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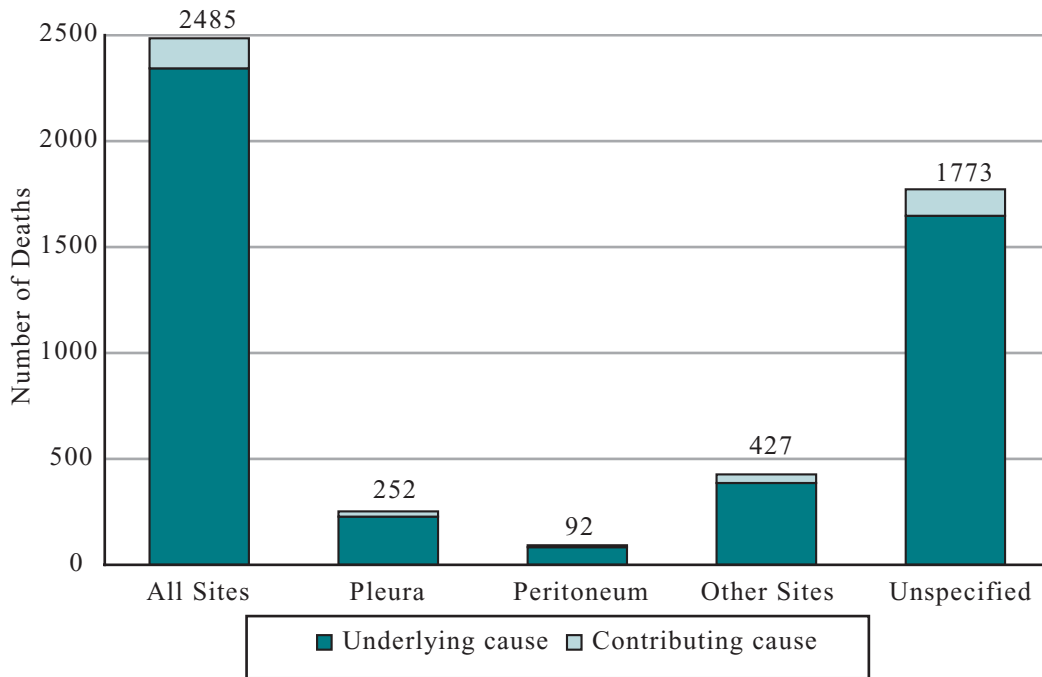
# **Section 7**

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# **Malignant Mesothelioma**

