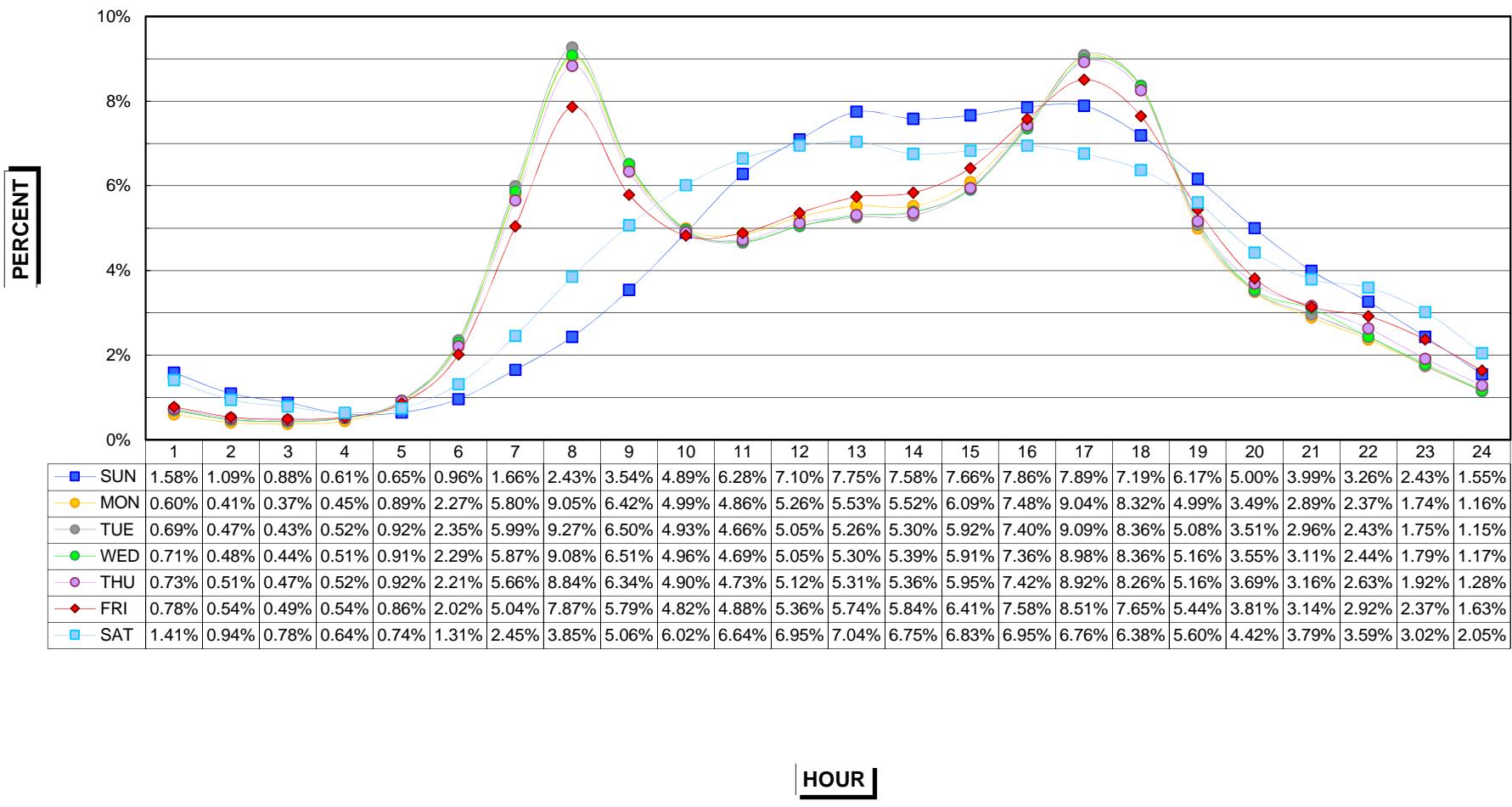
HOURLY DISTRIBUTION OF DAILY TRAFFIC 2016 RURAL PRIMARY



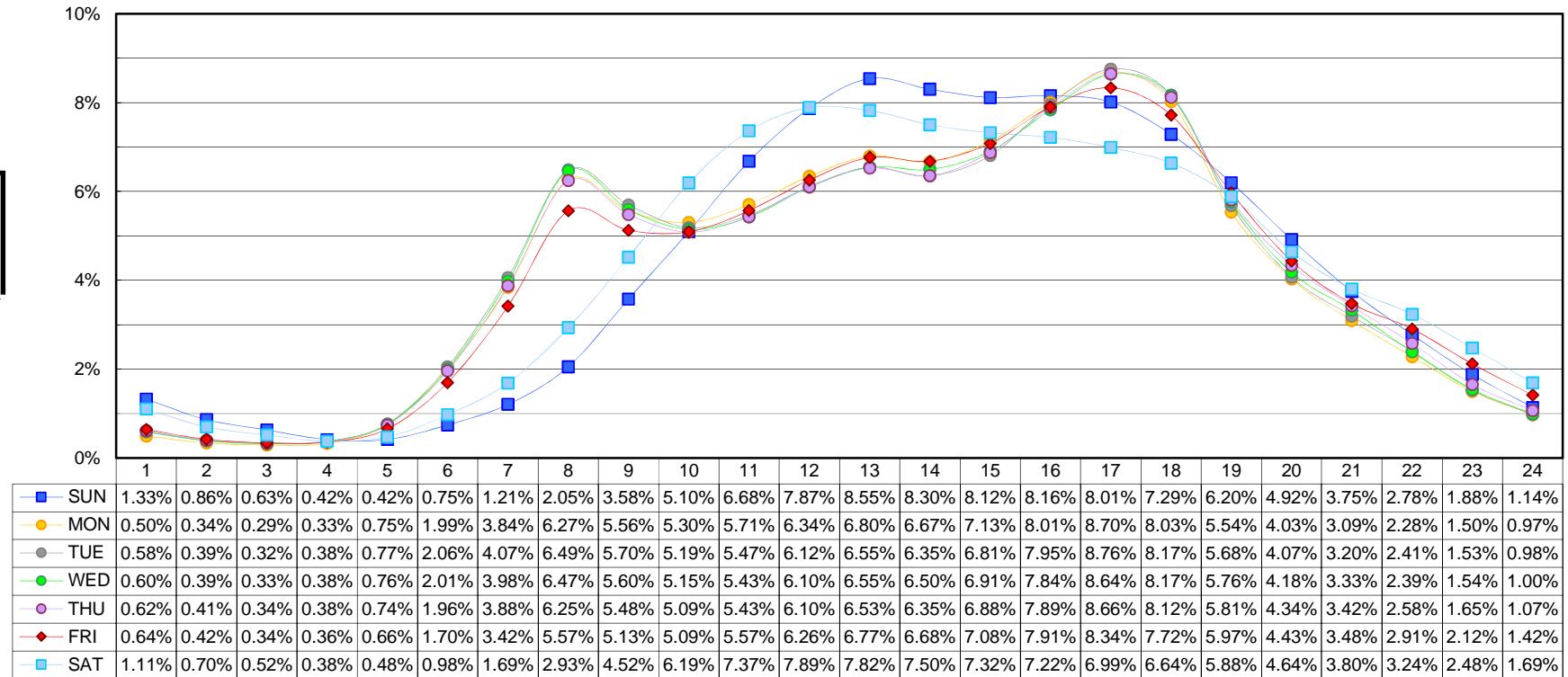
HOURLY DISTRIBUTION OF DAILY TRAFFIC 2016 RURAL SECONDARY



HOURLY DISTRIBUTION OF DAILY TRAFFIC
2016 MUNICIPAL INTERSTATE

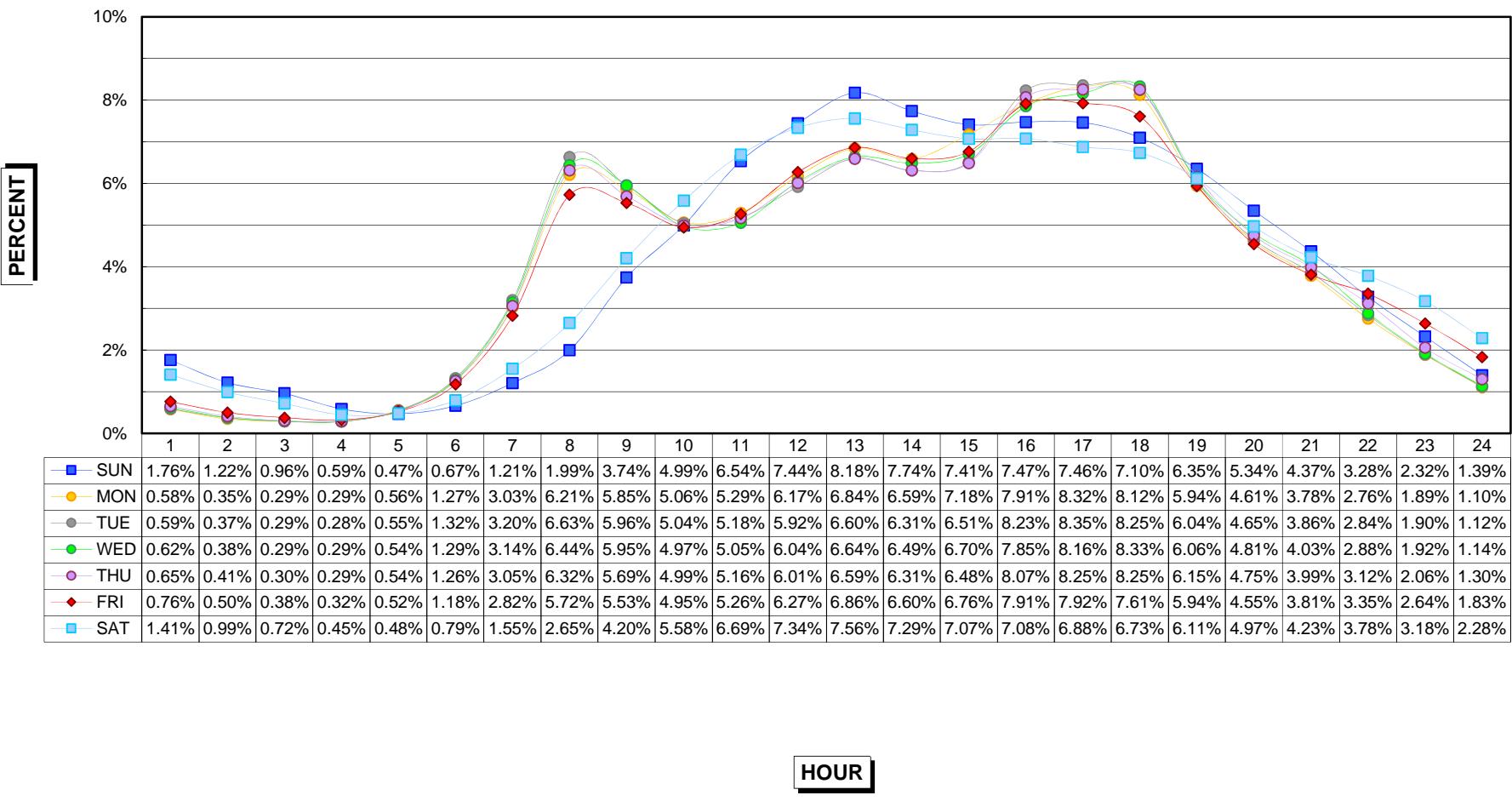


HOURLY DISTRIBUTION OF DAILY TRAFFIC 2016 MUNICIPAL PRIMARY



HOUR

HOURLY DISTRIBUTION OF DAILY TRAFFIC 2016 MUNICIPAL STREETS



SUMMARY OF ANALYSIS

Analysis of the Thirtieth Highest Hour at the Permanent Continuous Automatic Traffic Recorder Stations 2007 - 2016

Permanent automatic traffic recorder data is collected on a continuing basis in Iowa to facilitate the expansion of the short-time manual and portable recorder traffic counts to Annual Average Daily Traffic and to make possible a means of estimating design hour volumes from the Annual Average Daily Traffic. A record of the 50 highest hourly volumes at each rural automatic recorder station has been kept since 1949 and at each urban station since 1959, making possible the fitting of first degree curves to desired design hours periodically as the data has been accumulated.

