

Table XII-1  
LARYNX CANCER (Invasive)

TRENDS IN SEER INCIDENCE<sup>a</sup> AND U.S. MORTALITY<sup>b</sup> USING THE JOINTPOINT REGRESSION PROGRAM, 1975-2005  
WITH UP TO THREE JOINTPOINTS BY RACE AND SEX

		Joinpoint Trend 1		Joinpoint Trend 2		Joinpoint Trend 3		Joinpoint Trend 4		AAPC <sup>c</sup>	
		Years	APC	Years	APC	Years	APC	Years	APC	1996-2005	2001-2005
<u>SEER Cancer Incidence<sup>a</sup></u>											
All Races	Both Sexes	1975-1988	0.1	1988-2005	-2.6*					-2.6*	-2.6*
All Races	Male	1975-1988	-0.3	1988-2005	-2.8*					-2.8*	-2.8*
All Races	Female	1975-1989	1.8*	1989-2005	-2.5*					-2.5*	-2.5*
White	Both Sexes	1975-1988	0.1	1988-2005	-2.6*					-2.6*	-2.6*
White	Male	1975-1988	-0.3	1988-2005	-2.9*					-2.9*	-2.9*
White	Female	1975-1989	1.6*	1989-2005	-2.3*					-2.3*	-2.3*
Black	Both Sexes	1975-1990	1.2*	1990-2005	-2.9*					-2.9*	-2.9*
Black	Male	1975-1990	0.9	1990-2005	-2.8*					-2.8*	-2.8*
Black	Female	1975-1989	3.8*	1989-2005	-2.8*					-2.8*	-2.8*
<u>SEER Delay-Adjusted Incidence<sup>a</sup></u>											
All Races	Both Sexes	1975-1988	0.1	1988-2005	-2.5*					-2.5*	-2.5*
All Races	Male	1975-1988	-0.3	1988-2005	-2.7*					-2.7*	-2.7*
All Races	Female	1975-1989	1.8*	1989-2005	-2.5*					-2.5*	-2.5*
White	Both Sexes	1975-1988	0.1	1988-2005	-2.5*					-2.5*	-2.5*
White	Male	1975-1987	-0.1	1987-2005	-2.7*					-2.7*	-2.7*
White	Female	1975-1989	1.6*	1989-2005	-2.3*					-2.3*	-2.3*
Black	Both Sexes	1975-1990	1.2*	1990-2005	-2.8*					-2.8*	-2.8*
Black	Male	1975-1990	0.9	1990-2005	-2.7*					-2.7*	-2.7*
Black	Female	1975-1989	3.8*	1989-2005	-2.7*					-2.7*	-2.7*
<u>U.S. Cancer Mortality<sup>b</sup></u>											
All Races	Both Sexes	1975-1988	-0.7*	1988-1992	0.8	1992-2005	-2.1*			-2.1*	-2.1*
All Races	Male	1975-1993	-0.8*	1993-2005	-2.3*					-2.3*	-2.3*
All Races	Female	1975-1992	1.5*	1992-2005	-1.9*					-1.9*	-1.9*
White	Both Sexes	1975-1988	-1.0*	1988-1991	1.2	1991-2005	-1.8*			-1.8*	-1.8*
White	Male	1975-1993	-1.1*	1993-2005	-2.1*					-2.1*	-2.1*
White	Female	1975-1992	1.4*	1992-2005	-1.6*					-1.6*	-1.6*
Black	Both Sexes	1975-1993	1.2*	1993-2005	-3.0*					-3.0*	-3.0*
Black	Male	1975-1993	1.3*	1993-2005	-3.0*					-3.0*	-3.0*
Black	Female	1975-1993	2.3*	1993-2005	-3.1*					-3.1*	-3.1*

Joinpoint Regression Program Version 3.3.1, April 2008, National Cancer Institute. (<http://srab.cancer.gov/joinpoint/>).  
The APC is the Annual Percent Change based on rates age-adjusted to the 2000 US Std Population (19 age groups - Census P25-1130).  
Trends are from the SEER 9 areas (San Francisco, Connecticut, Detroit, Hawaii, Iowa, New Mexico, Seattle, Utah, and Atlanta).  
Trends are from US Mortality Files, National Center for Health Statistics, Centers for Disease Control and Prevention.  
The AAPC is the Average Annual Percent Change and is based on the APCs calculated by Joinpoint over the time range of 1975-2005.  
The APC/AAPC is significantly different from zero (p<.05).

a  
b  
c  
\*

Table XII-1a  
LARYNX CANCER (Invasive)TRENDS IN SEER INCIDENCE<sup>a</sup> AND U.S. MORTALITY<sup>b</sup> USING THE JOINTPOINT REGRESSION PROGRAM, 1975-2005  
WITH UP TO FOUR JOINTPOINTS BY RACE AND SEX

		Joinpoint Trend 1		Joinpoint Trend 2		Joinpoint Trend 3		Joinpoint Trend 4		Joinpoint Trend 5		AAPC <sup>c</sup>
		Years	APC	Years	APC	Years	APC	Years	APC	Years	APC	2001-2005
<u>SEER Cancer Incidence<sup>a</sup></u>												
All Races	Both Sexes	1975-1988	0.1	1988-2005	-2.6*							-2.6*
All Races	Male	1975-1988	-0.3	1988-2005	-2.8*							-2.8*
All Races	Female	1975-1989	1.8*	1989-2005	-2.5*							-2.5*
White	Both Sexes	1975-1988	0.1	1988-2005	-2.6*							-2.6*
White	Male	1975-1988	-0.3	1988-2005	-2.9*							-2.9*
White	Female	1975-1989	1.6*	1989-2005	-2.3*							-2.3*
Black	Both Sexes	1975-1990	1.2*	1990-2005	-2.9*							-2.9*
Black	Male	1975-1990	0.9	1990-2005	-2.8*							-2.8*
Black	Female	1975-1989	3.8*	1989-2005	-2.8*							-2.8*
<u>SEER Delay-Adjusted Incidence<sup>a</sup></u>												
All Races	Both Sexes	1975-1988	0.1	1988-2005	-2.5*							-2.5*
All Races	Male	1975-1988	-0.3	1988-2005	-2.7*							-2.7*
All Races	Female	1975-1989	1.8*	1989-2005	-2.5*							-2.5*
White	Both Sexes	1975-1988	0.1	1988-2005	-2.5*							-2.5*
White	Male	1975-1987	-0.1	1987-2005	-2.7*							-2.7*
White	Female	1975-1989	1.6*	1989-2005	-2.3*							-2.3*
Black	Both Sexes	1975-1990	1.2*	1990-2005	-2.8*							-2.8*
Black	Male	1975-1990	0.9	1990-2005	-2.7*							-2.7*
Black	Female	1975-1989	3.8*	1989-2005	-2.7*							-2.7*
<u>U.S. Cancer Mortality<sup>b</sup></u>												
All Races	Both Sexes	1975-1988	-0.7*	1988-1992	0.8	1992-2005	-2.1*					-2.1*
All Races	Male	1975-1993	-0.8*	1993-2005	-2.3*							-2.3*
All Races	Female	1975-1992	1.5*	1992-2005	-1.9*							-1.9*
White	Both Sexes	1975-1988	-1.0*	1988-1991	1.2	1991-2005	-1.8*					-1.8*
White	Male	1975-1993	-1.1*	1993-2005	-2.1*							-2.1*
White	Female	1975-1992	1.4*	1992-2005	-1.6*							-1.6*
Black	Both Sexes	1975-1993	1.2*	1993-2005	-3.0*							-3.0*
Black	Male	1975-1993	1.3*	1993-2005	-3.0*							-3.0*
Black	Female	1975-1993	2.3*	1993-2005	-3.1*							-3.1*

Joinpoint Regression Program Version 3.3.1, April 2008, National Cancer Institute. (<http://srab.cancer.gov/joinpoint/>).

The APC is the Annual Percent Change based on rates age-adjusted to the 2000 US Std Population (19 age groups - Census P25-1130).

Trends are from the SEER 9 areas (San Francisco, Connecticut, Detroit, Hawaii, Iowa, New Mexico, Seattle, Utah, and Atlanta).

Trends are from US Mortality Files, National Center for Health Statistics, Centers for Disease Control and Prevention.

The AAPC is the Average Annual Percent Change and is based on the APCs calculated by Joinpoint over the time range of 1975-2005.

\* The APC/AAPC is significantly different from zero (p&lt;.05).

a  
b  
c  
\*

Table XII-2  
LARYNX CANCER (Invasive)

AGE ADJUSTED SEER INCIDENCE<sup>a</sup> RATES BY YEAR, RACE AND SEX

	<u>All Races</u>			<u>Whites</u>			<u>Blacks</u>		
	<u>Total</u>	<u>Males</u>	<u>Females</u>	<u>Total</u>	<u>Males</u>	<u>Females</u>	<u>Total</u>	<u>Males</u>	<u>Females</u>
<u>AGE-ADJUSTED RATES</u>									
<u>YEAR OF DIAGNOSIS:</u>									
1975	5.0	9.5	1.5	5.0	9.4	1.5	7.1	13.4	-
1976	5.2	10.0	1.4	5.2	9.9	1.4	7.3	14.6	-
1977	5.0	9.7	1.4	5.0	9.7	1.3	7.5	13.9	2.4
1978	5.3	9.8	1.8	5.3	9.8	1.9	6.9	13.2	2.2
1979	5.4	10.1	1.7	5.4	10.2	1.6	7.5	13.2	3.1
1980	5.3	10.0	1.5	5.2	9.9	1.5	7.3	14.5	-
1981	5.4	9.8	1.9	5.3	9.6	2.0	8.1	16.3	-
1982	5.3	9.8	1.8	5.3	9.8	1.8	7.9	14.5	2.9
1983	5.3	9.9	1.7	5.4	10.2	1.7	6.8	12.2	2.6
1984	5.1	9.6	1.6	5.0	9.6	1.5	8.5	14.9	3.4
1985	5.4	9.9	1.9	5.4	10.0	1.9	8.4	15.4	3.3
1986	5.0	9.4	1.6	4.9	9.2	1.7	7.7	15.4	2.1
1987	5.2	9.4	1.9	5.1	9.3	1.9	8.3	15.2	3.1
1988	5.2	9.6	1.9	5.2	9.6	1.9	8.2	14.9	3.2
1989	5.0	8.9	2.0	5.0	8.9	1.9	7.9	14.3	3.3
1990	5.1	9.2	1.9	5.0	8.9	1.9	9.5	17.8	3.6
1991	4.7	8.5	1.8	4.8	8.5	1.9	6.6	12.3	2.3
1992	5.0	9.1	1.8	4.9	8.9	1.7	8.6	15.7	3.4
1993	4.4	8.1	1.5	4.4	8.0	1.5	6.9	14.1	1.7
1994	4.7	8.3	1.8	4.5	8.1	1.7	8.9	16.0	3.7
1995	4.4	7.9	1.6	4.4	7.9	1.6	6.8	13.1	2.2
1996	4.3	7.6	1.6	4.3	7.6	1.6	6.5	11.5	2.8
1997	4.2	7.5	1.6	4.1	7.3	1.6	7.2	13.3	2.7
1998	3.9	6.8	1.6	3.7	6.5	1.5	6.6	12.0	2.7
1999	4.2	7.1	1.8	4.2	7.0	1.8	7.1	12.2	3.6
2000	4.0	7.3	1.4	4.1	7.2	1.5	6.0	11.4	2.2
2001	3.6	6.5	1.3	3.6	6.3	1.3	6.2	12.2	1.8
2002	3.5	6.3	1.3	3.5	6.1	1.3	6.3	11.1	2.7
2003	3.3	5.9	1.2	3.3	5.8	1.3	5.0	9.5	1.8
2004	3.5	6.1	1.4	3.4	6.0	1.4	5.9	11.0	2.3
2005	3.4	6.1	1.3	3.4	6.1	1.3	5.5	10.4	1.9
1975-2005	4.6	8.3	1.6	4.6	8.3	1.6	7.1	13.2	2.5

<sup>a</sup> SEER 9 areas (San Francisco, Connecticut, Detroit, Hawaii, Iowa, New Mexico, Seattle, Utah, and Atlanta). Rates are per 100,000 and are age-adjusted to the 2000 US Std Population (19 age groups - Census P25-1130).