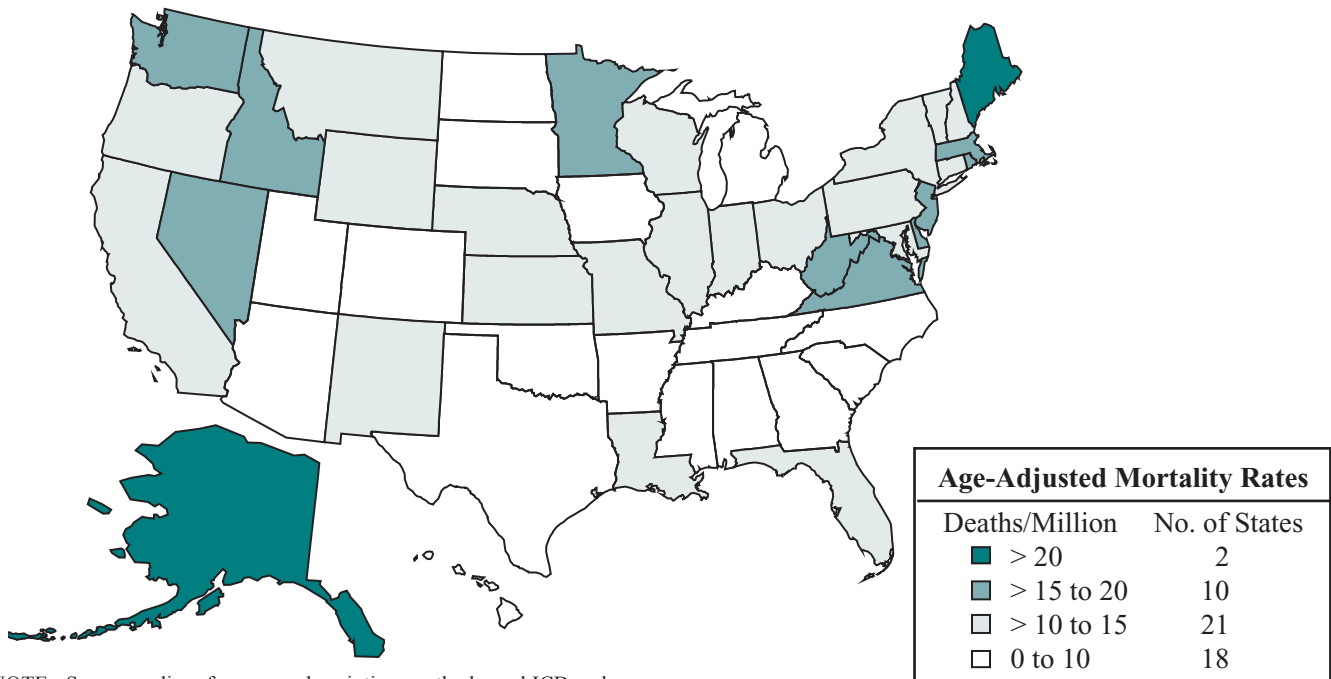


**Figure 7-1. Malignant mesothelioma: Number of deaths by anatomical site, U.S. residents age 15 and over, 1999**



NOTE: See appendices for source description, methods, and ICD codes.  
 SOURCE: National Center for Health Statistics multiple cause of death data.

**Figure 7-2. Malignant mesothelioma: Age-adjusted mortality rates by state, U.S. residents age 15 and over, 1999**



NOTE: See appendices for source description, methods, and ICD codes.  
 SOURCE: National Center for Health Statistics multiple cause of death data. Population estimates from U.S. Bureau of the Census.

**Table 7-1. Malignant mesothelioma: Number of deaths by sex, race, and age, and median age at death, U.S. residents age 15 and over, 1999**

Site	No. of Deaths	Underlying Cause (%)	Sex		Race			Age Group (yrs)								Median Age (yrs)
			Male	Female	White	Black	Other	15-24	25-34	35-44	45-54	55-64	65-74	75-84	85+	
Pleura	252	90.1	219	33	240	10	2	-	-	2	12	32	101	86	19	72.0
Peritoneum	92	90.2	62	30	90	2	-	-	-	2	10	23	31	20	6	69.5
Other Sites	427	90.4	345	82	407	14	6	1	2	3	23	61	134	154	49	74.0
Unspecified	1,773	92.9	1,424	349	1,673	83	17	1	2	26	94	279	572	654	145	73.0
<b>Any Site</b>	<b>2,485</b>	<b>94.3</b>	<b>1,995</b>	<b>490</b>	<b>2,355</b>	<b>105</b>	<b>25</b>	<b>2</b>	<b>4</b>	<b>33</b>	<b>138</b>	<b>389</b>	<b>818</b>	<b>888</b>	<b>213</b>	<b>73.0</b>

- indicates no deaths listed.

NOTE: The sum of individual site death totals may be greater than the total number of deaths for "any site" because some decedents have more than one site of mesothelioma listed on their death certificates. See appendices for source description, methods, and ICD codes.

SOURCE: National Center for Health Statistics multiple cause of death data.

**Table 7-2. Malignant mesothelioma: Mortality rates (per million population) by race and sex, U.S. residents age 15 and over, 1999**

Year	Overall	White		Black		Other	
		Male	Female	Male	Female	Male	Female
<b>Crude Mortality Rate</b>							
1999	11.60	21.93	4.95	6.43	2.02	3.61	1.53
<b>Age-Adjusted Mortality Rate</b>							
1999	11.65	23.89	4.29	10.32	2.57	6.47	2.18

– indicates no deaths listed.

