

CHAPTER 2

TRENDS AND PATTERNS IN MORTALITY, ARIZONA, 2006-2016

2A. TOTAL MORTALITY

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2D. PATTERNS OF PREMATURE MORTALITY



2A.

TOTAL MORTALITY

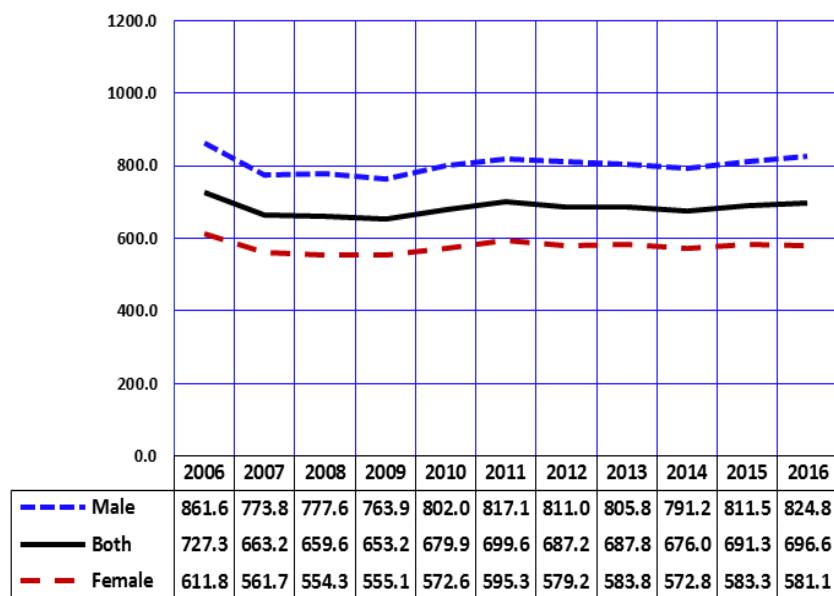
The total number of deaths from all causes among Arizona residents increased by 4.3 percent from 2015 (54,152) to 2016 (56,480; **Table 2A-1**). The age-adjusted mortality rate for all causes of death also increased from 691.3/100,000 in 2015 to 696.6 /100,000 in 2016.

Compared to 2015, there were more deaths in 2016 for all of the leading causes of mortality. The causes with the largest increases were essentially influenza and pneumonia (16.2 percent), septicemia (15.8 percent), accidents (14.6 percent), and essential primary hypertension and hypertensive renal disease (12.7 percent).

When considering race/ethnicity and gender, the age-adjusted mortality rate for deaths due to major cardiovascular diseases among American Indian or Alaska Native males increased (16.5 percent) from 2015 to 2016. In terms of mortality due to diabetes, the overall mortality rate for males and females decreased from 2015 (25.7/100,000) to 2016 (24.5/100,000) following a period of stability during 2011 to 2014 (**Figure 2B-18**). The decrease in deaths due to diabetes affected all race/ethnic groups, except American Indian or Alaska Natives where an 8.2 percent increase was observed between 2015-2016.

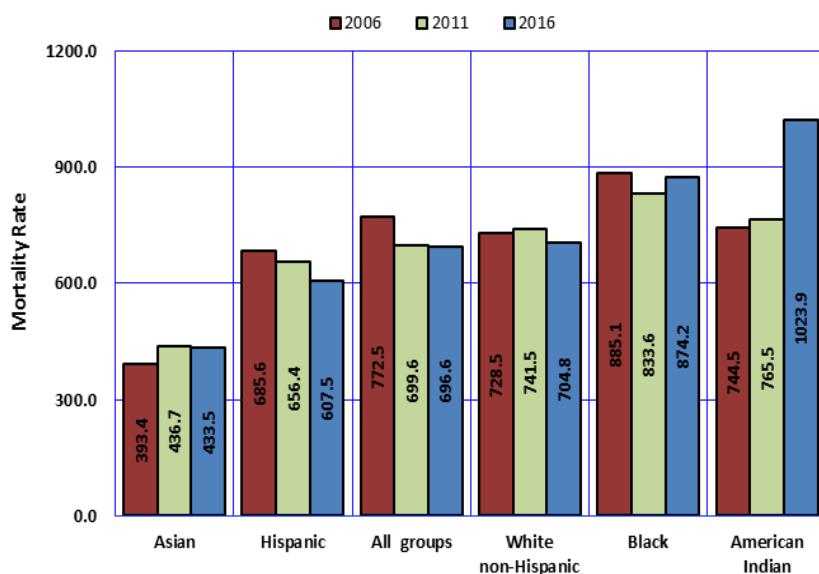
2A. TOTAL MORTALITY

Figure 2A-1
Age-adjusted Mortality Rates^a for all Causes by Gender and Year,
Arizona, 2006-2016



Note: ^a Number of deaths per 100,000 persons (adjusted to the 2000 standard U.S. population).

Figure 2A-2
Age-adjusted Mortality Rates^a for all Causes by Race/Ethnicity and Year,
Arizona Residents, 2006, 2011, and 2016



Note: ^a Number of deaths per 100,000 persons (adjusted to the 2000 standard U.S. population).

The age-adjusted mortality rates discussed below are based on the year 2000 population standard. All mortality rates in sections 2A and 2B are age-adjusted. A detailed explanation of the age-adjustment of mortality rates is given in the **Technical Notes**.

The total age-adjusted mortality rate increased by 0.8 percent, from 691.3 in 2015 to 696.6 in 2016 (**Figure 2A-1, Table 2B-2**). Over this period, the age-adjusted mortality rates increased for males but decreased for females.

The difference between male and female mortality rates increased slightly between 2006 and 2016. The male age-adjusted mortality rate was 40.8 percent greater than the female age-adjusted mortality rate on 2006, but 41.9 percent greater in 2016.

The 2016 age-adjusted death rates for the major racial/ethnic groups were as follows: for Asian or Pacific Islander, 433.5 deaths per 100,000 population; Hispanic or Latino, 607.5; White non-Hispanic, 704.8; Black or African American, 874.2; and American Indian or Alaska Native, 1023.9 (**Figure 2A-2, Table 2B-4**).

In 2016, as in 2006 and 2011, Blacks and American Indians had higher total mortality rates than White non-Hispanics, Hispanics, and Asians. The total mortality rates for Asians were lower than the rates of both White non-Hispanics and Hispanics in 2006, 2011, and 2016.

2A. TOTAL MORTALITY

If there was no monthly variation in proportional contribution to total annual deaths, 8.3 percent (100/12) of deaths should occur monthly. However, when the monthly distribution of resident deaths is examined, March (9.5 percent), January, February (9.1 percent), and December (8.6 percent) were higher in 2016 from the expected value (**Figure 2A-3**). June, August, and September were the months with the lowest proportional contributions to the total annual deaths among Arizona residents.

The majority of the 2,228 non-residents who died in Arizona during 2016 did so during the months of February, March, and January.

September was the month with the lowest percent contribution (6.1 percent) to the annual death among out-of-State residents who died in Arizona.

Figure 2A-3
Percent of Annual Deaths by Month of Occurrence and Residence Status, Arizona, 2016

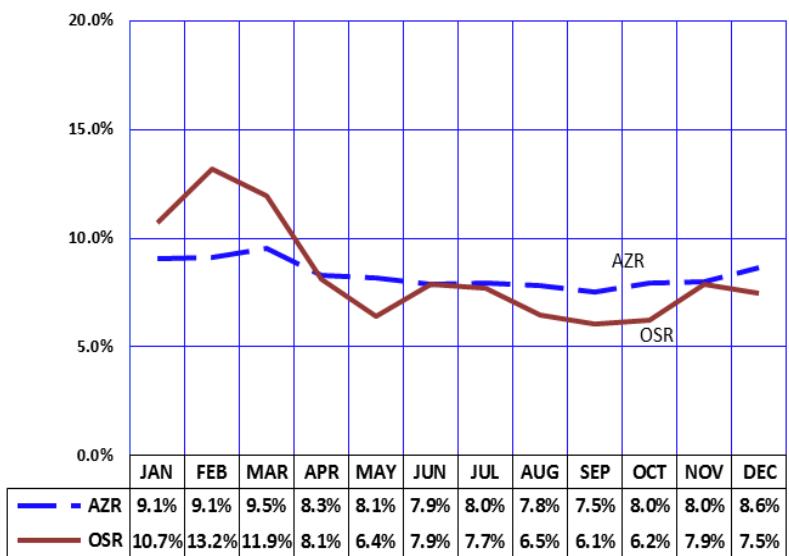


Figure 2A-4
Percentage of Deaths for which Autopsies were Reported by Race/Ethnicity and Year, Arizona Residents, 2006-2016

Autopsies were reported as performed on 5,726 decedents, or 10.1 percent of the deaths that occurred among Arizona residents in 2016. From 2006 – 2016, the percentage of deaths for which autopsies were reported varied from a high of 10.1 percent in 2006, to a low of 8.6 percent in 2011 and 2012 then back to the initial level at 10.1 percent in 2016.

The percentage autopsied varies by the decedent's demographic characteristics. By race/ethnicity (**Figure 2A-4**) the percentage autopsied was lower for the White non-Hispanic and Asian population than for other groups. The prevalence of autopsies was substantially greater among Black, American Indian, and Hispanic or Latino sub-populations. A substantial portion of the differential in the use of autopsy by race/ethnicity reflects differences in the age and manner of death. For example, autopsies tend to be more common at younger ages and for deaths by homicide, suicide, accidents, and undetermined manner.

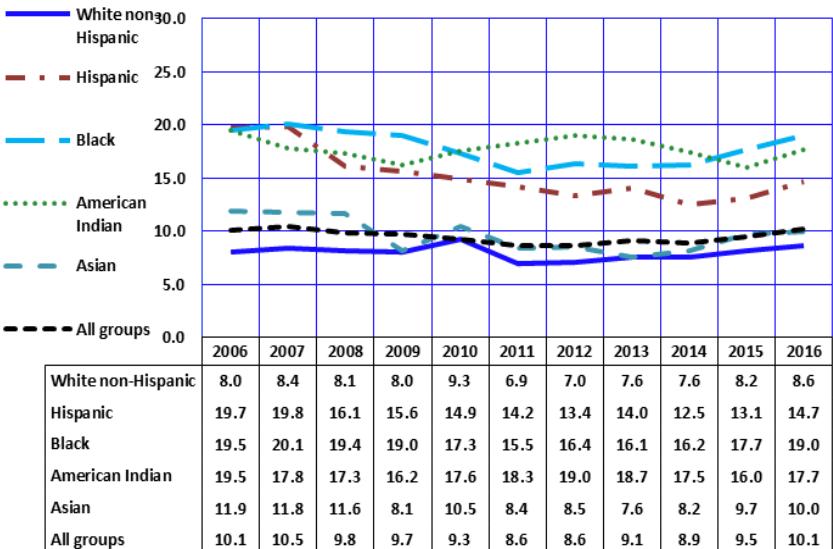


TABLE 2A-1
NUMBER OF DEATHS BY RACE/ETHNICITY, GENDER, AND YEAR, ARIZONA RESIDENTS, 2006-2016

		2006	2007	2008	2009	2010	2011	2012 ^a	2013 ^a	2014 ^a	2015 ^a	2016 ^a
TOTAL	Total	45,415	44,640	45,128	45,065	45,871	47,547	48,459	49,929	51,074	54,152	56,480
Male		23,658	23,321	23,744	23,535	24,163	24,785	25,577	26,222	27,037	28,814	30,431
Female		21,757	21,319	21,384	21,530	21,708	22,762	22,874	23,703	24,034	25,334	26,046
White non-Hispanic	Total	36,952	35,805	36,235	35,829	36,066	37,211	38,629	39,543	40,391	42,750	44,092
Male		18,711	18,339	18,758	18,476	18,693	19,307	20,206	20,550	21,207	22,504	23,439
Female		18,241	17,466	17,477	17,353	17,373	17,904	18,416	18,989	19,181	20,242	20,653
Hispanic or Latino	Total	5,284	5,496	5,313	5,401	5,374	5,575	5,963	6,300	6,444	6,839	7,343
Male		3,114	3,146	2,996	2,978	2,959	2,982	3,323	3,412	3,543	3,814	4,154
Female		2,170	2,350	2,317	2,423	2,415	2,593	2,640	2,888	2,901	3,025	3,189
Black or African American	Total	1,274	1,276	1,295	1,334	1,336	1,399	1,509	1,593	1,578	1,742	1,925
Male		754	695	712	697	735	734	803	897	852	971	1,108
Female		520	581	583	637	601	665	706	696	726	771	817
American Indian or Alaska Native	Total	1,543	1,661	1,722	1,871	1,781	1,681	1,806	1,955	2,074	2,140	2,346
Male		901	950	981	1,028	1,015	876	993	1,103	1,152	1,187	1,365
Female		642	711	741	843	766	805	812	852	922	953	981
Asian or Pacific Islander	Total	336	365	449	469	487	528	552	538	582	673	769
Male		164	168	230	241	258	269	252	260	280	334	364
Female		172	197	219	228	229	259	300	278	302	339	405
Refused/ Unknown race	Total	26	37	114	161	827	1,153	b	b	10†	10†	0†
Male		14	23	67	115	503	617	b	b	*	*	*
Female		12	14	47	46	324	536	b	b	*	*	*

Notes: * Cell suppressed due to non-zero count less than 6; † Sum rounded to nearest tens unit due to non-zero addend less than 6; ^a Deaths with unknown gender (Total, n=3; White non-Hispanic, n=3 were included in total for 2016); ^b Bridging of race/ethnicity in 2012 and 2013 differed from previous years. Individuals with unknown race were categorized as White non-Hispanic, while individuals with unknown race and Hispanic ethnicity were coded as Hispanic.

TABLE 2A-2
RESIDENT MORTALITY BY MONTH OF OCCURRENCE AND YEAR, ARIZONA, 2006-2016

Month of death		2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
JAN	Count	4,640	4,213	4,149	3,983	3,950	4,321	4,210	5,079	4,824	5,028	5,119
	Percent	10.2%	9.4%	9.2%	8.8%	8.6%	9.1%	8.7%	10.2%	9.4%	9.3%	9.1%
FEB	Count	4,013	3,726	4,059	3,592	3,582	4,070	4,147	4,383	4,227	4,267	5,135
	Percent	8.8%	8.3%	9.0%	8.0%	7.8%	8.6%	8.6%	8.8%	8.3%	7.9%	9.1%
MAR	Count	4,124	4,062	4,426	3,954	4,084	4,358	4,414	4,484	4,333	4,819	5,387
	Percent	9.1%	9.1%	9.8%	8.8%	8.9%	9.2%	9.1%	9.0%	8.5%	8.9%	9.5%
APR	Count	3,765	3,781	3,949	3,945	3,845	3,967	4,176	4,231	4,278	4,547	4,689
	Percent	8.3%	8.5%	8.8%	8.8%	8.4%	8.3%	8.6%	8.5%	8.4%	8.4%	8.3%
MAY	Count	3,729	3,656	3,754	3,699	3,811	3,899	3,980	4,076	4,291	4,527	4,603
	Percent	8.2%	8.2%	8.3%	8.2%	8.3%	8.2%	8.2%	8.2%	8.4%	8.4%	8.1%
JUN	Count	3,489	3,427	3,542	3,500	3,651	3,823	3,868	3,831	4,072	4,396	4,464
	Percent	7.7%	7.7%	7.8%	7.8%	8.0%	8.0%	8.0%	7.7%	8.0%	8.1%	7.9%
JUL	Count	3,630	3,636	3,467	3,741	3,843	3,791	3,862	3,926	4,071	4,338	4,496
	Percent	8.0%	8.1%	7.7%	8.3%	8.4%	8.0%	8.0%	7.9%	8.0%	8.0%	8.0%
AUG	Count	3,417	3,466	3,512	3,617	3,756	3,913	3,850	3,893	4,112	4,338	4,432
	Percent	7.5%	7.8%	7.8%	8.0%	8.2%	8.2%	7.9%	7.8%	8.1%	8.0%	7.8%
SEP	Count	3,414	3,554	3,279	3,604	3,633	3,678	3,849	3,804	3,994	4,183	4,253
	Percent	7.5%	8.0%	7.3%	8.0%	7.9%	7.7%	7.9%	7.6%	7.8%	7.7%	7.5%
OCT	Count	3,767	3,651	3,636	3,739	3,678	3,888	3,956	3,868	4,184	4,284	4,501
	Percent	8.3%	8.2%	8.1%	8.3%	8.0%	8.2%	8.2%	7.7%	8.2%	7.9%	8.0%
NOV	Count	3,527	3,608	3,519	3,694	3,806	3,753	3,894	3,924	4,239	4,543	4,518
	Percent	7.8%	8.1%	7.8%	8.2%	8.3%	7.9%	8.0%	7.9%	8.3%	8.4%	8.0%
DEC	Count	3,900	3,860	3,836	3,997	4,232	4,086	4,253	4,430	4,449	4,882	4,883
	Percent	8.6%	8.6%	8.5%	8.9%	9.2%	8.6%	8.8%	8.9%	8.7%	9.0%	8.6%
TOTAL	Count	45,415	44,640	45,128	45,065	45,871	47,547	48,459	49,929	51,074	54,152	56,480
	Percent	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%

TABLE 2A-3
DEATHS BY DAY AND MONTH OF OCCURRENCE, ARIZONA RESIDENTS, 2016

Day of death	Month of death											Total	
	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	
1	155	163	158	168	150	151	165	150	153	160	163	161	1,897
2	166	165	187	157	137	148	142	144	174	125	151	166	1,862
3	138	166	172	156	166	141	129	145	139	150	146	170	1,818
4	157	192	164	140	150	154	142	150	138	139	139	139	1,829
5	180	177	177	159	147	142	149	138	131	131	163	150	1,844
6	164	159	173	167	139	169	136	151	144	148	150	177	1,877
7	169	171	179	184	147	165	144	130	139	158	141	156	1,883
8	153	189	172	151	143	161	157	146	141	130	163	163	1,869
9	162	190	173	147	125	141	141	158	152	152	124	149	1,814
10	183	163	172	161	152	151	146	141	144	155	137	153	1,858
11	154	186	183	144	167	152	142	144	128	155	167	156	1,878
12	190	155	197	159	176	141	139	147	133	133	160	150	1,880
13	165	188	170	150	137	139	133	135	123	130	136	162	1,768
14	179	185	191	141	151	143	140	142	134	153	146	151	1,861
15	164	181	193	157	158	145	149	158	144	152	144	138	1,883
16	141	170	195	164	143	128	133	140	118	141	149	172	1,794
17	157	184	175	154	153	144	137	148	149	154	163	155	1,873
18	157	176	164	166	153	156	143	129	142	164	139	144	1,833
19	152	187	186	158	176	156	160	137	142	139	150	137	1,880
20	183	187	166	149	146	154	150	156	147	167	153	144	1,902
21	178	184	176	146	155	141	123	137	164	129	145	171	1,849
22	172	190	193	157	134	163	144	145	149	152	156	167	1,922
23	165	178	164	162	145	143	149	137	137	143	177	152	1,852
24	186	160	156	150	140	146	140	138	150	159	154	143	1,822
25	144	176	165	149	141	148	167	150	130	119	142	144	1,775
26	167	181	152	153	135	142	194	138	136	147	157	158	1,860
27	166	174	178	147	142	152	140	140	137	138	167	149	1,830
28	183	170	139	168	149	165	151	125	154	130	153	164	1,851
29	160	173	151	144	158	132	146	132	158	129	175	1,846	
30	173	166	150	150	129	152	139	137	135	154	194	1,679	
31	156	178	162	115	156	115	151	151	151	173	1,091		
Total	5,119	5,135	5,387	4,689	4,603	4,464	4,496	4,432	4,253	4,501	4,518	4,883	56,480

TABLE 2A-4
AGE-SPECIFIC MORTALITY BY PLACE OF DEATH AND DECEDENT STATUS, ARIZONA, 2016

		Age												
		<1	1-4	5-14	15-24	25-34	35-44	45-54	55-64	65-74	75-84	85+	Unknown	Total
In-patient	324	39	40	152	306	415	1,018	1,991	3,029	2,877	2,136	0	12,327	
Out-patient	90	46	26	135	218	234	404	563	594	486	356	0	3,152	
Died on arrival	*	*	0	*	*	*	*	6	7	*	*	0	30†	
Status unknown	26	20	19	176	370	523	1,241	2,745	4,121	4,771	5,086	0	19,098	
Subtotal	440†	110†	85	460†	900†	1,180†	2,660†	5,305	7,751	8,140†	7,580†	0	34,608	
		Nursing home^b							960	1,663	2,041	2,351	0	7,590†
Residence	0	0	0	*	12	25	93	305	663	1,318	2,416	*	4,840†	
Other^c	6	10	17	274	370	300	480	718	1,036	2,004	4,225	6	9,446	
Unspecified	0	0	0	0	0	0	*	0	0	0	0	0	0†	
Subtotal	13	10†	26	290†	427	432	959	1,983	3,362	5,363	8,992	10†	21,870†	
TOTAL	454	120	111	758	1,322	1,608	3,623	7,288	11,113	13,502	16,574	7	56,480	

Notes: * Cell suppressed due to count less than 6; † Sum rounded to nearest tens unit due to addend less than 6; ^a Includes Emergency Room; ^b Includes other long-term care facilities;

^c Includes hospices.



2B.

LEADING CAUSES OF DEATH

In 2010, the Office of Vital Records (OVR) of the Arizona Department of Health Services implemented the new (2003) Standard U.S. death certificate. The new certificate added several new questions: 1) whether tobacco use contributed to the death, and 2) whether, if the decedent was a female, the death was "pregnancy-associated" (defined as death from any cause during pregnancy or within one calendar year of delivery or pregnancy termination).

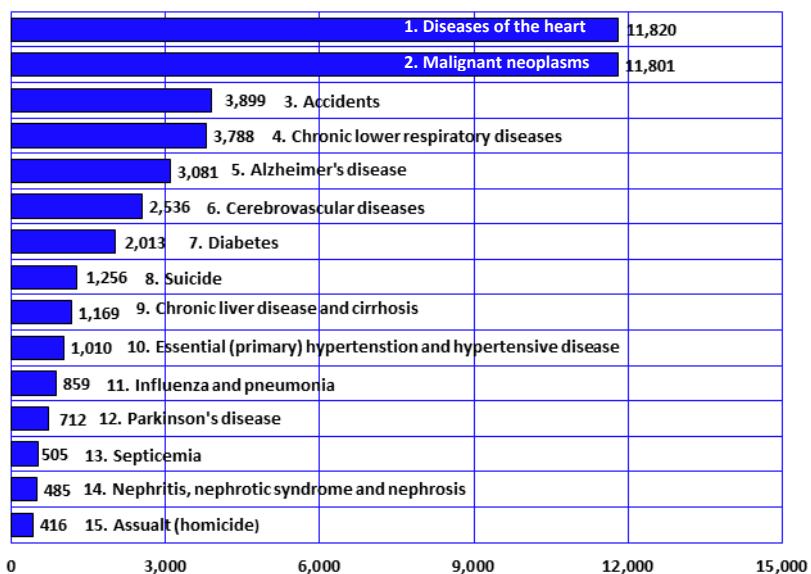
The death certificate now includes a new classification of the decedent's racial/ethnic status, consistent with the revised federal standards for collecting and reporting racial and ethnic status. These standards were published in the Federal Register on October 30, 1997, as "Revisions to the Standards for the Classification of Federal Data on Race and Ethnicity." The revised standards are available on the OMB (the Office of Management and Budget) web-site at: <http://www.whitehouse.gov/omb/fedreg>.

There are now 15 racial categories (including Guamanian or Chamorro; Samoan or Native Hawaiian) to choose from. It is also permitted to indicate more than one race for a decedent. In 2016, among the 56,480 deaths of Arizona residents, indication of "two or more races" appeared on only 502 certificates. The total number of deaths for decedents identified as Native Hawaiian was 20. To create frequency counts of race and ethnicity that were adequate to compute statistically reliable mortality rates, race was "bridged", or essentially collapsed into 5 categories; White non-Hispanic, Hispanic or Latino, Black or African American, Native American or Alaska Native, and Asian or Pacific Islander. When an individual was identified as both Hispanic and any other race, that person was added to the racial/ethnic group with the lowest population. For example, a person identified as both White and Hispanic would be coded as Hispanic, where a person identified as American Indian and Hispanic would be coded as American Indian. Please refer to the technical appendix for further explanation of the racial bridging used in this report.

2B. LEADING CAUSES OF DEATH

Figure 2B-1A
Leading Causes of Death among Arizona Residents in 2016

BASED ON THE NUMBER OF DEATHS DUE TO THE UNDERLYING CAUSE:

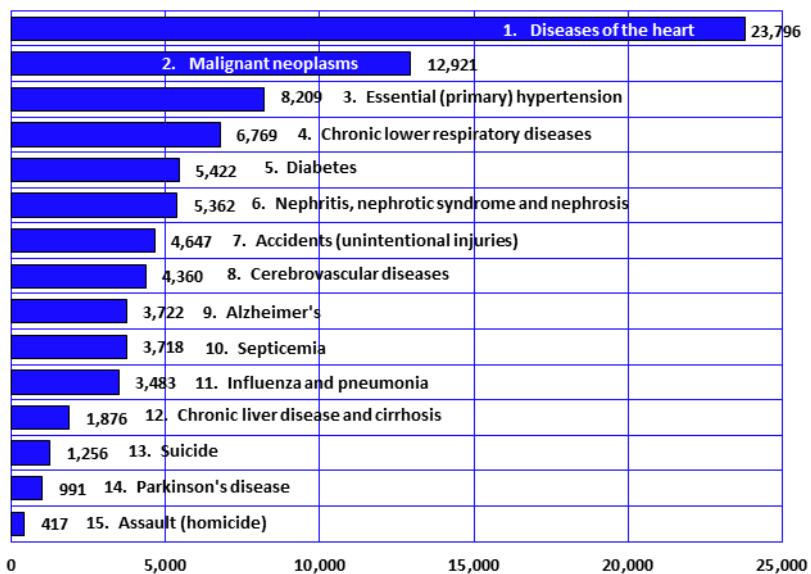


Based on the number of deaths (but not age-adjusted mortality rate), the leading underlying cause of death to Arizona residents in 2016 was *heart disease* (11,820 or 20.9 percent of all deaths), closely followed by *cancer*, which accounted for 11,801 or 20.9 percent of deaths (**Figure 2B-1A, Table 2B-1, Table 5E-14**).

The third leading cause of death, *accidents (unintentional injuries)*, accounted for 3,899 or 6.9 percent of total deaths. Deaths due to *chronic lower respiratory diseases* ranked fourth in 2016, with 3,788 resident deaths reported. Deaths due to *Alzheimer's disease* ranked fifth in 2016, with 3,081 resident deaths reported. Together, these five causes accounted for 60.9 percent of total deaths in 2016. The fifteen leading causes accounted for 80.3 percent of all deaths among Arizona residents.

Figure 2B-1B
Leading Causes of Death among Arizona Residents in 2016

BASED ON THE NUMBER OF DEATHS DUE TO ANY MENTION OF A CAUSE:



For the purpose of mortality statistics, every death is attributed to one underlying condition or underlying cause of death. The underlying cause is defined as the disease or injury that initiated the chain of events leading directly to death. It is selected from up to 20 causes and conditions entered by the physician on the death certificate. The totality of all these conditions is known as multiple cause of death.

In addition to 11,820 deaths that had diseases of the heart assigned as the underlying cause, another 11,976 deaths had diseases of the heart assigned as a secondary cause of death. The sum of these two counts (23,796, **Figure 2B-1B**) is the total number of deaths that had any mention of diseases of the heart on the 2016 death certificates. The ranking based on any mention of the 15 diagnostic categories is different from ranking of the leading causes of death based on the underlying cause. In particular, *nephritis, nephrotic syndrome and nephrosis* ranked 14th as the underlying cause but ranked 6th when any mention of it was counted.

2B. LEADING CAUSES OF DEATH Five Leading Causes by Gender

It is important to note that (**Figures 2B-2, 2B-3, 2B-4, and 2B-5**) are based on the age-adjusted mortality rates and not on the number of deaths.

In 2016, diseases of the heart were the leading cause of death for all race/ethnic groups, except the Asian or Pacific Islanders. Cancer was the second leading cause of death for White non-Hispanics, Hispanic or Latinos, and Black or African Americans. Unintentional injury was among the third leading cause of death for White non-Hispanics, Hispanics, and Blacks while it ranked second among American Indians and 5th among Asians or Pacific Islanders (**Figure 2B-2, Table 2B-4**).

In 2016, stroke was the third leading cause of death specific to Asians. Chronic lower respiratory diseases were the fourth leading cause of death specific to White non-Hispanics.

For White non-Hispanics, Hispanics, and Blacks, Alzheimer's disease was the 5th leading cause of death while it ranked fourth among Asians or Pacific Islanders. (**Table 2B-4**).

Figure 2B-2
Age-adjusted Mortality Rates^a for the Five Leading Causes of Death for Both Genders by Race/Ethnicity, Arizona, 2016

Rank	White non-Hispanic	Hispanic or Latino	Black or African American	American Indian or Alaska Native	Asian or Pacific Islander
1	Diseases of heart 147.7	Diseases of heart 116.3	Diseases of heart 188.3	Diseases of heart 139.9	Cancer 102.6
2	Cancer 146.7	Cancer 115.9	Cancer 171.6	Unintentional injury 139.1	Diseases of heart 76.6
3	Unintentional injury 55.2	Unintentional injury 41.6	Unintentional injury 52.2	Cancer 101.2	Stroke 31.1
4	Chronic lower respiratory diseases 50.9	Diabetes 40.5	Diabetes 50.1	Chronic liver disease and cirrhosis 85.9	Alzheimer's disease 26.2
5	Alzheimer's disease 37.9	Alzheimer's disease 34.6	Alzheimer's disease 48.6	Diabetes 79.9	Unintentional injury 25.9

Note: ^a Number of deaths per 100,000 population age-adjusted to the 2000 U.S. standard.

Figure 2B-3
Age-adjusted Mortality Rates^a for the Five Leading Causes of Death by Race/Ethnicity among Females, Arizona, 2016

Rank	White non-Hispanic	Hispanic or Latino	Black or African American	American Indian or Alaska Native	Asian or Pacific Islander
1	Cancer 126.5	Cancer 92.3	Diseases of heart 151.5	Diseases of heart 102.3	Cancer 98.4
2	Diseases of heart 113.5	Diseases of heart 91.5	Cancer 138.9	Cancer 94.6	Diseases of heart 69.9
3	Chronic lower respiratory diseases 49.4	Alzheimer's disease 40.4	Alzheimer's disease 54.1	Unintentional injury 67.9	Alzheimer's disease 26.7
4	Alzheimer's disease 42.0	Diabetes 32.1	Stroke 45.8	Chronic liver disease and cirrhosis 67.2	Stroke 24.8
5	Unintentional injury 36.9	Stroke 31.2	Diabetes 44.9	Diabetes 63.5	Diabetes 24.0

Note: ^a Number of deaths per 100,000 population age-adjusted to the 2000 U.S. standard.

B. LEADING CAUSES OF DEATH Five Leading Causes by Gender

Figure 2B-4
Age-adjusted Mortality Rates^a for the Five Leading Causes of Death by Race/Ethnicity among Males, Arizona, 2016

Rank	White non-Hispanic	Hispanic or Latino	Black or African American	American Indian or Alaska Native	Asian or Pacific Islander
1	Diseases of heart 186.9	Cancer 147.3	Diseases of heart 224.0	Unintentional injury 219.5	Cancer 106.6
2	Cancer 171.3	Diseases of heart 147.1	Cancer 214.4	Diseases of heart 191.2	Diseases of heart 86.8
3	Unintentional injury 73.8	Unintentional injury 58.2	Unintentional injury 66.0	Cancer 110.7	Stroke 41.5
4	Chronic lower respiratory diseases 52.7	Diabetes 51.4	Diabetes 55.9	Chronic liver disease and cirrhosis 107.3	Unintentional injury 33.4
5	Intentional Self-harm Suicide 33.6	Stroke 31.4	Chronic lower respiratory diseases 51.5	Diabetes 100.4	Alzheimer's disease 26.2

Note: ^a Number of deaths per 100,000 population age-adjusted to the 2000 U.S. standard.

Figure 2B-5
Age-adjusted Mortality Rates^a for the Five Leading Causes of Death by Gender in Urban^b and Rural Areas, Arizona, 2016

Rank	Urban male	Urban female	Rural male	Rural female
1	Diseases of heart 171.0	Cancer 116.1	Diseases of heart 212.4	Cancer 135.8
2	Cancer 163.7	Diseases of heart 105.5	Cancer 172.7	Diseases of heart 128.0
3	Unintentional injury 66.6	Alzheimer's disease 43.0	Unintentional injury 96.1	Chronic lower respiratory diseases 46.8
4	Chronic lower respiratory diseases 45.2	Chronic lower respiratory diseases 41.6	Chronic lower respiratory diseases 56.6	Unintentional injury 45.3
5	Diabetes 31.8	Unintentional injury 32.7	Intentional Self-harm (suicide) 42.6	Stroke 35.0

Note: ^a Number of deaths per 100,000 population age-adjusted to the 2000 U.S. standard; ^b Urban = Maricopa, Pima, Pinal, and Yuma counties. The remaining counties comprise Arizona's rural areas.

Based on age-adjusted mortality rates, diseases of the heart followed by cancer were the two leading causes of death among White non-Hispanic and Black males. In contrast, cancer followed by diseases of the heart were the leading causes of death for Hispanic or Latino and Asian or Pacific Islander males (Figure 2B-4; Table 2B-4). Age-adjusted mortality rate for unintentional injury was the highest of all causes among American Indian or Alaska Native males, but ranked third among White non-Hispanic, Hispanic, and Black males and fourth among Asian males.

In 2016, based on the age-adjusted mortality rates, diabetes was among the fourth leading causes of death for Hispanic and Black males, and the 5th leading cause of death for American Indian males.

In 2016, the profile of the leading causes of death differed by gender for residents of the urban (Maricopa, Pima, Pinal, and Yuma counties) and rural (all the remaining counties) areas of the state (Figure 2B-5, Table 2B-5). Cancer exceeded diseases of the heart as the leading causes of death among both urban and rural females. Diseases of the heart were the leading cause of deaths specific to both urban and rural males.

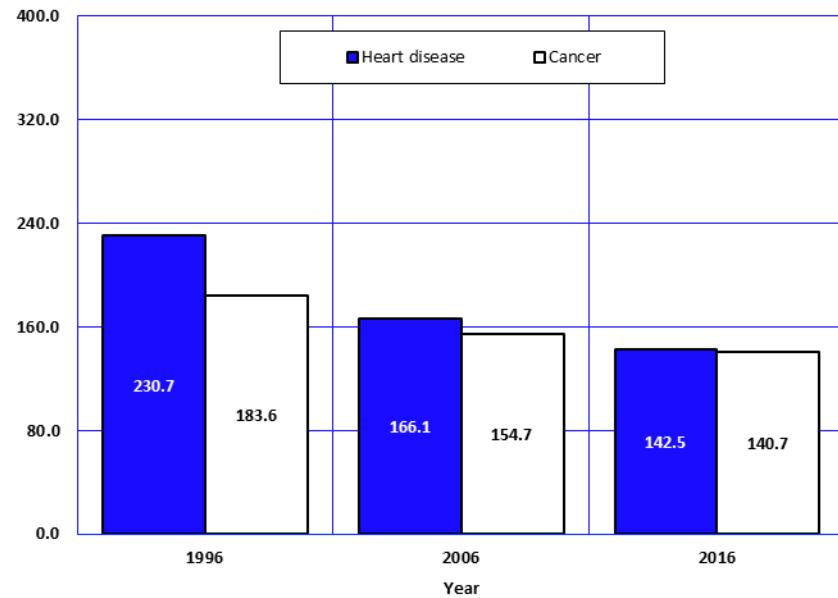
Chronic lower respiratory diseases were the fourth leading cause of death in urban areas and among rural males. Alzheimer's disease was the 3rd leading cause of death among urban females. Among the fifth leading cause of death, diabetes was specific to Urban males; suicide was specific to rural males while stroke was specific to rural females.

2B. LEADING CAUSES OF DEATH Diseases of heart and malignant neoplasm (cancer)

The age-adjusted mortality rate for diseases of the heart decreased by 38.2 percent from 230.7 deaths per 100,000 population in 1996 to 142.5/100,000 in 2016 (**Figure 2B-6**). The age-adjusted mortality rate for cancer declined less, by 23.4 percent, from 1996-2016. In Arizona, the relative risk of death from heart disease versus cancer changed from 25.6 percent greater in 1996 to 1.3 percent less in 2016.

In 2006, 594 more Arizonans died from diseases of the heart than cancer (**Table 2B-1**). In 2016, the number of deaths due to the diseases of heart exceeded marginally the number of cancer deaths by only 19 cases (**Table 2B-4**).

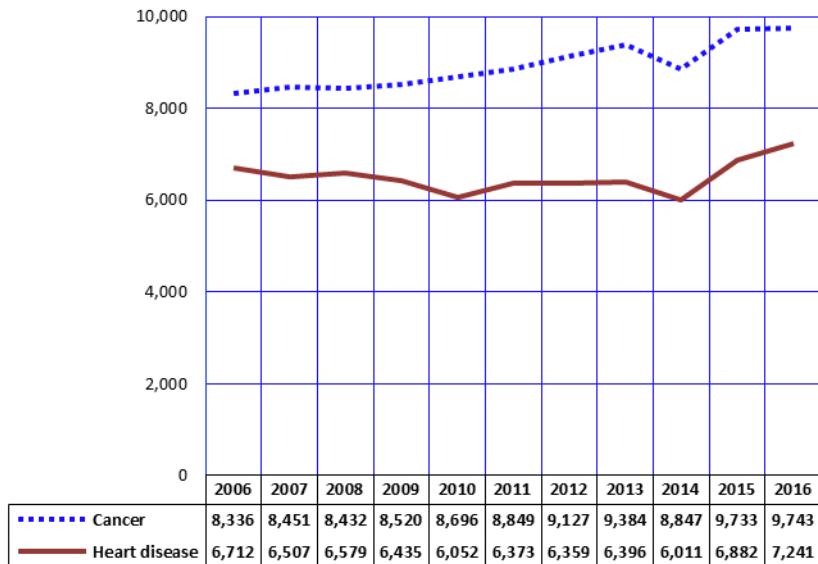
Figure 2B-6
Comparison of Age-adjusted Mortality Rates^a for Heart Disease and Cancer (Malignant Neoplasm), Arizona, 1996, 2006, and 2016



Note: ^a Number of deaths per 100,000 population age-adjusted to the 2000 U.S. standard.

Figure 2B-7
Number of Deaths from Heart Disease and Cancer among Arizonans 0-84 Years, 2006-2016

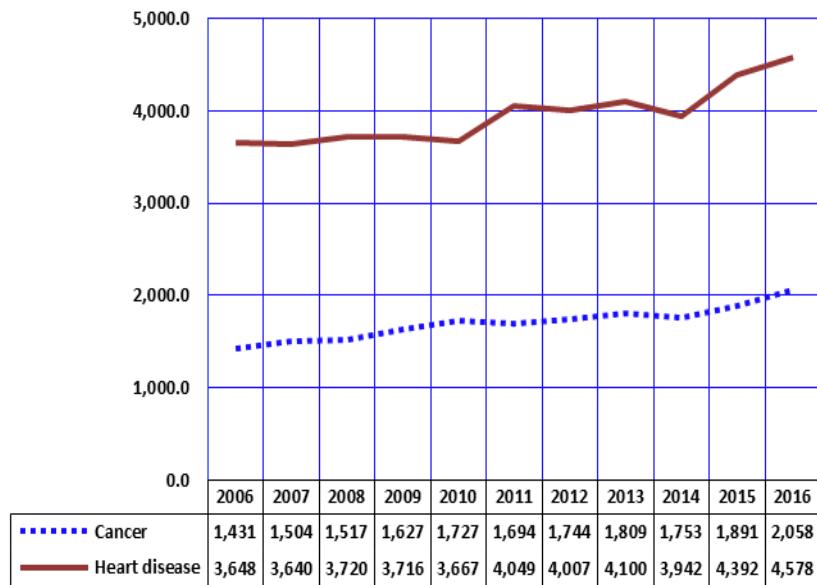
For the past several years, cancer has been the number one cause of death among Arizonans aged 0-84 years (**Figure 2B-7**). Beginning in 1996, the annual number of cancer deaths exceeded the number of deaths from heart disease. In 2016, 2,502 more Arizonans 0-84 years old died from cancer (9,743) than heart disease (7,241).



Note: 2008 counts for cancer and heart disease were updated due to misclassification of 2008 death records.

2B. LEADING CAUSES OF DEATH
Diseases of heart and malignant neoplasm (cancer)

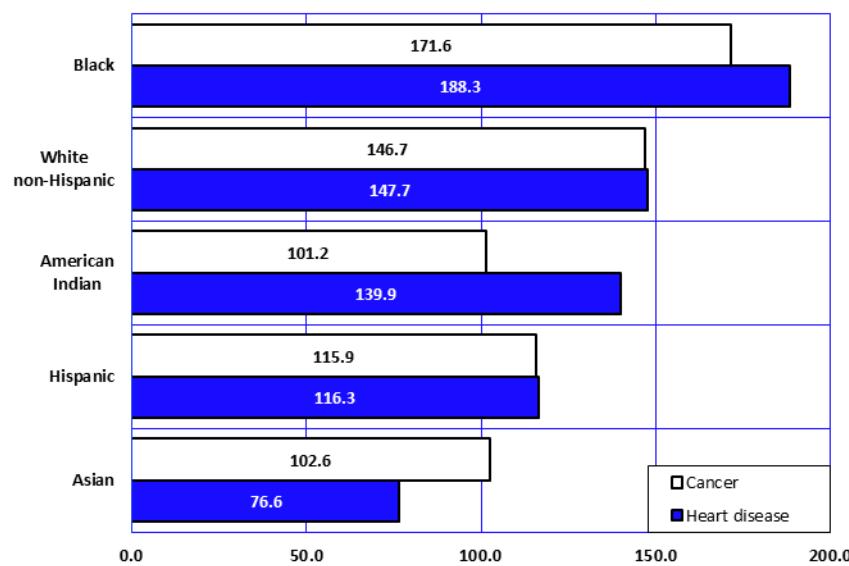
Figure 2B-8
Deaths from Heart Disease and Cancer among Arizonans 85+, 2006-2016



Among Arizonans age 85 and over, heart disease is the number one leading cause of death by a wide margin. In 2016, adults aged 85 and over accounted for 17.4 percent of all deaths from cancer but 38.7 percent of all deaths from heart disease. In 2016, the median age at death for heart disease was 80 years (**Table 2D-3**); and a minority of deaths (44.9 percent, **Table 2D-4**) were premature, i.e., before reaching the expected years of life at birth for all U.S. residents (78.8 years).

However, from 2006 to 2016, the number of deaths from cancer increased by 43.8 percent among Arizonans 85 years or older, more than the increase observed in diseases of the heart (25.5 percent increase).

Figure 2B-9
Age-adjusted Mortality Rates^a for Heart Disease and Cancer by Race/Ethnicity, Arizona, 2016



Arizona's White non-Hispanics were 1.9 times more likely to die from diseases of the heart and 1.4 times more likely to die from malignant neoplasms in 2016 than Asians, the group with the lowest risk of each respective cause of death (**Figure 2B-9, Table 2B-4**). Compared to Asians, Black or African American Arizonans were 2.5 times more likely to die of heart disease and 1.7 times more likely to die of cancer.

In 2016, the relative risk of death from heart disease exceeded cancer mortality risk (**Table 2B-3**) for all the racial/ethnic groups.

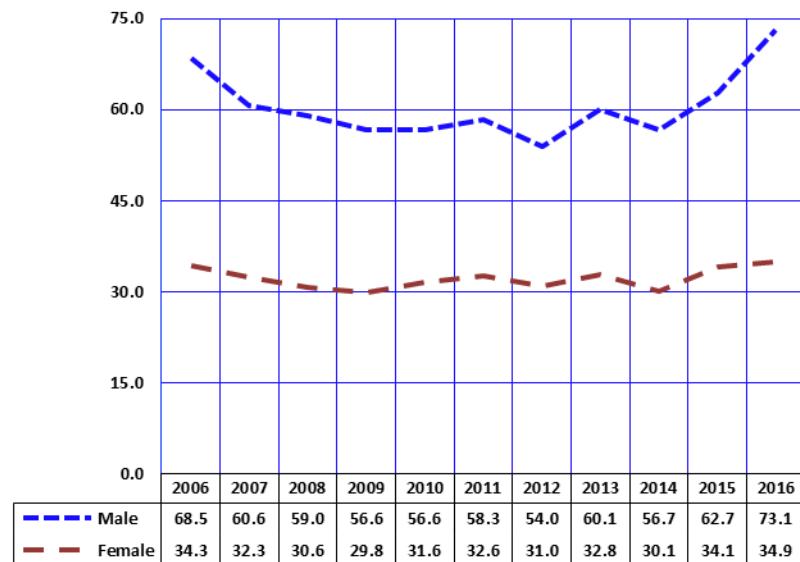
Note: ^a Number of deaths per 100,000 population age-adjusted to the 2000 U.S. standard.

2B. LEADING CAUSES OF DEATH Accidents (unintentional injury)

The number of deaths from unintentional injuries increased by 14.6 percent from 3,403 in 2015 to 3,899 in 2016 (**Table 2B-1**). In 2016, based on age-adjusted mortality rates, accidents ranked third as a leading cause of death for males and fifth for females (**Table 2B-4**). From 2015 to 2016, the age-adjusted mortality rate for accidents increased 16.5 percent for males compared to 2.3 percent for females (**Figure 2B-10**).

In 2016, 967 deaths were caused by motor vehicle accidents, an increase of 13.1 percent from 2015. Deaths due to accidental drowning and submersion increased 29.6 percent over this period. Additionally, Arizonans experienced a 14.7 percent increase in the number of accidental poisonings due to drugs and/or medicaments from 2015 (955) to 2016 (1,095); **Table 2B-9**.

Figure 2B-10
Age-adjusted Mortality Rates^a for Accidents (Unintentional Injuries) by Gender and Year, Arizona, 2006-2016

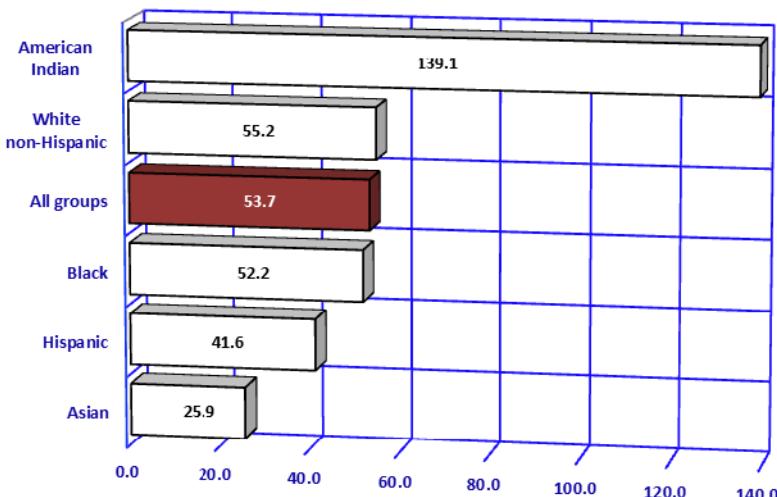


Note: ^a Number of deaths per 100,000 population age-adjusted to the 2000 U.S. standard.

