Seattle Department of Transportation

2017 TRAFFIC REPORT

*2016 data

Seattle Department of Transportation

VISION ZERO
SAFER STREETS FOR SEATTLE


DELTA DEN

CONTENTS


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EXECUTIVE SUMMARY

As Seattle continues to grow, we look to our data to monitor trends and respond to needs citywide. The annual Traffic Report presents a review of the core data sets the Seattle Department of Transportation (SDOT) collects and maintains.

Seattle's population grew by 2.9% last year inviting 19,901 new neighbors into our community. In terms of how people are getting around the city, we continue to have an impressive commute mode split – nearly 50% of trips are made by means other than driving alone. For those commuting downtown, more than 70% are taking transit, carpooling, biking, or walking. City's average daily traffic volumes remain unchanged in 2016, compared to 2.6% increase in all state highways in Washington State.

Bicycle volumes from our permanent counters show 2.6% decrease in ridership from 2015. Ridership is expected to increase as we build and connect our bicycle network identified in the Bicycle Master Plan. Our 2nd Ave protected bike lanes have seen nearly triple the number of riders since 2014.

Transit ridership increased by 4.8% in the last year. Transit service continues to sustain our transportation system and Seattle residents made it clear that transit service is a priority by approving Proposition 1 in November 2014, which provides more service hours to 85% of bus routes.

In February 2015, Seattle launched our Vision Zero initiative to end traffic deaths and serious injuries by 2030. It's an aggressive goal that will be guided by data and a desire to improve safety for everyone who travels in and around Seattle's streets, no matter how they get around. Twenty fatal collisions occurred in 2016, which is one less than the prior year. Of the twenty fatal collisions, five involved people walking and three involved people riding bicycles. Speeding was cited in five incidents, driving under the influence of alcohol in three incidents, driver distraction in three incidents, and did not grant right of way to pedestrian in two incidents.

Scott Kubly, Director
Seattle Department of Transportation

Dongho Chang, P.E., City Traffic Engineer
Seattle Department of Transportation


P. Patches Pl
Fremont Ave N St
704

TRAFFIC VOLUMES AND SPEEDS

The Seattle Department of Transportation (SDOT) collects and maintains volume data for vehicles (including trucks), pedestrians, and bicycles. Engineers and planners use volume data to select future project locations, support grant applications, and track the performance of traffic projects once they are installed.

SDOT also collects vehicle speed data. Speed data is particularly useful for making traffic safety decisions such as those connected with traffic calming, Safe Routes to School, Seattle's Vision Zero Plan and crossing improvements.

Speed data can also be reprocessed into vehicle classification data that categorizes vehicles in up to 13 different groups, including motorcycles, cars, and numerous types of trucks. Such data gives planners and engineers a better understanding of the movement of goods within the city.

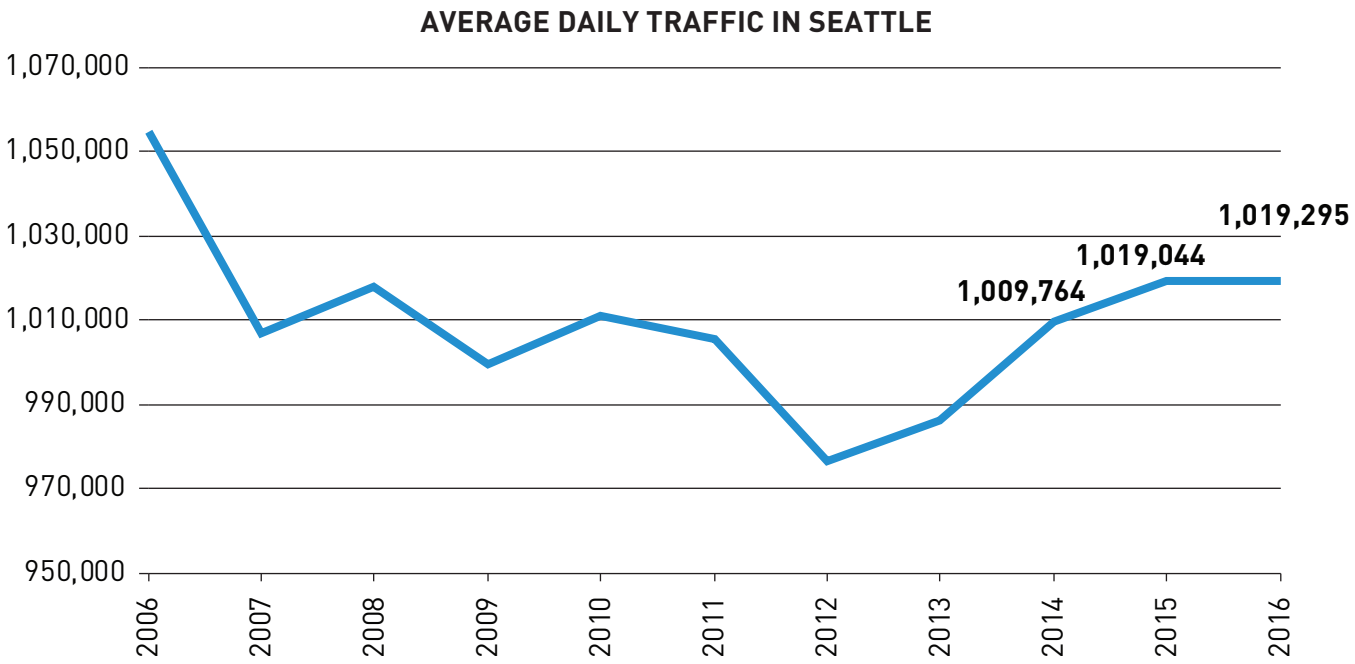
Traffic volumes, speeds, and reported collisions are the three cardinal pieces of data traffic engineers and planners use to evaluate changes to Seattle streets.

MOTOR VEHICLE VOLUMES

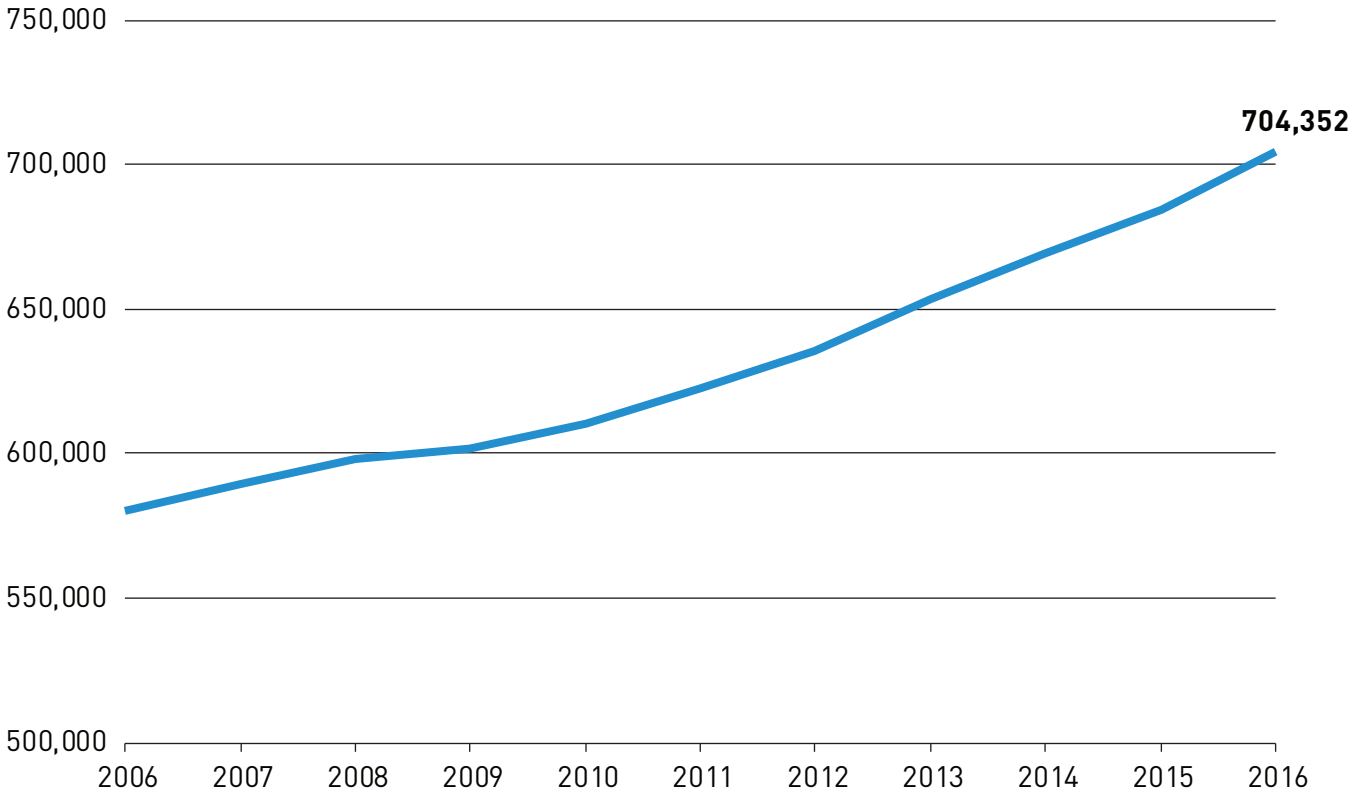
SDOT is responsible for measuring traffic volumes on certain city arterial streets each year. Traffic counts are taken throughout the year at 20 control count locations, 164 screen line locations and 111 additional locations.

At 20 locations, SDOT conducts control counts every month. These counts are used to create a monthly control factor. This factor can be applied to every count we take to adjust for seasonal changes in traffic. In addition, SDOT measures vehicle volume at 164 screen line locations. These locations are identified in Seattle's Comprehensive Plan, and the counts are used to determine screen line levels of service as required by the plan. We also measure vehicle volume at 111 additional locations each year. The locations of control, screen line, and other regular counts are shown on maps in the appendix. SDOT also measures volume at ad hoc locations throughout the year as needed for traffic analysis and engineering studies.

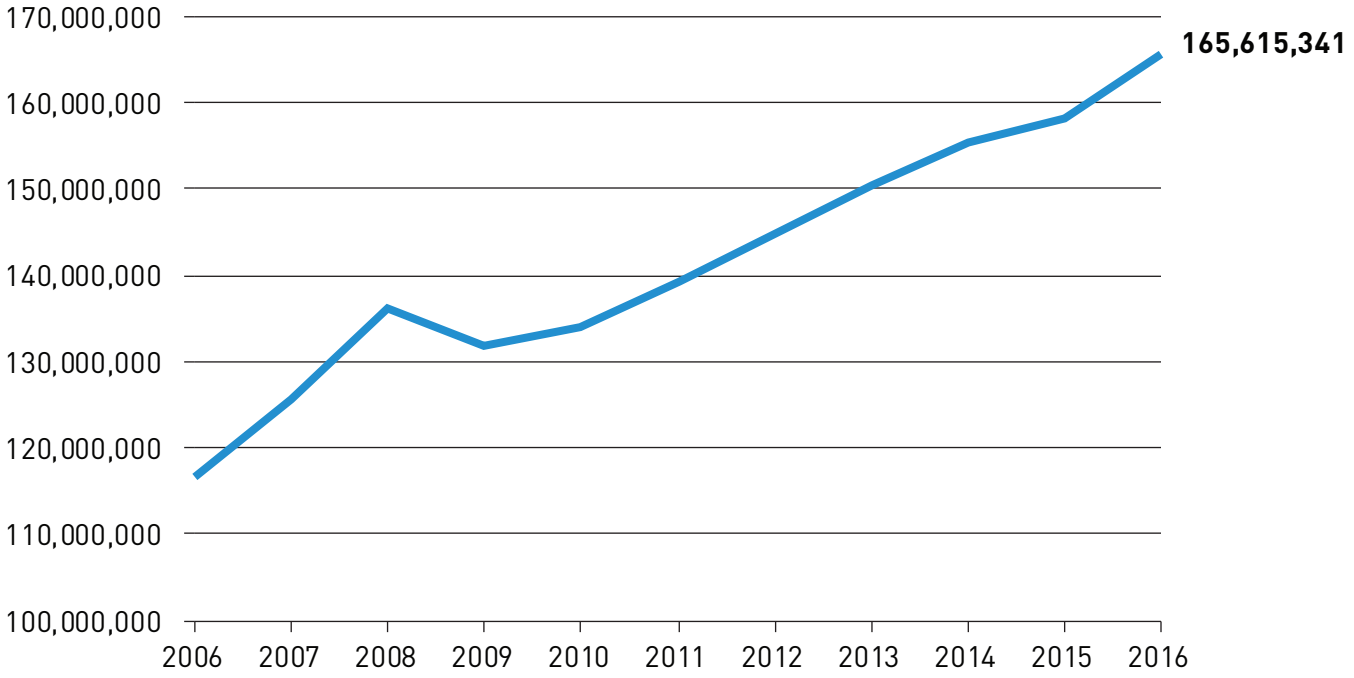
Using the annual counts taken at 19 of Seattle's bridges (including I-90, SR 520, and 1st Ave S), SDOT derives a proxy number for citywide motor vehicle average daily traffic (ADT). Volumes are trending upward with traffic counts increasing since 2012. Traffic volumes remain unchanged, however, from 2015 to 2016. The following graph of Seattle's ADT shows overall trend since 2006. Population, employment, and transit ridership trends are also shown in graphs, along with commute mode share for context.



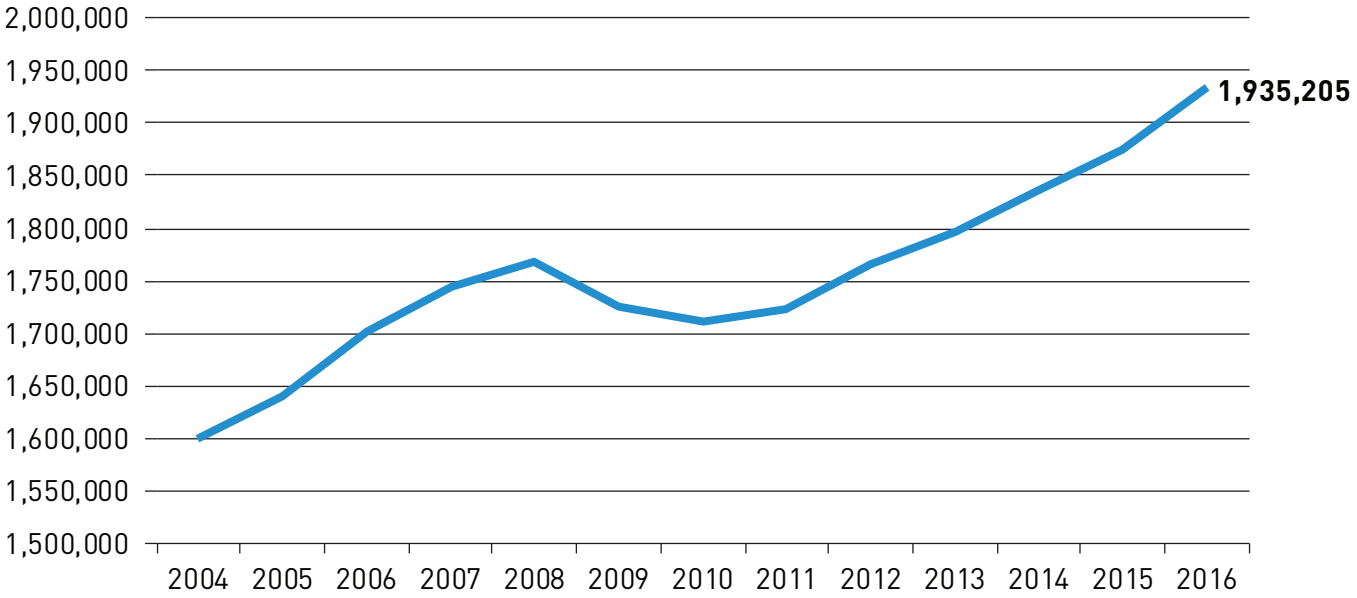
SEATTLE POPULATION



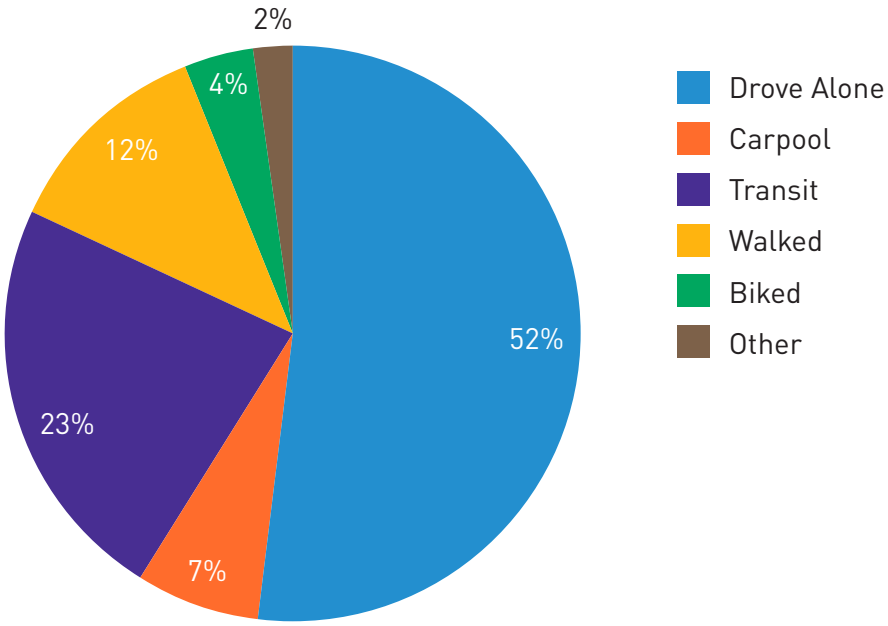
TRANSIT RIDERSHIP



AVERAGE ANNUAL EMPLOYMENT - SEATTLE, TACOMA, BELLEVUE



2016 SEATTLE COMMUTE MODE SHARE*



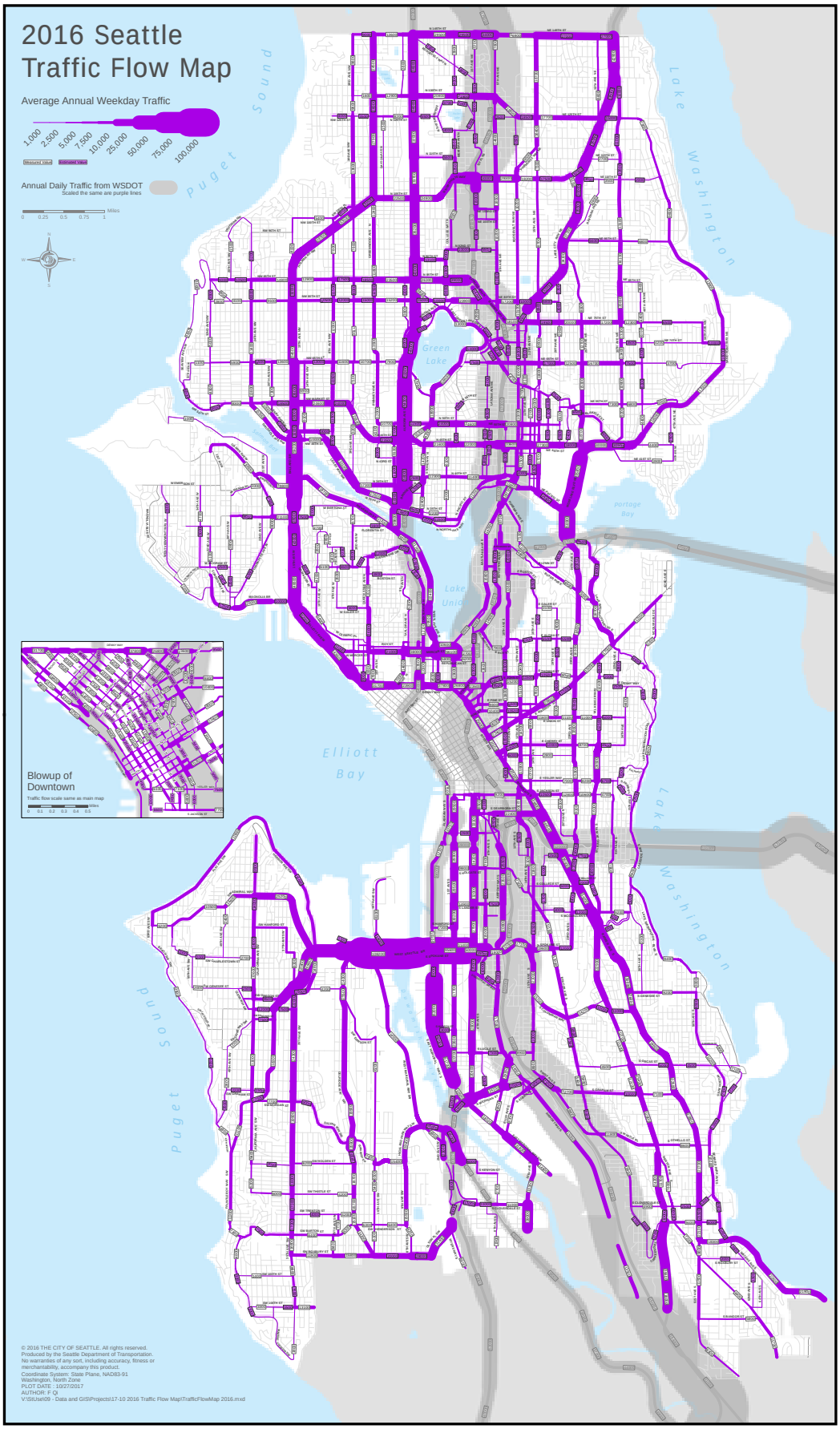
*2016 American Community Survey

TRAFFIC FLOW MAP

The 2016 Traffic Flow Map is one of the products of the volume counts program. The volumes on the map represent the Average Annual Weekday Traffic (AAWDT) (5-days, 24-hour) for that section of roadway. A full-size version of this map is available on SDOT's website at: www.seattle.gov/transportation/document-library/reports-and-studies

In 2016 the top ten arterials for traffic volume includes four streets that were not on the list in 2015: Montlake Blvd NE, north of NE Pacific Pl, Fremont Bridge, 1st Ave S Bridge, and Rainier Ave S, Southeast of S Dearborn St. The West Seattle Bridge east of the Delridge ramps continues to be the busiest city street, as measured by SDOT.