- Statistic not shown. Rate based on less than 16 cases for the time interval.

Table XII-3  
LARYNX CANCER (Invasive)

AGE-ADJUSTED U.S. DEATH<sup>a</sup> RATES BY YEAR, RACE AND SEX

	All Races			Whites			Blacks		
	Total	Males	Females	Total	Males	Females	Total	Males	Females
<u>AGE-ADJUSTED RATES</u>									
YEAR OF DEATH:									
1975	1.7	3.3	0.5	1.6	3.2	0.4	2.6	5.0	0.8
1976	1.7	3.4	0.5	1.6	3.3	0.5	2.6	5.1	0.7
1977	1.7	3.4	0.5	1.6	3.3	0.4	2.7	5.5	0.7
1978	1.7	3.4	0.5	1.6	3.2	0.5	2.9	5.9	0.7
1979	1.7	3.3	0.5	1.6	3.2	0.4	2.6	5.2	0.6
1980	1.6	3.2	0.5	1.5	3.0	0.4	2.9	5.7	0.9
1981	1.7	3.3	0.5	1.5	3.1	0.5	3.0	5.6	1.1
1982	1.7	3.2	0.5	1.6	3.0	0.5	2.8	5.5	0.8
1983	1.6	3.2	0.5	1.5	3.0	0.5	2.7	5.3	0.9
1984	1.6	3.2	0.5	1.5	2.9	0.5	3.0	6.2	0.7
1985	1.6	3.0	0.5	1.4	2.8	0.5	3.0	5.8	0.9
1986	1.6	3.1	0.5	1.5	2.8	0.5	3.1	6.1	1.0
1987	1.6	3.1	0.5	1.5	2.9	0.5	2.9	5.9	0.9
1988	1.6	3.0	0.5	1.4	2.7	0.5	3.2	6.7	0.8
1989	1.6	3.0	0.6	1.4	2.7	0.6	3.2	6.6	0.8
1990	1.6	3.0	0.5	1.4	2.7	0.5	3.0	5.8	1.1
1991	1.7	3.1	0.6	1.5	2.8	0.6	3.3	6.4	1.2
1992	1.6	3.0	0.6	1.5	2.7	0.6	3.3	6.4	1.1
1993	1.6	3.0	0.6	1.5	2.7	0.5	3.2	6.4	1.1
1994	1.6	2.9	0.6	1.4	2.6	0.5	3.2	6.4	1.0
1995	1.5	2.8	0.5	1.4	2.6	0.5	3.0	6.0	1.0
1996	1.5	2.8	0.6	1.4	2.5	0.5	3.2	6.3	1.0
1997	1.4	2.7	0.5	1.3	2.4	0.5	3.0	6.1	0.9
1998	1.4	2.6	0.6	1.3	2.3	0.5	2.8	5.6	0.9
1999	1.4	2.5	0.5	1.3	2.3	0.5	2.6	5.1	0.9
2000	1.4	2.5	0.5	1.3	2.3	0.5	2.8	5.5	1.0
2001	1.3	2.5	0.5	1.2	2.3	0.5	2.6	5.0	0.9
2002	1.3	2.3	0.5	1.2	2.2	0.5	2.5	4.8	0.8
2003	1.3	2.4	0.5	1.2	2.2	0.4	2.5	5.1	0.7
2004	1.2	2.2	0.4	1.2	2.1	0.4	2.2	4.6	0.7
2005	1.2	2.2	0.5	1.2	2.1	0.5	2.3	4.6	0.8
1975-2005	1.5	2.9	0.5	1.4	2.7	0.5	2.8	5.6	0.9

<sup>a</sup> US Mortality Files, National Center for Health Statistics, Centers for Disease Control and Prevention. Rates are per 100,000 and are age-adjusted to the 2000 US Std Population (19 age groups - Census P25-1130).

- Statistic not shown. Rate based on less than 16 cases for the time interval.

Table XII-4  
LARYNX CANCER (Invasive)

SEER INCIDENCE<sup>a</sup> AND U.S. DEATH<sup>b</sup> RATES, AGE-ADJUSTED AND AGE-SPECIFIC RATES, BY RACE AND SEX

	All Races			Whites			Blacks		
	Total	Males	Females	Total	Males	Females	Total	Males	Females
<u>SEER INCIDENCE</u>									
<u>AGE AT DIAGNOSIS</u>									
AGE-ADJUSTED RATES, 2001-2005									
All ages	3.6	6.4	1.3	3.6	6.3	1.4	5.8	10.9	2.0
Under 65	1.8	3.0	0.7	1.8	2.9	0.7	3.4	6.0	1.2
65 and over	15.7	29.8	5.6	16.0	29.9	5.8	22.3	45.1	7.4
All ages(IARC world std) <sup>c</sup>	2.6	4.4	1.0	2.5	4.3	1.0	4.3	7.9	1.5
AGE-SPECIFIC RATES, 2001-2005									
<1	-	-	-	-	-	-	-	-	-
1-4	-	-	-	-	-	-	-	-	-
5-9	-	-	-	-	-	-	-	-	-
10-14	-	-	-	-	-	-	-	-	-
15-19	-	-	-	-	-	-	-	-	-
20-24	-	-	-	-	-	-	-	-	-
25-29	-	-	-	-	-	-	-	-	-
30-34	0.1	0.2	-	0.2	0.2	-	-	-	-
35-39	0.4	0.5	0.3	0.4	0.5	0.3	0.5	-	-
40-44	1.2	1.8	0.7	1.2	1.7	0.7	2.3	3.4	1.3
45-49	2.7	4.4	1.0	2.5	4.0	0.9	5.8	9.9	2.2
50-54	5.2	8.6	1.9	5.1	8.4	1.9	9.3	16.2	3.4
55-59	8.9	14.9	3.2	8.6	14.2	3.2	17.6	31.9	5.8
60-64	13.2	22.3	4.8	13.1	21.9	5.0	22.2	41.6	6.7
65-69	16.7	28.6	6.5	16.9	28.4	6.7	25.4	46.9	9.0
70-74	17.9	32.1	6.6	18.2	32.0	7.0	26.5	52.4	8.5
75-79	16.2	31.3	5.4	16.3	31.2	5.6	25.7	52.2	9.2
80-84	14.4	29.9	4.7	14.7	30.3	4.9	16.0	37.8	-
85+	9.9	25.4	2.8	10.1	25.9	3.0	7.9	22.4	-
<u>U.S. MORTALITY</u>									
<u>AGE AT DEATH</u>									
AGE-ADJUSTED RATES, 2001-2005									
All ages	1.3	2.3	0.5	1.2	2.1	0.5	2.4	4.8	0.8
Under 65	0.5	0.9	0.2	0.5	0.8	0.2	1.2	2.2	0.4
65 and over	6.5	12.3	2.4	6.2	11.6	2.4	11.0	23.3	3.5
All ages(IARC world std) <sup>c</sup>	0.8	1.5	0.3	0.8	1.4	0.3	1.7	3.2	0.5
AGE-SPECIFIC RATES, 2001-2005									
<1	-	-	-	-	-	-	-	-	-
1-4	-	-	-	-	-	-	-	-	-
5-9	-	-	-	-	-	-	-	-	-
10-14	-	-	-	-	-	-	-	-	-
15-19	-	-	-	-	-	-	-	-	-
20-24	-	-	-	-	-	-	-	-	-
25-29	-	-	-	-	-	-	-	-	-
30-34	0.0	-	-	-	-	-	-	-	-
35-39	0.1	0.1	0.0	0.0	0.1	-	0.1	-	-
40-44	0.3	0.4	0.1	0.2	0.4	0.1	0.5	0.8	0.3
45-49	0.7	1.2	0.3	0.6	1.0	0.2	1.6	2.7	0.6
50-54	1.4	2.3	0.5	1.2	1.9	0.4	3.5	6.3	1.2
55-59	2.6	4.4	0.9	2.3	3.9	0.9	6.0	11.3	1.7
60-64	4.2	7.2	1.5	3.9	6.4	1.5	9.0	17.2	2.6
65-69	5.5	9.7	2.0	5.2	8.9	1.9	10.0	19.6	2.9
70-74	6.7	11.6	2.7	6.3	10.8	2.6	12.3	23.7	4.5
75-79	7.1	13.4	2.6	6.9	12.8	2.6	12.0	26.2	3.5
80-84	7.0	14.2	2.5	6.7	13.6	2.5	11.1	25.9	3.3
85+	6.3	15.7	2.2	6.2	15.2	2.2	8.5	23.0	2.9

<sup>a</sup> SEER 17 areas. Rates are per 100,000 and are age-adjusted to the 2000 US Std Population (19 age groups - Census P25-1130), unless noted.

<sup>b</sup> US Mortality Files, National Center for Health Statistics, Centers for Disease Control and Prevention. Rates are per 100,000 and are age-adjusted to the 2000 US Std Population (19 age groups - Census P25-1130), unless noted.

<sup>c</sup> Rates are per 100,000 and are age-adjusted to the IARC world standard population.

- Statistic not shown. Rate based on less than 16 cases for the time interval.

