

State *of* Safety Report

2017



**HOUSTON-GALVESTON AREA COUNCIL
METROPOLITAN PLANNING ORGANIZATION**



Regional Collaboration • Transportation Planning • Multimodal Mobility

State *of* Safety Report

2017

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State of Safety Report

INTRO

Introduction

Traffic safety is critical to the Houston-Galveston area. The four million miles of roadways in our region are the backbone of our economy and our way of life. Safe travel by all modes is the key to this region’s continued prosperity.

The State of Safety Report is an annual overview of motor vehicle crash incidents in the eight-county TMA region. Utilizing Texas Department of Transportation (TxDOT) Crash Record Information System records, the report summarizes vehicle crashes by county and category. Grouping vehicle crashes in this way allows policy makers and traffic safety professionals to better assess the location and magnitude of various types of vehicle crashes in the region.

The report covers a five-year period from 2012 to 2016, and is organized by vehicle crash categories. There are 12 vehicle crash categories, and a regional summary for all vehicle crashes. Each vehicle crash category includes annual summary tables of total crashes, fatalities, and serious injuries grouped by county.

Five of the vehicle crash categories have been identified as focus areas by the State of Texas and the H-GAC Regional Safety Council. These five crash categories are: Impaired Driving, Distracted Driving, Speeding-related, Bicycle-involved and Pedestrian-involved vehicle crashes. These vehicle crash categories were designated as focus areas because of the frequency and/or magnitude of these types of vehicle crashes in terms of fatalities and serious injuries. Additional

Federal Safety Performance Measures

Safety Performance Measures	2016
Number of Fatalities	715
Rate of Fatalities (per 100 million VMT ¹)	1.4
Number of Serious Injuries	3,390
Rate of Serious Injuries (per 100 million VMT)	6.6
Number of Non-motorized Fatalities & Serious Injuries	615

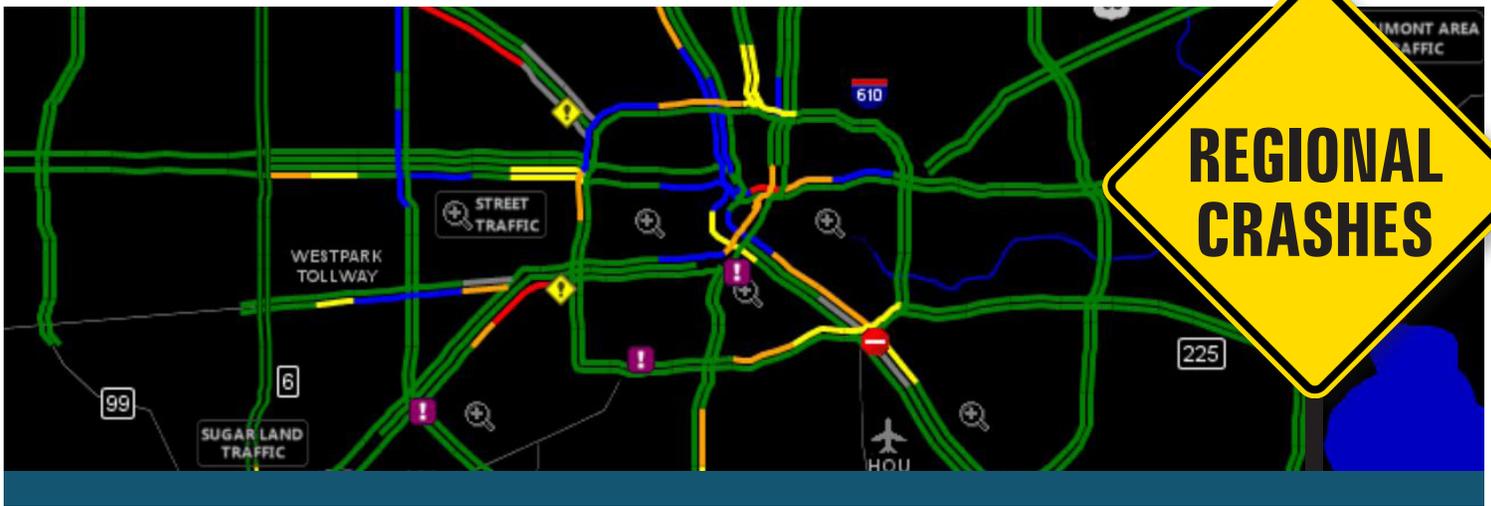
¹Vehicle Miles Traveled

information and analysis is provided in the focus area sections of the report.

Safety Performance Management (Safety PM) is part of the Federal Highway Administration’s (FHWA) Transportation Performance Management (TPM) program. The Safety PM Final Rule established five safety performance measures. The table above depicts the federal safety performance measures and the 2016 numbers for the TMA region.

Regional Crash Summary

Crash Type	Total Crashes	Percent of All Crashes	Percent Change from 2015	Fatalities	Serious Injuries
Regional Crashes	170,099	100%	+2%	715	3,390
Speeding	51,212	30%	-1%	155	769
Young Drivers	30,562	18%	-0.03%	62	579
Distracted Drivers	18,614	11%	-15%	56	356
Elderly Drivers	19,011	11%	+5%	75	357
Commercial Vehicles	8,625	5%	-5%	68	161
Unrestrained Occupants	6,791	4%	-1%	53	182
Impaired Driving (DUI)	3,418	2%	-7%	318	310
Work Zones	4,029	2%	-0.3%	24	80
Pedestrian	1,983	1%	+3%	189	192
Motorcycles	1,975	1%	+9%	120	377
Bicycle	889	0.5%	+8%	21	102
Railroad-related Crashes	403	0.2%	+5%	2	18



Regional Crashes

The Houston-Galveston Area has seen a marked increase in vehicle crashes in the last five years. Between 2012 and 2016, the total number of crashes increased by over 40 percent. With this, fatalities increased over 20 percent, from 590 in 2012 to 715 in 2016. Serious injuries only increased by 9 percent over the same period.

The Regional Crash Summary table, on page 2, shows the 2016 total vehicle crashes, percentage of crashes by category, and the percentage change from 2015, as well as fatalities and serious injuries for each category. Of note are sharp increases in motorcycle, bicycle, and pedestrian crashes, as well as major decreases in Impaired Driving, Distracted Driving, and Commercial Vehicle crashes.

Regional Crashes

	2012	2013	2014	2015	2016
Brazoria	4,980	5,156	5,189	5,872	6,114
Chambers	971	1,037	1,071	1,168	1,290
Fort Bend	7,276	8,025	8,977	9,962	10,688
Galveston	6,333	6,359	6,508	7,468	8,082
Harris	91,405	101,715	118,738	129,288	131,156
Liberty	1,206	1,278	1,296	1,238	1,321
Montgomery	7,697	8,636	9,537	10,823	10,536
Waller	649	619	654	787	912
TOTAL	120,517	132,825	151,970	166,606	170,099

Regional Crash Fatalities

	2012	2013	2014	2015	2016
Brazoria	36	45	29	43	48
Chambers	9	13	20	15	21
Fort Bend	36	51	35	39	38
Galveston	34	27	33	44	44
Harris	375	381	427	399	460
Liberty	22	23	15	18	20
Montgomery	67	52	54	61	77
Waller	11	19	11	7	7
TOTAL	590	611	624	626	715

Regional Crash Serious Injuries

	2012	2013	2014	2015	2016
Brazoria	138	190	176	202	233
Chambers	37	78	43	77	33
Fort Bend	188	224	188	208	192
Galveston	169	154	162	172	158
Harris	2,163	2,119	2,369	2,426	2,341
Liberty	95	111	71	74	77
Montgomery	284	315	310	318	306
Waller	32	58	34	32	50
TOTAL	3,106	3,249	3,353	3,509	3,390

CRASH FACTS 2012-2016

VEHICLE CRASHES

 **40%**



2012: **120,517**
2016: **170,099**

CRASH FATALITIES

 **20%**



2012: **590**
2016: **715**

Source: TxDOT 2016



Bicyclists

As a means of travel, recreation, or exercise, bicycling is becoming more popular throughout the region. Regionally, the number of bicycle-involved crashes has increased from 820 in 2012 to 889 in 2016. Likewise, fatalities and serious injuries have also increased over the same time period. As noted below, in approximately 70 percent of bicycle-involved crashes the bicyclists are adults between 18 and 64 years of age. Fifty-four percent of bicycle crashes occur on local streets, and nearly half of those crashes occur between 3 PM and 7 PM.