Top 10 Arterials by Volume	Average Week Day Traffic (AWDT)
West Seattle Bridge (EB&WB), west of Alaska Way Viaduct	137,400
East Marginal Way S, South of S Alaska St	68,000
Montlake Bridge	63,100
Ballard Bridge	60,400
Montlake Blvd NE, north of NE Pacific Pl	55,800
Fremont Bridge, north of Point A	52,200
1st Ave S Bridge	50,900
S Michigan St, west of 4th Ave S	49,000
15th Ave W, north of W Armory Way	46,600
Rainier Ave S, Southeast of S Dearborn St	44,500


2016 Seattle
Traffic Flow Map
Average Annual Weekday Traffic
1,000
2,500
5,000
7,500
10,000
25,000
50,000
75,000
100,000
Annual Daily Traffic from WSDOT
Scaled the same are purple lines
Miles
Blowup of
Downtown
Traffic flow scale same as main map
Puget Sound
Lake Washington
Green Lake
Portage Bay
Lake Union
Elliott Bay
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merchantability, accompany this product.
Coordinate System: State Plane, NAD83-91
Washington, North Zone
PLOT DATE: 10/27/2017
AUTHOR: F.Qi
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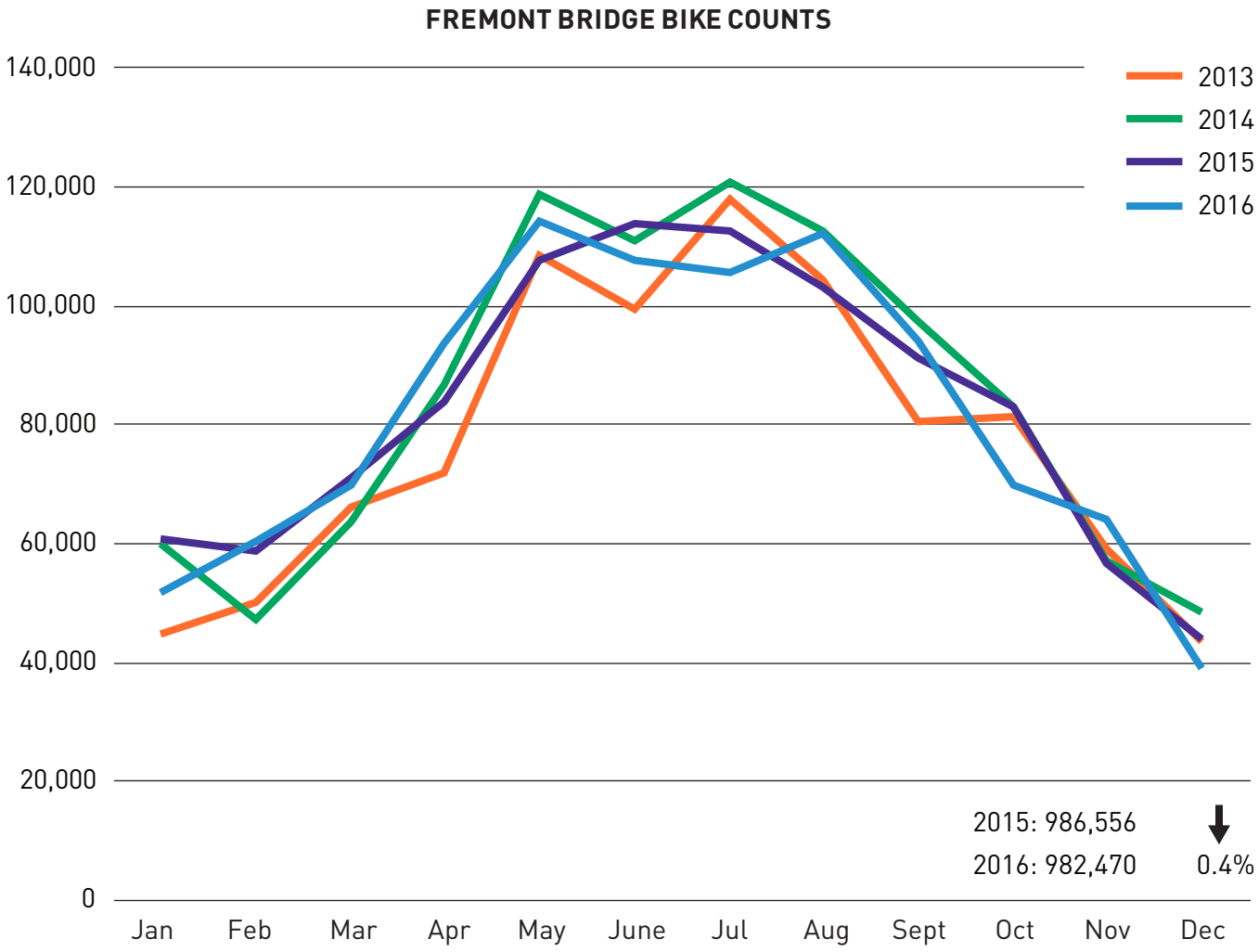
BICYCLE VOLUMES

In 2016, SDOT collected bicycle volume data with three different programs: automated permanent bicycle counters at 10 locations, 163 multiday short counts, and regular spot counts at 50 intersections.

Automated Bicycle Counters

In October 2012, the Fremont bridge totem was installed to count bikes crossing the bridge on both walkways of the bridge. These counts show both hourly and daily patterns for bike volume and allow the effects of weather and other factors to be evaluated. This is the third full year of complete data for the Fremont bridge bike counter. The total bike volume for 2016 was just little under a million at 982,470, which represents 0.4% reduction in bike volume from 2015.



Fremont Bridge Totem 2016	
Total	982,470
Peak Day	Mon, 2 May, 2016 (5,656)
Minimum Day	Thu, 24 Nov, 2016 (179)
Max Day of the Week	Tuesday
Hourly Average	112
Daily Average	2,684
Average Workday Traffic	3,233
Average Weekend Traffic	1,322
Weekly Average	18,790
Monthly Average	81,705

Site	2015 Annual Count	2016 Annual Count
39th Ave Greenway at 62nd St	93,794	80,788
Burke Gilman north of NE 70th St	414,548	405,393
Elliott Bay in Myrtle Edward Park	446,800*	411,192
Fremont Totem	986,556	982,470
MTS west of I-90	252,500	231,177
Spokane St Bridge	299,550	297,474
Broadway	99,595	114,399
Total	**2,593,343**	**2,526,822**

*Volumes estimated for March.

2016 marks the fourth continuous year of full counts from ten permanent bike counters that were installed at the end of 2013 on multi-use trails and neighborhood greenways. These counters capture bike volume by direction; additionally, three locations capture pedestrian volume. These counts give a better illustration of daily bike ridership throughout the city.

Permanent counters that have reliable data for current and past year will be used to track bicycle ridership trends. A map with all the permanent bike counter locations can be found in the appendices as well as the overall numbers from each counter. Seven continuous count sites had no physical changes from 2015 to 2016 and provided good baseline data. Bicycle volume decreased by 2.6% from 2015 to 2016 based on total counts at these seven permanent count locations.

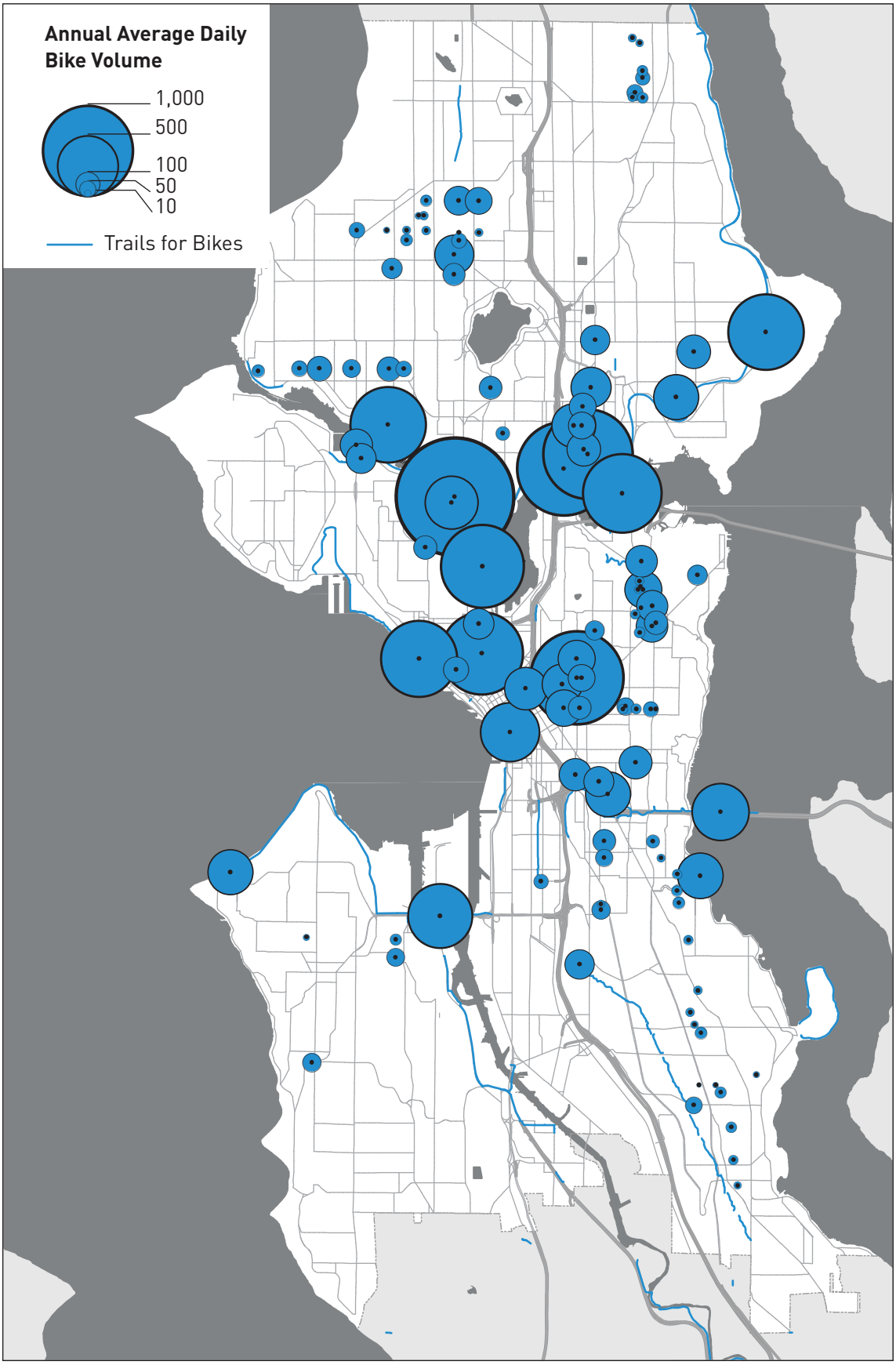
Multiday Short Counts

In 2016 we conducted 163 machine short counts in different parts of the city in addition to the spot counts. These counts are a better indication of bike ridership since they capture at least one week of data instead of the 2-hour window of the spot counts. Some of these counts support the Bicycle Master Plan's ridership performance measure and will be counted on annual basis going forward.

Using data from our permanent counters we created daily volume factors that allowed us to extrapolate our short counts into annual volume estimates for each short count location (as per NCHRP report 797). This data, along with that from our permanent counters, is mapped on the next page as annual average daily bicycle volume. Because of the high seasonal variation in bike volumes, the daily summer volume is often three times the annual average daily volume. Similarly, the daily volume in the winter is lower.


seattle.gov/ePARK
OPEN
SEAPARK
WATERFRONT DIST 1218
RETAIL DISTRICT 949
PSP/COBB 424

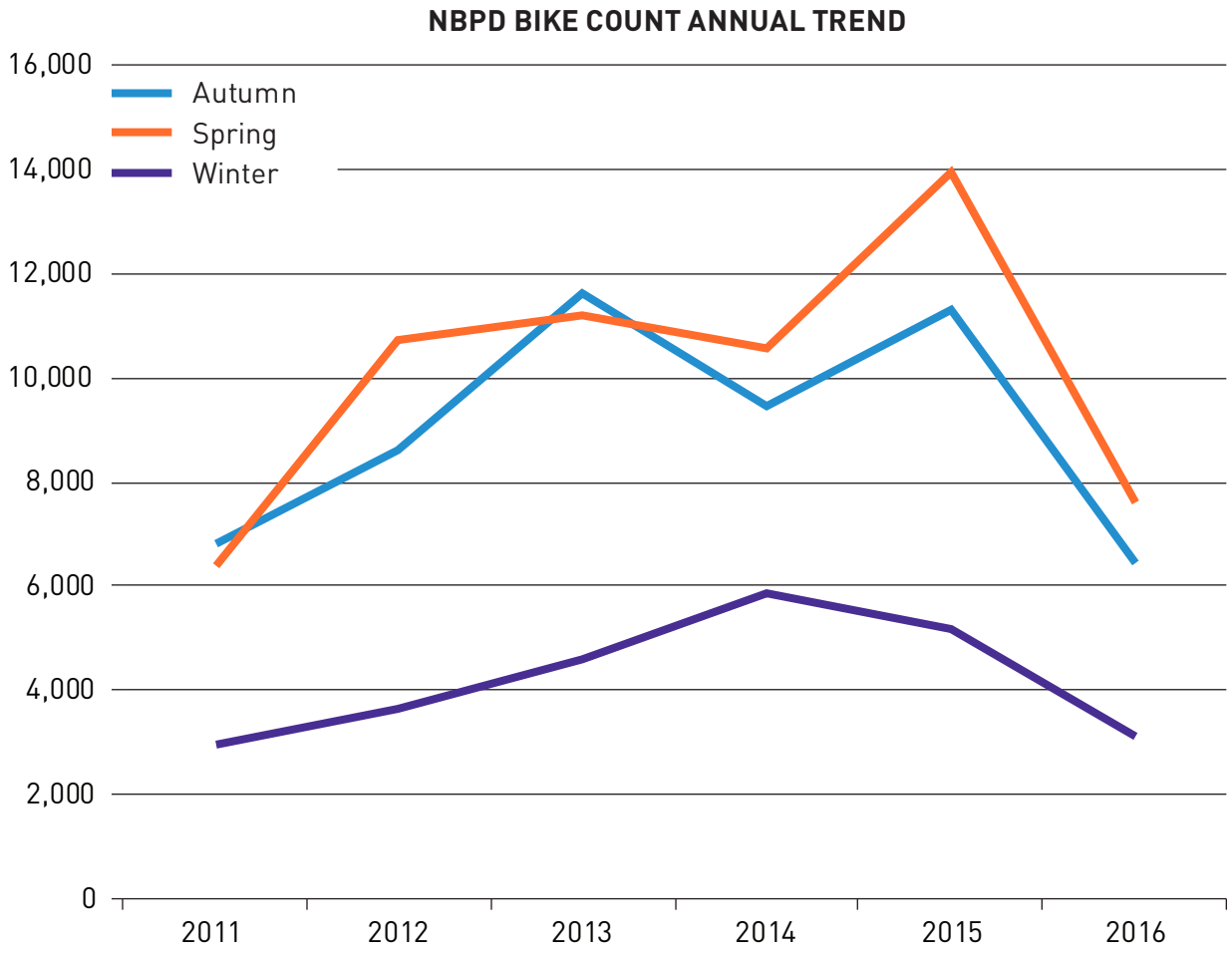
2016 AVERAGE DAILY BIKE VOLUMES



Spot Bike Counts

In 2011 SDOT began a systematic bicycle counts program that uses National Bicycle and Pedestrian Documentation (NBPD) methodology to count bicycles and pedestrians at 50 locations citywide multiple times a year. In 2016 these counts were conducted in January, May, and September. Each month counts are collected for PM peak (5-7 PM), off peak (10 AM-noon), and Saturday (noon-2 PM) time periods at each location. In 2014 we removed the July counts since the days these were conducted landed on the week of the July 4th. We observed that these counts don't correctly show true ridership numbers.

In 2016, the quarterly citywide program counted 17,193 cyclists for the months of January, May and September. The overall number of cyclists counted decreased at these valid count locations. Weather played a factor to these counts due to being on the same day. Weather impacts ridership in which lower volumes will be recorded. We also conduct short counts in different locations and have permanent counters. These counts provie a better assessment on daily ridership due to longer periods of counts. From the NBPD count analysis Alaskan Way and Broad St showed the most overall ridership with 1,383 total riders.



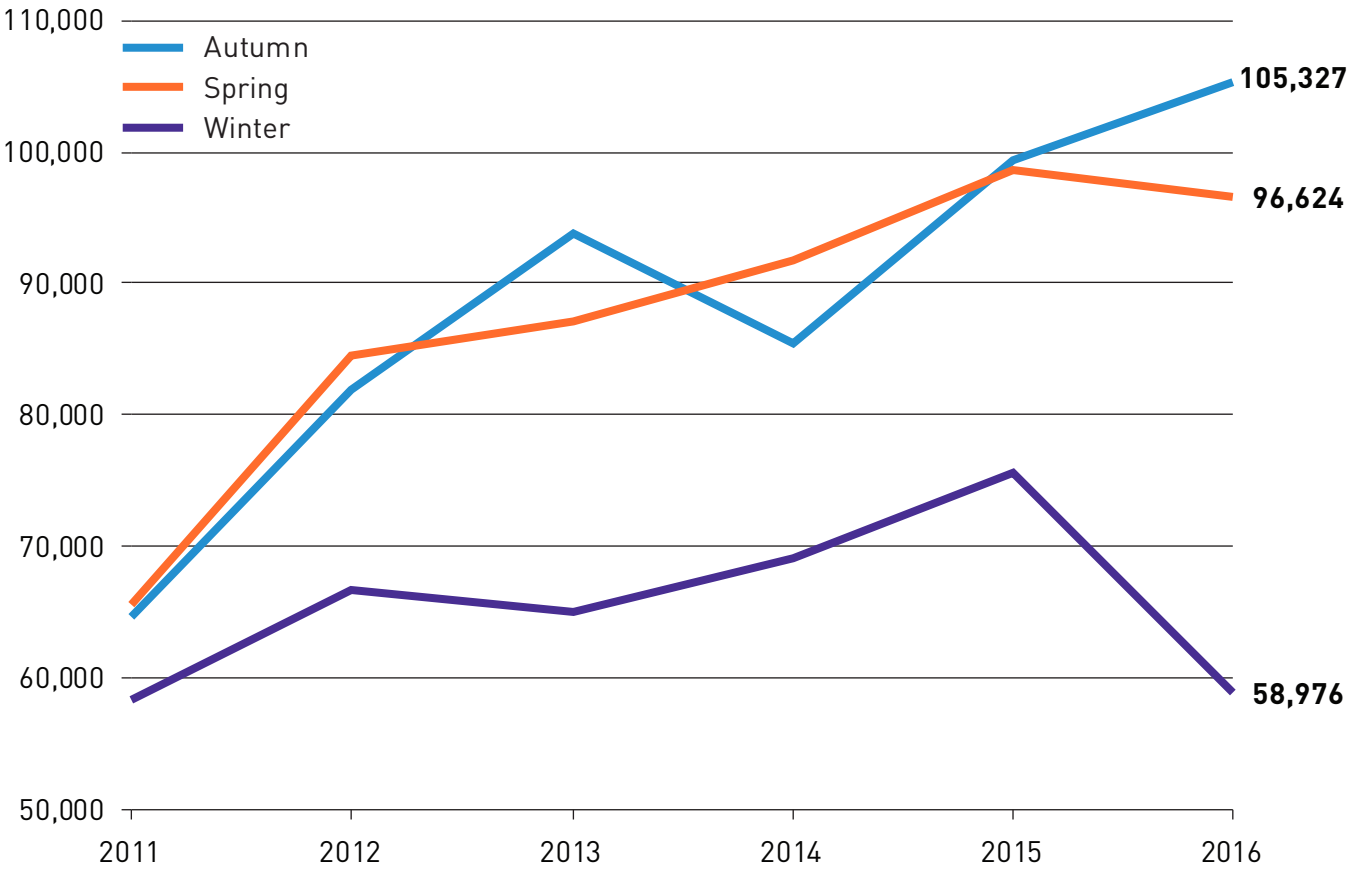
PEDESTRIAN VOLUMES

SDOT has been using the Downtown Seattle Association's downtown pedestrian counts from the summer and holiday season since 2007 as a measure of pedestrian volumes. This data has been omitted from this year's report because the counts have been discontinued. Beginning in 2011, SDOT began collecting quarterly citywide counts using the National Bike and Pedestrian (NBPD) methodology. Pedestrian volume is also being recorded at the newly installed permanent multi-sue trail counter locations. The map of these locations can be found in the appendices.

