### 2016

# Virginia Department of Transportation Daily Traffic Volume Estimates Including Vehicle Classification Estimates

where available

# Special Locality Report 306

Town of Strasburg

Information in this report is included in Report

85

(Shenandoah County)

Prepared By

Virginia Department of Transportation Traffic Engineering Division

In Cooperation With

U.S. Department of Transportation Federal Highway Administration

#### Virginia Department of Transportation Traffic Engineering Division Traffic Monitoring Section

The Virginia Department of Transportation (VDOT) conducts a program where traffic count data are gathered from sensors in or along streets and highways and other sources. From these data, estimates of the average number of vehicles that traveled each segment of road are calculated. VDOT periodically publishes booklets listing these estimates.

One of these booklets, titled "Average Daily Traffic Volumes with Vehicle Classification Data, on Interstate, Arterial and Primary Routes" includes a list of each Interstate and Primary highway segment with the estimated Annual Average Daily Traffic (AADT) for that segment. AADT is the total annual traffic estimate divided by the number of days in the year. This booklet also includes information such as estimates of the percentage of the AADT made up by 6 different vehicle types, ranging from cars to double trailer trucks; estimated Annual Average Weekday Traffic (AAWDT), which is the number of vehicles estimated to have traveled the segment of highway during a 24 hour weekday averaged over the year; as well as Peak Hour and Peak Direction factors used by planners to formulate design criteria.

In addition to the Primary and Interstate publication, one hundred books are published periodically, one for each of 100 areas across the state defined by VDOT for record-keeping purposes. These books include traffic volume estimates for roads within the county, cities, and towns within the area. These books are titled "Daily Traffic Volumes Including Vehicle Classification Estimates, where available; Jurisdiction Report numbers 00 through 99".

Also available are a number of reports summarizing the average Vehicle Miles Traveled (VMT) in selected jurisdictions and other categories of highways. There are many different ways to present traffic volume summary information. Because the user determines the value of each presentation, the reports have been redesigned based on user requests and feedback. The people of the VDOT Traffic Engineering Division Traffic Monitoring Section who produce these books welcome requests for other helpful ways of presenting the summary information.

A compact disc (CD) is available that includes files in the Adobe® Portable Document Format (PDF) that can be displayed, searched, and printed using common desktop computer equipment. The CD includes the publications described above as well as a number of other reports, including specialized VMT summaries and smaller AADT reports for each city and town separately.

#### **Publication Notes**

#### Parallel Roads

For road inventory and management purposes, some roadways are counted separately by direction and have separately published traffic estimates for each direction of travel. Examples of such roadways are the interstate system and routes with separated facilities and (usually) one-way traffic facilities in urban areas. In these publications, they are referred to as parallel roads. As a convenience for the users of the publication, the listing for segments of roads with parallel segments are published with both the traffic estimates for their own direction of travel (e.g. I-95 Northbound) as well as the estimate of the total of all traffic on the same route including parallel roadways (all directions of I-95). The publication will have a "Combined Traffic Estimates for Parallel Roadways on this Route" or "Combined Traffic" identifiers for the combined direction of travel estimates.

Roadways such as I-395 with a North segment, a South segment and a separate Reversible lane segment will have the estimate for more than two parallel roadways included in the entire combined traffic estimate.

Some routes have very complicated paths through cities and towns. These parallel paths may be too complex to allow a relationship between nearby sections of the opposite direction on the same route. In this case, to indicate that the traffic estimates for such a road segment may not include all directions of traffic on that route, the line that would list the combined values will indicate "NA" for not available.

VDOT's traffic monitoring program includes more than 100,000 segments of roads and highways ranging from several mile sections of Interstate highways to very short sections of city streets. Due to problems experienced obtaining some traffic count data, and the level of quality necessary to maintain confidence in the data, no estimate is currently available for some segments of roadway. These segments are included in the publications indicating "NA" for not available. It is the intention of the VDOT Traffic Engineering Division Traffic Monitoring group to obtain the data necessary and to report traffic volume estimates on all road segments included in these publications.

Many of the road segments in this program are local secondary roads. The amount and detail of data collected on these roads are not as great as the data collected on higher volume roads. The vehicle classification, average weekday traffic volumes, and the theoretical design hour traffic volumes are not calculated for these roads. The publications indicate "NA" for the information that is not available.