From permanent automatic traffic recorder data a straight-line relationship between the design hour volume and the Annual Average Daily Traffic can be expressed mathematically as:

$$Y = a + bx$$

Where Y = nth high hour volume (design hour)

x = Annual Average Daily Traffic

a = A constant of minimum relationship

b = The slope relationship which can be expressed as a percentage of the Annual Average Daily Traffic

The constant "a" and the relationship "b" have been recomputed for the 30th highest hour as the data for each succeeding year has become available. Table 1 shows the 30th high hour results computed from data collected over a ten-year period, 2006 through 2015.

Table 1

Calculations of Design Hour Volumes (30th high hour) From Annual Average Daily Traffic

	PRIMARY		INTERSTATE		SECONDARY		CITY STREET	
	"a" Constant	"b" %AADT	"a" Constant	"b" %AADT	"a" Constant	"b" %AADT	"a" Constant	"b" %AADT
Rural	12.24	10.84	372.85	9.72	4.21	12.43	-	-
Municipal	40.13	10.23	26.69	10.59	-	-	51.97	10.00

ANNUAL AVERAGE DAILY TRAFFIC BY STATIONS FOR THE YEARS 2006 TO 2016
RURAL INTERSTATE

STATION	ROUTE	LOCATION
100	I 29	2.0 MI N OF S JCT I 680 HONEY CREEK
102	I 29	7.0 MI S OF US 34 PACIFIC JCT
103	I 80	1.0 MI W OF US 63 GRINNELL
104	I 35	3.0 MI N OF IA 175 JEWELL
105	I 29	3.8 MI S OF IA 175 ONAWA
106	I 35	1.5 MI N OF IA 2 LEON
109	I 35	3.0 MI N OF CO B20 HANLONTOWN
110	I 80	1.5 MI W OF CO M16 SHELBY
111	I 80	2.0 MI E OF IA 149 WILLIAMSBURG
113	I 380	1.5 MI N OF IA 150 BRANDON
115	I 80	2.0 MI E OF US 71 ATLANTIC
116	I 80	0.8 MI W OF 74TH ST WAUKEE
117	I 80	1.8 MI E OF E JCT I 35/80/235 ALTOONA
119	I 80	1.5 MI E OF MIDDLE RD LECLAIRE
120	I 80	2.5 MI E OF CO RD X40 TIPTON
121	I 35	2.0 MI N OF CO RD R75 DOWS
122	I 35	1.0 MI N OF IA 92 CUMMING
123	I 80	4.8 MI E OF E JCT US 65 MITCHELLVILLE
124	I 680	6.4 MI W OF I 80 BEEBEETOWN
125	I 380	6.0 MI N OF I 80 NORTH LIBERTY

2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
21484	21033	20246	20170	20593	NONE	19730	19907	20696	21770	22259
12495	12300	11793	11761	11868	NONE	12008	12337	13563	13530	13780
26940	26853	26118	26234	26569	26045	26046	26235	26523	27320	28119
20269	20598	20147	20509	NONE	21248	21437	21726	21775	22963	23783
12283	12418	12096	12512	12791	NONE	12587	12667	13150	14096	14350
13290	13227	12705	12715	12786	12783	12699	NONE	NONE	13661	14115
18466	18611	17794	18757	19118	19192	19254	19184	19324	20097	20923
22670	22752	21727	22189	22950	NONE	NONE	23070	23517	24441	25519
31347	31325	29718	29950	NONE	NONE	NONE	30642	31210	32352	33298
14695	14976	14648	15084	15665	15796	15905	15937	16186	16741	17520
19480	19697	19267	19067	19879	19661	19740	19821	20113	21331	22176
35190	34897	33977	34437	35427	35272	35527	NONE	NONE	39315	45973
70362	68589	67650	69757	72678	73105	74017	74863	75290	NONE	77337
28926	28639	27436	27398	NONE	29604	29978	29000	30825	32582	NONE
32583	32755	31284	31386	32327	NONE	31963	32640	33523	NONE	NONE
14112	13858	13376	13822	NONE	14291	14270	14195	14506	15227	15730
	21255	21339	21205	21105	21087	21044	NONE	NONE	21974	
				35329	35061	35253	34996	NONE	NONE	
					6196	NONE	5947	5913	6039	6311
						NONE	48518	49835	51703	53335
										NONE

2016 EXPANSION FACTORS
RURAL INTERSTATE

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
SEASONAL	1.259	1.223	1.036	1.003	0.921	0.865	0.842	0.868	0.946	0.974	1.015	1.109
Sunday	1.083	1.113	1.007	0.979	1.009	0.948	0.943	0.959	0.939	0.931	0.927	1.074
Monday	1.076	1.052	1.083	1.076	1.069	1.094	1.091	1.092	1.051	1.106	1.163	1.078
Tuesday	1.045	1.098	1.106	1.102	1.118	1.123	1.108	1.122	1.155	1.131	1.080	1.017
Wednesday	1.008	1.049	1.059	1.067	1.083	1.069	1.057	1.067	1.118	1.078	0.958	0.979
Thursday	0.982	0.955	0.982	0.976	0.988	0.989	0.963	1.002	1.020	0.998	1.044	0.973
Friday	0.851	0.800	0.814	0.825	0.817	0.840	0.860	0.849	0.820	0.824	0.891	0.873
Saturday	1.015	1.032	1.034	1.058	1.001	1.020	1.051	0.987	0.992	1.027	1.013	1.059