Quarterly Citywide Pedestrian Counts

In 2011, SDOT started using the National Bicycle and Pedestrian Documentation project methodology for counting bicycles and pedestrians. These spot counts provide consistent, annual pedestrian volumes that we can track over time. Each count is conducted at an intersection and records the number of pedestrians crossing each leg of the intersection. Since these counts are collected in conjuction with the quarterly bicycle counts, they share the January, May, July, and September count dates as well as the PM peak (5-7pm), off peak (10am-noon), and Saturday (noon-2pm) time periods.

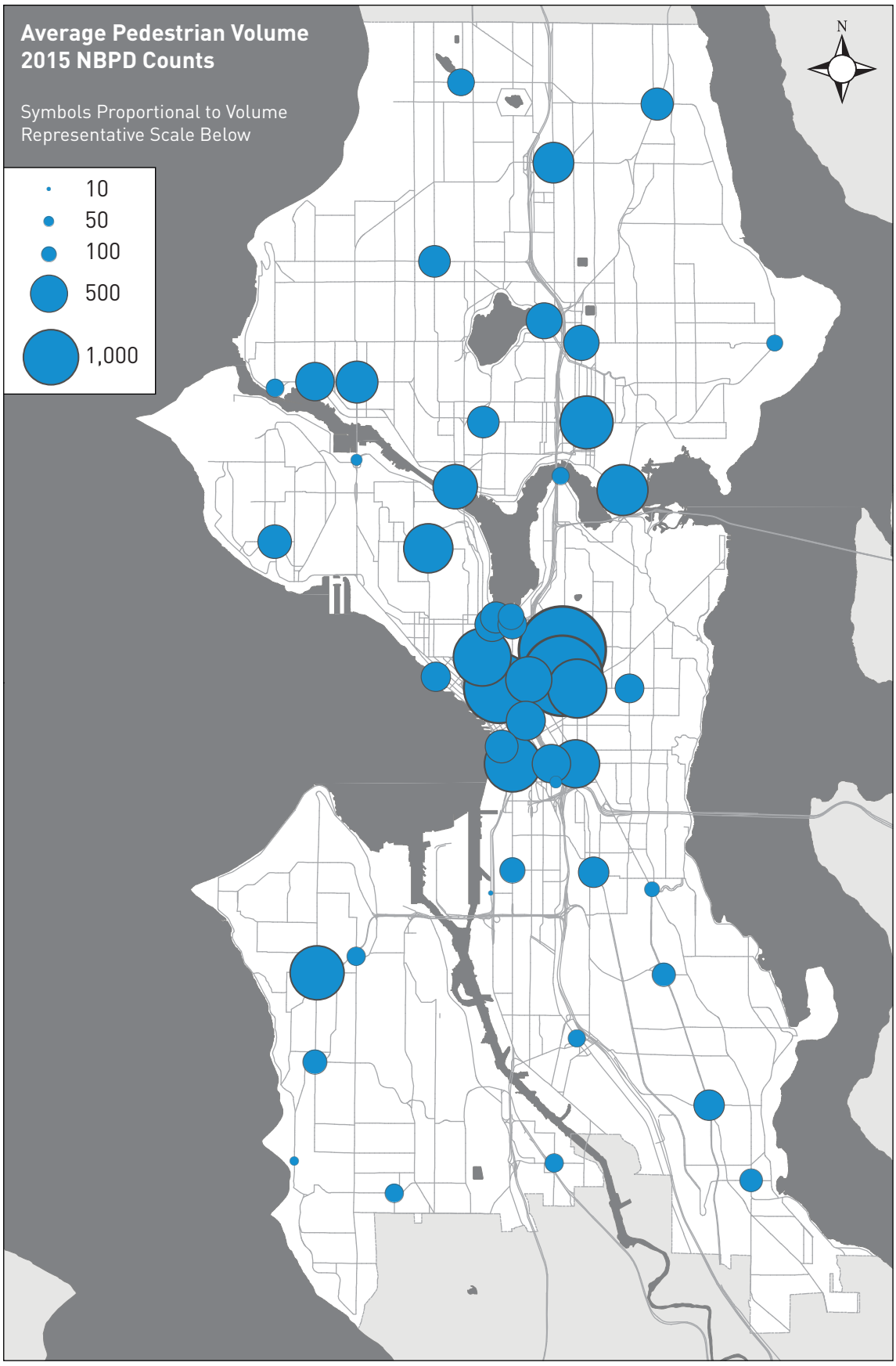
NBPD PEDESTRIAN COUNT ANNUAL TREND



This ongoing program expands SDOT's pedestrian data beyond the city center; it also provides insight into seasonal and daily pedestrian patterns. A chart of the trends in this data is presented. In general, volumes have consistently increased for each season year over year, except for the summer season, which is highly variable from year to year due to the fact the counts are conducted during the Fourth of July holiday week. With this, we have decided to remove those counts and rely on our other permanent counters.

The total number of pedestrians counted in 2016 by the program was 260,927. The busiest pedestrian location counted in 2016 was at Broadway and East Olive Street with 22,539 total pedestrians counted. The following map shows the total pedestrian volumes for each location counted in 2016. Details of the 2016 counts by location are available on the web at http://data.seattle.gov.

AVERAGE VOLUMES FOR 2016 PEDESTRIAN COUNTS



MOTOR VEHICLE SPEEDS

Starting in 2010, SDOT began collecting speed data at consistent locations each year, in addition to the ad-hoc locations that serve site-specific traffic evaluation needs. SDOT also collects vehicle speeds for purposes of traffic safety investigations, prospective project selection and design, and for evaluation of completed projects.

Engineers gauge speed several different ways, including the 85th percentile speed of traffic and high-end speeder percentage. The 85th percentile measure is the most commonly used and represents the speed at or below which 85 percent of traffic travels. The high-end speeder percentage is the percentage of drivers who exceed the posted speed limit by 10 miles per hour or more.

Aurora Ave N, Stone Way N, Fauntleroy Avenue SW, 24th Avenue NW, and Rainier Avenue S are all specified in the Pedestrian Master Plan as locations to report on trends in the 85th percentile speed of traffic. The 2016 results for these locations are listed in the table below. For more results of the speed studies program, see the Supporting Data section.

Location	Direction	85th Percentile Speed	High End Speeder Percentage	Speed Limit
Aurora Ave N S/O N 112 St	NB	42	5.0%	35
Aurora Ave N S/O N 112 St	SB	43.7	9.6%	35
Stone Way N S/O N 45 St	NB	25.9	0.0%	30
Stone Way N S/O N 45 St	SB	24.8	0.0%	30
24th Ave NW S/O NW 80 St	NB	31	0.0%	30
24th Ave NW S/O NW 80 St	SB	30.8	0.0%	30
Rainier Ave S NW/O S Holly St	NWB	39.1	11.7%	30
Rainier Ave S NW/O S Holly St	SEB	37.1	7.3%	30
Fauntleroy Way SW S/O SW Alaska St*	NB	ND	ND	30
Fauntleroy Way SW S/O SW Alaska St*	SB	ND	ND	30

*Data unavailable due to construction activity.


N 34th St

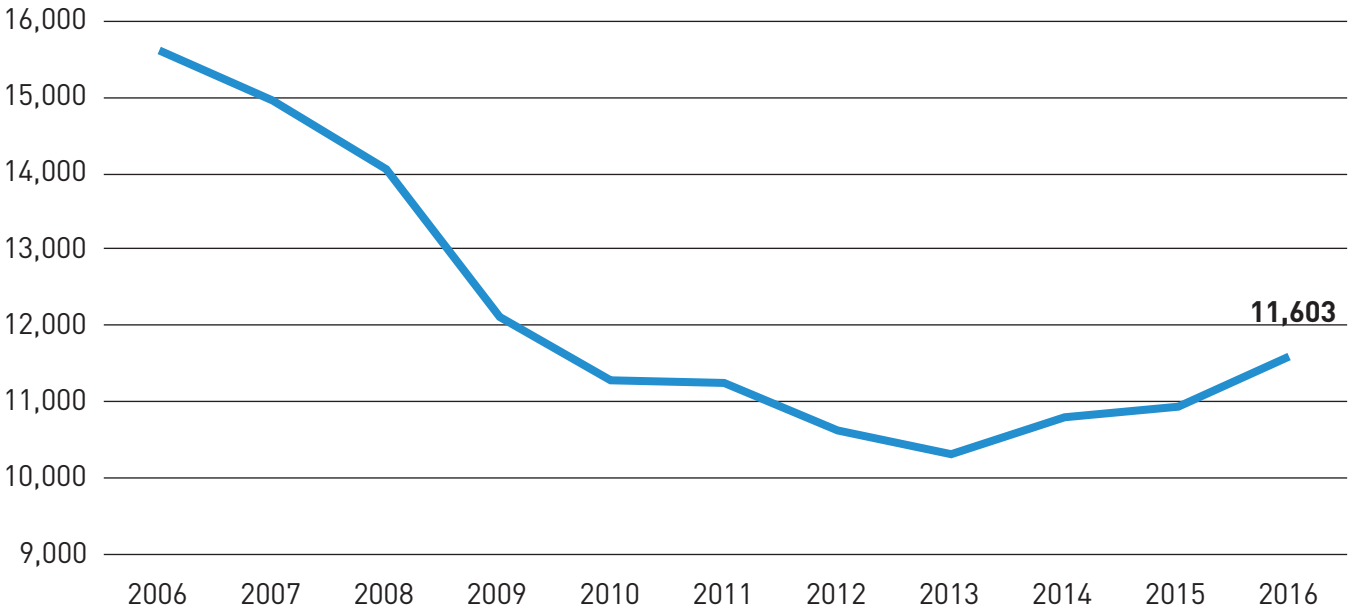
TRAFFIC COLLISIONS

While most collisions result from road user error or inattention, collision data can be used to help gauge the effectiveness of engineering and enforcement efforts. Collision data helps identify locations that may benefit from additional engineering treatments or enhanced enforcement efforts.

There were 11,603 police reported collisions on Seattle streets in 2016. In addition, there were 2,038 self-reported collisions, which are not included in our analysis due to reliability and completeness factors. The number of Seattle collisions increased slightly since 2013. The trend for all types of reports is listed on the Supporting Data section.

There were 11,603 collisions in 2016 on Seattle streets reported by police.

POLICE REPORTED COLLISIONS ON SEATTLE STREETS

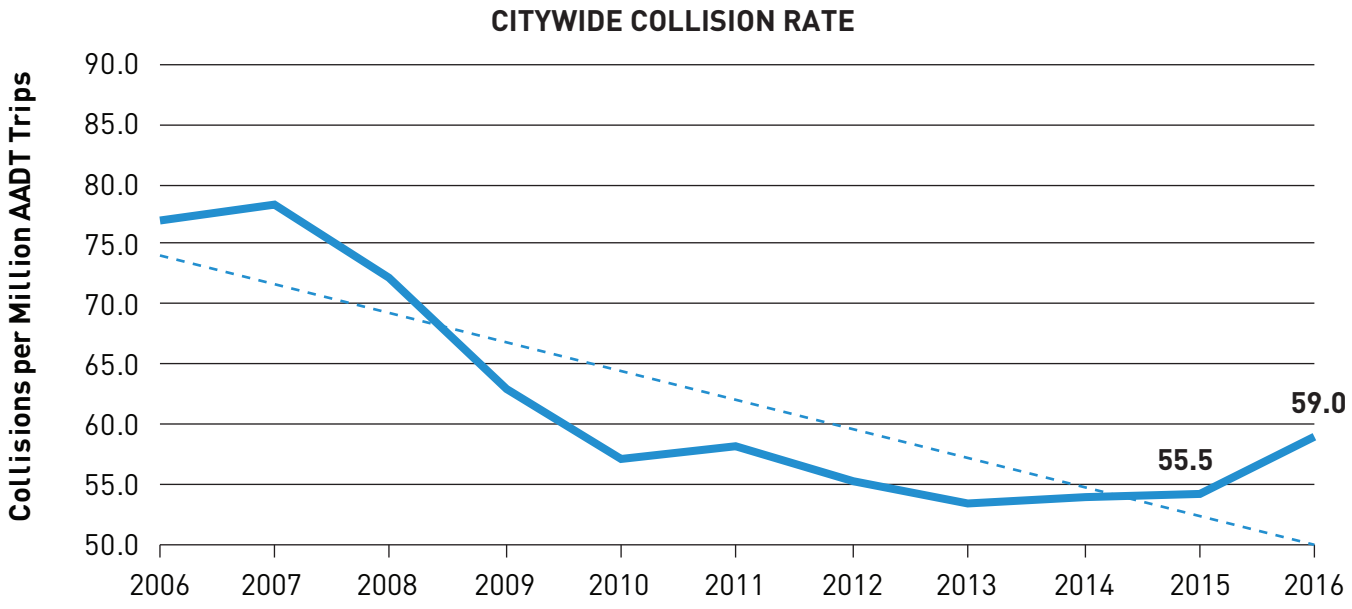


CITYWIDE COLLISION RATE

The collision rate increased by 6.3% from 2015 to 2016.

The rate that SDOT uses is the number of police reported collisions per Average Annual Daily Trips (AADT). The AADT used is a citywide approximation of arterial traffic volumes and in this case, it has been adjusted to exclude volumes on I-5, I-90 and SR-520 because our collision data do not include collisions on these roadways. The 16th Ave S Bridge counts have been included into the ADT. The count for 2014 has been added to the years 2011, 2012 and 2013 since the counts were not done that year due to closure for construction.

Year	Police Reported Collisions	Average Daily Traffic	AADT	Citywide Collision Rate
2005	15,744	543,444	198,357,060	79.4
2006	15,625	555,997	202,938,905	77.0
2007	14,971	523,342	191,019,830	78.4
2008	14,037	531,930	194,154,450	72.3
2009	12,101	525,758	191,901,732	63.1
2010	11,288	541,170	197,527,114	57.1
2011	11,240	529,988	193,445,620	58.1
2012	10,614	524,732	191,527,180	55.4
2013	10,310	528,174	192,783,510	53.5
2014	10,815	549,655	200,624,075	53.9
2015	10,930	539,600	196,954,000	55.5
2016	11,603	539,106	196,773,690	59.0

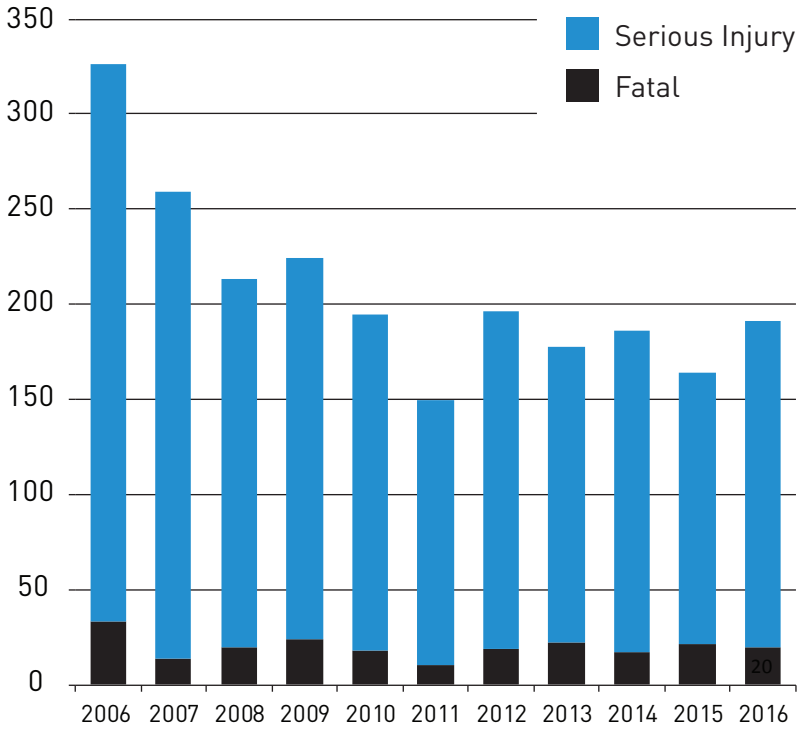


FATAL AND SERIOUS INJURY COLLISIONS

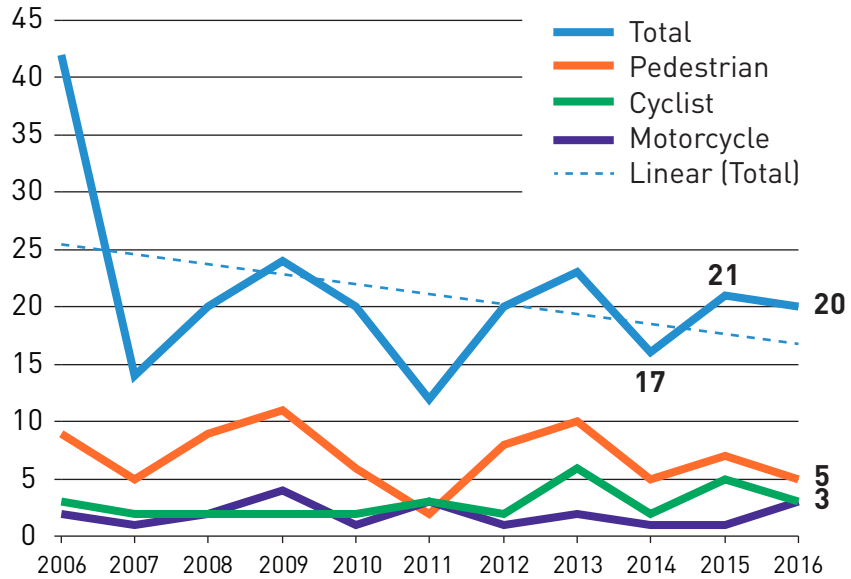
This chart below shows the trend of fatal and serious injury collisions on Seattle streets since 2004. The Vision Zero Action Plan set out a goal of reducing these collisions to zero. The 2016 total of 191 fatal and serious injury collisions represents 16.5% increase from 2015.

In 2016, there were 20 fatalities on Seattle streets. These numbers do not include incidents on limited access State Highways and Interstates, but do include incidents on the Alaskan Way Viaduct. Details of each fatality and tables of historical trends can be found in the appendices.