Bicyclists encounter far greater safety risks compared to other roadway users, despite sharing the same rights and responsibilities as motorized vehicles. Bicyclists are significantly less protected in the event of a crash compared to automobile drivers. They are more difficult to see due to their size and physical profile. With far fewer numbers than motor vehicles on the road, many drivers may not be consciously looking out for bicyclists while driving.

TIPS FOR SHARING THE ROAD

BICYCLISTS

- Make yourself visible to the driving public with bright colors and reflective gear
- Follow all traffic laws
- Make your intentions clear when stopping or turning
- Avoid distractions – don't listen to music while riding

DRIVERS

- Give cyclists at least three feet while passing
- Always look for passing traffic before opening your car door
- Check mirrors and blind spots for bicyclists
- Don't park in bike lanes

Source: FHWA Ped-Bike Info Center

Bicyclist Crashes

	2012	2013	2014	2015	2016
Brazoria	26	21	22	12	22
Chambers	1	0	3	1	1
Fort Bend	48	48	53	74	65
Galveston	67	56	40	51	83
Harris	625	627	654	635	660
Liberty	4	5	4	4	2
Montgomery	43	41	46	44	52
Waller	6	1	2	3	4
TOTAL	820	799	824	824	889

Bicyclist Fatalities

	2012	2013	2014	2015	2016
Brazoria	0	1	1	2	0
Chambers	0	0	0	0	0
Fort Bend	0	0	1	4	0
Galveston	1	1	1	2	2
Harris	8	9	12	9	12
Liberty	0	1	0	1	1
Montgomery	3	1	0	0	6
Waller	1	1	0	0	0
TOTAL	13	14	15	18	21

Bicyclist Serious Injuries

	2012	2013	2014	2015	2016
Brazoria	2	3	2	1	4
Chambers	0	0	0	0	0
Fort Bend	3	4	9	12	5
Galveston	3	6	6	12	11
Harris	66	61	62	60	71
Liberty	1	2	1	0	0
Montgomery	3	7	4	6	10
Waller	3	0	0	0	1
TOTAL	81	83	84	91	102

Bicyclist Crashes by Hour of Day



Bicyclist Crashes by Road Type

Road Type	Percent of Crashes
City Street	53.9%
County Road	13.3%
Non Trafficway	12.2%
Highway Frontage Roads	11.9%
FM Roads	8.6%
TOTAL	100%

Bicyclist Crashes by Age Group

Age Group	Percent of Crashes	Percent of Pop
< 18	24.8%	26.7%
18-40	37.3%	33.4%
41-64	33.0%	30.0%
65+	4.9%	10.0%
TOTAL	100%	100%





Pedestrians

Nearly everyone is a pedestrian at some point during the day, whether as a primary mode of transportation to and from work or walking down the street to visit a neighbor. Pedestrian-involved crashes while not the most prevalent tend to always be the most severe.

Regionally, the number of crashes has steadily increased from 1,625 in 2012 to 1,983 in 2016. Pedestrian fatalities and serious injuries have general trended upward as well. In 2016, pedestrian-involved vehicle crashes accounted for almost 25 percent of all traffic fatalities in the region.

Nearly half of all pedestrian-involved crashes in the region occur between 6 PM and Midnight. As shown in the chart below, the most dangerous hours of the day for pedestrians are around dusk.

PEDESTRIAN SAFETY TIPS

- Stand clear of buses, hedges, parked cars, or other obstacles before crossing so drivers can see you.
- Always walk on the sidewalk. If there is no sidewalk, walk facing traffic.
- Make eye contact with drivers, don't just look at the vehicle. If a driver is on a cell phone, he or she may not be paying enough attention to drive safely.
- Don't rely solely on pedestrian signals. Look before you cross the road.
- Be alert to engine noise or backup lights on cars when in parking lots and near on-street parking spaces.
- Cross streets at marked crosswalks or intersections, if possible.
- Look left, right, and left again before crossing a street.

Source: FHWA Ped-Bike Info Center

Pedestrian Crashes

	2012	2013	2014	2015	2016
Brazoria	40	36	31	38	46
Chambers	3	7	4	9	5
Fort Bend	61	62	64	77	73
Galveston	69	46	69	68	81
Harris	1,388	1,466	1,560	1,662	1,691
Liberty	8	8	7	6	14
Montgomery	55	54	79	66	66
Waller	1	7	1	6	7
TOTAL	1,625	1,686	1,815	1,932	1,983

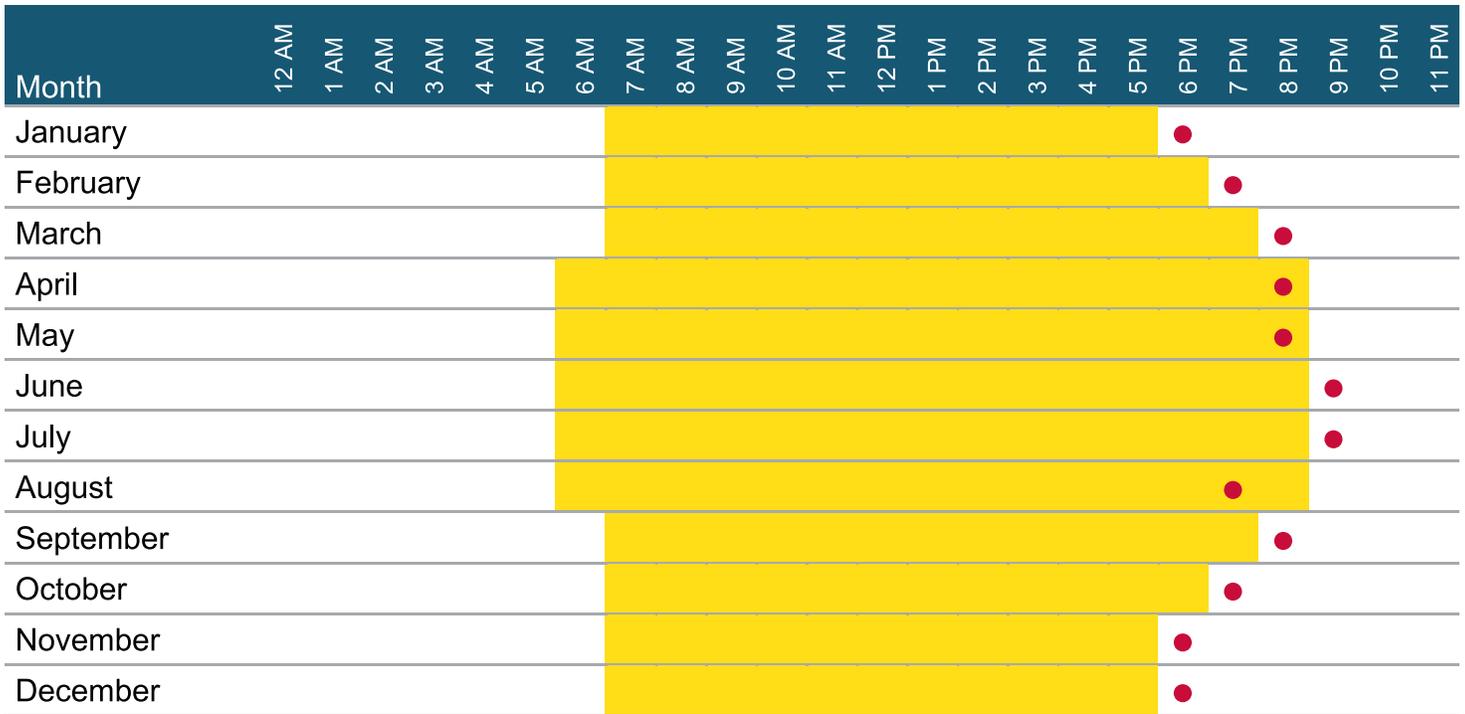
Pedestrian Fatalities

	2012	2013	2014	2015	2016
Brazoria	6	5	1	4	8
Chambers	0	2	2	1	3
Fort Bend	5	3	3	8	6
Galveston	9	3	4	10	14
Harris	85	87	92	94	130
Liberty	0	3	1	1	4
Montgomery	4	7	5	12	10
Waller	0	4	0	2	2
TOTAL	109	114	108	132	177