This publication is based on a traffic monitoring program initiated in 1997. Because the data collection techniques and statistical evaluation processes are different than those used in previous years, comparison with previous publications may be misleading.

#### Glossary of Terms:

Route: The Route Number assigned to this segment of roadway with the master inventory route number if this is an overlapping route, with official street or highway name if available.

Length: Length of the traffic segment in miles.

AADT: Annual Average Daily Traffic. The estimate of typical daily traffic on a road segment for all days of the week, Sunday through Saturday, over the period of one year.

#### QA: Quality of AADT:

- A Average of Complete Continuous Count Data
- B Average of Selected Continuous Count Data
- F Factored Short Term Traffic Count Data
- G Factored Short Term Traffic Count Data with Growth Element
- H Historical Estimate
- M Manual Uncounted Estimate
- N AADT of Similar Neighboring Traffic Link
- O Provided By External Source
- R Raw Traffic Count, Unfactored

4Tire: Percentage of the traffic volume made up of motorcycles, passenger cars, vans and pickup trucks.

Bus: Percentage of the traffic volume made up of busses.

**2Axle Truck**: Percentage of the traffic volume made up of 2 axle single unit trucks (not including pickups and vans).

**3+Axle Truck**: Percentage of the traffic volume made up of single unit trucks with three or more axles.

1 Trail Truck: Percentage of the traffic volume made up of units with a single trailer.

2Trail Truck: Percentage of the traffic volume made up of units with more than one trailer.

QC: Quality of Classification Data:

- A Average of Complete Continuous Count Data
- B Average of Selected Continuous Count Data
- C Short Term Classified Traffic Count Data
- F Factored Short Term Traffic Count Data
- H Historical Estimate
- M Mass Collective Average
- N Classification Estimates of Similar Neighboring Traffic Link

K Factor: The estimate of the portion of the traffic volume traveling during the peak hour or design hour.

QK: Quality of the K Factor estimate:

- A Factor based on 30th Highest Hour Observed During at least 250 days of Continuous Traffic Data
- B Factor based on other Hour Observed During Less than 250 days of Continuous Traffic Data
- F Factor based on Highest Hour Collected at in a 48 Hour Weekday Period
- M Factor based on Manual Estimate of design hour
- N Design Hour Factor (K Factor) of Similar Neighboring Traffic Link
- O Provided by External Source

Dir Factor: The estimate of the portion of the traffic volume traveling in the peak direction during the peak hour..

AAWDT: Average Annual Weekday Traffic. The estimate of typical traffic over the period of one year for the days between Monday through Thursday inclusive.

QW: Quality of AAWDT:

- A Average of Complete Continuous Count Data
- B Average of Selected Continuous Count Data
- F Factored Short Term Traffic Count Data
- G Factored Short Term Traffic Count Data with Growth Element
- Manual Uncounted Estimate
- N AAWDT of Similar Neighboring Traffic Link
- O Provided by External Source

Year: Year for which the published values are appropriate. If the Quality of AADT (QA) is "R", the year is the year that the raw traffic count was collected, and if available,

### Route Shield Legend

#### Route Systems

North 81	Interstate Route	Traffic volume data for Interstate Routes and some other routes are reported separately by direction, as well as combined.
29	US Route	

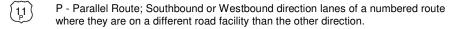
(F241)	Frontage Road (F precedes frontage route number)

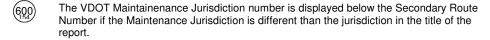
(600) Secondary Route

#### Special Routes

Bus	Bus - Business Route
[29]	Bypas - Bypass Route
	Truck - Truck Route
ALT	ALT - Alternate Route
(220)	Wve - Wve Route connector