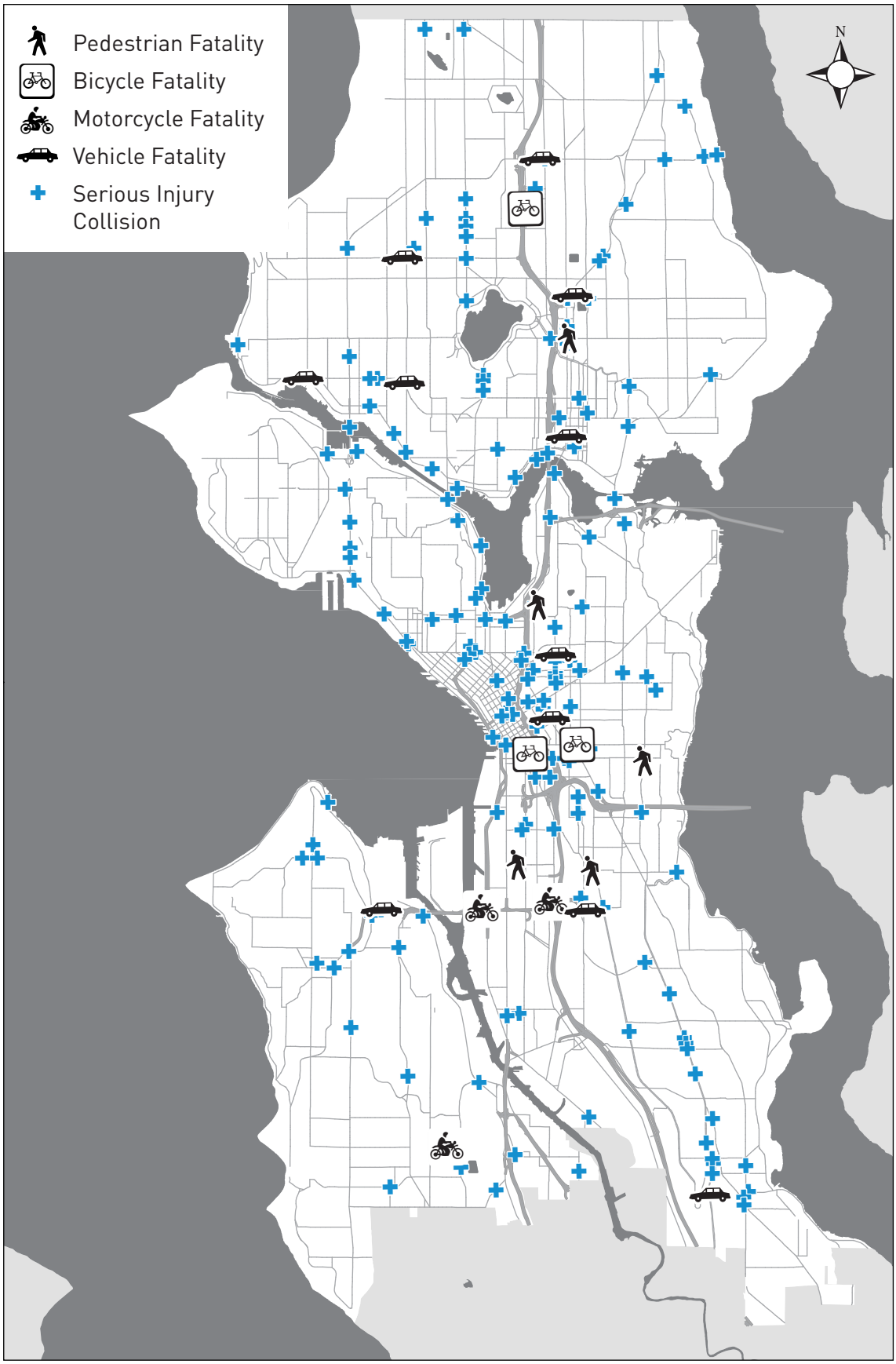
FATAL/SERIOUS INJURY COLLISION TREND



TRAFFIC FATALITIES ON SEATTLE STREETS



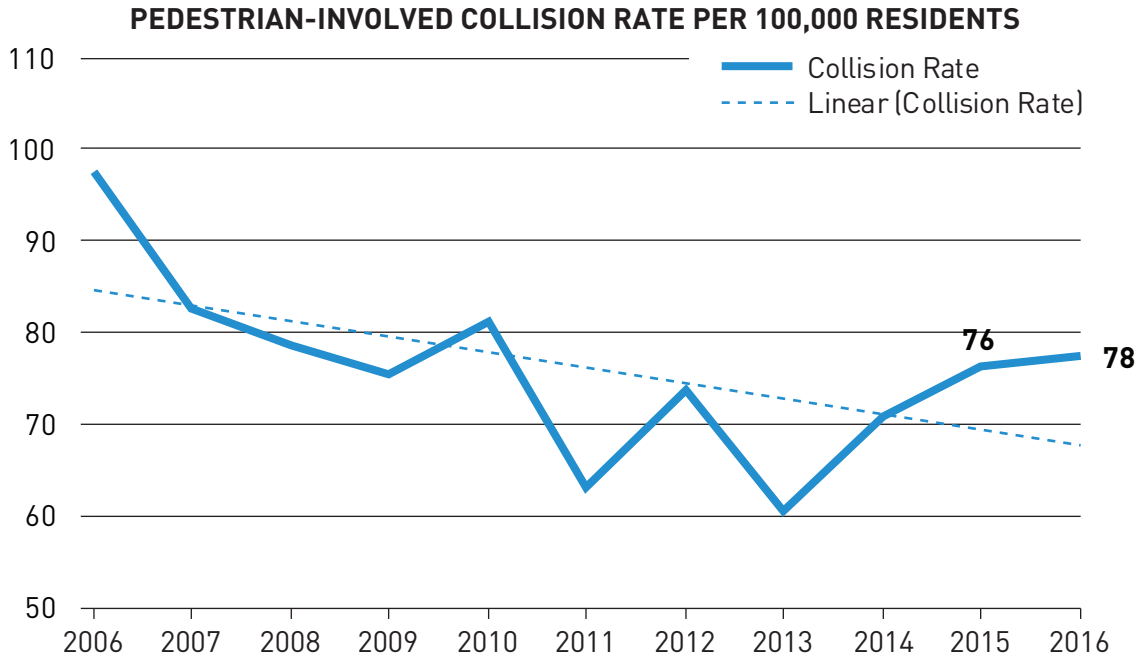
2016 SERIOUS AND FATAL COLLISION LOCATIONS ON SEATTLE STREETS

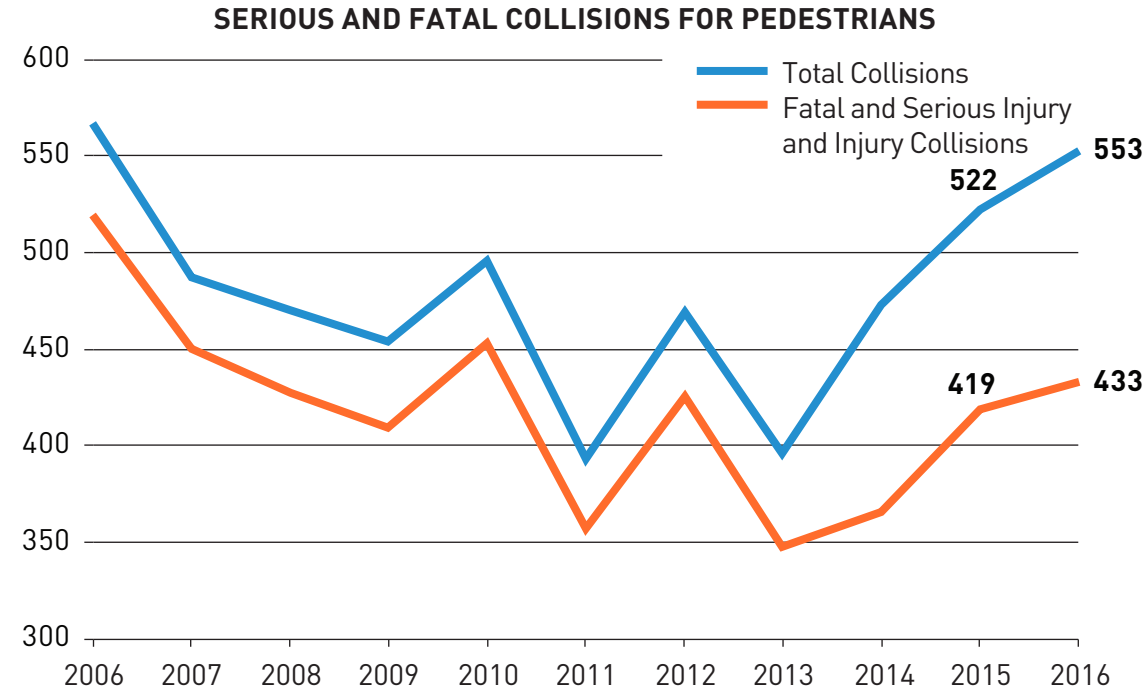


PEDESTRIAN COLLISION RATE

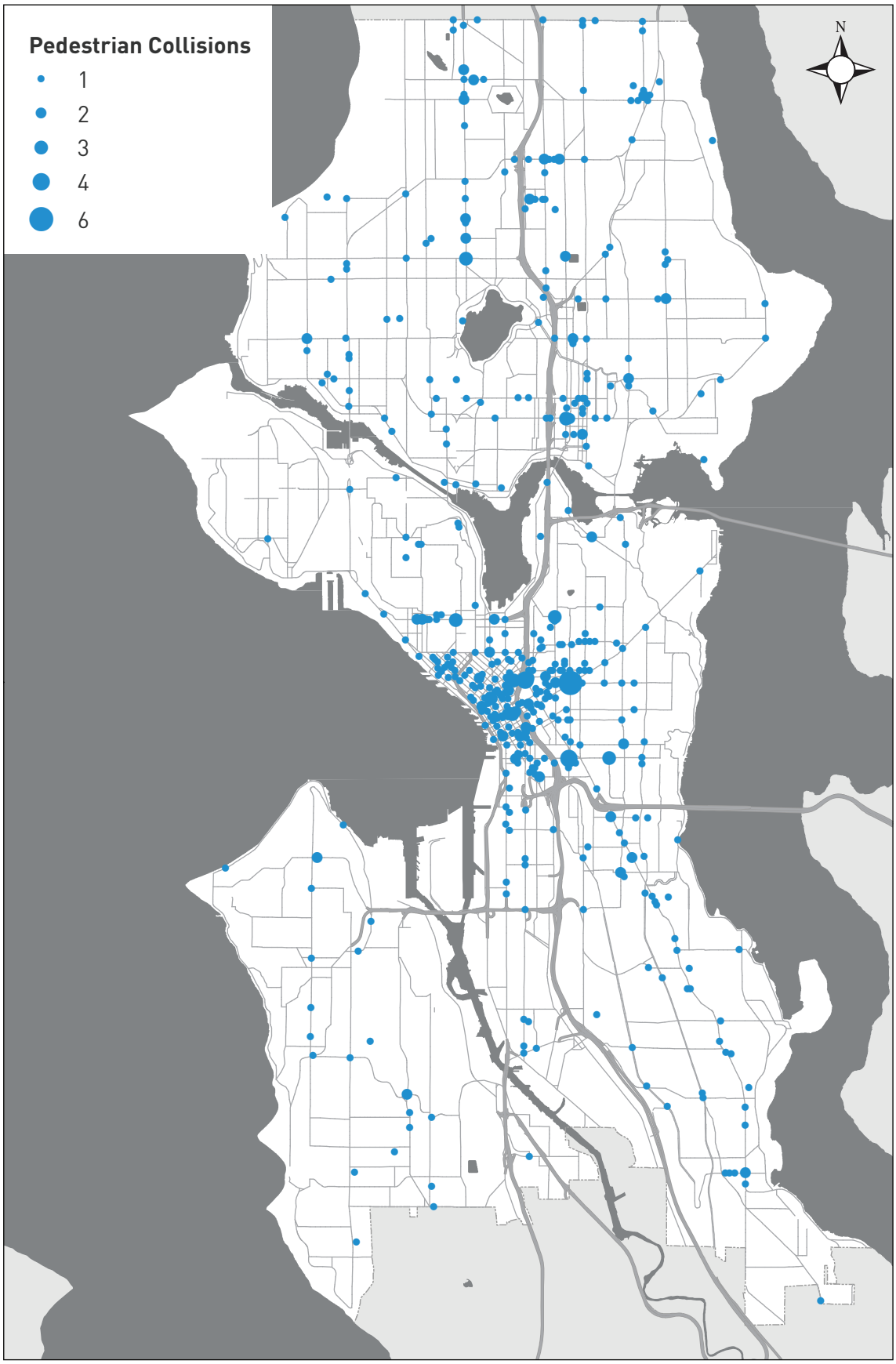
The 2009 Pedestrian Master Plan specified that establishing a decreasing trend in the rate of collisions involving pedestrians was a safety goal. SDOT continues to measure its pedestrian collision rate as the number of pedestrian collision divided by the population of the City of Seattle.

The pedestrian collisions per 100,000 inhabitants increased by 2.6% from 2015 to 2016. The total number of pedestrian serious injury and fatality increased 3.3% from 419 to 433.





2016 PEDESTRIAN COLLISIONS ON SEATTLE STREETS



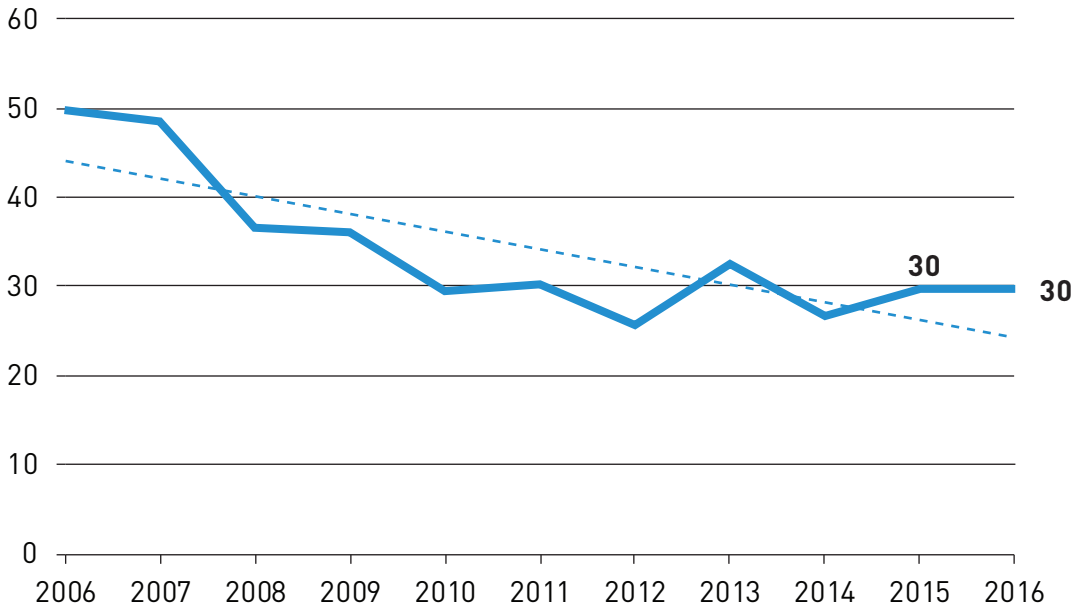

MOTIF
Beef Jerky

BICYCLE COLLISION RATE

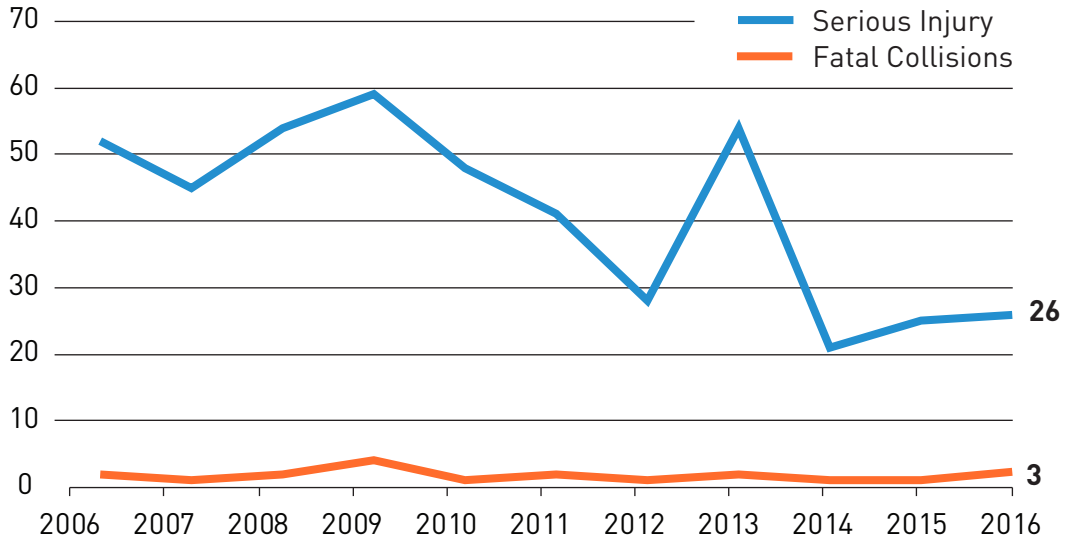
The chart below shows the bicycle collision rate as a factor of the number of Seattle's bicycle commuters as reported by the U.S. Census Bureau's Amercian Community Survey (ACS).

Currently, the ACS number is the best proxy SDOT has for the total number of cycling trips in the City of Seattle. The bicycle collision rate shows a decreasing trend since 2007 when SDOT Bicycle Master Plan was implemented.

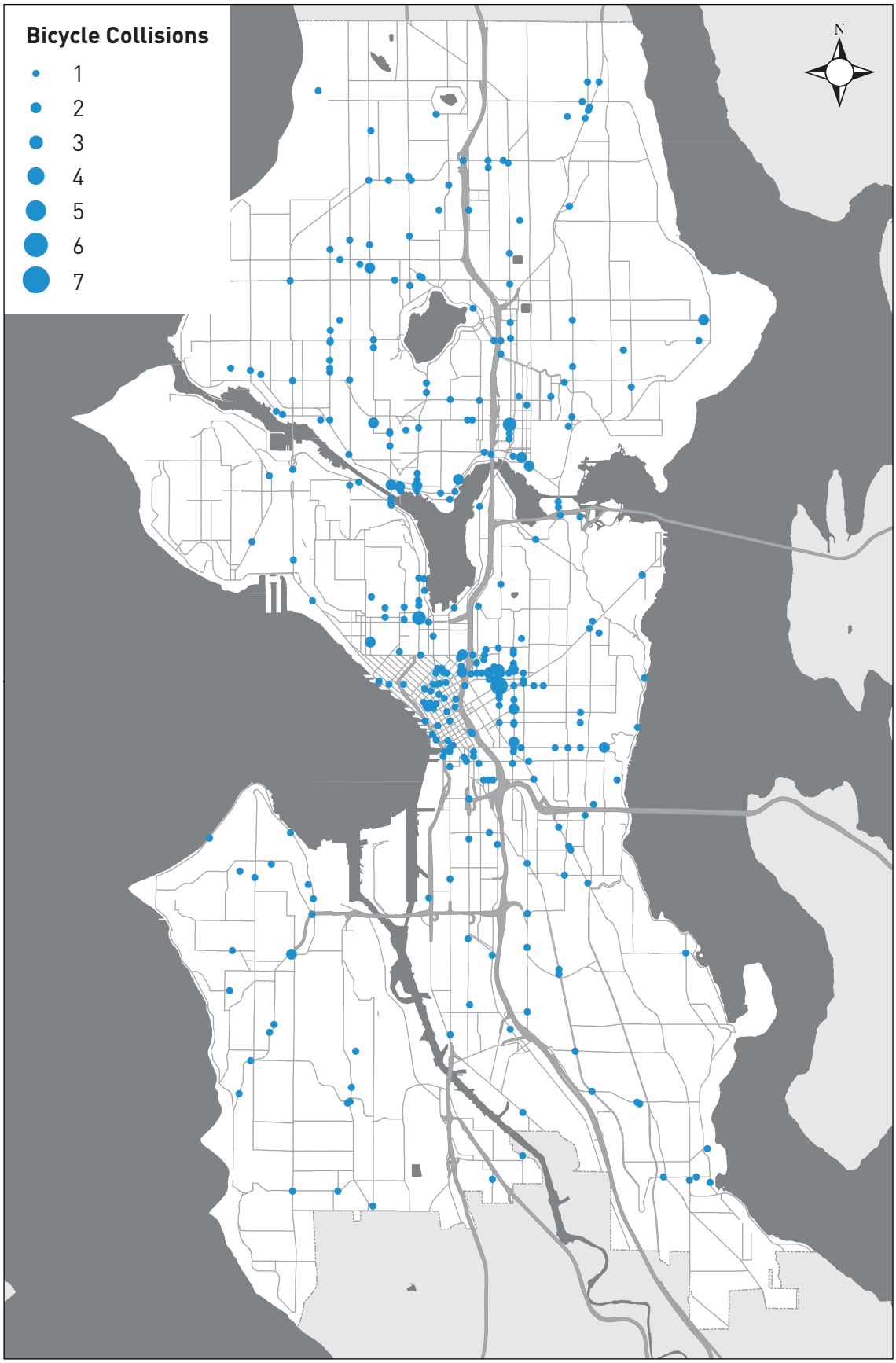
BICYCLE COLLISION RATE PER BICYCLE 1000 COMMUTERS



SERIOUS AND FATAL COLLISIONS FOR BICYCLES



2016 BICYCLE COLLISIONS ON SEATTLE STREETS




City of Seattle
today
65
1 000 000
900 000
800 000
700 000
600 000
500 000
400 000
300 000
200 000
100 000
this year

SUPPORTING DATA

VOLUME DATA

These locations are counted every month. The resulting counts (except the West Seattle Bridge) are added together and divided by 12 to determine a monthly control factor. This factor can then be applied to counts to correct for seasonal variation.