Figure 2B-11
Age-adjusted Mortality Rates^a for Accidents (Unintentional Injuries) by Race/Ethnicity, Arizona, 2016

The American Indian death rate for unintentional injuries (139.1/100,000) was 5.4 times greater than the rate for Asians (25.9/100,000), the group at the lowest risk of unintentional injury death among racial/ethnic groups in the State (**Figure 2B-11, Table 2B-4**).

In 2016, Apache (142.2/100,000) and La Paz (118.7/100,000) counties had the two highest age-adjusted mortality rates for unintentional injuries (**Table 5E-11**).



Note: ^a Number of deaths per 100,000 population age-adjusted to the 2000 U.S. standard.

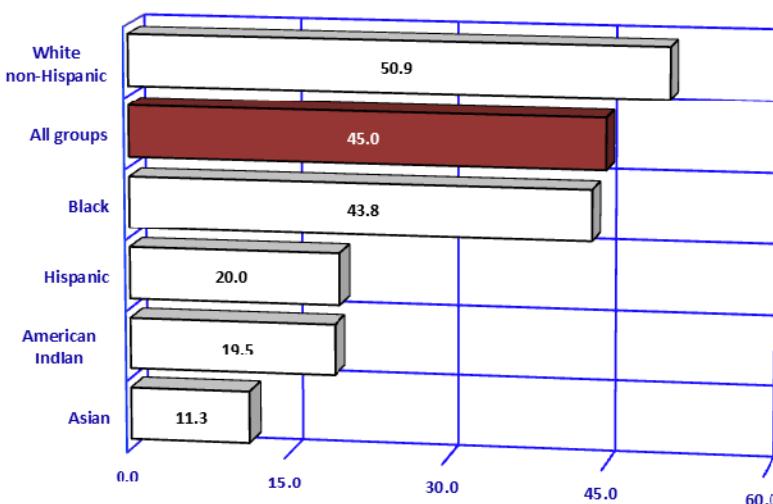
2B. LEADING CAUSES OF DEATH Chronic lower respiratory diseases

Figure 2B-12
Age-adjusted Mortality Rates^a for Chronic Lower Respiratory Diseases^b by Gender and Year, Arizona, 2006-2016



Notes: ^a Number of deaths per 100,000 population age-adjusted to the 2000 U.S. standard; ^bThis ICD-10 title corresponds to Chronic Obstructive Pulmonary Disease (ICD-9 title).

Figure 2B-13
Age-adjusted Mortality Rates^a for Chronic Lower Respiratory Diseases by Race/Ethnicity, Arizona, 2016



In 2016, chronic lower respiratory diseases (bronchitis, emphysema, asthma) were the 4th leading cause of death among Arizona residents (**Table 2B-1**). From 2015 to 2016, the mortality rate for chronic lower respiratory diseases decreased among males while it increased among females (**Figure 2B-12, Table 2B-2**).

Urban females had the lowest mortality rate for chronic lower respiratory diseases (41.6/100,000) among the genders and by regional group (**Table 2B-5**). Rural males were the group with the highest mortality risk for chronic lower respiratory diseases (56.6/100,000), followed by rural females (46.8/100,000) and urban males (45.2 deaths per 100,000).

Mortality rates for emphysema, chronic bronchitis, asthma, and other lower respiratory disorders were substantially higher among White non-Hispanics (50.9 deaths per 100,000) and Black or African Americans (43.8/100,000) than they were among Hispanics, (20.0/100,000), American Indians (19.5/100,000), and Asians (11.3/100,000) (**Figure 2B-13, Table 2B-4**).

Note: ^a Number of deaths per 100,000 population age-adjusted to the 2000 U.S. standard.

2B. LEADING CAUSES OF DEATH Cerebrovascular disease

Cerebrovascular disease and diseases of the heart are two of the leading causes of death that share many risk factors such as hypertension, smoking, obesity, and high levels of cholesterol. The age-adjusted mortality rate for stroke decreased by 11.7 percent from 34.8 deaths per 100,000 population in 2006 to 30.7/100,000 in 2016 (**Table 2B-3**).

With some exceptions, the risk of dying from stroke was generally higher among females than males for the period 2006-2016. In 2012, the age-adjusted mortality rate for stroke was greater among males than females, with male risk being slightly higher than female risk (**Figure 2B-14**). In 2015, the stroke mortality rate for males was again greater than the rate for females (**Figure 2B-14, Table 2B-2**). In 2016, however, females experienced a higher risk of dying from stroke than males.

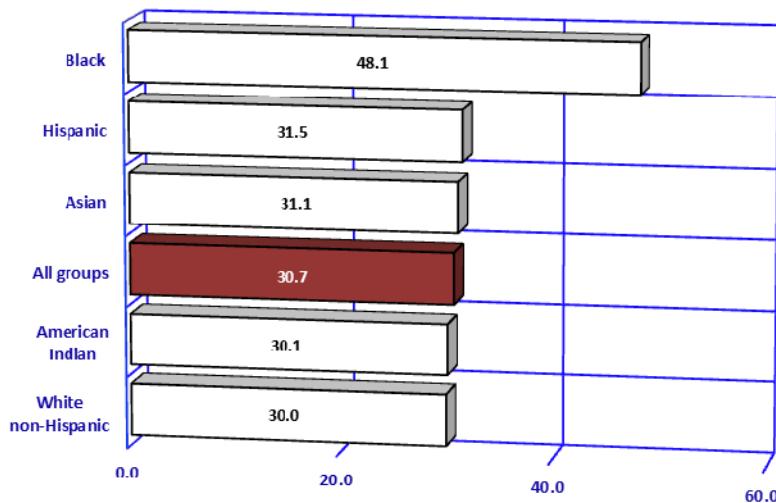
Figure 2B-14
Age-adjusted Mortality Rates^a for Cerebrovascular Disease by Gender and Year, Arizona, 2006-2016



Note: ^a Number of deaths per 100,000 population age-adjusted to the 2000 U.S. standard.

Figure 2B-15
Age-adjusted Mortality Rates^a for Cerebrovascular Disease by Race/Ethnicity, Arizona, 2016

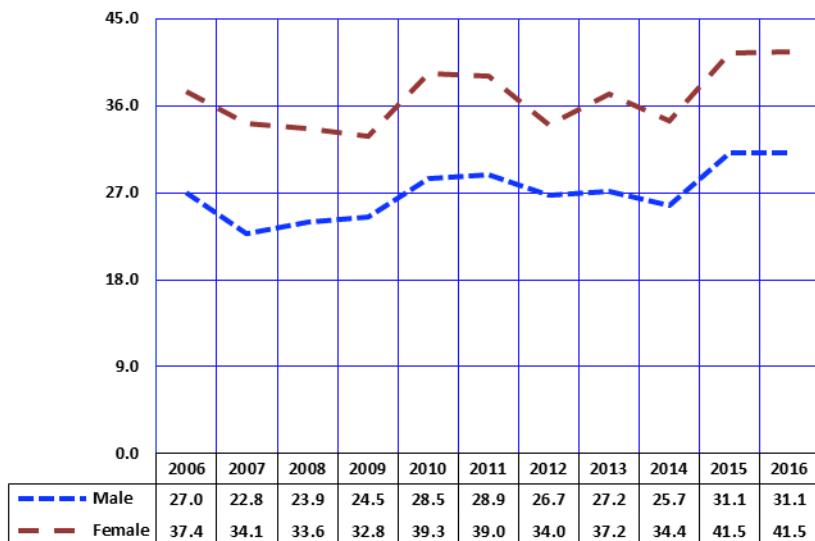
Compared to Arizona's overall rate, Black or African Americans were 56.7 percent more likely to die from cerebrovascular disease in 2016 (**Figure 2B-15, Table 2B-4**). The 2016 mortality rate for cerebrovascular disease among White non-Hispanics (30.0/100,000) was the lowest among racial/ethnic groups.



Note: ^a Number of deaths per 100,000 population age-adjusted to the 2000 U.S. standard.

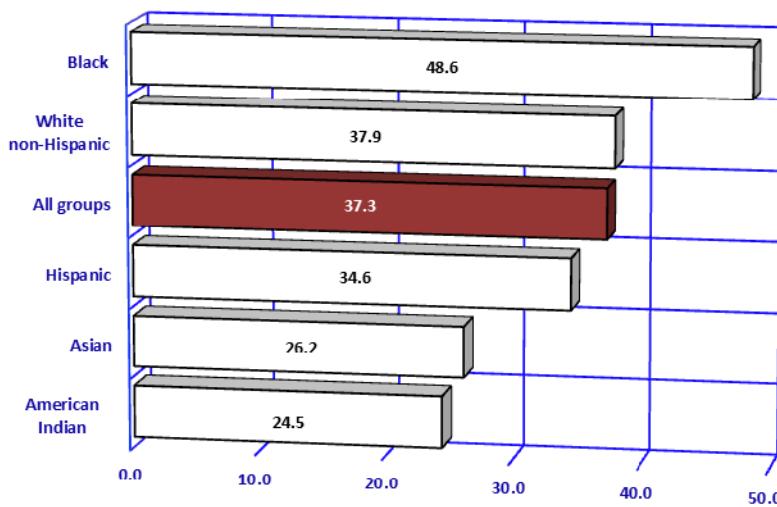
2B. LEADING CAUSES OF DEATH Alzheimer's disease

Figure 2B-16
Age-adjusted Mortality Rates^a for Alzheimer's Disease by Gender and Year, Arizona, 2006-2016



Note: ^a Number of deaths per 100,000 population age-adjusted to the 2000 U.S. standard.

Figure 2B-17
Age-adjusted Mortality Rates^a for Alzheimer's Disease by Race/Ethnicity, Arizona, 2016



Note: ^a Number of deaths per 100,000 population age-adjusted to the 2000 U.S. standard.

Based on the number of deaths in 2016, Alzheimer's disease was the 4th leading cause of death for females and 6th leading cause for males (**Table 2B-4**).

From 2015 to 2016, the age-adjusted mortality rate for Alzheimer's disease remained constant among both genders, at 41.5/100,000 for females and 31.1/100,000 for males (**Figure 2B-16**).

The age-adjusted mortality rates for Alzheimer's disease in 2016 were higher among Black or African Americans (48.6/100,000), White non-Hispanics (37.9/100,000), and Hispanics (34.6/100,000) than among Asian residents of Arizona (26.2/100,000) or American Indian (24.5/100,000) (**Figure 2B-17**, **Table 2B-4**).

White non-Hispanic residents of Arizona disproportionately contributed to mortality from Alzheimer's disease. In 2016, White non-Hispanics accounted for 56.7 percent (**Table 10C-1**) of the State's population, but 85.0 percent of all deaths from Alzheimer's disease (2,617 out of 3,081; **Table 2B-4**).

In 2016, the median age at death from Alzheimer's disease was 88 for females and 86 for males (**Table 2D-3**).

2B. LEADING CAUSES OF DEATH Diabetes

Figure 2B-18
Age-adjusted Mortality Rates^a for Diabetes by Gender and Year,
Arizona, 2006-2016

In 2016, mortality rates for diabetes decreased for both genders, to a greater extent among females than males (**Figure 2B-18**).

In addition to 2,013 deaths that had diabetes assigned as the underlying cause in 2016, another 3,409 deaths had diabetes assigned as a contributing factor. The diabetes-related death rate of 65.5/100,000 (**Table 6A-6**) was 2.7 times greater than the rate for diabetes as an underlying cause (24.5/100,000; **Table 2B-2**).

The diabetes-related death rate includes all mentions of diabetes on the death certificate as the underlying or other than underlying cause.

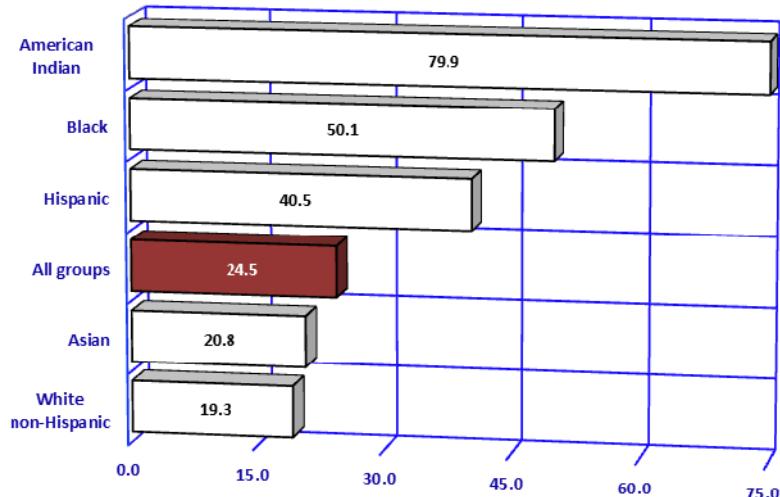


Note: ^a Number of deaths per 100,000 population age-adjusted to the 2000 U.S. standard.

Figure 2B-19
Age-adjusted Mortality Rates^a for Diabetes by Race/Ethnicity,
Arizona, 2016

In 2016, compared to Arizona's rate, American Indians were 3.3 times more likely to die from diabetes (79.9 deaths per 100,000; **Figure 2B-19, Table 2B-4**). The rate of 19.3 deaths per 100,000 among White non-Hispanics was the lowest rate among all racial/ethnic groups in the State.

Among the 15 Arizona counties, in 2016, Apache (46.7/100,000), La Paz (41.2/100,000) and Graham (37.4/100,000) counties had the highest mortality rates for diabetes (**Table 5E-11**).



Note: ^a Number of deaths per 100,000 population age-adjusted to the 2000 U.S. standard.

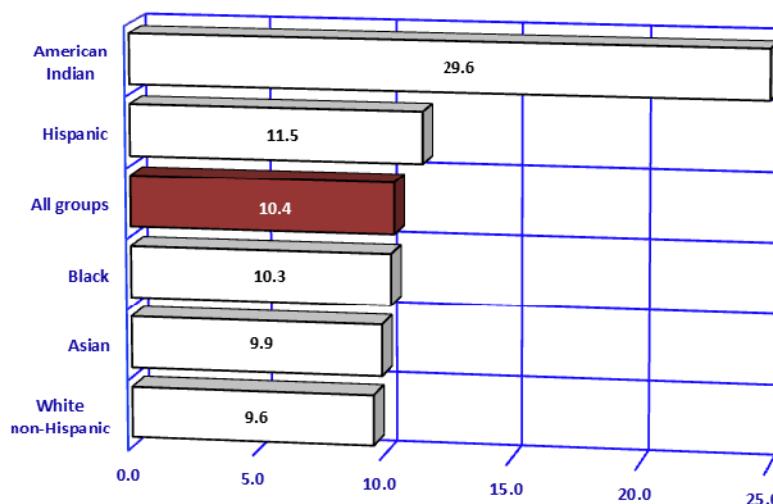
2B. LEADING CAUSES OF DEATH Influenza and pneumonia

Figure 2B-20
Age-adjusted Mortality Rates^a for Influenza and Pneumonia by Gender and Year, Arizona, 2006-2016



Note: ^a Number of deaths per 100,000 population age-adjusted 2000 U.S. standard.

Figure 2B-21
Age-adjusted Mortality Rates^a for Influenza and Pneumonia by Race/Ethnicity, Arizona, 2016



Note: ^a Number of deaths per 100,000 population age-adjusted to the 2000 U.S. standard.

The number of deaths from influenza and pneumonia decreased by 25.1 percent from 1,147 in 2006 to 859 in 2016, though the number of influenza deaths rose 16.2 percent from 2015 to 2016 (**Table 2B-1**). Among the 859 deaths, influenza was identified as the underlying cause for 146 of them, while pneumonia was listed as the underlying cause on 713 death certificates (**Table 2B-6**).

The mortality rate for influenza and pneumonia increased for females from 8.2 deaths per 100,000 in 2015 to 9.4 deaths in 2016 (**Figure 2B-20, Table 2B-2**). The mortality rate for influenza and pneumonia also increased for males from 10.9 deaths per 100,000 in 2015 to 11.8/100,000 in 2016.

In 2016, the age-adjusted mortality rate for Arizona males was 25.2 percent greater than that of Arizona females.

In 2016, American Indian residents of Arizona had the highest mortality rate for influenza and pneumonia (29.6 deaths per 100,000) among the racial/ethnic groups. The age-adjusted mortality of 9.6/100,000 among White non-Hispanic was the lowest rate among racial/ethnic groups in the State (**Figure 2B-21, Table 2B-4**).

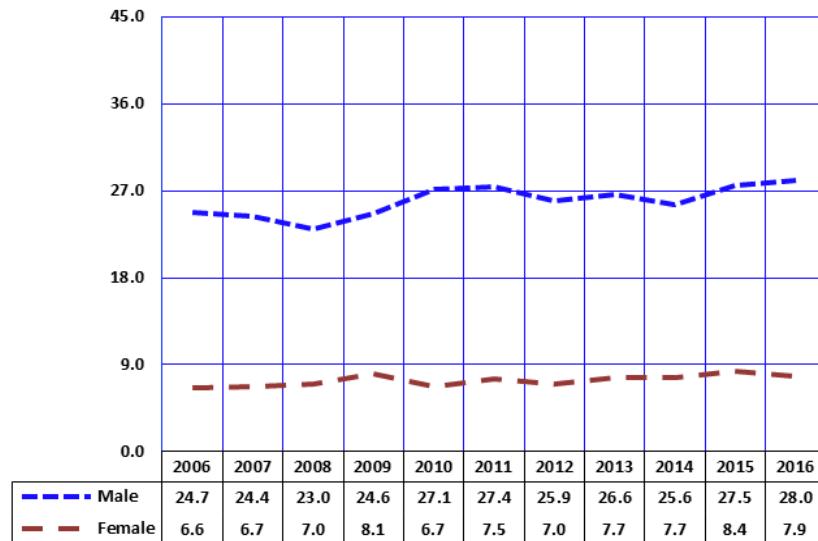
Compared to the State death rate for influenza and pneumonia, Apache County's rate was 2.2 times greater (22.5/100,000). The mortality rate was also higher in Cochise, Graham and Navajo Counties (**Table 5E-11**).

2B. LEADING CAUSES OF DEATH Suicide

Figure 2B-22
Age-adjusted Mortality Rates^a for Suicide by Gender and Year,
Arizona, 2006-2016

In 2016, suicide was the 8th leading cause of death among males. It ranked as the 11th cause of mortality for females. The age-adjusted suicide rate decreased from 17.8 suicides per 100,000 in 2015 to 17.7 in 2016 (**Table 2B-4**).

From 2015 to 2016, the suicide rate increased for both males and females (**Figure 2B-22, Table 2B-4**). In 2016, suicide posed a 3.6 times greater mortality risk for males (28.0/100,000) than for females (7.9/100,000).

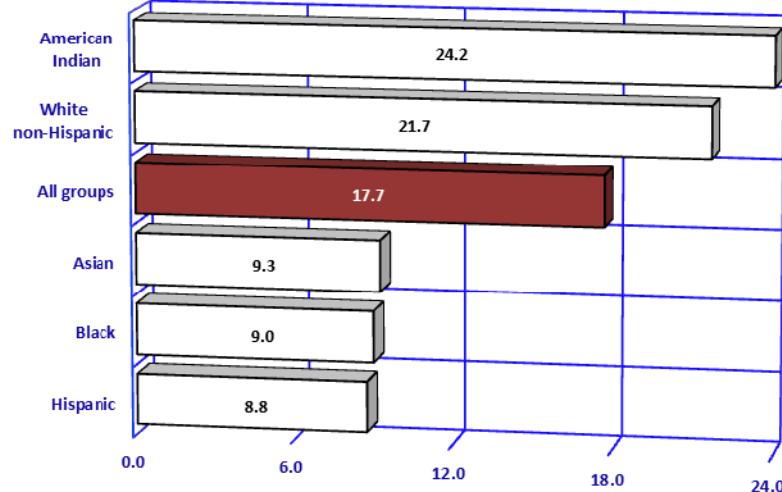


Note: ^a Number of deaths per 100,000 population age-adjusted to the 2000 U.S. standard.

Figure 2B-23
Age-adjusted Mortality Rates^a for Suicide by Race/Ethnicity,
Arizona, 2016

In 2016, American Indians had the highest age-adjusted suicide rate (24.2 suicides per 100,000) among racial/ethnic groups, followed by White non-Hispanics (21.7/100,000), while Hispanics recorded the lowest age-adjusted suicide rate (8.8/100,000; **Figure 2B-23, Table 2B-4**).

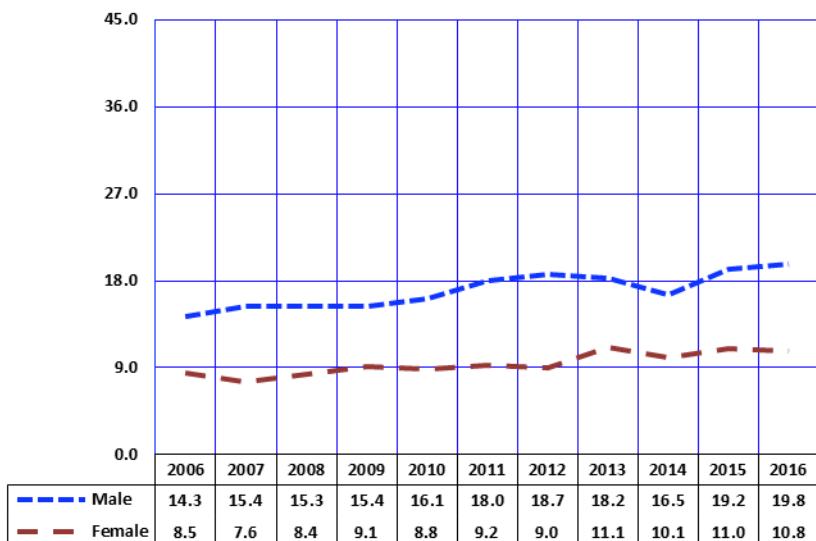
The age-adjusted mortality rates for suicide varied in Arizona in 2016 from a low rate of 9.7 suicides per 100,000 residents in Santa Cruz county to a high of 32.7 suicides per 100,000 residents of Yavapai County (**Table 5E-11**).



Note: ^a Number of deaths per 100,000 population age-adjusted to the 2000 U.S. standard.

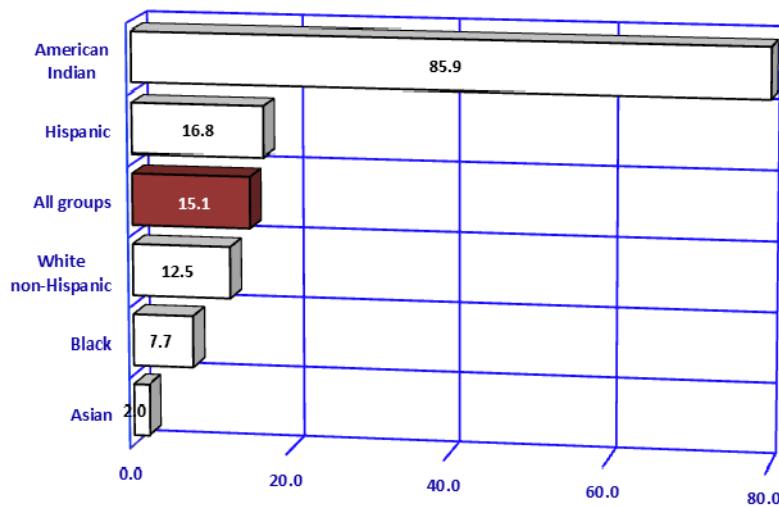
2B. LEADING CAUSES OF DEATH Chronic liver disease and cirrhosis

Figure 2B-24
Age-adjusted Mortality Rates^a for Chronic Liver Disease and Cirrhosis
by Gender and Year, Arizona, 2006-2016



Note: ^a Number of deaths per 100,000 population age-adjusted to the 2000 U.S. standard.

Figure 2B-25
Age-adjusted Mortality Rates^a for Chronic Liver Disease and Cirrhosis
by Race/Ethnicity, Arizona, 2016



Note: ^a Number of deaths per 100,000 population age-adjusted to the 2000 U.S. standard.

Chronic liver disease and cirrhosis was the 9th leading cause of death in Arizona in 2016 (**Figure 2B-1, Table 2B-1**). Among the 1,169 deaths due to chronic liver disease and cirrhosis, 744 (63.6 percent) were males (**Table 2B-4**).

Among females, the age-adjusted mortality rate for chronic liver disease and cirrhosis decreased 2.3 percent from 2015 to 2016. Among males, the mortality rate increased 2.9 percent from 19.2/100,000 in 2015 to 19.8/100,000 in 2016 (**Figure 2B-24, Table 2B-3**).

In 2016, La Paz, Gila, Navajo, and Apache counties had the highest mortality rates for chronic liver disease and cirrhosis (**Table 5E-11**).

The 2016 death rate for chronic liver disease and cirrhosis among American Indians (85.9 deaths per 100,000) was 5.7 times greater than the state average (15.1/100,000; **Figure 2B-25, Table 2B-4**). The rate for Asians (2.0 deaths per 100,000 population) was the lowest among all racial/ethnic groups in the State.

Compared to the median age at death from all causes (76 years), those who died from chronic liver disease and cirrhosis were on average 17 years younger (59 years, **Table 2D-3**). In 2016, the median age at death of American Indians who died from chronic liver disease and cirrhosis was 50 years, which was 11-12 years younger than all the other race/ethnic groups (**Table 2D-3**).

TABLE 2B-1
NUMBER OF DEATHS FOR THE LEADING CAUSES OF MORTALITY BY YEAR, ARIZONA, 2006-2016

Rank in 2006	Rank in 2016	Cause of death	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
1	1	Diseases of heart	10,362	10,147	10,299	10,151	9,719	10,424	10,366	10,497	9,953	11,274	11,820
2	2	Malignant neoplasms	9,768	9,955	9,949	10,147	10,423	10,543	10,871	11,193	10,600	11,624	11,801
3	3	Accidents (unintentional injury)	3,156	3,014	2,951	2,887	2,834	2,959	2,804	3,137	3,011	3,403	3,899
4	4	Chronic lower respiratory diseases	2,771	2,651	2,896	2,808	2,892	3,143	3,167	3,295	3,185	3,648	3,788
6	5	Alzheimer's disease	2,057	2,041	2,086	2,086	2,314	2,336	2,154	2,384	2,345	2,942	3,081
5	6	Cerebrovascular diseases	2,159	2,079	2,089	2,010	2,051	2,067	2,096	2,047	1,995	2,463	2,536
7	7	Diabetes	1,188	1,145	1,162	1,078	1,372	1,721	1,698	1,744	1,776	2,050	2,013
9	8	Intentional self-harm (suicide)	948	986	968	1,060	1,070	1,113	1,070	1,116	1,124	1,233	1,256
10	9	Chronic liver disease and cirrhosis	706	734	778	818	843	933	971	1,040	984	1,120	1,169
15	10	Essential primary hypertension and hypertensive renal disease	420	389	475	475	498	725	739	711	758	896	1,010
8	11	Influenza and pneumonia	1,147	875	1,075	1,007	729	649	635	724	669	739	859
14	12	Parkinson's disease	489	455	487	446	488	545	579	578	569	719	712
12	13	Septicemia	539	547	539	528	425	321	319	354	336	436	505
11	14	Nephritis, nephrotic syndrome and nephrosis	549	510	488	532	516	409	440	391	353	498	485
13	15	Assault (homicide)	525	494	461	360	404	387	376	383	294	364	416
ALL CAUSES			45,415	44,640	45,128	45,065	45,871	47,547	48,459	49,929	51,074	54,152	56,480

Notes: The cause-of-death titles are according to the Tenth Revision of the International Classification of Diseases (ICD-10). The causes of death for 2006-2016 are classified by ICD-10, replacing the Ninth Revision (ICD-9) used during 1979-1999. The group titles, such as cardiovascular diseases, infectious and parasitic diseases, or other cardiovascular diseases are not ranked to determine the leading causes of death. The ICD-10 code for the underlying cause of death was missing for as many as 140 in 2008.

TABLE 2B-2
**AGE-ADJUSTED MORTALITY RATES^a BY GENDER AND YEAR FOR SELECTED LEADING CAUSES OF DEATH,
ARIZONA, 2006-2016**

	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
TOTAL, ALL CAUSES											
Total	727.3	663.2	659.6	653.2	679.9	699.6	687.2	687.8	676.0	691.3	696.6
Male	861.6	773.8	777.6	763.9	802.0	817.1	811.0	805.8	791.2	811.5	824.8
Female	611.8	561.7	554.3	555.1	572.6	595.3	579.2	583.8	572.8	583.3	581.1
CARDIOVASCULAR DISEASE											
Total	216.4	194.4	194.1	188.8	188.6	201.0	193.3	187.7	171.6	189.0	190.8
Male	258.3	227.5	235.8	228.1	225.1	239.2	233.6	229.0	206.9	226.7	230.7
Female	181.0	164.3	158.1	154.9	156.7	168.0	159.1	152.4	140.7	156.1	155.9
----DISEASES OF HEART											
Total	166.1	149.5	149.3	145.9	143.3	152.7	145.8	143.0	129.9	141.3	142.5
Male	207.3	184.0	189.3	183.1	179.8	192.8	184.4	183.6	164.1	177.1	180.5
Female	131.8	119.4	115.1	114.1	112.2	119.0	113.7	109.2	100.5	110.5	109.8
----CEREBROVASCULAR DISEASE											
Total	34.8	30.6	30.3	28.9	30.7	30.6	29.9	28.2	26.2	31.1	30.7
Male	33.4	27.7	29.6	28.2	28.9	28.0	30.0	27.2	24.8	31.3	29.9
Female	35.2	32.2	30.5	29.1	31.3	32.3	29.4	28.5	26.8	30.7	30.9
MALIGNANT NEOPLASMS											
Total	154.7	148.0	145.5	147.2	150.5	151.3	149.8	149.6	136.3	144.0	140.7
Male	187.0	176.7	173.8	174.9	180.6	179.3	180.3	175.0	160.8	169.0	166.3
Female	131.0	125.6	123.0	125.8	127.1	129.5	125.9	129.9	116.8	123.8	120.0
CHRONIC LOWER RESPIRATORY DISEASE											
Total	44.3	39.2	42.1	40.5	42.6	45.9	44.2	44.5	41.1	45.1	45.0
Male	50.2	43.5	46.5	44.7	48.1	49.7	50.5	48.1	45.8	48.9	47.6
Female	40.1	36.0	38.9	37.1	38.6	42.8	39.5	41.8	37.5	41.7	42.9
ACCIDENTS (UNINTENTIONAL INJURIES)											
Total	51.2	46.6	44.7	43.1	43.8	45.5	42.4	46.3	43.3	48.1	53.7
Male	68.5	60.6	59.0	56.6	56.6	58.3	54.0	60.1	56.7	62.7	73.1
Female	34.3	32.3	30.6	29.8	31.6	32.6	31.0	32.8	30.1	34.1	34.9
----MOTOR VEHICLE ACCIDENTS											
Total	19.6	16.2	13.6	11.6	11.1	12.1	11.4	11.4	10.3	12.6	13.9
Male	26.8	22.2	19.5	16.8	15.9	17.6	16.8	16.3	14.5	18.0	20.1
Female	12.4	10.1	7.9	6.5	6.4	6.9	6.3	6.6	6.0	7.2	7.8
INFLUENZA AND PNEUMONIA											
Total	18.4	12.9	15.6	14.6	10.9	9.7	9.1	10.0	8.9	9.4	10.4
Male	22.2	14.9	17.7	15.6	12.8	11.5	7.4	11.6	10.4	10.9	11.8
Female	15.7	11.5	14.1	13.7	9.3	8.2	5.6	8.8	7.7	8.2	9.4

TABLE 2B-2 (continued)
**AGE-ADJUSTED MORTALITY RATES^a BY GENDER AND YEAR FOR SELECTED LEADING CAUSES OF DEATH,
ARIZONA, 2006-2016**

	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
ALZHEIMER'S DISEASE											
Total	33.4	29.6	29.8	29.5	35.1	35.2	29.9	33.2	30.9	37.3	37.3
Male	27.0	22.8	23.9	24.5	28.5	28.9	41.5	27.2	25.7	31.1	31.1
Female	47.4	34.1	33.6	32.8	39.3	39.0	52.8	37.2	34.4	41.5	41.5
DIABETES											
Total	18.9	17.0	17.0	15.7	20.1	24.8	23.5	23.6	23.0	25.7	24.5
Male	22.5	20.5	20.7	18.2	24.9	30.3	29.2	29.1	28.9	31.8	31.5
Female	15.9	13.9	13.9	13.5	16.0	20.2	18.6	18.8	17.8	20.4	18.4
CHRONIC LIVER DISEASE AND NEPHRITIS, NEPHROTIC SYNDROME, AND NEPHROSIS											
Total	11.4	11.3	11.7	12.2	12.3	13.4	13.6	14.5	13.2	14.9	15.1
Male	14.3	15.4	15.3	15.4	16.1	18.0	18.7	18.2	16.5	19.2	19.8
Female	8.5	7.6	8.4	9.1	8.8	9.2	9.0	11.1	10.1	11.0	10.8
INTENTIONAL SELF-HARM (SUICIDE)											
Total	8.8	7.6	7.1	7.7	7.6	6.0	6.2	5.3	4.6	6.3	5.8
Male	10.5	8.8	8.6	9.2	9.0	7.2	8.9	6.1	5.2	7.7	6.9
Female	7.4	6.6	5.9	6.5	6.4	5.1	6.7	4.8	4.2	5.2	4.9
ASSAULT (HOMICIDE)											
Total	15.4	15.4	14.8	16.1	16.7	17.2	16.2	17.0	16.5	17.8	17.7
Male	24.7	24.4	23.0	24.6	27.1	27.4	25.9	26.6	25.6	27.5	28.0
Female	6.6	6.7	7.0	8.1	6.7	7.5	7.0	7.7	7.7	8.4	7.9
SEPTICEMIA											
Total	8.6	8.1	7.9	7.7	7.4	4.7	4.5	4.8	4.4	5.4	6.2
Male	13.5	11.8	11.2	8.0	10.5	9.6	8.6	9.2	7.1	8.6	9.9
Female	3.1	3.2	2.7	2.9	2.4	2.6	3.1	2.5	2.1	2.5	2.5

Notes: ^a The number of deaths per 100,000 population adjusted to the 2000 U.S. standard. The cause-of-death titles are according to the Tenth Revision of the International Classification of Diseases (ICD-10). Beginning in 2000, the causes of death are classified by ICD-10.

TABLE 2B-3
**AGE-ADJUSTED^a MORTALITY RATES FOR SELECTED CAUSES OF DEATH BY RACE/ETHNICITY
AND GENDER, ARIZONA, 1990-2016**

	All groups			White non-Hispanic			Hispanic or Latino			Black or African American			American Indian or Alaska Native			Asian or Pacific Islander		
	T	M	F	T	M	F	T	M	F	T	M	F	T	M	F	T	M	F
Total, all causes																		
1990	839.9	1056.7	666.4	833.8	1048.8	663.8	736.6	906.0	591.9	1092.7	1366.7	868.4	1043.2	1371.6	763.0	528.8	589.2	446.3
1991	836.9	1046.3	668.3	826.3	1031.5	661.9	797.7	1020.2	620.0	1140.9	1374.4	926.9	1003.3	1256.1	792.1	518.3	634.6	421.4
1992	840.2	1066.9	658.4	825.8	1044.8	651.7	808.7	1053.8	614.6	1140.1	1455.5	877.4	1058.7	1345.0	815.1	550.5	674.3	450.6
1993	866.4	1081.0	691.0	852.7	1060.9	682.5	852.6	1096.9	663.2	1041.6	1295.4	828.6	1078.4	1377.8	830.6	651.9	705.1	611.6
1994	846.6	1049.8	677.9	834.7	1031.8	672.1	798.6	975.8	652.6	1133.0	1486.6	841.7	1012.7	1285.8	779.8	675.6	836.4	556.9
1995	835.5	1026.0	675.3	823.1	1008.9	668.2	823.7	1021.1	659.6	1110.4	1411.2	867.0	1010.4	1192.0	846.8	595.8	804.1	438.2
1996	829.3	1020.7	672.0	817.6	1006.4	663.6	783.7	981.1	622.8	1038.4	1224.6	890.7	1047.2	1282.1	848.7	378.7	456.6	321.3
1997	809.5	975.5	668.6	798.4	954.8	666.1	789.1	1010.8	613.5	1040.2	1252.1	859.6	972.9	1177.6	795.4	426.3	530.3	351.1
1998	807.6	978.4	665.4	794.5	959.6	657.2	804.1	990.0	654.6	1017.9	1253.7	840.8	990.7	1230.3	789.4	460.3	499.5	429.0
1999	811.0	982.6	668.7	792.3	957.4	656.1	794.6	995.4	635.5	1025.4	1254.3	842.9	1017.5	1176.1	877.9	434.8	511.7	378.4
2000	785.6	941.1	654.6	776.6	930.6	647.3	769.9	926.0	642.4	1057.5	1263.1	890.3	1011.4	1240.4	818.7	504.1	544.0	451.5
2001	791.2	952.4	656.7	778.1	936.3	647.1	787.6	958.7	644.5	1050.6	1211.7	923.5	1010.5	1213.3	836.9	560.7	592.9	517.2
2002	796.4	964.8	658.0	786.7	948.7	654.4	811.1	1007.5	651.5	951.5	1170.1	759.6	975.1	1201.7	792.3	560.4	661.8	452.6
2003	784.0	942.8	651.5	764.9	921.4	636.0	839.5	1007.3	698.7	1048.6	1201.7	901.9	900.7	1057.7	761.4	497.2	522.0	478.7
2004	757.3	909.0	632.0	734.6	885.2	612.8	834.0	1006.6	691.5	1021.7	1149.2	895.8	879.2	1040.6	741.7	557.5	446.5	715.3
2005	772.5	925.7	644.9	744.6	894.4	622.3	849.2	1062.1	679.8	1053.1	986.6	1125.9	1006.6	1215.2	835.6	629.5	670.8	593.1
2006	727.3	861.6	611.8	728.5	854.4	621.1	685.6	837.3	556.0	885.1	1109.5	693.6	744.5	933.9	593.0	393.4	478.0	340.5
2007	663.2	773.8	561.7	665.1	777.7	563.2	603.7	705.7	509.3	719.2	739.1	691.2	752.5	928.8	605.2	356.3	1008.6	342.1
2008	659.6	777.6	554.3	660.1	780.7	553.9	606.9	704.0	515.8	710.7	746.4	670.5	766.3	937.9	620.0	427.0	529.7	359.0
2009	653.2	763.9	555.1	647.3	761.9	546.8	614.9	712.3	528.4	736.8	728.4	736.1	823.5	972.5	695.0	472.8	561.7	408.7
2010	679.9	802.0	572.6	674.4	791.8	569.7	612.0	716.0	525.0	835.0	1009.6	698.5	891.8	1080.0	731.1	424.1	544.7	345.7
2011	699.6	817.1	595.3	741.5	810.1	595.9	656.4	781.9	549.7	833.6	981.9	718.5	765.5	871.4	669.5	436.7	521.8	377.8
2012	687.2	811.0	579.2	693.1	817.9	583.0	616.2	743.0	512.8	886.5	985.3	793.1	843.8	1001.0	708.3	440.1	463.6	418.3
2013	687.8	805.8	583.8	693.7	811.8	588.8	615.6	708.5	534.9	918.5	1061.5	782.1	887.0	1075.3	728.5	413.4	485.9	364.6
2014	676.0	791.2	572.8	685.7	802.3	579.5	636.9	752.5	538.1	739.9	850.5	646.5	818.5	971.5	684.9	371.8	416.1	337.6
2015	691.3	811.5	583.3	704.1	821.6	597.0	601.5	725.0	497.2	832.8	980.1	704.1	965.3	1171.5	790.6	413.8	498.8	360.5
2016	696.6	824.8	581.1	704.8	826.6	593.6	607.5	739.7	496.9	874.2	1029.9	724.6	1023.9	1314.1	783.5	433.5	485.6	392.8
Cardiovascular diseases																		
1990	338.6	410.6	280.7	343.6	417.5	284.2	285.7	347.2	236.0	446.1	492.3	411.6	269.0	365.5	190.7	188.2	180.4	189.7
1991	328.9	397.0	271.5	331.2	401.0	272.4	306.1	370.0	252.6	467.2	495.5	432.1	248.0	308.2	200.8	217.4	259.1	181.91
1992	329.2	402.3	269.6	328.7	403.3	267.8	318.0	387.0	263.8	503.7	602.1	425.1	280.7	360.5	216.0	206.2	226.1	191.9
1993	339.9	408.5	282.4	341.1	413.4	280.0	317.3	384.2	266.5	408.2	438.8	379.2	293.3	323.2	269.4	301.2	327.6	281.11
1994	324.1	387.3	269.9	325.4	389.5	269.8	298.5	359.6	252.6	438.2	507.7	371.4	287.6	369.8	222.0	279.8	309.9	256.67
1995	318.3	380.6	266.3	318.8	384.6	264.0	319.5	356.4	286.2	407.9	477.7	352.9	269.0	298.3	243.6	236.9	349.8	152.14
1996	307.1	373.1	253.1	309.6	377.4	254.0	285.3	361.6	226.2	385.6	406.2	364.3	267.9	323.4	224.1	134.8	183.0	99.326
1997	297.3	349.6	252.6	298.4	351.2	253.0	300.4	358.3	255.3	355.5	384.4	326.1	237.6	268.9	211.5	165.0	217.1	128.47
1998	296.2	356.4	246.3	295.2	356.0	244.2	297.6	358.7	252.2	420.5	512.3	348.6	259.1	336.2	198.2	173.5	175.3	177.44
1999	289.7	349.8	240.1	289.5	350.5	238.5	283.5	352.2	234.1	384.3	432.7	342.8	241.0	290.8	201.4	164.9	172.0	159.85
2000	276.1	333.1	230.0	276.0	335.8	227.7	273.6	320.8	236.1	411.5	460.3	374.6	257.5	308.3	218.7	190.6	197.0	183.2
2001	267.3	321.6	223.0	265.8	322.0	220.1	281.4	325.8	242.8	388.1	422.3	354.6	234.1	275.6	202.5	184.3	190.8	179.9
2002	265.5	321.1	221.0	266.1	323.2	220.0	276.3	321.8	240.0	329.8	402.1	269.0	216.2	257.6	184.4	218.4	208.4	173.5
2003	258.4	310.3	215.8	257.2	309.3	214.2	278.2	339.9	230.3	390.1	426.5	348.3	188.6	239.3	150.6	145.3	137.2	150.7
2004	248.5	298.4	207.8	243.1	295.7	200.6	284.1	331.4	247.0	372.5	365.2	363.2	214.6	254.7	181.0	200.3	158.8	259.2
2005	245.7	298.2	203.8	241.3	295.8	198.2	266.1	331.8	217.5	343.3	304.3	385.9	235.6	279.7	201.6	243.0	244.9	241.3
2006	216.4	258.3	181.0	218.2	258.9	183.3	203.2	243.8	170.2	310.3	443.9	208.0	167.0	213.0	131.3	136.2	159.0	122.9
2007	194.4	227.5	164.3	196.9	234.0	163.5	179.8	201.8	159.1	225.9	210.0	239.7	155.0	181.8	132.4	108.9	165.9	108.3
2008	194.1	235.8	158.1	196.3	240.6	158.3	184.8	218.8	153.8	219.6	235.0	205.2	150.4	172.8	133.7	121.4	132.3	114.1
2009	188.8	228.1	154.9	188.3	229.4	152.9	179.8	211.3	151.9	245.7	228.8	252.2	164.2	209.1	130.0	150.8	182.3	127.9
2010	188.6	225.1	156.7	188.8	224.9	156.6	172.4	201.5	148.9	258.5	305.4	215.1	183.2	216.9	154.8	130.0	175.8	98.9
2011	201.0	239.2	168.0	212.6	239.9	167.1	193.4	223.9	168.0	266.1	329.3	219.6	149.2	160.8	136.3	122.4	148.6	103.7
2012	193.3	233.6	159.1	195.1	238.4	157.9	176.2	204.3	153.1	280.4	290.7	269.6	168.3	204.1	139.8	134.7	159.3	116.7
2013	187.7	229.0	152.4	190.9	233.3	154.0	161.9	194.2	135.3	280.2	354.0	218.5	164.2	199.8	137.4	133.6	154.8	119.2
2014	171.6	206.9	140.7	174.9	2													

TABLE 2B-3 (continued)