Pedestrian Serious Injuries

	2012	2013	2014	2015	2016
Brazoria	8	7	7	9	13
Chambers	1	3	1	6	0
Fort Bend	9	8	9	14	9
Galveston	8	9	19	15	17
Harris	199	214	255	241	255
Liberty	3	1	4	1	2
Montgomery	7	15	15	8	13
Waller	0	1	0	1	3
TOTAL	235	258	310	295	312

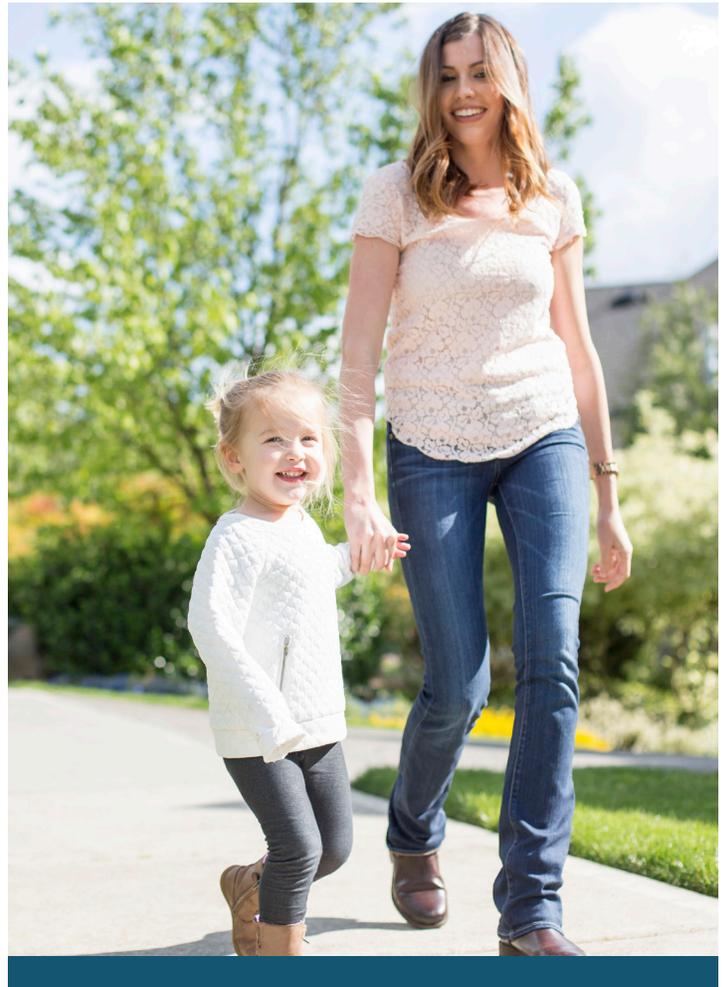
Hour of Day with the Highest Percentage of Pedestrian Vehicle Crashes



■ Daylight Hours
 ● Highest Percentage Hour

Pedestrian Crashes by Time of Day

Time of Day	Percent of Crashes
Midnight to 6 AM	13.7%
6 AM to 12 noon	18.7%
12 noon to 6PM	25.6%
6 PM to Midnight	42.0%
TOTAL	100.0%





Speeding

Speed-related crashes include those crashes where unsafe speed or speeding over the limit was indicated as a contributing factor. Speed-related crashes steadily increased from 2012 to 2015, but declined one percent in 2016. Fatalities and serious injuries fluctuated during this period, but generally showed a downward trend.

In 2016, speed-related crashes comprised 30 percent of all regional crashes. Nearly 60 percent of drivers in speed-related crashes were under 40 years of age—almost double this age group’s percentage of the general population. Nearly half of all speeding crashes occur on regional interstates and highways. However, over 20 percent occur on local streets.

CAUSES OF SPEEDING

TRAFFIC can cause drivers to use aggressive driving behaviors including speeding, changing lanes frequently, or becoming angry at other drivers

RUNNING LATE for work, school, their next meeting, lesson, soccer game, or other appointment.

ANONYMITY from the world, where some people feel less constrained in their behavior.

DISREGARD FOR OTHERS AND FOR THE LAW while not exhibited by most drivers, is shown by some infrequently. And for a small proportion disregard for others and the law is their usual driving behavior.

Source: NHTSA

Speeding-related Crashes

	2012	2013	2014	2015	2016
Brazoria	1,606	1,744	1,732	1,993	1,934
Chambers	268	251	314	334	376
Fort Bend	2,708	2,857	3,215	3,534	3,635
Galveston	1,998	1,943	2,051	2,282	2,317
Harris	25,165	28,751	35,392	38,857	38,469
Liberty	422	409	436	402	374
Montgomery	3,027	3,292	3,657	4,090	3,872
Waller	215	184	214	243	235
TOTAL	35,409	39,431	47,011	51,735	51,212

Speeding-related Crash Fatalities

	2012	2013	2014	2015	2016
Brazoria	9	12	11	14	11
Chambers	2	1	8	4	4
Fort Bend	13	13	13	10	11
Galveston	18	12	14	15	11
Harris	91	106	117	100	95
Liberty	10	5	6	4	6
Montgomery	27	17	18	14	16
Waller	5	4	5	1	1
TOTAL	175	170	192	162	155

Speeding-related Serious Injuries

	2012	2013	2014	2015	2016
Brazoria	50	61	39	54	53
Chambers	7	18	8	24	5
Fort Bend	68	83	64	63	58
Galveston	73	49	56	46	31
Harris	516	561	649	622	509
Liberty	40	39	17	20	17
Montgomery	110	107	108	126	82
Waller	12	19	11	11	14
TOTAL	876	937	952	966	769