Control Count Locations
1. Denny Way, w/o 2nd Ave
2. E Madison St, sw/o 17th Ave
3. East Green Lake Way N, ne/o N 57th St
4. Fremont Br, s/o Point A
5. N 85th St, w/o Ashworth Ave N
6. Queen Anne Ave N, s/o Crockett St
7. University Br, sw/o Point A
8. Lake City Way NE, ne/o NE 95th St
9. M L King Jr. Way S, n/o S Andover St
10. NW Market St, w/o 8th Ave NW
11. Rainier Ave S, s/o S Othello St
12. S Lander St, w/o 6th Ave S
13. Alki Ave SW, w/o Harbor Ave SW
14. 3rd AVE se/o UNION ST
15. Alaskan Way se/o Blanchard
16. Stewart St, ne/o 4th Ave
17. University St, sw/o 4th Ave
18. East Marginal Way S, s/o S Alaska St
19. West Seattle Bridge, ne/o Fauntleroy
20. SW Spokane Bridge, w/o SW Spokane St

2016 Bridge Count Locations
1. Aurora Bridge
2. Ballard Bridge
3. Fremont Bridge
4. Montlake Bridge
5. Spokane Street Corridor (Duwamish West Waterway)
6. West Seattle Bridge (High-rise)
7. SW Spokane Bridge (Swing)
8. University Bridge
9. 1 Ave S Bridge
10. 16th Ave S Bridge (closed – not counted in 2013)
11. 1-90 Bridge
12. SR520 Bridge
13. I-5 Bridge

Year	Average Daily Traffic in Seattle
2006	1,054,570
2007	1,006,782
2008	1,017,930
2009	999,465
2010	1,010,870
2011	1,005,616
2012	976,625
2013	986,174
2014	1,009,764
2015	1,019,044
2016	1,019,295

2016 Monthly Expansion Factor						
	JAN	FEB	MAR	APR	MAY	JUN
Count	454,947	471,449	487,443	476,266	482,351	479,218
Factor	1.034	0.998	0.965	0.988	0.976	0.982
	JUL	AUG	SEP	OCT	NOV	DEC
Count	482,047	469,378	468,202	470,935	445,489	458,866
Factor	0.976	1.003	1.005	0.999	1.056	1.026

2016 Top Arterial Traffic Counts		
Location	Notes	AAWDT Scaled
West Seattle Br (EB&WB), w/o Alaskan Wy Vi NB on RP		137,400
East Marginal Way S, s/o S Alaska St		68,000
Montlake Bridge	scaled from 2013	63,100
Ballard Bridge	scaled from 2015	60,400
Montlake Blvd NE, n/o NE Pacific Pl		55,800
Fremont Br, n/o Point A		52,200
1st Ave S Bridge	scaled from 2015	50,900
S Michigan St, west of 4th Ave S	scaled from 2015	49,000
15th Ave W, north of W Armory Way		46,600
Rainier Ave S, se/o S Dearborn St		44,500
Elliott Ave W, southeast of W Mercer Pl	scaled from 2015	44,500
Lake City Way NE, s/o NE 145th St		42,900
1st Ave S, n/o S Royal Brougham Way		40,600
NE 45th St, w/o NE 45th Pl		40,000
Denny Way, w/o 2nd Ave		39,100
Mercer St, e/o Taylor Ave N		38,000
Aurora Ave N, n/o N 115th St		37,000

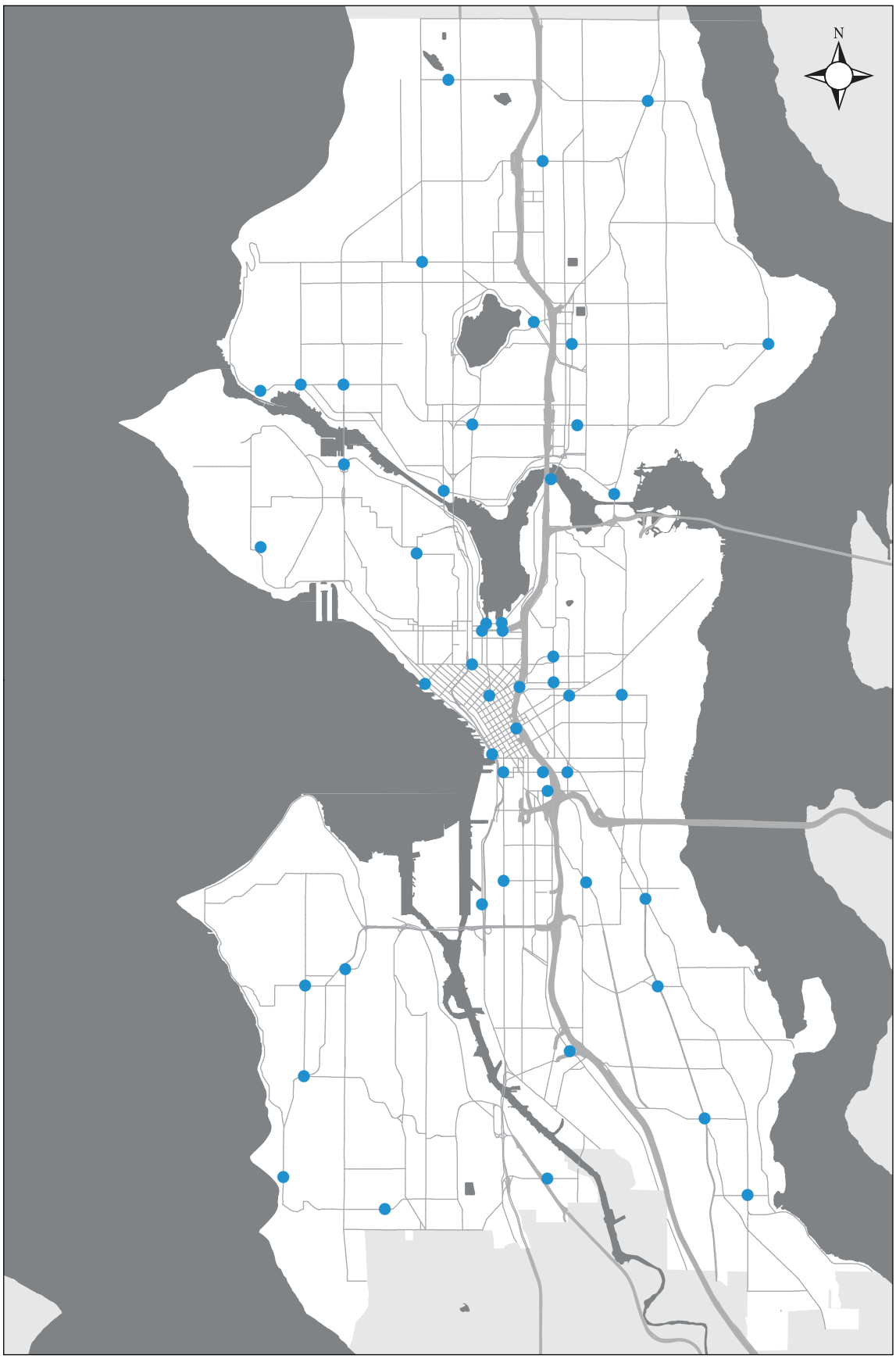
Year	Seattle Population
2005	573,296
2006	580,485
2007	589,304
2008	598,541
2009	602,000
2010	610,383
2011	622,354
2012	635,521
2013	653,713
2014	669,112
2015	684,451
2016	704,352

Year	Seattle/Tacoma/Bellevue Employment
2006	1,702,077
2007	1,744,923
2008	1,768,195
2009	1,724,562
2010	1,710,769
2011	1,722,178
2012	1,765,426
2013	1,796,317
2014	1,836,144
2015	1,874,467
2016	1,935,205

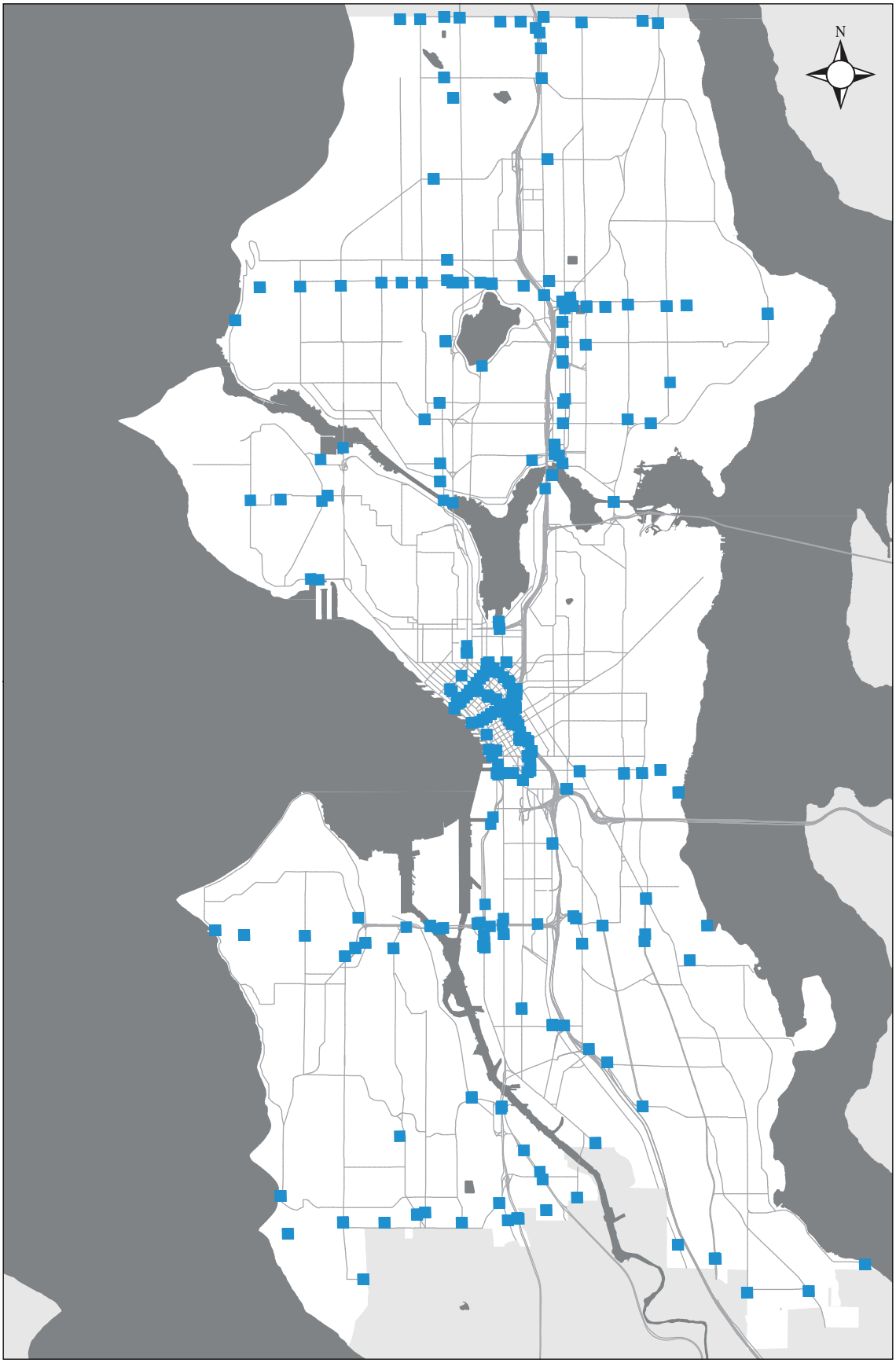
Annual Transit Ridership						
Year	Metro Ridership	Access Boardings	Taxi Boardings	CAT* Boardings	ST Boardings	Total Transit Ridership
2004	96,507,443	1,062,092	50,314	117,004	10,144,153	107,881,006
2005	98,957,216	1,104,480	44,797	127,685	10,968,979	111,203,157
2006	103,242,414	1,128,496	40,474	129,460	12,256,022	116,796,866
2007	110,600,190	1,118,400	35,320	141,368	13,764,711	125,659,989
2008	118,824,795	1,121,776	34,046	155,456	16,128,142	136,264,215
2009	111,717,152	1,119,927	34,320	211,417	18,810,635	131,893,451
2010	109,583,654	1,229,039	32,502	250,369	22,802,673	133,898,237
2011	112,766,328	1,221,392	32,352	303,428	25,079,792	139,403,292
2012	115,410,304	1,164,935	31,228	312,795	28029,348	144,948,610
2013	118,629,373	1,158,467	31,271	316,723	30,379,713	150,515,547
2014	120,950,922	1,079,309	27,490	342,989	32,996,287	155,396,997
2015	121,849,972	980,086	24,059	362,461	34,860,000	158,069,578
2016	121,547,394	961,478	20,156	347,550	42,738,763	165,615,341

*Community Access Transit

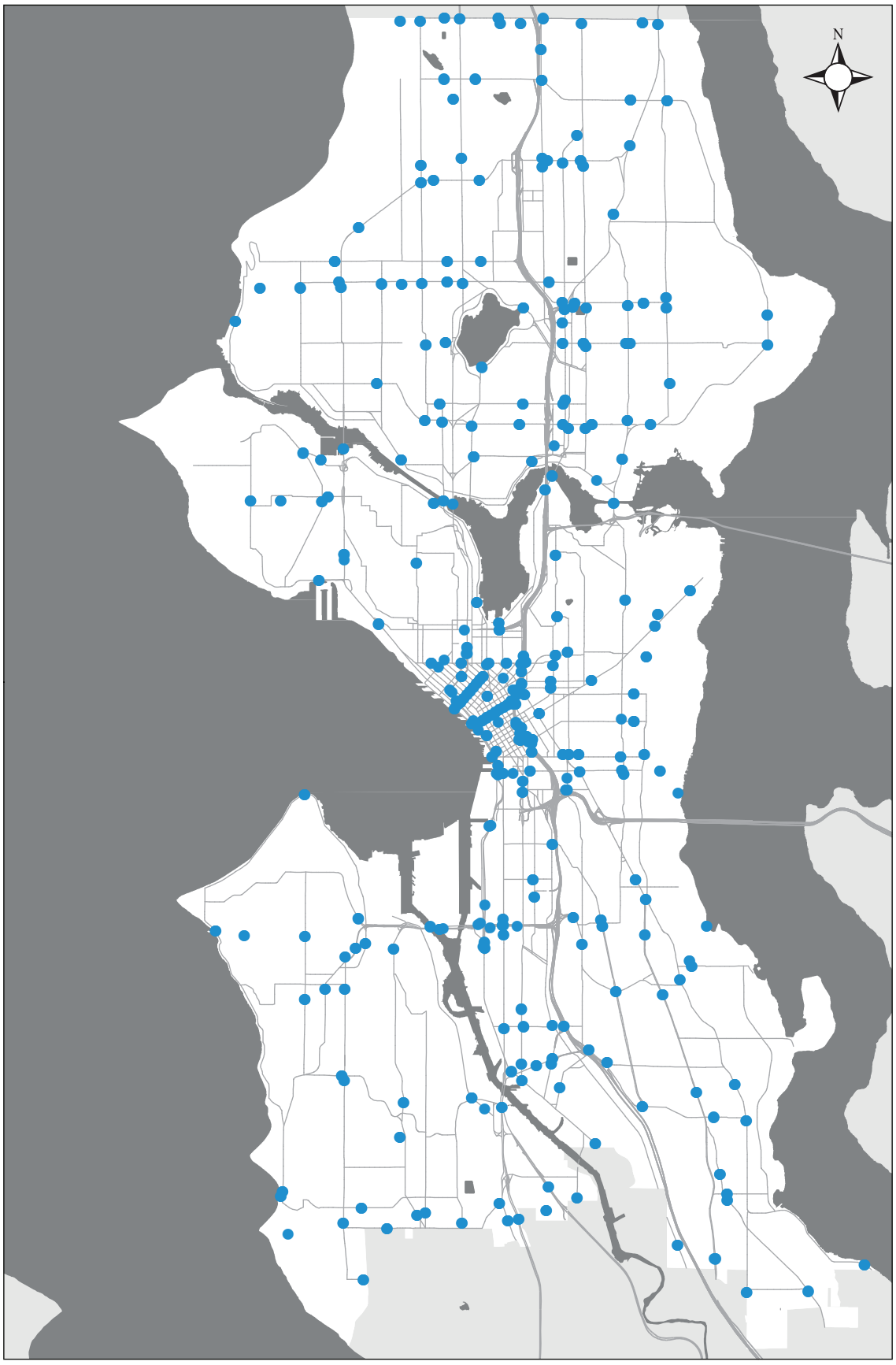
SDOT BIKE AND PEDESTRIAN SPOT COUNT LOCATIONS



SDOT SCREENLINE TRAFFIC VOLUME COUNT LOCATIONS



SDOT FLOW MAP TRAFFIC VOLUME COUNT LOCATIONS




Permanent Bike Counters
Bike with Display
Bike and Pedestrian
Bike
N
Linden Ave N south of N 135th St
Burke Gilman Trail north of NE 70th St
NW 58th St east of 22nd Ave NW
39th Ave NE south of NE 62nd St
Fremont Bridge
Elliott Bay Trail in Myrtle Edwards Park
Broadway PBL between Pike St and Union St
2nd Ave PBL south of Madison
S Spokane St Bridge
MTS Trail (I-90) at Lakeside Ave S
26th Ave SW south of SW Oregon St - Delridge Greenway
Chief Sealth Trail north of S Thistle St

Fremont Bridge Total					
Month	2012	2013	2014	2015	2016
January	n/a	44,884	59,873	60,630	51,733
February	n/a	50,027	47,025	58,659	60,381
March	n/a	66,089	63,494	71,144	69,804
April	n/a	71,998	86,855	83,697	93,639
May	n/a	108,574	118,644	107,775	114,159
June	n/a	99,280	110,907	113,717	107,617
July	n/a	117,974	120,669	112,780	105,683
August	n/a	104,549	112,490	103,351	112,380
September	n/a	80,729	97,558	91,140	94,157
October	n/a	81,352	83,184	83,003	69,883
November	50647	59,270	56,990	56,668	64,097
December	36369	43,553	48,507	43,992	38,937

2016 Machine Bicycle Counts		
Count Location	Count Type	Calculated Daily Average Bike Volume
Fremont Bridge Totem	Continuous Counter	2,690
University BR Sidewalks	Short Duration Count	1,720
12th Ave n/o E Pike St	Short Duration Count	1,690
NE 40th e/o Brooklyn Ave NE	Short Duration Count	1,550
Dexter Ave N nw/o Howe St	Short Duration Count	1,330
Dexter Ave N n/o Denny Way	Short Duration Count	1,320
Montlake Bridge	Short Duration Count	1,200
Elliot Bay Trl in Murtle Edwards Park	Continuous Counter	1,140
Burke Gilman Trail North of NE 70th St	Continuous Counter	1,110
Burke Gilman Trail e/o 9th Ave NW	Short Duration Count	1,110
Spokane St Bridge	Continuous Counter	800
2nd Ave Cycle Track	Continuous Counter	670
Mountain to Sound Greenway (I-90)	Continuous Counter	630
Westlake Ave N w/o 4th Ave N	Short Duration Count	540
Lake Washington Blvd S n/o S Horton St	Short Duration Count	410
Alki Ave SW sw/o 60th Ave SW	Short Duration Count	400
Hiawatha nw/o Charles	Short Duration Count	390
35th Ave NE n/o NE 50th St	Short Duration Count	390
Roosevelt Way NE s/o NE 45th St	Short Duration Count	370
Pike St w/o Terry Ave	Short Duration Count	350

2016 Machine Bicycle Counts		
Count Location	**Count Type**	**Calculated Daily Average Bike Volume**
University Way NE n/o NE 52nd St	Short Duration Count	320
Broadway Cycle Track	Continuous Counter	310
Fremont Ave N n/o N 86th St	Short Duration Count	300
12th Ave n/o E Howell St	Short Duration Count	270
26th Ave E s/o E Lee St	Short Duration Count	270
E Columbia St e/o Broadway	Short Duration Count	260
NE Campus Pkwy e/o 12th Ave NE	Short Duration Count	220
39th Ave Greenway at 62nd St	Continuous Counter	220
S Jackson St e/o 23rd Av S	Short Duration Count	210
12th Ave S s/o S Weller St	Short Duration Count	210
26th Ave E s/o Boyer Ave E	Short Duration Count	200
15th Ave W n/o W Nickerson	Short Duration Count	200
Mercer St w/o Aurora Ave N	Short Duration Count	190
28th Ave E s/o E Mercer St	Short Duration Count	190
28th Ave E se/o E Helen St	Short Duration Count	190
Dearborn w/o Hiawatha	Short Duration Count	180
15th Ave NE n/o NE 65th St	Short Duration Count	170
14th Ave W n/o W Nickerson	Short Duration Count	170
13th Ave S n/o S Snoqualmie St	Short Duration Count	170
N 100th St e/o Fremont Ave N	Short Duration Count	160
12th Ave NE s/o NE 50th St	Short Duration Count	150
N 100th St e/o Aurora Ave N	Short Duration Count	150
13th Ave n/o E Pike St	Short Duration Count	140
12th Ave NE s/o NE 45th St	Short Duration Count	140
2nd Ave se/o Cedar Ave	Short Duration Count	130
NW 58 St Greenway at 22nd Ave NW	Continuous Counter	120
29th Ave E s/o E Roy St	Short Duration Count	110
NW 58th St w/o 9th Ave NW	Short Duration Count	110
W Boston St e/o 1st Ave W	Short Duration Count	110
18th Ave S n/o S Hill St	Short Duration Count	100
E Columbia St e/o 12th Ave	Short Duration Count	100
Fremont Ave N s/o N 82nd St	Short Duration Count	100
Greenlake Way N s/o N 54th St	Short Duration Count	100
NW 83rd St w/o 8th Ave NW	Short Duration Count	80
E Garfield St w/o 38th Ave E	Short Duration Count	80
Fauntleroy Way SW sw/o California Ave SW	Short Duration Count	70

2016 Machine Bicycle Counts		
Count Location	**Count Type**	**Calculated Daily Average Bike Volume**
Lafayette Ave S n/o S Snoqualmie St	Short Duration Count	70
E Republican w/o 16th Ave E	Short Duration Count	70
S Othello St w/o 38th Ave S	Short Duration Count	60
26th Ave SW at Oregon St	Continuous Counter	60
18th Ave S n/o S Bayfront St	Short Duration Count	60
22nd Ave n/o E Columbia St	Short Duration Count	60
NW 58th St w/o 15th Ave NW	Short Duration Count	60
NW 58th St w/o 26th Ave NW	Short Duration Count	50
NW 58th St w/o 5th Ave NW	Short Duration Count	50
NW 92nd St e/o 15th Ave NW	Short Duration Count	50
NW 90th St e/o Fremont Ave N	Short Duration Count	50
NE 127th St e/o 25th Ave NE	Short Duration Count	50
27th Ave NE n/o 130th St	Short Duration Count	40
N 43rd St w/o Wallingford Ave N	Short Duration Count	40
E Columbia St e/o 27th Ave	Short Duration Count	40
S Forest St w/o 6th Ave S (Sodo Trl)	Short Duration Count	40
26th Ave SW n/o SW Dakota St	Short Duration Count	30
28th Ave S S/O S Holgate St	Short Duration Count	30
44th Ave S s/o S Frontenac St	Short Duration Count	30
N 100th St e/o 1st Ave NW	Short Duration Count	30
NW 57th St w/o 34th Ave NW	Short Duration Count	30
NW 90th St e/o 6th Ave NW	Short Duration Count	30
S Horton St e/o 34th Ave S	Short Duration Count	30
39th Ave S s/o S Mead St	Short Duration Count	30
NW 92nd St e/o 1st Ave NW	Short Duration Count	20
1st Ave NW n/o NW 95th St	Short Duration Count	20
24th Ave E s/o E Aloha St	Short Duration Count	20
25th Ave E n/o E Thomas St	Short Duration Count	20
27th Ave NE n/o NE 125th St	Short Duration Count	20
27th Ave NE n/o NE 133rd St	Short Duration Count	20
34th Ave S s/o Mt. Baker Blvd EB	Short Duration Count	20
34th Ave S s/o S Lander St	Short Duration Count	20
46th Ave S s/o S Holden St	Short Duration Count	20
46th Ave S s/o S Thistle St	Short Duration Count	20
Courtland Pl S s/o S Andover St	Short Duration Count	20
E Columbia St e/o 21st Ave	Short Duration Count	20