**AGE-ADJUSTED^a MORTALITY RATES FOR SELECTED CAUSES OF DEATH BY RACE/ETHNICITY
AND GENDER, ARIZONA, 1990-2016**

	All groups			White non-Hispanic			Hispanic or Latino			Black or African American			American Indian or Alaska Native			Asian or Pacific Islander		
	T	M	F	T	M	F	T	M	F	T	M	F	T	M	F	T	M	F
-----Cerebrovascular diseases																		
1990	54.6	54.6	54.1	55.0	54.7	54.8	45.2	40.7	46.9	76.6	84.7	73.2	48.8	63.0	37.5	44.7	23.5	54.5
1991	53.9	54.1	52.4	53.3	53.3	51.9	47.3	42.6	49.0	71.6	74.4	68.0	59.9	66.2	56.1	66.9	83.7	53.6
1992	51.7	55.0	49.3	51.2	53.6	49.3	51.5	63.4	43.5	77.6	86.1	70.4	43.1	49.3	38.2	30.6	38.5	22.0
1993	55.0	51.9	56.0	54.8	51.8	55.6	52.4	59.3	48.1	51.8	29.9	66.0	52.8	36.6	65.1	68.0	70.9	64.0
1994	54.7	55.5	53.1	54.3	54.9	52.7	54.2	61.7	48.6	63.6	62.3	64.1	47.7	48.5	46.8	75.6	46.1	96.6
1995	53.9	52.8	54.0	53.1	51.2	53.7	57.3	58.5	56.6	64.6	73.8	58.4	54.3	64.7	47.3	54.2	79.5	35.4
1996	54.8	55.9	53.0	54.4	54.7	53.2	53.8	61.4	48.7	77.9	71.2	78.0	59.7	68.2	52.6	31.1	57.2	12.2
1997	54.9	52.5	55.8	54.1	50.2	56.0	64.6	77.6	55.3	64.3	72.7	58.7	37.2	37.3	37.8	33.9	20.2	45.5
1998	52.2	52.3	51.9	51.8	51.5	52.0	49.8	50.6	48.7	58.8	69.1	50.6	49.5	44.8	52.8	75.7	112.1	49.0
1999	48.5	50.2	46.9	47.6	49.0	46.0	52.5	60.8	47.2	63.8	70.8	56.3	39.7	32.2	44.5	36.7	35.0	37.5
2000	51.7	50.8	51.8	50.8	49.3	51.4	51.2	54.4	48.3	82.4	101.5	71.6	55.3	60.2	51.9	46.1	45.0	47.8
2001	47.7	48.3	46.8	46.2	47.1	45.0	55.4	50.8	57.7	79.6	80.0	76.2	44.3	46.6	42.9	51.1	49.2	52.1
2002	47.0	47.3	46.7	45.9	45.3	46.2	53.9	62.6	47.8	69.6	57.9	72.9	39.4	46.5	34.7	57.6	72.6	46.9
2003	43.9	42.9	43.8	41.7	40.1	42.1	61.9	65.7	59.2	69.0	60.6	73.5	36.4	45.8	29.9	35.9	42.5	31.1
2004	43.6	42.7	43.6	41.4	40.6	41.3	61.3	62.4	60.1	71.5	69.0	69.1	27.5	20.1	31.8	45.1	31.6	64.4
2005	40.6	40.0	40.5	38.8	38.1	38.8	51.0	59.8	44.3	66.0	40.3	94.1	32.3	29.9	33.7	64.6	49.0	78.3
2006	34.8	33.4	35.2	34.1	31.3	35.5	37.3	43.9	32.1	58.2	86.0	41.1	27.0	32.8	23.0	18.4	6.8	25.9
2007	30.6	27.7	32.2	29.7	26.9	31.2	34.9	30.0	37.8	34.1	30.9	36.5	22.0	23.9	20.3	37.7	85.6	40.0
2008	30.3	29.6	30.5	29.2	28.0	29.9	33.6	34.6	32.0	40.0	42.9	38.9	23.5	26.2	21.8	36.2	32.8	38.9
2009	28.9	28.2	29.1	27.5	26.6	27.9	33.8	34.3	32.7	42.8	31.4	54.5	24.7	33.5	20.0	39.2	43.6	35.9
2010	30.7	28.9	31.3	29.4	27.2	30.5	35.1	34.8	34.6	53.5	41.4	58.1	29.8	30.0	29.5	26.0	30.7	21.7
2011	30.6	28.0	32.3	30.4	26.2	30.7	34.9	33.3	35.6	56.5	43.3	64.3	29.7	24.8	33.1	29.1	34.2	26.2
2012	29.9	30.0	29.4	28.1	28.0	27.6	35.5	37.8	33.6	56.0	50.9	57.7	27.1	30.3	24.5	30.9	26.4	33.3
2013	28.2	27.2	28.5	27.1	25.7	27.7	29.7	30.8	28.5	54.4	51.4	54.6	23.4	18.6	25.3	30.7	30.0	31.2
2014	26.2	24.8	26.8	25.3	25.2	26.1	27.4	26.6	27.5	40.8	41.7	39.2	24.5	24.2	24.0	28.7	33.1	25.8
2015	31.1	31.3	30.7	30.1	29.6	30.1	32.4	34.0	30.6	51.8	59.6	45.5	31.6	31.7	31.1	30.4	36.7	27.0
2016	30.7	29.9	30.9	30.0	28.7	30.6	31.5	31.4	31.2	48.1	49.7	45.8	30.1	27.8	30.9	31.1	41.5	24.8
Malignant neoplasms																		
1990	190.4	238.8	156.2	195.1	245.9	160.0	162.6	185.3	143.4	244.2	360.7	155.6	122.1	123.1	121.0	109.3	132.4	86.1
1991	197.7	246.5	163.21	203.72	253.3	169.06	162.37	204.1	132.27	252.6	333.9	187.6	130.9	158.1	109.7	135.18	149.64	128.03
1992	194.0	244.5	157.7	198.8	250.0	161.9	170.7	210.8	142.6	258.2	378.8	168.9	116.1	126.7	108.4	118.6	155.9	86.1
1993	193.2	240.6	159.8	198.0	245.5	164.4	180.9	242.4	140.2	196.3	241.0	160.3	129.8	143.3	120.0	131.4	154.5	113.3
1994	190.9	238.2	157.5	196.9	246.3	161.8	156.3	184.7	137.7	224.1	310.8	164.6	108.5	121.2	98.9	170.5	254.3	109.9
1995	183.2	224.8	153.4	187.2	228.1	157.9	160.9	220.2	120.3	247.1	330.0	187.8	133.5	151.9	119.2	171.1	181.2	165.3
1996	183.6	228.5	151.2	188.8	234.7	155.7	160.6	206.7	129.1	228.5	304.6	175.2	139.8	146.3	135.6	77.0	102.1	59.2
1997	178.8	217.2	150.8	184.5	221.2	157.8	146.4	199.7	108.1	241.9	343.2	175.5	116.0	146.2	92.8	88.5	84.5	93.0
1998	174.5	211.2	147.8	179.2	216.0	152.4	150.8	184.9	124.8	222.4	293.1	183.4	117.0	134.2	104.1	114.0	110.0	115.2
1999	176.7	212.6	150.5	182.2	218.0	155.6	145.9	179.9	122.6	214.4	302.2	156.7	114.1	128.1	104.0	95.5	120.2	79.3
2000	170.4	204.0	145.8	174.8	208.1	150.0	156.9	201.5	126.0	216.1	274.7	178.0	123.0	142.7	107.2	103.4	103.6	103.1
2001	169.2	199.8	147.5	173.1	203.7	151.4	155.6	196.8	126.9	213.0	247.6	195.0	121.7	128.8	115.4	147.0	175.5	127.1
2002	168.6	209.1	139.1	172.4	213.2	142.5	156.3	211.2	118.0	222.7	290.3	176.0	117.6	125.8	112.5	116.5	126.5	108.5
2003	169.4	208.3	141.3	171.2	212.4	141.2	168.5	209.2	140.1	218.5	245.6	200.8	200.7	120.7	112.6	126.7	132.9	132.6
2004	164.7	201.2	138.6	165.4	202.9	138.1	161.6	218.1	123.6	227.7	274.2	200.5	139.3	150.9	131.8	111.0	72.9	165.2
2005	161.8	197.1	136.1	162.4	197.6	136.8	165.9	217.1	130.8	217.9	216.7	219.3	122.2	159.7	97.5	112.7	122.5	104.0
2006	154.7	187.0	131.0	162.8	195.5	138.4	124.7	160.9	98.7	163.5	216.0	127.7	83.1	93.9	79.5	82.0	113.2	64.1
2007	148.0	176.7	125.6	154.6	184.4	131.1	118.6	144.3	99.0	153.4	178.3	135.2	113.9	135.0	100.1	84.2	248.1	81.6
2008	145.5	173.8	123.0	150.4	179.7	127.0	123.8	151.9	101.5	149.2	150.1	146.3	106.7	126.4	93.2	104.4	149.4	74.0
2009	147.2	174.9	125.8	151.1	179.8	128.7	128.4	157.1	105.9	153.1	154.2	113.3	127.5	103.5	108.1	122.0	98.7	122.0
2010	150.5	180.6	127.1	155.6	185.8	131.6	126.2	148.8	110.6	182.6	231.0	144.8	106.4	137.8	86.6	96.2	130.7	74.2
2011	151.3	179.3	129.5	170.3	182.2	132.4	136.3	176.0	107.3	167.1	170.6	169.0	100.8	116.3	90.9	116.6	126.2	110.2
2012	149.8	180.3	125.9	155.6	185.9	131.5	127.2	161.8	102.4	180.1	220.1	147.1	100.8	114.5	90.4	100.5	113.1	94.6
2013	149.6	175.0	129.9	154.3	180.9	133.3	129.8	147.2	117.0	190.4	209.3	176.5	118.2	126.0	114.5	100.1	131.4	81.4
2014	136.3	160.8	116.8	141.8	166.5	121.8	124.9	153.6	103.4	145.0	154.7	140.9	97.1	124.6	77.3	83.2	82.1	83.5
2015	144.0	169.0	123.8	149.8	173.9	129.9	120.4	152.9	96.2	154.7	181.5	135.0	124.4	112.4	104.8	133.4	88.2	122.1
2016	140.7	166.3	120.0	146.7	171.3	126.5	115.9	147.3	92.3	171.6	214.4	138.9	101.2	110.7	94.6	102.6	106.6	98.4
Lung cancer																		
1990	51.7	71.9	36.5	55.1	75.9	39.6	31.5	41.9	22.7	66.2	123.1	19.9	8.7	12.7	5.4	30.5	53.6	8.8
1991	54.5	76.4	37.7	58.7	80.4	42.0	30.2	53.2	14.2	71.3	129.4	25.5	11.3	23.0	1.8	28.5	45.2	16.9
1992	54.5	76.4	37.8	58.5	81.1	41.3	33.6	52.4	19.7	67.0	102.0	36.8	7.1	10.2	4.7	26.3	18.5	32.2
1993	53.4	75.4	36.5	58.0	80.6	40.6	31.5	50.1	17.6	49.4	91.4	14.6	12.6	13.7	11.7	16.9	22.5	13.9
1994	52.2	71.5	37.2	56.3	76.3	40.8	28.9	40.1	20.3	64.9	107.1	34.0	8.8	15.3	3.6	28.5	65.4	0.0
1995	50.8	68.3	37.3	54.1	71.3	40.7	29.3	48.7	15.3	78.3	127.9							

TABLE 2B-3 (continued)
**AGE-ADJUSTED^a MORTALITY RATES FOR SELECTED CAUSES OF DEATH BY RACE/ETHNICITY
AND GENDER, ARIZONA, 1990-2016**

	All groups			White non-Hispanic			Hispanic or Latino			Black or African American			American Indian or Alaska Native			Asian or Pacific Islander		
	T	M	F	T	M	F	T	M	F	T	M	F	T	M	F	T	M	F
----Colorectal cancer																		
1990	19.4	22.1	17.1	19.9	23.3	17.1	17.4	14.7	18.3	24.8	20.1	29.9	1.1	2.4	0.0	6.8	9.3	4.9
1991	19.1	23.0	16.2	19.4	23.5	16.4	20.2	21.2	19.1	18.1	12.7	22.0	9.2	16.4	3.4	13.3	15.6	13.0
1992	17.1	21.6	13.7	17.5	21.8	14.1	16.0	38.7	10.6	27.9	38.7	22.9	6.4	5.5	7.0	7.5	14.9	2.0
1993	18.3	22.4	15.1	18.7	23.0	15.4	16.9	20.7	13.7	23.5	33.9	16.2	5.8	1.5	9.1	14.0	4.0	21.5
1994	18.7	21.7	16.3	19.4	22.4	17.0	16.4	17.3	15.8	18.1	30.9	7.7	8.2	6.7	9.3	14.1	20.0	10.4
1995	18.8	20.7	17.1	19.3	21.4	17.5	13.7	15.5	11.7	26.4	25.1	27.5	13.2	7.8	17.4	15.2	32.4	2.7
1996	19.6	24.6	15.9	19.8	25.0	15.8	19.7	23.7	16.8	36.2	36.9	37.9	11.3	18.5	6.0	0.0	0.0	0.0
1997	18.3	22.0	15.4	18.8	22.4	16.0	14.5	19.8	10.3	27.2	27.1	26.4	6.9	9.1	5.1	20.3	7.5	30.7
1998	20.3	25.7	16.0	20.2	25.6	16.1	20.4	27.0	14.9	41.8	39.8	20.7	10.5	9.8	10.3	16.4	6.4	23.2
1999	19.1	23.5	15.6	19.2	23.7	15.8	17.3	20.3	14.4	31.2	38.1	24.3	6.8	4.3	8.5	3.6	5.0	2.6
2000	17.0	20.5	14.1	17.4	20.7	14.6	16.4	20.5	13.5	16.3	26.3	9.7	8.2	15.1	2.7	6.6	12.9	2.2
2001	16.7	19.0	14.8	16.9	19.0	15.2	16.6	22.1	12.9	27.4	26.2	25.2	7.2	7.8	6.3	10.6	15.3	7.2
2002	16.5	20.6	13.4	16.9	21.0	13.6	16.2	23.4	11.7	26.4	36.4	19.8	9.1	7.9	9.3	9.7	13.9	7.0
2003	17.9	21.8	14.7	17.9	22.0	14.4	21.2	25.5	17.9	26.3	22.3	28.2	6.3	10.2	3.7	3.0	4.8	1.8
2004	15.3	18.9	12.6	15.5	19.2	12.8	13.1	15.8	11.5	27.3	41.2	16.9	9.3	14.1	5.6	11.0	7.7	15.9
2005	15.4	18.9	12.8	15.2	18.8	12.5	17.6	21.5	14.8	27.0	23.7	30.6	7.5	10.0	6.0	12.5	18.7	7.1
2006	14.6	18.1	12.0	15.1	18.9	12.0	14.2	15.8	13.1	14.9	21.1	10.1	4.7	3.5	5.5	6.5	11.4	3.9
2007	14.4	17.7	11.5	15.0	18.1	12.3	12.0	16.5	8.6	15.7	19.3	11.8	8.0	10.6	5.3	9.4	28.7	9.8
2008	13.1	15.1	11.3	13.2	15.0	11.4	13.2	15.5	11.2	16.4	20.3	13.0	11.1	11.9	10.9	8.6	14.9	4.2
2009	12.9	14.9	11.2	12.9	15.1	11.0	13.8	16.7	11.5	14.1	14.0	14.9	8.5	7.4	9.1	13.8	16.4	12.5
2010	13.8	16.6	11.4	13.9	16.0	12.1	13.5	19.0	9.2	21.9	28.9	16.0	12.4	19.9	8.0	10.3	22.2	2.6
2011	13.4	15.4	11.6	14.4	15.3	11.4	13.6	16.5	11.2	20.2	12.6	25.6	9.9	12.0	7.4	14.3	16.2	12.7
2012	13.1	15.8	10.7	13.4	16.0	11.2	12.2	17.0	8.3	20.5	23.9	17.4	7.1	7.8	6.3	9.8	8.0	11.4
2013	13.6	15.3	12.3	13.7	15.5	12.2	12.5	14.3	10.9	21.7	19.6	23.0	11.3	7.3	14.0	12.1	13.0	11.7
2014	12.4	14.6	10.5	13.2	15.0	11.5	10.8	15.1	7.4	15.8	18.4	14.3	7.0	9.5	4.7	7.2	8.3	6.3
2015	12.9	15.6	10.5	12.9	15.1	10.9	11.8	16.6	8.0	19.5	25.1	15.0	13.3	18.8	9.6	9.4	17.1	4.9
2016	12.9	15.4	10.6	13.2	15.6	11.2	11.1	14.7	7.8	17.4	17.9	16.1	8.0	7.7	8.3	13.1	10.6	13.8
----Female breast cancer																		
1990	NA	NA	29.5	NA	NA	31.3	NA	NA	27.5	NA	NA	16.3	NA	NA	3.2	NA	NA	0.0
1991	NA	NA	28.3	NA	NA	30.3	NA	NA	14.5	NA	NA	25.7	NA	NA	15.5	NA	NA	24.6
1992	NA	NA	28.0	NA	NA	30.3	NA	NA	16.6	NA	NA	22.9	NA	NA	8.8	NA	NA	3.9
1993	NA	NA	29.2	NA	NA	30.6	NA	NA	19.3	NA	NA	42.7	NA	NA	16.6	NA	NA	8.7
1994	NA	NA	28.6	NA	NA	29.2	NA	NA	23.1	NA	NA	41.3	NA	NA	9.2	NA	NA	25.5
1995	NA	NA	23.7	NA	NA	24.5	NA	NA	16.7	NA	NA	31.2	NA	NA	9.9	NA	NA	49.0
1996	NA	NA	24.1	NA	NA	24.8	NA	NA	19.9	NA	NA	39.0	NA	NA	18.2	NA	NA	4.8
1997	NA	NA	26.5	NA	NA	27.8	NA	NA	22.3	NA	NA	38.4	NA	NA	9.6	NA	NA	2.1
1998	NA	NA	24.8	NA	NA	26.3	NA	NA	20.1	NA	NA	28.9	NA	NA	7.7	NA	NA	7.0
1999	NA	NA	24.4	NA	NA	25.9	NA	NA	15.7	NA	NA	32.8	NA	NA	9.9	NA	NA	13.5
2000	NA	NA	25.4	NA	NA	26.2	NA	NA	20.7	NA	NA	29.5	NA	NA	12.1	NA	NA	12.8
2001	NA	NA	23.6	NA	NA	24.7	NA	NA	17.5	NA	NA	55.8	NA	NA	11.7	NA	NA	12.7
2002	NA	NA	22.2	NA	NA	22.5	NA	NA	18.7	NA	NA	42.3	NA	NA	9.6	NA	NA	17.7
2003	NA	NA	22.1	NA	NA	22.3	NA	NA	18.9	NA	NA	41.2	NA	NA	16.4	NA	NA	19.6
2004	NA	NA	21.4	NA	NA	21.4	NA	NA	18.0	NA	NA	32.2	NA	NA	18.4	NA	NA	35.2
2005	NA	NA	20.7	NA	NA	20.5	NA	NA	19.8	NA	NA	35.7	NA	NA	14.9	NA	NA	17.3
2006	NA	NA	21.6	NA	NA	23.2	NA	NA	14.0	NA	NA	25.7	NA	NA	6.9	NA	NA	7.5
2007	NA	NA	20.1	NA	NA	20.5	NA	NA	16.9	NA	NA	23.9	NA	NA	16.2	NA	NA	11.3
2008	NA	NA	19.8	NA	NA	20.6	NA	NA	15.1	NA	NA	38.0	NA	NA	11.6	NA	NA	7.1
2009	NA	NA	19.2	NA	NA	19.8	NA	NA	16.4	NA	NA	30.7	NA	NA	11.6	NA	NA	5.9
2010	NA	NA	19.2	NA	NA	19.9	NA	NA	18.5	NA	NA	25.8	NA	NA	8.2	NA	NA	12.9
2011	NA	NA	19.7	NA	NA	20.8	NA	NA	12.2	NA	NA	24.1	NA	NA	7.5	NA	NA	15.6
2012	NA	NA	19.2	NA	NA	20.0	NA	NA	14.8	NA	NA	30.3	NA	NA	8.6	NA	NA	15.3
2013	NA	NA	20.7	NA	NA	21.3	NA	NA	19.7	NA	NA	23.3	NA	NA	13.1	NA	NA	11.4
2014	NA	NA	17.9	NA	NA	18.5	NA	NA	16.5	NA	NA	29.4	NA	NA	9.2	NA	NA	6.3
2015	NA	NA	19.2	NA	NA	20.7	NA	NA	12.9	NA	NA	23.1	NA	NA	12.8	NA	NA	13.3
2016	NA	NA	19.4	NA	NA	20.8	NA	NA	13.9	NA	NA	23.0	NA	NA	11.8	NA	NA	13.4
----Prostate cancer																		
1990	NA	34.0	NA	NA	34.1	NA	NA	28.3	NA	NA	94.9	NA	NA	20.4	NA	NA	13.9	NA
1991	NA	36.1	NA	NA	36.9	NA	NA	24.8	NA	NA	77.0	NA	NA	21.3	NA	NA	27.7	NA
1992	NA	33.0	NA	NA	32.7	NA	NA	32.5	NA	NA	89.0	NA	NA	20.2	NA	NA	12.7	NA
1993	NA	34.2	NA	NA	34.0	NA	NA	40.9	NA	NA	29.1	NA	NA	27.6	NA	NA	29.0	NA
1994	NA	32.4	NA	NA	32.9	NA	NA	29.3	NA	NA	45.0	NA	NA	14.9	NA	NA	17.2	NA
1995	NA	34.8	NA	NA	34.4	NA	NA	39.9	NA	NA	58.6	NA	NA	26.8	NA	NA	25.2	NA
1996	NA	31.0	NA	NA	31.4	NA	NA	30.7	NA	NA	57.8	NA	NA	10.3	NA	NA	22.9	NA
1997	NA	29.7	NA	NA	30.0	NA	NA	24.8	NA	NA	76.9	NA	NA	11.0	NA	NA	19.2	NA
1998	NA	26.5	NA	NA	25.4	NA	NA	28.9	NA	NA	82.6	NA	NA	20.4	NA	NA	20.2	NA
1999	NA	23.7	NA	NA	23.8	NA	NA	23.0	NA	NA	46.9	NA	NA	11.3	NA	NA	16.6	NA
2000	NA	28.4	NA															

TABLE 2B-3 (continued)
**AGE-ADJUSTED^a MORTALITY RATES FOR SELECTED CAUSES OF DEATH BY RACE/ETHNICITY
AND GENDER, ARIZONA, 1990-2016**

	All groups			White non-Hispanic			Hispanic or Latino			Black or African American			American Indian or Alaska Native			Asian or Pacific Islander		
	T	M	F	T	M	F	T	M	F	T	M	F	T	M	F	T	M	F
Chronic lower respiratory diseases^b																		
1990	44.4	58.2	35.0	47.7	62.5	37.9	19.9	26.7	15.3	29.7	48.6	15.6	16.4	18.9	14.6	32.6	27.9	32.6
1991	46.4	63.6	35.0	49.4	67.2	37.8	25.6	38.8	16.4	55.1	89.9	27.9	18.3	16.9	19.2	9.1	19.9	0.0
1992	43.9	57.6	34.6	47.3	61.8	37.4	19.0	29.0	12.9	34.6	61.5	15.3	13.6	8.2	17.7	19.6	25.2	15.5
1993	48.5	63.4	38.0	51.3	66.4	40.8	28.4	43.3	17.7	44.9	75.3	21.9	21.4	25.2	18.8	30.3	29.4	31.4
1994	44.6	58.6	35.7	47.5	61.6	38.6	24.0	36.6	16.2	44.1	76.1	24.1	18.4	22.9	14.9	12.7	28.6	0.0
1995	46.9	57.2	39.7	49.4	59.6	42.2	29.6	42.4	20.4	39.6	72.4	20.4	22.9	21.1	24.5	25.7	55.4	2.7
1996	47.1	56.4	40.9	50.9	60.0	44.9	23.2	31.7	17.5	26.3	38.9	15.3	17.3	24.7	11.7	11.6	22.3	3.1
1997	50.1	61.5	42.2	53.9	65.4	46.1	23.2	40.4	12.2	41.8	40.3	42.2	16.7	24.3	10.6	25.7	27.6	24.0
1998	49.2	60.5	41.8	52.6	63.7	45.4	28.1	36.4	22.3	39.7	60.3	26.0	15.2	27.0	6.0	23.0	24.7	21.6
1999	50.1	59.8	43.8	53.6	63.0	47.6	23.1	33.5	16.4	44.9	76.8	26.4	19.2	15.2	22.1	15.5	23.4	9.7
2000	47.4	56.2	41.3	51.1	59.8	44.8	24.4	38.2	15.9	30.4	38.4	26.3	21.9	28.9	17.9	12.7	7.8	16.5
2001	46.9	53.9	42.2	51.0	58.1	46.2	17.7	25.4	12.5	37.9	48.9	32.2	26.8	30.0	24.3	21.4	19.2	23.0
2002	47.0	57.1	40.3	50.4	59.4	44.5	25.2	46.6	11.2	38.3	59.0	21.9	22.3	30.1	17.0	24.5	45.8	9.0
2003	45.4	53.8	40.0	48.3	56.5	42.9	28.7	39.9	22.1	30.3	39.7	23.1	19.4	20.8	18.4	15.5	34.4	2.1
2004	41.9	48.1	37.7	45.1	51.3	41.0	22.7	29.5	17.8	24.9	38.8	14.8	10.8	4.7	15.1	21.6	27.1	14.2
2005	46.8	51.3	43.5	49.6	53.6	46.7	31.6	42.7	24.0	43.9	49.4	37.9	12.0	12.9	11.4	17.9	22.6	13.8
2006	44.3	50.2	40.1	49.2	55.5	44.7	18.3	20.9	16.2	27.3	28.8	25.6	8.4	6.2	10.4	9.9	26.2	0.0
2007	39.2	43.5	36.0	43.7	47.9	40.7	18.8	26.4	13.4	18.7	10.1	26.7	13.0	20.1	8.4	7.5	19.9	6.1
2008	42.2	46.6	39.0	46.9	51.0	43.8	20.5	24.3	18.0	26.0	33.9	19.1	15.8	23.9	9.5	13.7	22.4	8.5
2009	40.5	44.7	37.1	45.0	48.7	42.1	16.4	20.2	13.4	26.8	34.1	20.8	19.2	29.5	12.3	18.0	33.4	8.1
2010	42.6	48.1	38.6	47.1	52.2	43.4	18.6	25.4	14.3	27.4	32.2	23.8	21.7	24.1	20.0	12.0	29.5	1.7
2011	45.9	49.7	42.8	55.3	53.3	48.5	19.5	26.5	14.7	34.8	48.5	24.7	14.4	14.7	14.4	17.2	26.4	11.9
2012	44.2	50.5	39.5	49.4	55.5	44.8	20.3	27.1	16.1	35.0	43.4	30.9	18.0	27.4	12.1	14.7	14.3	14.2
2013	44.5	48.1	41.8	49.3	52.5	47.0	20.9	24.6	18.2	46.7	56.4	37.5	15.5	11.7	18.4	19.4	32.0	12.4
2014	41.1	45.8	37.5	45.9	49.7	43.0	21.1	28.7	15.9	34.0	47.4	26.1	12.4	13.7	11.7	17.3	33.8	7.6
2015	45.1	48.9	41.7	50.8	53.7	48.0	21.5	27.9	16.8	34.0	51.8	20.6	14.8	16.5	13.0	18.1	17.5	18.4
2016	45.0	47.6	42.9	50.9	52.7	49.4	20.0	23.2	17.7	43.8	51.5	39.2	19.5	27.2	15.1	11.3	19.4	5.9
Chronic liver disease and cirrhosis																		
1990	12.4	17.3	8.3	10.3	14.1	7.1	15.4	23.2	8.4	17.4	25.3	9.0	48.6	60.2	38.1	10.8	16.4	7.1
1991	13.6	18.3	9.4	10.6	14.3	7.3	18.4	27.1	10.1	10.0	15.5	3.7	64.0	74.5	55.3	0.0	0.0	0.0
1992	12.2	16.5	8.5	9.8	13.2	7.1	15.2	22.7	7.9	13.0	17.3	7.7	52.5	61.2	44.7	12.7	23.4	3.6
1993	13.5	18.5	9.0	10.8	14.6	7.4	22.1	34.4	10.7	11.0	13.7	6.2	48.0	54.6	41.4	0.0	0.0	0.0
1994	13.9	19.1	9.0	11.1	15.0	7.6	21.3	33.4	10.2	5.8	10.4	1.1	50.3	60.5	40.8	5.8	6.8	5.1
1995	13.5	18.1	9.3	10.5	14.2	7.1	21.0	29.9	12.8	17.1	23.2	10.5	54.9	63.0	47.4	10.4	2.4	16.4
1996	12.4	16.3	8.9	10.3	14.5	6.4	18.0	20.2	15.3	9.7	13.2	6.9	46.7	44.4	47.7	1.9	4.7	0.0
1997	13.4	18.6	8.7	11.2	16.0	6.8	20.4	29.8	12.2	9.8	9.6	10.3	46.3	54.9	39.1	2.8	0.0	4.7
1998	12.4	17.7	7.6	10.2	14.4	6.5	16.5	25.9	8.0	7.9	7.7	7.4	53.5	75.4	34.5	2.6	6.3	0.0
1999	12.0	16.8	7.5	9.7	13.9	6.0	21.7	31.3	13.0	7.5	12.7	1.8	38.5	46.2	31.7	3.8	5.6	2.5
2000	12.8	17.7	8.3	10.4	14.9	6.4	15.8	20.5	11.0	6.6	7.1	5.9	61.7	80.2	45.3	4.1	6.9	2.2
2001	12.3	17.7	7.5	10.6	15.0	6.6	17.4	27.0	8.7	11.7	24.1	2.0	39.1	51.1	28.4	4.0	3.8	4.2
2002	12.1	15.6	8.9	9.9	11.9	8.0	21.6	31.9	12.3	9.8	14.6	5.5	40.5	55.6	27.5	5.3	2.9	7.0
2003	11.5	16.2	7.1	9.7	13.8	5.8	17.6	25.1	10.6	3.5	6.3	1.0	38.8	49.6	29.8	3.3	0.0	5.8
2004	11.1	15.6	6.9	8.4	11.7	5.4	18.6	26.6	10.6	6.7	7.3	6.5	51.0	68.9	36.1	3.8	7.0	2.4
2005	12.7	17.7	8.1	10.7	15.1	6.6	19.4	28.6	11.4	12.8	14.7	10.7	51.2	60.3	42.8	4.9	10.4	0.0
2006	11.4	14.3	8.5	9.6	11.8	7.6	15.5	19.9	11.1	7.2	11.6	4.2	43.6	54.3	32.7	3.1	3.8	2.5
2007	11.3	15.4	7.6	9.6	13.0	6.6	16.3	23.5	9.4	5.9	9.9	2.3	36.8	46.9	28.3	3.2	5.5	4.2
2008	11.7	15.3	8.4	10.0	13.2	7.1	15.4	19.9	11.2	7.5	9.2	5.6	40.7	52.8	30.5	1.8	2.6	1.1
2009	12.2	15.4	9.1	9.5	12.8	6.4	18.7	21.4	15.7	3.1	3.4	2.7	54.0	57.9	49.9	3.1	6.4	1.1
2010	12.3	16.1	8.8	9.7	13.6	6.1	15.5	20.9	10.3	8.0	9.5	7.0	64.6	63.9	64.9	0.5	1.2	0.0
2011	13.4	18.0	9.2	12.0	14.7	8.1	18.9	29.2	9.8	6.6	5.5	7.6	43.6	46.7	40.4	4.2	9.0	0.9
2012	13.6	18.7	9.0	11.4	15.9	7.2	16.9	25.7	9.2	10.9	14.8	8.5	59.2	63.3	55.5	2.6	6.1	0.0
2013	14.5	18.2	11.1	12.6	15.5	10.0	16.7	23.0	10.8	6.8	9.9	3.9	36.0	70.1	55.0	3.9	4.3	3.4
2014	13.2	16.5	10.1	10.9	14.1	7.9	18.0	22.4	13.6	8.3	10.7	5.5	52.7	48.0	55.5	3.8	4.0	3.6
2015	14.9	19.2	11.0	13.1	16.1	10.3	14.0	22.0	7.0	8.4	12.3	4.6	77.6	91.8	66.1	4.0	8.3	0.8
2016	15.1	19.8	10.8	12.5	16.0	9.2	16.8	24.2	10.3	7.7	12.7	2.9	85.9	107.3	67.2	2.0	5.2	0.0
Diabetes																		
1990	15.6	16.9	14.2	12.0	13.2	10.8	31.5	32.2	30.0	26.0	20.2	29.0	77.4	86.1	70.2	5.5	7.2	4.4
1991	16.4	18.8	14.7	13.5	16.4	11.3	31.3	32.1	30.5	37.0	27.3	44.4	60.4	55.3	64.5	20.8	48.1	13.9
1992	17.6	18.9	16.4	13.4	14.7	12.3	41.5	46.4	37.6	34.5	26.4	41.3	74.1	77.2	71.6	2.2	5.8	0.0
1993	16.6	16.5	16.5</td															

TABLE 2B-3 (continued)
**AGE-ADJUSTED^a MORTALITY RATES FOR SELECTED CAUSES OF DEATH BY RACE/ETHNICITY
AND GENDER, ARIZONA, 1990-2016**

	All groups			White non-Hispanic			Hispanic or Latino			Black or African American			American Indian or Alaska Native			Asian or Pacific Islander			
	T	M	F	T	M	F	T	M	F	T	M	F	T	M	F	T	M	F	
Accidents (unintentional injuries)																			
1990	42.6	61.4	24.5	37.7	53.4	22.4	39.4	60.8	19.2	48.1	65.4	34.4	139.4	225.5	62.4	29.6	43.0	16.6	
1991	38.5	53.5	24.3	32.5	44.2	21.3	48.4	69.6	29.3	36.1	53.4	20.2	123.3	204.1	52.9	19.1	22.1	16.4	
1992	40.6	59.7	23.1	34.6	49.7	20.9	40.9	63.9	19.3	37.6	59.9	14.0	146.3	229.5	71.8	37.9	32.2	42.8	
1993	42.6	61.8	24.4	36.5	52.0	21.9	46.8	75.7	20.5	41.3	52.9	29.3	143.4	234.9	64.9	26.4	7.7	40.3	
1994	44.9	64.6	26.2	39.8	55.4	25.1	46.7	70.5	23.0	46.4	73.5	19.8	131.5	200.2	69.5	30.6	33.4	29.1	
1995	45.1	64.4	26.2	41.3	56.8	26.2	44.1	66.0	22.7	52.9	80.9	28.4	113.2	181.8	50.2	20.6	32.3	10.5	
1996	46.1	66.4	26.8	39.4	56.8	23.1	45.8	69.4	22.9	44.0	61.6	27.2	150.5	219.6	88.9	24.5	16.1	31.6	
1997	44.9	63.8	26.5	39.9	56.5	24.0	43.7	64.8	23.7	50.3	63.5	36.9	146.4	219.1	80.1	14.9	14.8	13.6	
1998	45.2	62.8	27.7	40.6	56.2	25.3	42.5	62.0	22.8	48.1	74.1	25.8	126.8	171.5	85.5	23.3	35.8	13.0	
1999	44.4	62.5	27.0	38.0	52.8	23.9	46.8	68.6	24.9	39.7	52.6	24.5	127.0	181.0	77.7	27.2	42.2	15.3	
2000	41.1	58.0	24.9	36.9	51.5	23.3	41.6	60.8	22.5	49.7	75.8	22.7	113.1	165.2	67.4	24.1	24.4	21.4	
2001	46.6	66.5	27.7	42.5	59.5	26.8	45.6	63.9	25.9	52.6	83.2	22.4	112.7	177.5	53.9	29.9	41.3	46.6	
2002	45.2	62.8	28.8	41.5	56.8	27.8	45.5	64.6	26.2	44.0	58.5	28.5	111.0	168.4	60.4	15.5	13.8	15.6	
2003	44.8	61.6	28.8	40.9	55.2	27.6	44.7	63.3	26.3	52.4	69.8	35.0	108.6	153.5	66.3	25.3	35.2	17.8	
2004	46.0	61.1	31.7	43.3	56.8	30.7	48.9	66.1	31.8	45.9	66.9	26.0	103.9	137.5	73.7	21.2	21.7	30.0	
2005	51.1	68.7	34.4	46.2	62.4	31.4	54.8	71.5	37.2	64.3	80.3	46.9	117.8	174.1	67.4	34.2	41.2	28.1	
2006	51.2	68.5	34.3	48.7	64.5	33.5	52.4	72.9	32.2	54.8	73.0	34.5	97.2	139.8	58.6	19.8	20.0	20.8	
2007	46.6	60.6	32.3	44.9	57.7	32.2	40.6	53.5	27.5	48.1	62.8	29.6	95.0	143.9	50.3	20.3	72.6	20.3	
2008	44.7	59.0	30.6	45.4	59.8	31.4	34.2	46.9	22.0	43.1	50.6	33.8	92.6	142.6	47.9	23.7	31.1	17.9	
2009	43.1	56.6	29.8	43.3	56.6	30.4	35.3	48.2	23.3	36.5	42.1	30.0	92.6	144.4	46.4	24.5	27.6	21.1	
2010	43.8	56.6	31.6	45.5	58.0	33.3	33.7	45.3	22.8	36.0	42.3	30.7	99.2	148.9	55.4	24.6	24.9	23.9	
2011	45.5	58.3	32.6	46.9	57.3	33.9	38.9	51.9	26.4	41.6	50.3	34.4	100.6	146.7	58.0	19.7	28.4	14.0	
2012	42.4	54.0	31.0	43.3	54.0	32.7	33.9	45.4	22.8	38.2	50.3	25.2	94.8	136.9	56.5	21.0	20.0	20.3	
2013	46.3	60.1	32.8	47.9	61.2	34.7	38.5	51.4	26.3	43.3	68.7	23.5	104.5	150.5	62.9	13.4	12.7	13.2	
2014	43.3	56.7	30.1	43.7	57.7	29.9	35.9	47.3	24.9	37.6	44.1	32.2	85.4	128.2	47.4	18.3	15.5	19.3	
2015	48.1	62.7	34.1	49.3	62.4	36.7	36.7	48.4	24.9	50.5	59.5	40.6	139.0	203.9	82.7	21.7	23.7	20.2	
2016	53.7	73.1	34.9	55.2	73.8	36.9	41.6	58.2	25.9	52.2	66.0	35.8	139.1	219.5	67.9	25.9	33.4	20.1	
Motor vehicle accidents																			
1990	23.6	33.1	14.3	20.1	27.9	12.6	21.1	31.7	10.9	27.4	34.7	20.9	82.2	130.6	38.8	18.2	26.3	11.7	
1991	20.6	27.8	13.4	16.2	22.3	10.1	27.9	36.2	20.2	9.4	13.9	4.0	73.8	112.7	38.5	6.1	0.0	10.8	
1992	20.3	29.1	12.2	16.8	24.4	10.0	21.9	31.4	12.9	16.0	26.0	5.5	74.9	104.8	47.3	21.3	9.3	31.2	
1993	20.1	27.8	12.6	15.8	21.7	10.1	22.3	35.2	10.0	15.0	19.2	9.2	80.4	115.8	49.3	15.8	5.8	22.7	
1994	21.1	30.0	12.5	18.1	25.0	11.7	21.4	31.3	11.1	15.4	25.7	5.2	69.4	102.8	39.0	10.1	17.7	4.4	
1995	23.1	32.0	14.4	19.9	25.8	14.2	21.8	30.5	12.4	28.1	41.1	16.5	69.0	114.1	27.7	15.4	23.1	8.2	
1996	22.9	32.1	13.9	17.8	25.3	10.7	23.3	34.1	12.7	13.2	14.5	10.2	94.1	129.3	61.6	16.3	14.8	17.9	
1997	20.5	28.2	12.7	16.9	23.6	10.3	20.9	29.0	12.9	23.9	36.7	13.7	79.4	109.8	50.6	7.9	8.3	6.7	
1998	20.4	27.3	13.6	16.9	23.1	10.9	19.0	25.8	12.1	23.0	30.6	16.4	75.9	93.3	58.8	14.6	26.3	5.6	
1999	19.6	27.5	11.8	14.6	20.4	9.2	24.4	34.9	13.8	16.3	23.8	8.2	68.4	100.4	39.1	15.3	20.7	11.1	
2000	17.5	24.4	10.6	13.8	18.5	9.2	18.2	28.5	7.5	19.3	33.1	6.8	74.2	106.4	46.3	15.3	11.6	12.8	
2001	17.2	24.2	10.1	13.5	18.5	8.5	18.2	26.3	9.4	19.1	28.8	7.2	63.2	88.8	38.3	8.6	7.7	9.9	
2002	18.5	25.5	11.6	14.7	20.3	9.3	21.1	27.4	14.0	11.9	15.9	7.5	65.9	100.2	35.3	10.1	8.2	11.1	
2003	18.0	24.9	11.2	14.6	20.3	9.0	21.3	29.1	13.6	15.2	23.3	8.1	59.0	78.0	40.4	11.8	14.1	9.9	
2004	18.1	23.9	12.5	15.3	20.3	10.6	23.2	30.0	16.0	14.8	18.2	10.8	54.1	63.9	44.1	11.3	13.7	13.9	
2005	18.9	27.0	11.1	15.0	21.9	8.4	22.7	33.1	12.6	24.9	31.4	17.8	62.6	91.3	36.4	10.2	14.5	6.3	
2006	19.6	26.8	12.4	16.6	22.8	10.7	21.9	29.9	13.3	15.3	22.9	7.7	56.9	76.5	38.5	5.9	5.3	6.1	
2007	16.2	22.2	10.1	13.1	18.3	8.0	17.6	22.6	12.2	13.6	18.2	7.6	49.0	72.8	27.2	9.9	37.6	10.6	
2008	13.6	19.5	7.9	12.0	17.7	6.5	13.1	18.5	7.7	11.5	16.8	5.6	41.9	55.0	29.3	4.4	6.9	2.0	
2009	11.6	16.8	6.5	10.1	15.2	5.1	10.6	14.4	6.7	12.4	14.2	10.3	36.9	51.0	23.3	6.5	11.2	3.0	
2010	11.1	15.9	6.4	9.2	13.6	4.8	11.1	15.6	6.9	10.8	14.2	7.2	41.7	60.2	24.0	5.5	4.3	6.3	
2011	12.1	17.6	6.9	10.4	14.5	5.6	11.7	17.6	6.2	11.7	16.6	7.5	44.2	66.8	23.7	6.8	6.3	7.3	
2012	11.4	16.8	6.3	10.0	14.8	5.3	10.6	16.3	5.4	10.1	15.2	5.1	37.8	53.1	22.8	4.9	5.4	4.5	
2013	11.4	16.3	6.6	10.2	15.1	5.3	11.4	15.5	7.3	7.3	12.0	8.1	41.8	31.7	40.3	23.5	5.8	8.6	3.8
2014	10.3	14.5	6.0	8.3	12.5	4.1	10.3	14.2	6.5	7.9	11.1	4.4	35.6	49.2	23.1	2.5	2.8	2.2	
2015	12.6	18.0	7.2	10.7	15.5	5.9	9.9	15.2	4.8	14.1	19.1	8.2	54.3	74.1	36.5	8.2	7.9	8.3	
2016	13.9	20.1	7.8	11.5	17.3	5.9	13.3	19.9	7.2	19.1	22.6	14.7	52.2	77.6	29.5	7.2	9.0	6.2	
Assault (homicide)																			
1990	8.1	12.2	4.0	5.7	7.8	3.6	10.4	18.6	2.2	31.3	48.1	12.1	17.7	27.8	8.7	4.8	4.1	6.0	
1991	8.6	12.7	4.5	5.4	7.5	3.2	13.0	20.0	5.8	22.3	38.3	4.3	24.2	34.7	14.3	24.8	32.9	19.1	
1992	8.8	13.2	4.2	5.7	7.2	4.1	13.9	23.7	3.5	22.5	33.7	9.4	15.6	26.8	4.5	5.9	10.7	2.5	
1993	9.2	13.5	4.9	5.9	7.7	4.1	15.1	24.8	5.3	30.8	50.4	10.6	1						

TABLE 2B-3 (continued)
**AGE-ADJUSTED^a MORTALITY RATES FOR SELECTED CAUSES OF DEATH BY RACE/ETHNICITY
AND GENDER, ARIZONA, 1990-2016**

	All groups			White non-Hispanic			Hispanic or Latino			Black or African American			American Indian or Alaska Native			Asian or Pacific Islander		
	T	M	F	T	M	F	T	M	F	T	M	F	T	M	F	T	M	F
Intentional self-harm (suicide)																		
1990	19.0	32.6	6.5	20.9	36.1	7.2	9.4	16.6	2.8	12.5	17.2	7.7	20.1	39.1	2.6	7.9	4.6	10.1
1991	18.0	30.8	6.4	19.1	32.8	6.7	12.1	20.3	4.6	17.8	23.6	12.3	18.9	35.1	4.0	2.5	5.5	0.0
1992	17.3	29.0	6.5	18.8	31.1	7.5	10.4	19.2	2.6	10.3	17.8	2.4	19.6	34.7	5.6	4.8	10.5	0.0
1993	18.9	32.2	6.9	21.2	35.7	8.2	8.8	14.9	2.4	8.0	12.4	3.0	21.7	39.1	5.5	5.2	7.7	3.2
1994	19.4	32.2	7.4	21.2	34.9	8.3	11.1	19.6	2.2	8.7	13.9	2.9	20.8	33.0	8.8	16.7	18.9	15.4
1995	19.5	31.1	8.6	22.2	35.1	10.2	9.7	15.8	3.4	14.4	24.6	5.8	16.3	30.0	3.5	4.1	5.0	4.0
1996	16.9	28.4	6.2	19.1	31.8	7.5	9.0	16.2	1.8	7.3	11.7	2.2	15.9	25.6	6.8	4.7	9.9	0.0
1997	17.2	28.7	6.3	19.4	31.8	7.7	8.8	16.3	1.3	12.3	21.5	3.5	18.7	30.5	7.4	11.0	18.2	5.7
1998	17.5	28.7	7.1	20.1	32.2	8.9	9.5	18.4	0.8	6.5	8.7	3.9	16.1	28.1	5.0	6.8	9.1	3.9
1999	15.7	25.5	6.5	16.7	27.1	7.0	10.5	17.8	3.7	12.8	26.1	0.0	16.6	27.6	6.4	6.4	10.3	3.4
2000	14.6	24.7	5.2	16.7	27.6	6.8	7.2	12.7	1.4	6.5	12.2	0.0	16.2	29.7	3.7	5.7	12.3	0.0
2001	14.9	24.6	5.6	12.8	21.0	5.1	5.9	9.9	1.6	9.2	15.2	2.4	15.4	26.4	5.2	9.4	15.4	4.7
2002	15.9	26.4	6.0	18.3	30.0	7.4	8.3	14.2	2.5	6.2	11.4	0.0	17.9	31.7	4.9	4.1	9.1	0.0
2003	14.6	24.0	5.8	16.4	27.1	6.4	8.2	11.8	4.2	11.3	16.6	4.8	15.2	27.4	3.6	6.0	7.0	5.9
2004	14.9	24.1	6.3	16.6	26.4	7.5	9.8	17.5	2.2	12.1	17.3	5.1	17.0	28.5	6.5	4.0	7.0	2.7
2005	15.4	24.9	6.5	16.6	26.7	7.3	10.5	17.8	3.0	3.3	4.7	1.8	17.5	28.7	6.8	11.7	8.9	14.1
2006	15.4	24.7	6.6	17.8	27.9	8.5	8.2	14.2	2.0	8.3	13.9	2.3	13.7	23.4	4.5	8.4	13.2	4.3
2007	15.4	24.4	6.7	18.7	29.4	8.3	9.2	14.7	3.6	6.2	10.1	1.7	9.8	16.3	3.6	6.1	9.2	2.4
2008	14.8	23.0	7.0	17.6	27.3	8.5	6.5	10.8	1.9	7.5	10.3	4.2	13.5	21.2	5.9	9.9	10.7	8.8
2009	16.1	24.6	8.1	18.4	28.0	9.5	9.0	14.0	3.9	10.5	12.7	7.7	15.9	22.9	9.3	9.9	19.9	2.3
2010	16.7	27.1	6.7	20.6	32.8	8.7	7.4	12.5	2.6	6.4	9.9	2.2	18.7	32.3	5.7	6.8	11.0	3.2
2011	17.2	27.4	7.5	22.0	33.1	10.1	8.1	14.8	1.8	9.1	13.7	4.3	14.9	24.0	5.8	5.3	6.9	3.5
2012	16.2	25.9	7.0	20.2	32.2	8.7	6.8	11.1	2.9	10.0	15.5	4.0	17.9	27.9	8.1	5.7	10.2	1.8
2013	17.0	26.6	7.7	20.8	32.4	9.6	8.4	12.8	4.2	6.7	9.7	3.1	21.9	36.1	8.1	7.0	14.5	1.1
2014	16.5	25.6	7.7	21.0	31.9	10.4	8.3	13.4	3.4	9.0	13.6	4.2	13.9	24.3	3.7	7.0	12.0	2.7
2015	17.8	27.5	8.4	23.6	36.4	11.1	6.7	10.4	3.2	6.6	9.2	3.7	19.0	28.4	10.0	7.0	9.9	4.5
2016	17.7	28.0	7.9	21.7	33.6	10.2	8.8	15.0	2.9	9.0	13.1	5.2	24.2	36.7	11.9	9.3	14.0	4.7

Notes: ^a Adjusted to the 2000 standard U.S. population; ^b Chronic obstructive pulmonary diseases in 1980 and 1990; beginning in 2000, when the new standard for the age-adjustment of mortality rates was implemented, all previously published rates for 1979-1999 became obsolete. With the 2008 edition of this report we have added the recomputed age-adjusted mortality rates for 1991-1999. In order to compute these rates, we have used the population denominators consistent with both the 1990 and 2000 census. The mortality rates for 1989-1999 in Table 2B-2 also were revised for consistency; The denominators are available at:

<http://pub.azdhs.gov/health-stats/>

TABLE 2B-4
NUMBER OF DEATHS AND AGE-ADJUSTED MORTALITY RATES^a FOR SELECTED CAUSES OF DEATH BY RACE/ETHNICITY AND GENDER, ARIZONA, 2016