ANNUAL AVERAGE DAILY TRAFFIC BY STATIONS FOR THE YEARS 2006 TO 2016
MUNICIPAL INTERSTATE

STATION	ROUTE	LOCATION	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
701	I 380	BTWN WILSON AND 33RD CEDAR RAPIDS	64968	64650	63791	65296	66377	66597	66619	66629	67456	69639	71681
703	I 380	AT J AVE S OF COLDSTREAM CEDAR RAPIDS	82503	82450	80922	80465	84299	82907	82911	82286	83915	85038	81120
704	I 29/80	0.6 MI W OF IA 192 COUNCIL BLUFFS	79350	79516	76838	75586	75988	NONE	75521	NONE	NONE	NONE	NONE
705	I 74	0.6 MI S OF US 6 BETTENDORF	49099	48849	48427	47738	NONE	45756	47653	49404	49577	NONE	NONE
707	I 29	AT SOUTH DAKOTA BORDER SIOUX CITY	28070	27931	28175								SITE REMOVED JANUARY 2010
708	I 280	0.3 MI S OF IA 22 DAVENPORT											NONE
709	I 35	N OF ORALABOR ROAD ANKENY											NONE
710	I 235	E. INNERLEG OF 35TH ST WEST DES MOINES											NONE
711	I 235	S OF GUTHRIE AVENUE DES MOINES											66548
712	I 235	E OF SECOND AVENUE DES MOINES											NONE
713	I 35/80	E OF MERLE HAY ROAD DES MOINES											NONE
714	I 235	0.4 MI N OF EUCLID AVENUE DES MOINES											NONE
715	I 29	I 29 E OF IA 12 SIOUX CITY											33150
													SITE REMOVED MARCH 2012
													NONE
													65417
													68332
													72475

2016 EXPANSION FACTORS
MUNICIPAL INTERSTATE

SEASONAL	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
	1.106	1.049	0.994	0.947	0.939	0.929	0.957	0.936	0.956	0.946	1.011	1.051
Sunday	1.533	1.561	1.468	1.432	1.407	1.468	1.465	1.446	1.375	1.399	1.409	1.507
Monday	0.973	0.985	0.955	0.962	1.059	0.953	0.967	0.950	1.039	0.972	0.936	0.980
Tuesday	0.907	0.951	0.943	0.936	0.937	0.920	0.907	0.926	0.938	0.948	0.896	0.886
Wednesday	0.916	0.936	0.925	0.933	0.918	0.909	0.884	0.911	0.920	0.930	0.889	0.894
Thursday	0.903	0.885	0.906	0.903	0.888	0.894	0.864	0.897	0.895	0.906	0.984	0.907
Friday	0.858	0.822	0.848	0.853	0.843	0.861	0.896	0.865	0.853	0.857	0.889	0.884
Saturday	1.185	1.154	1.193	1.204	1.155	1.249	1.290	1.240	1.163	1.184	1.205	1.209

**ANNUAL AVERAGE DAILY TRAFFIC BY STATIONS FOR THE YEARS 2006 TO 2016
RURAL PRIMARY**

STATION	ROUTE	LOCATION
201	US 65	2.7 MI N OF IA 3 HAMPTON
202	US 71	2.0 MI N OF IA 44 HAMLIN
204	US 75	1.3 MI N OF CO C60 HINTON
205	US 218	2.7 MI S OF IA 78 SWEDESBURG
206	US 30	AT BOONE/STORY CO LINE NAPIER
207	US 18	2.2 MI E OF US 169 ALGONA
208	US 6	3.0 MI E OF CO V66 MARENKO
209	US 67	1.5 MI S OF CO F45 PRINCETON
210	US 18	4.2 MI E OF IA 60 SHELDON
212	IA 92	0.6 MI W OF CO V45 SIGOURNEY
213	US 30	1.8 MI E OF US 65 COLO
214	US 61	3.8 MI N OF US 34 BURLINGTON
216	US 34/169	2.5 MI E OF W JCT US 169 AFTON
217	US 18	2.5 MI E OF I 35 CLEAR LAKE
218	IA 44	0.2 MI W OF US 169 ADEL
219	US 34	1.0 MI W OF I 35 OSCEOLA
220	US 52	1.0 MI NW OF US 18 POSTVILLE
221	IA 9	2.5 MI W OF CO N52 ARMSTRONG
222	IA 3	0.1 MI W OF CO P66 HUMBLDT
223	IA 48	4.0 MI S OF IA 92 GRISWOLD
224	US 59	0.5 MI S OF CO F16 DEFIANCE
226	US 18	3.8 MI E OF CO W14 WEST UNION
228	IA 117	2.5 MI S OF US 65 MINGO
229	IA 78	1.2 MI W OF CO X23 WINFIELD
230	US 169	3.5 MI S OF SJCT IA 92 WINTERSET
231	IA 148	9.3 MI N OF IA 92 ANITA
233	IA 110	1.5 MI S OF CO C65 SCHALLER
234	IA 12	2.5 MI N OF CO K18 ACRON
235	IA 143	3.4 MI S OF IA 10 MARCUS
236	IA 196	3.0 MI S OF US 20 SAC CITY
238	IA 149	2.1 MI N OF IA 78 MARTINSBURG
240	IA 2	3.0 MI E OF US 275 SIDNEY
241	IA 13	5.0 MI S OF US 20 RYAN
242	US 61	3.8 MI N OF CO F41 ELDRIDGE
243	US 30	0.3 MI E OF CO Z24 DEWITT
244	IA 1	0.8 MI S OF CO F67 KALONA
245	US 20	1.5 MI E OF CO V62 JESUP
246	IA 141	1.0 MI E OF WILLIS AVE PERRY
247	US 20	3.0 MI E OF E JCT IA 17 WEBSTER CITY
248	IA 21	2.8 MI N OF US 6 BELLE PLAINE
249	US 218	0.5 MI N OF HILLS INTERCHANGE HILLS
250	US 65	1.5 MI N OF IA 163 PLEASANT HILL
252	US 18/63	0.5 MI S OF CO B54 NEW HAMPTON
253	US 218	3.5 MI S OF CO T64 CHARLES CITY
254	IA 60	4.1 MI N OF IA 9 SIBLEY
255	US 20	1.0 MI E OF US 65 IOWA FALLS
256	US 18	3.3 MI E OF I 35 MASON CITY
257	US 20	3.6 MI W OF W JCT US 59 HOLSTEIN
258	US 30	0.6 MI E OF CO V66 BLAIRSTOWN
259	US 30	3.5 MI E OF IA 1 LISBON
260	US 71	0.6 MI S OF CO J64 BRADDYVILLE
261	US 169	2.3 MI N OF CO D14 FORT DODGE
262	US 63	1.6 MI S OF IA 2 BLOOMFIELD
263	US 52	0.3 MI E OF CO X47 GARNAVILLO
264	IA 27	3.0 MI S OF CO W62 ARGYLE
265	US 61	1.0 MI N OF CO E17 MAQUOKETA
266	IA 2	0.8 MI W OF US 63 WEST GROVE
267	US 34	3.0 MI W OF US 59 EMERSON
268	US 30	4.0 MI SW OF CO M14 DOW CITY
269	US 30	3.6 MI E OF IA 144 GRAND JUNCTION
270	US 71	3.1 MI S OF IA 3 STORM LAKE
271	US 18	4.3 MI E OF IA 4 EMMETSBURG
272	US 71	5.2 MI S OF W JCT US 6 ATLANTIC
273	US 34	3.6 MI E OF CO RD S56 RUSSELL
274	IA 163	2.6 MI NW OF CO RD G28 PELLA
275	US 20	0.5 MI W OF CENTER AVE EPWORTH
276	US 63	1.5 MI N OF IA 9 LIME SPRINGS
277	US 34	1.1 MI E OF IA 16 AGENCY
278	IA 141	0.5 MI N OF IA 44 GRIMES
279	IA 13	1.5 MI N OF CO RD C64 DUNDEE
280	IA 2	2.0 MI W OF I 35 LEON
281	US 151	4.4 MI S OF IA 38 MONTICELLO
282	US 52	9.5 MI S OF IA 62 BELLEVUE
283	US 61/218	0.8 MI S OF N JCT US 61/218 KEOKUK
284	IA 9	1.0 MI W OF 6TH STREET LANSING
285	US 20	1.3 MI E OF IA 4 ROCKWELL CITY
286	US 34	2.0 MI W OF I 29 GLENWOOD
287	US 20	0.6 MI E OF US 75 LAWTON