NOTE: See appendices for source description, methods, and ICD codes.

SOURCE: National Center for Health Statistics multiple cause of death data. Population estimates from U.S. Bureau of the Census.

*Malignant Mesothelioma: Mortality*

**Table 7-3. Malignant mesothelioma: Years of potential life lost to age 65 and to life expectancy by race and sex, U.S. residents age 15 and over, 1999**

Year	White		Black		Other		Total
	Male	Female	Male	Female	Male	Female	
<b>Years of Potential Life Lost to Age 65</b>							
1999	3,395	1,205	320	95	25	30	5,070
<b>Years of Potential Life Lost to Life Expectancy</b>							
1999	23,535	7,120	1,060	408	230	132	32,485

– indicates no deaths listed.

NOTE: See appendices for source description, methods, and ICD codes.

SOURCE: National Center for Health Statistics multiple cause of death data.

## Malignant Mesothelioma: Mortality

**Table 7-4. Malignant mesothelioma: Number of deaths, mortality rates (per million population), and years of potential life lost (YPLL) by state, U.S. residents age 15 and over, 1999**

State	No. of Deaths		Crude Mortality		Age-Adjusted Mortality		YPLL to Life Expectancy			
	Deaths	Rank	Rate	Rank	Rate	Rank	Total	Rank	YPLL/death	Rank
Alabama	33	20	9.46	34	9.35	37	525	20	15.9	8
Alaska	8	45	17.53	5	32.81	1	132	44	16.5	4
Arizona	32	22	8.76	39	8.40	40	423	24	13.2	32
Arkansas	15	37	7.47	45	6.70	47	205	37	13.7	25
California	259	1	10.12	33	11.42	28	3,670	1	14.2	20
Colorado	17	35	5.35	49	6.46	48	239	36	14.1	21
Connecticut	33	20	12.77	22	11.60	27	435	23	13.2	32
Delaware	12	41	19.96	2	19.71	3	157	41	13.1	36
District of Columbia	5	47	11.45	30	11.15	29	51	51	10.2	51
Florida	163	2	13.44	19	10.16	33	2,134	2	13.1	36
Georgia	30	25	4.94	51	6.05	50	453	22	15.1	13
Hawaii	5	47	5.30	50	4.95	51	73	48	14.6	16
Idaho	14	39	14.48	14	15.33	12	192	39	13.7	25
Illinois	128	6	13.52	18	13.76	17	1,844	6	14.4	17
Indiana	58	14	12.40	25	12.53	22	916	13	15.8	10
Iowa	21	33	9.19	37	7.92	42	258	34	12.3	49
Kansas	27	28	12.97	21	12.25	24	336	30	12.4	45
Kentucky	24	30	7.58	44	7.63	43	400	27	16.7	3
Louisiana	47	19	13.83	16	14.78	14	718	16	15.3	11
Maine	28	27	27.50	1	26.40	2	363	28	13.0	38
Maryland	51	16	12.52	24	13.74	18	680	17	13.3	31
Massachusetts	81	9	16.39	8	15.40	10	1,006	11	12.4	45
Michigan	69	12	8.91	38	9.07	38	1,028	10	14.9	14
Minnesota	61	13	16.34	9	16.82	7	875	14	14.3	19
Mississippi	20	34	9.30	35	9.61	35	257	35	12.9	39
Missouri	49	17	11.35	31	10.73	31	618	19	12.6	43
Montana	10	43	14.21	15	13.38	20	124	46	12.4	45
Nebraska	15	37	11.50	29	10.77	30	191	40	12.7	41
Nevada	22	31	15.79	11	17.73	4	280	32	12.7	41
New Hampshire	11	42	11.58	28	12.31	23	147	42	13.4	30
New Jersey	111	8	17.20	6	16.30	8	1,515	8	13.6	27
New Mexico	17	35	12.77	22	13.05	21	362	29	21.3	1
New York	156	4	10.79	32	10.46	32	2,121	3	13.6	27
North Carolina	56	15	9.30	35	9.45	36	773	15	13.8	24
North Dakota	4	50	7.92	43	7.37	45	53	50	13.2	32
Ohio	131	5	14.70	12	14.26	15	2,005	5	15.3	11
Oklahoma	22	31	8.34	41	7.93	41	262	33	11.9	50
Oregon	32	22	12.14	26	11.66	25	405	25	12.6	43
Pennsylvania	162	3	16.80	7	14.14	16	2,095	4	12.9	39
Rhode Island	14	39	17.74	4	15.56	9	202	38	14.4	17
South Carolina	26	29	8.40	40	8.79	39	322	31	12.4	45
South Dakota	4	50	6.98	47	6.36	49	65	49	16.2	6
Tennessee	31	24	7.09	46	7.30	46	499	21	16.1	7
Texas	125	7	8.19	42	9.62	34	1,832	7	14.7	15
Utah	9	44	5.83	48	7.52	44	143	43	15.9	8
Vermont	7	46	14.55	13	14.85	13	128	45	18.2	2
Virginia	75	10	13.67	17	15.36	11	1,047	9	14.0	22
Washington	72	11	15.90	10	17.29	6	947	12	13.2	32
West Virginia	29	26	19.59	3	17.37	5	402	26	13.9	23
Wisconsin	49	17	11.80	27	11.61	26	663	18	13.5	29
Wyoming	5	47	13.20	20	13.73	19	83	47	16.5	4