	NUMBER OF DEATHS																		
	All groups						White non-Hispanic			Hispanic or Latino			Black or African American			American Indian or Alaska Native			Asian or Pacific Islander
	T	M	F	T	M	F	T	M	F	T	M	F	T	M	F	T	M	F	
Total, all causes^b	56,480	30,431	26,046	44,095	23,439	20,653	7,343	4,154	3,189	1,925	1,108	817	2,346	1,365	981	769	364	405	
Major cardiovascular diseases	15,822	8,559	7,263	12,882	6,967	5,915	1,797	978	819	561	317	244	389	210	179	193	87	106	
Diseases of heart	11,820	6,702	5,118	9,765	5,527	4,238	1,250	716	534	394	233	161	286	167	119	125	59	66	
Coronary heart disease	8,848	5,257	3,591	7,325	4,351	2,974	936	567	369	294	176	118	202	117	85	91	46	45	
Malignant neoplasms	11,801	6,429	5,372	9,592	5,234	4,358	1,406	787	619	380	216	164	222	105	117	201	87	114	
Malignant neoplasm of trachea, bronchus and lung	2,690†	1,452	1,240†	2,358	1,267	1,091	200	116	84	78	42	36	20†	10	*	38	17	21	
Malignant neoplasm of colon, rectum, and anus	1,069	591	478	852	467	385	138	88	50	38	20	18	19	8	11	22	8	14	
Malignant neoplasm of breast	850†	10†	844	690	8	682	100†	*	101	28	0	28	15	0	15	18	0	18	
Malignant neoplasm of prostate	NA	700†	NA	NA	569	NA	NA	79	NA	NA	32	NA	NA	12	NA	*	NA	*	
Malignant melanoma of skin	190†	130†	60†	174	121	53	10†	8	*	0†	0	*	0†	*	*	0	0	0	
Malignant neoplasm of cervix uteri	NA	NA	80†	NA	NA	NA	NA	49	NA	NA	26	NA	NA	*	NA	*	NA	0	
Accidents (unintentional injury)	3,899	2,527	1,372	2,643	1,644	999	688	477	211	151	104	47	363	270	93	54	32	22	
Accidental poisoning	1,250†	873	380†	851	563	288	219	165	54	59	45	14	110	93	17	10†	7	*	
Falls	1,100†	550†	550†	932	460	472	112	60	52	10†	6	*	37	23	14	10†	*	7	
Motor vehicle accidents	967	693	274	492	362	130	257	184	73	58	38	20	143	100	43	17	9	8	
Accidental drowning and submersion	110†	80†	30†	68	47	21	20†	15	*	10†	*	*	10†	*	*	10†	*	0	
Chronic lower respiratory diseases	3,788	1,808	1,980	3,432	1,626	1,806	211	106	105	87	43	44	38	20	18	20	13	7	
Alzheimer's disease	3,081	1,084	1,997	2,617	940	1,677	313	95	218	72	23	49	44	14	30	35	12	23	
Cerebrovascular diseases	2,536	1,094	1,442	2,007	853	1,154	333	150	183	89	43	46	60	25	35	47	23	24	
Diabetes	2,013	1,199	814	1,216	756	460	466	266	200	112	61	51	180	102	78	39	14	25	
Intentional self-harm (suicide)	1,256	976	280	955	739	216	173	143	30	28	20	8	75	56	19	25	18	7	
Chronic liver disease and cirrhosis	1,170†	740†	430†	686	435	251	241	163	78	20†	17	*	217	125	92	0†	*	0	
Essential (primary) hypertension and hypertensive renal disease	1,010†	500†	510	747	373	374	152	75	77	58	32	26	36	16	20	20†	*	13	
Influenza and pneumonia	859	434	425	631	320	311	129	72	57	20	6	14	62	27	35	17	9	8	
Parkinson's disease	710†	462	250†	615	400	215	65	37	28	10†	6	*	10†	10	*	10†	9	*	
Sepicemia	510†	270†	240†	340	181	159	91	43	48	24	14	10	41	24	17	10†	*	*	
Nephritis, nephrotic syndrome and nephrosis	490†	250†	231	328	169	159	87	48	39	18	10	8	49	24	25	0†	*	0	
Assault (homicide)	420†	331	90†	138	98	40	148	128	20	70	61	9	51	37	14	10†	7	*	
Human immunodeficiency virus (HIV) disease	100†	80†	10†	50†	47	*	20†	14	*	20†	17	*	0†	*	0	0†	*	0	
Injury by firearms	1,080†	899	190†	748	616	132	210	182	28	76	65	11	35	25	10	20†	11	*	
Drug-induced deaths	1,463	945	518	1,091	666	425	246	184	62	64	47	17	50	42	8	12	6	6	
Opioid-induced deaths⁺⁺	740†	480†	260†	541	331	210	156	113	43	20†	16	*	20†	17	*	10†	*	*	
Alcohol-induced deaths	1,310†	930†	380†	749	522	227	210	157	53	29	22	7	316	224	92	10†	*	*	

TABLE 2B-4 (continued)
NUMBER OF DEATHS AND AGE-ADJUSTED MORTALITY RATES^a FOR SELECTED CAUSES OF DEATH BY RACE/ETHNICITY AND GENDER, ARIZONA, 2016

		All groups						White non-Hispanic						Hispanic or Latino						Black or African American						American Indian or Alaska Native						Asian or Pacific Islander					
		T	M	F	T	M	F	T	M	F	T	M	F	T	M	F	T	M	F	T	M	F	T	M	F	T	M	F	T	M	F						
Total, all causes		696.6	824.8	581.1	704.8	826.6	593.6	607.5	739.7	496.9	874.2	1029.9	724.6	1023.9	1314.1	783.5	433.5	485.6	485.6	392.8																	
Major cardiovascular diseases		190.8	230.7	155.9	194.4	235.2	158.0	168.3	202.3	140.4	275.8	314.3	233.8	189.6	238.8	152.7	120.9	135.9	111.0																		
Diseases of heart		142.5	180.5	109.8	147.7	186.9	113.5	116.3	147.1	91.5	188.3	224.0	151.5	139.9	191.2	102.3	76.6	86.8	69.9																		
Coronary heart disease		106.2	140.6	76.8	110.5	146.4	79.3	86.4	115.6	63.1	141.6	168.4	111.8	99.9	134.3	74.4	56.1	67.5	48.6																		
Malignant neoplasms		140.7	166.3	120.0	146.7	171.3	126.5	115.9	147.3	92.3	171.6	214.4	138.9	101.2	110.7	94.6	102.6	106.6	98.4																		
Malignant neoplasm of trachea, bronchus and lung		31.4	36.6	26.9	34.8	40.0	30.5	17.8	22.0	14.3	37.8	48.7	31.5	7.4	10.7	**	19.5	20.1	18.4																		
Malignant neoplasm of colon, rectum, and anus		12.9	15.4	10.6	13.2	15.6	11.2	11.1	14.7	7.8	17.4	17.9	16.1	8.0	7.7	8.3	13.1	10.6	13.8																		
Malignant neoplasm of breast		10.4	0.2	19.4	11.1	0.3	20.8	7.6	**	13.9	12.2	0.0	23.0	6.8	0.0	11.8	7.7	0.0	13.4																		
Malignant neoplasm of prostate		NA	18.8	NA	NA	18.6	NA	NA	19.4	NA	NA	NA	39.5	NA	NA	15.9	NA	NA	**	NA																	
Malignant melanoma of skin		2.4	3.5	1.4	2.9	4.3	1.6	0.9	1.1	**	0.0	**	0.0	**	**	**	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0					
Malignant neoplasm of cervix uteri		NA	NA	2.1	NA	NA	1.8	NA	NA	3.1	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA						
Accidents (unintentional injury)		53.7	73.1	34.9	55.2	73.8	36.9	41.6	58.2	25.9	52.2	66.0	35.8	139.1	219.5	67.9	25.9	33.4	20.1																		
Accidental poisoning		18.6	26.1	11.0	22.4	29.9	14.8	10.8	16.4	5.2	19.8	29.0	10.1	40.8	73.3	11.4	3.6	5.2	1.8																		
Motor vehicle accidents		13.9	20.1	7.8	11.5	17.3	5.9	13.3	19.9	7.2	19.1	22.6	**	52.2	77.6	29.5	7.2	**	6.2																		
Falls		13.4	15.5	11.7	14.0	15.9	12.3	11.0	13.4	9.2	6.0	5.8	5.3	17.5	24.3	12.0	7.5	8.0	**																		
Accidental drowning and submersion		1.5	2.2	0.8	1.7	2.4	0.9	0.9	1.5	0.2	2.6	2.4	2.4	2.5	2.4	2.5	2.1	2.3	4.9	0.0																	
Chronic lower respiratory diseases		45.0	47.6	42.9	50.9	52.7	49.4	20.0	23.2	**	43.8	**	19.5	**	19.5	**	**	**	**	0.0																	
Alzheimer's disease		37.3	31.1	41.5	37.9	31.9	42.0	34.6	25.4	40.4	48.6	37.8	54.1	24.5	19.6	27.3	26.2	26.2	26.7																		
Cerebrovascular diseases		30.7	29.9	30.9	30.0	28.7	30.6	31.5	31.4	31.2	48.1	49.7	45.8	30.1	27.8	30.9	31.1	41.5	24.8																		
Diabetes		24.5	31.5	18.4	19.3	25.8	13.5	40.5	51.4	32.1	50.1	55.9	44.9	79.9	100.4	63.5	20.8	14.9	24.0																		
Intentional self-harm (suicide)		17.7	28.0	7.9	21.7	33.6	10.2	8.8	15.0	2.9	9.0	13.1	5.2	24.2	36.7	11.9	9.3	14.0	4.7																		
Chronic liver disease and cirrhosis		15.1	19.8	10.8	12.5	16.0	9.2	16.8	24.2	10.3	7.7	12.7	**	85.9	107.3	67.2	**	**	0.0																		
Essential (primary) hypertension and hypertensive renal disease		12.2	13.4	11.0	11.2	12.5	10.0	14.6	15.9	13.4	28.5	31.9	24.8	16.1	18.0	15.0	11.1	**	13.8																		
Influenza and pneumonia		10.4	11.8	9.4	9.6	10.8	8.7	11.5	13.9	9.6	10.3	7.1	12.8	29.6	30.5	28.8	9.9	11.6	8.4																		
Parkinson's disease		8.7	12.9	5.4	9.0	13.3	5.6	7.1	10.3	5.1	4.0	7.9	**	6.0	13.9	**	9.1	14.7	**																		
Assault (homicide)		6.3	9.9	2.5	3.7	5.3	2.1	6.8	11.7	1.8	20.4	33.4	5.6	17.6	25.7	9.9	**	**	0.0																		
Septicemia		6.2	7.1	5.5	6.0	4.6	7.3	7.9	7.0	11.7	15.5	8.6	17.6	24.7	12.6	4.7	**	**	**																		
Nephritis, nephrotic syndrome and nephrosis		5.8	6.9	4.9	5.8	4.2	8.4	10.9	6.7	8.4	10.8	6.6	24.7	29.1	21.2	1.5	3.6	**	**	0.0																	
Human immunodeficiency virus (HIV) disease		1.4	2.5	0.4	1.3	2.4	**	1.0	1.7	**	7.2	10.5	**	**	**	0.0	**	**	0.0																		
Injury by firearms		15.3	25.6	5.4	16.9	27.6	6.6	10.2	18.0	2.6	22.8	37.7	6.7	12.0	16.7	7.3	5.6	8.5	**																		
Drug-induced deaths		21.5	28.2	14.8	27.9	34.8	20.8	12.2	18.4	6.1	21.7	31.5	12.1	17.8	31.4	5.1	4.6	4.4	4.5																		
Opioid-induced deaths⁺⁺		11.1	14.5	7.6	14.5	18.2	10.7	7.5	10.7	4.2	7.0	10.2	**	6.5	12.1	**	2.1	**	**																		
Alcohol-induced deaths		17.6	25.5	10.2	14.7	20.4	9.3	13.8	22.5	6.1	9.7	14.5	4.8	123.0	190.0	65.3	**	**	**																		

Notes: * Cell suppressed due to count less than 6; ** Cell suppressed due to rate/ratio/percent based on non-zero count less than 6;
^a The number of deaths per 100,000 resident population age-adjusted to the 2000 U.S. standard; The rates for cervical cancer are per 100,000 females; The rate for prostate cancer is per 100,000 males;
^b Includes records with unknown gender and race/ethnicity;
⁺⁺ First ever published sub-category of drug-induced deaths.

TABLE 2B-5
AGE-ADJUSTED MORTALITY RATES^a FOR SELECTED CAUSES OF DEATH BY URBAN/RURAL AREA AND GENDER
ARIZONA, 2016

	Arizona			Urban			Rural		
	Total	Male	Female	Total	Male	Female	Total	Male	Female
Total, all causes	696.6	824.8	581.1	670.3	790.0	564.2	795.9	948.0	651.7
Major cardiovascular diseases	190.8	230.7	155.9	183.8	221.6	151.5	216.3	260.7	174.7
Diseases of heart	142.5	180.5	109.8	135.4	171.0	105.5	168.5	212.4	128.0
Coronary heart disease	106.2	140.6	76.8	101.1	134.1	73.5	125.0	161.7	91.4
Malignant neoplasms	140.7	166.3	120.0	137.2	163.7	116.1	152.6	172.7	135.8
Malignant neoplasm of trachea, bronchus and lung	31.4	36.6	26.9	30.3	35.9	25.8	34.7	38.4	31.4
Malignant neoplasm of colon, rectum, and anus	12.9	15.4	10.6	12.6	15.2	10.3	13.6	15.3	11.9
Malignant neoplasm of breast	10.4	0.2	19.4	10.1	0.3	18.7	11.4	0.0	21.9
Malignant neoplasm of prostate	NA	18.8	NA	NA	18.5	NA	NA	19.7	NA
Malignant melanoma of skin	2.4	3.5	1.4	2.3	3.5	1.3	2.9	3.6	2.3
Malignant neoplasm of cervix uteri	NA	NA	2.1	NA	NA	2.1	NA	NA	2.4
Accidents (unintentional injury)	53.7	73.1	34.9	49.3	66.6	32.7	71.0	96.1	45.3
Accidental drowning	18.6	26.1	11.0	16.7	23.0	10.4	25.3	37.3	13.1
Motor vehicle accidents	13.9	20.1	7.8	12.4	18.1	6.8	21.0	28.8	13.1
Falls	13.4	15.5	11.7	13.4	15.8	11.5	13.1	13.4	12.5
Accidental drowning and submersion	1.5	2.2	0.8	1.4	2.0	0.9	1.9	3.0	0.7
Chronic lower respiratory diseases	45.0	47.6	42.9	43.2	45.2	41.6	51.5	56.6	46.8
Alzheimer's disease	37.3	31.1	41.5	38.6	31.8	43.0	31.7	27.9	34.5
Cerebrovascular diseases	30.7	29.9	30.9	30.1	29.5	30.1	33.5	31.5	35.0
Diabetes	24.5	31.5	18.4	24.7	31.8	18.6	22.9	29.6	16.7
Intentional self-harm (suicide)	17.7	28.0	7.9	16.0	24.8	7.6	25.7	42.6	8.8
Chronic liver disease and cirrhosis	15.1	19.8	10.8	12.4	16.5	8.7	28.2	34.7	22.1
Essential (primary) hypertension and hypertensive renal disease	12.2	13.4	11.0	12.9	14.1	11.8	8.7	10.1	7.3
Influenza and pneumonia	10.4	11.8	9.4	9.8	11.3	8.6	13.2	13.9	12.5
Parkinson's disease	8.7	12.9	5.4	9.1	13.5	5.7	6.8	10.6	3.7
Assault (homicide)	6.3	9.9	2.5	6.0	9.4	2.5	6.9	10.9	2.7
Septicemia	6.2	7.1	5.5	5.6	6.1	5.1	9.0	11.3	7.1
Nephritis, nephrotic syndrome and nephrosis	5.8	6.9	4.9	4.7	5.1	4.4	10.6	14.1	7.5
(HIV) disease	1.4	2.5	0.4	1.5	2.6	0.5	0.8	1.6	0.0
Injury by firearms	15.3	25.6	5.4	14.5	24.3	5.1	17.9	29.6	6.3
Drug-induced deaths	21.5	28.2	14.8	19.9	25.7	14.1	26.3	35.5	16.7
Opioid-induced deaths⁺⁺	11.1	14.5	7.6	10.9	14.1	7.7	11.0	15.3	6.3
Alcohol-induced deaths	17.6	25.5	10.2	14.3	20.4	8.7	34.3	50.1	19.0

Notes: ^a The number of deaths per 100,000 population in specified group age-adjusted to the 2000 standard U.S.; the rates for cervical cancer are per 100,000 females; the rates for prostate cancer is per 100,000 males; ⁺⁺ First ever published sub-category of drug-induced deaths.

TABLE 2B-6
DEATHS AND DEATH RATES BY GENDER FOR SELECTED CAUSES,
ARIZONA RESIDENTS, 2016

Cause of death (Tenth Revision, International Statistical Classification of Diseases)	Number of deaths			Crude death rate per 100,000 persons		
	Total	Male	Female	Total	Male	Female
Total, all causes^a	56,480	30,431	26,046	826.3	896.2	757.2
Salmonella infections	0†	*	0	**	**	0.0
Shigellosis and amebiasis	0	0	0	0.0	0.0	0.0
Certain other intestinal infections	229	103	126	3.4	3.0	3.7
Enterocolitis due to Clostridium difficile	164	71	93	2.4	2.1	2.7
Tuberculosis	10†	*	*	0.1	**	**
Respiratory tuberculosis	10†	*	*	0.1	**	**
Other tuberculosis	0†	0	*	**	0.0	**
Whooping cough	0†	*	*	**	**	**
Scarlet fever and erysipelas	0	0	0	0.0	0.0	0.0
Meningococcal infection	0	0	0	0.0	0.0	0.0
Septicemia	505	266	239	7.4	7.8	6.9
Syphilis	0†	*	0	**	**	0.0
Acute poliomyelitis	0	0	0	0.0	0.0	0.0
Arthropod-borne encephalitis	0	0	0	0.0	0.0	0.0
Measles	0	0	0	0.0	0.0	0.0
Viral hepatitis	217	138	79	3.2	4.1	2.3
Human immunodeficiency virus (HIV) disease	96	83	13	1.4	2.4	0.4
Malaria	0	0	0	0.0	0.0	0.0
Other and unspecified infectious and parasitic diseases	164	94	70	2.4	2.8	2.0
Malignant neoplasms	11,801	6,429	5,372	172.6	189.3	156.2
Malignant neoplasm of lip, oral cavity and pharynx	205	157	48	3.0	4.6	1.4
Malignant neoplasm of esophagus	310	246	64	4.5	7.2	1.9
Malignant neoplasm of stomach	226	128	98	3.3	3.8	2.8
Malignant neoplasm of colon, rectum, and anus	1,069	591	478	15.6	17.4	13.9
Malignant neoplasm of liver and intrahepatic bile ducts	551	372	179	8.1	11.0	5.2
Malignant neoplasm of pancreas	901	494	407	13.2	14.5	11.8
Malignant neoplasm of larynx	75	61	14	1.1	1.8	0.4
Malignant neoplasm of trachea, bronchus and lung	2,689	1,452	1,237	39.3	42.8	36.0
Malignant melanoma of skin	191	131	60	2.8	3.9	1.7
Malignant neoplasm of breast	853	9	844	12.5	0.3	24.5
Malignant neoplasm of cervix uteri	82	0	82	1.2	0.0	2.4
Malignant neoplasm of corpus uteri and uterus, part unspecified	168	0	168	2.5	0.0	4.9
Malignant neoplasm of ovary	307	0	307	4.5	0.0	8.9
Malignant neoplasm of prostate	697	697	0	10.2	20.5	0.0
Malignant neoplasm of kidney and renal pelvis	308	205	103	4.5	6.0	3.0
Malignant neoplasm of bladder	367	267	100	5.4	7.9	2.9
Malignant neoplasm of meninges, brain and other parts of CNS	340	195	145	5.0	5.7	4.2
Malignant neoplasm of lymphoid, hematopoietic and related tissue	1,142	654	488	16.7	19.3	14.2
Hodgkin's disease	22	10	12	0.3	0.3	0.3
Non-Hodgkin's lymphoma	399	221	178	5.8	6.5	5.2
Leukemia	477	273	204	7.0	8.0	5.9
Multiple myeloma and immunoproliferative neoplasms	243	149	94	3.6	4.4	2.7
Other and unspecified malignant neoplasms of lymphoid tissue	0†	*	0	**	**	0.0
All other and unspecified malignant neoplasm	1,320	770	550	19.3	22.7	16.0
In situ neoplasms	353	214	139	5.2	6.3	4.0
Anemias	59	30	29	0.9	0.9	0.8
Diabetes	2,013	1,199	814	29.4	35.3	23.7

TABLE 2B-6 (continued)
DEATHS AND DEATH RATES BY GENDER FOR SELECTED CAUSES,
ARIZONA RESIDENTS, 2016

Cause of death (Tenth Revision, International Statistical Classification of Diseases)	Number of deaths			Crude death rate per 100,000 persons		
	Total	Male	Female	Total	Male	Female
Nutritional deficiencies	141	53	88	2.1	1.6	2.6
Malnutrition	132	48	84	1.9	1.4	2.4
Other nutritional deficiencies	10†	*	*	0.1	**	**
Obesity	193	120	73	2.8	3.5	2.1
Meningitis	10†	*	8	0.2	**	0.2
Parkinson's disease	712	462	250	10.4	13.6	7.3
Alzheimer's disease	3,081	1,084	1,997	45.1	31.9	58.1
Major cardiovascular diseases	15,822	8,559	7,263	231.5	252.1	211.1
Diseases of heart	11,820	6,702	5,118	172.9	197.4	148.8
Acute rheumatic fever and chronic rheumatic heart disease	77	33	44	1.1	1.0	1.3
Hypertensive heart disease	1,114	554	560	16.3	16.3	16.3
Hypertensive heart and renal disease	111	56	55	1.6	1.6	1.6
Ischemic heart disease	7,734	4,703	3,031	113.1	138.5	88.1
Acute myocardial infarction	1,755	1,038	717	25.7	30.6	20.8
Other acute ischemic heart disease	31	24	7	0.5	0.7	0.2
Other forms of chronic ischemic heart disease	5,948	3,641	2,307	87.0	107.2	67.1
Atherosclerotic cardiovascular disease	1,954	1,232	722	28.6	36.3	21.0
All other forms of chronic ischemic heart disease	3,994	2,409	1,585	58.4	70.9	46.1
Other heart diseases	2,784	1,356	1,428	40.7	39.9	41.5
Acute and subacute endocarditis	39	23	16	0.6	0.7	0.5
Diseases of pericardium and acute myocarditis	20†	11	*	0.2	0.3	**
Heart failure	686	343	343	10.0	10.1	10.0
All other forms of heart disease	2,044	979	1,065	29.9	28.8	31.0
Essential (primary) hypertension and hypertensive renal disease	1,010	500	510	14.8	14.7	14.8
Cerebrovascular diseases	2,536	1,094	1,442	37.1	32.2	41.9
Atherosclerosis	72	41	31	1.1	1.2	0.9
Other diseases of circulatory system	384	222	162	5.6	6.5	4.7
Aortic aneurysm and dissection	198	123	75	2.9	3.6	2.2
Other disease of arteries, arterioles and capillaries	186	99	87	2.7	2.9	2.5
Other disorders of circulatory system	104	54	50	1.5	1.6	1.5
Influenza and pneumonia	859	434	425	12.6	12.8	12.4
Influenza	146	73	73	2.1	2.1	2.1
Pneumonia	713	361	352	10.4	10.6	10.2
Other acute lower respiratory infections	0†	*	0	**	**	0.0
Acute bronchiolitis	0†	*	0	**	**	0.0
Unspecified acute lower respiratory infection	0	0	0	0.0	0.0	0.0
Chronic lower respiratory diseases	3,788	1,808	1,980	55.4	53.2	57.6
Bronchitis, chronic and unspecified	10†	*	*	0.1	**	**
Emphysema	180	93	87	2.6	2.7	2.5
Asthma	105	38	67	1.5	1.1	1.9
Other chronic lower respiratory diseases	3,495	1,674	1,821	51.1	49.3	52.9
Pneumoconioses and chemical effects	20†	13	*	0.2	0.4	**
Pneumonitis due to solids and liquids	288	160	128	4.2	4.7	3.7
Other disease of respiratory system	638	336	302	9.3	9.9	8.8
Peptic ulcer	71	32	39	1.0	0.9	1.1
Diseases of appendix	10†	9	*	0.2	0.3	**
Hernia	39	21	18	0.6	0.6	0.5

TABLE 2B-6 (continued)
DEATHS AND DEATH RATES BY GENDER FOR SELECTED CAUSES,
ARIZONA RESIDENTS, 2016

Cause of death (Tenth Revision, International Statistical Classification of Diseases)	Number of deaths			Crude death rate per 100,000 persons		
	Total	Male	Female	Total	Male	Female
Chronic liver disease and cirrhosis	1,169	744	425	17.1	21.9	12.4
Alcoholic liver disease	846	570	276	12.4	16.8	8.0
Other chronic liver disease and cirrhosis	323	174	149	4.7	5.1	4.3
Cholelithiasis and other disorders of gallbladder	89	48	41	1.3	1.4	1.2
Nephritis, nephrotic syndrome and nephrosis	485	254	231	7.1	7.5	6.7
Acute and rapidly progressive nephritic and nephrotic syndrome	10†	*	*	**	**	**
Chronic glomerulonephritis	10†	*	*	0.1	**	**
Renal failure	473	246	227	6.9	7.2	6.6
Others disorders of kidney	0	0	0	0.0	0.0	0.0
Infections of kidney	10†	*	10	0.2	**	0.3
Hyperplasia of prostate	11	11	0	0.2	0.3	0.0
Inflammatory diseases of female pelvic organs	0†	0	*	**	0.0	**
Pregnancy, childbirth and the puerperium	26	0	26	0.4	0.0	0.8
Pregnancy with abortive outcome	0†	0	*	**	0.0	**
Other complications of pregnancy, childbirth and the puerperium	25	0	25	0.4	0.0	0.7
Perinatal conditions	215	113	102	3.1	3.3	3.0
Congenital malformations	211	114	97	3.1	3.4	2.8
Symptoms, signs, abnormal findings ^a	1,899	955	941	27.8	28.1	27.4
Total accidents	3,899	2,527	1,372	57.0	74.4	39.9
Transport accidents	1,028	744	284	15.0	21.9	8.3
Motor vehicle accidents	967	693	274	14.1	20.4	8.0
Other land transport accidents	20†	20	*	0.3	0.6	**
Water, air, space	38	31	7	0.6	0.9	0.2
Nontransport accidents	2,871	1,783	1,088	42.0	52.5	31.6
Falls	1,103	553	550	16.1	16.3	16.0
Accidental discharge of firearms	7	7	0	0.1	0.2	0.0
Accidental drowning and submersion	105	75	30	1.5	2.2	0.9
Accidental exposure to smoke, fire and flames	40	24	16	0.6	0.7	0.5
Accidental poisoning	1,248	873	375	18.3	25.7	10.9
Other and unspecified nontransport accidents	368	251	117	5.4	7.4	3.4
Intentional self-harm (suicide)	1,256	976	280	18.4	28.7	8.1
By discharge of firearms	747	633	114	10.9	18.6	3.3
By other means	509	343	166	7.4	10.1	4.8
Assault (homicide)	416	331	85	6.1	9.7	2.5
By discharge of firearms	301	238	63	4.4	7.0	1.8
By other means	115	93	22	1.7	2.7	0.6
Legal intervention	10†	12	*	0.2	0.4	**
Events of undetermined intent	172	99	73	2.5	2.9	2.1
Discharge of firearms	16	10	6	0.2	0.3	0.2
Other and unspecified events of undetermined intent	156	89	67	2.3	2.6	1.9
Operations of war	0†	*	0	**	**	0.0
Complications of medical and surgical care	47	22	25	0.7	0.6	0.7
INJURY BY FIREARMS	1,084	899	185	15.9	26.5	5.4
DRUG-INDUCED DEATHS	1,463	945	518	21.4	27.8	15.1
OPIOID-INDUCED DEATHS ⁺⁺	743	481	262	10.9	14.2	7.6
ALCOHOL-INDUCED DEATHS	1,309	928	381	19.1	27.3	11.1

Notes: * Cell suppressed due to count less than 6; ** Cell suppressed due to rate/ratio/percent based on non-zero count less than 6; † Sum rounded to nearest tens unit due to addend less than 6; ^a Includes records with unknown gender; The list of Causes of Death was developed for the general analysis of ICD-10 mortality statistics and for ranking of leading causes of death. It is similar in structure and content and replaces the list of 72 Selected Causes of Death used for ICD-9 mortality statistics; ⁺⁺ First ever published sub-category of drug-induced deaths.

TABLE 2B-7
NUMBER OF DEATHS FROM DISEASES OF THE HEART BY CATEGORY, GENDER, AND YEAR, ARIZONA, 2006-2016

		2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	
ALL FORMS OF HEART DISEASE		TOTAL	10,362	10,147	10,052	10,151	9,719	10,423	10,366	10,497	9,953	11,274	11,820
Male		5,538	5,455	5,535	5,558	5,351	5,748	5,731	5,910	5,575	6,286	6,702	
Female		4,824	4,692	4,517	4,593	4,368	4,675	4,635	4,587	4,378	4,988	5,118	
Acute rheumatic fever and chronic rheumatic heart disease		TOTAL	57	38	57	51	42	69	51	64	74	52	77
Male		15	15	24	16	15	22	19	17	26	20	33	
Female		42	23	33	35	27	47	32	47	48	32	44	
Hypertensive heart and renal disease		TOTAL	24	29	48	35	36	49	51	49	65	71	111
Male		13	15	22	18	16	22	28	27	31	36	56	
Female		11	14	26	17	20	27	23	22	34	35	55	
Ischemic heart disease		TOTAL	7,628	7,163	7,326	7,372	7,043	7,498	7,294	7,159	6,650	7,264	7,734
Male		4,202	4,005	4,225	4,233	4,076	4,409	4,279	4,259	3,957	4,391	4,703	
Female		3,426	3,158	3,101	3,139	2,967	3,089	3,015	2,900	2,693	2,873	3,031	
Hypertensive heart disease		TOTAL	506	646	636	698	644	739	761	943	991	1,118	1,114
Male		256	332	322	340	302	348	375	462	491	517	554	
Female		250	314	314	358	342	391	386	481	500	601	560	
Other heart diseases		TOTAL	2,147	2,271	1,985	1,995	1,954	2,069	2,209	2,282	2,173	2,769	2,784
Male		1,052	1,088	942	951	942	947	1,030	1,145	1,070	1,322	1,356	
Female		1,095	1,183	1,043	1,044	1,012	1,121	1,179	1,137	1,103	1,447	1,428	

TABLE 2B-8
NUMBER OF DEATHS FOR SELECTED SUBCATEGORIES OF MALIGNANT NEOPLASMS BY GENDER AND YEAR,
ARIZONA, 2006-2016

	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
ALL CANCERS^a	TOTAL^b	9,768	9,955	9,941	10,147	10,423	10,543	10,871	11,193	10,600	11,624
Male	TOTAL	5,233	5,364	5,363	5,432	5,639	5,932	5,950	5,731	6,263	6,429
Female	TOTAL	4,535	4,591	4,578	4,715	4,784	4,903	4,939	5,243	4,869	5,361
ICD-9 140-149/ICD-10 C00-C14 - Malignant neoplasm of lip, oral cavity and pharynx (oropharyngeal cancer)	TOTAL	115	133	151	125	134	132	144	150	137	160
Male	TOTAL	80	91	101	89	98	105	106	101	98	109
Female	TOTAL	35	42	50	36	36	27	38	49	39	51
ICD-9 150/ICD-10 C15 - Malignant neoplasm of esophagus	TOTAL	261	252	262	266	273	288	325	320	286	303
Male	TOTAL	209	206	212	214	220	232	260	257	230	249
Female	TOTAL	52	46	50	52	53	56	65	63	56	54
ICD-9 151/ICD-10 C16 - Malignant neoplasm of stomach	TOTAL	190	186	200	179	199	211	204	202	186	211
Male	TOTAL	111	106	121	105	123	131	118	122	109	121
Female	TOTAL	79	80	79	74	76	80	86	80	77	90
ICD-9 153, 154/ICD-10 C18-C21 - Malignant neoplasm of colon, rectum, rectosigmoid junction and anus	TOTAL	917	966	896	887	952	927	946	997	953	1,022
Male	TOTAL	495	535	466	463	520	482	523	510	510	568
Female	TOTAL	422	431	430	424	432	445	423	487	443	454
ICD-9 157/ICD-10 C25 - Malignant neoplasm of pancreas	TOTAL	575	629	636	622	707	708	813	755	769	852
Male	TOTAL	301	362	340	304	373	355	450	392	400	461
Female	TOTAL	274	267	296	318	334	353	363	363	369	391
ICD-9 162/ICD-10 C33-C34 - Malignant neoplasm of trachea, bronchus and lung	TOTAL	2,718	2,573	2,632	2,691	2,655	2,654	2,772	2,763	2,543	2,885
Male	TOTAL	1,528	1,443	1,477	1,480	1,465	1,474	1,512	1,485	1,385	1,533
Female	TOTAL	1,190	1,130	1,155	1,211	1,190	1,180	1,260	1,278	1,158	1,352
ICD-9 172/ICD-10 C43 - Malignant melanoma of skin	TOTAL	179	188	168	226	191	187	216	222	215	213
Male	TOTAL	124	124	115	160	133	125	147	137	147	142
Female	TOTAL	55	64	53	66	58	62	69	85	68	71
ICD-9 174,175/ICD-10 C50 - Malignant neoplasm of breast	TOTAL	745	724	734	716	732	747	740†	836	729	810†
Male	TOTAL	6	6	9	8	12	6	*	9	6	*
Female	TOTAL	739	718	725	708	720	741	740	827	723	809

TABLE 2B-8 (continued)
NUMBER OF DEATHS FOR SELECTED SUBCATEGORIES OF MALIGNANT NEOPLASMS BY GENDER AND YEAR,
ARIZONA, 2006-2016

		2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
ICD-9 180/ICD-10 C53 - Malignant neoplasm of cervix uteri	TOTAL	54	62	60	64	68	72	73	86	75	84	82
Female	54	62	60	64	68	72	73	86	75	84	82	82
ICD-9 179, 182 / ICD-10 C54-C55 - Malignant neoplasm of body of uterus and of uterus, part unspecified	TOTAL	97	97	115	108	138	159	131	140	176	180	168
Female	97	97	115	108	138	159	131	140	176	180	180	168
ICD-9 185/ICD-10 C61 - Malignant neoplasm of prostate	TOTAL	522	548	568	551	549	574	581	570	572	633	697
Male	522	548	568	551	549	574	581	570	572	633	697	697
ICD-9 188/ICD-10 C67 - Malignant neoplasm of bladder	TOTAL^a	238	270	258	264	247	355	316	293	305	355	367
Male	175	206	192	206	183	245	244	221	241	255	267	267
Female	63	64	66	58	64	109	72	72	64	100	100	100
ICD-9 189/ICD-10 C64-C65 - Malignant neoplasm of kidney and other and unspecified urinary organs	TOTAL	238	231	247	240	286	267	252	274	254	309	308
Male	156	147	154	161	189	178	171	179	177	224	205	205
Female	82	84	93	79	97	89	81	95	77	85	103	103
ICD-9 191, 192/ICD-10 C70-C72 - Malignant neoplasm of brain	TOTAL	248	248	268	275	268	275	337	325	339	323	340
Male	133	141	152	151	153	145	196	172	194	190	195	195
Female	115	107	116	124	115	130	141	153	145	133	145	145
ICD-9 201/ICD-10 81 - Hodgkin's disease	TOTAL	20†	30	17	16	22	19	17	26	10†	30	22
Male	14	19	10	9	12	9	8	16	10	21	10	10
Female	*	11	7	7	10	10	9	10	*	9	12	12
ICD-9 200, 202/ICD-10 C82-C85 - Malignant lymphoma other than Hodgkin's disease	TOTAL	373	362	434	388	379	392	372	416	371	397	399
Male	213	200	230	212	219	212	214	251	196	216	221	221
Female	160	162	204	176	160	180	158	165	175	181	178	178
ICD-9 203/ICD-10 C88, C90 - Multiple myeloma and immunoproliferative neoplasms	TOTAL	199	213	203	189	206	219	221	247	221	240	243
Male	110	118	123	107	117	133	128	129	133	139	149	149
Female	89	95	80	82	89	86	93	118	88	101	94	94
Other malignant neoplasms	TOTAL	2,080	2,243	2,092	2,340	2,417	2,357	2,409	2,571	2,455	2,613	2,731
Male	1,056	1,112	1,093	1,212	1,273	1,234	1,400	1,323	1,397	1,477		
Female	1,024	1,131	999	1,128	1,144	1,123	1,171	1,132	1,216	1,254		

Notes: * Cell suppressed due to count less than 6; † Sum rounded to nearest tens unit due to addend less than 6; ^a All cancers total includes other forms of cancer; counts for other malignant neoplasms which are bolded reflect corrected counts; ^b Total includes records with unknown gender.

TABLE 2B-9
**NUMBER OF DEATHS FROM UNINTENTIONAL INJURIES IN ACCIDENTS BY CATEGORY AND YEAR AMONG
 ARIZONA RESIDENTS, 2006-2016**

	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
Total unintentional injury deaths	3,156	3,014	2,951	2,887	2,834	2,959	2,804	3,137	3,011	3,403	3,899
Railway accident	17	12	9	8	12	6	7	7	8	6	11
Motor vehicle accident	1,220	1,035	891	771	711	787	747	767	702	855	967
Water transport accident	*	*	*	*	*	*	*	*	0	*	*
Accident involving aircraft	32	17	32	15	16	21	13	9	*	7	10
Poisoning by drugs / medicaments	624	669	689	802	798	781	731	853	885	955	1,095
Poisoning by gases and vapors	22	52	77	85	81	102	86	112	94	105	153
Falls	702	720	748	731	762	776	782	870	881	1,014	1,103
Fire, flames, smoke	43	31	50	31	25	33	43	68	30	25	40
Excessive natural heat	62	28	33	39	51	57	51	56	32	43	99
Excessive natural cold	17	20	25	24	17	22	9	28	19	20	21
Contact with venomous snakes and lizards	0	0	*	0	*	0	*	0	0	0	0
Contact with venomous spiders	0	*	0	0	0	0	0	*	0	0	0
Contact with scorpions	0	0	0	0	0	0	0	*	0	0	0
Contact with hornets, wasps, bees	0	0	0	0	0	0	0	*	0	*	*
Bitten or struck by dog	*	*	*	*	*	*	*	*	*	*	*
Lightning	*	*	0	*	*	*	*	*	0	*	*
Storms and floods	*	*	0	0	*	0	0	0	0	0	0
Accidental drowning and submersion	87	85	78	99	86	93	83	72	78	81	105
Choked on food	30	22	35	43	39	34	38	29	33	34	33
Choked on other objects	48	61	53	49	57	44	44	57	56	53	38
Mechanical suffocation	26	43	29	25	28	25	23	21	35	40	35
Accidental discharge of firearms	9	13	10	7	11	8	*	9	6	*	7
Exposure to electric current	*	11	6	7	*	6	0	6	*	*	10
Overexertion	0	0	0	0	*	0	0	0	0	0	0
Adverse effects of drugs in therapeutic use	*	*	7	8	10	*	6	10	10	12	*
Misadventures to patients during medical/surgical care	51	44	40	42	41	45	42	46	32	20	43

Notes: * Cell suppressed due to count less than 6; Beginning in 2000, the data are classified by the Tenth Revision of the International Classification of Diseases (ICD-10).

TABLE 2B-10
NUMBER OF DEATHS FROM MOTOR VEHICLE-RELATED INJURIES BY PERSON INJURED, GENDER, AND YEAR,
ARIZONA RESIDENTS, 2006-2016

		2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
TOTAL	Total	1,220	1,035	891	771	711	787	747	767	702	855	967
Male	Male	831	710	632	554	501	562	541	541	492	605	693
Female	Female	389	325	259	217	210	225	206	226	210	250	274
Motorcyclist	Total	115	103	113	100†	69	113	130	111	100	121	126
Male	Male	99	92	106	94	61	96	113	98	93	106	118
Female	Female	16	11	7	*	8	17	17	13	7	15	8
Pedestrian	Total	169	155	136	122	152	153	128	152	138	160	218
Male	Male	123	103	101	90	115	111	88	105	100	115	150
Female	Female	46	52	35	32	37	42	40	47	38	45	68
Pedal cyclist	Total	30†	20†	10†	20†	20†	20†	11	20†	20†	20†	20†
Male	Male	29	17	11	19	20	16	11	19	15	15	18
Female	Female	*	*	*	*	*	*	0	*	*	*	*
Other person	Total	906	759	630	528	469	502	478	481	445	558	601
Male	Male	580	498	414	351	305	339	329	31.9	284	369	407
Female	Female	326	261	216	177	164	163	149	162	161	189	194

Notes: * Cell suppressed due to count less than 6; † Sum rounded to nearest tens unit due to addend less than 6; Beginning in 2000, the data are classified by the Tenth Revision of the International Classification of Diseases (ICD-10).

TABLE 2B-11
LEADING CAUSES OF DEATH BY PLACE OF DEATH AND DECEDENT STATUS, ARIZONA, 2016

Causes of death	TOTAL	IN HOSPITAL			NOT IN HOSPITAL			Subtotal
		In-patient ^a	Out-patient ^a	Died on arrival	Status Unknown	Nursing home ^a	Residence	
TOTAL, ALL CAUSES	56,480	12,327	3,152	31	19,098	34,608	7,590	4,835
Diseases of heart	11,820	2,428	974	11	4,511	7,924	1,066	1,024
Coronary heart disease	8,848	1,615	813	10	3,560	5,998	686	752
Malignant neoplasms	11,801	1,744	176	0	5,467	7,387	2,606	645
Malignant neoplasm of trachea, bronchus and lung	2,689	411	44	0	1,258	1,713	581	137
Malignant neoplasm of colon, rectum, and anus	1,069	145	14	0	506	665	239	59
Malignant neoplasm of breast	853	105	12	0	383	500	192	55
Malignant neoplasm of prostate	697	78	6	0	338	422	120	57
Malignant neoplasm of cervix uteri	80†	8	*	0	38	50†	26	*
Accidents (unintentional injury)	3,900†	883	566	*	885	2,340†	369	165
Accidental poisoning	1,250†	133	185	0	611	929	*	*
Falls	1,103	375	42	0	136	553	317	130
Motor vehicle accidents	970†	227	246	*	480†	30	11	446
Accidental drowning and submersion	110†	16	29	*	17	60†	*	0
Chronic lower respiratory diseases	3,790†	782	134	*	1,404	2,320†	601	325
Alzheimer's disease	3,081	62	9	0	773	844	309	647
Cerebrovascular diseases	2,540†	596	53	*	561	1,210†	585	306
Diabetes	2,013	514	200	0	780	1,494	198	153
Intentional self-harm (suicide)	1,260†	93	94	*	661	850†	8	*
Chronic liver disease and cirrhosis	1,170†	405	33	*	332	770†	237	88
Essential (primary) hypertension & hypertensive renal disease	1,010†	197	73	*	326	600†	129	130
Influenza and pneumonia	860†	536	45	*	93	680†	104	46
Parkinson's disease	710†	33	*	0	238	270†	84	117
Septicemia	505	378	17	0	30	425	41	25
Nephritis, nephrotic syndrome and nephrosis	485	158	15	0	146	319	37	76
Assault (homicide)	420†	66	89	*	84	240†	*	172
Human immunodeficiency virus (HIV) disease	100†	54	*	0	14	70†	16	*
Injury by firearms	1,080†	89	127	*	496	710†	*	*
Drug-induced deaths	1,463	188	214	0	720	1,122	30	8
Opioid-induced deaths^{††}	740†	64	105	0	405	574	*	*
Alcohol-induced deaths	1,310†	379	62	*	454	900†	203	66

Notes: * Cell suppressed due to count less than 6; † Sum rounded to nearest tens unit due to addend less than 6; ^a Includes Emergency Room; ^b Includes other long-term care facilities; ^c Includes hospices; ^{††} First ever published sub-category of drug-induced deaths.



2C.

AGE-SPECIFIC MORTALITY

Six age-specific profiles of mortality are given on the following pages. The six developmental periods in the life span are:

- **Infants** less than one year of age
- **Children** 1 to 14 years old
- **Adolescents** or persons 15 to 19 years old
- **Young adults** or persons 20 to 44 years old
- **Middle-aged adults** or persons 45 to 64 years old
- **Elderly** or persons 65 years or older.

For each age group, cause-specific mortality is compared between urban (i.e., Maricopa, Pima, Pinal, and Yuma counties) and rural (all other counties) regions and between genders. Urban and rural regions also are compared in gender-specific total mortality.

A comparison of age-specific mortality for causes of death is provided in **Table 2C-27**. A comparison of age-specific mortality rates is presented in **Table 2C-28**.

2C. AGE-SPECIFIC MORTALITY

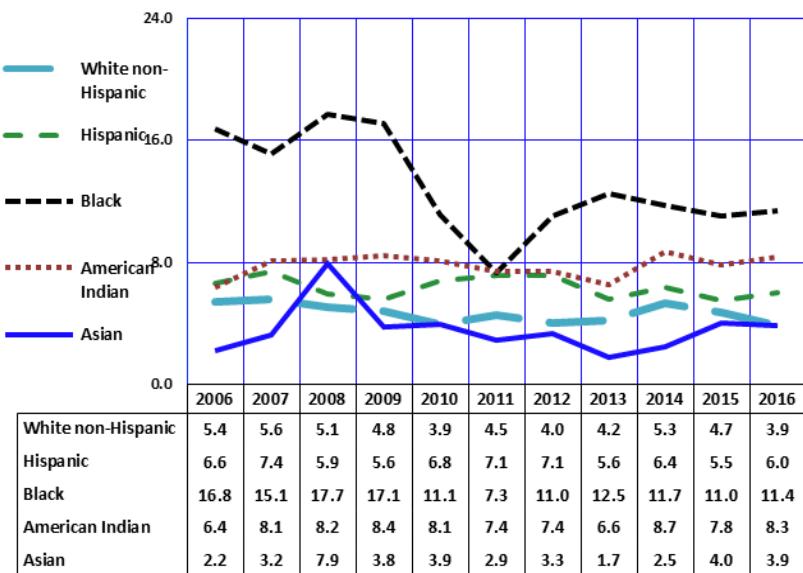
Infant mortality

Figure 2C-1
Infant Mortality Rates by Neonatal/Postneonatal Age and Year,
Arizona, 2006-2016



Notes: Neonatal deaths are those infants age 0-27 days; Post-neonatal are deaths to infants age 28 days-1 year.

Figure 2C-2
Infant Mortality Rates^a by Race/Ethnicity and Year,
Arizona, 2006-2016



Note: ^a Number of infant deaths per 1,000 live births in specified group.

Infant mortality is defined as the number of deaths within the first year of life. The infant mortality rate is computed as the number of infant deaths in a calendar year per 1,000 live births recorded for the same period.

In 2016, 454 Arizona infants died before reaching their first birthday, 247 fewer than the latest peak of 701 infant deaths in 2007, and a decrease of 19 deaths in comparison to 2015 (**Table 2C-2**).

Even if the infant mortality rate remained the same as it was in 2007, 120 fewer infant deaths can be attributed to the absolute reduction in the number of births by 18,283 from 2007 to 2016 $((18,283 \times 6.8)/1,000) = 124$.

Based on the actual number of infant deaths and live births in 2016, the infant mortality decreased by 3.3 percent from 5.6/1,000 in 2015 to 5.4/1,000 in 2016 (**Figure 2C-1**).

In 2016, 89.2 percent (405/454)* of all infant death records were successfully matched to their corresponding birth records.