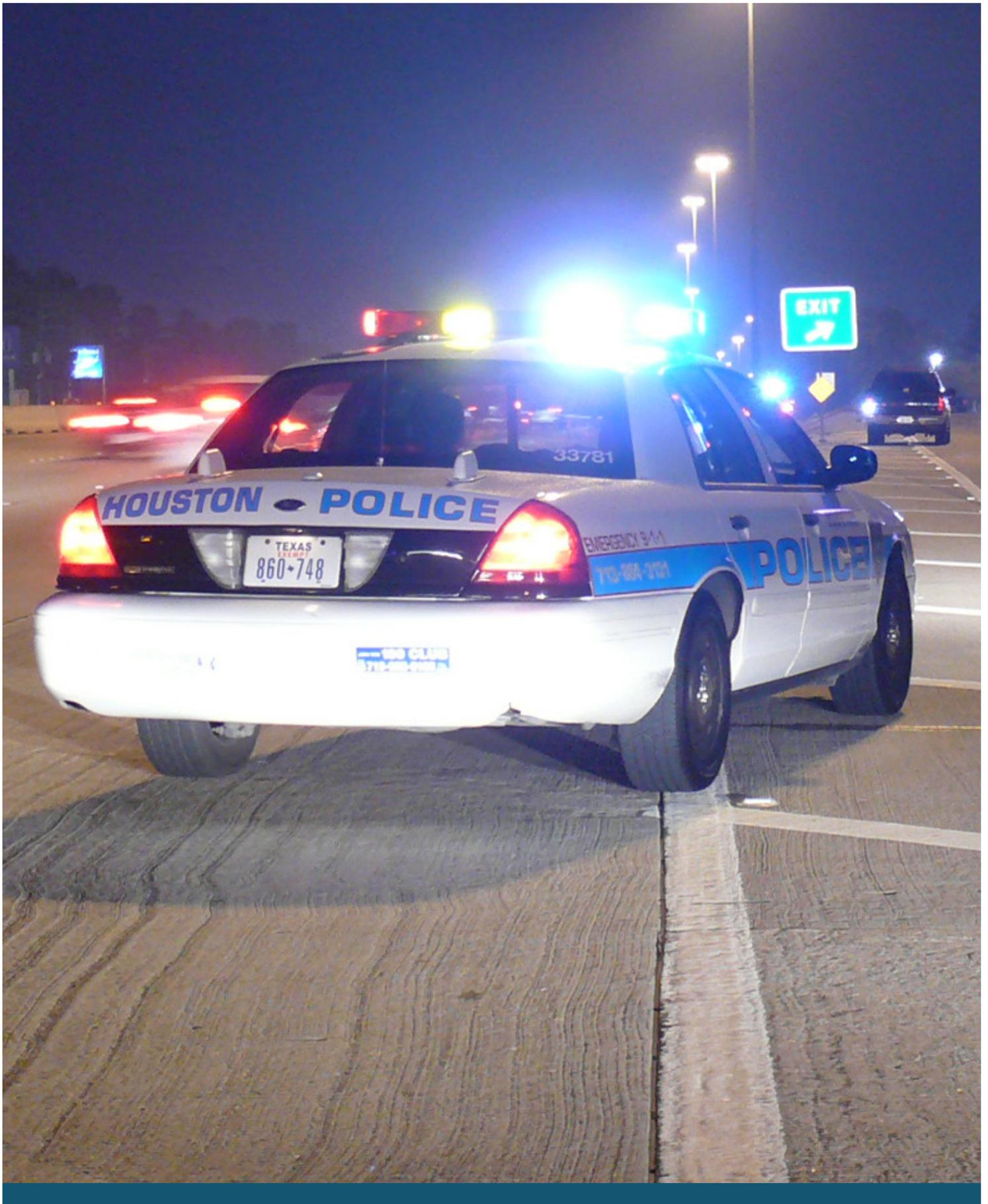


Photo: Houston Police Department



Impaired Drivers

Alcohol and drug-related crashes involve a driver who is either intoxicated or impaired by some other substance. Drivers who are “intoxicated” have a blood alcohol content that equals or exceeds the legal level of 0.08%, which is known as driving while intoxicated (DWI). Substance impaired driving includes the use of alcohol as well as legal or illegal substances that impair driving ability, referred to as driving under the influence (DUI).

At the regional level, alcohol-related crashes comprised only one percent of all crashes in 2016. Conversely, alcohol related crash fatalities made up 27 percent of the region’s fatalities. The number of fatalities increased 38 percent in a single year, from 142 in 2015 to 196 in 2016. The number of fatalities from DWI accounts for over 60 percent of the region’s DUI fatalities. It is important to note that drivers with prior DWI convictions are more likely to continue to drink and drive and eventually become involved in a fatal alcohol related crash.

TIPS FOR ALCOHOL USERS

- Before drinking, designate a non-drinking driver when with a group.
- Don’t let your friends drive impaired.
- If you have been drinking or using drugs, get a ride home or call a taxi.
- If you’re hosting a party where alcohol will be served, remind your guests to plan ahead and designate their sober driver; offer alcohol-free beverages, and make sure all guests leave with a sober driver.

Source: Drunk Driving - National Highway Traffic Safety Administration (NHTSA)

DWI Crashes

	2012	2013	2014	2015	2016
Brazoria	78	50	46	70	102
Chambers	22	16	8	17	15
Fort Bend	95	54	44	54	85
Galveston	67	45	34	57	73
Harris	1,042	878	975	1,199	1,298
Liberty	10	10	15	19	36
Montgomery	205	145	115	250	234
Waller	26	9	7	10	26
TOTAL	1,545	1,207	1,244	1,676	1,869

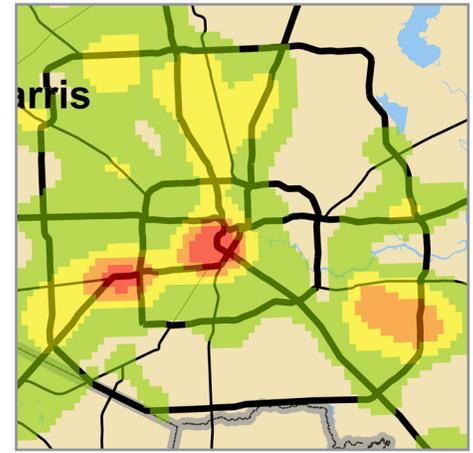
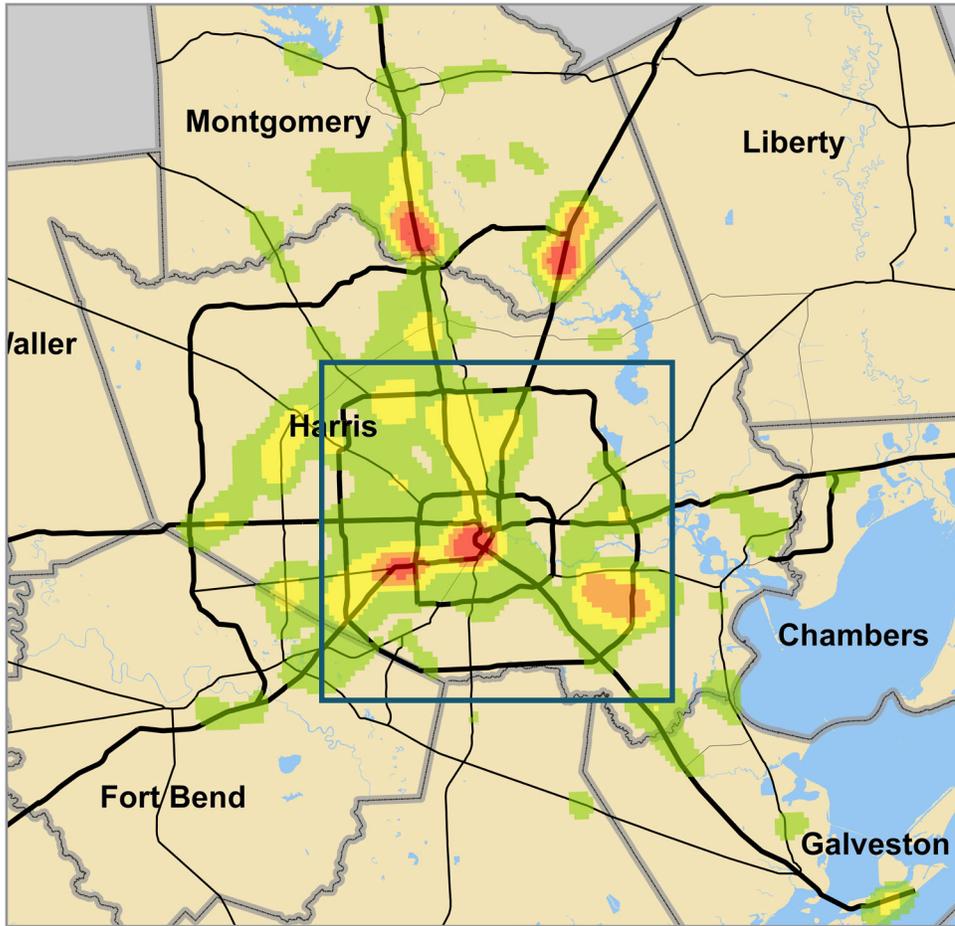
DWI Fatalities