2016 Machine Bicycle Counts		
Count Location	**Count Type**	**Calculated Daily Average Bike Volume**
E Columbia St e/o 24th Ave	Short Duration Count	20
E Galer St ne/o Interlaken Pl E	Short Duration Count	20
Renton Ave S se/o S Bennett St	Short Duration Count	20
25th Ave NE n/o NE 125th St	Short Duration Count	20
45th Ave SW n/o SW Dakota St	Short Duration Count	10
Lafayette Av S n/o S Hinds St	Short Duration Count	10
S Holly St e/o 51st Ave S	Short Duration Count	10
S Willow St e/o 42nd Ave S	Short Duration Count	10
S Willow St w/o MLK Jr Way S	Short Duration Count	10
NW 92nd St e/o 9th Ave NW	Short Duration Count	10
25th Ave E s/o E Lee St	Short Duration Count	10
25th Ave NE n/o NE 140th St	Short Duration Count	10
2nd Ave NW n/o NW 95th St	Short Duration Count	10
30th Ave S s/o S College St	Short Duration Count	10
NE 140th St e/o 26th Ave NE	Short Duration Count	10
Renton Ave S s/o S Findlay St	Short Duration Count	10
S Ferdinand St e/o Rainier Ave S	Short Duration Count	10
E Columbia St e/o MLK Jr Way	Short Duration Count	10
NW 92nd St e/o 6th Ave NW	Short Duration Count	10
S Director St e/o 46th Ave S	Short Duration Count	10
N 92nd St e/o Aurora Ave N	Short Duration Count	10
E Lee St e/o 25th Ave E	Short Duration Count	5
E Ward St w/o 26th Ave E	Short Duration Count	5
N 92nd St e/o Fremont Ave N	Short Duration Count	5

SPEED DATA

Location	Direction	Speed Limit	85th Percentile speed	High End Speeder Percentage	Date
1 Ave S n/o S King St	NB	30	39.7	0.0%	3/9/17
1 Ave S n/o S King St	SB	30	38.8	0.3%	3/9/17
1 Ave S s/o S Lucile St	NB	35	38.6	0.1%	3/16/17
1 Ave S s/o S Lucile St	SB	35	37	0.3%	3/16/17
12 Ave E n/o E John St	NB	30	27.8	0.0%	1/26/16
12 Ave E n/o E John St	SB	30	27.6	0.0%	1/26/16
12th Ave S, s/o S Weller St	NB	30	40.4	0.1%	3/10/16
12th Ave S, s/o S Weller St	SB	30	37.3	0.1%	3/10/16
15 Ave NE s/o NE 75 St	NB	35	33.4	0.0%	6/23/16
15 Ave NE s/o NE 75 St	SB	35	35.8	0.0%	6/23/16
15 Ave NE s/o NE Northgate Way	NB	30	37.7	0.1%	1/25/16
15 Ave NE s/o NE Northgate Way	SB	30	36.4	0.0%	1/25/16
15 Ave NE s/o NE 145 St	NB	30	30.5	0.0%	10/12/16
15 Ave NE s/o NE 145 St	SB	30	33.8	0.0%	10/12/16
15 Ave W n/o W Armory Way	NB	35	39.5	0.0%	12/15/16
15 Ave W n/o W Armory Way	SB	35	38.5	0.0%	12/15/16
23 Ave n/o E Cherry St	NB	30	ND	ND	ND
23 Ave n/o E Cherry St	SB	30	ND	ND	ND
24 Ave NW s/o NW 80 St	NB	30	31	0.0%	11/16/16
24 Ave NW s/o NW 80 St	SB	30	30.8	0.0%	11/16/16
25 Ave NE s/o NE 47 St	NB	35	32.3	0.0%	8/16/16
25 Ave NE s/o NE 47 St	SB	35	37.2	0.0%	7/26/16
3 Ave NW s/o NW 80 St	NB	30	30.2	0.0%	11/16/16
3 Ave NW s/o NW 80 St	SB	30	ND	0.0%	1/6/16
35 Ave SW n/o SW Roxbury St	NB	30	34.3	0.0%	10/4/16
35 Ave SW n/o SW Roxbury St	SB	30	33	0.0%	10/4/16
5 Ave NE s/o 145 St Off Rp	NB	30	41.7	0.3%	8/16/16
5 Ave NE s/o 145 St Off Rp	SB	30	42.3	0.2%	7/26/16
51 Ave S s/o S Bangor St	NB	30	25.3	0.0%	6/28/16
51 Ave S s/o S Bangor St	SB	30	ND	ND	ND
Airport Way S, s/o S Stacy St	NB	45	40.4	0.0%	6/28/16
Airport Way S, s/o S Stacy St	SB	45	38.8	0.0%	6/28/16
Airport Wy S n/o S Norfolk St	NB	45	56.2	0.7%	6/28/16
Airport Wy S n/o S Norfolk St	SB	45	55.4	0.5%	6/28/16

Location	Direction	Speed Limit	85th Percentile speed	High End Speeder Percentage	Date
Aurora Ave N s/o N 112 St	NB	35	42	5.0%	6/23/16
Aurora Ave N s/o N 112 St	SB	35	43.7	9.6%	6/23/16
Beacon Ave S, n/o S Spokane St	NB	30	30.8	0.0%	6/28/16
Beacon Ave S, n/o S Spokane St	SB	30	29.5	0.0%	6/28/16
Boren Av nw/o E Yesler Way	NWB	30	33.8	0.0%	1/26/16
Boren Av nw/o E Yesler Way	SEB	30	34.3	0.1%	1/26/16
Broad St sw/o 3 Ave	SWB	30	29.1	0.0%	1/26/16
Broad St sw/o 3 Ave	NEB	30	27	0.0%	1/26/16
Broad St ne/o Denny Way	NEB	30	32	0.0%	1/26/16
Broad St ne/o Denny Way	SWB	30	31.2	0.0%	1/26/16
California Ave SW s/o SW Charlestown St	NB	30	31.8	0.0%	6/30/16
California Ave SW s/o SW Charlestown St	SB	30	31.8	0.0%	6/30/16
California Ave SW s/o SW Erskine St	NB	30	29.7	0.0%	8/4/16
California Ave SW s/o SW Erskine St	SB	30	26.8	0.0%	8/4/16
Fauntleroy Way SW s/o SW Alaska St	NB	30	ND	ND	ND
Fauntleroy Way SW s/o SW Alaska St	SB	30	ND	ND	ND
Greenwood Ave N s/o N 80 St	NB	25	24.8	0.0%	1/21/16
Greenwood Ave N s/o N 80 St	SB	25	26.6	0.0%	1/21/16
Greenwood Ave N n/o N 107 St	NB	35	36.6	0.0%	1/21/16
Greenwood Ave N n/o N 107 St	SB	35	38.2	0.0%	1/21/16
Lake City Way NE sw/o NE 115 St	NEB	35	35.9	0.1%	8/16/16
Lake City Way NE sw/o NE 115 St	SWB	35	36.2	0.1%	7/26/16
Lake City Way NE s/o NE 145 St	NB	35	37.3	0.1%	8/16/16
Lake City Way NE s/o NE 145 St	SB	35	37.2	0.1%	7/26/16
Leary Way Nw nw/o 3 Ave NW	NWB	30	37.3	0.1%	12/15/16
Leary Way Nw nw/o 3 Ave NW	SEB	30	36.2	0.1%	12/15/16
Rainier Ave S s/o M L King Jr Way S	NB	35	33.8	0.0%	8/17/16
Rainier Ave S s/o M L King Jr Way S	SB	35	37.4	0.1%	8/17/16
Rainier Ave S nw/o S Holly St	NWB	30	39.1	11.7%	8/17/16
Rainier Ave S nw/o S Holly St	SEB	30	37.1	7.3%	8/17/16
Rainier Ave S e/o S 75 St	EB	35	38.2	0.1%	8/24/16
Rainier Ave S e/o S 75 St	WB	35	39.2	0.1%	8/24/16
Roosevelt Way NE se/o NE 130* N St	NWB	30	ND	ND	ND
Roosevelt Way NE se/o NE 130* N St	SEB	30	ND	ND	ND
Sand Point Way NE, sw/o NE 65th St	NEB	40	40.3	0.0%	10/19/16

Location	Direction	Speed Limit	85th Percentile speed	High End Speeder Percentage	Date
Sand Point Way NE, sw/o NE 65th St	SWB	40	41.6	0.0%	10/19/16
Stone Way N s/o N 45 St	SB	30	24.8	0.0%	2/1/16
Stone Way N s/o N 45 St	NB	30	25.9	0.0%	2/1/16
East Green Lake Way N ne/o N 57 St	NEB	30	34.6	0.0%	3/15/16
East Green Lake Way N ne/o N 57 St	SWB	30	31.6	0.0%	3/15/16
E Madison St s/o 17 Ave	WB	30	24.2	0.0%	3/16/16
E Madison St w/o 17 Ave	EB	30	25.4	0.0%	3/29/16
E Madison St sw/o 38 Ave E	NEB	30	34	0.0%	2/1/16
E Madison St sw/o 38 Ave E	SWB	30	34.4	0.0%	2/1/16
East Mariginal Way S se/o 4 Ave S	NWB	35	38.7	0.1%	6/29/16
East Mariginal Way S se/o 4 Ave S	SEB	35	42.9	0.3%	6/29/16
East Marginal Way S se/o Boeing Dr	NWB	35	46.4	0.8%	6/29/16
East Marginal Way S se/o Boeing Dr	SEB	35	45	0.5%	6/29/16
E Yesler Way w/o 23 Ave	EB	30	25.6	0.0%	2/1/16
E Yesler Way w/o 23 Ave	WB	30	29.3	0.0%	2/1/16
N 45 St w/o Eastern Ave N	EB	30	30.2	0.0%	1/21/16
N 45 St w/o Eastern Ave N	WB	30	30.2	0.0%	1/21/16
N 50 St w/o Fremont Ave N	EB	30	30.9	0.0%	6/23/16
N 50 St w/o Fremont Ave N	WB	30	ND	ND	ND
N 85 St w/o Linden Ave N	EB	30	34.8	0.0%	9/29/16
N 85 St w/o Linden Ave N	WB	30	33.7	0.0%	9/29/16
N 85th St, w/o Ashworth Ave N	EB	30	38.5	0.1%	3/15/16
N 85th St, w/o Ashworth Ave N	WB	30	37.6	0.1%	3/15/16
NE 125 St e/o 35 Ave NE	EB	30	33.1	0.0%	2/5/16
NE 125 St e/o 35 Ave NE	WB	30	34	0.0%	2/5/16
NE 50th St, w/o Roosevelt Way NE	EB	30	23.9	0.0%	10/19/16
NE 50th St, w/o Roosevelt Way NE	WB	30	27.6	0.0%	10/19/16
NE 65 St w/o 25 Ave NE	EB	30	28.1	0.0%	2/5/16
NE 65 St w/o 25 Ave NE	WB	30	28.4	0.0%	1/25/16
NE 65 St e/o 25 Ave NE	EB	30	15.6	0.0%	1/25/16
NE 65 St e/o 25 Ave NE	WB	30	27	0.0%	1/25/16
NE 75 St w/o Roosevelt Way NE	WB	30	34.2	0.0%	10/19/16
NE 75 St w/o Roosevelt Way NE	EB	30	33.5	0.0%	10/19/16
NE 75 St w/o 30 Ave NE	EB	30	31.7	0.0%	1/25/16
NE 75 St w/o 30 Ave NE	WB	30	34.5	0.0%	1/25/16

Location	Direction	Speed Limit	85th Percentile speed	High End Speeder Percentage	Date
NE Northgate Way e/o 5 Ave NE	EB	30	ND	ND	ND
NE Northgate Way e/o 5 Ave NE	WB	30	ND	ND	ND
S Genesee St e/o 38 Ave S	EB	25	26.3	0.0%	8/24/16
S Genesee St e/o 38 Ave S	WB	25	ND	ND	ND
S Lucile St e/o 12 Ave S	EB	30	35.2	0.0%	4/5/16
S Lucile St e/o 12 Ave S	WB	30	34.1	0.0%	4/5/16
S Michigan St e/o 6 Ave S	EB	35	37.2	0.1%	7/21/16
S Michigan St e/o 6 Ave S	WB	35	36.5	0.2%	7/21/16
SW Barton St w/o 31 Ave SW	EB	30	32.1	0.0%	6/30/16
SW Barton St w/o 31 Ave SW	WB	30	ND	ND	ND
West Marginal Way SW nw/o 2 Ave SW	NWB	35	41.8	0.2%	7/27/16
West Marginal Way SW nw/o 2 Ave SW	SEB	35	41.4	0.2%	7/27/16
Mercer St w/o Dexter Ave N (North Rd)	EB	30	ND	ND	ND
Mercer St w/o Dexter Ave N (South Rd)	EB	30	ND	ND	ND
M L King *Er Way S nw/o S Edmunds St	NWB	35	35.6	0.1%	6/29/16
M L King *Wr Way S nw/o S Edmunds St	SEB	35	ND	ND	ND
M L King *Er Way S s/o S Norfolk St	NB	35	44.4	1.2%	8/17/16
M L King *Wr Way S s/o S Norfolk St	SB	35	ND	ND	ND
Beacon Ave S, s/o S Spokane St	NB	30	35.1	0.0%	6/28/16
Beacon Ave S, s/o S Spokane St	SB	30	34.4	0.0%	6/28/16

HISTORICAL COLLISION DATA

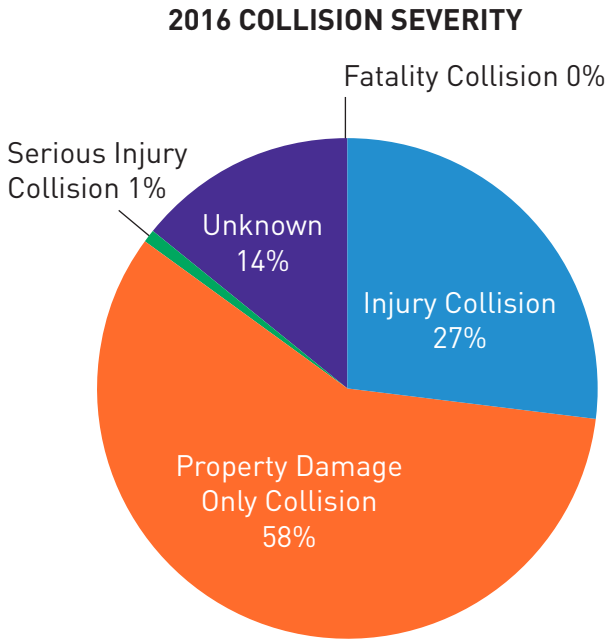
Historical Data				
Year	Statewide Collisions	Seattle Collisions	Police Reported	Citizen Reported
2006	122,172	15,784	15,625	159
2007	118,829	15,065	14,971	94
2008	110,494	14,139	14,037	102
2009	103,008	13,272	12,101	1,171
2010	101,887	11,948	11,288	660
2011	98,881	12,405	11,240	1,165
2012	99,560	12,725	10,614	2,111
2013	99,689	12,736	10,310	2,426
2014	107,634	12,034	10,815	2,425
2015	117,053	14,244	10,930	3,314
2016	N/A	13,641	11,603	2,038

Fatal/Serious Collisions			
Year	Fatal	Serious Injury	Total Serious Fatal
2005	28	206	234
2006	33	293	326
2007	14	245	259
2008	20	193	213
2009	24	200	224
2010	18	177	195
2011	10	140	150
2012	19	177	196
2013	22	156	178
2014	17	169	186
2015	21	143	164
2016	20	171	191

Bicycle Collisions					
Year	Total Collisions	Serious Injury	Possible/ Evident Injury	Fatal Collisions	Fatal and Serious Injury Collisions
2005	293	24	223	0	24
2006	365	31	280	2	33
2007	356	47	263	1	48
2008	365	29	280	2	31
2009	383	23	297	4	27
2010	364	23	292	1	24
2011	362	24	295	2	26
2012	387	24	319	1	25
2013	421	25	340	2	27
2014	380	21	316	1	22
2015	483	25	404	1	26
2016	440	26	352	3	29

Pedestrian Collisions					
Year	Total Collisions	Serious Injury	Possible/ Evident Injury	Fatal Collisions	Fatal and Serious Injury Collisions
2005	477	46	424	7	53
2006	567	48	510	9	57
2007	487	37	445	5	42
2008	470	43	418	9	52
2009	454	45	398	11	56
2010	496	43	448	5	48
2011	393	36	355	2	38
2012	469	44	417	8	52
2013	396	48	339	9	57
2014	473	52	360	6	58
2015	522	46	412	7	53
2016	553	61	428	5	66

2016 ALL COLLISIONS



2016 Total Collision by State Collision Type	
	Count
All Other Non-Collisions	3
Bicycle	440
Breakage Of Any Part Of the Vehicle Resulting In Injury or in Further Property Damage	5
Domestic Animal Other (Cat, Dog etc)	2
Entering At Angle	2,261
Fire Started In Vehicle	1
From Opposite Direction	879
From Same Direction	3,644
Not Stated	5
Parked Car	2,229
Person Fell, Jumped, or was Pushed From Vehicle	1
Left Turn	66
Right Turn	104
Struck Fixed Object	883
Struck Other Object	29
Train	14
Pedestrian	553

Contributing Circumstances for All 2016 Collisions					
	Fatality Collision	Serious Injury Collision	Injury Collision	Property Damage Only Collision	Total
Apparently Asleep			14	21	35
Apparently Fatigued			6	8	14
Apparently Ill		1	5	4	10
Did not Grant Right of Way to Pedestrian	2	16	165	19	202
Did not Grant Right of Way to Vehicle		19	648	903	1570
Disregard Flagger/Officer			3	1	4
Disregard Stop and Go Light		7	124	134	265
Disregard Stop Sign/Flashing Red		3	81	84	168
Disregard Yield Sign/Flashing Yellow			15	14	29
Driver Adjusting Audio or Entertainment System			1	3	4
Driver Distractions Outiside Vehicle			17	20	37
Driver Eating or Drinking			2	2	4
Driver Interacting with passengers, Animals, or Objects Inside Vehicle			9	14	23
Driver Not Distracted	3	19	319	569	910
Driver Operating Handheld Telecommunications Device			7	15	22
Driver Operating Hands-free Wireless Telecommunications Device			1	5	6
Driver Operating Other Electronic Devices (computers, navigational, etc.)			5	5	10
Exceeding Reasonable and Safe Speed	1	6	114	183	304
Exceeding Stated Speed Limit	5	3	20	25	53
Failing To Signal			6	2	8
Failure to Use Xwalk	1	6	29	3	39
Following Too Closely		4	272	321	597
Headlight Violation			1		1
Improper Backing			15	197	212
Improper Parking Location				15	15
Improper Passing		5	20	87	112
Improper Signal		1	1	5	7
Improper Turn		12	93	265	370
Improper U-Turn	1		30	47	78
Inattention	1	19	818	1547	2,386
None	10	133	3,096	5,955	9,196

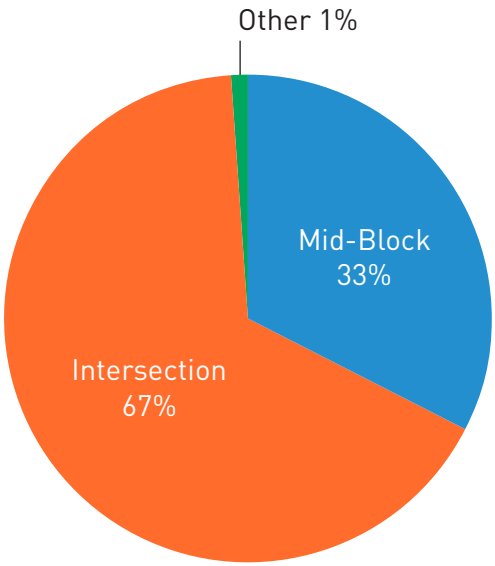
Contributing Circumstances for All 2016 Collisions					
	Fatality Collision	Serious Injury Collision	Injury Collision	Property Damage Only Collision	Total
On Wrong Side OF Road		2	17	16	35
Operating Defective Equipment		1	25	79	105
Other	6	27	473	1,657	2,163
Other Driver Distractions Inside Vehicle		1	10	14	25
Over Center Line		2	23	39	64
Under the Influence of Alcohol	3	12	129	275	419
Under the Influence of Drugs		1	10	20	31
Unknown Driver Distraction	3	23	277	962	1,265

2016 Fatalities		
Location	Collision Date	Collision Type
Beacon Ave S and S McClellan St	1/5/2016	Ped
Broadway between E Denny Way and E Howell St	3/8/2016	Vehicle
Boren Ave and James St	3/16/2016	Vehicle
Airport Way S near 8th Ave S	3/25/2016	Motorcycle
S Lander St, 200 block	4/30/2016	Ped
MLK Jr Way S between S Jackson St and S King St	4/30/2016	Ped
13th Ave and E Yesler	5/13/2016	Bike
5th Ave S and S Main St	5/14/2016	Bike
NW Market St near NW 55th St	5/29/2016	Vehicle
SW Spokane east of SW Admiral Way	7/1/2016	Vehicle
SR-99 ramp to West Seattle Bridge	9/10/2016	Motorcycle
Roosevelt Way NE and NE 65th St	9/13/2016	Ped
1st Ave NE near NE 95th St	9/21/2016	Bike
Belmont Ave E and Bellevue Pl E	9/21/2016	Ped
MLK Jr Way S, 9200 block	10/24/2016	Vehicle
24th Ave NW and NW Market St	11/10/2016	Vehicle
NE Northgate Way btwn 3rd Ave NE and 5th Ave NE	11/11/2016	Vehicle
NW 85th St btwn 3rd Ave NW and 6th Ave NW	11/15/2016	Vehicle
15th Ave S and S Spokane St	11/18/2016	Vehicle
12th Ave SW and SW Thistle St	12/4/2016	Motorcycle