- indicates no deaths listed.

NOTE: See appendices for source description, methods, and ICD codes.

SOURCE: National Center for Health Statistics multiple cause of death data. Population estimates from U.S. Bureau of the Census.





**Table 7-7. Malignant mesothelioma: Proportionate mortality ratio (PMR) adjusted for age, sex, and race by usual industry, U.S. residents age 15 and over, selected states, 1999**

CIC	Industry	Number of Deaths	PMR	95% Confidence Interval	
				LCL	UCL
360	Ship and boat building and repairing	7	5.95	2.39	12.27
192	Industrial and miscellaneous chemicals	19	4.81	2.90	7.51
200	Petroleum refining	5	3.80	1.23	8.87
460	Electric light and power	10	3.08	1.48	5.66
060	Construction	77	1.55	1.23	1.94

CIC - Census Industry Code      n.e.c. - not elsewhere classified      LCL - lower confidence limit      UCL - upper confidence limit

NOTE: See appendices for source description, methods, and ICD codes, industry and occupation codes, and list of selected states.

SOURCE: National Center for Health Statistics multiple cause of death data.

## *Malignant Mesothelioma: Mortality*

**Table 7-8. Malignant mesothelioma: Proportionate mortality ratio (PMR) adjusted for age, sex, and race by usual occupation, U.S. residents age 15 and over, selected states, 1999**