	2012	2013	2014	2015	2016
Brazoria	9	13	3	9	18
Chambers	1	2	3	2	2
Fort Bend	14	10	5	6	8
Galveston	10	1	1	6	10
Harris	136	102	127	101	138
Liberty	3	1	2	4	1
Montgomery	24	10	14	14	18
Waller	2	2	0	0	1
TOTAL	199	141	155	142	196

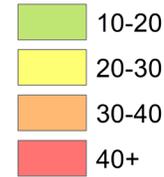
DWI Serious Injuries

	2012	2013	2014	2015	2016
Brazoria	7	9	5	8	18
Chambers	3	3	0	8	0
Fort Bend	11	0	5	1	3
Galveston	4	1	3	1	3
Harris	100	94	79	85	95
Liberty	1	4	2	2	4
Montgomery	38	22	19	32	26
Waller	3	2	0	0	5
TOTAL	167	135	113	137	154

DWI Crash Density per Square Mile



DWI Crash Density (per Sq Mi)



DUI Crashes

	2012	2013	2014	2015	2016
Brazoria	229	217	180	207	205
Chambers	79	81	58	66	60
Fort Bend	234	196	242	214	182
Galveston	236	204	217	202	188
Harris	2,181	2,072	2,463	2,415	2,234
Liberty	44	46	54	51	53
Montgomery	456	466	426	511	449
Waller	54	35	31	29	47
TOTAL	3,513	3,317	3,671	3,695	3,418

DUI Driver Fatalities

	2012	2013	2014	2015	2016
Brazoria	12	21	9	18	24
Chambers	6	6	5	2	5
Fort Bend	25	13	12	15	11
Galveston	11	7	11	17	16
Harris	209	171	215	169	219
Liberty	4	3	2	7	3
Montgomery	35	28	24	27	39
Waller	5	4	0	1	1
TOTAL	307	253	278	256	318

DUI Driver Serious Injuries

	2012	2013	2014	2015	2016
Brazoria	17	25	10	27	33
Chambers	5	10	2	15	3
Fort Bend	25	13	20	17	14
Galveston	25	10	16	9	12
Harris	214	201	202	185	171
Liberty	9	14	5	14	9
Montgomery	79	54	43	56	60
Waller	6	11	1	3	8
TOTAL	380	338	299	326	310

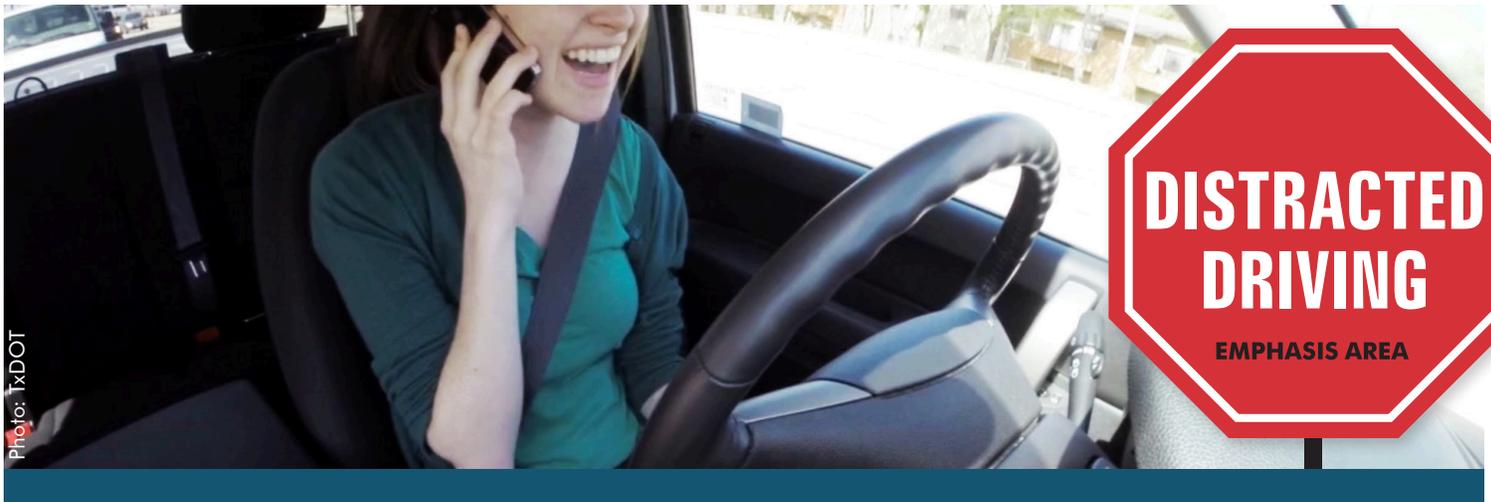


Photo: TxDOT

Distracted Driving

Distracted driving crashes are those where distractions within the vehicle, driver inattention, or cell phone use was identified as a contributing factor. This involves any activity whereby the driver's eyes, hands and/or attention are diverted from driving the vehicle.

Across the region, the number of distracted driving crashes have increased from 15,178 in 2012 to 18,614 in 2016, which represents a 23 percent increase. Of the 18,614 distracted driving crashes in 2016, 42 percent involved mobile phone use.

One form of distracted driving, texting-while-driving, was recently addressed in a new law by the Texas State Legislature. House Bill 62 took effect September 1, 2017 and bans texting-while-driving statewide. In 2009, the State has passed legislation (HB 55) to ban the use of mobile phones in school zones unless they are used with hands-free devices.

WAYS TO END DISTRACTED DRIVING

- Always give driving your full attention.
- Put your phone away or turn it off before you get behind the wheel.
- Pull off the road to a safe location before talking on the phone or texting.
- Tell friends, family, and coworkers you won't respond to calls or texts when driving.
- Use a smartphone app that sends auto-reply texts when you're behind the wheel.
- Spread the word. Tell your friends and family about the dangers of distracted driving.

Source: TxDOT - Talk, Text, Crash

Distracted Driver Crashes

	2012	2013	2014	2015	2016
Brazoria	954	1,011	1,139	1,117	886
Chambers	112	175	148	166	143
Fort Bend	1,267	1,319	1,508	1,236	1,045
Galveston	1,564	1,760	2,044	2,002	1,510
Harris	9,873	11,114	14,353	15,513	13,477
Liberty	184	188	187	155	176
Montgomery	1,107	1,316	1,522	1,598	1,192
Waller	117	127	147	187	185
TOTAL	15,178	17,010	21,048	21,974	18,614

Distracted Driver Fatalities

	2012	2013	2014	2015	2016
Brazoria	10	7	3	11	5
Chambers	0	2	4	1	1
Fort Bend	1	5	6	3	4
Galveston	7	9	3	6	6
Harris	30	27	53	23	32
Liberty	0	6	1	1	3
Montgomery	9	2	15	9	5
Waller	0	0	0	2	0
TOTAL	57	58	85	56	56

Distracted Driver Serious Injuries

	2012	2013	2014	2015	2016
Brazoria	28	33	32	41	31
Chambers	6	7	5	5	3
Fort Bend	26	32	39	28	22
Galveston	29	37	49	47	27
Harris	196	228	317	293	231
Liberty	13	8	12	6	7
Montgomery	26	42	66	37	28
Waller	6	5	0	3	7
TOTAL	330	392	520	460	356

Don't drive under the influence of your phone.

Always give driving your full attention.



When driving, put your phone away.