E Jefferson St 400

2016 PEDESTRIAN COLLISIONS

2016 PEDESTRIAN COLLISION LOCATIONS



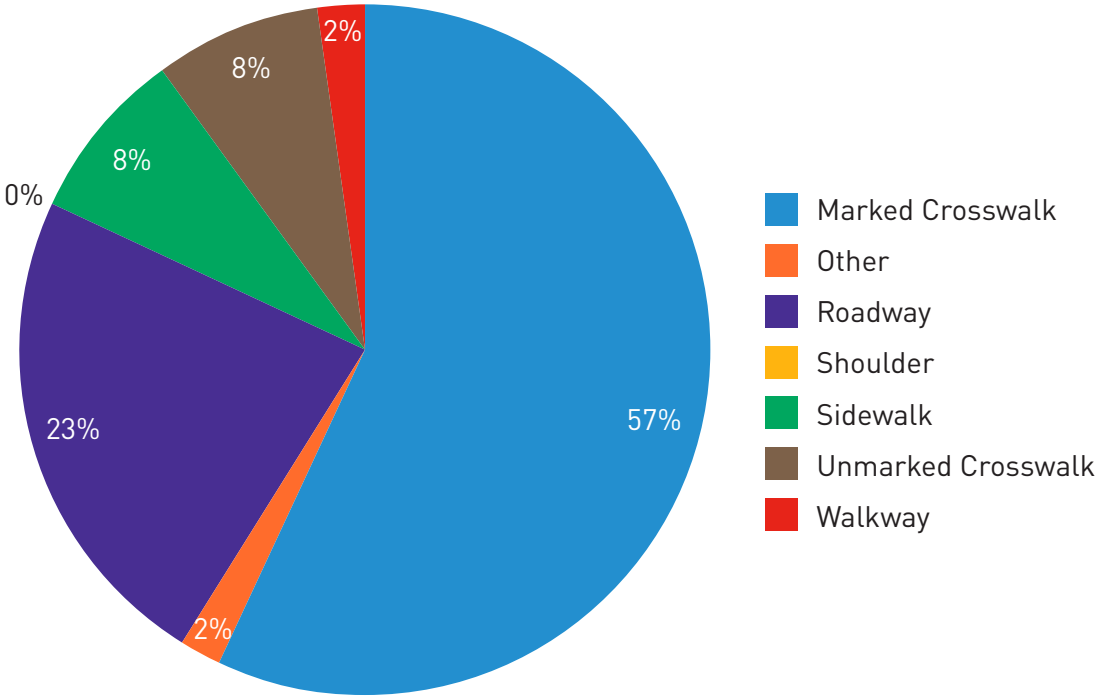
Collision Location	Count
Mid-Block	180
Intersection	366
Other	7
Total	**553**

Pedestrian - Involved Collision Rate per Million Inhabitants				
Year	Pedestrian Collisions	Seattle Population	Pedestrian Collisions Per Capita	Pedestrian Collisions Per 100,000
2006	567	580,485	0.000977	98
2007	487	589,304	0.000826	83
2008	470	598,541	0.000785	79
2009	455	602,000	0.000756	76
2010	508	608,660	0.000835	83
2011	401	620,778	0.000646	65
2012	486	634,535	0.000766	77
2013	413	652,000	0.000633	63
2014	496	668,342	0.000742	74
2015	522	684,451	0.000763	76
2016	553	704,352	0.000785	79

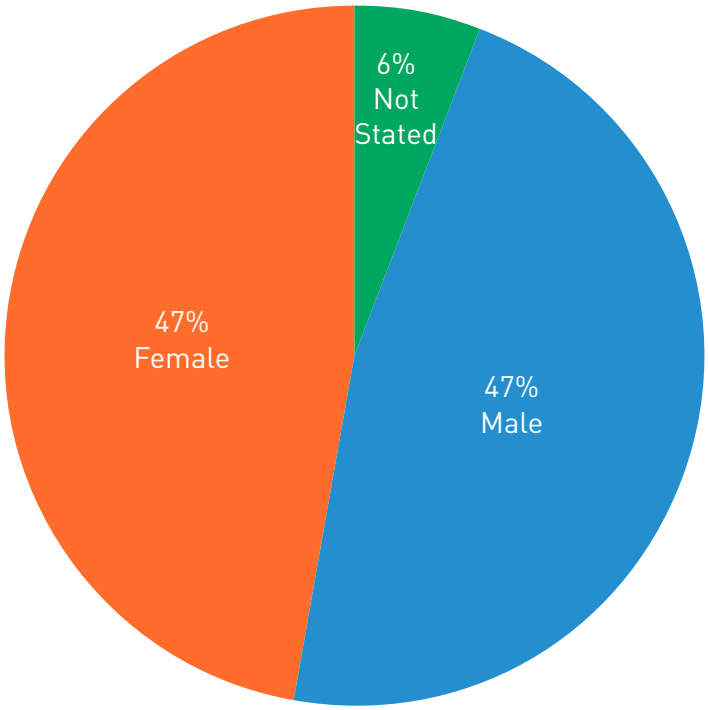
Injury Class of Pedestrians Involved in 2016 Collisions by Facility Type							
Facility	Fatal	Serious Injury	Possible Injury	Non-Serious Injury (Evident Injury)	No Injury	Unknown	Total
Marked Cross Walk	2	27	104	72	10	12	227
Other	1	2	5			1	9
Roadway	1	18	34	26	7	4	90
Shoulder			1	1			2
Sidewalk		3	18	5	2	3	31
Unmarked Crosswalk	1	3	14	10	5	1	34
Walkway			3	3		1	7

Injury Class of Pedestrians Involved in Collisions in 2016							
Age	Fatal	Serious Injury	Possible Injury	Non-Serious Injury (Evident Injury)	No Injury	Unknown	Total
14 and Under			6	8	4	1	19
15 - 24	1	6	21	18	1	3	50
25 - 34		10	57	32	8	1	108
35 - 34		6	29	15	3	1	54
45 - 54		5	27	14	3	1	50
55 - 64	1	15	13	16	1	4	50
66 and Over	2	6	18	12	2	1	41
Not Listed		5	9	3	2	10	29

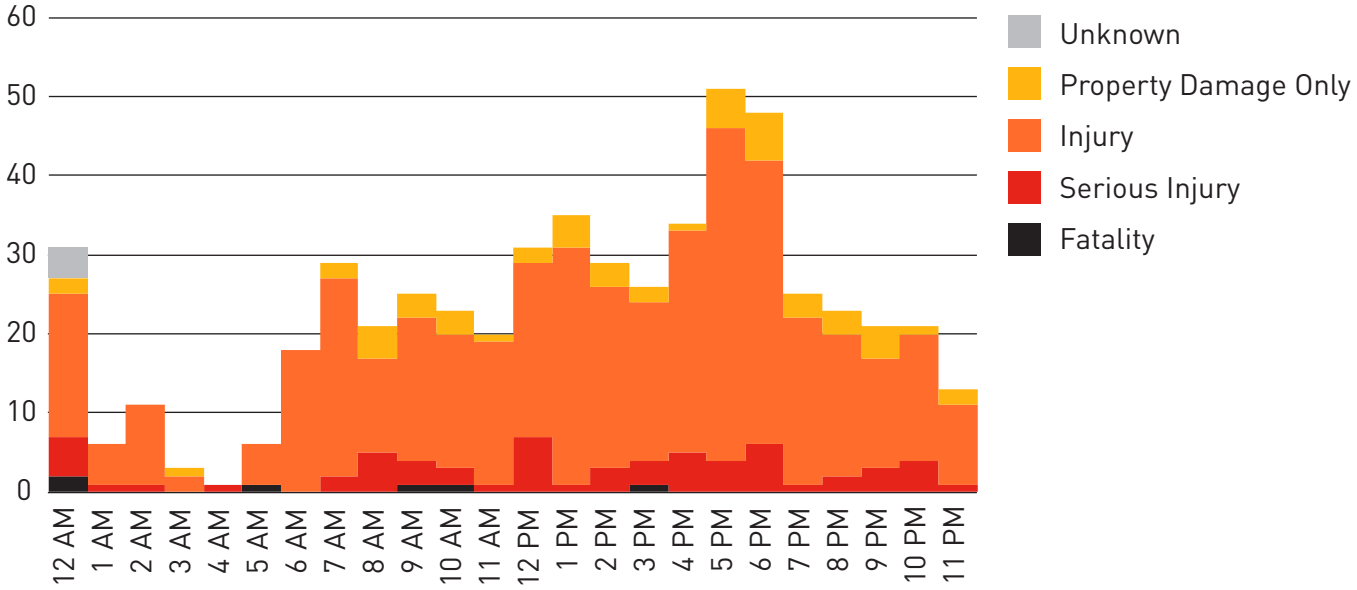
FACILITY THE PEDESTRIAN WAS USING FOR 2016 COLLISIONS



GENDER OF PEDESTRIANS IN 2016 COLLISIONS

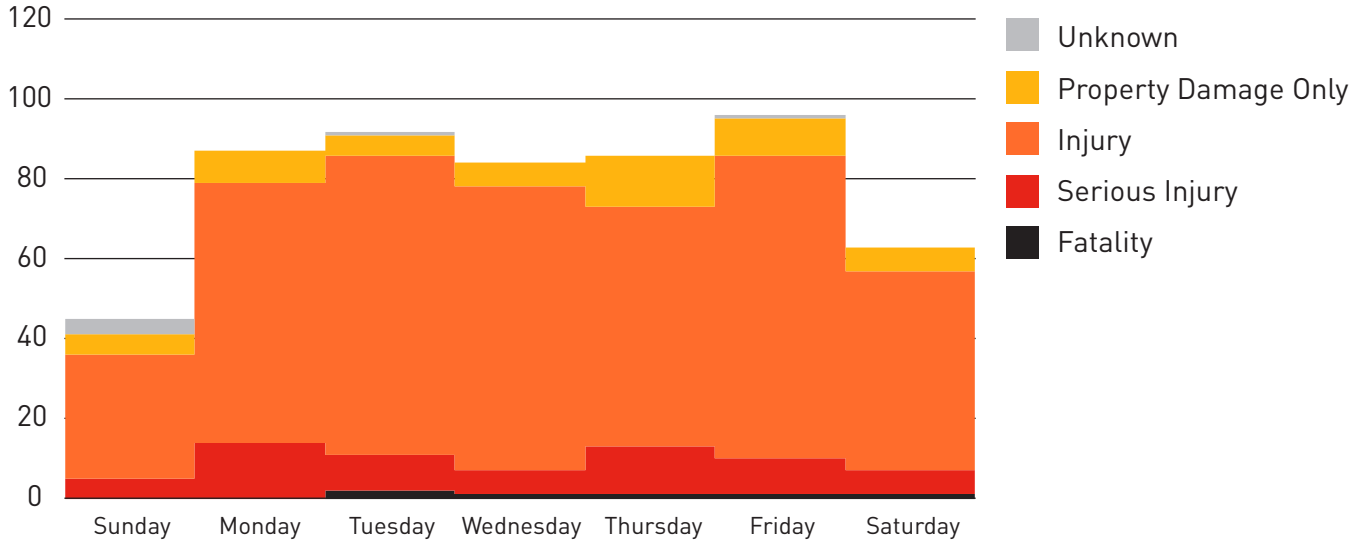


2016 PEDESTRIAN COLLISION SEVERITY BY HOUR OF THE DAY



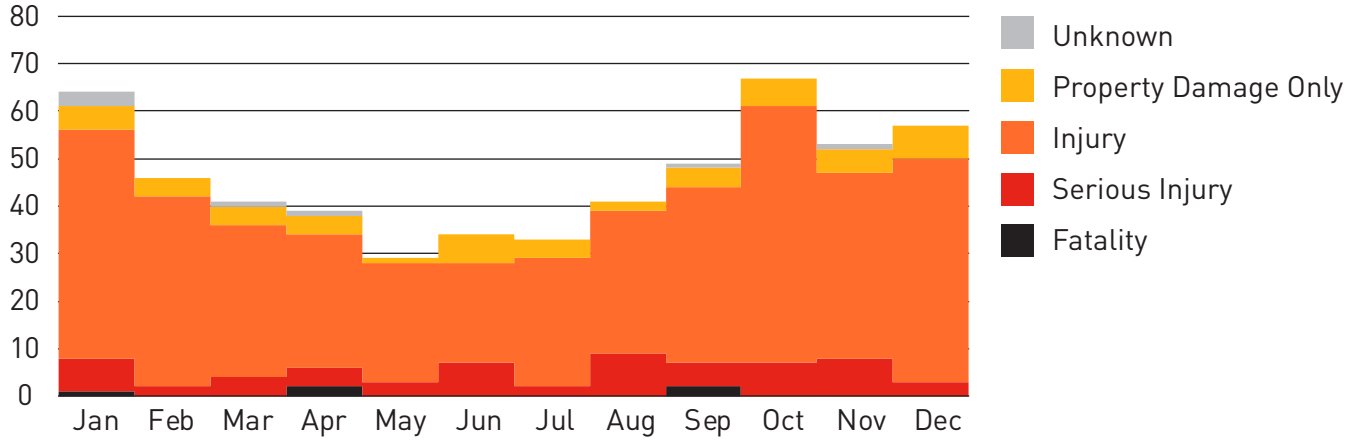
Pedestrian Collision Severity by Hour of Day in 2016						
Hour	Fatality Collision	Serious Injury Collision	Injury Collision	Property Damage Only Collision	Unknown	Total
12 AM	1	5	18	2	7	33
1 AM		1	5			6
2 AM		1	10			11
3 AM			2	1		3
4 AM		1				1
5 AM	1		5			6
6 AM			18			18
7 AM		2	25	2		29
8 AM		5	12	4		21
9 AM	1	3	18	3		25
10 AM	1	2	17	3		23
11 AM		1	18	1		20
12 PM		7	22	2		31
1 PM		1	30	4		35
2 PM		3	23	3		29
3 PM	1	3	20	2		26
4 PM		5	28	1		34
5 PM		4	42	5		51
6 PM		6	36	6		48
7 PM		1	21	3		25
8 PM		2	18	3		23
9 PM		3	14	4		21
10 PM		4	16	1		21
11 PM		1	10	2		13
Total	**5**	**61**	**428**	**52**	**7**	**553**

2016 PEDESTRIAN COLLISION SEVERITY BY DAY OF WEEK



Pedestrian Collision Severity by Day of Week in 2016						
Day of Week	**Fatality Collision**	**Serious Injury Collision**	**Injury Collision**	**Property Damage Only Collision**	**Unknown**	**Total**
Sunday		5	31	5	4	45
Monday		14	65	8		87
Tuesday	1	9	75	5	2	92
Wednesday	1	6	71	6		84
Thursday	1	12	60	13		86
Friday	1	9	76	9	1	96
Saturday	1	6	50	6		63
Total	**5**	**61**	**428**	**52**	**7**	**553**

2016 PEDESTRIAN COLLISION SEVERITY BY MONTH



Pedestrian Collision Severity by Month in 2016						
Month	**Fatality Collision**	**Serious Injury Collision**	**Injury Collision**	**Property Damage Only Collision**	**Unknown**	**Total**
Jan	1	7	48	5	2	63
Feb		2	40	4		46
Mar		4	32	4	1	41
Apr	2	4	28	4	1	39
May		3	25	1		29
Jun		7	21	6		34
Jul		2	27	4		33
Aug		9	30	2		41
Sep	2	5	37	4	1	49
Oct		7	54	6		67
Nov		8	39	5	1	53
Dec		3	47	7		57
Total	**5**	**61**	**428**	**52**	**4**	**553**

Vehicle Actions in Pedestrian Collisions in 2016						
	Fatality Collision	Serious Injury Collision	Injury Collision	Property Damage Only Collision	Unknown	Total
Unknown	1	4	12	1	4	22
Bicycle		1	11			12
Entering At Angle			2			2
From Opposite Direction - One Left Turn - One Straight				2		2
Vehicle Backing Hits Pedestrian		1	5	4		10
Vehicle Going Straight Hits Pedestrian	2	35	136	21		194
Vehicle Hits Pedestrian - All Other Actions		1	5	1		7
Vehicle Turning Left Hits Pedestrian	2	13	119	9		143
Vehicle Turning Right Hits Pedestrian		1	62	8		71

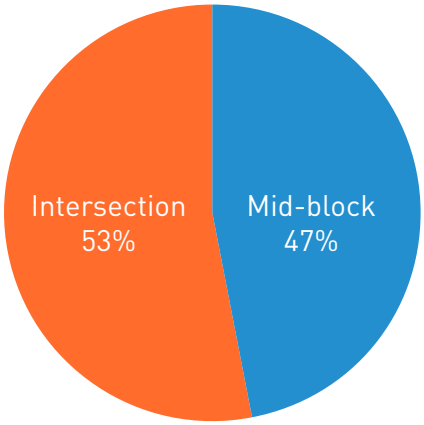
Injury Class of Pedestrians Involved in 2016 Collisions by Weather					
Weather Condition	Fatality Collision	Serious Injury Collision	Injury Collision	Property Damage Only Collision	Total
Clear or Partly Cloudy	3	34	242	29	308
Other	1		1		2
Overcast	1	10	48	7	66
Raining		11	113	12	136
Snowing			1		1
Unknown		2	9	3	14

2016 Pedestrian Collisions by Light Conditions	
Light Condition	**Total**
Dark - No Street Lights	6
Dark - Street Lights Off	5
Dark - Street Lights On	183
Dawn	9
Daylight	291
Dusk	22
Other	1
Unknown	36
Total	**553**

2016 Pedestrian Collisions by Road Condition					
Road Condition	**Fatality Collision**	**Serious Injury Collision**	**Injury Collision**	**Property Damage Only Collision**	**Total**
Dry	3	39	262	31	335
Ice			1		1
Snow/Slush			1		1
Standing Water			1		1
Unknown	1	1	8	3	13
Wet	1	17	142	16	176

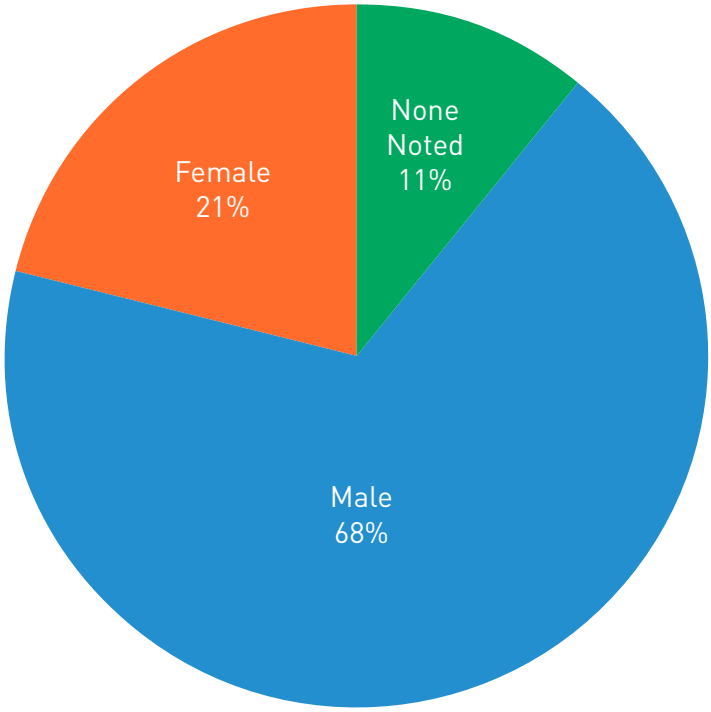
2016 BICYCLE COLLISIONS

2016 BICYCLE COLLISION LOCATIONS



Contributing Circumstance for Cyclists in 2016 Bicycle Collisions							
Contributing Circumstance	Fatal	Serious Injury	Possible Injury	Non-Serious Injury (Evident Injury)	No Injury	Unknown	Total
Unknown		2	7	4	3	2	18
Did not Grant Right of Way to Vehicle			6	4	3	1	14
Disregard Stop and Go Light		1	1	1	1	1	5
Disregard Stop Sign/ Flashing Red			1	3	1		5
Driver Distractions Outiside Vehicle			1				1
Driver Not Distracted		3	3	7	2		15
Exceeding Reasonable and Safe Speed	1			2			3
Following Too Closely				1	1		2
Improper Passing			1	1		1	3
Improper Turn			2	2	1		5
Inattention		3	2	3			8
None	2	9	41	62	9	3	126
On Wrong Side OF Road			1	2			3
Operating Defective Equipment				1			1
Other		1	10	13	2	3	29
Unknown Driver Distraction		3	5			1	9