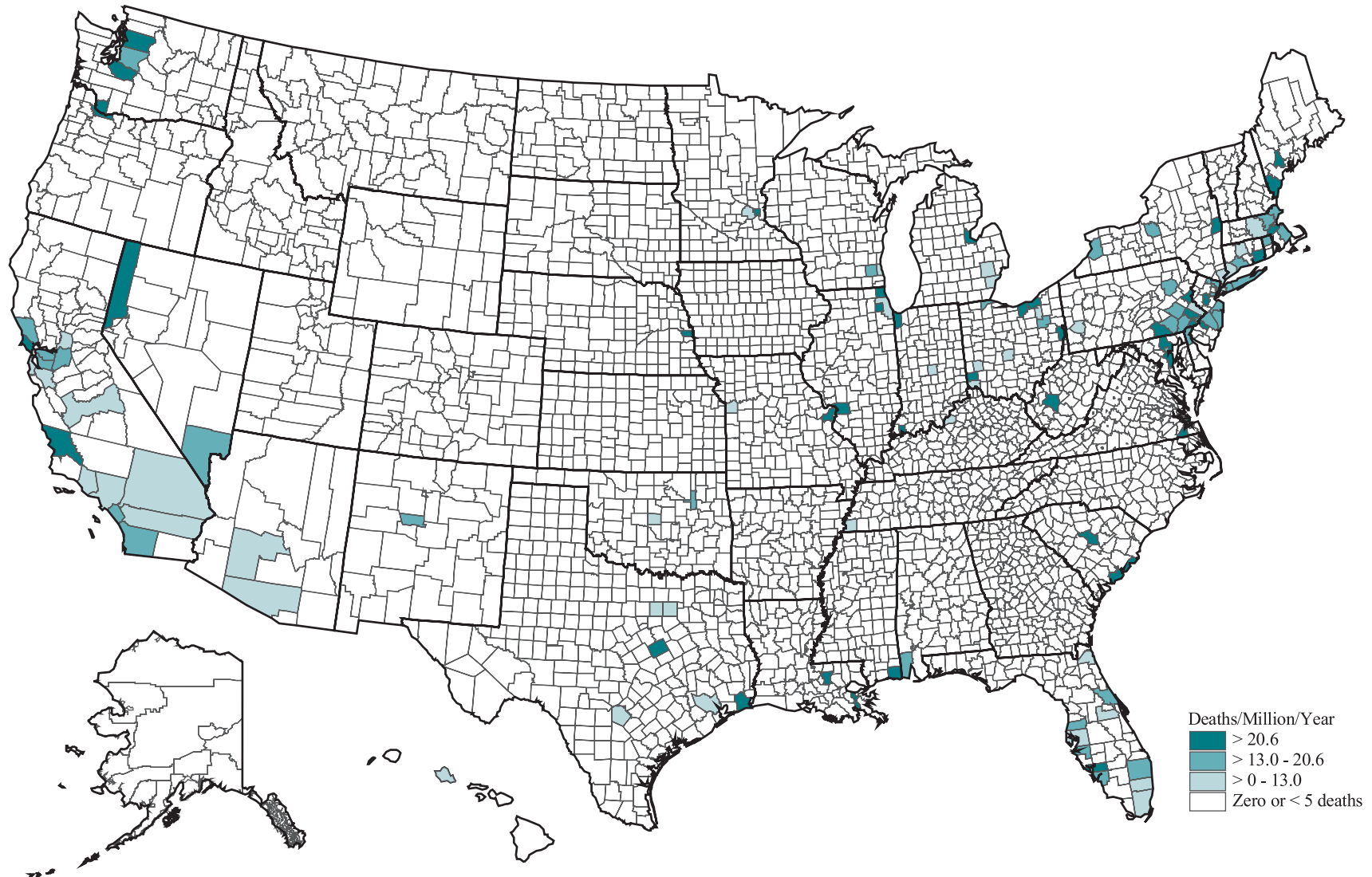
COC	Occupation	Number of Deaths	PMR	95% Confidence Interval	
				LCL	UCL
585	Plumbers, pipefitters, and steamfitters	18	4.76	2.81	7.51
057	Mechanical engineers	6	3.04	1.11	6.62
575	Electricians	12	2.42	1.25	4.22
156	Teachers, elementary school	13	2.13	1.13	3.64

COC - Census Occupation Code      n.e.c. - not elsewhere classified      LCL - lower confidence limit      UCL - upper confidence limit

NOTE: See appendices for source description, methods, and ICD codes, industry and occupation codes, and list of selected states.

SOURCE: National Center for Health Statistics multiple cause of death data.

**Figure 7-3. Malignant mesothelioma: Age-adjusted mortality rates by county, U.S. residents age 15 and over, 1999**



NOTE: Age-adjusted rates are not calculated for those counties with 1-4 deaths. See appendices for source description, methods, and ICD codes.  
SOURCE: National Center for Health Statistics multiple cause of death data. Population estimates from U.S. Bureau of the Census.