Table XII-5  
LARYNX CANCER (Invasive)

SURVIVAL RATES, BY RACE, SEX, DIAGNOSIS YEAR, STAGE AND AGE

	All Races			Whites			Blacks		
	Total	Males	Females	Total	Males	Females	Total	Males	Females
<u>5-YR RELATIVE SURVIVAL RATES</u>									
YEAR OF DIAGNOSIS:									
1960-1963 <sup>a</sup>	-	-	-	53	54	46	-	-	-
1970-1973 <sup>a</sup>	-	-	-	62	63	56	-	-	-
1975-1977 <sup>b</sup>	66.6	67.3	62.8	67.2	68.1	62.5	59.2	58.3	63.5 <sup>f</sup>
1978-1980 <sup>b</sup>	66.0	66.3	64.6	67.0	67.3	65.3	57.1	57.3	56.0 <sup>f</sup>
1981-1983 <sup>b</sup>	68.8	69.0	67.8	70.2	70.5	69.3	56.5	57.3	53.1 <sup>f</sup>
1984-1986 <sup>b</sup>	65.7	66.4	62.3	67.6	68.3	64.2	52.8	53.4	50.8 <sup>f</sup>
1987-1989 <sup>b</sup>	66.4	67.5	62.4	67.8	69.3	61.9	57.2	55.2	63.2 <sup>f</sup>
1990-1992 <sup>b</sup>	66.5	67.3	63.5	68.4	69.1	65.6	53.2	53.7	51.1 <sup>f</sup>
1993-1995 <sup>b</sup>	63.8	65.5	57.3	65.4	67.2	58.2	53.0	54.2	48.0 <sup>f</sup>
1996-2004 <sup>b</sup>	63.7 <sup>e</sup>	65.0	58.7	65.8	66.9	61.8	50.3	52.8	43.1
<u>5-YR PERIOD SURVIVAL RATES<sup>cd</sup></u>									
YEAR OF DIAGNOSIS:									
1996-2004	62.1	63.5	57.1	63.4	64.5	59.3	51.6	53.8	43.7
<u>5-YR RELATIVE SURVIVAL RATES, 1996-2004<sup>c</sup></u>									
AGE AT DIAGNOSIS:									
<45	72.1	70.5	75.5	74.7	72.8	78.8	59.9	58.7 <sup>f</sup>	61.5 <sup>f</sup>
45-54	64.0	64.2	63.1	67.4	67.3	68.1	50.1	50.9	47.1 <sup>f</sup>
55-64	62.9	63.9	58.9	64.6	65.6	60.6	52.5	53.5	49.2
65-74	61.4	63.5	53.8	61.7	63.2	55.8	51.4	58.0	26.6 <sup>f</sup>
75+	57.2	60.6	45.8	58.3	61.6	47.7	43.7 <sup>f</sup>	45.3 <sup>f</sup>	33.0 <sup>f</sup>
Under 65	64.4	64.8	63.0	66.8	67.1	65.9	52.7	53.3	51.0
65 and over	60.6	62.9	52.2	61.1	63.1	54.1	49.3	54.0	30.9 <sup>f</sup>

<sup>a</sup> Rates are based on End Results data from a series of hospital registries and one population-based registry.  
<sup>b</sup> Rates are from the SEER 9 areas (San Francisco, Connecticut, Detroit, Hawaii, Iowa, New Mexico, Seattle, Utah, Atlanta).  
Rates are based on follow-up of patients into 2005.  
<sup>c</sup> Rates are from the SEER 17 areas (San Francisco, Connecticut, Detroit, Hawaii, Iowa, New Mexico, Seattle, Utah, Atlanta, San Jose-Monterey, Los Angeles, Alaska Native Registry, Rural Georgia, California excluding SF/SJM/LA, Kentucky, Louisiana and New Jersey). California excluding SF/SJM/LA, Kentucky, Louisiana, and New Jersey contribute cases for diagnosis years 2000-2004. The remaining 13 SEER Areas contribute cases for the entire period 1996-2004. Rates are based on follow-up of patients into 2005.  
<sup>d</sup> Period survival provides a more up-to-date estimate of survival by piecing together the most recent conditional survival estimates from several cohorts. It is computed here using three calendar year blocks (2002-2004: 0-1 year survival), (2001-2003: 1-2 year survival), (2000-2002: 2-3 year survival), (1999-2001: 3-4 year survival), (1998-2000: 4-5 years survival).  
<sup>e</sup> The difference in rates between 1975-1977 and 1996-2004 is statistically significant (p<.05).  
<sup>f</sup> The standard error of the survival rate is between 5 and 10 percentage points.  
<sup>g</sup> The standard error of the survival rate is greater than 10 percentage points.  
- Statistic could not be calculated due to fewer than 16 cases during the time period.

Table XII-6  
 LARYNX CANCER (Invasive)

SURVIVAL RATES<sup>a</sup>

By Year of Diagnosis

All Races, Males and Females

Year of Diagnosis

	1975- 1979	1980- 1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	2002	2003	2004
Relative Survival Rates (SEER <sup>b</sup> )																						
1-year	88.6	89.1	90.6	89.6	88.2	86.8	89.5	87.7	90.8	88.5	87.7	87.5	89.5	88.7	86.2	86.6	86.0	85.8	85.8	84.9	84.5	87.2
2-year	79.2	80.3	80.9	80.3	79.1	76.8	80.3	77.8	80.9	78.4	79.3	77.4	80.2	79.6	77.9	76.2	75.3	77.0	76.0	75.2	74.4	
3-year	73.4	74.8	75.7	73.3	74.1	72.1	74.8	71.4	74.3	74.0	72.5	70.0	75.1	74.3	72.1	70.7	71.3	71.3	71.1	70.3		
4-year	69.1	70.6	70.2	68.6	70.4	69.1	68.0	66.9	70.3	69.8	66.4	65.7	69.5	69.5	68.6	67.7	69.1	67.1	67.1			
5-year	66.1	67.4	68.1	65.5	67.9	66.9	64.2	65.4	68.0	66.2	62.4	62.9	66.2	65.7	65.4	63.6	64.6	63.8				
6-year	63.9	64.6	64.4	61.4	64.8	64.3	62.1	61.4	64.0	62.9	60.0	58.6	63.6	63.6	62.4	59.7	61.4					
7-year	61.7	62.1	62.0	59.0	61.4	62.7	59.6	59.6	62.9	60.2	57.8	56.6	60.3	61.2	60.2	56.2						
8-year	59.9	60.5	59.2	57.0	58.0	60.2	56.4	57.5	59.2	57.5	55.5	55.0	57.6	57.9	57.6							
9-year	57.8	58.5	56.7	54.7	55.7	57.2	53.8	55.4	56.8	55.4	52.6	51.3	54.8	54.4								
11-year	55.7	56.7	54.6	51.8	54.1	55.4	51.1	53.0	55.0	52.2	49.9	49.9	51.6									
10-year	54.3	54.5	53.3	50.1	51.2	51.9	49.7	51.2	53.6	49.8	47.9	48.4										
12-year	52.6	52.0	51.2	47.9	49.7	49.3	48.2	49.0	52.4	47.4	46.2											
13-year	51.5	49.9	50.7	46.0	48.3	48.7	46.5	45.8	51.3	43.9												
14-year	50.2	48.7	46.6	43.4	46.4	46.6	44.3	44.4	49.7													
15-year	48.1	47.0	45.5	40.5	43.8	43.5	41.9	42.9														
16-year	46.1	44.6	44.1	40.0	41.0	42.6	40.6															
17-year	44.0	43.2	43.3	40.0	39.6	39.9																
18-year	43.1	41.6	43.3	38.7	38.1																	
19-year	41.4	40.3	41.8	36.0																		
20-year	39.5	39.0	41.8																			

<sup>a</sup> Survival rates are relative rates expressed as percents.

<sup>b</sup> Rates are from the SEER 9 areas (San Francisco, Connecticut, Detroit, Hawaii, Iowa, New Mexico, Seattle, Utah, and Atlanta).

Table XII-7  
 LARYNX CANCER (Invasive)

SURVIVAL RATES<sup>a</sup>

By Year of Diagnosis

All Races, Males

Year of Diagnosis

	1975- 1979	1980- 1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	2002	2003	2004
Relative Survival Rates (SEER <sup>b</sup> )																						
1-year	88.9	89.3	90.8	89.8	88.8	86.9	89.9	88.1	90.9	88.8	88.1	89.7	91.4	88.3	88.7	87.7	87.4	86.0	86.4	85.4	84.3	87.9
2-year	79.3	80.5	81.5	80.2	80.2	76.0	81.2	78.4	81.4	79.4	80.0	79.5	81.8	79.6	80.7	77.0	76.5	77.6	75.9	75.4	75.3	
3-year	73.8	75.2	75.9	74.0	76.5	70.8	75.5	71.5	74.5	74.3	74.3	71.9	76.5	74.3	74.8	71.5	72.2	71.9	71.8	71.2		
4-year	69.5	71.2	70.5	69.2	72.5	68.4	69.6	67.7	70.7	70.5	68.2	67.1	71.4	69.6	71.0	69.1	70.3	67.6	67.4			
5-year	66.6	68.0	68.3	66.0	69.7	66.4	65.9	66.0	68.7	66.9	64.3	64.2	67.8	66.3	67.9	65.6	66.3	64.4				
6-year	64.4	65.1	64.8	61.9	67.1	63.9	63.0	62.0	64.6	63.5	62.0	60.3	65.4	64.0	65.2	62.6	63.0					
7-year	62.3	62.6	62.7	59.6	63.8	62.6	61.3	60.4	63.5	60.6	59.9	58.3	62.0	61.7	63.1	59.3						
8-year	60.5	61.2	60.7	57.5	60.5	60.0	58.2	58.4	59.8	58.6	57.5	57.3	59.0	58.3	60.5							
9-year	58.3	59.1	58.6	55.6	58.9	57.6	56.0	56.6	57.4	56.3	54.1	53.4	56.5	54.5								
11-year	56.5	57.6	56.8	52.4	57.2	56.3	53.3	54.3	55.0	53.0	51.4	51.7	53.4									
10-year	55.4	55.4	56.2	50.7	54.6	53.6	51.6	52.4	54.0	50.9	49.4	50.2										
12-year	54.0	52.8	54.2	49.2	53.2	51.6	49.6	50.5	52.8	48.3	47.5											
13-year	53.0	50.7	53.5	47.9	52.8	50.6	47.7	47.4	52.2	45.5												
14-year	51.6	49.4	49.5	45.5	51.4	48.6	46.0	46.4	50.0													
15-year	49.6	47.5	48.5	42.9	48.0	45.5	43.2	45.1														
16-year	47.6	45.4	46.5	42.5	45.8	44.6	42.3															
17-year	45.5	44.4	45.8	42.5	44.7	42.1																
18-year	44.5	42.6	45.8	40.7	43.0																	
19-year	42.8	41.3	44.7	37.3																		
20-year	41.0	39.9	44.7																			

<sup>a</sup>

Survival rates are relative rates expressed as percents.

<sup>b</sup>

Rates are from the SEER 9 areas (San Francisco, Connecticut, Detroit, Hawaii, Iowa, New Mexico, Seattle, Utah, and Atlanta).