The mortality risk for infants varies by race/ethnicity. Infants of Asian or Pacific Islander mothers, followed by infants of White non-Hispanic mothers had the lowest infant mortality rates among the racial/ethnic groups in 2016 (**Figure 2C-2, Table 2C-2**).

In 2016, Black or African American infants had the worst survival chances among the ethnic groups (**Figure 2C-2**). American Indian and Hispanic or Latino infants also had elevated mortality rates.

*Infant death records that were not linked to their corresponding birth certificates include unrecorded home births (i.e., no birth certificate was issued) and out-of-State births (i.e., the State issuing the certificate of birth did not send a copy to Arizona).

2C. AGE-SPECIFIC MORTALITY

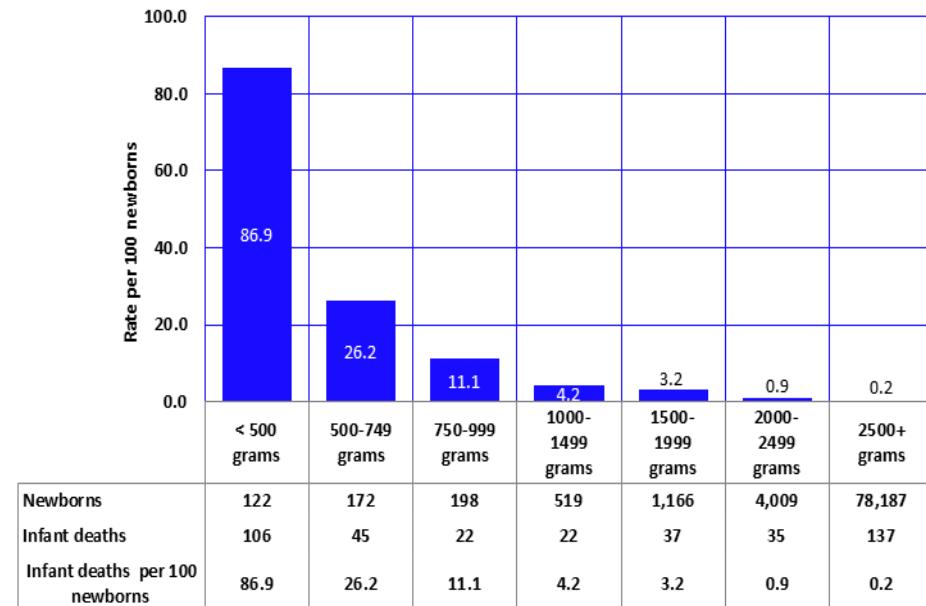
Infant mortality

Newborn weight at birth is one of the most important predictors of an infant's survival chances. In 2016, the mortality rate among babies weighing less than 500 grams at birth was 86.9 per 100 live births (**Figure 2C-3**).

The absolute number of low birthweight births remained lower in 2016 at 6,186 than at its peak in 2007 (7,285). The proportion of babies whose weight at birth was less than 1,000 grams increased from 7.4 percent of all low birthweight births in 2015 to 8.0 percent in 2016 (**Table 1B-3**).

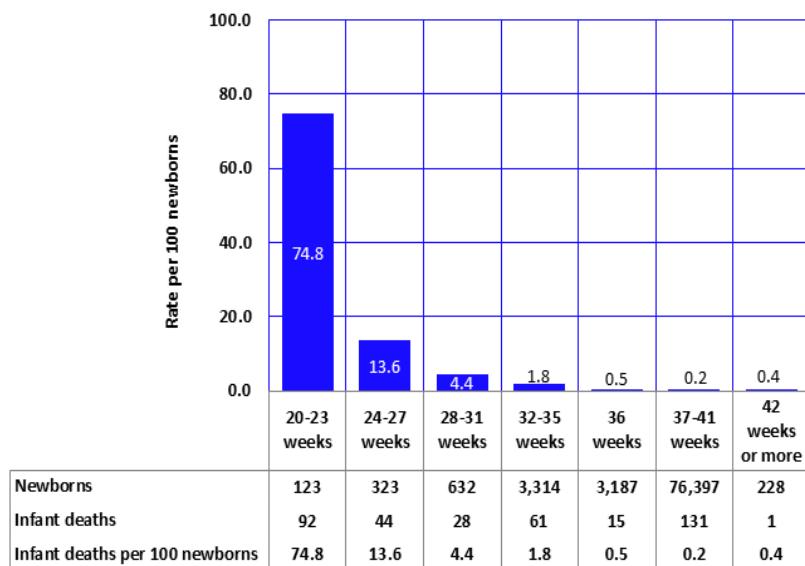
Together, infants weighing less than 1,500 grams accounted for 1.2 percent of births and 48.1 percent of all infant deaths with a matching birth record.

Figure 2C-3
Proportion of Infant Deaths by Birthweight, Arizona, 2016



Note: 31 cases in the complete 2016 birth file had missing birthweight estimates.

Figure 2C-4
Proportion of Infant Deaths by Gestational Age, Arizona, 2016

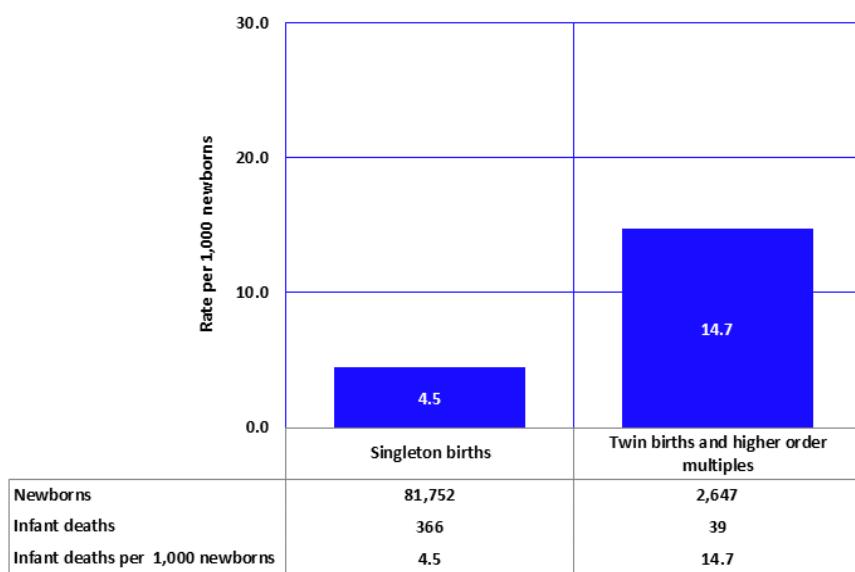


Note: 200 cases in the complete 2016 birth file had missing gestational age estimates and <20 weeks gestation, 33 of which were missing in the linked infant death file.

2C. AGE-SPECIFIC MORTALITY

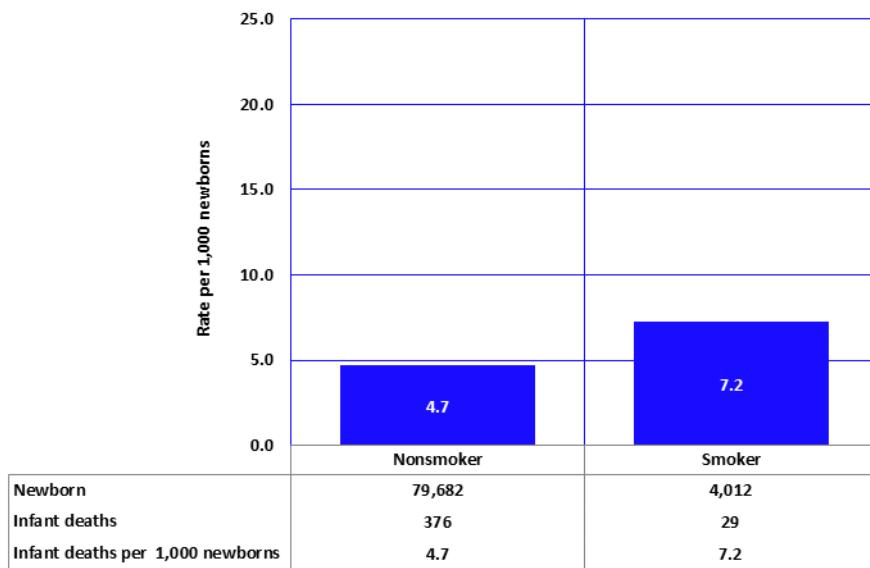
Infant mortality

Figure 2C-4.2
Infant Mortality Rates for Single and Multiple Births, Arizona, 2016



Note: 5 cases in the complete 2016 birth file were missing plurality.

Figure 2C-4.3
Infant Mortality Rates by Mother's Smoking Status during Pregnancy, Arizona, 2016



Note: 710 cases in the complete 2016 birth file were missing mothers' smoking status.

As already noted in Section 1B, infants born in multiple deliveries tend to be born at shorter gestations and smaller than those in singleton deliveries. In 2016, infants born in multiple deliveries were 12.0 times more likely (45.3 vs. 3.7 percent) to be born earlier than expected (at less than 37 completed weeks of gestation) and smaller (at less than 2,500 grams) than singleton births (**Figure 1B-10**).

The infant mortality rate for single births was 4.5/1,000 live births in 2016 (**Figure 2C-4.2**). The infant mortality rate for twin births or higher order multiples was 14.7/1,000 live births.

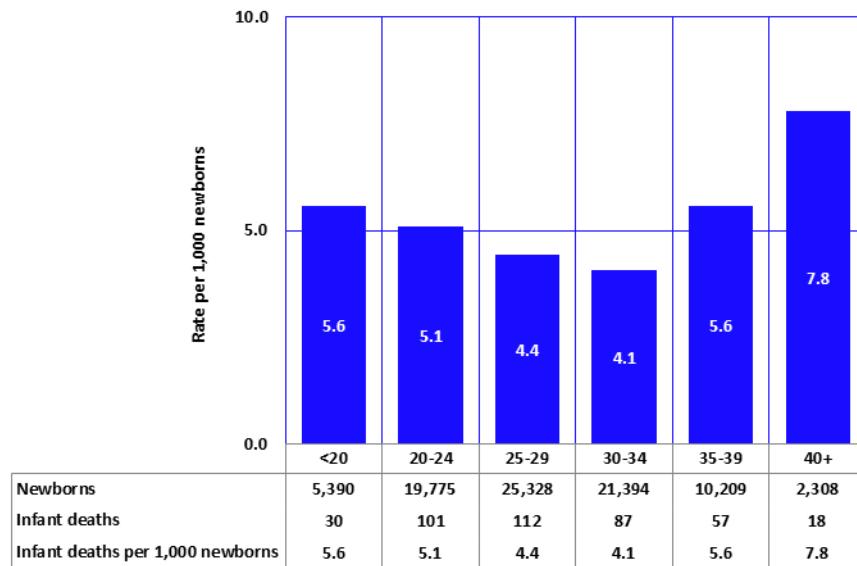
Babies born in multiple deliveries accounted for 3.1 percent of births (**Table 1B-16**), but 14.7 percent of all infant deaths in Arizona in 2016 (only those with matching birth and death records).

Smoking during pregnancy has been shown to increase the risk of preterm delivery, low birth weight and infant mortality. In 2016, among the 4,012 mothers who smoked during pregnancy, the risk of infant mortality was 1.5 times higher than among nonsmoker mothers (**Figure 2C-4.3**).

2C. AGE-SPECIFIC MORTALITY

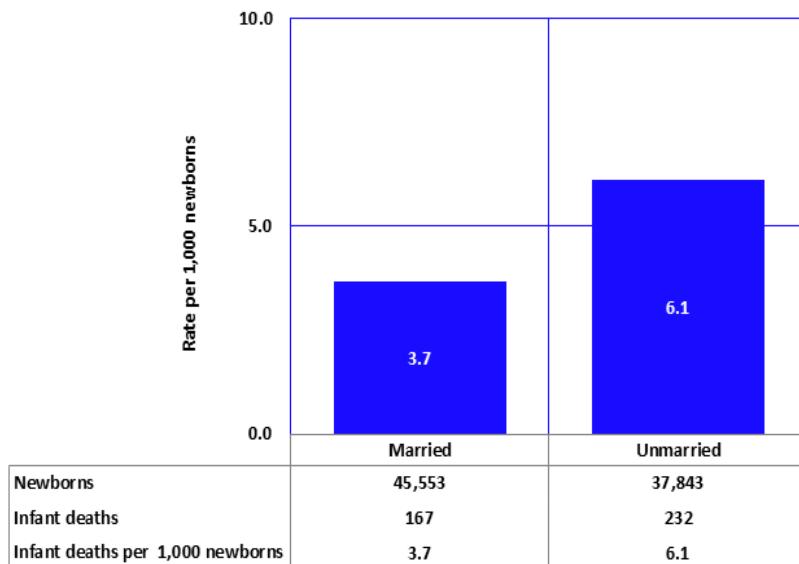
Infant mortality

Figure 2C-4.4
Infant Mortality Rates by Mother's Age Group, Arizona, 2016



Note: 0 cases in the complete 2016 birth file were missing mother's age.

Figure 2C-4.5
Infant Mortality Rates by Mother's Marital Status, Arizona, 2016



Note: 1,008 cases in the complete 2016 birth file were missing mother's marital status.

**TABLE 2C-1 (CORRECTION)
INFANT, NEONATAL, AND POSTNEONATAL MORTALITY RATES AND PERCENT OF POSTNEONATAL DEATHS,
UNITED STATES, ARIZONA AND URBAN/RURAL COUNTIES OF ARIZONA, 2006-2016**

UNITED STATES	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
Infant mortality ^a	6.7	6.7	6.7	6.4	6.1	6.0	6.0	6.0	5.8	5.8	5.8
Neonatal mortality ^a	4.5	4.4	4.3	4.2	4.0	4.0	4.0	4.0	3.9	3.9	3.8
Postneonatal mortality ^a	2.2	2.3	2.3	2.2	2.1	2.0	2.0	2.0	1.8	1.9	2.0
Percent postneonatal mortality ^b	32.8	34.3	34.3	33.3	34.4	33.3	33.3	33.3	31.0	32.8	34.5
ARIZONA, STATEWIDE TOTAL											
Infant mortality ^a	6.3	6.8	6.3	5.9	6.0	5.9	5.8	5.3	6.2	5.6	5.4
Neonatal mortality ^a	4.3	4.7	4.2	3.9	3.8	3.9	3.9	3.4	4.1	3.5	3.6
Postneonatal mortality ^a	2.0	2.2	2.1	2.0	2.2	2.0	1.9	1.9	2.1	2.1	1.8
Percent postneonatal mortality ^b	31.5	32.4	33.3	34.0	36.7	34.3	32.9	35.3	33.4	37.8	33.7
URBAN COUNTIES											
Infant mortality ^a	6.3	6.6	6.3	5.9	5.7	5.8	5.7	5.2	6.1	5.3	5.2
Neonatal mortality ^a	4.3	4.6	4.3	4.0	3.7	3.9	3.9	3.3	4.0	3.3	3.5
Postneonatal mortality ^a	2.0	2.0	2.0	2.0	1.9	1.9	1.8	2.1	2.0	1.7	
Percent postneonatal mortality ^b	31.3	30.3	31.8	33.0	35.1	32.6	32.9	35.1	34.1	37.4	32.5
RURAL COUNTIES											
Infant mortality ^a	6.3	8.0	6.2	5.5	7.4	6.6	5.9	5.8	6.6	7.3	5.6
Neonatal mortality ^a	4.3	4.8	3.5	3.9	4.5	3.7	3.9	3.7	4.5	4.4	3.1
Postneonatal mortality ^a	2.0	3.3	2.7	2.0	2.9	2.9	2.0	2.2	2.1	3.0	2.4
Percent postneonatal mortality ^b	32.6	41.3	43.6	38.7	37.7	43.8	33.8	37.3	31.6	40.5	43.8

Notes: ^a Rates per 1,000 live births; the U.S. rates are from the National Center for Health Statistics; ^b Total infant mortality = 100 percent; Urban = Maricopa, Pima, Pinal, and Yuma Counties; the remaining counties comprise Arizona's rural areas; records with unknown county of residence are included in the statewide totals, but are not distributed by urban/rural area.

TABLE 2C-2
NUMBER AND RATE^a OF INFANT DEATHS BY RACE/ETHNICITY AND GENDER, ARIZONA, 2006-2016
NUMBER OF INFANT DEATHS

	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
White non-Hispanic											
Total	232	237	215	192	151	171	154	161	213	181	146
Male	119	135	114	109	88	98	81	93	122	99	87
Female	113	102	101	83	63	73	73	68	91	82	59
Hispanic or Latino											
Total	297	338	251	215	235	229	236	185	216	189	203
Male	173	186	142	115	144	122	138	97	108	94	111
Female	124	152	109	100	91	107	98	88	108	95	92
Black or African American											
Total	65	63	76	75	48	32	52	59	53	48	50
Male	36	42	42	41	20	16	22	30	35	24	23
Female	29	21	34	34	28	16	30	29	18	24	27
American Indian or Alaska Native											
Total	41	52	52	47	43	41	36	45	39	42	
Male	28	29	27	28	15	22	19	24	21	21	22
Female	13	23	25	24	19	28	19	17	21	18	20
Asian or Pacific Islander											
Total	10†	10†	27	13	10†	10†	10†	10†	10†	10†	13
Male	*	*	7	15	6	9	8	*	6	*	7
Female	*	*	*	12	7	*	*	*	*	*	6
All groups^b											
Total	642	701	625	547	519	504	495	447	535	473	454
Male	361	399	343	302	267	271	242	295	243	250	
Female	281	302	282	248	217	237	224	205	240	230	204

INFANT MORTALITY RATES

	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
White non-Hispanic											
Total	5.4	5.6	5.1	4.8	3.9	4.5	4.0	4.2	5.3	4.7	3.9
Male	5.4	6.3	5.3	5.4	4.4	5.0	4.1	4.7	5.9	5.0	4.5
Female	5.4	4.9	4.9	4.3	3.3	3.9	3.9	3.7	4.7	4.4	3.2
Hispanic or Latino											
Total	6.6	7.4	5.9	5.6	6.8	7.1	7.1	5.6	6.4	5.5	6.0
Male	7.5	7.9	6.5	5.8	8.3	7.3	8.1	5.7	6.2	5.4	6.4
Female	5.7	6.8	5.2	5.3	5.4	6.8	6.1	5.5	6.6	5.6	5.5
Black or African American											
Total	16.8	15.1	17.7	17.1	11.1	7.3	11.0	12.5	11.7	11.0	11.4
Male	18.3	19.5	18.7	18.0	9.1	7.3	9.2	12.3	14.9	10.7	10.3
Female	15.3	10.5	16.6	16.2	13.1	7.4	12.8	12.7	8.3	11.3	12.5
American Indian or Alaska Native											
Total	6.4	8.1	8.2	8.4	8.1	7.4	7.4	6.6	8.7	7.8	8.3
Male	8.8	9.0	8.5	9.0	9.5	5.1	7.8	6.7	9.4	8.3	8.7
Female	4.1	7.2	7.9	7.8	6.6	9.7	6.9	6.4	8.1	7.3	8.0
Asian or Pacific Islander											
Total	2.2	3.2	7.9	3.8	3.9	2.9	3.3	1.7	2.5	4.0	3.9
Male	**	3.9	8.5	3.4	5.4	4.4	4.2	**	3.7	**	4.0
Female	**	7.2	4.3	**	**	**	**	**	**	5.7	3.7
All groups^b											
Total	6.3	6.8	6.3	5.9	6.0	5.9	5.8	5.3	6.2	5.6	5.4
Male	6.9	7.6	6.8	6.3	6.1	6.2	5.5	6.6	5.6	5.8	
Female	5.6	6.0	5.8	5.5	5.1	5.7	5.4	5.0	5.7	5.5	4.9

Notes: * Cell suppressed due to count less than 6; ** Cell rounded to nearest tens unit due to addend less than 6;^a Number of infant deaths per 1,000 live births in specified ethnic/gender group; infant deaths are by the race/ethnicity of the decedent; For consistency with the national data, the denominators used to calculate infant mortality rates were changed from race/ethnicity of parents to race/ethnicity of mother as stated on the birth certificate; The change in the basis for calculating infant mortality rates results in lower rates for white infants and higher rates for most minority infants than when they are computed by the previous method;^b Includes records with other and unknown ethnic group.

TABLE 2C-3
NUMBER AND RATE^a OF INFANT DEATHS BY RACE/ETHNICITY AND AGE GROUP, 2006-2016
NUMBER OF INFANT DEATHS

		2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
White non-Hispanic	Total	232	237	215	192	151	171	154	161	213	181	146
	Neonatal	161	161	138	129	96	120	100	97	138	108	92
	Postneonatal	71	76	77	63	55	51	54	64	75	73	54
Hispanic or Latino	Total	297	338	251	215	235	229	236	185	216	189	203
	Neonatal	213	239	175	150	156	152	170	131	149	130	142
	Postneonatal	84	99	76	65	79	77	66	54	67	59	61
Black or African American	Total	65	63	76	75	48	32	52	59	53	48	50
	Neonatal	37	43	51	46	32	20	34	38	34	25	33
	Postneonatal	28	20	25	29	16	12	18	21	19	23	17
American Indian or Alaska Native	Total	41	52	52	52	47	43	41	36	45	39	42
	Neonatal	26	27	29	26	22	19	21	20	26	16	21
	Postneonatal	15	25	23	26	25	24	20	16	19	23	21
Asian or Pacific Islander	Total	10†	10†	30†	10†	10†	10	10†	10†	10†	10†	13
	Neonatal	*	*	9	22	10	11	10	7	*	7	12
	Postneonatal	*	*	*	*	*	*	0	*	*	*	0
All groups^b	Total	642	701	625	547	519	504	495	447	535	473	454
	Neonatal	440	479	419	361	330	331	332	289	354	294	301
	Postneonatal	202	222	206	186	189	173	163	158	181	179	153

INFANT MORTALITY RATES

		2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
White non-Hispanic	Total	5.4	5.6	5.1	4.8	3.9	4.5	4.0	4.2	5.3	4.7	3.9
	Neonatal	3.7	3.8	3.3	3.2	2.5	3.1	2.6	2.5	3.4	2.8	2.4
	Postneonatal	1.7	1.8	1.8	1.6	1.4	1.3	1.4	1.7	1.9	1.9	1.4
Hispanic or Latino	Total	6.6	7.4	5.9	5.6	6.8	7.1	7.1	5.6	6.4	5.5	6.0
	Neonatal	4.7	5.2	4.1	3.9	4.5	4.7	5.1	4.0	4.4	3.8	4.2
	Postneonatal	1.9	2.2	1.8	1.7	2.3	2.4	2.0	1.6	2.0	1.7	1.8
Black or African American	Total	16.8	15.1	17.7	17.1	11.1	7.3	11.0	12.5	11.7	11.0	11.4
	Neonatal	9.6	10.3	11.9	10.5	7.4	4.6	7.2	8.0	7.5	5.7	7.5
	Postneonatal	7.2	4.8	5.8	6.6	3.7	2.7	3.8	4.4	4.2	5.3	3.9
American Indian or Alaska Native	Total	6.4	8.1	8.2	8.4	8.1	7.4	7.4	6.6	8.7	7.8	8.3
	Neonatal	4.0	4.2	4.6	4.2	3.8	3.3	3.8	3.7	5.1	3.2	4.2
	Postneonatal	2.4	3.9	3.6	4.2	4.3	4.1	3.6	2.9	3.7	4.6	4.2
Asian or Pacific Islander	Total	2.2	3.2	7.9	3.8	3.9	2.9	3.3	1.7	2.5	4.0	3.9
	Neonatal	**	2.6	6.4	2.9	3.3	2.9	1.9	**	2.2	3.7	3.9
	Postneonatal	**	**	**	**	0.0	**	**	**	**	0.0	0.0
All groups^b	Total	6.3	6.8	6.3	5.9	6.0	5.9	5.8	5.3	6.2	5.6	5.4
	Neonatal	4.3	4.7	4.2	3.9	3.8	3.9	3.9	3.4	4.1	3.5	3.6
	Postneonatal	2.0	2.2	2.1	2.0	2.2	2.0	1.9	1.9	2.1	2.1	1.8

Notes: * Cell suppressed due to count less than 6; ** Cell suppressed due to rate/ratio/percent based on non-zero count less than 6; † Sum rounded to nearest tens unit due to addend less than 6; ^a Number of infant deaths per 1,000 live births in specified ethnic/gender group; infant deaths are by the race/ethnicity of the decedent; for consistency with the national data, the denominators used to calculate infant mortality rates were changed from race/ethnicity of parents to race/ethnicity of mother as stated on the birth certificate; the change in the basis for calculating infant mortality rates results in lower rates for white infants and higher rates for most minority infants than when they are computed by the previous method; ^b Includes records with other and unknown ethnic group.

TABLE 2C-4
**NEONATAL, POSTNEONATAL, AND TOTAL INFANT MORTALITY BY CHILD'S GENDER AND MOTHER'S RACE/ETHNICITY,
ARIZONA, 2016**

		NUMBER OF DEATHS BY AGE			MORTALITY RATES ^a		
		Total	Neonatal	Postneonatal	Total	Neonatal	Postneonatal
TOTAL, ALL GROUPS		454	301	153	5.4	3.6	1.8
Male		250	161	89	5.8	3.7	2.1
Female		204	140	64	4.9	3.4	1.5
White non-Hispanic		146	92	54	3.9	2.4	1.4
Male		87	47	40	4.5	2.4	2.1
Female		59	45	14	3.2	2.4	0.8
Hispanic or Latino		203	142	61	6.0	4.2	1.8
Male		111	78	33	6.4	4.5	1.9
Female		92	64	28	5.5	3.8	1.7
Black or African American		50	33	17	11.4	7.5	3.9
Male		23	16	7	10.3	7.2	3.1
Female		27	17	10	12.5	7.9	4.6
American Indian or Alaska Native		42	21	21	8.3	4.2	4.2
Male		22	13	9	8.7	5.1	3.5
Female		20	8	12	8.0	3.2	4.8
Asian or Pacific Islander		13	13	0	3.9	3.9	0.0
Male		7	7	0	4.0	4.0	0.0
Female		6	6	0	3.7	3.7	0.0

Notes: ^a Number of deaths per 1,000 live births in specified gender group by mother's race/ethnicity; denominators are from Table 5B-8.

TABLE 2C-5
NUMBER OF DEATHS FOR SELECTED LEADING CAUSES OF INFANT MORTALITY^a BY YEAR, ARIZONA, 2006-2016

Causes of death	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
Congenital malformations, deformations and chromosomal abnormalities	142	159	145	122	114	107	118	101	121	117	105
of brain, spinal cord or nervous system	28	20	24	15	21	13	19	13	24	20	14
of respiratory system	9	9	*	*	9	*	6	*	*	8	7
Short gestation and low birth weight	93	95	91	101	64	60	62	56	63	53	55
Maternal complications	42	30	53	31	27	33	46	28	39	39	28
Accidents (unintentional injuries)	17	30	19	18	18	23	16	14	27	29	16
Sudden infant death syndrome	37	43	21	42	34	25	13	14	13	15	7
Intrauterine hypoxia or birth asphyxia	7	11	11	*	*	11	*	6	9	*	6
Respiratory distress syndrome	12	8	11	8	7	*	*	*	*	*	*
Influenza and pneumonia	13	*	*	10	*	*	*	*	*	*	*
Assault (homicide)	11	12	*	*	6	6	*	*	6	*	*
Total, all causes	642	701	625	547	519	504	495	447	535	473	454

Notes: * Cell suppressed due to count less than 6; ^a Leading causes of infant mortality are based on the list of 130 causes of infant death according to the Tenth Revision, International Classification of Diseases (ICD-10).

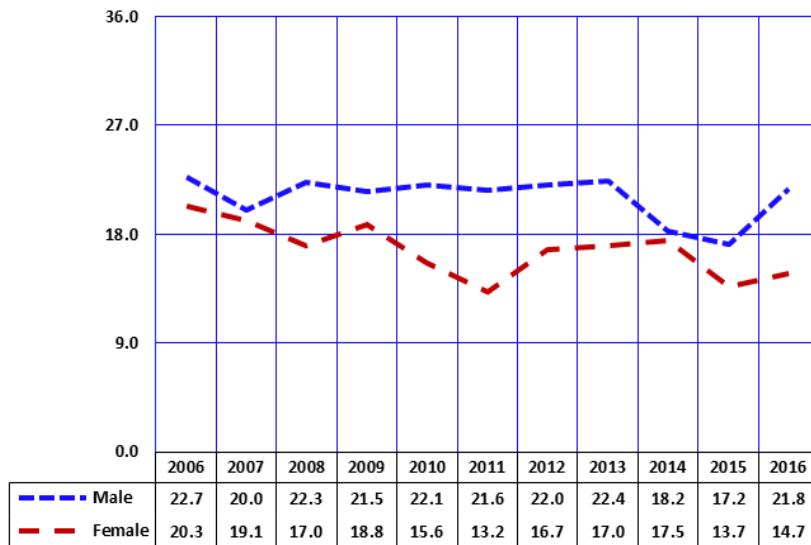
TABLE 2C-6
INFANT MORTALITY RATES^a FOR SELECTED LEADING CAUSES OF DEATH BY YEAR, ARIZONA, 2006-2016

Causes of death	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
Congenital malformations, deformations and chromosomal abnormalities	1.4	1.5	1.5	1.3	1.3	1.3	1.4	1.2	1.4	1.4	1.2
of brain, spinal cord or nervous system	0.3	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.3	0.2	0.2
of respiratory system	0.1	0.1	**	**	0.1	**	0.1	**	**	0.1	0.1
Short gestation and low birth weight	0.9	0.9	0.9	1.1	0.7	0.7	0.7	0.7	0.7	0.6	0.7
Maternal complications	0.4	0.3	0.5	0.3	0.3	0.4	0.5	0.3	0.5	0.5	0.3
Accidents (unintentional injuries)	0.2	0.3	0.2	0.2	0.2	0.3	0.2	0.2	0.2	0.3	0.2
Sudden infant death syndrome	0.4	0.4	0.2	0.4	0.4	0.3	0.2	0.2	0.2	0.2	0.1
Intrauterine hypoxia or birth asphyxia	0.1	0.1	0.1	**	**	0.1	**	0.1	0.1	**	0.1
Respiratory distress syndrome	0.1	0.1	0.1	0.1	0.1	**	**	**	**	**	**
Influenza and pneumonia	0.1	**	**	0.1	**	**	**	**	**	**	**
Assault (homicide)	0.1	0.1	**	**	0.1	0.1	**	**	0.1	**	**
Total, all causes	6.3	6.8	6.3	5.9	6.0	5.9	5.8	5.3	6.2	5.6	5.4

Notes: ** Cell suppressed due to rate/ratio/percent based on non-zero count less than 6;^a Number of infant deaths per 1,000 live births; leading causes of infant mortality are based on the list of 130 causes of infant death according to the Tenth Revision, International Classification of Diseases (ICD-10).

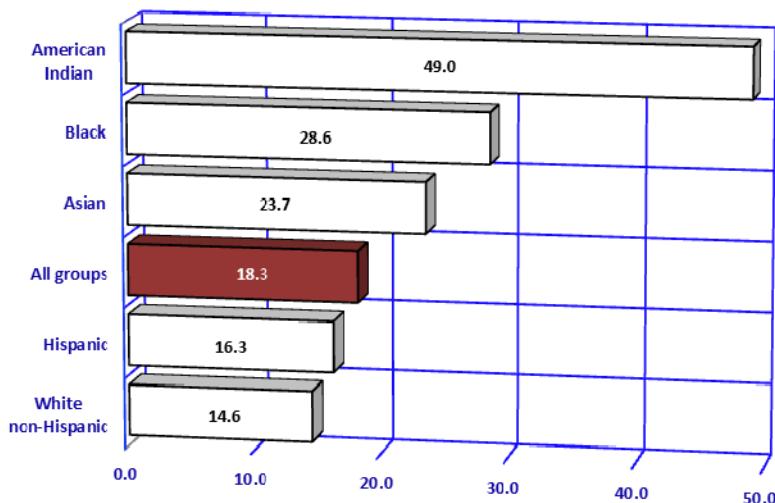
2C.AGE-SPECIFIC MORTALITY Childhood mortality (ages 1-14 years)

Figure 2C-5
**Mortality Rates^a by Gender and Year among Children 1-14 Years,
Arizona, 2006-2016**



Note: ^a Number of deaths per 100,000 persons, 1-14 years old in specified group.

Figure 2C-6
**Mortality Rates^a by Race/Ethnicity among Children 1-14 Years,
Arizona, 2016**



Note: ^a Number of deaths per 100,000 persons, 1-14 years old in specified group.

In 2016, a total of 231 deaths were recorded among 1,262,086 children aged 1-14 years residing in Arizona. The 2016 childhood mortality rate of 18.3 per 100,000 was 18.5 percent higher than the 2015 mortality rate of 15.4 (**Table 2C-7**). The mortality rate increased for both male and female children between 2015 and 2016 (**Figure 2C-5, Table 2C-7**).

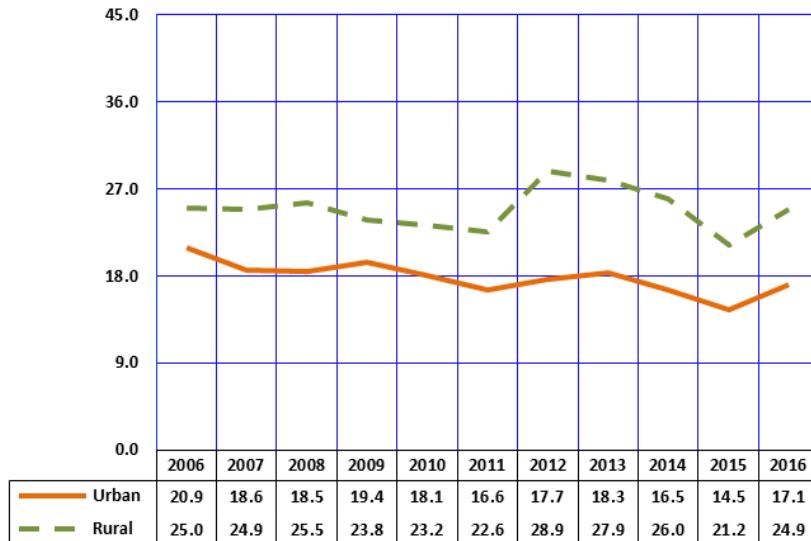
The five causes with the greatest mortality rates in childhood from 2006-2016 were *accidents (unintentional injuries)*, *malignant neoplasms*, *congenital malformations*, *homicide*, and *suicide* (**Table 2C-7**).

American Indian children had the highest 2016 total mortality rate (49.0 deaths per 100,000) followed by Black or African American children (28.6/100,000; **Figure 2C-6**). The mortality rates of Asian, White non-Hispanic, and Hispanic or Latino children were lower than the average rate for all groups.

It is important to note that the mortality rate for Asians is based on a very low death count (**Table 2C-10**) thus not statistically reliable. In 2015, there were approximately 16 children who died of accidental drowning and submersion, around 16 children who died of assault, and 12 completed *suicides* of children aged 1-14 years (**Table 2C-10**).

2C.AGE-SPECIFIC MORTALITY
Childhood mortality (ages 1-14 years)

Figure 2C-7
**Mortality Rates^a by Urban/Rural Area^b and Year among Children 1-14 Years,
Arizona, 2006-2016**



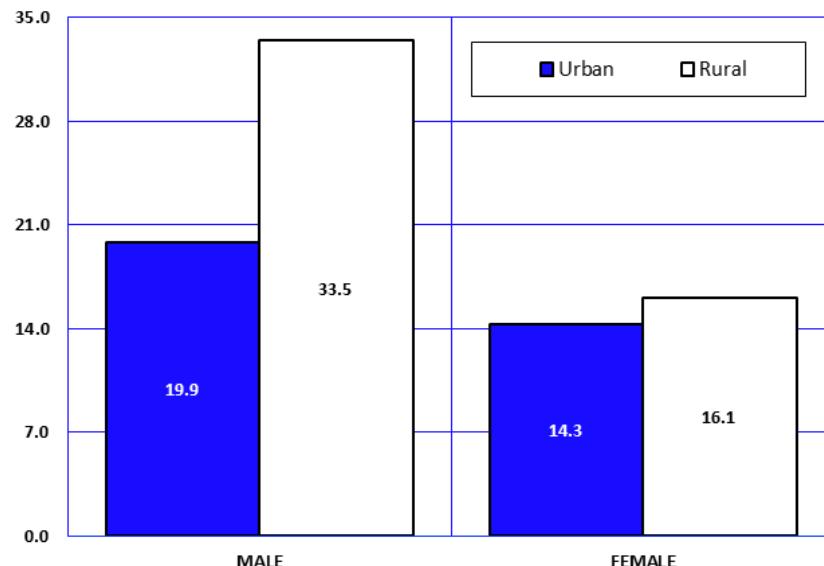
From 2015 to 2016, overall mortality rates increased for both urban and rural children (**Figure 2C-7, Table 2C-8**). From 2006 to 2016, both urban and rural children have witnessed a decrease in mortality rate. The decline was however more markedly among urban children (18.0 percent) than rural children (0.3 percent).

Notes: ^a Number of deaths per 100,000 persons, 1-14 years old in specified group; ^b Urban counties are Maricopa, Pima, Pinal, and Yuma Counties. Rural counties are those remaining.

Figure 2C-8
**Mortality Rates^a by Gender in Urban/Rural^b Areas among Children 1-14 Years,
Arizona, 2016**

From 2015 to 2016, the mortality rate for accidents increased for both urban children and rural children (**Table 2C-8**). In 2016, the mortality rate for unintentional injuries among rural children (10.8/100,000) was 2.2 times greater than the rate among urban children (5.0/100,000; **Table 2C-8**). In the same year, 20 children died of accidental drowning; all of them resided in urban areas (**Table 2C-10**).

Urban females aged 1-14 years old had the lowest mortality risk among gender by area groups in 2016, followed by rural females, urban males, and rural males.



Notes: ^a Number of deaths per 100,000 persons, 1-14 years old in specified group; ^b Urban counties include Maricopa, Pima, Pinal, and Yuma Counties. Rural counties are those remaining.

TABLE 2C-7
**MORTALITY RATES^a FOR THE SELECTED FIVE LEADING CAUSES^b OF DEATH AMONG CHILDREN (1-14 YEARS) BY GENDER,
ARIZONA, 2006-2016**

Gender/Cause	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	% change from 2006
MALE												
Accidents (unintentional injuries)	8.0	8.3	7.8	8.0	8.2	9.6	7.4	8.6	6.5	5.7	7.0	-12.6
Motor vehicle accidents	4.2	4.6	2.5	4.2	3.1	4.0	3.5	4.5	2.5	2.0	4.0	-3.8
Drowning	0.9	1.5	2.9	2.6	2.5	2.6	2.2	1.8	2.2	1.9	2.3	158.9
Other	2.9	2.2	2.4	1.2	2.6	3.1	1.7	2.3	1.9	1.9	0.6	-78.6
Malignant neoplasms	1.7	2.2	2.5	3.1	1.9	1.7	2.8	2.5	1.7	1.7	1.6	-8.6
Congenital malformations	2.3	0.7	1.8	1.5	1.5	1.7	1.8	0.9	0.9	0.9	1.1	-52.7
Assault (homicide)	1.5	1.3	1.2	0.9	2.0	0.9	0.9	1.4	0.9	1.2	0.9	-37.9
Intentional self-harm (suicide)	0.5	0.4	0.9	0.4	1.2	1.1	1.1	0.6	1.1	1.1	0.8	55.4
ALL CAUSES	22.7	20.0	22.3	21.5	22.1	21.6	22.0	22.4	18.2	17.2	21.8	-4.2
(Number of all deaths)	(150)	(134)	(152)	(148)	(143)	(141)	(143)	(146)	(118)	(111)	(140)	(-6.7)
FEMALE												
Accidents (unintentional injuries)	7.8	6.3	4.6	5.5	5.1	3.2	3.7	4.5	3.7	4.3	4.5	-42.0
Motor vehicle accidents	4.1	3.6	2.8	2.9	2.4	1.1	1.8	2.6	2.6	1.9	2.7	-33.0
Other	1.6	1.9	0.9	2.0	1.4	0.8	1.1	0.6	0.6	1.8	1.0	-39.4
Drowning	2.1	0.8	0.9	0.6	1.3	1.3	0.8	1.3	0.5	0.6	0.8	-61.5
Malignant neoplasms	0.9	4.2	2.0	1.8	2.2	2.4	2.4	2.1	2.9	0.5	1.3	43.7
Assault (homicide)	0.8	1.4	0.9	1.8	0.3	1.3	1.1	1.6	1.3	1.3	1.3	61.7
Congenital malformations	2.1	1.3	1.5	1.4	1.6	1.0	2.3	2.4	1.3	2.1	0.6	-69.2
Influenza and pneumonia	0.9	0.2	0.6	0.5	0.3	0.3	0.2	0.2	0.2	0.2	0.2	-82.0
ALL CAUSES	20.3	19.1	17.0	18.8	15.6	13.2	16.7	17.0	17.5	13.7	14.7	-27.5
(Number of all deaths)	(128)	(122)	(110)	(123)	(97)	(83)	(104)	(106)	(109)	(85)	(91)	(-28.9)
TOTAL												
Accidents (unintentional injuries)	7.9	7.3	6.2	6.8	6.7	6.5	5.6	6.6	5.1	5.0	5.8	-26.8
Motor vehicle accidents	4.2	4.1	2.6	3.6	2.8	2.6	2.0	3.5	2.5	2.0	3.4	-18.9
Drowning	1.5	1.1	2.0	1.6	1.9	2.0	1.5	1.6	1.3	1.3	1.6	5.6
Other	2.2	2.1	1.6	1.6	2.0	2.0	1.4	1.5	1.3	1.8	0.8	-64.0
Malignant neoplasms	1.3	3.2	2.3	2.5	2.0	2.0	2.6	2.3	2.3	1.1	1.4	9.7
Assault (homicide)	1.2	1.4	1.1	1.3	1.2	1.1	1.0	1.5	1.1	1.3	1.1	-7.6
Congenital malformations	2.2	1.0	1.7	1.4	1.6	1.3	2.0	1.6	1.1	1.5	0.9	-60.4
Intentional self-harm (suicide)	0.9	0.4	0.6	0.3	0.7	0.9	0.6	0.6	0.9	0.9	0.7	-20.8
ALL CAUSES	21.5	19.5	19.7	20.2	18.9	17.5	19.4	19.8	17.9	15.4	18.3	-14.9
(Number of all deaths)	(278)	(256)	(262)	(271)	(240)	(224)	(247)	(252)	(227)	(196)	(231)	(-16.9)

Notes: ^a Number of deaths per 100,000 children 1-14 years old; ^b The five causes with the greatest number of deaths over the 2006-2016 period; the cause-of-death titles are according to the Tenth Revision of the International Classification of Diseases (ICD-10); the causes of death for 2006-2016 are classified by ICD-10, replacing the Ninth Revision (ICD-9); measures of comparison between ICD-9 and ICD-10 – the “comparability ratios” – for the causes of death shown in this report are provided in the **Technical Notes**.

TABLE 2C-8
**MORTALITY RATES^a FOR THE SELECTED FIVE LEADING CAUSES^b OF DEATH AMONG CHILDREN (1-14 YEARS)
 IN URBAN AND RURAL AREAS^c, ARIZONA, 2006-2016**

Area/Cause	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	% change from 2006
URBAN												
Accidents (unintentional injuries)	7.1	6.5	5.4	6.4	6.0	5.7	4.7	5.5	4.5	4.3	5.0	-29.9
Motor vehicle accidents	3.9	3.2	2.0	3.2	2.5	1.7	1.9	2.6	2.0	1.7	2.6	-33.9
Drowning	1.4	1.3	1.8	1.8	2.2	1.5	1.8	1.4	1.2	1.8	1.8	31.6
Other	1.8	2.0	1.7	1.5	1.7	1.7	1.3	1.1	1.1	1.4	0.6	-69.3
Malignant neoplasms	1.5	3.4	2.6	2.6	2.3	2.1	2.6	2.4	2.3	1.1	1.4	-7.9
Assault (homicide)	1.1	1.4	1.1	1.3	1.3	1.2	0.9	1.5	1.0	1.2	1.1	0.5
Congenital malformations	2.4	0.8	1.7	1.3	1.8	1.3	2.1	1.8	1.0	1.5	0.9	-61.6
Diseases of heart	1.0	0.4	0.4	0.3	0.3	0.4	0.6	0.3	0.3	0.3	0.5	-53.9
ALL CAUSES	20.9	18.6	18.5	19.4	18.1	16.6	17.7	18.3	16.5	14.5	17.1	-18.0
(Number of all deaths)	(28)	(206)	(210)	(221)	(197)	(182)	(192)	(200)	(180)	(158)	(186)	(-18.4)
RURAL												
Accidents (unintentional injuries)	12.0	12.0	10.3	8.8	10.8	11.3	10.9	12.6	8.9	9.5	10.8	-10.3
Motor vehicle accidents	5.5	9.0	6.4	5.8	4.3	7.5	7.1	8.7	5.5	3.3	8.5	54.5
Other	4.5	2.5	1.5	1.9	4.3	3.2	2.2	3.8	2.2	4.5	2.3	-49.6
Drowning	2.0	0.5	2.5	1.0	2.2	0.5	1.6	0.0	1.1	1.7	0.0	-100.0
Malignant neoplasms	0.5	2.0	0.5	1.9	0.5	1.6	2.2	1.6	2.2	1.1	1.7	239.9
Intentional self-harm (suicide)	2.0	0.5	1.5	0.5	1.1	0.5	1.1	1.6	2.2	2.8	1.7	-15.0
Assault (homicide)	1.5	1.0	1.0	1.5	0.5	0.5	1.6	1.6	1.7	1.7	1.1	-24.5
Congenital malformations	1.0	2.0	1.5	1.9	0.5	1.6	1.6	0.5	1.7	1.7	0.6	-43.3
ALL CAUSES	25.0	24.9	25.5	23.8	23.2	22.6	28.9	27.9	26.0	21.2	24.9	-0.3
(Number of all deaths)	(50)	(50)	(52)	(49)	(43)	(42)	(53)	(51)	(47)	(38)	(44)	(-12.0)
TOTAL												
Accidents (unintentional injuries)	7.9	7.3	6.2	6.8	6.7	6.5	5.6	6.6	5.1	5.0	5.8	-26.8
Motor vehicle accidents	4.2	4.1	2.6	3.6	2.8	2.6	2.7	3.5	2.5	2.0	3.4	-18.9
Drowning	1.5	1.1	2.0	1.6	1.9	2.0	1.5	1.6	1.3	1.3	1.6	5.6
Other	2.2	2.1	1.6	1.6	2.0	2.0	1.4	1.5	1.3	1.8	0.8	-64.0
Malignant neoplasms	1.3	3.2	2.3	2.5	2.0	2.0	2.6	2.3	2.3	1.1	1.4	9.7
Assault (homicide)	1.2	1.4	1.1	1.3	1.2	1.1	1.0	1.5	1.1	1.3	1.1	-7.6
Congenital malformations	2.2	1.0	1.7	1.4	1.6	1.3	2.0	1.6	1.1	1.5	0.9	-60.4
Intentional self-harm (suicide)	0.9	0.4	0.6	0.3	0.7	0.9	0.6	0.6	0.9	0.9	0.7	-20.8
ALL CAUSES	21.5	19.5	19.7	20.2	18.9	17.5	19.4	19.8	17.9	15.4	18.3	-14.9
(Number of all deaths)	(278)	(256)	(262)	(271)	(240)	(224)	(247)	(252)	(227)	(196)	(231)	(-16.9)

Notes: ^a Number of deaths per 100,000 children 1-14 years old; ^b The five causes with the greatest number of deaths over the 2006-2016 period; ^c Urban = Maricopa, Pima, Pinal, and Yuma counties; the remaining counties comprise Arizona's rural areas; see **Technical Notes** for more information; records with unknown county of residence are included in the statewide totals, but are not distributed by urban/rural area; the cause-of-death titles are according to the Tenth Revision of the International Classification of Diseases (ICD-10); the causes of death for 2006-2016 are classified by ICD-10, measures of comparison between ICD-9 and ICD-10 - the "comparability ratios" - for the causes of death shown in this report are provided in the **Technical Notes**.