## Malignant Mesothelioma: Mortality

**Table 7-9. Malignant mesothelioma: Counties with highest age-adjusted mortality rates (per million population), U.S. residents age 15 and over, 1999**

County	State	Age-Adjusted Rate	Crude Rate	Number of Deaths	% Female
Suffolk City	Virginia	111.7	99.5	5	40.0
Hampton City	Virginia	95.9	82.6	9	0.0
Jefferson County	Ohio	90.1	115.6	7	0.0
Androscoggin County	Maine	82.2	85.7	7	57.1
Somerset County	New Jersey	73.9	64.7	15	33.3
Jackson County	Mississippi	70.0	48.4	5	20.0
Bay County	Michigan	63.1	69.3	6	0.0
Kanawha County	West Virginia	45.6	54.4	9	22.2
York County	Maine	42.1	42.0	6	33.3
Rensselaer County	New York	40.3	41.5	5	40.0
Jefferson Parish	Louisiana	39.9	39.2	14	42.9
Washoe County	Nevada	37.8	32.0	8	12.5
Lake County	Illinois	35.8	27.5	13	30.8
Lorain County	Ohio	34.1	31.7	7	42.9
Vanderburgh County	Indiana	33.3	37.0	5	0.0
Norfolk County	Massachusetts	32.5	36.0	19	0.0
McLennan County	Texas	31.8	31.4	5	40.0
Delaware County	Pennsylvania	31.1	36.7	16	25.0
Pierce County	Washington	30.6	26.2	14	7.1
Douglas County	Nebraska	30.0	25.7	9	33.3
Jefferson County	Texas	29.6	31.7	6	33.3
Anne Arundel County	Maryland	28.2	23.8	9	22.2
San Luis Obispo County	California	27.2	31.4	6	0.0
Camden County	New Jersey	26.2	26.2	10	30.0
Madison County	Illinois	26.1	29.3	6	0.0
Clark County	Washington	25.8	19.3	5	40.0
Northampton County	Pennsylvania	25.6	28.7	6	0.0
New London County	Connecticut	25.5	26.1	5	0.0
Butler County	Ohio	25.3	22.8	6	33.3
Richland County	South Carolina	25.0	20.0	5	20.0
Baltimore County	Maryland	24.7	28.9	17	23.5
Marin County	California	24.6	25.0	5	40.0
St. Louis County	Missouri	23.4	25.0	20	20.0
York County	Pennsylvania	22.7	23.3	7	0.0
Charleston County	South Carolina	22.7	19.6	5	0.0
Ramsey County	Minnesota	22.6	23.4	9	11.1
Snohomish County	Washington	22.2	17.3	8	12.5
Du Page County	Illinois	21.9	18.7	13	15.4
Charlotte County	Florida	21.3	50.8	6	50.0
Multnomah County	Oregon	21.2	19.5	10	0.0
East Baton Rouge Parish	Louisiana	21.0	16.1	5	20.0
Cuyahoga County	Ohio	20.7	23.6	26	23.1
Lake County	Indiana	20.6	21.5	8	37.5
Montgomery County	Pennsylvania	20.6	25.4	15	6.7
Union County	New Jersey	19.9	22.4	9	0.0
Manatee County	Florida	19.8	35.1	7	42.9
Chester County	Pennsylvania	19.0	17.6	6	33.3
Philadelphia County	Pennsylvania	19.0	21.5	24	12.5
Waukesha County	Wisconsin	19.0	17.5	5	0.0
New Castle County	Delaware	18.8	18.0	7	14.3
<b>Overall United States</b>		<b>11.6</b>	<b>11.6</b>	<b>2,485</b>	<b>19.7</b>

NOTE: Only counties with at least 5 deaths from the disease of interest are included. See appendices for source description, methods, and ICD codes.  
SOURCE: National Center for Health Statistics multiple cause of death data. Population estimates from U.S. Bureau of the Census.