Table XII-8  
 LARYNX CANCER (Invasive)

SURVIVAL RATES<sup>a</sup>

By Year of Diagnosis

All Races, Females

Year of Diagnosis

	1975- 1979	1980- 1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	2002	2003	2004
Relative Survival Rates (SEER <sup>b</sup> )																						
1-year	87.1	88.5	89.7	88.8	85.6	86.1	87.9	86.0	90.2	87.3	85.9	78.6	81.7	90.6	76.8	83.4	81.2	85.0	83.3	82.5	85.0	84.9
2-year	78.5	79.2	77.9	80.4	74.8	79.5	77.1	75.3	78.9	74.1	76.1	69.3	73.4	79.6	68.0	73.7	70.9	74.5	76.1	74.0	70.6	
3-year	71.6	72.7	74.3	70.0	64.4	77.2	72.1	70.6	73.4	72.5	65.3	62.5	69.4	74.5	62.4	68.1	67.9	68.5	67.8	66.5		
4-year	67.2	68.0	68.8	66.0	61.9	71.5	62.9	64.0	69.1	66.8	58.7	60.2	61.8	69.1	59.7	63.4	65.1	64.8	66.1			
5-year	63.8	65.0	66.8	63.0	60.4	68.5	58.4	62.6	64.5	63.2	54.3	57.8	59.4	63.1	56.1	57.5	59.1	61.3				
6-year	61.6	62.4	62.4	59.0	55.7	65.2	58.1	59.1	61.8	60.0	52.0	52.0	55.9	61.9	52.6	50.6	56.0					
7-year	58.8	59.9	58.8	56.6	52.3	62.8	54.2	56.4	60.0	58.6	49.1	50.0	53.5	59.0	49.9	46.6						
8-year	57.5	57.7	53.0	55.1	48.7	60.0	50.5	53.9	56.9	53.3	47.6	46.6	51.9	56.5	47.3							
9-year	55.1	55.6	49.0	50.5	44.3	55.6	46.6	50.9	54.8	51.2	46.6	43.5	48.1	53.7								
11-year	51.9	53.1	45.5	49.2	42.6	50.8	44.2	48.0	54.6	49.3	44.1	43.3	43.9									
10-year	49.4	50.7	42.4	47.1	39.3	45.9	43.4	47.1	52.1	45.4	42.1	42.0										
12-year	46.6	48.6	39.9	42.5	37.1	41.2	43.0	43.6	50.0	43.3	40.5											
13-year	45.2	46.4	39.4	38.6	32.1	41.2	42.7	40.3	47.7	38.0												
14-year	43.9	45.6	36.1	35.0	28.5	39.4	39.3	37.0	47.7													
15-year	41.8	45.1	34.4	31.5	28.5	36.9	37.3	35.5														
16-year	40.2	41.7	34.3	30.8	24.9	35.0	35.2															
17-year	37.8	38.4	34.2	30.8	22.7	32.5																
18-year	37.2	37.8	33.7	30.8	22.2																	
19-year	36.4	36.5	31.3	30.8																		
20-year	33.9	35.6	28.4																			

<sup>a</sup> Survival rates are relative rates expressed as percents.

<sup>b</sup> Rates are from the SEER 9 areas (San Francisco, Connecticut, Detroit, Hawaii, Iowa, New Mexico, Seattle, Utah, and Atlanta).

Table XII-9  
LARYNX CANCER (Invasive)

Risk of Being Diagnosed With Cancer in 10, 20 and 30 Years, Lifetime Risk of Being Diagnosed with Cancer, and  
Lifetime Risk of Dying from Cancer Given Cancer Free At Current Age  
Both Sexes, 2003-2005 By Race/Ethnicity

Race/ Ethnicity	Current Age	Risk of Being Diagnosed with Cancer			Risk of Dying from Cancer	
		+10 yrs Percent ( 95% C.I. )	+20 yrs Percent ( 95% C.I. )	+30 yrs Percent ( 95% C.I. )	Eventually Percent ( 95% C.I. )	Eventually Percent ( 95% C.I. )
All Races	0	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.37 ( 0.36, 0.37 )	0.14 ( 0.13, 0.14 )
	10	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.37 ( 0.36, 0.38 )	0.14 ( 0.14, 0.14 )
	20	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.02 ( 0.02, 0.02 )	0.37 ( 0.36, 0.38 )	0.14 ( 0.14, 0.14 )
	30	0.00 ( 0.00, 0.00 )	0.02 ( 0.02, 0.02 )	0.08 ( 0.08, 0.09 )	0.37 ( 0.37, 0.38 )	0.14 ( 0.14, 0.14 )
	40	0.02 ( 0.02, 0.02 )	0.08 ( 0.08, 0.09 )	0.20 ( 0.20, 0.21 )	0.38 ( 0.37, 0.39 )	0.14 ( 0.14, 0.14 )
	50	0.07 ( 0.06, 0.07 )	0.19 ( 0.18, 0.19 )	0.31 ( 0.30, 0.31 )	0.37 ( 0.36, 0.38 )	0.14 ( 0.14, 0.14 )
	60	0.13 ( 0.13, 0.14 )	0.26 ( 0.25, 0.26 )	0.31 ( 0.30, 0.32 )	0.32 ( 0.31, 0.33 )	0.13 ( 0.13, 0.13 )
	70	0.14 ( 0.14, 0.15 )	0.21 ( 0.20, 0.22 )	- ( - , - )	0.22 ( 0.21, 0.23 )	0.10 ( 0.10, 0.10 )
80	0.09 ( 0.09, 0.10 )	- ( - , - )	- ( - , - )	0.11 ( 0.10, 0.12 )	0.06 ( 0.06, 0.06 )	
White	0	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.37 ( 0.36, 0.38 )	0.13 ( 0.13, 0.13 )
	10	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.37 ( 0.36, 0.38 )	0.13 ( 0.13, 0.13 )
	20	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.02 ( 0.02, 0.02 )	0.37 ( 0.37, 0.38 )	0.13 ( 0.13, 0.13 )
	30	0.00 ( 0.00, 0.00 )	0.02 ( 0.02, 0.02 )	0.08 ( 0.08, 0.09 )	0.38 ( 0.37, 0.39 )	0.13 ( 0.13, 0.14 )
	40	0.02 ( 0.02, 0.02 )	0.08 ( 0.08, 0.08 )	0.20 ( 0.20, 0.21 )	0.38 ( 0.37, 0.39 )	0.13 ( 0.13, 0.14 )
	50	0.06 ( 0.06, 0.07 )	0.19 ( 0.18, 0.19 )	0.31 ( 0.30, 0.32 )	0.37 ( 0.36, 0.38 )	0.13 ( 0.13, 0.14 )
	60	0.13 ( 0.13, 0.14 )	0.26 ( 0.25, 0.27 )	0.32 ( 0.31, 0.33 )	0.32 ( 0.32, 0.33 )	0.12 ( 0.12, 0.13 )
	70	0.14 ( 0.14, 0.15 )	0.21 ( 0.20, 0.22 )	- ( - , - )	0.22 ( 0.21, 0.23 )	0.09 ( 0.09, 0.10 )
80	0.10 ( 0.09, 0.10 )	- ( - , - )	- ( - , - )	0.11 ( 0.10, 0.12 )	0.06 ( 0.05, 0.06 )	
Black	0	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.47 ( 0.44, 0.50 )	0.21 ( 0.20, 0.22 )
	10	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.01 )	0.48 ( 0.45, 0.51 )	0.22 ( 0.21, 0.23 )
	20	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.01 )	0.04 ( 0.03, 0.04 )	0.49 ( 0.46, 0.52 )	0.22 ( 0.21, 0.23 )
	30	0.00 ( 0.00, 0.01 )	0.04 ( 0.03, 0.04 )	0.15 ( 0.13, 0.16 )	0.49 ( 0.46, 0.53 )	0.22 ( 0.21, 0.23 )
	40	0.03 ( 0.03, 0.04 )	0.15 ( 0.13, 0.16 )	0.32 ( 0.30, 0.35 )	0.50 ( 0.47, 0.54 )	0.23 ( 0.22, 0.24 )
	50	0.12 ( 0.11, 0.13 )	0.31 ( 0.29, 0.33 )	0.45 ( 0.42, 0.48 )	0.49 ( 0.46, 0.53 )	0.23 ( 0.22, 0.24 )
	60	0.21 ( 0.19, 0.23 )	0.37 ( 0.34, 0.40 )	0.42 ( 0.39, 0.45 )	0.42 ( 0.39, 0.46 )	0.21 ( 0.20, 0.22 )
	70	0.20 ( 0.18, 0.23 )	0.26 ( 0.23, 0.29 )	- ( - , - )	0.26 ( 0.23, 0.30 )	0.15 ( 0.14, 0.16 )
80	0.09 ( 0.07, 0.11 )	- ( - , - )	- ( - , - )	0.10 ( 0.08, 0.13 )	0.09 ( 0.08, 0.11 )	

Devcan Version 7.0.0, April 2008, National Cancer Institute (<http://srab.cancer.gov/devcan/>).

Source: Incidence data are from the SEER 17 areas (San Francisco, Connecticut, Detroit, Hawaii, Iowa, New Mexico, Seattle, Utah, Atlanta, San Jose-Monterey, Los Angeles, Alaska Native Registry, Rural Georgia, California excluding SF/SJM/LA, Kentucky, Louisiana and New Jersey). Mortality data are from the NCHS public use data file for the total US.

- Statistic could not be calculated.

A percent or confidence interval value of 0.00 represents a value that is below 0.005.

Table XII-9 - continued  
 LARYNX CANCER (Invasive)

Risk of Being Diagnosed With Cancer in 10, 20 and 30 Years, Lifetime Risk of Being Diagnosed with Cancer, and  
 Lifetime Risk of Dying from Cancer Given Cancer Free At Current Age  
 Both Sexes, 2003-2005 By Race/Ethnicity