TABLE 2C-9
MORTALITY RATES^a FOR THE SELECTED FIVE LEADING CAUSES OF DEATH AMONG CHILDREN (1-14 YEARS) BY GENDER
IN URBAN AND RURAL AREAS^b, ARIZONA, 2006-2016

Area/Gender	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	% change from 2006
URBAN												
Male	22.2	19.2	21.1	20.6	20.0	20.8	20.0	21.3	16.2	19.9	-10.6	
Female	19.5	18.0	15.9	18.2	16.2	12.3	15.2	16.8	12.7	14.3	-26.7	
TOTAL	20.9	18.6	18.5	19.4	18.1	16.6	17.7	18.3	16.5	14.5	17.1	-18.0
RURAL												
Male	25.5	24.4	27.9	25.7	33.9	26.4	32.1	29.0	30.5	23.1	33.5	31.3
Female	24.4	25.4	23.0	21.8	12.1	18.7	25.5	26.6	21.3	19.3	16.1	-34.0
TOTAL	25.0	24.9	25.5	23.8	23.2	22.6	28.9	27.9	26.0	21.2	24.9	-0.3
TOTAL												
Male	22.7	20.0	22.3	21.5	22.1	21.6	22.0	22.4	18.2	17.2	21.8	-4.2
Female	20.3	19.1	17.0	18.8	15.6	13.2	16.7	17.0	17.5	13.7	14.7	-27.5
TOTAL	21.5	19.5	19.7	20.2	18.9	17.5	19.4	19.8	17.9	15.4	18.3	-14.9

Notes: ^a Rates are presented per 100,000 children 1-14 years old; ^b Urban = Maricopa, Pima, Pinal, and Yuma counties; the remaining counties comprise Arizona's rural areas; records with unknown county of residence are included in the statewide totals, but are not distributed by urban/rural area.

**TABLE 2C-10
LEADING CAUSES OF DEATH AMONG CHILDREN (1-14 YEARS) BY GENDER, AREA, AND RACE/ETHNICITY, ARIZONA, 2016**

Cause of death	Gender	Area ^a		Race/ethnicity
		Urban	Rural	
Accidents (unintentional injury)	Total	70†	45	28
	Male			Female
		28	54	19
Motor vehicle accidents	Total	40†	26	17
	Male			Female
		15	*	20
Accidental drowning and submersion	Total	20†	15	*
	Male			Female
		0	20	0
Malignant neoplasms	Total	20†	10	8
	Male			Female
		*	15	*
Leukemia	Total	10†	*	6
	Male			Female
		*	6	*
Assault (homicide)	Total	10†	6	8
	Male			Female
		*	12	*
By other means	Total	10†	6	7
	Male			Female
		*	7	*
By discharge of firearms	Total	10†	0	*
	Male			Female
		*	0	*
Congenital malformations	Total	10†	7	*
	Male			Female
		*	10	*
Intentional self-harm (suicide)	Total	10†	*	6
	Male			Female
		*	*	*
Influenza and pneumonia	Total	10†	*	*
	Male			Female
		*	*	*
Chronic lower respiratory diseases	Total	0†	*	*
	Male			Female
		*	*	*
Asthma	Total	0†	*	0
	Male			Female
		*	0	*
Total, all causes	Total	231	140	91
	Male			Female
		186	44	77
		*	*	*
		77	90	21
		*	*	*
		90	21	33
		*	*	*
		10	10	10

Notes: * Cell suppressed due to count less than 6; † Sum rounded to nearest tens unit due to addend less than 6; ^a Urban = Maricopa, Pima, Pinal, and Yuma counties; the remaining counties comprise Arizona's rural areas.

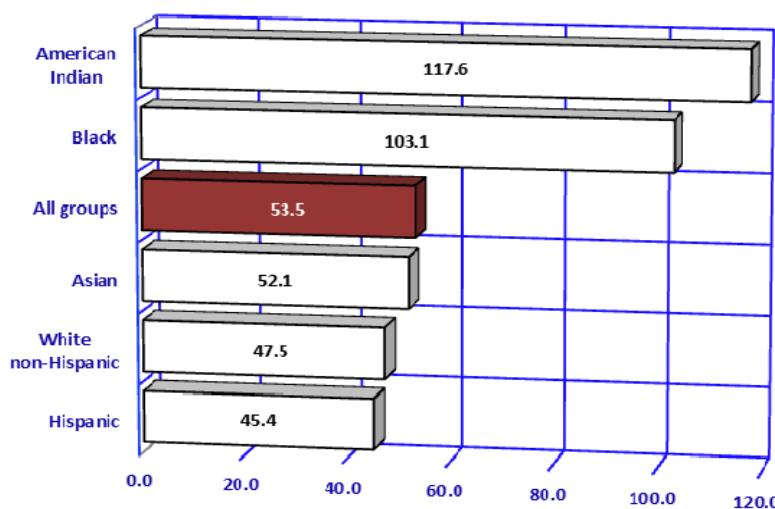
2C.AGE-SPECIFIC MORTALITY Adolescent mortality (ages 15-19 years)

Figure 2C-9
**Mortality Rates^a by Gender and Year among Adolescents 15-19 Years,
Arizona, 2006-2016**



Notes: ^a Number of deaths per 100,000 persons, 15 - 19 years old in specified group.

Figure 2C-10
**Mortality Rates^a by Race/Ethnicity among Adolescents 15-19 Years,
Arizona, 2016**



Note: ^a Number of deaths per 100,000 persons, 15 - 19 years old in specified group.

Adolescence refers to individuals between the ages of 15 and 19, an important developmental period marking the transition from childhood to adulthood. In 2016, an estimated 461,632 adolescents resided in Arizona, comprising 6.8 percent of the State's population (**Table 10A-1**). The lives of 247 resident adolescents prematurely ended in 2016, resulting in a total mortality rate of 53.5 deaths per 100,000 adolescents. This mortality rate was 43.0 percent higher than the 2006 rate (**Table 2C-11**).

The likelihood of dying was 2.2 times greater for adolescent boys than for adolescent girls in 2016 (**Figure 2C-9, Table 2C-11**).

The five causes with the greatest number of deaths over the 2006-2016 period were *unintentional injuries in accidents, suicide, homicide malignant neoplasms, and symptoms, signs, and abnormal findings* (**Table 2C-14**).

In 2016, adolescents who were Hispanic, White, or Asian had greater survival chances than the state average for all adolescents, while American Indian and Black adolescents had lower survival chances than average (**Figure 2C-10**). If the 2016 mortality risk of Hispanic adolescents (i.e., their mortality rate) was applied to all adolescents, only 209 would have died: 38 less than the 247 who actually did.

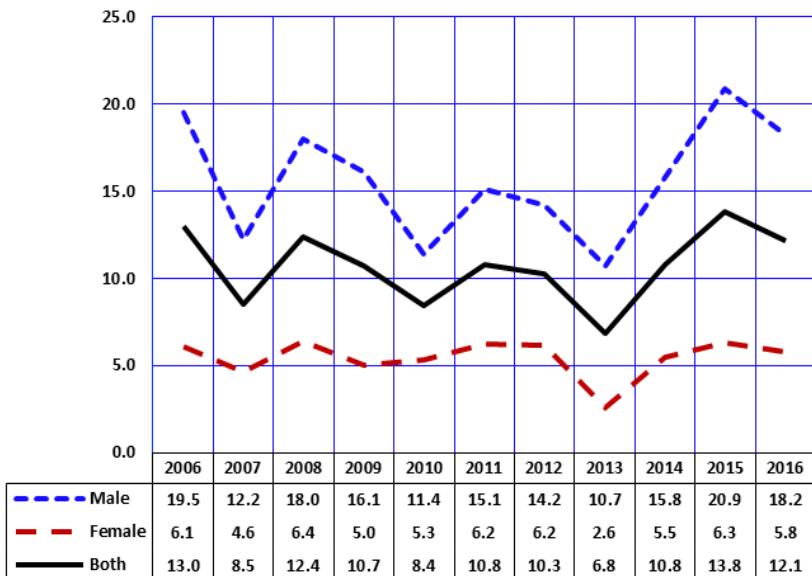
The number of deaths from accidental drug poisoning reached 27 deaths in 2016, a rise from 15 deaths in 2014 and 17 deaths in 2015.

2C.AGE-SPECIFIC MORTALITY
Adolescent mortality (ages 15-19 years)

Figure 2C-11
Suicide Rates^a by Gender and Year among Adolescents 15-19 Years, Arizona, 2006-2016

In 2016, fifty-six suicide deaths were recorded among Arizonans age 15-19 years, a decrease of 11.11 percent from 2015 (n = 63; **Table 2C-14**). In 2016, as in prior years, male adolescents accounted for the absolute majority (76.8 percent) of completed suicides.

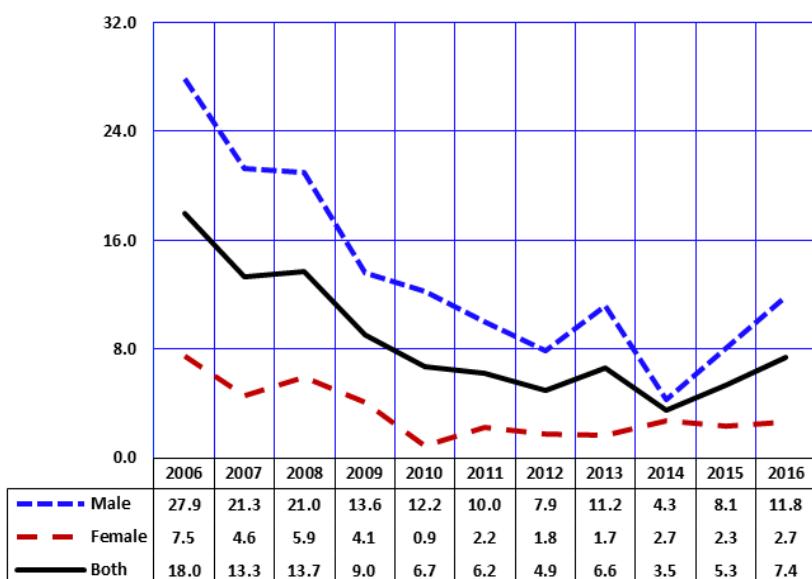
The suicide rate in 2013 was the lowest recorded since at least 1990 (**Figure 2C-11, Table 2C-11**). In 2016, the adolescent male suicide rate (18.2) and adolescent female suicide rate (5.8) was 6.8 percent and 6.7 percent lower than in 2006, respectively. The male to female ratio in suicide mortality rates decreased from 3.2:1 in 2006 to 3.1:1 in 2016. In other words, male adolescents were 3.1 times more likely to kill themselves in 2016 than female adolescents, compared to 3.2 times more likely in 2006.



Note: ^a Number of suicide deaths per 100,000 persons, 15 - 19 years old in specified group.

Figure 2C-12
Homicide Rates^a by Gender and Year among Adolescents 15-19 Years, Arizona, 2006-2016

From 2006 to 2016, homicide rates decreased for both adolescent males and females (**Figure 2C-12, Table 2C-11**). From 2008 to 2012, the homicide rate decreased by 62.4 percent for adolescent males, and by 69.5 percent for adolescent females. A shift occurred in 2013, as the adolescent homicide mortality rate increased for males while still declining for females. From 2015 to 2016, the rate of homicide death increased for both gender, but more so among males by 46.2 percent than females by 15.9 percent.



Note: ^a Number of homicide deaths per 100,000 persons, 15 - 19 years old in specified group.

**TABLE 2C-11
MORTALITY RATES^a FOR THE SELECTED FIVE LEADING CAUSES^b OF DEATH AMONG ADOLESCENTS (15-19 YEARS) BY GENDER,
ARIZONA, 2006-2016**

Gender/Cause	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	% change from 2006
MALE												
Accidents (unintentional injuries)	57.7	48.3	33.0	34.4	27.0	29.3	28.8	28.1	22.3	20.9	27.9	-51.6
Other	16.0	13.0	11.1	19.1	11.8	0.8	10.4	12.8	7.3	8.1	14.8	-7.5
Motor vehicle accidents	41.7	35.3	21.9	15.3	15.2	18.8	18.3	15.3	15.0	12.8	13.1	-68.6
Intentional self-harm (suicide)	19.5	12.2	18.0	16.1	11.4	15.1	14.2	10.7	15.8	20.9	18.2	-6.8
Assault (homicide)	27.9	21.3	21.0	13.6	12.2	10.0	7.9	11.2	4.3	8.1	11.8	-57.6
Malignant neoplasms	3.1	3.5	5.1	3.4	2.5	2.1	2.9	2.5	2.6	3.8	2.5	-18.2
Diseases of heart	1.8	2.2	0.4	1.3	2.1	1.3	0.0	0.4	1.3	0.4	0.0	-100.0
ALL CAUSES (Number of all deaths)	129.1	102.7	89.1	81.1	69.5	67.4	62.5	66.5	63.8	67.8	72.7	-43.7
FEMALE												
Accidents (unintentional injuries)	28.1	23.7	18.3	9.1	9.4	9.7	15.8	7.9	7.9	9.0	15.5	-44.7
Motor vehicle accidents	26.2	17.7	12.4	6.3	4.5	5.8	13.2	6.1	5.0	6.3	11.5	-55.9
Other	1.9	6.0	5.9	2.7	4.9	0.9	2.6	1.7	2.7	2.7	4.0	110.4
Intentional self-harm (suicide)	6.1	4.6	6.4	5.0	5.3	6.2	6.2	2.6	5.5	6.3	5.8	-5.3
Assault (homicide)	7.5	4.6	5.9	4.1	0.9	2.2	1.8	1.7	2.7	2.3	2.7	-64.5
Malignant neoplasms	3.7	4.2	4.1	3.2	2.7	4.4	1.8	3.5	4.1	2.7	2.2	-40.0
Diseases of heart	1.4	1.4	0.9	1.4	0.9	0.9	0.0	0.9	0.9	0.9	1.8	26.9
ALL CAUSES (Number of all deaths)	56.6	49.3	40.7	29.0	24.5	31.0	30.3	23.2	28.2	26.1	33.3	-41.1
TOTAL												
Accidents (unintentional injuries)	43.3	36.4	25.9	22.1	18.4	19.8	22.5	18.3	15.2	15.1	21.9	-49.5
Motor vehicle accidents	34.2	26.8	17.3	11.0	10.0	12.5	15.8	10.8	10.1	9.6	12.3	-63.9
Other	9.1	9.6	8.6	11.2	8.4	0.9	6.6	7.4	5.1	5.5	9.5	4.7
Intentional self-harm (suicide)	13.0	8.5	12.4	10.7	8.4	10.8	10.3	6.8	10.8	13.8	12.1	-6.7
Assault (homicide)	18.0	13.3	13.7	9.0	6.7	6.2	4.9	6.6	3.5	5.3	7.4	-59.1
Malignant neoplasms	3.4	3.8	4.6	3.3	2.6	3.2	2.4	3.0	3.3	3.3	2.4	-29.9
Diseases of heart	1.6	1.8	0.9	1.3	1.5	1.1	0.0	0.6	1.1	0.7	0.9	-45.8
ALL CAUSES (Number of all deaths)	93.8	76.9	65.7	55.9	47.7	49.7	47.1	45.5	46.5	47.5	53.5	-43.0
	(412)	(342)	(297)	(255)	(220)	(231)	(220)	(214)	(211)	(217)	(247)	(-40.0)

Notes: ^a Number of deaths per 100,000 adolescents 15-19 years old; ^b The five causes with the greatest number of deaths over the 2006-2016 period; the cause-of-death titles are according to the Tenth Revision of the International Classification of Diseases (ICD-10); the causes of death for 2006-2016 are classified by ICD-10, replacing the Ninth Revision (ICD-9); measures of comparison between ICD-9 and ICD-10 – the “comparability ratios” – for the causes of death shown in this report are provided in the **Technical Notes**.

TABLE 2C-12
MORTALITY RATES^a FOR THE SELECTED FIVE LEADING CAUSES^b OF DEATH AMONG ADOLESCENTS (15-19 YEARS)
IN URBAN AND RURAL AREAS^c, ARIZONA, 2006-2016

Area/Cause	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	% change from 2006
URBAN												
Accidents (unintentional injuries)	40.3	30.9	23.7	18.7	17.0	18.4	17.0	15.8	12.5	13.4	20.4	-49.4
Motor vehicle accidents	32.2	21.9	14.8	9.6	9.3	10.8	11.9	9.3	8.9	8.5	12.2	-62.0
Other	8.1	9.0	8.9	9.1	7.7	1.0	5.1	6.5	3.7	4.9	8.2	0.7
Intentional self-harm (suicide)	10.6	8.2	9.4	9.6	7.2	8.5	8.1	5.0	9.6	12.7	11.2	5.8
Assault (homicide)	20.0	14.8	15.3	9.6	6.7	6.4	4.8	6.8	3.7	5.9	7.9	-60.5
Malignant neoplasms	2.8	3.8	4.6	3.2	2.3	2.8	3.5	3.7	2.8	2.8	2.8	0.1
Diseases of heart	1.4	1.6	1.1	1.3	1.5	1.3	0.0	0.5	1.3	0.5	0.8	-45.4
ALL CAUSES	88.9	72.5	61.4	51.5	43.6	45.3	38.8	42.4	42.5	44.2	50.7	-42.9
(Number of all deaths)	(320)	(265)	(230)	(194)	(169)	(177)	(153)	(169)	(163)	(171)	(199)	(-37.8)
RURAL												
Accidents (unintentional injuries)	56.8	61.9	36.0	36.9	25.5	26.9	52.1	31.8	29.9	24.5	30.3	-46.6
Other	13.9	12.7	7.4	19.7	12.1	0.0	15.1	12.4	12.8	8.6	17.3	24.6
Motor vehicle accidents	42.9	49.2	28.6	17.2	13.4	21.5	37.0	19.3	17.1	15.8	13.0	-69.7
Intentional self-harm (suicide)	24.0	10.1	26.1	16.0	14.8	22.9	21.9	16.6	17.1	20.2	17.3	-27.8
Assault (homicide)	8.8	6.3	7.5	6.1	6.7	5.4	5.5	5.5	2.9	1.4	2.9	-67.2
Diseases of heart	2.5	2.5	0.0	1.2	1.3	0.0	0.0	0.0	0.0	1.4	1.4	-42.3
Malignant neoplasms	6.3	3.8	6.2	3.7	4.0	5.4	0.0	0.0	1.4	5.8	0.0	-100.0
ALL CAUSES	116.2	97.2	83.3	75.0	68.6	72.7	90.5	62.1	68.4	66.2	66.4	-42.9
(Number of all deaths)	(92)	(77)	(67)	(61)	(51)	(54)	(66)	(45)	(48)	(46)	(46)	(-50.0)
TOTAL												
Accidents (unintentional injuries)	43.3	36.4	25.9	22.1	18.4	19.8	22.5	18.3	15.2	15.1	21.9	-49.5
Motor vehicle accidents	34.2	26.8	17.3	11.0	10.0	12.5	15.8	10.8	10.1	9.6	12.3	-63.9
Other	9.1	9.6	8.6	11.2	8.4	0.9	6.6	7.4	5.1	5.5	9.5	4.7
Intentional self-harm (suicide)	13.0	8.5	12.4	10.7	8.4	10.8	10.3	6.8	10.8	13.8	12.1	-6.7
Assault (homicide)	18.0	13.3	13.7	9.0	6.7	6.2	4.9	6.6	3.5	5.3	7.4	-59.1
Malignant neoplasms	3.4	3.8	4.6	3.3	2.6	3.2	2.4	3.0	3.3	3.3	2.4	-29.9
Diseases of heart	1.6	1.8	0.9	1.3	1.5	1.1	0.0	0.6	1.1	0.7	0.9	-45.8
ALL CAUSES	93.8	76.9	65.7	55.9	47.7	49.7	47.1	45.5	46.5	47.5	53.5	-43.0
(Number of all deaths)	(412)	(342)	(297)	(255)	(220)	(231)	(220)	(214)	(211)	(217)	(247)	(-40.0)

Notes: ^a Number of deaths per 100,000 adolescents 15-19 years old; ^b The five causes with the greatest number of deaths over the 2006-2016 period; ^c Urban = Maricopa, Pima, Pinal, and Yuma counties; the remaining counties comprise Arizona's rural areas; see **Technical Notes** for more information; records with unknown county of residence are included in the statewide totals, but are not distributed by urban/rural area; the cause-of-death titles are according to the Tenth Revision of the International Classification of Diseases (ICD-10); the causes of death for 2006-2016 are classified by ICD-10; measures of comparison between ICD-9 and ICD-10 - the "comparability ratios" - for the causes of death shown in this report are provided in the **Technical Notes**.

TABLE 2C-13
**MORTALITY RATES^a FOR THE SELECTED FIVE LEADING CAUSES OF DEATH AMONG ADOLESCENTS (15-19 YEARS)
 BY GENDER IN URBAN AND RURAL AREAS^b, ARIZONA, 2006-2016**

Area/Gender	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	% change from 2006
URBAN												
Male	121.7	97.9	84.3	73.8	62.8	62.2	50.8	62.0	59.8	60.8	69.6	-42.8
Female	54.2	45.3	36.8	27.6	23.4	27.4	26.1	21.7	24.2	26.6	30.9	-43.1
TOTAL	88.9	72.5	61.4	51.5	43.6	45.3	38.8	42.4	42.5	44.2	50.7	-42.9
RURAL												
Male	162.3	125.2	109.0	112.6	104.9	94.6	123.3	91.4	85.8	106.8	84.9	-47.7
Female	67.5	57.6	56.2	35.4	30.3	49.6	53.3	31.2	50.0	23.6	47.1	-30.2
TOTAL	116.2	97.2	83.3	75.0	68.6	72.7	90.5	62.1	68.4	66.2	66.4	-42.9
TOTAL												
Male	129.1	102.7	89.1	81.1	69.5	67.4	62.5	66.5	63.8	67.8	72.7	-43.7
Female	56.6	49.3	40.7	29.0	24.5	31.0	30.3	23.2	28.2	26.1	33.3	-41.1
TOTAL	93.8	76.9	65.7	55.9	47.7	49.7	47.1	45.5	46.5	47.5	53.5	-43.0

Notes: ^a Rates are presented per 100,000 children 15-19 years old; ^b Urban = Maricopa, Pima, Pinal, and Yuma counties; the remaining counties comprise Arizona's rural areas; see **Technical Notes** for more information; records with unknown county of residence are included in the statewide totals, but are not distributed by urban/rural area.

**TABLE 2C-14
LEADING CAUSES OF DEATH AMONG ADOLESCENTS (15-19 YEARS) BY GENDER, AREA, AND RACE/ETHNICITY,
ARIZONA, 2016**

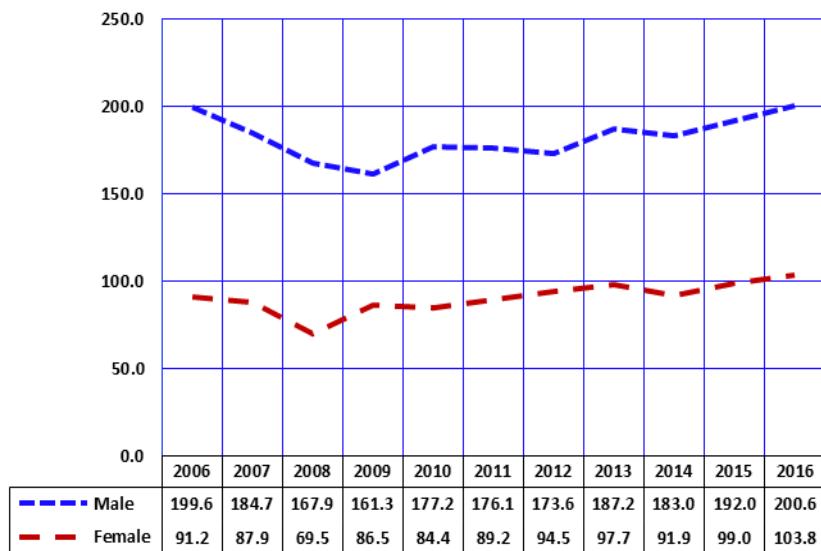
Cause of death	Gender	Area ^a		Race/ethnicity				
		Male	Female	Urban	Rural	White non-Hispanic	Hispanic or Latino	American Indian or Alaska Native
Accidents (unintentional injury)	Total	100†	66	35	80	21	0	41
Motor vehicle accidents		60†	31	26	48	9	0	19
Accidental poisoning		30†	22	*	22	*	0	15
Accidental drowning and submersion		10†	6	*	*	*	0	*
Intentional self-harm (suicide)		60†	43	13	44	12	0	28
By other means		30†	22	10	25	7	0	16
By discharge of firearms		20†	21	*	19	*	0	12
Assault (homicide)		30†	28	6	31	*	*	17
By discharge of firearms		30†	22	*	27	0	*	15
By other means		10†	6	*	*	*	*	*
Malignant neoplasms		10†	6	*	11	0	*	9
Symptoms, signs, abnormal findings		10†	8	*	7	*	*	*
Diseases of the heart		0†	0	*	*	0	*	0
Total, all causes^b		247	172	75	199	46	2	96
						88	27	28
								8

Notes: * Cell suppressed due to count less than 6; † Sum rounded to nearest tens unit due to addend less than 6; ^a May include death records where the county of residence could not be classified as urban or rural; Urban = Maricopa, Pima, Pinal, and Yuma counties; the remaining counties comprise Arizona's rural areas; ^b May include other causes of death not shown above.

2C.AGE-SPECIFIC MORTALITY

Young adult mortality (ages 20-44 years)

Figure 2C-13
**Mortality Rates^a by Gender and Year among Young Adults 20-44 Years,
 Arizona, 2006-2016**

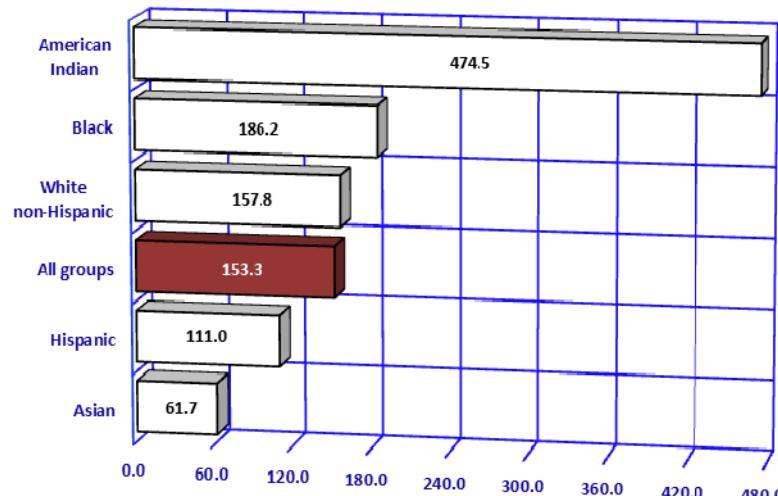


In 2016, 32.8 percent of Arizona residents were between 20 and 44 years of age. Among the six developmental periods examined in the life span, young adulthood, with an estimated 2.2 million individuals, easily represented the largest segment of the population. However, only 6.1 percent of all deaths occurred during young adulthood.

The number of deaths among young adults rose 5.6 percent from 2006 to 2016. Compared to 2015, the young adult mortality rate increased for both male and female by 4.5 percent and 4.8 percent, respectively (**Figure 2C-13, Table 2C-15**).

Note: ^a Number of deaths per 100,000 persons, 20-44 years old in specified group.

Figure 2C-14
**Mortality Rates^a by Race/Ethnicity among Young Adults 20-44 Years,
 Arizona, 2016**



The rank order of survival chances of young adults from best to worse by race/ethnicity in 2016 was Asian, Hispanic or Latino, White non-Hispanic, Black or African American, and American Indian.

American Indian young adults had a mortality rate 2.5 times greater than Black or African American adults, the racial/ethnic group with the second highest young adult mortality rate. The American Indian young adult mortality rate was 3.1 times greater than the state average for young adults and 7.7 times greater than Asian young adults.

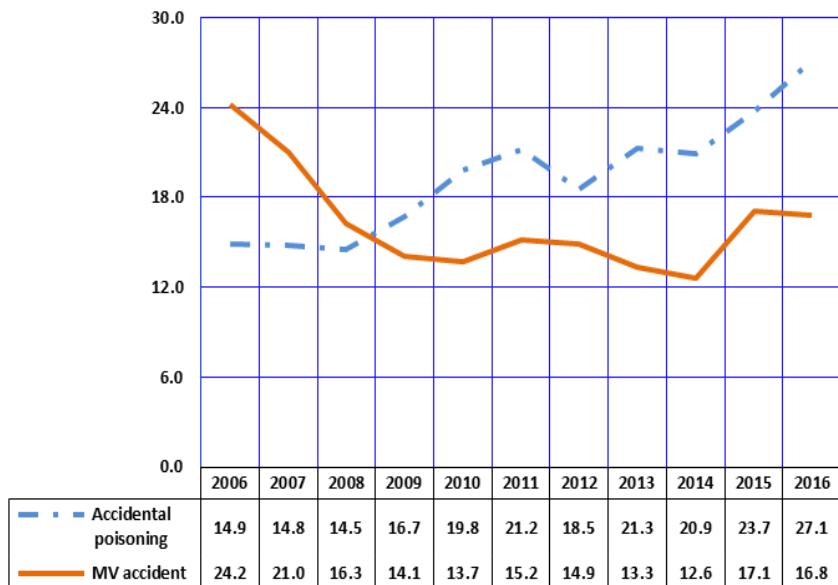
Note: ^a Number of deaths per 100,000 persons, 20-44 years old in specified group.

2C.AGE-SPECIFIC MORTALITY

Young adult mortality (ages 20-44 years)

In 2016, 609 deaths of young adults were attributed to accidental poisoning (**Table 2C-18**), an increase of 15.1 percent from 2015. The mortality rate for accidental poisoning among young adults (27.1/100,000) exceeded the mortality rate for motor vehicle-related injuries for the seventh straight year (**Figure 2C-15**). Among the young adults 20-44 years, 482 of the 548 accidental poisoning were due to drug overdose (ICD-10 X40-44) and 51 were due to alcohol poisoning (ICD-10 X45).

Figure 2C-15
Mortality Rates^a for Motor Vehicle-Related Injuries and Accidental Poisoning by Year among Young Adults 20-44 Years, Arizona, 2006-2016



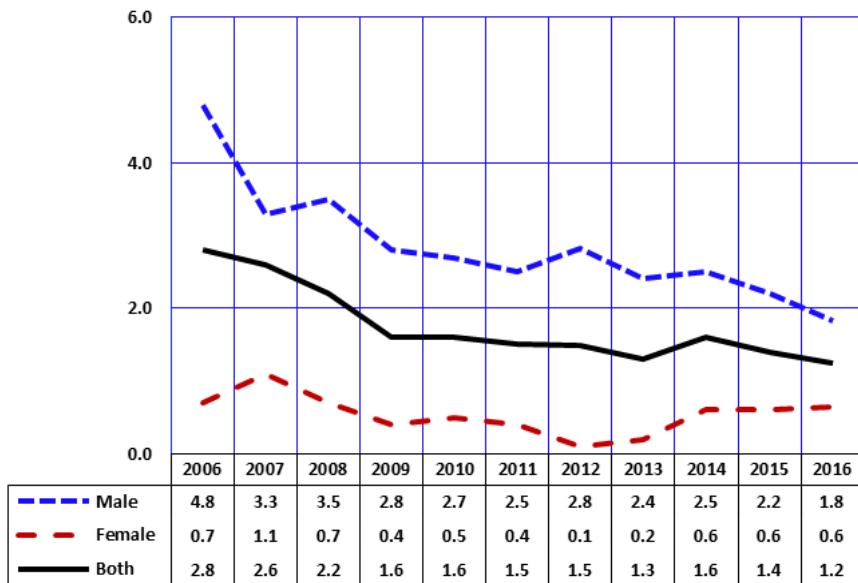
Note: ^a Number of motor vehicle and accidental poisoning deaths per 100,000 persons, 20-44 years old in specified group.

Figure 2C-16
Mortality Rates^a for HIV Disease by Gender and Year among Young Adults 20-44 Years, Arizona, 2006-2016

In 2016, more Arizonans 20-44 years old died from the *human immunodeficiency virus (HIV)* disease than from *morbid obesity* (**Table 2C-18**).

Of the 96 deaths from *HIV disease* in 2016, about 29 percent occurred among Arizonans 20-44 years old (**Table 2C-27**). Males accounted for 75.0 percent of young adult deaths from *HIV disease* in 2016 (**Table 2C-18**).

The mortality rate for *HIV disease* among young male adults decreased 10.9 percent from 2.2/100,000 adults 20-44 years in 2015 to 1.8/100,000 in 2016.



Note: ^a Number of HIV deaths per 100,000 persons, 20-44 years old in specified group.

TABLE 2C-15
**MORTALITY RATES^a FOR THE SELECTED FIVE LEADING CAUSES^b OF DEATH AMONG YOUNG ADULTS (20-44 YEARS) BY GENDER,
ARIZONA, 2006-2016**

Gender/Cause	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	% change from 2006
MALE												
Accidents (unintentional injuries)	69.2	60.6	54.4	53.7	52.6	57.9	52.8	56.7	54.3	63.3	71.2	2.9
Other	34.7	31.4	30.6	33.4	27.5	8.7	31.2	38.0	35.9	38.6	46.9	35.2
Motor vehicle accidents	34.5	29.2	23.8	20.2	19.8	20.6	21.6	18.7	18.4	24.7	24.3	-29.6
Intentional self-harm (suicide)	27.4	30.3	23.5	25.1	31.5	32.4	29.0	30.8	28.7	30.8	30.9	12.8
Assault (homicide)	24.2	22.8	19.2	13.4	20.1	18.2	16.1	13.3	16.6	17.8	11.0	-26.2
Diseases of heart	15.9	14.3	13.3	14.0	11.7	14.7	13.5	14.2	14.0	13.6	12.0	-24.4
Malignant neoplasms	11.0	11.3	12.6	12.0	12.8	11.0	12.3	13.4	11.2	13.0	11.3	2.9
ALL CAUSES (Number of all deaths)	199.6	184.7	167.9	161.3	177.2	176.1	173.6	187.2	183.0	192.0	200.6	0.5
	(2,290)	(2,166)	(2,001)	(1,944)	(1,920)	(1,923)	(1,910)	(2,082)	(2,071)	(2,191)	(2,304)	0.6
FEMALE												
Accidents (unintentional injuries)	25.0	25.2	20.4	20.8	22.4	25.2	22.8	24.5	21.3	28.2	26.6	6.2
Other	11.9	13.0	12.1	13.3	15.0	2.1	15.1	16.9	14.7	19.1	17.5	47.3
Motor vehicle accidents	13.1	12.2	8.3	7.5	7.4	9.7	7.7	7.6	6.6	9.1	9.0	-31.0
Malignant neoplasms	16.4	15.5	13.7	15.9	14.0	15.7	17.6	17.4	14.0	13.5	16.7	1.9
Intentional self-harm (suicide)	7.0	7.1	6.0	9.4	6.8	8.9	8.7	9.6	9.0	10.5	9.9	40.8
Diseases of heart	5.0	6.7	5.8	6.7	4.6	6.4	7.0	5.6	6.6	7.2	5.1	2.2
Assault (homicide)	4.0	4.7	3.2	4.0	3.5	2.4	4.3	3.4	2.9	3.2	3.7	-6.4
ALL CAUSES (Number of all deaths)	91.2	87.9	69.5	86.5	84.4	89.2	94.5	97.7	91.9	99.0	103.8	13.8
	(968)	(954)	(828)	(973)	(876)	(933)	(990)	(1,033)	(991)	(1,080)	(1,137)	17.5
TOTAL												
Accidents (unintentional injuries)	47.9	43.6	38.0	37.8	37.8	41.9	38.2	41.0	38.2	46.1	49.4	3.2
Other	23.7	22.6	21.7	23.7	24.1	5.5	23.3	27.7	25.6	29.0	32.6	37.4
Motor vehicle accidents	24.2	21.0	16.3	14.1	13.7	15.2	14.9	13.3	12.6	17.1	16.8	-30.4
Intentional self-harm (suicide)	17.6	19.1	15.0	17.5	19.4	20.9	19.1	20.5	19.1	20.9	20.6	17.2
Malignant neoplasms	13.6	13.3	9.7	13.9	13.4	13.3	14.9	15.3	12.6	13.2	13.9	2.6
Assault (homicide)	14.5	14.1	13.1	8.8	12.0	10.5	10.3	9.9	8.2	10.0	11.0	-24.4
Diseases of heart	10.7	10.7	11.5	10.5	8.2	10.6	10.3	10.0	10.4	10.5	8.6	-19.2
ALL CAUSES (Number of all deaths)	147.5	138.2	123.0	125.2	131.8	133.6	135.0	143.5	138.6	146.6	153.3	4.0
	(3,258)	(3,120)	(2,829)	(2,917)	(2,796)	(2,856)	(2,900)	(3,115)	(3,062)	(3,271)	(3,441)	5.6

Notes: ^a Rates are presented per 100,000 persons 20-44 years old; ^b The five causes with the greatest number of deaths over the 2006-2016 period; the cause-of-death titles are according to the Tenth Revision of the International Classification of Diseases (ICD-10); the causes of death for 2006-2016 are classified by ICD-10, replacing the Ninth Revision (ICD-9); measures of comparison between ICD-9 and ICD-10 – the "comparability ratios" – for the causes of death shown in this report are provided in the **Technical Notes**.

TABLE 2C-16
MORTALITY RATES^a FOR THE SELECTED FIVE LEADING CAUSES^b OF DEATH AMONG YOUNG ADULTS (20-44 YEARS)
IN URBAN AND RURAL AREAS^c, ARIZONA, 2006-2016

Area/Cause	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	% change from 2006
URBAN												
Accidents (unintentional injuries)	44.8	38.7	34.4	32.7	33.5	36.6	32.3	35.4	33.8	40.1	43.9	-2.0
Other	23.6	21.0	20.2	21.5	22.0	4.3	20.2	23.9	22.7	25.4	28.9	22.2
Motor vehicle accidents	21.2	17.7	14.2	11.2	11.5	12.4	12.1	11.5	11.1	14.7	15.1	-28.9
Intentional self-harm (suicide)	16.2	18.0	16.4	13.6	17.7	18.1	17.0	18.3	16.8	19.0	18.4	13.9
Malignant neoplasms	13.5	12.9	14.2	15.6	13.3	13.5	14.1	15.3	12.7	13.1	13.5	-0.2
Assault (homicide)	15.1	14.3	13.2	9.7	11.0	10.0	9.5	9.4	8.1	9.6	10.7	-29.4
Diseases of heart	10.0	9.9	8.9	8.7	8.0	9.6	9.5	9.3	9.7	10.1	8.3	-17.0
ALL CAUSES	139.3	129.8	113.6	113.0	119.7	120.3	118.8	130.1	126.2	131.9	137.1	-1.6
(Number of all deaths)	(2,640)	(2,511)	(2,239)	(2,203)	(2,203)	(2,232)	(2,215)	(2,451)	(2,422)	(2,557)	(2,676)	1.4
RURAL												
Accidents (unintentional injuries)	66.9	73.2	57.1	64.7	63.9	71.9	74.4	74.9	61.2	78.6	77.9	16.4
Other	24.5	32.7	29.2	35.4	36.9	10.3	42.7	50.8	39.6	47.9	51.3	109.2
Motor vehicle accidents	42.4	40.5	28.0	29.4	27.0	33.0	31.7	24.2	21.7	30.8	26.7	-37.1
Intentional self-harm (suicide)	25.5	25.6	20.4	29.1	30.2	37.6	32.4	33.6	32.3	32.1	33.5	31.3
Malignant neoplasms	14.0	16.1	12.5	15.9	13.8	12.0	19.0	15.4	11.4	13.3	16.7	19.6
Assault (homicide)	11.2	12.7	14.6	7.8	16.0	12.8	14.8	13.0	7.2	10.6	10.6	-5.4
Diseases of heart	15.0	15.1	9.4	15.0	9.6	16.7	14.5	14.0	14.4	13.0	10.3	-31.7
ALL CAUSES	196.9	188.1	174.2	191.6	203.7	210.2	233.4	226.5	207.1	224.7	240.9	22.3
(Number of all deaths)	(618)	(609)	(590)	(662)	(574)	(593)	(662)	(647)	(602)	(657)	(705)	14.1
TOTAL												
Accidents (unintentional injuries)	47.9	43.6	38.0	37.8	41.9	38.2	41.0	38.2	46.1	49.4	3.2	
Other	23.7	22.6	21.7	23.7	24.1	5.5	23.3	27.7	25.6	29.0	32.6	37.4
Motor vehicle accidents	24.2	21.0	16.3	14.1	13.7	15.2	14.9	13.3	12.6	17.1	16.8	-30.4
Intentional self-harm (suicide)	17.6	19.1	15.0	17.5	19.4	20.9	19.1	20.5	19.1	20.9	20.6	17.2
Malignant neoplasms	13.6	13.3	9.7	13.9	13.4	13.3	14.9	15.3	12.6	13.2	13.9	2.6
Assault (homicide)	14.5	14.1	13.1	10.5	12.0	10.5	10.3	9.9	8.2	10.0	11.0	-24.4
Diseases of heart	10.7	10.7	11.5	8.8	8.2	10.6	10.3	10.0	10.4	10.5	8.6	-19.2
ALL CAUSES	147.5	138.2	123.0	125.2	131.8	133.6	135.0	143.5	138.6	146.6	153.3	4.0
(Number of all deaths)	(3,258)	(3,120)	(2,829)	(2,917)	(2,796)	(2,856)	(2,900)	(3,115)	(3,062)	(3,271)	(3,441)	5.6

Notes: ^a Rates are presented per 100,000 young adults 20-44 years old; ^b The five causes with the greatest number of deaths statewide over the 2006-2016 period; ^c Urban = Maricopa, Pima, Pinal, and Yuma counties; the remaining counties comprise Arizona's rural areas; see **Technical Notes** for more information; records with unknown county of residence are included in the statewide totals, but are not distributed by urban/rural area; the cause-of-death titles are according to the Tenth Revision of the International Classification of Diseases (ICD-10); the causes of death for 2006-2016 are classified by ICD-10, replacing the Ninth Revision (ICD-9); measures of comparability ratios" - for the causes of death shown in this report are provided in the **Technical Notes**.

TABLE 2C-17
MORTALITY RATES^a FOR THE SELECTED FIVE LEADING CAUSES OF DEATH AMONG YOUNG ADULTS (20-44 YEARS)
BY GENDER IN URBAN AND RURAL AREAS^b, ARIZONA, 2006-2016

Area/Gender	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	% change from 2006
URBAN												
Male	188.7	172.2	154.2	143.9	159.4	158.7	154.0	169.0	165.6	171.9	178.4	-5.4
Female	85.3	83.6	69.4	79.5	78.4	80.3	81.9	89.2	85.1	90.1	94.0	10.2
TOTAL	139.3	129.8	113.6	113.0	119.7	120.3	118.8	130.1	126.2	131.9	137.1	-1.6
RURAL												
Male	266.4	261.2	244.4	258.9	281.0	271.6	288.4	296.4	278.8	294.2	315.6	18.5
Female	125.1	112.7	102.9	123.5	121.6	144.8	174.6	151.6	130.0	149.8	160.1	27.9
TOTAL	196.9	188.1	174.2	191.6	203.7	210.2	233.4	226.5	207.1	224.7	240.9	22.3
TOTAL												
Male	199.6	184.7	167.9	161.3	177.2	176.1	173.6	187.2	183.0	192.0	200.6	0.5
Female	91.2	87.9	69.5	86.5	84.4	89.2	94.5	97.7	91.9	99.0	103.8	13.8
TOTAL	147.5	138.2	123.0	125.2	131.8	133.6	135.0	143.5	138.6	146.6	153.3	4.0

Notes: ^a Rates are presented per 100,000 persons 20-44 years old; ^b Urban = Maricopa, Pima, Pinal, and Yuma counties; the remaining counties comprise Arizona's rural areas; see **Technical Notes** for more information; records with unknown county of residence are included in the statewide totals, but are not distributed by urban/rural area.

TABLE 2C-18
**LEADING CAUSES OF DEATH AMONG YOUNG ADULTS (20-44 YEARS) BY GENDER, AREA, AND RACE/ETHNICITY,
ARIZONA, 2016**

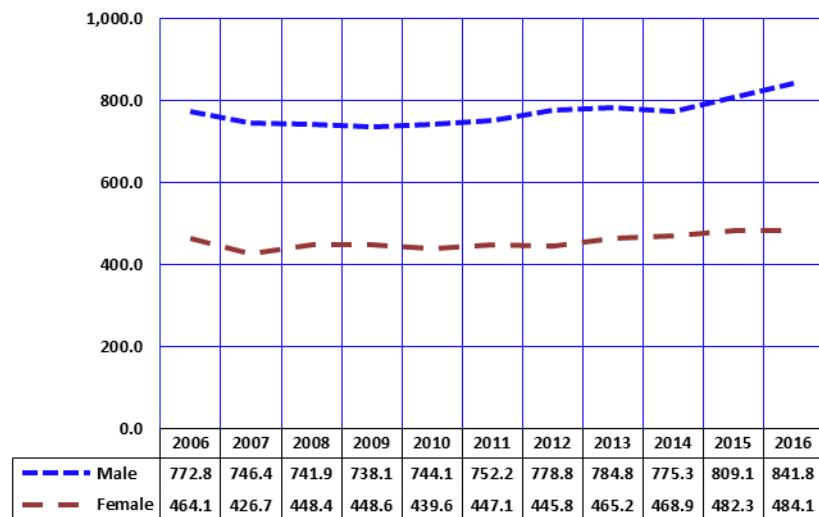
Cause of death	Gender		Area ^a		Race/ethnicity			
	Total	Male	Urban	Rural	White non-Hispanic	Hispanic or Latino	American Indian or Alaska Native	Asian or Pacific Islander
Accidents (unintentional injury)	1,109	818	291	857	228	24	584	283
Accidental poisoning	609	442	167	482	114	13	380	140
Motor vehicle accidents	378	279	99	294	78	6	148	115
Intentional self-harm (suicide)	463	355	108	360	98	*	264	110
By discharge of firearms	233	190	43	195	36	*	162	50
By other means	230	165	65	165	62	*	102	60
Malignant neoplasms	313	130	183	263	49	*	170	100
Malignant neoplasm of breast	60†	0	55	48	7	0	27	23
Malignant neoplasm of lymphoid, hematopoietic and related tissue	40†	16	19	30	*	0	17	16
Malignant neoplasm of meninges, brain and other parts of central nervous system	30†	18	10	25	*	0	23	*
Assault (homicide)	250†	205	41	208	31	7	69	95
By discharge of firearms	200†	163	32	175	16	*	53	80
By other means	50†	42	9	33	15	*	16	15
Diseases of heart	190†	138	56	162	30	*	106	47
Chronic liver disease and cirrhosis	150†	90	55	87	58	0	49	24
Diabetes	70†	49	24	57	15	*	28	18
Obesity	40†	26	16	29	12	*	17	13
Cerebrovascular diseases	40†	20	15	27	8	0	19	10
Human immunodeficiency virus (HIV) disease	30†	21	7	25	*	0	15	*
Total, all causes	3,441	2,304	1,137	2,676	705	60	1,750	891
							227	509
								64

Notes: * Cell suppressed due to count less than 6; † Sum rounded to nearest tens unit due to addend less than 6;^a Urban = Maricopa, Pima, Pinal, and Yuma counties; the remaining counties comprise Arizona's rural areas.