	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	
2831	2808	2777	2824	NONE	2786	2814	2832	2879	2881	2937		
3450	3473	3375	3393	3537	NONE	3505	NONE	NONE	NONE	NONE		
12296	12264	12302	12671	12918	NONE	12953	12985	13148	13820	14353		
10831	11292	11063	11484	11812	11809	11768	11798	12074	12816	13208		
12793	12929	13039	13356	13578	NONE	13930	14076	14583	14913	15538		
3306	3449	3226	3326	3377	3402	3444	3460	3361	3425	3372		
3256	3157	3113	3153	3256	NONE	3202	NONE	3181	3325	3441		
4424	4372	4181	4132	NONE	4264	4286	4207	4087	4106	4173		
4061	4066	4053	4120	4213	4109	4207	4178	4077	4272	4365		
2731	2684	2564	2602	2632	2570	NONE	2445	2501	2560	NONE		
5105	5058	4908	5047	NONE	NONE	5719	5872	6248	6587	6891		
7050	6985	6953	6814	6635	6520	6592	6612	6690	6882	6977		
3696	3671	3537	3665	3870	3864	3845	3701	3661	3708	3688		
14373	14364	14173	14489	NONE	13763	13740	13508	13582	13712	NONE		
3645	3444	3396	3406	3457	3476	3559	3458	3561	NONE	3781		
4724	4702	4575	4624	4711	4725	4792	4674	4589	4641	4682		
1715	1658	1578	1609	1676	1616	1614	NONE	1516	NONE	NONE		
1678	1690	1592	1631	NONE	NONE	1657	NONE	1613	1627	1614		
1956	1919	1844	1793	1917	2004	NONE	1732	NONE	NONE	NONE		
1248	1221	1171	1164	1190	1199	1225	1218	1212	1213	1215		
2613	2561	2507	2590	2638	NONE	2656	2623	2642	2696	2820		
2357	2339	2197	2291	2269	NONE	NONE	2501	2425	2489	NONE		
993	986	979	993	951	NONE	NONE	847	933	NONE			
785	742	738	748	750	761	NONE	765	781	772	802		
1726	1610	1588	1651	1686	1657	1677	1631	NONE	1669	1754		
782	761	755	763	NONE	NONE	NONE	NONE	818	853	883		
1260	1294	1298	1306	NONE	NONE	1331	1293	1322	1307	1331		
1435	1415	1304	1277	1342	NONE	1287	1224	1248	1244	1306		
825	802	765	746	785	NONE	NONE	889	894	NONE	NONE		
1060	1082	1088	1131	1169	NONE	1133	1150	1186	NONE	NONE		
1153	1132	1071	1102	1180	1164	NONE	1196	1154	1224	1234		
1879	1949	1914	1772	1899	NONE	1872	1862	1948	1947	1978		
4460	4280	4034	4069	4270	4142	4184	4205	4226	4340	4448		
16108	16214	15940	16374	16748	16530	16678	16651	16718	17300	17808		
9124	9448	9408	9678	9841	9704	NONE	NONE	NONE	9869			
5585	5624	5765	5694	5566	5493	5535	5473	NONE	NONE	5773		
10345	10571	10532	10789	11025	11052	NONE	9964	10566	10976	NONE		
9676	9448	9315	9478	9556	9256	9581	9239	9332	NONE	9996		
7888	7945	7858	7834	NONE	NONE	8211	8828	9134	9325			
1246	1193	1120	1135	1148	1159	1163	1145	1108	1162	1211		
18313	19527	18686	19548	19804	19698	19594	19810	20472	20683	21112		
25274	24416	23942	24223	24789	24953	25083	25034	25599	27101	28598		
4780	4831	4797	4909	5091	5099	5175	5225	5396	5624	5749		
8436	8649	8542	8643	NONE	9123	9218	9044	9074	9395	9678		
				3296	3378	NONE	NONE	3268	3484	3725	NONE	
7926	8057	8148	8335	8548	8497	8608	8730	8859	9144	9216		
7290	7507	7342	7612	7878	7911	8029	7975	7901	8242	NONE		
2781	2881	2926	2954	NONE	3022	NONE	3022	NONE	3609	NONE		
6424	5940	NONE	NONE	NONE	6553	6630	6876	7461	7461	7789		
	5427	5610	5753	5739	5812	5584	5598	5792	5978			
2182	2240	2301	2377	NONE	2404	2346	NONE	NONE	2416			
5783	5360	5389	NONE	NONE	5604	5679	5790	6015				
2247	2217	2288	2318	2253	2225	2218	2255	2297	2305			
2395	2225	2267	NONE	NONE	2382	2400	2409	2452	2484			
4532	4764	5079	5402	5651	5797	5891	NONE	NONE	6745			
7349	7053	7236	7475	7444	7537	NONE	NONE	NONE	8097			
1560	1546	1535	1596	1550	1557	1559	1619	1715	1772			
4176	4168	4380	4476	NONE	4421	4225	4162	4308	4580			
2997	2977	3022	NONE	2995	3028	3064	3143	3180				
	4137	4320	4359	4343	4384	4196	4272	4466	4548			
270	2441	2594	NONE	2685	2833	3010	3058	NONE				
3111	3218	3386	3233	3347	3283	3120	3084	3080				
2112	2228	NONE	2330	2253	2294	2354	2405					
	2109	2073	2070	2116	2047	2123	2222	2229				
9872	10331	10795	10858	11056	11215	NONE	11927	12341				
	12096	12376	12573	12661	12652	12696	13205	13478				
2870	2961	2920	2903	3016	3096	3169	3281					
	7804	7792	7883	8047	8085	8380	8562	9117				
20594	20395	20906	21762	21702	21922	23410	NONE					
	2311	2344	2305	2349	2358	2361	2395	2488				
	1303	NONE	1262	1232	1274	1299	1326					
	10635	10625	10807	10940	11122	11609	11994					
	NONE	842	842	799	824	NONE	888					
	7810	7666	8009	8004	8257	8684	8730					
	2163	NONE	2010	1939	1970	2066	2066					
	NONE	3407	4745	544								