Source: txdot.gov/driver/share-road/distracted.html



Unrestrained Persons

According to the National Highway Traffic Safety Administration, the national seatbelt use rate in 2016 was 90.1%, and 91.6% in the State of Texas. However, the number of crashes involving unrestrained persons in our Region has increased since 2012. While fatalities in this category declined over the five-year period, serious injuries trended upward.

Throughout the region, nearly 60 percent of all unrestrained persons involved in vehicle crashes were under 21 years of age. And, despite the child-occupant restraint laws, over 25 percent of all unrestrained were less than 8 years old.

Fatalities and injuries listed below do not include those individuals who do not have access to a restraint such as motorcycle riders, pedestrians, bicyclists, or individuals riding in the bed of a pickup truck.

TEXAS CLICK IT OR TICKET

The NHTSA estimates that since its inception in 2002, the “Click It or Ticket” campaign in Texas has resulted in 4,687 fewer traffic fatalities while preventing 79,578 serious injuries. When “Click It or Ticket” began, only 76 percent of Texans used their seat belts; today, that number has increased to 90 percent.

Texas law requires everyone in a vehicle to buckle up or face fines and court costs up to \$200. Children younger than 8 years old must be in a child safety seat or booster seat unless they are taller than 4 feet 9 inches.

Source: TxDOT

Unrestrained Persons Crashes

	2012	2013	2014	2015	2016
Brazoria	155	161	125	139	205
Chambers	28	43	25	24	34
Fort Bend	235	213	268	320	261
Galveston	248	231	285	435	446
Harris	4,086	4,536	5,138	5,591	5,554
Liberty	33	51	31	34	27
Montgomery	250	177	237	268	228
Waller	19	53	25	28	36
TOTAL	5,054	5,465	6,134	6,839	6,791

Unrestrained Persons Fatalities

	2012	2013	2014	2015	2016
Brazoria	2	3	3	7	2
Chambers	2	2		2	3
Fort Bend	6	2	3	1	4
Galveston	4	1	6	2	1
Harris	33	37	41	38	37
Liberty	3	4	0	0	2
Montgomery	9	3	2	3	4
Waller	0	2	0	0	0
TOTAL	59	54	55	53	53

Unrestrained Persons Serious Injuries

	2012	2013	2014	2015	2016
Brazoria	8	16	6	8	15
Chambers	3	7	3	5	1
Fort Bend	7	11	8	6	9
Galveston	10	11	7	7	9
Harris	97	116	127	111	124
Liberty	8	7	5	5	4
Montgomery	13	16	13	27	17
Waller	2	4	2	4	3
TOTAL	148	188	171	173	182



Young Drivers

Young drivers are motorists that are 16 to 20 years old. This age period is when most youth begin driving motor vehicles. Unrefined driving skills in adverse driving conditions, combined with distracted driving tendencies and greater inclination toward risk-taking all contribute to young driver crashes. Young drivers are at a greater risk than elderly drivers of being involved in crashes involving serious injuries, and the Centers for Disease Control states vehicular crashes as the leading cause of death in the for this age group nationally.

Young driver crashes represent almost 18 percent of all regional crashes. The incidence of these crashes in the region has increased by over 24 percent between 2012 and 2016. Serious injuries and fatalities for this category of vehicle crashes fluctuated during the same time period.

YOUNG DRIVER RISKS

The Texas A&M Transportation Institute (TTI) has identified five major risks that contribute to young driver crashes:

- Driving at night
- Speeding and Street Racing
- Distractions – such as cell phones/texting and other teens in the car
- Not wearing a seat belt
- Driving under the influence

Source: Texas A&M Transportation Institute

Young Driver Crashes

	2012	2013	2014	2015	2016
Brazoria	1,319	1,326	1,305	1,496	1,405
Chambers	203	217	218	183	243
Fort Bend	1,953	2,045	2,261	2,378	2,463
Galveston	1,519	1,452	1,368	1,553	1,652
Harris	17,138	18,177	20,885	21,830	21,718
Liberty	281	238	279	276	280
Montgomery	2,052	2,365	2,487	2,791	2,628
Waller	137	178	122	161	173
TOTAL	24,602	25,998	28,925	30,668	30,562

Young Driver Fatalities

	2012	2013	2014	2015	2016
Brazoria	0	1	2	1	2
Chambers	0	1	0	0	0
Fort Bend	0	2	3	2	2
Galveston	1	1	1	2	
Harris	16	10	18	24	13
Liberty	0	0	0	1	0
Montgomery	8	2	3	4	2
Waller	0	1	1	0	0
TOTAL	25	18	28	34	19

Young Driver Serious Injuries

	2012	2013	2014	2015	2016
Brazoria	10	9	8	14	13
Chambers	2	6	4	4	2
Fort Bend	12	17	16	13	14
Galveston	14	9	6	4	8
Harris	125	99	140	131	126
Liberty	11	6	4	7	8
Montgomery	12	24	15	26	17
Waller	2	9	0	2	4
TOTAL	188	179	193	201	192

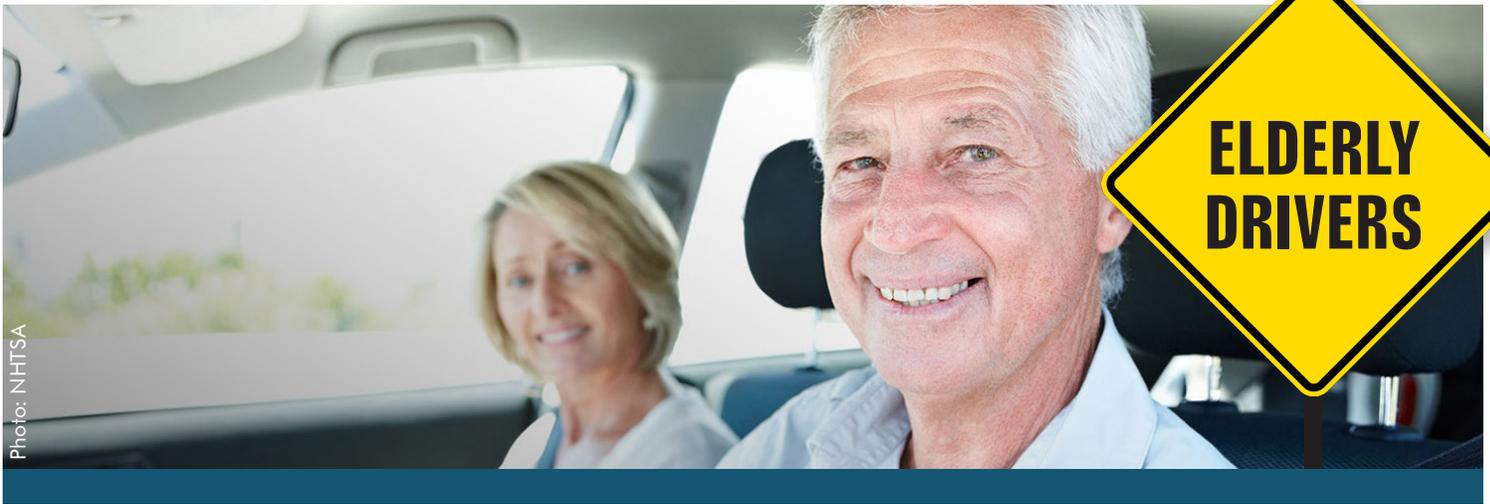


Photo: NHTSA

Elderly Drivers

Elderly driver crashes involve a driver that is 65 years or older. As of 2015, the U.S. Census Bureau estimates that this age group represents 14.9 percent of the country—growing by 1.6 million people since 2014. In the Houston-Galveston region, this age group is currently 10 percent of the population, and is forecast to increase to 18 percent by 2040.

The number of crashes involving elderly drivers in the region have increased considerably since 2012. There were 12,390 crashes in 2012 which increased to 19,011 in 2016, up by over 28 percent. Fatalities in elderly driver crashes have steadily risen during the same period, from 84 in 2012 to 120 in 2016.