2C.AGE-SPECIFIC MORTALITY

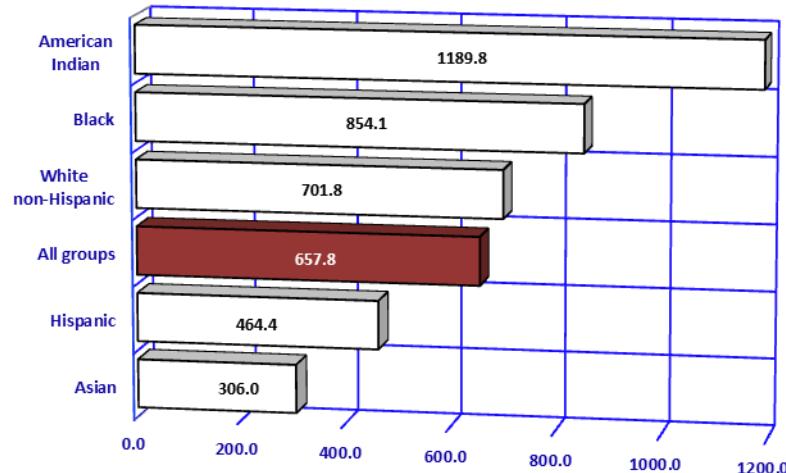
Middle-aged adult mortality (ages 45-64 years)

Figure 2C-17
**Mortality Rates^a by Gender and Year among Middle-Aged Adults 45-64 Years,
Arizona, 2006-2016**



Note: ^a Number of deaths per 100,000 persons, 45-64 years old in specified group.

Figure 2C-18
**Mortality Rates^a by Race/Ethnicity among Middle-Aged Adults 45-64 Years,
Arizona, 2016**



In 2016, the 1,658,674 middle-aged adult residents aged 45 to 64 experienced 10,911 deaths, or an average of 29 deaths, per day. The total number of deaths among 45-64 year old Arizona residents was higher in 2016, than any year since 1980, and is likely the greatest number of deaths among this age group in Arizona's history (**Table 2C-19**).

The 2016 total mortality rate among middle-age females was 4.3 percent higher, and among middle-aged males 8.9 percent higher than their respective rates in 2006 (**Figure 2C-17, Table 2C-19**). In 2016, the mortality rate for males age 45 - 64 was 73.9 percent greater than for females of the same age group.

The five causes with the greatest number of deaths in 2006-2016 were *malignant neoplasms, diseases of heart, accidents, chronic liver disease and cirrhosis, and chronic lower respiratory diseases* (**Table 2C-19**).

American Indian, Black or African American, and White non-Hispanic middle-aged adults had the three highest mortality rates (1,189.8/100,000, 854.1/100,000, and 701.8/100,000, respectively) among the racial/ethnic groups.

If the 2016 total mortality rate for Asian middle-aged adults applied to all Arizona residents 45-64 years old, 5,076 middle-aged adults would have died rather than the 10,911 who actually did.

Note: ^a Number of deaths per 100,000 persons, 45-64 years old in specified group.

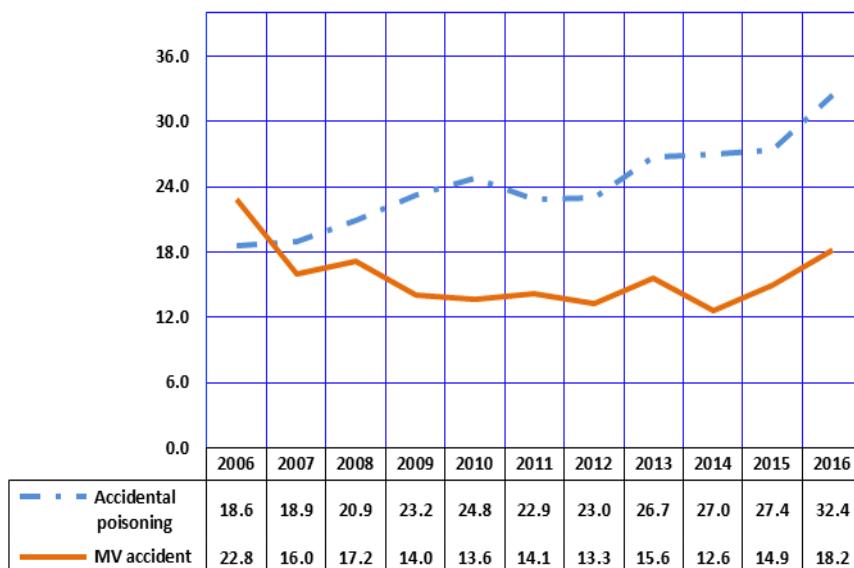
2C.AGE-SPECIFIC MORTALITY

Middle-aged adult mortality (ages 45-64 years)

In recent years, middle-aged adults experienced an unprecedented increase in mortality from accidental poisoning. The 2016 mortality rates due to accidental poisoning was 32.4 per 100,000 adults aged 45-65 years, an increase of 18.4 percent from 2015. In 2016, about 538 deaths were attributed to accidental poisoning (**Table 2C-22**), compared to 264 deaths in 2006. Of the accidental poisoning deaths in this age group, 467 were drug overdoses (ICD-10 X40-X44) and 64 were alcohol poisoning (ICD-10 X45).

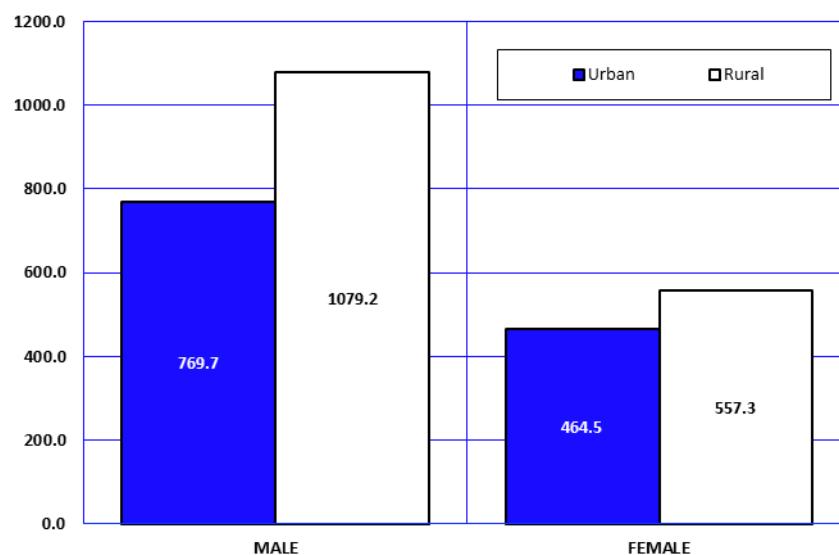
Beginning in 2007, the mortality rate for accidental poisoning exceeded the mortality rate for motor vehicle-related injuries among the middle-aged (**Figure 2C-19**). In 2016, accidental poisoning mortality rate of 32.4 per 100,000 middle-aged adults was 1.8 times fold higher than the mortality rate of 18.2 per 100,000 for motor vehicle accidents. White non-Hispanics accounted for about 74.9 percent of all accidental poisoning deaths (**Table 2C-22**).

Figure 2C-19
Mortality Rates^a for Accidental Poisoning and Motor Vehicle-related Injuries by Year among Middle-Aged Adults 45-64 Years, Arizona, 2006-2016



Note: ^a Number of motor vehicle and accidental poisoning deaths per 100,000 persons, 45-64 years old in specified group.

Figure 2C-20
Mortality Rates by Gender in Urban^a and Rural Areas among Middle-Aged Adults 45-64 Years, Arizona, 2016



Note: ^a Urban counties include Maricopa, Pima, Pinal, and Yuma counties.

TABLE 2C-19
MORTALITY RATES^a FOR THE SELECTED FIVE LEADING CAUSES^b OF DEATH AMONG MIDDLE-AGED ADULTS (45-64 YEARS) BY GENDER, ARIZONA, 2006-2016

Gender/Cause	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	% change from 2006
MALE												
Malignant neoplasms	192.1	192.1	184.5	182.2	188.3	186.3	196.6	191.4	171.5	186.4	184.1	-4.2
Diseases of heart	186.7	170.8	175.5	169.0	160.7	165.3	155.1	159.3	143.2	166.6	170.1	-8.9
Accidents (unintentional injuries)	81.2	73.2	76.5	71.9	69.2	68.9	68.0	77.9	73.5	76.8	100.4	23.7
Other	49.3	50.1	51.9	51.1	54.6	19.8	47.9	54.5	54.0	54.5	71.5	45.0
Motor vehicle accidents	31.9	23.1	24.6	20.8	19.9	21.4	20.1	23.3	19.4	22.3	28.9	-9.3
Chronic liver disease and cirrhosis	34.4	35.5	39.2	38.0	42.1	49.6	50.2	46.7	43.1	48.1	47.8	38.9
Suicide	31.9	35.0	35.1	37.0	40.9	41.3	41.8	38.3	37.7	40.3	41.2	29.2
ALL CAUSES (Number of all deaths)	772.8	746.4	741.9	738.1	744.1	752.2	778.8	784.8	775.3	809.1	841.8	8.9
(5,282) (5,397) (5,450) (5,472) (5,659) (5,760) (5,999) (6,088) (6,111) (6,444) (6,781) (6,781) (28.4)												
FEMALE												
Malignant neoplasms	166.2	154.7	151.4	154.2	153.9	156.9	155.1	160.7	145.0	155.6	150.9	-9.2
Diseases of heart	66.4	65.0	63.4	59.4	55.9	61.8	60.5	54.6	54.0	60.8	66.7	0.4
Accidents (unintentional injuries)	35.8	30.2	34.2	36.1	36.6	32.8	33.0	38.0	33.7	35.8	38.4	7.4
Other	21.6	21.0	24.2	28.5	29.0	7.4	26.1	29.8	27.4	27.9	30.4	40.6
Motor vehicle accidents	14.2	9.2	10.0	7.6	7.7	7.1	6.9	8.2	6.2	7.9	8.1	-43.0
Chronic lower respiratory diseases	21.6	23.6	24.3	19.2	19.3	21.6	24.2	24.8	24.8	23.0	25.8	19.4
Diabetes	19.1	14.0	16.0	14.2	17.0	21.3	22.3	23.6	22.8	27.4	24.6	28.9
ALL CAUSES (Number of all deaths)	464.1	426.7	448.4	448.6	439.6	447.1	445.8	465.2	468.9	482.3	484.1	4.3
(3,336) (3,232) (3,449) (3,483) (3,553) (3,638) (3,631) (3,810) (3,914) (4,066) (4,130) (4,130) (23.8)												
TOTAL												
Malignant neoplasms	178.8	173.0	167.6	167.9	170.6	171.2	175.2	175.6	157.9	170.6	167.0	-6.6
Diseases of heart	125.0	116.6	118.2	112.9	106.7	112.0	106.5	105.5	97.4	112.2	116.9	-6.5
Accidents (unintentional injuries)	57.9	51.2	54.9	53.6	52.4	50.3	50.0	57.4	53.0	55.7	68.5	18.4
Other	35.1	35.2	37.7	39.5	38.8	13.4	36.7	41.8	40.4	40.8	50.3	43.4
Motor vehicle accidents	22.8	16.0	17.2	14.0	13.6	14.1	13.3	15.6	12.6	14.9	18.2	-20.1
Chronic liver disease and cirrhosis	25.0	25.3	29.7	29.1	30.2	34.3	35.0	34.7	33.6	37.7	36.3	45.2
Chronic lower respiratory diseases	22.7	21.8	24.7	21.5	20.0	23.6	25.1	24.7	25.4	26.6	28.2	24.3
ALL CAUSES (Number of all deaths)	614.6	582.8	591.8	590.0	587.2	595.0	607.6	620.7	617.7	641.0	657.8	7.0
(8,618) (8,629) (8,899) (8,899) (8,895) (9,212) (9,398) (9,630) (9,898) (10,025) (10,510) (10,911) (26.6)												

Notes: ^a Rates are presented per 100,000 middle-aged adults 45-64 years old; ^b The five causes with the greatest number of deaths over the 2006-2016 period; the cause-of-death titles are according to the Tenth Revision of the International Classification of Diseases (ICD-10); the causes of death for 2006-2016 are classified by ICD-10; measures of comparison between ICD-9 and ICD-10 – the “comparability ratios” - for the causes of death shown in this report are provided in the **Technical Notes**.

TABLE 2C-20
MORTALITY RATES^a FOR THE SELECTED FIVE LEADING CAUSES^b OF DEATH AMONG MIDDLE-AGED ADULTS (45-64 YEARS)
IN URBAN AND RURAL AREAS, ARIZONA, 2006-2016

Area/Cause	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	% change from 2006
URBAN												
Malignant neoplasms	174.8	169.6	162.8	165.4	164.6	166.5	171.8	169.1	153.8	164.8	162.1	-7.3
Diseases of heart	119.9	109.4	109.8	101.3	98.6	103.9	95.9	96.5	89.5	100.3	106.3	-11.4
Accidents (unintentional injuries)	54.2	47.8	51.6	48.8	47.5	45.4	47.6	51.5	47.3	50.2	61.3	13.0
Other	34.5	34.1	36.8	37.3	36.5	12.4	35.7	38.5	36.7	37.8	45.3	31.3
Motor vehicle accidents	19.7	13.7	14.8	11.5	11.1	11.9	11.9	13.0	10.6	12.4	16.0	-19.0
Chronic liver disease and cirrhosis	23.3	23.0	27.4	25.7	27.2	30.8	31.5	29.9	31.5	32.6	30.3	29.9
Chronic lower respiratory diseases	22.3	20.5	23.6	20.2	19.2	20.6	22.9	22.6	23.4	25.0	25.9	16.0
ALL CAUSES	595.0	559.7	559.5	559.4	552.4	561.5	575.8	579.8	584.2	596.5	613.0	3.0
(Number of all deaths)	(6,834)	(6,812)	(6,918)	(6,979)	(7,098)	(7,274)	(7,513)	(7,631)	(7,855)	(8,128)	(8,485)	24.2
RURAL												
Malignant neoplasms	197.0	188.3	188.1	176.9	193.1	186.3	187.8	204.7	175.4	196.4	184.3	-6.4
Diseases of heart	148.1	149.6	156.0	164.3	137.4	143.7	152.5	142.2	133.3	163.5	159.6	7.7
Accidents (unintentional injuries)	74.9	65.3	68.1	71.4	66.2	67.6	55.3	75.8	73.3	72.6	83.8	11.9
Other	37.9	38.7	40.8	46.6	42.6	16.5	36.4	51.7	52.8	46.6	58.3	53.8
Motor vehicle accidents	37.0	26.6	27.3	24.8	23.6	22.5	18.9	24.1	20.5	26.0	25.5	-31.1
Chronic liver disease and cirrhosis	32.3	36.1	39.6	43.3	41.9	49.3	47.5	57.1	41.7	59.2	61.9	91.7
Chronic lower respiratory diseases	24.8	28.1	29.5	27.4	22.2	36.3	33.2	32.3	34.1	33.9	37.9	52.8
ALL CAUSES	702.9	687.3	727.8	713.2	708.3	716.6	720.2	786.8	751.4	821.2	808.3	15.0
(Number of all deaths)	(1,784)	(1,810)	(1,946)	(1,927)	(2,010)	(2,035)	(2,017)	(2,191)	(2,091)	(2,275)	(2,219)	24.4
TOTAL												
Malignant neoplasms	178.8	173.0	167.6	167.9	170.6	171.2	175.2	175.6	157.9	170.6	167.0	-6.6
Diseases of heart	125.0	116.6	118.2	112.9	106.7	112.0	106.5	105.5	97.4	112.2	116.9	-6.5
Accidents (unintentional injuries)	57.9	51.2	54.9	53.6	52.4	50.3	50.0	57.4	53.0	55.7	68.5	18.4
Other	35.1	35.2	37.7	39.5	38.8	13.4	36.7	41.8	40.4	40.8	50.3	43.4
Motor vehicle accidents	22.8	16.0	17.2	14.0	13.6	14.1	13.3	15.6	12.6	14.9	18.2	-20.1
Chronic liver disease and cirrhosis	25.0	25.3	29.7	29.1	30.2	34.3	35.0	34.7	33.6	37.7	36.3	45.2
Chronic lower respiratory diseases	22.7	21.8	24.7	21.5	20.0	23.6	25.1	24.7	25.4	26.6	28.2	24.3
ALL CAUSES	614.6	582.8	591.8	590.0	587.2	595.0	607.6	620.7	617.7	641.0	657.8	7.0
(Number of all deaths)	(8,618)	(8,629)	(8,899)	(8,855)	(9,212)	(9,398)	(9,630)	(9,898)	(10,025)	(10,510)	(10,911)	26.6

Notes: ^a Rates are presented per 100,000 middle-aged adults 45-64 years old; ^b The five causes with the greatest number of deaths over the 2006-2016 period; ^c Urban = Maricopa, Pima, Pinal, and Yuma counties; the remaining counties comprise Arizona's rural areas; see **Technical Notes** for more information; records with unknown county of residence are included in the statewide totals, but are not distributed by urban/rural area; the cause-of-death titles are according to the Tenth Revision of the International Classification of Diseases (ICD-10); the causes of death for 2006-2016 are classified by ICD-10; measures of comparability between ICD-9 and ICD-10 – the "comparability ratios" – for the causes of death shown in this report are provided in the **Technical Notes**.

TABLE 2C-21
**MORTALITY RATES^a FOR THE SELECTED FIVE LEADING CAUSES OF DEATH AMONG MIDDLE-AGED ADULTS (45-64 YEARS)
 BY GENDER IN URBAN AND RURAL AREAS^b, ARIZONA, 2006-2016**

Area/Gender	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	% change from 2006
URBAN												
Male	749.3	714.7	693.2	697.6	690.0	703.5	724.9	726.0	728.1	746.1	769.7	2.7
Female	447.6	410.8	431.1	426.5	423.0	427.8	434.7	441.0	448.0	454.8	464.5	3.8
TOTAL	595.0	559.7	559.5	559.4	552.4	561.5	575.8	579.8	584.2	596.5	613.0	3.0
RURAL												
Male	879.7	891.7	953.6	896.8	924.9	918.6	968.7	1018.5	953.9	1054.9	1079.2	22.7
Female	536.9	497.7	518.4	543.0	504.0	526.1	486.1	568.8	561.6	603.7	557.3	3.8
TOTAL	702.9	687.3	727.8	713.2	708.3	716.6	720.2	786.8	751.4	821.2	808.3	15.0
TOTAL												
Male	772.8	746.4	741.9	738.1	744.1	752.2	778.8	784.8	775.3	809.1	841.8	8.9
Female	464.1	426.7	448.4	448.6	439.6	447.1	445.8	465.2	468.9	482.3	484.1	4.3
TOTAL	614.6	582.8	591.8	590.0	587.2	595.0	607.6	620.7	617.7	641.0	657.8	7.0

Notes: ^a Rates are presented per 100,000 persons 45-64 years old; ^b Urban = Maricopa, Pima, Pinal, and Yuma counties; the remaining counties comprise Arizona's rural areas; see **Technical Notes** for more information.

**TABLE 2C-22
LEADING CAUSES OF DEATH AMONG MIDDLE-AGED ADULTS (45-64 YEARS) BY GENDER, AREA, AND RACE/ETHNICITY,
ARIZONA, 2016**

Cause of death	Gender	Area ^a		Race/ethnicity			
		Male	Female	Rural	Urban	White non-Hispanic or Alaska Native or American Indian or Alaskan Native or African American or Latino	Asian or Pacific Islander
Malignant neoplasms	Total	2,770	1,483	1,287	2,244	506	20
Malignant neoplasm of trachea, bronchus and lung		550†	293	252	431	106	8
Malignant neoplasm of colon, rectum, and anus		280†	166	110	227	46	*
Malignant neoplasm of breast		260†	*	259	217	43	*
Malignant neoplasm of pancreas		230†	139	86	195	28	*
Diseases of heart		1,939	1,370	569	1,471	438	30
Accidents (unintentional injury)		1,137	809	328	848	230	59
Accidental poisoning		540†	363	175	407	98	33
Motor vehicle accidents		300†	233	69	221	70	11
Falls		110†	72	42	88	24	*
Chronic liver disease and cirrhosis		600†	385	217	419	170	13
Diabetes		576	366	210	480	86	10
Chronic lower respiratory diseases		470†	248	220	358	104	6
Intentional self-harm (suicide)		440†	332	109	345	88	8
By discharge of firearms		260†	212	48	205	52	*
By other means		180†	120	61	140	36	*
Cerebrovascular diseases		260†	155	103	213	44	*
Essential (primary) hypertension and hypertensive renal disease		170†	106	59	141	20	*
Influenza and pneumonia		150†	81	70	113	36	*
Viral hepatitis		150†	102	47	123	23	*
Septicemia		110†	63	46	79	26	*
Assault (homicide)		90†	70	22	68	23	*
By discharge of firearms		60†	45	14	47	11	*
By other means		33	25	8	21	12	0
Nephritis, nephrotic syndrome and nephrosis		70†	41	29	46	24	0
Human immunodeficiency virus (HIV) disease		60†	55	*	54	*	
Total, all causes^b		10,911	6,781	4,130	8,485	2,219	207
						7,652	1,784
						573	729
							171

Note: * Cell suppressed due to count less than 6; † Sum rounded to nearest tens unit due to addend less than 6; ^a Urban = Maricopa, Pima, Pinel, and Yuma counties; the remaining counties comprise Arizona's rural areas; ^b May include other causes of death not shown above.

2C.AGE-SPECIFIC MORTALITY

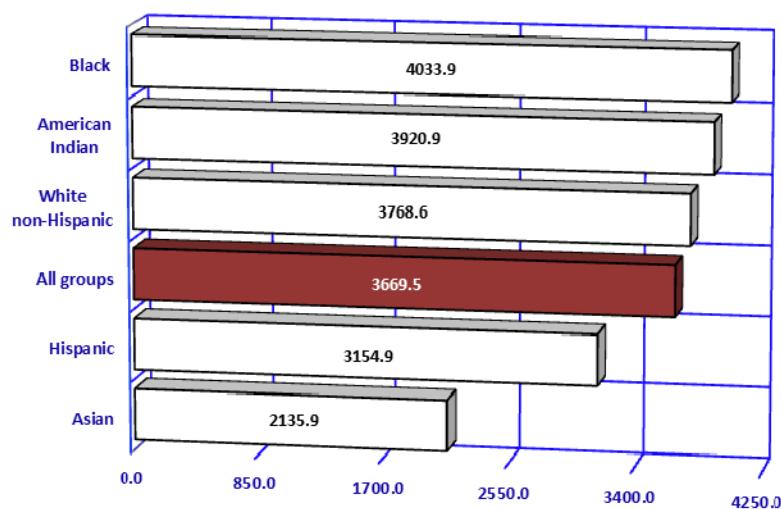
Elderly mortality (ages 65 years and older)

Figure 2C-21
**Mortality Rates^a by Gender and Year among Elderly 65 Years and Older,
Arizona, 2006-2016**



Note: ^a Number of deaths per 100,000 persons, 65+ years old in specified group.

Figure 2C-22
**Mortality Rates^a by Race/Ethnicity among Elderly 65 Years and Older,
Arizona, 2016**



Note: ^a Number of deaths per 100,000 persons, 65+ years old in specified group.

In 2016, an estimated 1,122,454 residents age 65 years and older resided in the state (**Table 10A-1**). No other age group has as great of a disproportionate gender distribution as the elderly. As a result of the higher total mortality rates for males at earlier ages, 17.9 percent more elderly women than men were alive in 2016.

The 2016 elderly mortality rate of 3,669.5 per 100,000 was 9.0 percent lower than the 2006 rate of 4,031.3 (**Table 2C-23**).

The 2016 total mortality rate among elderly females was 12.0 percent lower than their rate in 2006. The mortality rate among elderly males decreased 6.2 percent during the same period (**Figure 2C-21, Table 2C-23**).

In 2016 the mortality rate for Arizona's White non-Hispanic elderly residents was 1.8 times that of the Asian elderly population. The mortality rate of 2,135.9 /100,000 among elderly Asians was the lowest rate among the racial/ethnic groups (**Figure 2C-22**). Hispanic or Latino elderly had the second lowest mortality rate in 2016 at 3,154.9/100,000.

2C.AGE-SPECIFIC MORTALITY

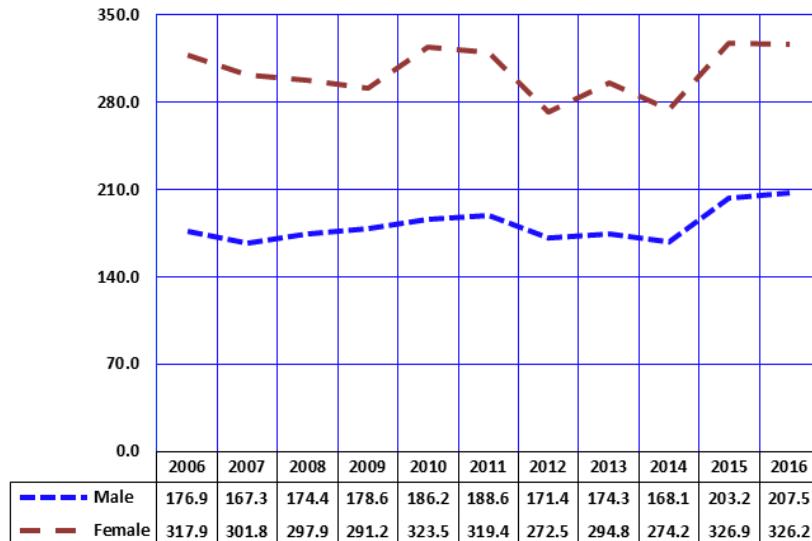
Elderly mortality (ages 65 years and older)

Tables, 2C-23 and 2C-24 provide mortality rates for the five causes with the greatest number of deaths over the 2006–2016 period.

In 2016, Alzheimer's disease (3,048 deaths; **Table 2C-26**) accounted for 7.4 percent of elderly mortality. From 2015 to 2016, mortality due to Alzheimer's disease increased for elderly males while it slightly declined for elderly females (**Figure 2C-23**).

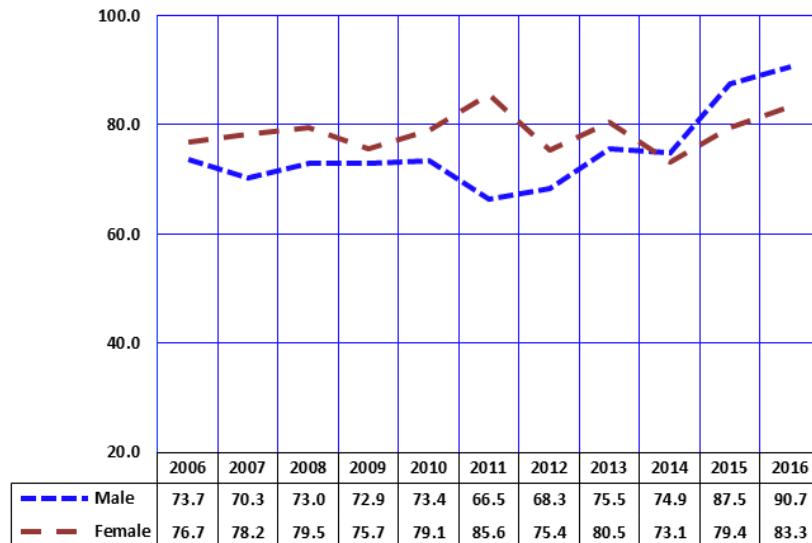
There were 1,975 deaths from Alzheimer's disease among elderly females in 2016, almost twice the number of deaths from this cause among males (1,073; **Table 2C-26**). White non-Hispanic elderly accounted for 85.2 percent of the 2016 deaths from Alzheimer's disease (based on data in **Table 2C-26**).

Figure 2C-23
Trends in Mortality Rates for Alzheimer's Disease^a by Gender and Year
among Elderly 65 Years and Older, Arizona, 2006-2016



Note: ^a Number of deaths due to Alzheimer's disease per 100,000 persons, 65+ years old in specified group.

Figure 2C-24
Trends in Mortality Rates for Falls and Fall-related Injuries^a by Gender and Year among
Elderly 65 Years and Older, Arizona, 2006-2016



Note: ^a Number of deaths due to falls and fall-related injuries per 100,000 persons, 65+ years old in specified group.

TABLE 2C-23
**MORTALITY RATES^a FOR THE SELECTED FIVE LEADING CAUSES^b OF DEATH AMONG ELDERLY (65 YEARS AND OLDER) BY GENDER,
ARIZONA, 2006-2016**

Gender/Cause	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	% change from 2006
MALE												
Diseases of heart	1,138.7	1,079.2	1,114.1	1,073.3	992.8	1,065.5	1,022.2	1,007.0	908.6	970.0	1,003.2	-11.9
Malignant neoplasms	1,058.2	1,020.4	1,006.6	1,017.3	1,007.7	1,007.4	992.6	958.6	899.1	931.7	927.9	-12.3
Chronic lower respiratory diseases	326.7	300.9	316.8	303.6	310.9	318.4	319.9	302.7	290.2	308.7	298.2	-8.7
Alzheimer's disease	176.9	167.3	174.4	178.6	186.2	188.6	171.4	174.3	168.1	203.2	207.5	17.3
Cerebrovascular diseases	195.2	168.6	188.9	182.8	169.3	164.4	165.5	151.8	144.4	183.0	176.8	-9.4
ALL CAUSES	4,282.4	4,002.8	4,095.0	4,025.9	3,974.9	4,083.3	3,987.4	3,904.2	3,883.3	3,975.4	4,019.0	-6.2
(Number of all deaths)	(15,273)	(14,981)	(15,589)	(15,462)	(15,967)	(16,517)	(17,101)	(17,489)	(18,292)	(19,665)	(20,781)	36.1
FEMALE												
Diseases of heart	968.0	891.9	860.8	855.9	804.8	847.2	794.5	763.7	694.9	756.2	741.0	-23.4
Malignant neoplasms	713.1	696.4	691.1	701.6	702.5	710.9	678.6	697.9	628.1	670.5	642.2	-9.9
Alzheimer's disease	317.9	301.8	297.9	291.2	323.5	319.4	272.5	294.8	274.2	326.9	326.2	2.6
Chronic lower respiratory diseases	286.3	255.0	279.3	273.5	272.6	301.4	268.6	283.6	248.3	286.8	288.1	0.6
Cerebrovascular diseases	258.7	246.8	229.2	218.5	229.9	231.0	208.0	198.1	191.1	210.5	218.4	-15.6
ALL CAUSES	3,828.7	3,597.1	3,544.8	3,515.6	3,521.7	3,681.4	3,489.9	3,468.6	3,378.3	3,412.6	3,371.1	-12.0
(Number of all deaths)	(16,919)	(16,601)	(16,625)	(16,636)	(16,909)	(17,798)	(17,855)	(18,494)	(18,718)	(19,815)	(20,408)	20.6
TOTAL												
Diseases of heart	1,044.8	975.7	974.3	953.3	890.4	946.8	898.3	874.8	793.1	854.5	861.8	-17.5
Malignant neoplasms	867.2	841.5	832.4	843.0	841.5	846.1	821.8	816.9	752.6	790.7	773.8	-10.8
Chronic lower respiratory diseases	304.3	275.6	296.1	287.0	290.1	309.1	292.0	292.3	267.6	296.8	292.8	-3.8
Alzheimer's disease	258.2	241.6	242.6	240.8	260.9	259.8	226.4	239.8	225.4	270.0	271.5	5.2
Cerebrovascular diseases	230.3	211.8	211.1	202.5	202.3	200.7	188.6	176.9	169.6	197.8	199.2	-13.5
ALL CAUSES	4,031.3	3,778.8	3,791.3	3,744.2	3,728.2	3,864.8	3,716.9	3,667.5	3,610.4	3,671.5	3,669.5	-9.0
(Number of all deaths)	(32,192)	(31,852)	(32,214)	(32,098)	(32,876)	(34,318) ^c	(34,958)	(35,983)	(37,010)	(39,480)	(41,189)	27.9

Notes: ^a Rates are presented per 100,000 elderly persons 65 years and older; ^b The five causes with the greatest number of deaths over the 2006-2016 period; ^c Total (number of all deaths) includes 2 unknown gender; the cause-of-death titles are according to the Tenth Revision of the International Classification of Diseases (ICD-10); the causes of death for 2006-2016 are classified by ICD-10, replacing the Ninth Revision (ICD-9).

TABLE 2C-24

**MORTALITY RATES^a FOR THE SELECTED FIVE LEADING CAUSES^b OF DEATH AMONG ELDERLY (65 YEARS AND OLDER)
IN URBAN AND RURAL AREAS^c, ARIZONA, 2006-2016**

Area/Cause	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	% change from 2006
URBAN												
Diseases of heart	1,055.0	983.1	971.9	952.2	888.5	932.0	891.8	862.3	781.0	830.2	835.5	-20.8
Malignant neoplasms	854.5	834.1	817.9	835.0	834.0	846.2	825.5	807.6	748.7	783.6	756.6	-11.5
Alzheimer's disease	270.7	262.4	261.3	263.2	284.9	288.9	251.5	272.0	252.6	291.9	286.0	5.6
Chronic lower respiratory diseases	303.2	271.8	289.2	282.2	288.7	311.3	288.9	286.3	267.8	292.0	285.8	-5.8
Cerebrovascular diseases	234.6	211.3	206.4	206.1	201.5	202.0	192.8	180.1	172.6	198.1	197.5	-15.8
ALL CAUSES	4,053.0	3,792.4	3,765.0	3,765.4	3,738.3	3,886.0	3,740.3	3,663.4	3,615.6	3,650.2	3,624.7	-10.6
(Number of all deaths)	(25,585)	(25,143)	(25,374)	(25,596)	(26,043)	(27,302)	(27,824)	(28,442)	(29,416)	(31,179)	(32,370)	26.5
RURAL												
Diseases of heart	1,006.1	946.3	979.3	950.4	889.9	990.4	912.5	919.1	834.0	935.2	947.2	-5.9
Malignant neoplasms	915.2	868.7	883.7	865.3	864.6	840.5	802.6	847.8	764.5	810.8	828.2	-9.5
Chronic lower respiratory diseases	308.5	290.0	322.1	302.5	291.6	298.9	299.6	314.0	264.3	311.1	311.2	0.9
Alzheimer's disease	195.5	161.5	166.7	152.1	169.6	145.1	130.2	117.2	118.7	184.1	211.9	8.4
Cerebrovascular diseases	214.0	213.6	228.2	187.0	204.1	193.1	171.9	164.1	157.9	195.8	204.0	-4.7
ALL CAUSES	3,949.5	3,723.8	3,863.1	3,628.5	3,657.5	3,741.1	3,590.0	3,665.4	3,558.1	3,706.3	3,771.9	-4.5
(Number of all deaths)	(6,607)	(6,434)	(6,789)	(6,441)	(6,773)	(6,935)	(7,058)	(7,505)	(7,526)	(8,196)	(8,653)	31.0
TOTAL												
Diseases of heart	1,044.8	975.7	974.3	953.3	890.4	946.8	898.3	874.8	793.1	854.5	861.8	-17.5
Malignant neoplasms	867.2	841.5	832.4	843.0	841.5	846.1	821.8	816.9	752.6	790.7	773.8	-10.8
Chronic lower respiratory diseases	304.3	275.6	296.1	287.0	290.1	309.1	292.0	292.3	267.6	296.8	292.8	-3.8
Alzheimer's disease	258.2	241.6	242.6	240.8	260.9	259.8	226.4	239.8	225.4	270.0	271.5	5.2
Cerebrovascular diseases	230.3	211.8	211.1	202.5	202.3	200.7	188.6	176.9	169.6	197.8	199.2	-13.5
ALL CAUSES	4,031.3	3,778.8	3,791.3	3,744.2	3,728.2	3,864.8	3,716.9	3,667.5	3,610.4	3,671.5	3,669.5	-9.0
(Number of all deaths)	(32,192)	(31,852)	(32,214)	(32,098)	(32,876)	(34,318)	(34,958)	(35,983)	(37,010)	(39,480)	(41,189)	27.9

Notes: ^a Rates are presented per 100,000 elderly persons 65 years and older; ^b The five causes with the greatest number of deaths over the 2006-2016 period; ^c Urban = Maricopa, Pima, Pinal, and Yuma counties; the remaining counties comprise Arizona's rural areas; see **Technical Notes** for more information; records with unknown county of residence are included in the statewide totals, but are not distributed by urban/rural area; the cause-of-death titles are according to the Tenth Revision of the International Classification of Diseases (ICD-10); the causes of death for 2006-2016 are classified by ICD-10, replacing the Ninth Revision (ICD-9); measures of comparison between ICD-9 and ICD-10 – the "comparability ratios" - for the causes of death shown in this report are provided in the **Technical Notes**.

TABLE 2C-25
MORTALITY RATES^a FOR THE FIVE LEADING CAUSES OF DEATH AMONG ELDERLY (65 YEARS AND OLDER)
BY GENDER IN URBAN AND RURAL AREAS^b, ARIZONA, 2006-2016

Area/Gender	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	% change from 2006
URBAN												
Male	4283.2	3986.1	4053.2	4013.8	3976.9	4107.6	3980.1	3898.2	3888.6	3944.3	3960.2	-7.5
Female	3871.5	3638.1	3534.9	3567.5	3543.8	3705.0	3543.8	3470.8	3388.5	3405.1	3344.3	-13.6
TOTAL	4053.0	3792.4	3765.0	3765.4	3738.3	3886.0	3740.3	3663.4	3615.6	3650.2	3624.7	-10.6
RURAL												
Male	4279.7	4058.9	4216.1	4021.7	3917.1	3948.9	3952.6	3895.3	3826.7	4027.0	4133.9	-3.4
Female	3658.6	3432.7	3555.8	3286.5	3418.2	3547.4	3256.0	3454.5	3309.8	3409.1	3435.2	-6.1
TOTAL	3949.5	3723.8	3863.1	3628.5	3657.5	3741.1	3590.0	3665.4	3558.1	3706.3	3771.9	-4.5
TOTAL												
Male	4282.4	4002.8	4095.0	4025.9	3974.9	4083.3	3987.4	3904.2	3883.3	3975.4	4019.0	-6.2
Female	3828.7	3597.1	3544.8	3515.6	3521.7	3681.4	3489.9	3468.6	3378.3	3412.6	3371.1	-12.0
TOTAL	4031.3	3778.8	3791.3	3744.2	3728.2	3864.8	3716.9	3667.5	3610.4	3671.5	3669.5	-9.0

Notes: ^a Rates are presented per 100,000 persons 65 years and older; ^b Urban = Maricopa, Pima, Pinal, and Yuma counties; the remaining counties comprise Arizona's rural areas; see **Technical Notes** for more information.

**TABLE 2C-26
LEADING CAUSES OF DEATH AMONG ELDERLY (65 YEARS AND OLDER) BY GENDER, AREA, AND RACE/ETHNICITY,
ARIZONA, 2016**

Cause of death	Total	Gender		Area ^a		Race/ethnicity			
		Male	Female	Urban	Rural	White non-Hispanic	Hispanic or Latino	American Indian or Alaska Native	Asian or Pacific Islander
Diseases of heart	9,673	5,187	4,486	7,461	2,173	39	8,216	929	236
Malignant neoplasms	8,686	4,798	3,888	6,757	1,900	29	7,374	832	241
Malignant neoplasm of trachea, bronchus and lung	2,132	1,153	979	1,644	479	9	1,895	147	57
Malignant neoplasm of lymphoid, hematopoietic and related tissue	890†	509	380	722	165	*	767	81	28
Malignant neoplasm of colon, rectum, and anus	756	405	351	587	168	*	637	74	23
Malignant neoplasm of pancreas	666	348	318	526	137	*	540	81	19
Malignant neoplasm of prostate	630†	631	0	495	133	*	522	68	28
Malignant neoplasm of breast	540†	7	530	408	128	*	467	41	15
Chronic lower respiratory diseases	3,286	1,542	1,744	2,552	714	20	3,002	171	66
Alzheimer's disease	3,048	1,073	1,975	2,554	486	8	2,598	303	72
Cerebrovascular diseases	2,236	914	1,322	1,764	468	*	1,833	253	69
Accidents (unintentional injury)	1,463	779	684	1,152	295	16	1,211	155	20
Falls	973	469	504	799	169	*	847	89	8
Motor vehicle accidents	190†	123	62	135	43	7	133	34	*
Diabetes	1,362	783	579	1,109	246	7	891	298	57
Essential (primary) hypertension and hypertensive disease	831	386	445	711	116	*	643	118	36
Parkinson's disease	697	455	242	587	107	*	605	63	6
Influenza and pneumonia	670	331	339	514	154	*	520	85	14
Nephritis, nephrotic syndrome and nephrosis	400†	204	199	260	140	*	283	70	10
Septicemia	368	191	177	267	100	*	277	51	14
Total, all causes^b	41,189	20,781	20,408	32,370	8,653	166	34,367	4,287	1,005

Notes: * Cell suppressed due to count less than 6; † Sum rounded to nearest tens unit due to addend less than 6; ^a Urban = Maricopa, Pima, Pinal, and Yuma counties; the remaining counties comprise Arizona's rural areas; ^b May include other causes of death not shown above..

COMPARATIVE CAUSE-SPECIFIC MORTALITY BY AGE GROUP

TABLE 2C-27
COMPARISON OF CAUSES OF MORTALITY BY AGE GROUP, ARIZONA, 2016

	All ages	Infants <1	Children 1-14	Adoles- cents 15- 19	Young adults 20- 44	Middle- aged adults 45- 64	Elderly 65+	Un- known
Total, all causes	56,480	454	231	247	3,441	10,911	41,189	7
Salmonella infections	0†	0	0	0	*	0	0	0
Shigellosis and amebiasis	0	0	0	0	0	0	0	0
Certain other intestinal infections	230†	*	0	0	7	31	182	0
Enterocolitis due to Clostridium difficile	160†	0	0	0	*	20	140	0
Tuberculosis	10†	0	0	0	*	*	*	0
Respiratory tuberculosis	10†	0	0	0	0	*	*	0
Other tuberculosis	0†	0	0	0	*	0	0	0
Whooping cough	0†	*	0	0	0	0	0	0
Scarlet fever and erysipelas	0	0	0	0	0	0	0	0
Meningococcal infection	0	0	0	0	0	0	0	0
Septicemia	510†	*	*	0	24	109	368	0
Syphilis	0†	0	0	0	0	*	*	0
Acute poliomyelitis	0	0	0	0	0	0	0	0
Arthropod-borne encephalitis	0	0	0	0	0	0	0	0
Measles	0	0	0	0	0	0	0	0
Viral hepatitis	220†	0	0	0	*	149	63	0
Human immunodeficiency virus (HIV) disease	96	0	0	0	28	60	8	0
Malaria	0	0	0	0	0	0	0	0
Other and unspecified infectious and parasitic diseases	160†	0	*	*	15	38	102	0
Malignant neoplasms	11,800†	*	18	11	313	2,770	8,686	0
Malignant neoplasm of lip, oral cavity and pharynx	210†	0	*	0	*	54	147	0
Malignant neoplasm of esophagus	310	0	0	0	6	92	212	0
Malignant neoplasm of stomach	226	0	0	0	16	67	143	0
Malignant neoplasm of colon, rectum, and anus	1,069	0	0	0	37	276	756	0
Malignant neoplasm of liver and intrahepatic bile ducts	550†	0	*	0	6	194	350	0
Malignant neoplasm of pancreas	901	0	0	0	10	225	666	0
Malignant neoplasm of larynx	80†	0	0	0	*	25	49	0
Malignant neoplasm of trachea, bronchus and lung	2,690†	0	0	*	11	545	2,132	0
Malignant melanoma of skin	191	0	0	0	15	47	129	0
Malignant neoplasm of breast	853	0	0	0	55	261	537	0
Malignant neoplasm of cervix uteri	82	0	0	0	15	34	33	0
Malignant neoplasm of corpus uteri and uterus, part unspecified	170†	0	0	0	*	58	108	0
Malignant neoplasm of ovary	307	0	0	0	13	92	202	0
Malignant neoplasm of prostate	697	0	0	0	0	66	631	0
Malignant neoplasm of kidney and renal pelvis	308	0	0	0	8	79	221	0
Malignant neoplasm of bladder	370†	0	0	0	*	47	319	0

TABLE 2C-27 (continued)
COMPARISON OF CAUSES OF MORTALITY BY AGE GROUP, ARIZONA, 2016

	All ages	Infants <1	Children 1-14	Adolescents 15-19	Young adults 20-44	Middle-aged adults 45-64	Elderly 65+	Un-known
Malignant neoplasm of meninges, brain and other parts of CNS	340†	*	*	*	28	116	192	0
Malignant neoplasm of lymphoid, hematopoietic and related tissue	1,140†	*	7	*	35	207	889	0
Hodgkin's disease	20†	0	0	0	*	9	12	0
Non-Hodgkin's lymphoma	399	0	0	0	9	78	312	0
Leukemia	480†	*	7	*	22	75	369	0
Multiple myeloma and immunoproliferative neoplasms	240†	0	0	0	*	45	195	0
Other and unspecified malignant neoplasms of lymphoid tissue	0†	0	0	0	0	0	*	0
All other and unspecified malignant neoplasm	1,320†	*	8	*	51	285	970	0
In situ neoplasms	350†	*	0	*	16	40	294	0
Anemias	60†	0	*	0	*	8	46	0
Diabetes	2,010†	0	*	0	73	576	1,362	0
Nutritional deficiencies	141	0	0	0	0	12	129	0
Malnutrition	132	0	0	0	0	11	121	0
Other nutritional deficiencies	10†	0	0	0	0	*	8	0
Obesity	193	0	0	0	42	94	57	0
Meningitis	10†	*	*	0	*	*	*	0
Parkinson's disease	710†	0	0	0	*	14	697	0
Alzheimer's disease	3,081	0	0	0	0	33	3,048	0
Major cardiovascular diseases	15,820†	*	10	*	251	2,436	13,114	*
Diseases of heart	11,820†	*	6	*	194	1,939	9,673	*
Acute rheumatic fever and chronic rheumatic heart disease	80†	0	0	0	*	11	64	0
Hypertensive heart disease	1,114	0	0	0	35	209	870	0
Hypertensive heart and renal disease	110†	0	0	0	*	16	94	0
Ischemic heart disease	7,734	0	0	0	72	1,359	6,302	*
Acute myocardial infarction	1,755	0	0	0	23	349	1,383	0
Other acute ischemic heart disease	31	0	0	0	0	7	24	0
Other forms of chronic ischemic heart disease	5,948	0	0	0	49	1,003	4,895	*
Atherosclerotic cardiovascular disease	1,954	0	0	0	36	588	1,330	0
All other forms of chronic ischemic heart disease	3,994	0	0	0	13	415	3,565	*
Other heart diseases	2,780†	*	6	*	84	344	2,343	0
Acute and subacute endocarditis	39	0	0	0	6	13	20	0
Diseases of pericardium and acute myocarditis	20†	*	*	0	*	6	*	0
Heart failure	690†	0	0	0	*	31	653	0
All other forms of heart disease	2,040†	*	*	*	75	294	1,665	0
Essential (primary) hypertension and hypertensive renal disease	1,010	0	0	0	14	165	831	0
Cerebrovascular diseases	2,540†	*	*	*	35	258	2,236	0
Atherosclerosis	70†	0	0	0	0	*	70	0

TABLE 2C-27 (continued)
COMPARISON OF CAUSES OF MORTALITY BY AGE GROUP, ARIZONA, 2016

	All ages	Infants <1	Children 1-14	Adoles- cents 15- 19	Young adults 20- 44	Middle- aged adults 45- 64	Elderly 65+	Un- known
Other diseases of circulatory system	384	0	0	0	8	72	304	0
Aortic aneurysm and dissection	198	0	0	0	7	46	145	0
Other disease of arteries, arterioles and capillaries	190†	0	0	0	*	26	159	0
Other disorders of circulatory system	100†	0	*	0	14	34	55	0
Influenza and pneumonia	860†	*	6	0	28	151	670	0
Influenza	150†	0	*	0	8	45	92	0
Pneumonia	710†	*	*	0	20	106	578	0
Other acute lower respiratory infections	0†	0	0	0	0	0	*	0
Acute bronchiolitis	0†	0	0	0	0	0	*	0
Unspecified acute lower respiratory infection	0	0	0	0	0	0	0	0
Chronic lower respiratory diseases	3,790†	0	*	*	29	468	3,286	0
Bronchitis, chronic and unspecified	10†	0	*	0	0	0	7	0
Emphysema	180†	0	0	0	*	34	145	0
Asthma	110†	0	*	*	23	34	45	0
Other chronic lower respiratory diseases	3,500†	0	*	0	*	400	3,089	0
Pneumoconioses and chemical effects	20†	0	0	0	*	0	*	12
Pneumonitis due to solids and liquids	290†	*	*	0	*	34	247	0
Other disease of respiratory system	638	7	6	0	11	85	529	0
Peptic ulcer	70†	0	0	0	*	16	53	0
Diseases of appendix	10†	0	0	*	*	*	8	0
Hernia	40†	0	0	0	*	9	28	0
Chronic liver disease and cirrhosis	1,169	0	0	0	145	602	422	0
Alcoholic liver disease	846	0	0	0	124	474	248	0
Other chronic liver disease and cirrhosis	323	0	0	0	*	21	128	0
Cholelithiasis and other disorders of gallbladder	90†	0	0	0	*	14	73	0
Nephritis, nephrotic syndrome and nephrosis	490†	*	0	0	11	70	403	0
Acute and rapidly progressive nephritic and nephrotic syndrome	10†	0	0	0	0	0	*	0
Chronic glomerulonephritis	10†	0	0	0	*	*	*	0
Renal failure	470†	*	0	0	8	68	396	0
Others disorders of kidney	0	0	0	0	0	0	0	0
Infections of kidney	10†	0	0	0	*	*	8	0
Hyperplasia of prostate	11	0	0	0	0	0	11	0
Inflammatory diseases of female pelvic organs	0†	0	0	0	0	0	*	0
Pregnancy, childbirth and the puerperium	30†	0	*	*	25	0	0	0
Pregnancy with abortive outcome	0†	0	0	0	*	0	0	0
Other complications of pregnancy, childbirth and the puerperium	30†	0	*	24	0	0	0	0

TABLE 2C-27 (continued)
COMPARISON OF CAUSES OF MORTALITY BY AGE GROUP, ARIZONA, 2016

	All ages	Infants <1	Children 1-14	Adolescents 15-19	Young adults 20-44	Middle-aged adults 45-64	Elderly 65+	Unknown
Perinatal conditions	220†	208	6	0	*	0	0	0
Congenital anomalies, deformations and chromosomal abnormalities	210†	105	11	*	21	40	29	0
Symptoms, signs, abnormal findings	1,899	74	22	11	188	276	1,323	*
Total accidents	3,899	16	73	101	1,109	1,137	1,463	0
Transport accidents	1,030†	*	43	60	396	324	203	0
Motor vehicle accidents	970†	*	43	57	378	302	185	0
Other land transport accidents	20†	0	0	*	10	*	6	0
Water, air, space	40†	0	0	*	8	17	12	0
Nontransport accidents	2,871	14	30	41	713	813	1,260	0
Falls	1,103	0	0	0	16	114	973	0
Accidental discharge of firearms	10†	0	0	*	*	*	*	0
Accidental drowning and submersion	105	0	20	7	27	26	25	0
Accidental exposure to smoke, fire and flames	40†	0	*	*	7	16	15	0
Accidental poisoning	1,250†	0	*	27	609	538	73	0
Other and unspecified nontransport accidents	370†	14	8	*	52	116	173	0
Intentional self-harm (suicide)	1,256	0	9	56	463	441	287	0
By discharge of firearms	747	0	0	24	233	260	230	0
By other means	509	0	9	32	230	181	57	0
Assault (homicide)	420†	*	14	34	246	92	26	0
By discharge of firearms	300†	0	*	27	195	59	15	0
By other means	120†	*	9	7	51	33	11	0
Legal intervention	10†	0	0	0	13	*	0	0
Events of undetermined intent	170†	6	*	67	70	20	*	
Discharge of firearms	20†	0	*	9	*	*	*	
Other and unspecified events of undetermined intent	160†	6	*	58	69	18	0	
Operations of war	0†	0	0	0	0	*	0	
Complications of medical and surgical care	50†	*	0	0	6	16	24	0
Injury by firearms	1,084	0	6	54	451	324	248	*
Drug-induced deaths	1,460†	*	*	30	63	642	123	0
Opioid-induced deaths ^{†++}	740†	*	*	17	412	266	45	0
Alcohol-induced deaths	1,310†	0	0	*	239	720	349	0

Notes: * Cell suppressed due to count less than 6; † Sum rounded to nearest tens unit due to addend less than 6; the causes of death in this table are classified by the Tenth Revision of the International Classification of Diseases (ICD-10); ^{†++} First ever published sub-category of drug-induced deaths.