Race/ Ethnicity	Current Age	Risk of Being Diagnosed with Cancer				Risk of Dying from Cancer	
		+10 yrs Percent ( 95% C.I. )	+20 yrs Percent ( 95% C.I. )	+30 yrs Percent ( 95% C.I. )	Eventually Percent ( 95% C.I. )	Eventually Percent ( 95% C.I. )	
Asian/ Pacific Islander	0	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.19 ( 0.16, 0.24 )	0.07 ( 0.05, 0.10 )	
	10	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.19 ( 0.16, 0.24 )	0.07 ( 0.05, 0.11 )	
	20	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.01 ( 0.00, 0.01 )	0.19 ( 0.16, 0.24 )	0.07 ( 0.05, 0.11 )	
	30	0.00 ( 0.00, 0.00 )	0.01 ( 0.00, 0.01 )	0.02 ( 0.02, 0.03 )	0.20 ( 0.16, 0.24 )	0.07 ( 0.05, 0.11 )	
	40	0.00 ( 0.00, 0.01 )	0.02 ( 0.02, 0.03 )	0.07 ( 0.06, 0.08 )	0.20 ( 0.16, 0.24 )	0.07 ( 0.05, 0.11 )	
	50	0.02 ( 0.01, 0.02 )	0.06 ( 0.05, 0.07 )	0.12 ( 0.10, 0.14 )	0.19 ( 0.16, 0.24 )	0.07 ( 0.05, 0.11 )	
	60	0.05 ( 0.04, 0.06 )	0.10 ( 0.09, 0.12 )	0.15 ( 0.13, 0.18 )	0.18 ( 0.15, 0.23 )	0.07 ( 0.05, 0.11 )	
	70	0.06 ( 0.05, 0.08 )	0.11 ( 0.09, 0.14 )	- ( - , - )	0.15 ( 0.11, 0.19 )	0.07 ( 0.05, 0.10 )	
	80	0.07 ( 0.05, 0.09 )	- ( - , - )	- ( - , - )	0.11 ( 0.07, 0.16 )	0.06 ( 0.04, 0.11 )	
American Indian/ Alaska Native <sup>a</sup>	0	0.00 ( 0.00, 0.02 )	0.00 ( 0.00, 0.02 )	0.00 ( 0.00, 0.02 )	0.14 ( 0.08, 0.42 )	0.10 ( 0.07, 0.18 )	
	10	0.00 ( 0.00, 0.01 )	0.00 ( 0.00, 0.01 )	0.00 ( 0.00, 0.01 )	0.14 ( 0.08, 0.43 )	0.10 ( 0.07, 0.19 )	
	20	0.00 ( 0.00, 0.01 )	0.00 ( 0.00, 0.01 )	0.01 ( 0.00, 0.03 )	0.14 ( 0.08, 0.43 )	0.10 ( 0.07, 0.19 )	
	30	0.00 ( 0.00, 0.01 )	0.01 ( 0.00, 0.03 )	0.03 ( 0.01, 0.07 )	0.15 ( 0.08, 0.44 )	0.10 ( 0.07, 0.19 )	
	40	0.01 ( 0.00, 0.03 )	0.03 ( 0.01, 0.07 )	0.07 ( 0.04, 0.13 )	0.15 ( 0.08, 0.45 )	0.11 ( 0.07, 0.20 )	
	50	0.03 ( 0.01, 0.06 )	0.07 ( 0.03, 0.12 )	0.15 ( 0.08, 0.25 )	0.15 ( 0.08, 0.46 )	0.11 ( 0.07, 0.21 )	
	60	0.04 ( 0.02, 0.09 )	0.13 ( 0.06, 0.24 )	0.13 ( 0.06, 0.26 )	0.13 ( 0.06, 0.47 )	0.10 ( 0.06, 0.21 )	
	70	0.10 ( 0.04, 0.21 )	0.10 ( 0.04, 0.24 )	- ( - , - )	0.10 ( 0.04, 0.50 )	0.08 ( 0.04, 0.20 )	
	80	0.00 ( 0.00, 0.15 )	- ( - , - )	- ( - , - )	0.00 ( 0.00, 0.57 )	0.05 ( 0.01, 0.23 )	
Hispanic <sup>b</sup>	0	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.30 ( 0.27, 0.34 )	0.13 ( 0.11, 0.14 )	
	10	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.31 ( 0.28, 0.34 )	0.13 ( 0.11, 0.15 )	
	20	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.01 ( 0.01, 0.01 )	0.31 ( 0.28, 0.35 )	0.13 ( 0.11, 0.15 )	
	30	0.00 ( 0.00, 0.00 )	0.01 ( 0.01, 0.01 )	0.05 ( 0.04, 0.06 )	0.31 ( 0.28, 0.35 )	0.13 ( 0.12, 0.15 )	
	40	0.01 ( 0.01, 0.01 )	0.05 ( 0.04, 0.06 )	0.14 ( 0.12, 0.15 )	0.31 ( 0.28, 0.35 )	0.13 ( 0.12, 0.15 )	
	50	0.04 ( 0.04, 0.05 )	0.13 ( 0.12, 0.15 )	0.23 ( 0.21, 0.26 )	0.31 ( 0.28, 0.35 )	0.13 ( 0.12, 0.15 )	
	60	0.09 ( 0.08, 0.11 )	0.20 ( 0.18, 0.23 )	0.27 ( 0.24, 0.30 )	0.28 ( 0.25, 0.32 )	0.13 ( 0.11, 0.15 )	
	70	0.12 ( 0.10, 0.14 )	0.19 ( 0.17, 0.22 )	- ( - , - )	0.21 ( 0.18, 0.25 )	0.11 ( 0.09, 0.13 )	
	80	0.09 ( 0.07, 0.12 )	- ( - , - )	- ( - , - )	0.11 ( 0.08, 0.16 )	0.08 ( 0.06, 0.10 )	

Devcan Version 7.0.0, April 2008, National Cancer Institute (<http://srab.cancer.gov/devcan/>).

Source: Incidence data are from the SEER 17 areas (San Francisco, Connecticut, Detroit, Hawaii, Iowa, New Mexico, Seattle, Utah, Atlanta, San Jose-Monterey, Los Angeles, Alaska Native Registry, Rural Georgia, California excluding SF/SJM/LA, Kentucky, Louisiana and New Jersey). Mortality data are from the NCHS public use data file for the total US.

<sup>a</sup> Underlying incidence and mortality data for American Indian/Alaska Native are based on the CHSDA (Contract Health Service Delivery Area) counties.

<sup>b</sup> Hispanic is not mutually exclusive from whites, blacks, Asian/Pacific Islanders, and American Indians/Alaska Natives. Underlying incidence data for Hispanics are based on NHIA and exclude cases from the Alaska Native Registry and Kentucky. Underlying mortality data for Hispanics exclude deaths from Minnesota, New Hampshire and North Dakota.

- Statistic could not be calculated.

A percent or confidence interval value of 0.00 represents a value that is below 0.005.

Table XII-9 - continued  
 LARYNX CANCER (Invasive)

Risk of Being Diagnosed With Cancer in 10, 20 and 30 Years, Lifetime Risk of Being Diagnosed with Cancer, and  
 Lifetime Risk of Dying from Cancer Given Cancer Free At Current Age  
 Males, 2003-2005 By Race/Ethnicity

Race/ Ethnicity	Current Age	Risk of Being Diagnosed with Cancer			Risk of Dying from Cancer	
		+10 yrs Percent ( 95% C.I. )	+20 yrs Percent ( 95% C.I. )	+30 yrs Percent ( 95% C.I. )	Eventually Percent ( 95% C.I. )	Eventually Percent ( 95% C.I. )
All Races	0	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.61 ( 0.59, 0.62 )	0.23 ( 0.22, 0.23 )
	10	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.62 ( 0.60, 0.63 )	0.23 ( 0.23, 0.24 )
	20	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.03 ( 0.03, 0.03 )	0.62 ( 0.60, 0.64 )	0.23 ( 0.23, 0.24 )
	30	0.00 ( 0.00, 0.00 )	0.03 ( 0.03, 0.03 )	0.14 ( 0.13, 0.14 )	0.63 ( 0.61, 0.64 )	0.24 ( 0.23, 0.24 )
	40	0.03 ( 0.03, 0.03 )	0.13 ( 0.13, 0.14 )	0.33 ( 0.32, 0.34 )	0.63 ( 0.62, 0.65 )	0.24 ( 0.23, 0.24 )
	50	0.11 ( 0.10, 0.11 )	0.31 ( 0.30, 0.32 )	0.51 ( 0.50, 0.53 )	0.63 ( 0.61, 0.65 )	0.24 ( 0.23, 0.24 )
	60	0.22 ( 0.21, 0.23 )	0.44 ( 0.42, 0.45 )	0.54 ( 0.53, 0.56 )	0.56 ( 0.54, 0.58 )	0.22 ( 0.22, 0.23 )
	70	0.26 ( 0.25, 0.27 )	0.38 ( 0.37, 0.40 )	- ( - , - )	0.40 ( 0.39, 0.42 )	0.18 ( 0.17, 0.18 )
80	0.19 ( 0.18, 0.20 )	- ( - , - )	- ( - , - )	0.22 ( 0.21, 0.24 )	0.12 ( 0.12, 0.13 )	
White	0	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.61 ( 0.59, 0.63 )	0.21 ( 0.21, 0.22 )
	10	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.62 ( 0.60, 0.63 )	0.22 ( 0.21, 0.22 )
	20	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.03 ( 0.03, 0.03 )	0.62 ( 0.60, 0.64 )	0.22 ( 0.21, 0.22 )
	30	0.00 ( 0.00, 0.00 )	0.03 ( 0.03, 0.03 )	0.13 ( 0.13, 0.14 )	0.63 ( 0.61, 0.65 )	0.22 ( 0.22, 0.23 )
	40	0.03 ( 0.03, 0.03 )	0.13 ( 0.12, 0.14 )	0.33 ( 0.31, 0.34 )	0.63 ( 0.61, 0.65 )	0.22 ( 0.22, 0.23 )
	50	0.11 ( 0.10, 0.11 )	0.31 ( 0.30, 0.32 )	0.51 ( 0.49, 0.53 )	0.63 ( 0.61, 0.65 )	0.22 ( 0.22, 0.23 )
	60	0.22 ( 0.21, 0.23 )	0.44 ( 0.42, 0.45 )	0.54 ( 0.52, 0.56 )	0.56 ( 0.54, 0.58 )	0.21 ( 0.21, 0.22 )
	70	0.26 ( 0.24, 0.27 )	0.38 ( 0.37, 0.40 )	- ( - , - )	0.41 ( 0.39, 0.42 )	0.17 ( 0.16, 0.17 )
80	0.19 ( 0.18, 0.21 )	- ( - , - )	- ( - , - )	0.23 ( 0.21, 0.24 )	0.11 ( 0.11, 0.12 )	
Black	0	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.78 ( 0.73, 0.84 )	0.37 ( 0.36, 0.39 )
	10	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.01 ( 0.00, 0.01 )	0.80 ( 0.75, 0.87 )	0.38 ( 0.37, 0.41 )
	20	0.00 ( 0.00, 0.00 )	0.01 ( 0.00, 0.01 )	0.06 ( 0.05, 0.07 )	0.81 ( 0.76, 0.88 )	0.39 ( 0.37, 0.41 )
	30	0.01 ( 0.00, 0.01 )	0.06 ( 0.05, 0.07 )	0.25 ( 0.23, 0.27 )	0.83 ( 0.77, 0.90 )	0.40 ( 0.38, 0.42 )
	40	0.05 ( 0.05, 0.06 )	0.25 ( 0.23, 0.28 )	0.56 ( 0.51, 0.60 )	0.85 ( 0.79, 0.92 )	0.41 ( 0.39, 0.43 )
	50	0.21 ( 0.19, 0.23 )	0.54 ( 0.49, 0.59 )	0.78 ( 0.72, 0.84 )	0.85 ( 0.79, 0.93 )	0.42 ( 0.40, 0.44 )
	60	0.38 ( 0.34, 0.42 )	0.66 ( 0.60, 0.72 )	0.74 ( 0.68, 0.81 )	0.75 ( 0.68, 0.82 )	0.39 ( 0.37, 0.42 )
	70	0.37 ( 0.32, 0.43 )	0.48 ( 0.42, 0.55 )	- ( - , - )	0.49 ( 0.43, 0.57 )	0.30 ( 0.28, 0.33 )
80	0.20 ( 0.15, 0.26 )	- ( - , - )	- ( - , - )	0.22 ( 0.16, 0.30 )	0.22 ( 0.19, 0.25 )	

Devcan Version 7.0.0, April 2008, National Cancer Institute (<http://srab.cancer.gov/devcan/>).