AARP SMART DRIVER COURSE

- How to minimize the effects of blind spots
- How to maintain the proper following distance behind another car
- The safest ways to change lanes and make turns at busy intersections
- Proper use of safety belts, air bags, antilock brakes and new technology found in cars today
- Ways to monitor your own and others' driving skills and capabilities
- The effects of medications on driving
- The importance of eliminating distractions, such as eating, smoking and using a cellphone

Source: AARP

Elderly Driver Crashes

	2012	2013	2014	2015	2016
Brazoria	656	690	705	748	891
Chambers	96	111	104	119	133
Fort Bend	850	1,037	1,125	1,268	1,407
Galveston	871	959	989	1,199	1,323
Harris	8,613	9,713	11,695	13,050	13,369
Liberty	181	189	217	171	224
Montgomery	1,049	1,197	1,416	1,542	1,563
Waller	74	57	85	87	101
TOTAL	12,390	13,953	16,336	18,184	19,011

Elderly Driver Fatalities

	2012	2013	2014	2015	2016
Brazoria	11	15	6	4	8
Chambers	0	2	3	1	1
Fort Bend	4	4	6	3	4
Galveston	8	6	9	13	14
Harris	55	59	61	54	72
Liberty	0	3	2	1	2
Montgomery	6	11	12	11	17
Waller	0	4	4	0	2
TOTAL	84	104	103	87	120

Elderly Driver Serious Injuries

	2012	2013	2014	2015	2016
Brazoria	20	39	34	27	31
Chambers	2	18	3	5	7
Fort Bend	18	25	18	12	19
Galveston	34	27	32	38	29
Harris	205	252	216	257	232
Liberty	3	16	10	6	8
Montgomery	42	48	45	40	44
Waller	5	11	8	2	7
TOTAL	329	436	366	387	377



Motorcyclists

Despite comprising only two percent of all vehicles in the Region, motorcyclists are over 25 times more likely to be involved in a fatal crash than other types of crashes.

In the region, the number of motorcyclist crashes, serious injuries and fatalities have all increased since 2012. The total number of crashes was 1,809 in 2015 and 1,975 in 2016, a nine percent increase in that year alone. Motorcyclists are more susceptible to fatalities and serious injuries, with six percent of crashes resulting in fatalities and 19 percent resulting in serious injuries in 2016, compared to 0.1 percent and 0.7 percent for passenger vehicles.

TIPS FOR SHARING THE ROAD

- Look twice for motorcycles, especially at intersections
- Obey posted speed limits
- Use your turn signals and check your blind spot before changing lanes
- Don't follow a motorcycle too closely
- Always assume motorcycles are closer than they appear to be
- Give motorcyclists a full lane

Source: TxDOT Motorcycle Safety Campaign

Motorcyclist Crashes

	2012	2013	2014	2015	2016
Brazoria	107	121	109	104	118
Chambers	19	28	16	19	24
Fort Bend	94	95	102	86	100
Galveston	168	136	146	129	162
Harris	1,220	1,228	1,315	1,266	1,345
Liberty	18	32	25	20	31
Montgomery	153	169	173	167	171
Waller	29	26	31	18	24
TOTAL	1,808	1,835	1,917	1,809	1,975

Motorcyclist Fatalities

	2012	2013	2014	2015	2016
Brazoria	11	15	6	4	8
Chambers	0	2	3	1	1
Fort Bend	4	4	6	3	4
Galveston	8	6	9	13	14
Harris	55	59	61	54	72
Liberty	0	3	2	1	2
Montgomery	6	11	12	11	17
Waller	0	4	4	0	2
TOTAL	84	104	103	87	120

Motorcyclist Serious Injuries

	2012	2013	2014	2015	2016
Brazoria	20	39	34	27	31
Chambers	2	18	3	5	7
Fort Bend	18	25	18	12	19
Galveston	34	27	32	38	29
Harris	205	252	216	257	232
Liberty	3	16	10	6	8
Montgomery	42	48	45	40	44
Waller	5	11	8	2	7
TOTAL	329	436	366	387	377



Commercial Motor Vehicles

Commercial Motor Vehicle (CMV) crashes involve vehicles with a Gross Vehicle Weight over 10,000 lbs. This category of vehicles includes tractor-trailer units, buses of all types, box trucks, dump trucks, cement trucks, and other large commercial vehicles.

Due to their large size and weight, commercial motor vehicles have substantial blind spots on all sides and significantly longer stopping distances. While these types of crashes account for only five percent of vehicle crashes throughout the region, they often tend to result in fatalities and serious injuries. Passenger vehicle drivers and motorcyclists must be knowledgeable about sharing the road with these vehicles.

Overall, total CMV crashes fluctuated over the five-year report period. Likewise fatalities and serious injuries showed similar volatility. Approximately half of all CMV crashes take place on regional interstates and highways, while another 25 percent occur on local streets.

DRIVING NEAR LARGE TRUCKS

- Stay out of the “No Zones.” Commercial Vehicles have large blind spots, if you do not see their mirrors, they do not see you.
- Avoid cutting in front of Commercial Vehicles—they take longer to stop.
- Don’t get caught in the “Right Turn Squeeze”—don’t attempt to pass Commercial Vehicles when they are making a right turn.

Source: Federal Motor Carrier Safety Administration (FMCSA)
Tips for Driving Around Large Trucks

Commercial Vehicle Crashes

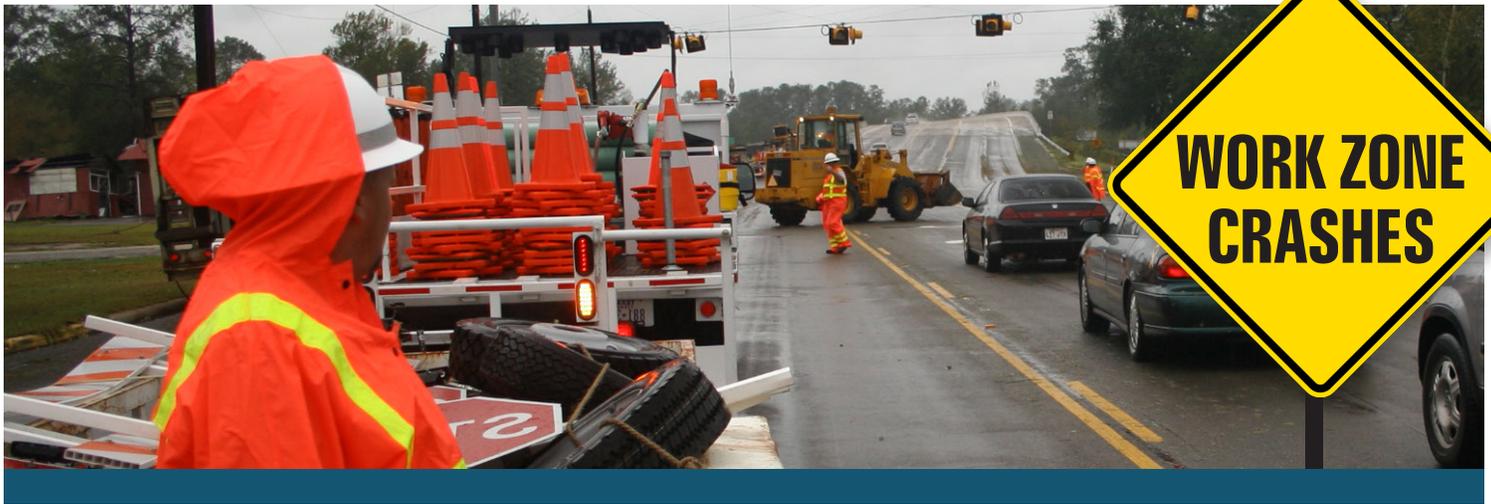
	2012	2013	2014	2015	2016
Brazoria	219	221	233	250	240
Chambers	162	174	177	192	202
Fort Bend	324	412	476	516	524
Galveston	213	230	207	257	220
Harris	4,555	5,006	6,335	6,888	6,552
Liberty	85	108	110	99	108
Montgomery	527	580	722	749	670
Waller	72	79	90	114	109
TOTAL	6,157	6,810	8,350	9,065	8,625