Virginia State Route





#### Virginia Department of Transportation Traffic Engineering Division 2016

#### Annual Average Daily Traffic Volume Estimates By Section of Route Town of Strasburg

Route	Jurisdiction	n Longth A		AADT QA		Due		Tru	ıck		QC	K	QK Dir	AAWDT	OW
Houle	Jurisdiction	Lengin	Length AADT		4Tire	Bus	2Axle	3+Axle	1Trail	2Trail	QU	Factor	Factor	AAWDI	QW
	From:	S	CL Strasbur	g											
Stover Ave	Town of Strasburg (Maint: 85)	0.38	7100	G	98%	0%	1%	0%	1%	0%	С	0.113	0.732	7500	G
$\bigcirc$	To:		King St												
	From:		Stover Ave												
King St	Town of Strasburg (Maint: 85)	0.24	7500	G	97%	1%	1%	0%	0%	0%	С	0.113	0.732	7500	G
$\bigcirc$	To:		Holliday St				$\neg$ $\vdash$								
√11 King St	Town of Strasburg (Maint: 85)	0.16	7600	G	98%	0%	1%	0%	1%	0%	F	0.109	0.695	8000	G
(1)	To:		5 Massanutt					.,.		• , •					-
	From:		R 55 King S												
11 55 N Massanutten St	Town of Strasburg (Maint: 85)	0.23	14000	G	98%	0%	0%	0%	1%	0%	F	0.087	0.594	14000	G
	To: From:	SR 55 N	John Mars	hall Hw	у										
N Massanutten St	Town of Strasburg (Maint: 85)	0.70	14000	G	98%	0%	0%	0%	1%	0%	С	0.094	0.588	14000	G
$\bigcirc$	To:	N	CL Strasbu	rg											
	From:	W	CL Strasbu	rg											
55 John Marshall Hwy	Town of Strasburg (Maint: 85)	0.64	3700	G	97%	1%	1%	1%	1%	0%	С	0.091	0.506	3900	G
,	To:	US 11 W. Massanutten St													
	From:	US 1	1 Massanutt	ten St											
(55) (11) N Massanutten St	Town of Strasburg (Maint: 85)	0.23	14000	G	98%	0%	0%	0%	1%	0%	F	0.087	0.594	14000	G
	To:	To: US 11 Massanutten St													
	From:	US 11	E, Massanu	itten St											
(55) King St	Town of Strasburg (Maint: 85)	0.60	7300	G	96%	1%	1%	1%	2%	0%	С	0.095	0.545	7700	G
$\smile$	To		Eberly St												
55 Front Royal Rd	Town of Strasburg (Maint: 85)	0.58	4100	G	96%	1%	1%	1%	2%	0%	F	0.098	0.556	4300	G
<u> </u>	To:		CL Strasbur	rg	/ -	,,,	TÎ.	, -		- / -	•	. ,			-

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# Virginia Department of Transportation Traffic Engineering Division 2016 Annual Average Daily Traffic Volume Estimates By Section of Route Town of Strasburg