ANNUAL AVERAGE DAILY TRAFFIC BY STATIONS FOR THE YEARS 2006 TO 2016
MUNICIPAL PRIMARY

STATION	ROUTE	LOCATION	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
802	US 71	W OF MEMPHIS AVE SPIRIT LAKE	12102	11721	11530	11961	11827	11701	11723	11777	12076	11714	11665
803	IA 12	ON VIADUCT E OF COURT ST SIOUX CITY	23924	23112	22228	NONE	NONE	22563	NONE	20642	NONE	NONE	NONE
804	IA 4	N OF 4TH AVE NW POCAHONTAS	3082	3012	2950	2868	2965	3246	3290	3091	3094	3177	3229
805	IA 148	S OF 11TH ST CORNING	3202	3046	2852	2867	2811	2797	2802	2637	2711	2720	2758
806	US 6	E OF SHASTA WINDSOR HEIGHTS	21425	19954	19072	19481	NONE	NONE	18681	19223	18151	18610	18621
808	US 71	S OF BIRCH ST AUDUBON	4750	4701	4655	4769	NONE	NONE	4675	4601	4567	4545	NONE
809	IA 14	N OF WOODLAND ST MARSHALLTOWN	6268	6304	6164	6119	6228	6000	5836	5746	5641	5648	NONE
810	IA 92	W OF N ST INDIANOLA	11203	10858	10837	11024	11061	11036	11047	10985	11251	NONE	NONE
811	IA 192	S OF AVE N COUNCIL BLUFFS	9047	8858	9139	9057	8718	NONE	6004	5949	6208	9535	10236
812	IA 122	W OF VIRGINIA AVE MASON CITY	12014	12035	11825	12186	11450	11754	11469	10842	10768	10542	10542
813	US 6	E OF PINE ST DAVENPORT	21648	22022	21686	21312	21935	21137	22050	20189	19925	NONE	20323
815	IA 922	BTWN WILEY BLVD & WESTDALE CDR RPDS	9474	9565	9551	10812	10940	10658	NONE	NONE	NONE	10989	11355
816	US 34	W OF US 61 WEST BURLINGTON	13878	13666	13097	13168	13671	13076	13173	12909	NONE	NONE	NONE
819	IA 9	EAST OF 14TH ST OSAGE	5391	5374	5264	5237	5262	NONE	5207	5200	5244	5080	4946
820	IA 17	N OF NW 11TH ST EAGLE GROVE	2867	2818	2739	2722	2832	2898	2810	2891	NONE	NONE	2870
821	IA 4	S OF EDGEWOOD AVE E JEFFERSON	4166	4102	4074	4154	4138	3995	NONE	3832	3923	4093	4170
823	US 6	BETWEEN Sycamore & 1st Ave Iowa City	21526	21187	20946	20652	20543	20148	NONE	NONE	NONE	19998	20069
824	US 69	BETWEEN 15TH AND 16TH ST AMES	19804	19440	17551	17318	18148	17567	NONE	17619	17298	17323	NONE
826	US 65	1.5 MI NE OF I-80 BONDURANT	12397	12052	11761	12272	12608	12446	NONE	12817	12625	NONE	14483
827	US 61/151	W OF MISSISSIPPI R DUBUQUE	19396	20588	20031	20744	21554	21609	21611	21381	21990	22069	22344
828	IA 150	S OF 12TH ST OELWEIN	6654	6298	6295	6461	6550	6490	6354	6305	6196	6198	6167
829	US 59	S OF 5TH AVE SHENANDOAH	10053	9698	9121	8694	8819						
830	IA 23	S OF IA 92 OSKALOOSA	3159	3073	2951	2871	2866	2808	2794	2742	NONE	2789	NONE
831	IA 5	W OF FLUER DRIVE DES MOINES						NONE	23086	22771	22572	23262	NONE