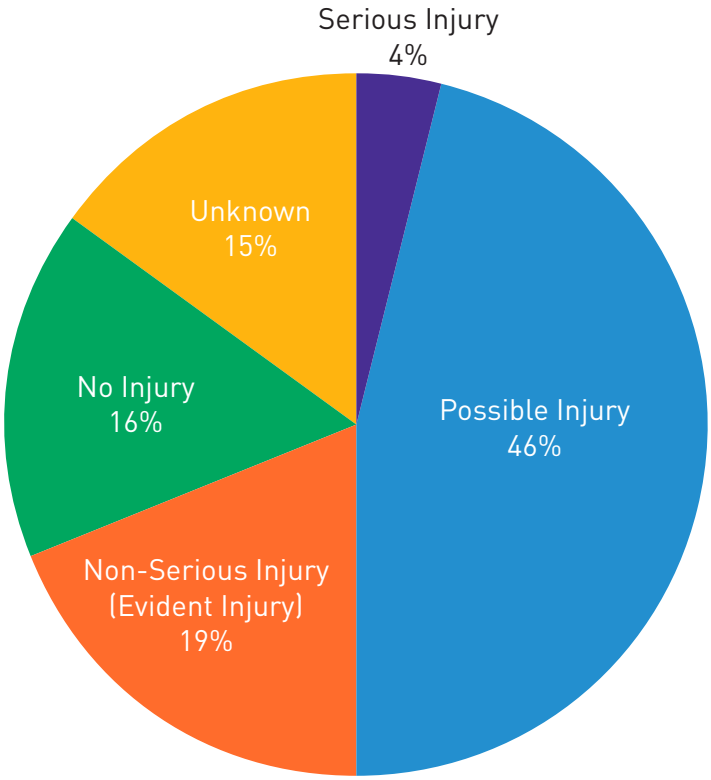
GENDER OF CYCLISTS INVOLVED IN 2016 COLLISIONS



Gender of Cyclists Involved in 2016 Collisions							
Gender	**Fatality**	**Serious Injury**	**Possible Injury**	**Non-Serious Injury (Evident Injury)**	**No Injury**	**Unknown**	**Total**
Not Noted		1	12	5	4	197	219
Male	2	15	52	77	14	8	168
Female	1	6	17	24	5		53

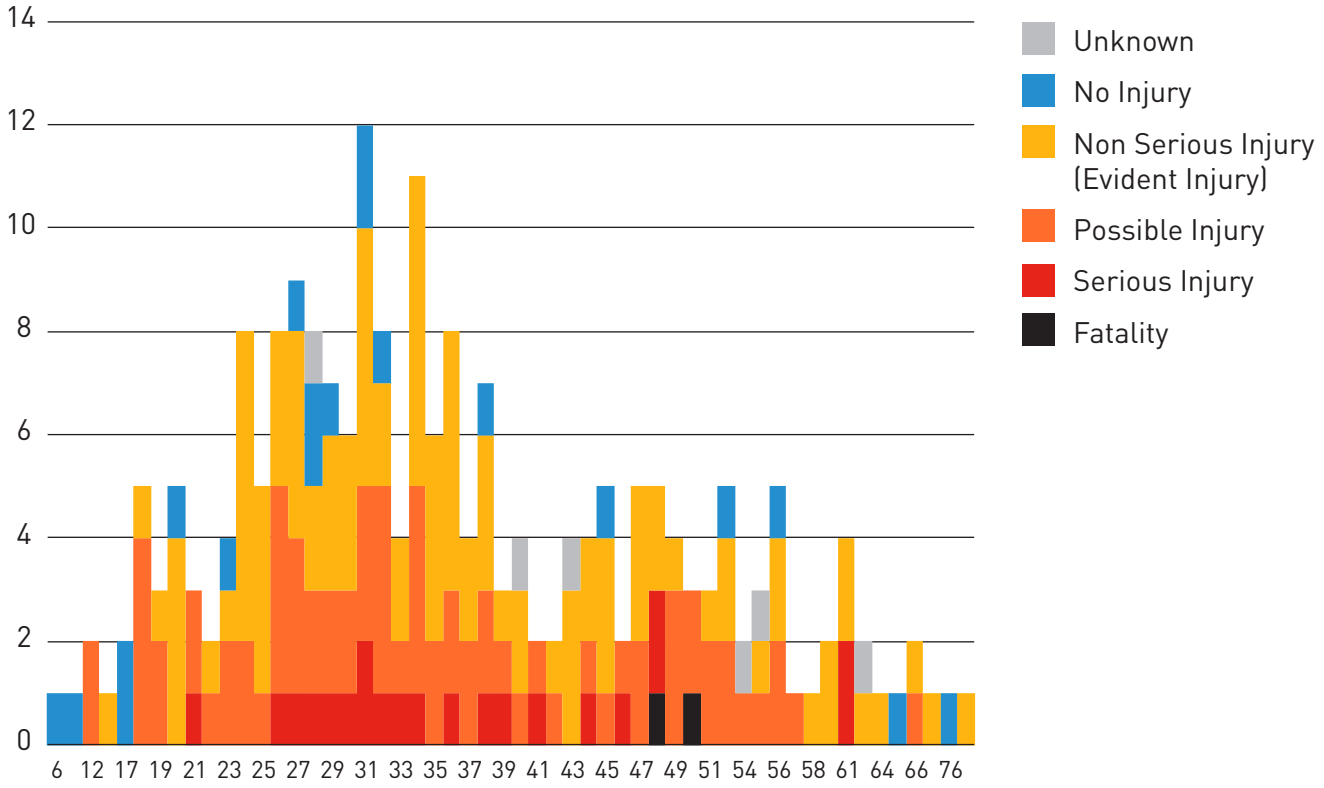

Cannondale

CYCLIST INJURY SEVERITY IN 2016 COLLISIONS



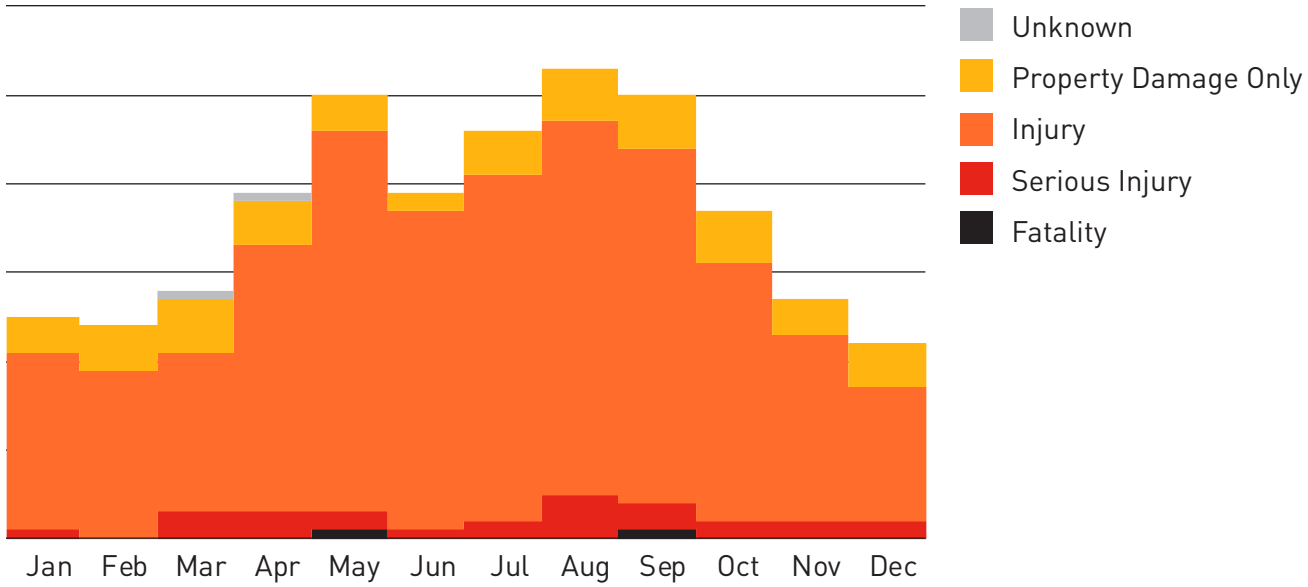
Age of Cyclists Involved in 2016 Collisions							
Age	Fatality	Serious Injury	Possible Injury	Non-Serious Injury (Evident Injury)	No Injury	Unknown	Total
13 and Under			2	1	2		5
17 - 24		1	13	14	4		32
25 - 34		10	26	34	7	1	78
35 - 44		5	13	23	1	2	44
45 - 54	2	3	14	12	2	1	34
55 - 64		2	4	10	1	2	19
65 - Over			1	3	2		6
Not Stated		1	8	9	4	6	28

AGE OF CYCLISTS INVOLVED IN 2016 COLLISIONS



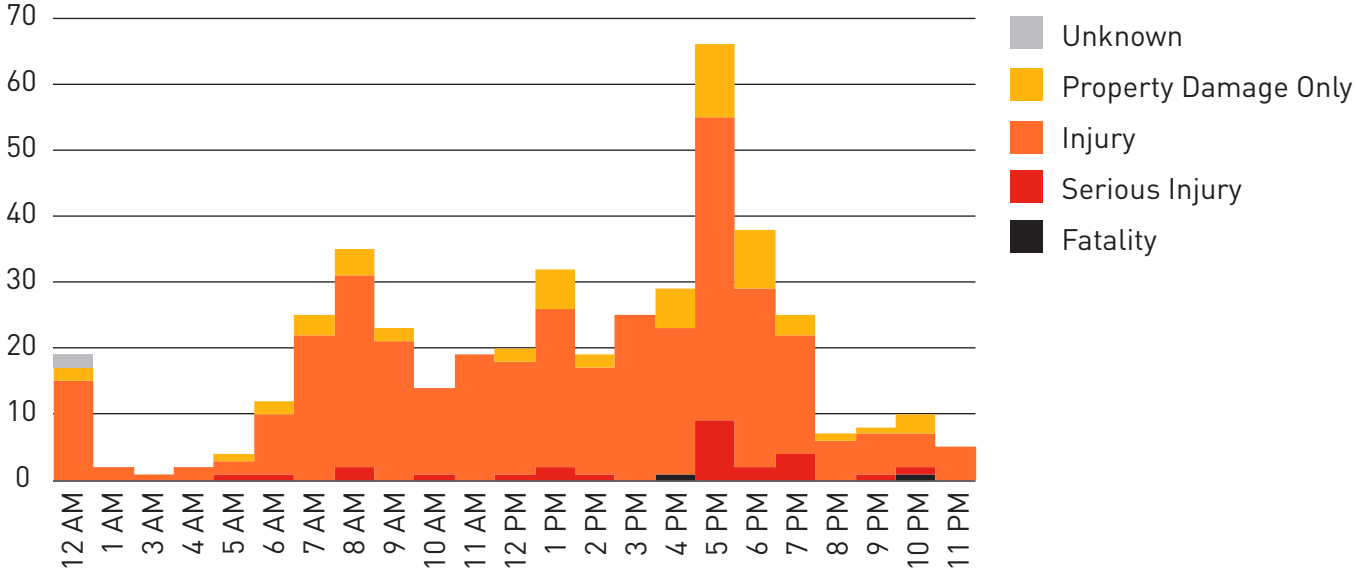
Bicycle Collisions by Month in 2016						
Month	**Fatality Collision**	**Serious Injury Collision**	**Injury Collision**	**Property Damage Only Collision**	**Unknown**	**Total**
Jan		1	20	4		25
Feb			19	5		24
Mar		3	18	6	1	28
Apr		3	30	5	1	39
May	1	2	43	4		50
Jun		1	36	2		39
Jul		2	39	5		46
Aug		5	42	6		53
Sep	1	3	40	6		50
Oct		2	29	6		37
Nov		2	21	4		27
Dec		2	15	5		22
Total	**2**	**26**	**352**	**58**	**2**	**440**

2016 BICYCLE COLLISIONS BY MONTH

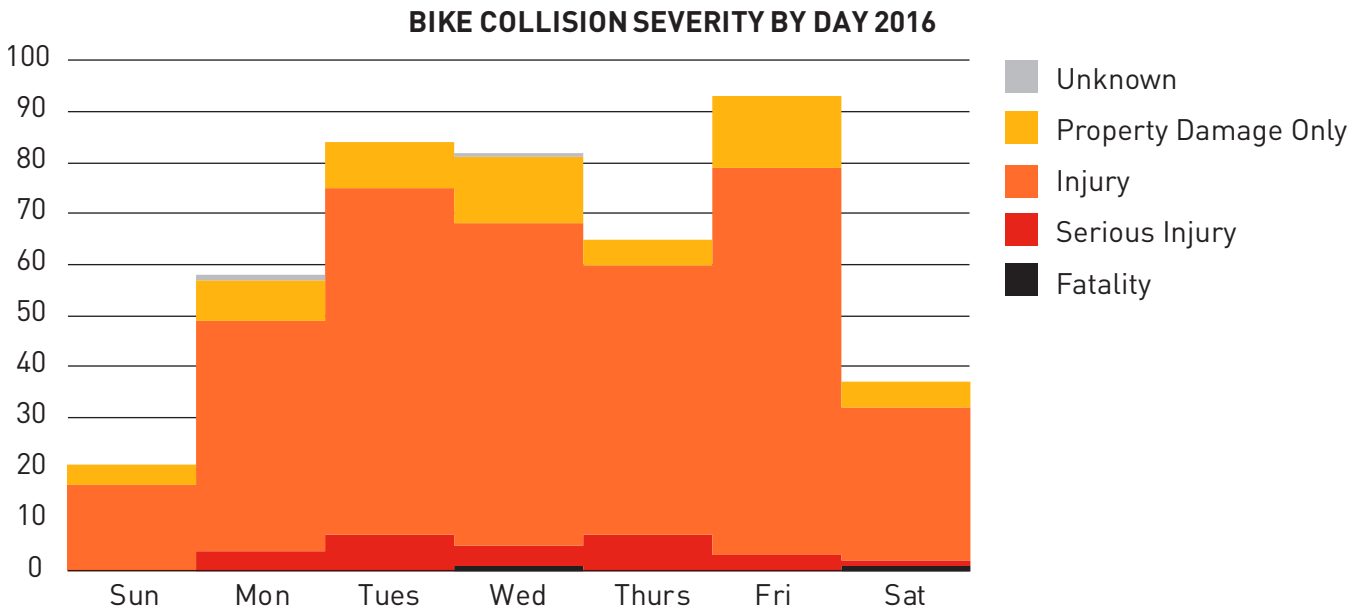


Bike Collision Severity by Hour of Day in 2016						
Hour	Fatality Collision	Serious Injury Collision	Injury Collision	Property Damage Only Collision	Unknown	Total
12 AM			15	2	2	19
1 AM			2			2
3 AM			1			1
4 AM			2			2
5 AM		1	2	1		4
6 AM		1	9	2		12
7 AM			22	3		25
8 AM		2	29	4		35
9 AM			21	2		23
10 AM		1	13			14
11 AM			19			19
12 PM		1	17	2		20
1 PM		2	24	6		32
2 PM		1	16	2		19
3 PM			25			25
4 PM	1		22	6		29
5 PM		9	46	11		66
6 PM		2	27	9		38
7 PM		4	18	3		25
8 PM			6	1		7
9 PM		1	6	1		8
10 PM	1	1	5	3		10
11 PM			5			5
Total	**2**	**26**	**352**	**58**	**2**	**440**

2016 BIKE COLLISION SEVERITY BY HOUR OF THE DAY

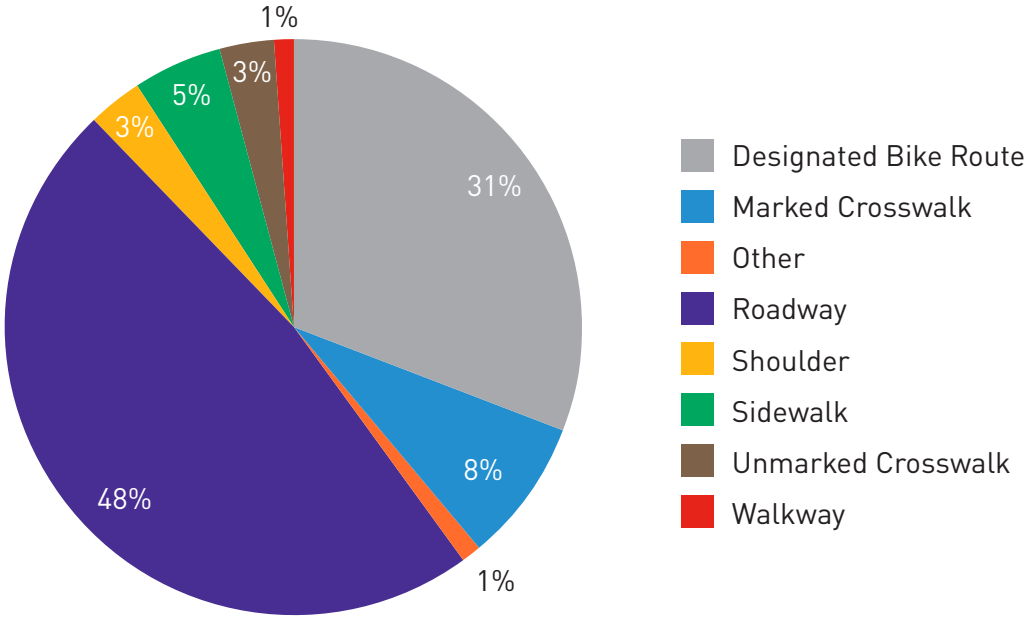


Bike Collision Severity of the Day in 2016						
Day	Fatality Collision	Serious Injury Collision	Injury Collision	Property Damage Only Collision	Unknown	Total
Sunday			17	4		21
Monday		4	45	8	1	58
Tuesday		7	68	9		84
Wednesday	1	4	63	13	1	82
Thursday		7	53	5		65
Friday		3	76	14		93
Saturday	1	1	30	5		37
Total	**2**	**26**	**352**	**58**	**2**	**440**



2016 Injury Class of Cyclists by Facility Type							
Facility Type	Fatality	Serious Injury	Possible Injury	Non-Serious Injury (Evident Injury)	No Injury	Unknown	Total
Unknown		2	1	3	1	1	8
Designated Bike Route		9	16	39	5	4	73
Marked Cross Walk		2	8	4	6		20
Other			1	1			2
Roadway	2	8	43	45	10	6	114
Shoulder		1	1	4			6
Sidewalk			7	6			13
Unmarked Crosswalk			2	4	1		7
Walkway			2			1	3

FACILITY TYPE FOR CYCLISTS INVOLVED IN 2016 COLLISIONS



Injury Class of Cyclists in 2016 Collisions by Weather					
Weather	Fatality Collision	Serious Injury Collision	Injury Collision	Property Damage Only Collision	Total
Blowing Sand or Dirt or Snow			1		1
Clear or Partly Cloudy	1	20	251	38	310
Other	1			1	1
Overcast	1	2	56	8	67
Raining		3	27	8	38
Snowing			1		1
Unknown		1	4	1	6

Clothing Visibility for Cyclists Involved in 2016 Collisions by Facility Type							
Clothing	Fatality	Serious Injury	Possible Injury	Non-Serious Injury (Evident Injury)	No Injury	Unknown	Total
Unknown	2	3	5	4	1	3	17
Dark	1	2	17	17	3	3	43
Light		2	10	18	5	2	37
Mixed		12	39	53	12	4	120
Other Reflective Apparel - Shoes, Patches		3	5	9	1		18
Retro - Reflective			5	5	1		11


PUBLIC
MARKET
RGB
Pike Place Market

GLOSSARY

TRAFFIC VOLUME TERMS

Source – William R. McShane and Roger P. Roess, *Traffic Engineering* (Englewood Cliffs, New Jersey: Prentice Hall, 1990) 49.

ADT: Average Daily Traffic. An average 24-hour traffic volume at a given location for some period less than a year.

AWDT: Average Weekday Daily Traffic. An average 24-hour traffic volume occurring on weekdays for some period of time less than one year, such as for a month or a season.

AADT: Average Annual Daily Traffic. The average 24-hour traffic volume at a given location over a full 365-day year.

INJURY TYPES

Source – State of Washington Police Traffic Collision Report Instruction Manual and SDOT

No Injury: Applies when the officer at the scene has no reason to believe that, at the time of the collision, the person received any bodily harm due to the collision.

Possible Injury: Any injury reported to the officer or claimed by the individual such as momentary unconsciousness, claim of injuries not evident, limping, complaint of pain, nausea, hysteria, etc. These are counted as injuries when the total number of injuries is presented.

Non Serious Injury (Evident Injury): Any injury other than fatal or disabling at the scene, including broken fingers or toes, abrasions, etc.

Serious Injury: Any injury that results in at least a temporary impairment, e.g. a broken limb. It does not mean that the collision resulted in a permanent disability.

Fatality: This category includes persons who died at the scene of the collisions, were dead on arrival at the hospital, or died within 30 days of the collision from collision-related injuries.

ROADWAY CLASSIFICATION TYPES Source – City of Seattle Comprehensive Plan, Section 3.4 and SDOT

Residential (Non-Arterial) Streets: Roadways that provide localized traffic circulation, including access to neighborhood land uses, commercial and industrial land uses, and access to higher level traffic streets.

Collector Arterials: Roadways that collect and distribute traffic from principal and minor arterials to local access streets or provide direct access to destinations.

Minor Arterials: Roadways that distribute traffic from principal arterials to collector arterials and access streets.

Principal Arterials: Roadways that are intended to serve as the primary routes for moving traffic through the city, connecting urban centers and urban villages to one another, or to the regional transportation network.

This report is prepared in compliance with Seattle Municipal Code 11.16.220, which requires the City Traffic Engineer to present an annual traffic report that includes information about traffic trends and traffic collisions on City of Seattle streets. Beyond this legal requirement, the report strives to serve as an accessible reference of Seattle traffic data and trends for all.

In gathering and compiling the information in this report, the Seattle Department of Transportation does not waive the limitations on this information's discoverability or admissibility under 23 U.S.C § 409.

For additional information about traffic data and collisions on Seattle streets, readers may contact the City Traffic Engineer Dongho Chang at dongho.chang@seattle.gov or visit www.seattle.gov/transportation/trafficdata.htm.

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