Source: Incidence data are from the SEER 17 areas (San Francisco, Connecticut, Detroit, Hawaii, Iowa, New Mexico, Seattle, Utah, Atlanta, San Jose-Monterey, Los Angeles, Alaska Native Registry, Rural Georgia, California excluding SF/SJM/LA, Kentucky, Louisiana and New Jersey). Mortality data are from the NCHS public use data file for the total US.

- Statistic could not be calculated.

A percent or confidence interval value of 0.00 represents a value that is below 0.005.

Table XII-9 - continued  
 LARYNX CANCER (Invasive)

Risk of Being Diagnosed With Cancer in 10, 20 and 30 Years, Lifetime Risk of Being Diagnosed with Cancer, and  
 Lifetime Risk of Dying from Cancer Given Cancer Free At Current Age  
 Males, 2003-2005 By Race/Ethnicity

Race/ Ethnicity	Current Age	Risk of Being Diagnosed with Cancer				Risk of Dying from Cancer	
		+10 yrs Percent ( 95% C.I. )	+20 yrs Percent ( 95% C.I. )	+30 yrs Percent ( 95% C.I. )	Eventually Percent ( 95% C.I. )	Eventually Percent ( 95% C.I. )	
Asian/ Pacific Islander	0	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.36 ( 0.30, 0.44 )	0.13 ( 0.09, 0.20 )	
	10	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.01 )	0.36 ( 0.30, 0.45 )	0.13 ( 0.09, 0.20 )	
	20	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.01 ( 0.01, 0.02 )	0.36 ( 0.30, 0.45 )	0.13 ( 0.09, 0.20 )	
	30	0.00 ( 0.00, 0.00 )	0.01 ( 0.01, 0.01 )	0.04 ( 0.03, 0.05 )	0.37 ( 0.30, 0.45 )	0.13 ( 0.09, 0.20 )	
	40	0.01 ( 0.01, 0.01 )	0.04 ( 0.03, 0.05 )	0.12 ( 0.10, 0.15 )	0.37 ( 0.31, 0.45 )	0.14 ( 0.09, 0.20 )	
	50	0.03 ( 0.03, 0.04 )	0.12 ( 0.10, 0.14 )	0.23 ( 0.19, 0.26 )	0.37 ( 0.30, 0.45 )	0.14 ( 0.09, 0.20 )	
	60	0.09 ( 0.07, 0.11 )	0.20 ( 0.17, 0.24 )	0.29 ( 0.25, 0.35 )	0.35 ( 0.28, 0.44 )	0.13 ( 0.09, 0.20 )	
	70	0.13 ( 0.10, 0.16 )	0.23 ( 0.18, 0.28 )	- ( - , - )	0.29 ( 0.22, 0.38 )	0.13 ( 0.08, 0.21 )	
	80	0.13 ( 0.09, 0.18 )	- ( - , - )	- ( - , - )	0.21 ( 0.14, 0.33 )	0.13 ( 0.07, 0.22 )	
American Indian/ Alaska Native <sup>a</sup>	0	0.00 ( 0.00, 0.05 )	0.00 ( 0.00, 0.05 )	0.00 ( 0.00, 0.05 )	0.24 ( 0.12, 0.88 )	0.17 ( 0.11, 0.37 )	
	10	0.00 ( 0.00, 0.02 )	0.00 ( 0.00, 0.02 )	0.00 ( 0.00, 0.03 )	0.24 ( 0.12, 0.90 )	0.17 ( 0.11, 0.38 )	
	20	0.00 ( 0.00, 0.02 )	0.00 ( 0.00, 0.03 )	0.01 ( 0.00, 0.04 )	0.24 ( 0.13, 0.91 )	0.18 ( 0.11, 0.38 )	
	30	0.00 ( 0.00, 0.03 )	0.01 ( 0.00, 0.04 )	0.06 ( 0.02, 0.13 )	0.25 ( 0.13, 0.93 )	0.18 ( 0.11, 0.39 )	
	40	0.01 ( 0.00, 0.04 )	0.06 ( 0.02, 0.14 )	0.12 ( 0.06, 0.22 )	0.26 ( 0.13, 0.96 )	0.19 ( 0.12, 0.41 )	
	50	0.06 ( 0.02, 0.13 )	0.11 ( 0.05, 0.22 )	0.26 ( 0.13, 0.47 )	0.26 ( 0.13, 1.01 )	0.20 ( 0.13, 0.43 )	
	60	0.06 ( 0.02, 0.16 )	0.22 ( 0.10, 0.44 )	0.22 ( 0.10, 0.51 )	0.22 ( 0.10, 1.05 )	0.19 ( 0.11, 0.45 )	
	70	0.19 ( 0.07, 0.43 )	0.20 ( 0.07, 0.51 )	- ( - , - )	0.20 ( 0.07, 1.19 )	0.16 ( 0.08, 0.48 )	
	80	0.01 ( 0.00, 0.39 )	- ( - , - )	- ( - , - )	0.01 ( 0.00, 1.53 )	0.09 ( 0.02, 0.59 )	
Hispanic <sup>b</sup>	0	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.55 ( 0.49, 0.63 )	0.25 ( 0.22, 0.29 )	
	10	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.56 ( 0.50, 0.64 )	0.25 ( 0.22, 0.29 )	
	20	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.02 ( 0.01, 0.02 )	0.56 ( 0.50, 0.64 )	0.25 ( 0.22, 0.29 )	
	30	0.00 ( 0.00, 0.00 )	0.02 ( 0.01, 0.02 )	0.09 ( 0.07, 0.10 )	0.57 ( 0.51, 0.65 )	0.26 ( 0.23, 0.30 )	
	40	0.02 ( 0.01, 0.02 )	0.09 ( 0.07, 0.10 )	0.25 ( 0.22, 0.28 )	0.57 ( 0.51, 0.66 )	0.26 ( 0.23, 0.30 )	
	50	0.07 ( 0.06, 0.08 )	0.24 ( 0.21, 0.27 )	0.43 ( 0.39, 0.48 )	0.57 ( 0.51, 0.66 )	0.26 ( 0.23, 0.31 )	
	60	0.18 ( 0.15, 0.20 )	0.38 ( 0.34, 0.43 )	0.50 ( 0.44, 0.56 )	0.53 ( 0.47, 0.63 )	0.26 ( 0.22, 0.30 )	
	70	0.24 ( 0.20, 0.28 )	0.37 ( 0.32, 0.43 )	- ( - , - )	0.41 ( 0.34, 0.51 )	0.23 ( 0.19, 0.28 )	
	80	0.19 ( 0.14, 0.25 )	- ( - , - )	- ( - , - )	0.24 ( 0.17, 0.37 )	0.18 ( 0.13, 0.25 )	

Devcan Version 7.0.0, April 2008, National Cancer Institute (<http://srab.cancer.gov/devcan/>).

Source: Incidence data are from the SEER 17 areas (San Francisco, Connecticut, Detroit, Hawaii, Iowa, New Mexico, Seattle, Utah, Atlanta, San Jose-Monterey, Los Angeles, Alaska Native Registry, Rural Georgia, California excluding SF/SJM/LA, Kentucky, Louisiana and New Jersey). Mortality data are from the NCHS public use data file for the total US.

<sup>a</sup> Underlying incidence and mortality data for American Indian/Alaska Native are based on the CHSDA (Contract Health Service Delivery Area) counties.

<sup>b</sup> Hispanic is not mutually exclusive from whites, blacks, Asian/Pacific Islanders, and American Indians/Alaska Natives. Underlying incidence data for Hispanics are based on NHIA and exclude cases from the Alaska Native Registry and Kentucky. Underlying mortality data for Hispanics exclude deaths from Minnesota, New Hampshire and North Dakota.

- Statistic could not be calculated.

A percent or confidence interval value of 0.00 represents a value that is below 0.005.

Table XII-9 - continued

## LARYNX CANCER (Invasive)

Risk of Being Diagnosed With Cancer in 10, 20 and 30 Years, Lifetime Risk of Being Diagnosed with Cancer, and  
Lifetime Risk of Dying from Cancer Given Cancer Free At Current Age  
Females, 2003-2005 By Race/Ethnicity