TABLE 2C-28
COMPARISON OF CAUSE-SPECIFIC MORTALITY RATES^a BY AGE GROUP, ARIZONA, 2016

	All ages	Infants <1	Children 1-14	Adolescents 15-19	Young adults 20-44	Middle-aged adults 45-64	Elderly 65+
Total, all causes	826.3	524.6	18.3	53.5	153.3	657.8	3669.5
Salmonella infections	0.0	0.0	0.0	0.0	* *	0.0	0.0
Shigellosis and amebiasis	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Certain other intestinal infections	3.4	**	0.0	0.0	0.3	1.9	16.2
Enterocolitis due to Clostridium difficile	2.4	0.0	0.0	0.0	**	1.2	12.5
Tuberculosis	0.1	0.0	0.0	0.0	**	**	***
Respiratory tuberculosis	0.1	0.0	0.0	0.0	0.0	**	***
Other tuberculosis	0.0	0.0	0.0	0.0	**	0.0	0.0
Whooping cough	0.0	**	0.0	0.0	0.0	0.0	0.0
Scarlet fever and erysipelas	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Meningococcal infection	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Septicemia	7.4	**	0.0	0.0	0.0	1.1	6.6
Syphilis	0.0	0.0	0.0	0.0	0.0	0.0	**
Acute poliomyelitis	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Arthropod-borne encephalitis	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Measles	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Viral hepatitis	3.2	0.0	0.0	0.0	**	9.0	5.6
Human immunodeficiency virus (HIV) disease	1.4	0.0	0.0	0.0	1.2	3.6	0.7
Malaria	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Other and unspecified infectious and parasitic diseases	2.4	0.0	**	**	0.7	2.3	9.1
Malignant neoplasms	172.6	**	1.4	2.4	13.9	167.0	773.8
Malignant neoplasm of lip, oral cavity and pharynx	3.0	0.0	**	0.0	**	3.3	13.1
Malignant neoplasm of esophagus	4.5	0.0	0.0	0.0	0.3	5.5	18.9
Malignant neoplasm of stomach	3.3	0.0	0.0	0.0	0.7	4.0	12.7
Malignant neoplasm of colon, rectum, and anus	15.6	0.0	0.0	0.0	1.6	16.6	67.4
Malignant neoplasm of liver and intrahepatic bile ducts	8.1	0.0	**	0.0	0.3	11.7	31.2
Malignant neoplasm of pancreas	13.2	0.0	0.0	0.0	0.4	13.6	59.3
Malignant neoplasm of larynx	1.1	0.0	0.0	0.0	**	1.5	4.4
Malignant neoplasm of trachea, bronchus and lung	39.3	0.0	0.0	**	0.5	32.9	189.9
Malignant melanoma of skin	2.8	0.0	0.0	0.0	0.7	2.8	11.5
Malignant neoplasm of breast	12.5	0.0	0.0	0.0	2.5	15.7	47.8
Malignant neoplasm of cervix uteri	1.2	0.0	0.0	0.0	0.7	2.0	2.9
Malignant neoplasm of corpus uteri and uterus, part unspecified	2.5	0.0	0.0	0.0	**	3.5	9.6
Malignant neoplasm of ovary	4.5	0.0	0.0	0.0	0.6	5.5	18.0
Malignant neoplasm of prostate	10.2	0.0	0.0	0.0	0.0	4.0	56.2
Malignant neoplasm of kidney and renal pelvis	4.5	0.0	0.0	0.0	0.4	4.8	19.7
Malignant neoplasm of bladder	5.4	0.0	0.0	0.0	**	2.8	28.4

TABLE 2C-28 (continued)
COMPARISON OF CAUSE-SPECIFIC MORTALITY RATES^a BY AGE GROUP, ARIZONA, 2016

	All ages	Infants <1	Children 1-14	Adolescents 15-19	Young adults 20-44	Middle-aged adults 45-64	Elderly 65+
Malignant neoplasm of meninges, brain and other parts of CNS	5.0	**	**	**	1.2	7.0	17.1
Malignant neoplasm of lymphoid, hematopoietic and related tissue	16.7	**	0.6	**	1.6	12.5	79.2
Hodgkin's disease	0.3	0.0	0.0	0.0	**	0.5	1.1
Non-Hodgkin's lymphoma	5.8	0.0	0.0	0.0	0.4	4.7	27.8
Leukemia	7.0	**	0.6	**	1.0	4.5	32.9
Multiple myeloma and immunoproliferative neoplasms	3.6	0.0	0.0	0.0	**	2.7	17.4
Other and unspecified malignant neoplasms of lymphoid tissue	0.0	0.0	0.0	0.0	0.0	0.0	**
All other and unspecified malignant neoplasm	19.3	**	0.6	**	2.3	17.2	86.4
In situ neoplasms	5.2	**	0.0	**	0.7	2.4	26.2
Anemias	0.9	0.0	**	0.0	**	0.5	4.1
Diabetes	29.4	0.0	**	0.0	3.3	34.7	121.3
Nutritional deficiencies	2.1	0.0	0.0	0.0	0.0	0.7	11.5
Mainnutrition	1.9	0.0	0.0	0.0	0.0	0.7	10.8
Other nutritional deficiencies	0.1	0.0	0.0	0.0	0.0	**	0.7
Obesity	2.8	0.0	0.0	0.0	1.9	5.7	5.1
Meningitis	0.2	**	**	0.0	**	**	**
Parkinson's disease	10.4	0.0	0.0	0.0	**	0.8	62.1
Alzheimer's disease	45.1	0.0	0.0	0.0	0.0	2.0	271.5
Major cardiovascular diseases	231.5	**	0.8	**	11.2	146.9	1168.3
Diseases of heart	172.9	**	0.5	**	8.6	116.9	861.8
Acute rheumatic fever and chronic rheumatic heart disease	1.1	0.0	0.0	0.0	**	0.7	5.7
Hypertensive heart disease	16.3	0.0	0.0	0.0	1.6	12.6	77.5
Hypertensive heart and renal disease	1.6	0.0	0.0	0.0	**	1.0	8.4
Ischemic heart disease	113.1	0.0	0.0	0.0	3.2	81.9	561.4
Acute myocardial infarction	25.7	0.0	0.0	0.0	1.0	21.0	123.2
Other acute ischemic heart disease	0.5	0.0	0.0	0.0	0.0	0.4	2.1
Other forms of chronic ischemic heart disease	87.0	0.0	0.0	0.0	2.2	60.5	436.1
Atherosclerotic cardiovascular disease	28.6	0.0	0.0	0.0	1.6	35.5	118.5
All other forms of chronic ischemic heart disease	58.4	0.0	0.0	0.0	0.6	25.0	317.6
Other heart diseases	40.7	**	0.5	**	3.7	20.7	208.7
Acute and subacute endocarditis	0.6	0.0	0.0	0.0	0.3	0.8	1.8
Diseases of pericardium and acute myocarditis	0.2	**	**	0.0	**	0.4	**
Heart failure	10.0	0.0	0.0	0.0	**	1.9	58.2
All other forms of heart disease	29.9	**	**	**	3.3	17.7	148.3
Essential (primary) hypertension and hypertensive renal disease	14.8	0.0	0.0	0.0	0.6	9.9	74.0
Cerebrovascular diseases	37.1	**	**	**	1.6	15.6	199.2
Atherosclerosis	1.1	0.0	0.0	0.0	0.0	**	6.2

TABLE 2C-28 (continued)
COMPARISON OF CAUSE-SPECIFIC MORTALITY RATES^a BY AGE GROUP, ARIZONA, 2016

	All ages	Infants <1	Children 1-14	Adoles- cents 15- 19	Young adults 20- 44	Middle- aged adults 45- 64	Elderly 65+
Other diseases of circulatory system	5.6	0.0	0.0	0.0	0.4	4.3	27.1
Aortic aneurysm and dissection	2.9	0.0	0.0	0.0	0.3	2.8	12.9
Other disease of arteries, arterioles and capillaries	2.7	0.0	0.0	0.0	**	1.6	14.2
Other disorders of circulatory system	1.5	0.0	**	0.0	0.6	2.0	4.9
Influenza and pneumonia	12.6	**	0.5	0.0	1.2	9.1	59.7
Influenza	2.1	0.0	**	0.0	0.4	2.7	8.2
Pneumonia	10.4	**	**	0.0	0.9	6.4	51.5
Other acute lower respiratory infections	0.0	0.0	0.0	0.0	0.0	0.0	**
Acute bronchiolitis	0.0	0.0	0.0	0.0	0.0	0.0	**
Unspecified acute lower respiratory infection	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Chronic lower respiratory diseases	55.4	0.0	**	**	1.3	28.2	292.8
Bronchitis, chronic and unspecified	0.1	0.0	**	0.0	0.0	0.0	0.6
Emphysema	2.6	0.0	0.0	0.0	**	2.0	12.9
Asthma	1.5	0.0	**	**	1.0	2.0	4.0
Other chronic lower respiratory diseases	51.1	0.0	**	0.0	**	24.1	275.2
Pneumoconioses and chemical effects	0.2	0.0	0.0	0.0	0.0	**	1.1
Pneumonitis due to solids and liquids	4.2	**	**	0.0	**	2.0	22.0
Other disease of respiratory system	9.3	8.1	0.5	0.0	0.5	5.1	47.1
Peptic ulcer	1.0	0.0	0.0	0.0	**	1.0	4.7
Diseases of appendix	0.2	0.0	0.0	0.0	**	**	0.7
Hernia	0.6	0.0	0.0	0.0	**	0.5	2.5
Chronic liver disease and cirrhosis	17.1	0.0	0.0	0.0	6.5	36.3	37.6
Alcoholic liver disease	12.4	0.0	0.0	0.0	5.5	28.6	22.1
Other chronic liver disease and cirrhosis	4.7	0.0	0.0	0.0	0.9	7.7	15.5
Cholelithiasis and other disorders of gallbladder	1.3	0.0	0.0	0.0	**	0.8	6.5
Nephritis, nephrotic syndrome and nephrosis	7.1	**	0.0	0.0	0.5	4.2	35.9
Acute and rapidly progressive nephritic and nephrotic syndrome	0.1	0.0	0.0	0.0	0.0	0.0	**
Chronic glomerulonephritis	0.1	0.0	0.0	0.0	**	**	**
Renal failure	6.9	**	0.0	0.0	0.4	4.1	35.3
Others disorders of kidney	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Infections of kidney	0.2	0.0	0.0	0.0	**	**	0.7
Hyperplasia of prostate	0.2	0.0	0.0	0.0	0.0	0.0	1.0
Inflammatory diseases of female pelvic organs	0.0	0.0	0.0	0.0	0.0	0.0	**
Pregnancy, childbirth and the puerperium	0.4	0.0	0.0	**	1.1	0.0	0.0
Pregnancy with abortive outcome	0.0	0.0	0.0	0.0	* *	0.0	0.0
Other complications of pregnancy, childbirth and the puerperium	0.4	0.0	0.0	**	1.1	0.0	0.0

TABLE 2C-28 (continued)
COMPARISON OF CAUSE-SPECIFIC MORTALITY RATES^a BY AGE GROUP, ARIZONA, 2016

	All ages	Infants <1	Children 1-14	Adolescents 15-19	Young adults 20-44	Middle-aged adults 45-64	Elderly 65+
Perinatal conditions							
Congenital anomalies, deformations and chromosomal abnormalities	3.1	240.4	0.5	0.0	**	0.0	0.0
Symptoms, signs, abnormal findings	3.1	121.3	0.9	**	0.9	2.4	2.6
Total accidents	27.8	85.5	1.7	2.4	8.4	16.6	117.9
Transport accidents	57.0	18.5	5.8	21.9	49.4	68.5	130.3
Motor vehicle accidents	15.0	**	3.4	13.0	17.6	19.5	18.1
Other land transport accidents	14.1	**	3.4	12.3	16.8	18.2	16.5
Water, air, space	0.3	0.0	0.0	**	0.4	**	0.5
Nontransport accidents	0.6	0.0	0.0	**	0.4	1.0	1.1
Falls	42.0	16.2	2.4	8.9	31.8	49.0	112.3
Accidental discharge of firearms	16.1	0.0	0.0	0.0	0.7	6.9	86.7
Accidental drowning and submersion	0.1	0.0	0.0	**	**	**	**
Accidental exposure to smoke, fire and flames	1.5	0.0	1.6	1.5	1.2	1.6	2.2
Accidental poisoning	0.6	0.0	**	**	0.3	1.0	1.3
Other and unspecified nontransport accidents	18.3	0.0	**	5.8	27.1	32.4	6.5
Intentional self-harm (suicide)	5.4	16.2	0.6	**	2.3	7.0	15.4
By discharge of firearms	18.4	0.0	0.7	12.1	20.6	26.6	25.6
By other means	10.9	0.0	0.0	5.2	10.4	15.7	20.5
Assault (homicide)	7.4	0.0	0.7	6.9	10.2	10.9	5.1
By discharge of firearms	6.1	**	1.1	7.4	11.0	5.5	2.3
By other means	4.4	0.0	**	5.8	8.7	3.6	1.3
Legal intervention	1.7	**	0.7	1.5	2.3	2.0	1.0
Events of undetermined intent	0.2	0.0	0.0	0.0	0.6	**	0.0
Discharge of firearms	2.5	6.9	**	**	3.0	4.2	1.8
Other and unspecified events of undetermined intent	0.2	0.0	**	**	0.4	**	**
Operations of war	2.3	6.9	**	**	2.6	4.2	1.6
Complications of medical and surgical care	0.7	**	0.0	0.0	0.0	0.0	**
Injury by firearms ^b		15.9	0.0	0.5	11.7	20.1	19.5
Drug-induced deaths ^b		21.4	**	**	6.5	29.5	38.7
Opioid-induced deaths ⁺⁺		10.9	**	**	3.7	18.4	16.0
Alcohol-induced deaths ^b		19.1	0.0	0.0	**	10.6	43.4
							31.1

Notes: ** Cell suppressed due to rate/ratio/percent based on non-zero count less than 6;^a The rates for infants <1 year of age are per 100,000 births; all other rates are per 100,000 population in specified group; the rates for malignant neoplasm of cervix uteri, corpus uteri, ovary, inflammatory disease of female pelvic organs and complications of pregnancy are per 100,000 females; the rates for prostate cancer and hyperplasia of prostate are per 100,000 males; ⁺⁺ Included in selected categories above; ^b First ever published sub-category of drug-induced deaths.



2D.

PATTERNS OF PREMATURE MORTALITY

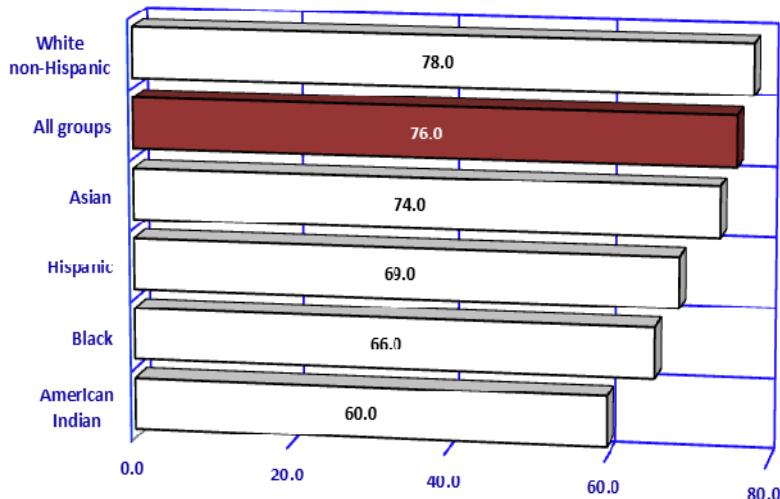
Compared with White non-Hispanics, all the racial/ethnic minority groups in Arizona had greater percentages of people younger than 25 years in 2016 (25.4% vs. 44.4%). In contrast, people aged 65 years and older accounted for 23.5 percent of White non-Hispanics, but only 7.1 percent of all ethnic minority groups (percentages based on race-and-age-specific population denominators in **Table 10C-1**).

Arizona's population distribution by age and race/ethnicity is related to patterns of mortality among these subgroups. In 2016, of all deaths among the elderly (65 years and older), 84.1 percent were White non-Hispanics, 10 percent were Hispanic or Latino, with the three remaining racial/ethnic groups comprising only 5.9 percent of all deaths in this age group (**Table 2C-26**). Looking at younger ages, Native American children comprised only 5.3 percent of Arizona's population age 1–14, but accounted for 17.3 percent of all childhood deaths. Native American adolescents represented only 5.2 percent of all adolescents, but accounted for 10.6 percent of all adolescent deaths. Finally, Native American young adults (ages 20–44) represented 4.8 percent of all young adults but comprised 13.8 percent of all young adult deaths. In summary, Arizona's racial/ethnic minority groups tend to experience mortality earlier in life than Arizona's White non-Hispanics.

Beginning with the 2005 edition of the report, information about the arithmetic mean age at death was supplemented with information about the median age, or the age in the center of the distribution when sorted by age (see **Table 2D-1**). The median age is higher than the arithmetic mean age in negatively skewed distributions.

2D. PATTERNS OF PREMATURE MORTALITY

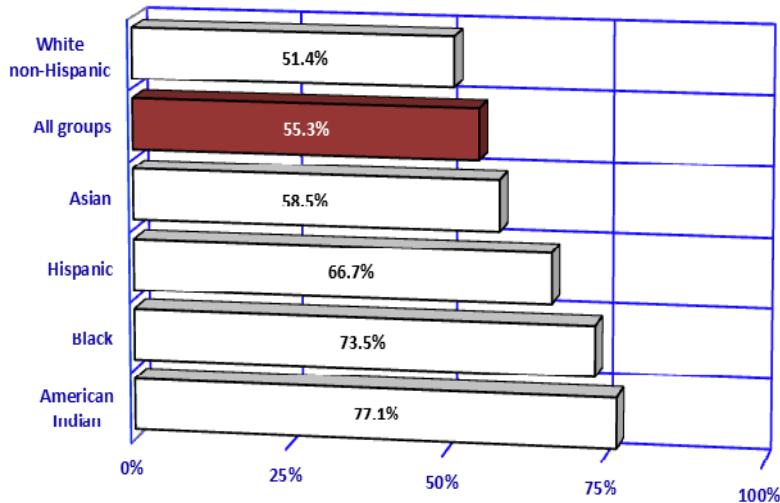
Figure 2D-1
Median Age at Death by Race/Ethnicity, Arizona, 2016



The median age at death remained at 76 years from 2014 to 2016 (**Table 2D-1**). In other words, one of every two Arizonans who died in 2016 was older than 76 years of age. Among Arizona females, 50 percent were 79 years older when they died in 2016. Among males, the median age at death was 73 years in 2016. **Table 2D-1** shows both the median age at death by race/ethnicity and gender from 2006-2016.

In 2016, compared to White non-Hispanics, on average Asians were 4 years younger at time of death, Hispanics were 9 years younger, Blacks were 12 years younger, and American Indian residents of Arizona were 18 years younger (based on the median age at death).

Figure 2D-2
Percent of Deaths before Expected^a Years of Life Reached by Race/Ethnicity, Arizona, 2016



The percent of deaths before expected years of life reached (a premature death ratio) increased for all Arizonans 54.9 % in 2015 to 55.3% (**Figure 2D-2**).

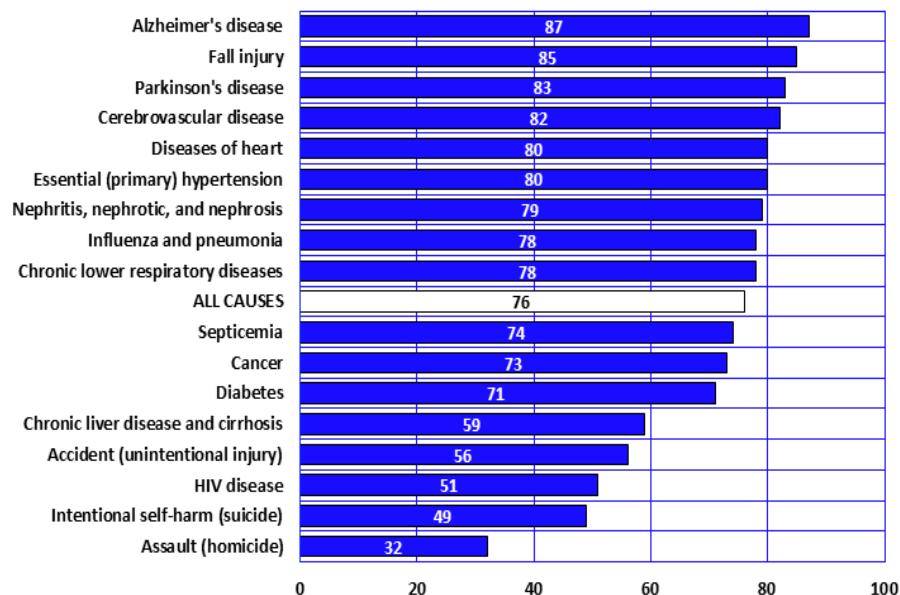
As expected, based on the findings for average and median age at death, White non-Hispanics were the only group with about 50 percent of all deaths (51.4 percent) occurring before the expected years of life were reached (**Figure 2D-2**). On average, 69.0 percent of the deaths among racial/ethnic minority groups occurred prematurely.

Among American Indians, nearly eight out of ten deaths (77.1 percent) were premature (**Table 2D-2**).

Note: ^a Expected years of life at birth for all U.S. residents (78.8 years).

2D. PATTERNS OF PREMATURE MORTALITY

Figure 2D-3
**Median Age at Death for Selected Leading Causes of Death,
 Arizona, 2016**

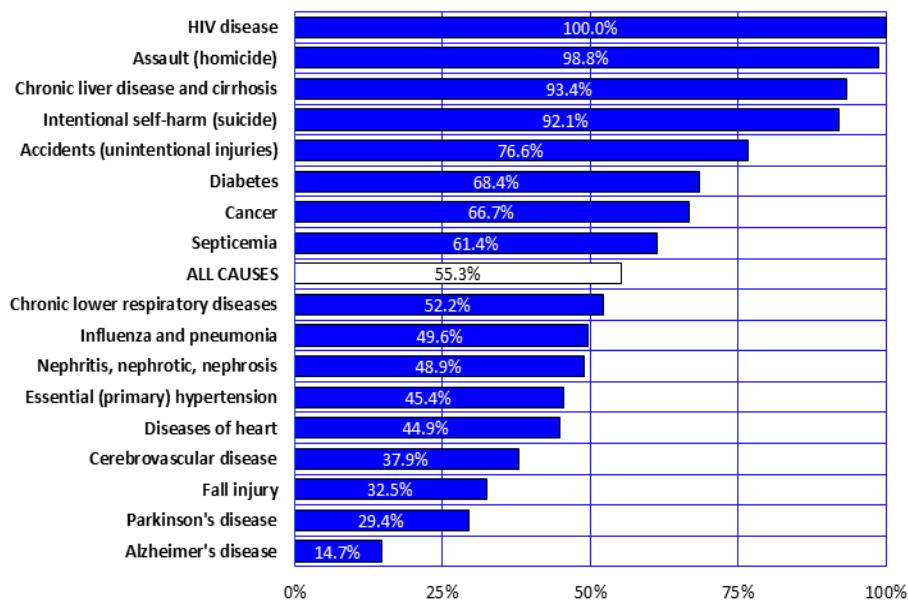


In 2016, *Alzheimer's disease* had the highest median age of death at 87 years (**Figure 2D-3**), exceeding by 11 years the median age at death for all causes (**Figure 2D-3, Table 2D-3**).

Among the leading causes of death, *homicide* had the lowest median age at death of 32 years.

From 2010-2015, *cancer* replaced *diseases of the heart* as the leading cause of death (based on the number of deaths). This epidemiologic transition in mortality risks is likely to have long lasting implications for the life expectancy of Arizonans, because the median age at death from *cancer* (73 years) is substantially lower than the median age at death from *diseases of the heart* (80 years).

Figure 2D-4
**Percent of Deaths before Expected Years of Life^a Reached for
 Selected Leading Causes of Death, Arizona, 2016**



Only 14.7 percent of deaths from *Alzheimer's disease* occurred before the age of 78.8 years, i.e., before the expected years of life were reached. In contrast, all deaths from *HIV disease* were premature (**Figure 2D-4, Table 2D-4**) and the median age at death from *HIV disease* decreased from the previous year at 51 years (**Figure 2D-3, Table 2D-3**).

A minority of deaths from *diseases of heart* were premature (44.9 percent). In contrast 66.7 percent of deaths from *cancer* occurred before the expected years of life were reached.

Note: ^a Expected years of life at birth for all U.S. residents (78.8 years).

TABLE 2D-1
AVERAGE AND MEDIAN AGE AT DEATH FROM ALL CAUSES BY GENDER AND RACE/ETHNICITY, ARIZONA, 2006-2016

Year	Gender	All ethnic groups		Race/ethnicity							
		White non-Hispanic		Hispanic or Latino		Black or African American		American Indian or Alaska Native		Asian or Pacific Islander	
		Mean	Median	Mean	Median	Mean	Median	Mean	Median	Mean	Median
2006	Total	71.2	76.0	74.0	78.0	58.7	65.0	60.2	63.0	55.4	57.0
	Male	67.9	73.0	71.1	75.0	55.1	59.0	57.3	59.0	51.5	52.0
	Female	74.8	80.0	76.9	81.0	64.0	73.0	64.4	70.0	60.9	65.0
2007	Total	71.2	76.0	74.2	78.0	58.4	64.0	60.1	62.0	57.2	59.0
	Male	67.8	73.0	71.3	75.0	54.6	59.0	54.8	57.0	53.7	54.0
	Female	74.9	80.0	77.4	81.0	63.4	71.0	66.5	70.0	61.9	67.0
2008	Total	71.5	77.0	74.3	78.0	61.2	68.0	58.5	62.0	57.3	59.0
	Male	68.4	73.0	71.6	76.0	57.1	62.0	55.3	59.0	53.7	54.0
	Female	75.0	80.0	77.2	81.0	66.4	74.0	62.5	67.0	62.0	67.0
2009	Total	71.9	76.0	74.3	78.0	61.8	67.0	60.0	64.0	57.6	59.0
	Male	69.3	73.0	71.6	75.0	58.6	63.0	56.9	60.0	54.2	54.0
	Female	74.8	80.0	77.2	81.0	65.7	72.0	63.4	68.0	61.8	66.0
2010	Total	72.1	77.0	74.8	79.0	62.4	68.0	62.6	65.0	57.0	58.0
	Male	69.1	73.0	72.1	75.0	58.3	63.0	60.5	63.0	52.7	53.0
	Female	75.4	80.0	77.7	82.0	67.4	74.0	65.3	69.0	62.6	65.0
2011	Total	72.8	77.0	75.3	79.0	63.6	68.0	63.6	66.0	58.4	60.0
	Male	69.7	73.0	72.5	76.0	59.8	63.0	61.0	64.0	54.4	54.0
	Female	76.2	81.0	78.3	82.0	68.5	75.0	66.6	69.0	63.2	67.0
2012	Total	72.7	77.0	75.2	78.8	63.8	68.8	62.6	65.9	57.8	59.8
	Male	69.9	73.7	72.6	75.9	60.7	64.3	59.6	63.2	54.3	55.5
	Female	75.9	80.6	78.1	82.1	67.8	74.7	66.0	69.6	62.0	65.0
2013	Total	72.5	77.0	75.2	79.0	64.3	69.0	63.1	66.0	58.3	60.0
	Male	69.6	74.0	72.6	76.0	60.6	64.0	59.5	63.0	54.7	55.0
	Female	75.8	81.0	78.0	82.0	68.6	75.0	67.7	73.0	63.1	67.0
2014	Total	72.7	76.0	75.1	78.0	64.7	69.0	62.7	65.0	59.3	61.0
	Male	70.0	73.0	72.6	75.0	61.7	65.0	60.5	63.0	55.7	57.0
	Female	75.8	80.0	77.9	81.0	68.4	74.0	65.3	67.0	63.8	66.0
2015	Total	72.5	76.0	74.9	78.0	64.8	69.0	62.8	66.0	58.5	60.0
	Male	69.9	73.0	72.5	75.0	61.7	66.0	60.4	64.0	55.0	56.0
	Female	75.5	79.0	77.5	81.0	68.7	74.0	65.9	69.0	62.9	66.0
2016	Total	72.9	76.0	75.4	78.0	65.0	69.0	63.4	66.0	58.9	60.0
	Male	70.3	73.0	73.2	75.0	61.9	65.0	60.3	63.0	55.8	56.0
	Female	75.9	79.0	78.0	81.0	69.1	75.0	67.6	71.0	63.3	66.0

Notes: Average age at death = the arithmetic mean of the ages of Arizonans who died in a given year; Median age at death = the middle of the age distribution: half died at age greater than the median and half at age below the median; The mean is lower than the median in negatively skewed distributions.

TABLE 2D-2
PERCENT OF DEATHS BEFORE EXPECTED YEARS OF LIFE REACHED
BY GENDER AND RACE/ETHNICITY, ARIZONA, 2006-2016

Year/gender	All racial/ethnic groups	White non-Hispanic	Hispanic or Latino	Black or African American	American Indian or Alaska Native	Asian or Pacific Islander
2006 Total	52.7	48.2	70.8	73.9	77.4	61.0
Male	61.0	56.2	78.4	80.9	82.9	61.0
Female	43.7	40.1	60.0	63.7	69.8	61.0
2007 Total	52.6	47.7	71.6	73.3	75.8	64.9
Male	61.5	56.4	79.2	82.6	82.0	73.8
Female	42.9	38.5	61.3	62.1	67.5	57.4
2008 Total	52.4	48.0	67.6	74.7	76.5	66.4
Male	60.0	55.4	75.4	81.6	82.6	68.7
Female	43.9	40.0	57.6	66.4	68.6	63.9
2009 Total	52.5	48.0	68.0	73.0	76.4	60.6
Male	59.9	55.4	74.4	79.3	81.1	66.8
Female	44.5	40.1	60.1	66.1	70.6	53.9
2010 Total	54.5	49.9	68.7	73.4	79.6	65.1
Male	62.4	57.8	76.2	78.4	85.3	69.0
Female	45.8	41.5	59.5	67.4	71.9	60.7
2011 Total	53.8	49.6	67.4	74.4	77.7	66.3
Male	61.8	57.5	75.4	80.7	84.3	71.3
Female	45.1	41.2	57.3	67.1	70.0	61.5
2012 Total	55.0	50.9	68.4	74.4	78.7	62.3
Male	62.3	58.1	75.7	81.6	83.9	74.2
Female	46.7	43.0	59.1	66.1	72.2	51.9
2013 Total	54.6	50.1	67.1	72.8	76.7	58.9
Male	62.0	57.5	75.0	80.8	82.7	65.0
Female	46.2	42.1	57.7	62.4	68.9	53.2
2014^a Total	54.8	50.9	66.7	75.2	77.8	58.9
Male	62.0	58.0	74.1	79.7	84.1	68.9
Female	46.7	43.1	57.7	69.8	69.8	49.7
2015^a Total	54.9	50.9	67.4	74.1	77.4	59.9
Male	61.6	57.6	73.9	78.5	83.2	66.8
Female	47.2	43.4	59.1	68.6	70.2	53.1
2016 Total	55.3	51.4	66.7	73.5	77.1	58.5
Male	62.1	57.9	73.4	79.9	82.4	67.3
Female	47.5	44.1	57.9	64.9	69.7	50.6

Note: ^a Based on updated expected years of life at birth for all U.S. residents (78.8 years in 2016).

TABLE 2D-3
**MEDIAN AGE AT DEATH FOR LEADING CAUSES OF MORTALITY BY GENDER, RACE/ETHNICITY, AND
 URBAN/RURAL AREAS^a, ARIZONA, 2016**

	ARIZONA		Area/gender		Race/ethnicity					
	Total	Male	Total Urban	Urban Male	Total Rural	Male Rural	Female Rural	White Non-Hispanic	Hispanic or Latino	African or Native American or Alaska Native
Total, all causes	76.0	73.0	79.0	76.0	73.0	75.0	73.0	78.0	69.0	66.0
Major cardiovascular diseases	81.0	77.0	84.0	81.0	78.0	84.0	79.0	84.0	82.0	77.0
Diseases of heart	80.0	77.0	84.0	81.0	77.0	85.0	79.0	83.0	81.0	76.0
Coronary heart disease	79.0	76.0	84.0	80.0	77.0	84.0	78.0	75.0	83.0	80.0
Malignant neoplasms	73.0	73.0	73.0	73.0	73.0	73.0	74.0	73.0	74.0	68.0
Lung cancer	73.0	73.0	74.0	73.0	74.0	73.0	73.0	73.0	73.0	72.0
Prostate cancer	80.0	80.0	NA	80.0	80.0	NA	80.0	80.0	81.0	74.5
Breast cancer	69.0	76.0	69.0	68.0	76.0	68.0	72.0	72.0	71.0	57.0
Colorectal cancer	72.0	71.0	75.0	73.0	70.0	76.0	72.0	71.0	71.0	67.5
Malignant melanoma of skin	72.0	71.0	73.0	71.5	71.0	73.0	73.5	69.0	73.0	73.0
Cerebrovascular diseases	82.0	79.0	85.0	82.0	79.0	85.0	83.0	80.0	85.0	83.0
Chronic lower respiratory diseases	78.0	77.0	79.0	78.0	77.0	79.0	77.0	76.0	78.0	76.0
Accidents (unintentional injuries)	56.0	53.0	64.0	56.0	53.0	65.0	55.0	53.0	62.0	61.0
Motor vehicle accidents	45.0	45.0	41.0	44.0	42.0	45.5	48.0	36.0	52.5	32.0
Falls	85.0	82.0	87.0	85.0	83.0	86.0	83.0	79.5	87.0	85.0
Accidental poisoning	44.0	43.0	45.0	43.0	42.0	45.0	45.0	44.0	48.5	46.0
Accidental drowning	40.0	35.0	53.0	46.0	36.0	54.0	33.0	34.0	32.0	33.5
Influenza and pneumonia	78.0	77.0	81.0	79.0	78.0	81.0	77.0	75.0	81.0	80.0
Alzheimer's disease	87.0	86.0	88.0	88.0	86.0	88.0	87.0	86.0	88.0	86.0
Diabetes	71.0	70.0	74.0	71.0	70.0	74.0	71.0	70.0	75.0	72.0
Intentional self-harm (suicide)	49.0	49.0	49.0	48.0	48.0	47.5	54.5	55.0	52.0	54.0
Chronic liver disease and cirrhosis	59.0	60.0	59.0	60.0	60.0	60.0	59.0	59.5	57.0	61.5
Nephritis, nephrotic syndrome and nephrosis	79.0	77.0	82.0	78.0	77.0	81.0	79.0	76.5	82.0	81.0
Septicemia	74.0	72.5	75.0	74.0	72.0	74.5	77.0	77.0	77.5	77.0
Assault (homicide)	32.0	31.0	35.0	31.0	33.0	42.0	38.5	52.0	39.5	29.0
Parkinson's disease	83.0	82.5	83.0	83.0	82.0	84.0	82.0	83.0	80.0	84.0
Essential (primary) hypertension and hypertensive renal disease	80.0	77.0	83.0	80.0	77.0	83.0	80.0	77.0	85.0	81.0
Human immunodeficiency virus (HIV) disease	51.0	52.0	44.0	51.0	51.0	44.0	53.0	53.0	0.0	51.5
INJURY BY FIREARMS	46.0	47.0	43.0	44.0	44.0	41.0	58.0	59.0	52.0	54.0
DRUG-INDUCED DEATHS	45.0	43.0	45.0	49.0	43.0	48.0	47.0	43.0	52.0	48.0
OPIOID-INDUCED DEATHS⁺⁺	40.0	37.0	45.0	40.0	37.0	45.0	41.0	36.0	49.0	43.0
ALCOHOL-INDUCED DEATHS	56.0	57.0	54.0	57.0	58.0	56.0	54.0	56.0	53.0	59.0

Notes: ^a Urban = Maricopa, Pima, Pinal, and Yuma counties; median age at death = the middle of the age distribution: half died at age greater than the median and half at age below the median; ⁺⁺ First ever published sub-category of drug-induced deaths.

TABLE 2D-4
PERCENT DEATHS BEFORE EXPECTED^a YEARS OF LIFE REACHED FOR THE LEADING CAUSES OF MORTALITY BY GENDER, RACE/ETHNICITY, AND URBAN/RURAL AREAS^b, ARIZONA, 2016

	ARIZONA		Area/gender		Race/ethnicity						
	Total	Male	Total	Female	Total Rural	Rural Male	White Non-Hispanic	Hispanic or Latino	African or American Native	Alaska Native	Asian or Pacific Islander
Total, all causes	55.3%	62.1%	47.5%	54.4%	61.3%	57.6%	63.5%	50.2%	51.4%	66.7%	73.5%
Major cardiovascular diseases	43.9%	52.7%	33.6%	43.0%	51.6%	33.3%	46.6%	55.6%	41.2%	52.9%	66.3%
Diseases of heart	44.9%	53.4%	33.7%	43.6%	51.9%	33.1%	48.5%	57.2%	42.2%	53.9%	69.0%
Coronary heart disease	47.3%	55.6%	35.1%	45.9%	54.1%	34.2%	51.2%	59.4%	38.4%	44.9%	56.1%
Malignant neoplasms	66.7%	66.8%	66.6%	66.4%	66.6%	66.0%	67.9%	67.1%	68.8%	65.0%	73.5%
Lung cancer	68.7%	69.1%	68.1%	67.7%	68.0%	67.4%	71.6%	72.3%	70.8%	68.6%	67.0%
Prostate cancer	43.9%	43.9%	0.0%	43.8%	43.8%	0.0%	43.2%	43.2%	0.0%	43.6%	39.2%
Breast cancer	72.6%	55.6%	72.7%	73.0%	55.6%	73.2%	70.8%	0.0%	70.8%	70.0%	81.4%
Colorectal cancer	65.6%	72.4%	57.1%	64.6%	72.4%	54.8%	69.3%	72.6%	65.3%	64.1%	73.9%
Malignant melanoma of skin	69.6%	71.0%	66.7%	68.7%	70.5%	64.4%	73.2%	73.1%	73.3%	68.4%	92.3%
Cerebrovascular diseases	37.9%	46.6%	31.3%	38.4%	47.7%	31.4%	35.7%	41.9%	31.0%	34.8%	48.6%
Chronic lower respiratory diseases	52.2%	56.4%	48.4%	51.7%	56.2%	47.7%	53.3%	56.3%	50.1%	51.6%	55.0%
Accidents (unintentional injuries)	76.6%	82.9%	65.0%	75.4%	81.5%	64.4%	78.9%	85.9%	65.6%	70.4%	87.4%
Motor vehicle accidents	94.3%	92.7%	94.8%	95.4%	93.1%	93.1%	94.0%	90.9%	92.1%	96.5%	98.3%
Falls	32.5%	39.1%	26.0%	31.8%	37.2%	26.5%	34.5%	45.7%	24.3%	29.7%	47.3%
Accidental poisoning	99.4%	99.7%	98.9%	99.6%	99.7%	99.3%	98.8%	99.4%	96.9%	99.3%	100.0%
Accidental drowning	87.6%	88.0%	86.7%	87.1%	87.9%	85.2%	90.0%	88.2%	100.0%	83.8%	100.0%
Influenza and pneumonia	49.6%	55.3%	43.8%	48.5%	53.6%	43.2%	52.8%	60.2%	45.5%	45.6%	62.8%
Alzheimer's disease	14.7%	20.2%	11.7%	14.4%	20.0%	11.4%	16.3%	21.1%	13.1%	13.5%	22.0%
Diabetes	68.4%	71.9%	63.1%	68.2%	71.4%	63.6%	67.7%	73.0%	59.6%	66.1%	68.7%
Intentional self-harm (suicide)	92.1%	90.6%	97.5%	92.9%	91.3%	98.2%	89.4%	88.5%	93.9%	90.2%	97.7%
Chronic liver disease and cirrhosis	93.4%	94.1%	92.2%	93.3%	93.7%	92.4%	93.4%	94.5%	91.7%	92.3%	93.4%
Nephritis, nephrotic syndrome and nephrosis	48.9%	53.9%	43.3%	50.2%	54.4%	46.4%	46.1%	52.9%	35.4%	44.2%	56.3%
Septicemia	61.4%	62.4%	60.3%	63.8%	65.0%	62.5%	53.4%	54.4%	51.9%	53.8%	74.7%
Assault (homicide)	98.8%	99.4%	96.5%	98.5%	99.3%	95.7%	100.0%	100.0%	100.0%	97.8%	100.0%
Parkinson's disease	29.4%	27.9%	32.0%	28.5%	27.7%	30.1%	32.7%	27.3%	45.5%	28.6%	26.2%
Essential (primary) hypertension and hypertensive renal disease	45.4%	53.0%	38.0%	45.4%	52.6%	38.5%	44.9%	54.1%	34.4%	41.0%	52.0%
Human immunodeficiency virus (HIV) disease	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%
INJURY BY FIREARMS	92.2%	91.3%	96.2%	93.0%	92.2%	96.6%	88.7%	87.7%	93.9%	98.3%	98.7%
DRUG-INDUCED DEATHS	97.7%	98.4%	96.5%	97.7%	98.2%	96.9%	97.3%	98.8%	94.3%	97.2%	100.0%
OPIOID-INDUCED DEATHS⁺⁺	99.5%	99.8%	98.9%	99.7%	99.8%	99.6%	98.1%	100.0%	93.9%	99.3%	100.0%
ALCOHOL-INDUCED DEATHS	96.9%	96.1%	98.7%	96.8%	96.1%	98.2%	96.9%	95.8%	100.0%	95.9%	97.1%

Notes: ^a Expected years of life at birth for all U.S. residents (78.8 years in 2016); ^b Urban = Maricopa, Pima, Pinal, and Yuma counties; ⁺⁺ First ever published sub-category of drug-induced deaths.