2016 EXPANSION FACTORS
MUNICIPAL PRIMARY

SEASONAL	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
	1.141	1.095	1.019	0.960	0.923	0.921	0.931	0.939	0.952	0.963	1.030	1.058
Sunday	1.489	1.493	1.404	1.381	1.299	1.288	1.258	1.254	1.274	1.291	1.356	1.429
Monday	0.969	0.972	0.956	0.974	1.059	0.986	0.996	0.981	1.046	0.991	0.958	0.985
Tuesday	0.935	0.972	0.963	0.963	0.965	0.972	0.967	0.981	0.970	0.983	0.921	0.924
Wednesday	0.935	0.956	0.948	0.956	0.954	0.955	0.944	0.960	0.962	0.963	0.916	0.908
Thursday	0.932	0.920	0.930	0.929	0.940	0.946	0.925	0.947	0.934	0.941	0.999	0.930
Friday	0.854	0.828	0.859	0.864	0.857	0.877	0.891	0.879	0.858	0.859	0.886	0.894
Saturday	1.122	1.101	1.124	1.095	1.047	1.091	1.131	1.093	1.066	1.085	1.118	1.127

ANNUAL AVERAGE DAILY TRAFFIC BY STATIONS FOR THE YEARS 2006 TO 2016

SECONDARY

PAVED

STATION	ROUTE	LOCATION
300	CO P14	2.7 MI N OF CO E33 CHURDAN
301	CO S14	0.8 MI S OF CO E29 NEVADA
302	CO M55	0.2 MI N OF IA 141 MANILLA
303	CO K45	2.25 MI S OF IA 175 ONAWA
304	CO V45	3.5 MI N OF IA 92 SIGOURNEY
306	CO E53	1.75 MI E OF IA 25 SCRANTON
307	CO R38	2.2 MI N OF CO C54 CLARION
308	CO N32	1.6 MI N OF IA 9 ESTHERVILLE
309	CO K52	1.5 MI S OF US 18 HULL
310	CO Y52	1.5 MI S OF US 30 GRAND MOUND
311	CO W12	3.5 MI S OF US 30 WATKINS
312	CO E26	2.7 MI W OF CO RD R38 BOONE
313	CO D42	0.2 MI E OF IA 13 MANCHESTER
314	CO 105	1.3 MI E OF CO S56 NORTHWOOD
315	CO RD	5.5 MI E OF US 63 DRAKESVILLE
316	CO D36	2.8 MI E OF CO N57 ROCKWELL CITY

2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
303	250	237	247	239	234	268	237	241	238	247
1008	989	975	973	958	988	965	967	969	992	
830	783	739	736	739	777	798	787	793	804	818
1029	1059	1106	1152	NONE	NONE	NONE	1162	1155	NONE	1120
645	634	617	636	665	652	NONE	646	631	636	643
570	515	520	544	NONE	NONE	524	497	507	530	539
1361	1293	1255	1240	1278	NONE	1339	1379	NONE	NONE	1421
370	341	330	357	NONE	344	NONE	323	NONE	340	NONE
1017	987	1001	1063	NONE	1149	1178	1228	1249	NONE	1379
534	504	479	501	NONE	502	498	NONE	NONE	NONE	507
852	853	804	825	NONE	804	799	773	744	756	799
1370	1327	1213	1269	1395	NONE	1525	NONE	1481	1525	1630
719	698	679	691	702	630	612	623	679	699	756
766	771	775	778	800	767	744	737	731	772	754
733	720	656	676	675	665	682	666	665	679	691
3138	3111	3087	3155	3292	1201	1157	1014	974	949	NONE

Note: Station 316 was previously station 211.

Co Rd D36 was US 20 until Dec. 2010 when the US 20 4-lane was extended from Moorland to IA 4.

GRAVEL

STATION	ROUTE	LOCATION
400	CO B30	0.5 MI E OF CO L48 PRIMGHAR
401	LOC RD	1.75 MI N OF CO E36 CLUTIER
402	LOC RD	0.75 MI E OF CO V18 CLUTIER
403	CO H47	5.0 MI SE OF US 34 ALBIA
405	LOC RD	2.5 MI N OF US 18 NEW HAMPTON
406	LOC RD	2.0 MI E OF US 169 LORIMOR
407	CO H23	2.0 MI E OF US 169 LORIMOR

2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
29	27	21	23	21	23	18	22	22	22	NONE
33	35	31	30	36	36	39	34	35	NONE	NONE
50	50	41	47	51	55	54	47	48	46	NONE
111	102	88	98	89	92	104	100	NONE	100	99
55	55	46	48	46	48	51	49	57	NONE	65
67	70	57	63	62	57	NONE	70	68	69	59
77	76	68	70	75	66	76	77	75	72	67

2016 EXPANSION FACTORS SECONDARY

SEASONAL	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
Sunday	1.442	1.441	1.365	1.362	1.312	1.326	1.305	1.287	1.311	1.384	1.441	
Monday	0.977	0.974	0.939	0.989	1.062	0.983	0.987	0.954	1.020	0.969	0.976	1.006
Tuesday	0.951	0.966	0.971	0.958	0.985	0.950	0.950	0.951	0.937	0.945	0.918	0.928
Wednesday	0.939	0.961	0.957	0.967	0.944	0.920	0.920	0.937	0.947	0.985	0.925	0.915
Thursday	0.933	0.926	0.949	0.957	0.958	0.951	0.910	0.945	0.936	0.959	0.976	0.927
Friday	0.867	0.858	0.875	0.885	0.871	0.897	0.917	0.913	0.903	0.916	0.912	0.884
Saturday	1.095	1.075	1.107	1.037	1.009	1.131	1.148	1.130	1.091	1.050	1.079	1.113