						TOWIT OF SITAS	burg								
Route	Length	AADT	QA	4Tire	Bus	Tı 2Axle 3+Axle			QC	K Factor	QK	Dir Factor	AAWDT	QW	Year
Town of Strasburg		From	1			Franklin St									
Third St	0.07	0	R			Trunkini St				NA			NA		08/25/2014
85		To	1			King St									
O Branch Ot	0.00	From	_	000/	00/	Capon St	00/	00/	0	0.100		0.544	400	_	0010
1 Branch St	0.26	430	G	98%	0%	1% 0% Franklin St	0%	0%	С	0.126		0.544	460	G	2016
Orchard St	0.18	290	G	98%	0%	85-1210 Frankli 1% 0%	n St 0%	0%	F	0.122		0.562	300	G	2016
2 Orchard St	0.10	<b>290</b> To	Ğ	30 /6	0 78	US 11 Stover A		0 70		0.122		0.502	300	<u> </u>	2010
		From				2 55 Front Royal Ro	1; King St								
(3) Eberly St	0.10	380 To	G	98%	0%	1% 0%	0%	0%	F	0.113		0.656	400	G	2016
		From	1		85-635	Bowman Hill Rd; I	ECL Stras	ourg		<del></del>					
Aileen Ave	0.28	300	G	98%	0%	Queen St 1% 0%	0%	0%	F	0.174		0.809	320	G	2016
•		To				Dead End									
<u> </u>		From				King St									
5 Sharpe St	0.08	590	G	98%	0%	1% 0% Queen St	0%	0%	F	0.19		0.753	620	G	2016
		From	l			0.30 ME US 1	1			1					
6 Hite Ln	0.30	110	R			0.30 ME US 1	l I			0.206		0.518	NA		10/14/2014
		То	_			US 11 Old Valley	Pike								
6 Radio Station Rd	0.54	1400	R			,				0.114		0.6	NA		10/14/2014
		To				Dead End									
O 5 11' 0'	0.40	From		070/	00/	Orchard St	201	00/				0.500	070	_	0010
1966 Franklin St	0.18	350	G	97%	2%	0% 1% Branch St	0%	0%	С	0.109		0.539	370	G	2016
		From				85-638 WCL Stra	sburg			1					
(1967) Ash St	0.77	1000	G	98%	1%	1% 0%	0%	0%	С	0.095		0.552	1100	G	2016
$\overline{}$		To From				306-1971 Capor	n St								
(1967) Washington St	0.37	2800	G	98%	1%	1% 0%	0%	0%	F	0.093		0.655	2900	G	2016
$\frac{\circ}{\circ}$		To From				US 11 N Massanu				$\Box$					
(1967) Washington St	0.43	1800	G	99%	0%	0% 0%	0%	0%	С	0.11		0.556	1900	G	2016
<u> </u>	0.40	From		200/	00/	Virginia St	00/	00/				0.500		_	0010
(1967) Washington St	0.18	790	G	99%	0%	0% 0% Eberly St; ECL Str	0%	0%	F	0.103		0.562	830	G	2016
		From				King St	asouig			+					
(1971) Capon St	0.16	2700	G	99%	0%	1% 0%	0%	0%	F	0.116		0.757	2800	G	2016
$\overline{\bigcirc}$		To	1			Branch St				$\neg$ —					
(1971) Capon St	0.50	2000	G	99%	0%	1% 0%	0%	0%	С	0.126		0.762	2100	G	2016
		To				SR 55 John Marsha									
(1974) Holliday St	0.30	Prom 2500		0/10/	10/	85-648 SCL Stras		00/	<u> </u>	0.249	_	0.550	2600	C	2016
(1974) Holliday St	0.30	2500	G	94%	4%	1% 0%	1%	0%	С	0.248		0.558	2600	G	2016
(1974) Holliday St	0.07	4200	G	94%	4%	High St 1% 0%	1%	0%	F	0.239		0.594	4500	G	2016
Holliday St	0.07	<b>4200</b>		0 + 70	770		170	0 70	•	0.200		0.004	4000	ď	2010
(1974) Holliday St	0.08	3100 From	G	94%	4%	Queen St 1% 0%	1%	0%	F	0.177		0.529	3200	G	2016
		To				US 11 King S									
(1974) Holliday St	0.08	1700	G	94%	4%	1% 0%	1%	0%	F	0.123		0.668	1800	G	2016
$\overline{}$		To				Washington S									
<u> </u>		From				Sharpe St		2		<u> </u>					
(1975) Queen St	0.19	510	G	97%	2%	1% 0%	0%	0%	F	0.167		0.749	540	G	2016
Ougan Ot	4 40	From		0701	001	Holliday St	00/	001				0.500	0700		0010
(1975) Queen St	1.10	2500 To	G	97%	2%	1% 0% SR 55 Front Roys	0%	0%	С	0.161		0.596	2700	G	2016
						SIC SS TIOHI KOY	ur INU								

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# Virginia Department of Transportation Traffic Engineering Division 2016 Annual Average Daily Traffic Volume Estimates By Section of Route Town of Strasburg

Route	Length	AADT	QA	4Tire	Bus	2Axle	Tru 3+Axle	ıck 1Trail		QC	K Factor	QK	Dir Factor	AAWDT	QW	Year	
Town of Strasburg		From				ī	ligh St										
Fort St		180	G				ngn St				0.15		0.571	180	G	2016	
		To	Queen St														
_		From:		East Queen Street													
Massanuten Street		3100	G	97%	1%	1%	0%	0%	0%	С	0.095		0.589	3100	G	2016	
		To:		SR 55 King Street													
		From				1	US 11										
Thompson Street		800	G	99%	0%	0%	0%	0%	0%	С	0.105		0.747	800	G	2016	
		To:				Le	e Street										

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