Commercial Vehicle Fatalities

	2012	2013	2014	2015	2016
Brazoria	2	4	3	0	2
Chambers	5	3	6	10	6
Fort Bend	3	6	8	1	8
Galveston	5	3	3	3	1
Harris	29	28	46	38	32
Liberty	5	9	2	5	6
Montgomery	5	2	8	7	13
Waller	1	2	0	0	0
TOTAL	55	57	76	64	68

Commercial Vehicle Serious Injuries

	2012	2013	2014	2015	2016
Brazoria	15	12	17	9	14
Chambers	6	18	11	15	3
Fort Bend	12	10	12	9	11
Galveston	3	5	9	10	7
Harris	101	112	122	145	86
Liberty	3	6	5	10	6
Montgomery	21	17	30	22	29
Waller	5	8	4	10	5
TOTAL	166	188	210	230	161



Work Zone Crashes

Work zone crashes are vehicle crashes that occur in a construction or maintenance zone, regardless of whether the crash was construction-related. In the region, work zone crashes increased 64 percent from 2012 to 2016, although 2016 saw a slight decrease in incidents.

Fatalities and serious injuries listed in this category include not only the drivers involved in the crash, but also anyone else killed or injured in the crashes, including construction workers.

CREATING SAFER WORK ZONES

- Stay alert and minimize distractions
- Keep your headlights on
- Pay attention to the road
- Merge into the proper lane
- Don't tailgate
- Obey the posted speed limit
- Change lanes safely
- Follow instructions from flaggers
- Expect the unexpected
- Be patient

Source: FHWA - Work Zone Safety for Drivers

Work Zone Crashes

	2012	2013	2014	2015	2016
Brazoria	134	101	90	41	74
Chambers	28	29	11	15	34
Fort Bend	171	161	210	283	600
Galveston	101	61	39	59	61
Harris	1,523	1,957	2,875	3,191	3,003
Liberty	15	10	21	16	24
Montgomery	476	452	658	415	218
Waller	7	4	4	23	15
TOTAL	2,455	2,775	3,908	4,043	4,029

Work Zone Fatalities

	2012	2013	2014	2015	2016
Brazoria	0	2	0	0	1
Chambers	0	0	0	0	0
Fort Bend	0	1	3	0	8
Galveston	0	0	0	0	0
Harris	5	8	15	8	9
Liberty	2	0	1	2	2
Montgomery	6	1	4	0	4
Waller	0	0	0	0	0
TOTAL	13	12	23	10	24

Work Zone Serious Injuries

	2012	2013	2014	2015	2016
Brazoria	7	5	6	2	3
Chambers	0	4	2	1	0
Fort Bend	6	3	8	4	16
Galveston	1	5	0	0	3
Harris	47	51	53	55	47
Liberty	2	0	1	0	2
Montgomery	4	26	14	9	9
Waller	0	0	1	3	0
TOTAL	67	94	85	74	80



Railroad-related Crashes

Railroad-related crashes include all vehicle crashes that involve railroad trains, vehicles, equipment or property. Railroad-related includes at-grade vehicle crashes. Since 2012, there has been variability in the number of railroad-related crash fatalities while the overall number of crashes has steadily increased. There were 403 railroad-related crashes in 2016, a 60 percent increase from the 251 crashes in 2012. The number of railroad-related serious injuries was 18 in 2016 which is a 50 percent increase from the 9 injuries in 2012.

Crashes at at-grade crossings have varied over the past 5 years as well, however, fatalities and serious injuries have been decreasing slightly. At-grade crossing crashes, while infrequent, are often serious. In 2016, there were 46 at-grade crashes which resulted in 17 serious injuries and one death. At-grade crashes accounted for approximately 11 percent of all railroad-related crashes in 2016.

STEPS FOR RAILROAD SAFETY

- Approach with care
- Prepare to stop
- Look and listen both ways, carefully.
- If it won't fit, don't commit. Do not enter a crossing unless you can drive completely through without stopping!
- Look again
- Cross tracks with care
- Keep going once you start, even if lights start to flash or gates come down

Source: FMCSA

Railroad-related Crashes

	2012	2013	2014	2015	2016
Brazoria	13	29	24	21	19
Chambers	3		7	2	7
Fort Bend	17	31	41	27	35
Galveston	18	18	17	26	14
Harris	162	271	220	261	275
Liberty	10	16	16	9	8
Montgomery	26	30	40	36	39
Waller	2	1	2	2	6
TOTAL	251	396	367	384	403

Railroad-related Crash Fatalities

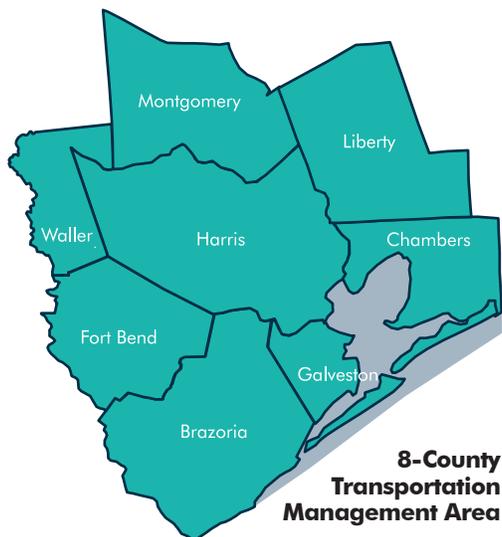
	2012	2013	2014	2015	2016
Brazoria	0	2	0	1	1
Chambers	0	0	0	0	0
Fort Bend	1	0	1	1	1
Galveston	0	0	1	1	0
Harris	1	0	4	0	0
Liberty	1	0	0	0	0
Montgomery	0	0	2	0	0
Waller	0	0	0	0	0
TOTAL	3	2	8	3	2

Railroad-related Crash Serious Injuries

	2012	2013	2014	2015	2016
Brazoria	2	0	0	0	0
Chambers	0	0	0	0	0
Fort Bend	0	1	2	1	1
Galveston	2	2	0	0	5
Harris	4	5	6	5	8
Liberty	1	1	0	0	2
Montgomery	0	1	1	0	2
Waller	0	0	0	0	0
TOTAL	9	10	9	6	18

State *of* Safety Report

**ABOUT
HGACmpo**



H-GAC is the Region's Metropolitan Planning Organization

A Metropolitan Planning Organization (MPO) is a local decision-making body that is responsible for overseeing the metropolitan planning process and deciding how to spend federal transportation funds for capital projects and planning studies. The Houston-Galveston Area Council (H-GAC) is designated by the State of Texas as the region's MPO for transportation planning in Brazoria, Chambers, Fort Bend, Galveston, Harris, Liberty, Montgomery, and Waller Counties; a service area of 6.7 million residents.

Transportation Policy Council

The Transportation Policy Council (TPC) provides policy guidance and overall coordination of the transportation planning activities within the region. The TPC consists of 28 members representing cities and counties, the Texas Department of Transportation (TxDOT), the Metropolitan Transit Authority of Harris County (METRO), one at-large member appointed by the H-GAC Board of Directors, and one member representing the Gulf Coast Rail District.

Regional Safety Council

The Regional Safety Council has been established by the TPC to improve road safety in the region. Membership includes officials from local and State governments, transportation, law enforcement, health care, insurance, trucking, railroads and non-profit organizations involved in safety. The purpose is to promote information-sharing, establish safety goals and performance measures, coordinate safety efforts across the region's jurisdictions, and identify policy issues concerning safety.



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