ANNUAL AVERAGE DAILY TRAFFIC BY STATIONS FOR THE YEARS 2006 TO 2016
MUNICIPAL STREETS

STATION	ROUTE	LOCATION
900	LAKE ST	N OF 3RD ST in STORM LAKE
901	2ND AVE N	E OF 15TH ST in FORT DODGE
902	LOCUST ST	E OF SPRING ST in DAVENPORT
903	JEFFERSON	NE OF E 5TH ST in OTTUMWA
904	JOHNSON	W OF JANICE DR in CEDAR RAPIDS
905	N'WESTERN	N OF 20TH ST in AMES
906	DUBUQUE	S OF DAVENPORT ST in IOWA CITY
907	COLLEGE	S OF 23RD ST in CEDAR FALLS
908	LIND'WOOD	S OF 35TH ST in SIOUX CITY
909	HAMILTON	N OF CLIFTON AVE in SIOUX CITY
910	GRANDVIEW	SE OF PLYMOUTH CT in DUBUQUE
911	HUMBOLDT	S OF 4TH ST in BODE
912	ELM ST	N OF LUCAS ST in CRESTON
** 913	WASHINGTON	E OF HARRISON ST in MOUNT PLEASANT

2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
2818	2872	2756	2848	2811	NONE	2610	2587	2556	2616	2662
6695	6760	6775	6665	6728	6620	6444	6024	NONE	NONE	NONE
21934	21750	21300	20726	20521	NONE	NONE	20336	19630	20177	19332
6627	6456	6272	6006	5694	NONE	5699	5628	NONE	5329	NONE
10086	9947	10000	9818	9613	9391	9258	9057	8931	NONE	NONE
2348	2304	2202	2264	NONE	2193	NONE	2211	2178	NONE	NONE
15448	15230	14688	14411	14245	13859	13518	NONE	12861	13339	NONE
7862	7444	NONE	NONE	NONE	7974	NONE	NONE	7410	7323	7177
1026	1008	969	977	954	976	960	NONE	NONE	NONE	904
14547	14314	13854	14159	14586	14388	14584	NONE	13719	14701	15289
8836	8779	8596	8871	8946	8917	8833	8411	7983	8465	NONE
796	786	776	770	767	739	NONE	684	695	665	660
3938	3710	3798	3807	3782	3802	3735	3550	NONE	3364	3440
11283	10632	10540	10161							SITE REMOVED SEPTEMBER 2010

Note: Station 913 was previously station 801.
Washington Street was US 34 until Nov. 2005 when the US 34 bypass opened.

2016 EXPANSION FACTORS
MUNICIPAL STREETS

SEASONAL	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
	1.122	1.066	1.018	0.944	0.953	0.988	1.004	0.965	0.950	0.937	1.033	1.057
Sunday	1.403	1.419	1.369	1.347	1.315	1.325	1.331	1.297	1.260	1.311	1.349	1.396
Monday	0.979	0.973	0.947	0.976	1.061	0.980	0.977	0.968	1.041	0.975	0.944	0.977
Tuesday	0.922	0.963	0.947	0.954	0.955	0.954	0.945	0.955	0.948	0.957	0.898	0.920
Wednesday	0.932	0.937	0.936	0.949	0.933	0.953	0.941	0.956	0.930	0.943	0.897	0.907
Thursday	0.932	0.925	0.931	0.932	0.925	0.943	0.929	0.946	0.923	0.938	1.002	0.929
Friday	0.878	0.854	0.878	0.883	0.874	0.884	0.902	0.888	0.885	0.893	0.930	0.907
Saturday	1.142	1.129	1.170	1.106	1.073	1.095	1.129	1.119	1.128	1.105	1.139	1.146

ANNUAL AVERAGE DAILY TRAFFIC BY STATIONS FOR THE YEARS 2006 TO 2016

RECREATIONAL

PRIMARY

STATION	ROUTE	LOCATION
500	US 71	0.1 MI S OF CO RD B14 FOSTORIA
501	IA 5	3.8 MI S OF US 34 MORAVIA
503	IA 415	0.5 MI W OF NW POLK CITY RD POLK CITY

2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
8343	8346	7877	8067	8213	8250	NONE	NONE	8284	8724	8741
3765	3745	3692	3922	3910	3801	3772	3711	3582	4041	4106
5870	5162	5293	6076	NONE	6130	6445	6697	NONE	7530	8418

SECONDARY

STATION	ROUTE	LOCATION
600	CO F25	0.1 MI W OF CO P18 SPRINGBROOK
602	ENTRANCE	GEORGE WYTH S. P. WATERLOO
603	ENTRANCE	3.3 MI N OF IA 25 GREEN VALLEY S. P.

2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
209	226	205	216	207	199	188	181	176	178	182
777	799	643	731	766	759	850	NONE	748	748	789
352	339	273	175	NONE	NONE	262	283	279	NONE	324

2016 EXPANSION FACTORS RECREATIONAL

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
SEASONAL	1.614	1.598	1.236	0.944	0.757	0.693	0.703	0.805	0.873	1.057	1.522	1.810
Sunday	1.167	1.216	1.113	1.010	0.966	0.926	0.951	0.946	0.957	1.002	1.187	1.234
Monday	1.056	1.066	1.002	1.102	1.091	1.186	1.141	1.182	1.046	1.119	1.031	1.024
Tuesday	1.098	1.042	1.048	1.186	1.209	1.143	1.186	1.185	1.217	1.123	0.972	0.976
Wednesday	1.006	1.051	1.051	1.191	1.138	1.109	1.129	1.128	1.210	1.091	0.977	0.960
Thursday	1.028	1.023	1.013	1.073	1.123	1.106	1.059	1.078	1.104	1.045	1.023	0.946
Friday	0.919	0.900	0.900	0.898	0.890	0.883	0.885	0.895	0.935	0.925	0.945	0.931
Saturday	0.904	0.900	0.987	0.840	0.838	0.872	0.870	0.845	0.844	0.886	0.966	1.027

AUTOMATIC TRAFFIC RECORDER LOCATIONS

JANUARY 1, 2017