Race/ Ethnicity	Current Age	Risk of Being Diagnosed with Cancer				Risk of Dying from Cancer	
		+10 yrs Percent ( 95% C.I. )	+20 yrs Percent ( 95% C.I. )	+30 yrs Percent ( 95% C.I. )	Eventually Percent ( 95% C.I. )	Eventually Percent ( 95% C.I. )	
All Races	0	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.14 ( 0.13, 0.15 )	0.05 ( 0.05, 0.06 )	
	10	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.14 ( 0.14, 0.15 )	0.06 ( 0.05, 0.06 )	
	20	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.01 ( 0.01, 0.01 )	0.14 ( 0.14, 0.15 )	0.06 ( 0.05, 0.06 )	
	30	0.00 ( 0.00, 0.00 )	0.01 ( 0.01, 0.01 )	0.03 ( 0.03, 0.04 )	0.14 ( 0.14, 0.15 )	0.06 ( 0.05, 0.06 )	
	40	0.01 ( 0.01, 0.01 )	0.03 ( 0.03, 0.03 )	0.08 ( 0.07, 0.08 )	0.14 ( 0.14, 0.15 )	0.06 ( 0.05, 0.06 )	
	50	0.02 ( 0.02, 0.03 )	0.07 ( 0.07, 0.08 )	0.11 ( 0.11, 0.12 )	0.14 ( 0.13, 0.15 )	0.06 ( 0.05, 0.06 )	
	60	0.05 ( 0.05, 0.05 )	0.10 ( 0.09, 0.10 )	0.12 ( 0.11, 0.12 )	0.12 ( 0.11, 0.13 )	0.05 ( 0.05, 0.05 )	
	70	0.05 ( 0.05, 0.06 )	0.07 ( 0.07, 0.08 )	- ( - , - )	0.08 ( 0.07, 0.08 )	0.04 ( 0.04, 0.04 )	
80	0.03 ( 0.03, 0.04 )	- ( - , - )	- ( - , - )	0.04 ( 0.03, 0.04 )	0.02 ( 0.02, 0.02 )		
White	0	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.15 ( 0.14, 0.16 )	0.05 ( 0.05, 0.06 )	
	10	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.15 ( 0.14, 0.16 )	0.05 ( 0.05, 0.06 )	
	20	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.01 ( 0.01, 0.01 )	0.15 ( 0.14, 0.16 )	0.05 ( 0.05, 0.06 )	
	30	0.00 ( 0.00, 0.00 )	0.01 ( 0.01, 0.01 )	0.03 ( 0.03, 0.04 )	0.15 ( 0.14, 0.16 )	0.05 ( 0.05, 0.06 )	
	40	0.01 ( 0.01, 0.01 )	0.03 ( 0.03, 0.04 )	0.08 ( 0.07, 0.09 )	0.15 ( 0.14, 0.16 )	0.06 ( 0.05, 0.06 )	
	50	0.02 ( 0.02, 0.03 )	0.07 ( 0.07, 0.08 )	0.12 ( 0.11, 0.13 )	0.14 ( 0.13, 0.15 )	0.05 ( 0.05, 0.06 )	
	60	0.05 ( 0.05, 0.06 )	0.10 ( 0.09, 0.11 )	0.12 ( 0.11, 0.13 )	0.12 ( 0.11, 0.13 )	0.05 ( 0.05, 0.05 )	
	70	0.05 ( 0.05, 0.06 )	0.08 ( 0.07, 0.08 )	- ( - , - )	0.08 ( 0.07, 0.09 )	0.04 ( 0.04, 0.04 )	
80	0.03 ( 0.03, 0.04 )	- ( - , - )	- ( - , - )	0.04 ( 0.03, 0.04 )	0.02 ( 0.02, 0.02 )		
Black	0	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.18 ( 0.16, 0.21 )	0.07 ( 0.07, 0.08 )	
	10	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.01 )	0.19 ( 0.16, 0.22 )	0.07 ( 0.07, 0.08 )	
	20	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.01 )	0.02 ( 0.01, 0.02 )	0.19 ( 0.16, 0.22 )	0.07 ( 0.07, 0.08 )	
	30	0.00 ( 0.00, 0.00 )	0.02 ( 0.01, 0.02 )	0.05 ( 0.04, 0.06 )	0.19 ( 0.16, 0.22 )	0.08 ( 0.07, 0.08 )	
	40	0.01 ( 0.01, 0.02 )	0.05 ( 0.04, 0.06 )	0.12 ( 0.10, 0.14 )	0.19 ( 0.16, 0.22 )	0.08 ( 0.07, 0.09 )	
	50	0.04 ( 0.03, 0.05 )	0.11 ( 0.09, 0.13 )	0.17 ( 0.14, 0.20 )	0.18 ( 0.16, 0.22 )	0.07 ( 0.07, 0.08 )	
	60	0.08 ( 0.06, 0.09 )	0.14 ( 0.12, 0.17 )	0.16 ( 0.13, 0.19 )	0.16 ( 0.13, 0.19 )	0.07 ( 0.06, 0.08 )	
	70	0.08 ( 0.06, 0.10 )	0.10 ( 0.07, 0.12 )	- ( - , - )	0.10 ( 0.08, 0.13 )	0.05 ( 0.04, 0.06 )	
80	0.03 ( 0.02, 0.05 )	- ( - , - )	- ( - , - )	0.03 ( 0.02, 0.05 )	0.03 ( 0.02, 0.04 )		

Devcan Version 7.0.0, April 2008, National Cancer Institute (<http://srab.cancer.gov/devcan/>).

Source: Incidence data are from the SEER 17 areas (San Francisco, Connecticut, Detroit, Hawaii, Iowa, New Mexico, Seattle, Utah, Atlanta, San Jose-Monterey, Los Angeles, Alaska Native Registry, Rural Georgia, California excluding SF/SJM/LA, Kentucky, Louisiana and New Jersey). Mortality data are from the NCHS public use data file for the total US.

- Statistic could not be calculated.

A percent or confidence interval value of 0.00 represents a value that is below 0.005.

Table XII-9 - continued

## LARYNX CANCER (Invasive)

Risk of Being Diagnosed With Cancer in 10, 20 and 30 Years, Lifetime Risk of Being Diagnosed with Cancer, and  
Lifetime Risk of Dying from Cancer Given Cancer Free At Current Age  
Females, 2003-2005 By Race/Ethnicity

Race/ Ethnicity	Current Age	Risk of Being Diagnosed with Cancer				Risk of Dying from Cancer	
		+10 yrs Percent ( 95% C.I. )	+20 yrs Percent ( 95% C.I. )	+30 yrs Percent ( 95% C.I. )	Eventually Percent ( 95% C.I. )	Eventually Percent ( 95% C.I. )	
Asian/ Pacific Islander	0	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.04 ( 0.03, 0.09 )	0.02 ( 0.01, 0.06 )	
	10	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.05 ( 0.03, 0.10 )	0.02 ( 0.01, 0.06 )	
	20	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.05 ( 0.03, 0.10 )	0.02 ( 0.01, 0.06 )	
	30	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.01 ( 0.00, 0.01 )	0.05 ( 0.03, 0.10 )	0.02 ( 0.01, 0.06 )	
	40	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.01 )	0.02 ( 0.01, 0.03 )	0.05 ( 0.03, 0.10 )	0.02 ( 0.01, 0.06 )	
	50	0.00 ( 0.00, 0.01 )	0.02 ( 0.01, 0.03 )	0.03 ( 0.02, 0.04 )	0.04 ( 0.03, 0.10 )	0.02 ( 0.01, 0.06 )	
	60	0.01 ( 0.01, 0.02 )	0.02 ( 0.01, 0.04 )	0.04 ( 0.02, 0.06 )	0.04 ( 0.03, 0.09 )	0.02 ( 0.01, 0.06 )	
	70	0.01 ( 0.01, 0.02 )	0.03 ( 0.01, 0.05 )	- ( - , - )	0.03 ( 0.02, 0.09 )	0.02 ( 0.01, 0.06 )	
	80	0.02 ( 0.01, 0.04 )	- ( - , - )	- ( - , - )	0.02 ( 0.01, 0.09 )	0.02 ( 0.00, 0.07 )	
American Indian/ Alaska Native <sup>a</sup>	0	0.00 ( 0.00, 0.05 )	0.00 ( 0.00, 0.05 )	0.00 ( 0.00, 0.05 )	0.05 ( 0.01, 0.57 )	0.03 ( 0.01, 0.17 )	
	10	0.00 ( 0.00, 0.02 )	0.00 ( 0.00, 0.02 )	0.00 ( 0.00, 0.03 )	0.05 ( 0.01, 0.57 )	0.03 ( 0.01, 0.17 )	
	20	0.00 ( 0.00, 0.02 )	0.00 ( 0.00, 0.03 )	0.01 ( 0.00, 0.04 )	0.05 ( 0.01, 0.58 )	0.03 ( 0.01, 0.18 )	
	30	0.00 ( 0.00, 0.03 )	0.01 ( 0.00, 0.04 )	0.01 ( 0.00, 0.05 )	0.05 ( 0.01, 0.58 )	0.03 ( 0.01, 0.18 )	
	40	0.01 ( 0.00, 0.04 )	0.01 ( 0.00, 0.05 )	0.03 ( 0.00, 0.11 )	0.05 ( 0.01, 0.59 )	0.03 ( 0.01, 0.18 )	
	50	0.00 ( 0.00, 0.04 )	0.02 ( 0.00, 0.10 )	0.05 ( 0.01, 0.17 )	0.05 ( 0.01, 0.61 )	0.03 ( 0.01, 0.19 )	
	60	0.02 ( 0.00, 0.11 )	0.05 ( 0.01, 0.18 )	0.05 ( 0.01, 0.22 )	0.05 ( 0.01, 0.64 )	0.03 ( 0.01, 0.19 )	
	70	0.03 ( 0.00, 0.16 )	0.03 ( 0.00, 0.21 )	- ( - , - )	0.03 ( 0.00, 0.71 )	0.02 ( 0.00, 0.21 )	
	80	0.00 ( 0.00, 0.23 )	- ( - , - )	- ( - , - )	0.00 ( 0.00, 0.92 )	0.02 ( 0.00, 0.29 )	
Hispanic <sup>b</sup>	0	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.09 ( 0.07, 0.12 )	0.02 ( 0.02, 0.04 )	
	10	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.09 ( 0.07, 0.12 )	0.02 ( 0.02, 0.04 )	
	20	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.01 )	0.09 ( 0.07, 0.12 )	0.02 ( 0.02, 0.04 )	
	30	0.00 ( 0.00, 0.00 )	0.00 ( 0.00, 0.01 )	0.01 ( 0.01, 0.02 )	0.09 ( 0.07, 0.12 )	0.02 ( 0.02, 0.04 )	
	40	0.00 ( 0.00, 0.01 )	0.01 ( 0.01, 0.02 )	0.04 ( 0.03, 0.05 )	0.09 ( 0.07, 0.12 )	0.02 ( 0.02, 0.04 )	
	50	0.01 ( 0.01, 0.02 )	0.03 ( 0.02, 0.04 )	0.06 ( 0.05, 0.08 )	0.08 ( 0.06, 0.12 )	0.03 ( 0.02, 0.04 )	
	60	0.02 ( 0.01, 0.03 )	0.05 ( 0.04, 0.07 )	0.07 ( 0.05, 0.10 )	0.08 ( 0.06, 0.12 )	0.02 ( 0.02, 0.04 )	
	70	0.03 ( 0.02, 0.05 )	0.05 ( 0.04, 0.08 )	- ( - , - )	0.06 ( 0.04, 0.10 )	0.02 ( 0.01, 0.04 )	
	80	0.03 ( 0.01, 0.05 )	- ( - , - )	- ( - , - )	0.03 ( 0.02, 0.08 )	0.02 ( 0.01, 0.04 )	

Devcan Version 7.0.0, April 2008, National Cancer Institute (<http://srab.cancer.gov/devcan/>).

Source: Incidence data are from the SEER 17 areas (San Francisco, Connecticut, Detroit, Hawaii, Iowa, New Mexico, Seattle, Utah, Atlanta, San Jose-Monterey, Los Angeles, Alaska Native Registry, Rural Georgia, California excluding SF/SJM/LA, Kentucky, Louisiana and New Jersey). Mortality data are from the NCHS public use data file for the total US.

<sup>a</sup> Underlying incidence and mortality data for American Indian/Alaska Native are based on the CHSDA (Contract Health Service Delivery Area) counties.

<sup>b</sup> Hispanic is not mutually exclusive from whites, blacks, Asian/Pacific Islanders, and American Indians/Alaska Natives. Underlying incidence data for Hispanics are based on NHIA and exclude cases from the Alaska Native Registry and Kentucky. Underlying mortality data for Hispanics exclude deaths from Minnesota, New Hampshire and North Dakota.

- Statistic could not be calculated.

A percent or confidence interval value of 0.00 represents a value that is below 0.005.

Table XII-10  
LARYNX CANCER (Invasive)

SEER INCIDENCE AND U.S. MORTALITY  
AGE-ADJUSTED RATES AND TRENDS<sup>a</sup>  
By Race/Ethnicity and Sex

SEER Incidence	Rate 2001-2005 <sup>b</sup>			Seer 13 Areas <sup>c</sup> Trend 1996-2005 AAPC (%)			SEER 9 Areas <sup>d</sup> Trend 1996-2005 AAPC (%)		
	Rate per 100,000 persons			Total	Males	Females	Total	Males	Females
	Total	Males	Females	Total	Males	Females	Total	Males	Females
RACE/ETHNICITY									
All Races	3.6	6.4	1.3	-3.1*	-3.2*	-2.9*	-2.6*	-2.8*	-2.5*
White	3.6	6.3	1.4	-2.8*	-3.1*	-2.5*	-2.6*	-2.9*	-2.3*
White Hispanic <sup>e</sup>	2.7	5.3	0.7	-2.3*	-2.4*	-	-	-	-
White Non-Hispanic <sup>e</sup>	3.6	6.2	1.4	-2.8*	-3.1*	-2.3*	-	-	-
Black	5.8	10.9	2.0	-3.6*	-3.6*	-3.6*	-2.9*	-2.8*	-2.8*
Asian/Pacific Islander	1.4	2.8	0.3	-3.1*	-2.8*	-	-	-	-
Amer Ind/Alaska Nat <sup>f</sup>	1.8	2.8	-	-	-	-	-	-	-
Hispanic <sup>e</sup>	2.6	5.1	0.6	-2.3*	-2.5*	-	-	-	-
U.S. Mortality <sup>g</sup>									
	Rate 2001-2005			Trend 1996-2005 <sup>h</sup>					
	Rate per 100,000 persons			AAPC (%)					
	Total	Males	Females	Total	Males	Females			
RACE/ETHNICITY									
All Races	1.3	2.3	0.5	-2.1*	-2.4*	-2.0*			
White	1.2	2.1	0.5	-1.9*	-2.2*	-1.6*			
White Hispanic <sup>e</sup>	1.0	2.0	0.2	-2.8*	-3.1*	-			
White Non-Hispanic <sup>e</sup>	1.2	2.2	0.5	-1.6*	-2.0*	-1.3*			
Black	2.4	4.8	0.8	-2.9*	-2.8*	-3.0*			
Asian/Pacific Islander	0.4	0.8	0.1	-3.7*	-2.9	-			
Amer Ind/Alaska Nat									
Total U.S.	1.0	1.7	0.4	-	-	-			
CHSDA Counties	1.2	2.1	-	-	-	-			
Non-CHSDA Counties	0.7	1.1	-	-	-	-			
Hispanic <sup>e</sup>	0.9	1.9	0.2	-2.8*	-3.0*	-			

The AAPC is the Average Annual Percent Change over the time interval. The AAPCs are calculated by the Joinpoint Regression Program Version 3.3, April 2008, National Cancer Institute.

Statistic not shown. Rate based on less than 16 cases for the time interval. Trend based on less than 10 cases for at least one year within the time interval.

Rates are age-adjusted to the 2000 US Std Population (19 age groups - Census P25-1130). Trends are based on rates age-adjusted to the 2000 US Std Population (19 age groups - Census P25-1130).

Incidence data used in calculating the 2001-2005 rates are from the SEER 17 areas (San Francisco, Connecticut, Detroit, Hawaii, Iowa, New Mexico, Seattle, Utah, Atlanta, San Jose-Monterey, Los Angeles, Alaska Native Registry, Rural Georgia, California excluding SF/SJM/LA, Kentucky, Louisiana and New Jersey).

The SEER 13 areas are San Francisco, Connecticut, Detroit, Hawaii, Iowa, New Mexico, Seattle, Utah, Atlanta, San Jose-Monterey, Los Angeles, Alaska Native Registry and Rural Georgia. The 1996-2005 AAPC trends are based on a Joinpoint analysis using diagnosis years 1992-2005.

The SEER 9 areas are San Francisco, Connecticut, Detroit, Hawaii, Iowa, New Mexico, Seattle, Utah, and Atlanta. The 1996-2005 AAPC trends are based on a Joinpoint analysis using diagnosis years 1975-2005.

Hispanic and Non-Hispanic are not mutually exclusive from whites, blacks, Asian/Pacific Islanders, and American Indians/Alaska Natives. Incidence data for Hispanics and Non-Hispanics are based on NHIA and exclude cases from the Alaska Native Registry and Kentucky. The 2001-2005 Hispanic and Non-Hispanic death rates exclude deaths from Minnesota, New Hampshire and North Dakota. The 1996-2005 Hispanic and Non-Hispanic mortality trends exclude deaths from Connecticut, Maine, Maryland, Minnesota, New Hampshire, New York, North Dakota, Oklahoma and Vermont.

Incidence data for American Indian/Alaska Native are based on the CHSDA(Contract Health Service Delivery Area) counties.

US Mortality Files, National Center for Health Statistics, CDC.

The 1996-2005 mortality AAPCs are based on a Joinpoint analysis using years of death 1992-2005.

The APC is significantly different from zero (p<.05).



Table XII-11  
LARYNX CANCER (Invasive)

AGE-ADJUSTED SEER INCIDENCE RATES<sup>a</sup>  
By Registry, Race and Sex

	All Races			Whites			Blacks		
	Total	Males	Females	Total	Males	Females	Total	Males	Females
<u>SEER INCIDENCE RATES<sup>a</sup>, 2001-2005</u>									
REGISTRY									
Atlanta & Rural Georgia	3.8	6.9	1.5	3.6	6.4	1.5	4.6	8.6	1.8
Atlanta	3.7	6.7	1.6	3.4	6.0	1.5	4.6	8.8	1.8
Rural Georgia	6.0	12.3	-	7.0	14.5	-	-	-	-
California	2.9	5.2	1.0	3.0	5.4	1.1	4.7	8.6	1.8
Greater Bay Area	2.6	4.7	0.9	2.7	4.8	1.0	5.2	9.3	2.3
San Francisco-Oakland	2.7	5.1	0.9	2.7	5.0	0.9	5.6	9.9	2.5
San Jose-Monterey	2.3	4.0	1.0	2.7	4.5	1.2	-	-	-
Los Angeles	2.8	5.3	0.9	2.9	5.4	0.9	4.6	8.9	1.6
Greater California	3.0	5.4	1.1	3.1	5.6	1.1	4.5	7.6	1.8
Connecticut	3.9	7.1	1.4	3.8	6.8	1.3	5.8	11.3	2.0
Detroit	4.7	8.5	1.7	4.2	7.5	1.5	7.0	13.1	2.6
Hawaii	2.7	5.2	0.6	4.9	8.7	-	-	-	-
Iowa	4.2	7.3	1.6	4.1	7.3	1.6	-	-	-
Kentucky	5.8	9.9	2.5	5.7	9.7	2.5	7.8	14.6	2.9
Louisiana	5.8	10.3	2.2	5.2	8.9	2.1	7.7	15.3	2.3
New Jersey	4.0	7.3	1.4	3.9	7.1	1.4	5.4	10.7	1.7
New Mexico	3.0	5.0	1.2	3.1	5.3	1.3	-	-	-
Seattle-Puget Sound	3.1	5.4	1.3	3.3	5.5	1.4	4.6	9.1	-
Utah	1.8	3.1	0.7	1.8	3.2	0.7	-	-	-
9 SEER Areas <sup>b</sup>	3.5	6.2	1.3	3.4	6.0	1.3	5.8	10.8	2.1
11 SEER Areas <sup>b</sup>	3.3	5.9	1.2	3.3	5.8	1.2	5.4	10.2	2.0
13 SEER Areas <sup>b</sup>	3.3	5.9	1.2	3.3	5.8	1.2	5.4	10.2	2.0
17 SEER Areas <sup>b</sup>	3.6	6.4	1.3	3.6	6.3	1.4	5.8	10.9	2.0

<sup>a</sup> Rates are per 100,000 and are age-adjusted to the 2000 US Std Population (19 age groups - Census P25-1130)

<sup>b</sup> The SEER 9 areas are San Francisco, Connecticut, Detroit, Hawaii, Iowa, New Mexico, Seattle, Utah and Atlanta.

The SEER 11 areas comprise the SEER 9 areas plus San Jose-Monterey and Los Angeles.

The SEER 13 areas comprise the SEER 11 areas plus the Alaska Native Registry and Rural Georgia.

The SEER 17 areas comprise the SEER 13 areas plus California excluding SF/SJM/LA, Kentucky, Louisiana and New Jersey.

- Statistic not shown. Rate based on less than 16 cases for the time interval.

Table XII-12  
LARYNX CANCER (Invasive)

AGE-ADJUSTED SEER DEATH RATES<sup>a</sup>  
By Registry, Race and Sex

	All Races			Whites			Blacks		
	Total	Males	Females	Total	Males	Females	Total	Males	Females
<u>SEER DEATH RATES<sup>a</sup>, 2001-2005</u>									
REGISTRY									
Atlanta & Rural Georgia	1.3	2.3	0.6	0.9	1.6	0.4	2.4	4.8	0.9
Atlanta	1.2	2.2	0.5	0.9	1.5	0.4	2.3	4.6	-
Rural Georgia	2.5	-	-	-	-	-	-	-	-
California	1.0	1.9	0.4	1.0	1.9	0.4	2.3	4.5	0.8
Greater Bay Area	0.8	1.6	0.3	0.8	1.5	0.3	2.6	4.9	-
San Francisco-Oakland	0.9	1.8	0.3	0.9	1.7	0.3	2.8	5.4	-
San Jose-Monterey	0.6	1.1	-	0.7	1.3	-	-	-	-
Los Angeles	1.2	2.3	0.4	1.2	2.3	0.3	2.3	4.5	0.9
Greater California	1.0	1.8	0.4	1.0	1.8	0.4	2.3	4.2	-
Connecticut	1.2	2.2	0.4	1.2	2.2	0.4	1.7	3.3	-
Detroit	1.5	2.8	0.6	1.3	2.2	0.6	2.6	5.2	0.8
Hawaii	0.8	1.5	-	1.4	2.7	-	-	-	-
Iowa	1.1	2.1	0.4	1.1	2.1	0.4	-	-	-
Kentucky	1.6	3.0	0.6	1.6	2.9	0.5	2.5	4.4	-
Louisiana	1.8	3.4	0.6	1.5	2.6	0.6	3.0	6.2	0.8
New Jersey	1.3	2.5	0.5	1.2	2.2	0.5	2.9	5.9	0.9
New Mexico	1.2	2.0	0.5	1.2	2.0	0.5	-	-	-
Seattle-Puget Sound	1.1	1.8	0.5	1.1	1.8	0.5	-	-	-
Utah	0.5	0.8	-	0.5	0.8	-	-	-	-
9 SEER Areas <sup>b</sup>	1.1	2.0	0.4	1.1	1.9	0.4	2.3	4.6	0.7
11 SEER Areas <sup>b</sup>	1.1	2.0	0.4	1.1	1.9	0.4	2.3	4.6	0.8
13 SEER Areas <sup>b</sup>	1.1	2.0	0.4	1.1	1.9	0.4	2.3	4.6	0.8
17 SEER Areas <sup>b</sup>	1.2	2.2	0.4	1.1	2.0	0.4	2.5	5.0	0.8
Total U.S.	1.3	2.3	0.5	1.2	2.1	0.5	2.4	4.8	0.8

<sup>a</sup> US Mortality Files, National Center for Health Statistics, Centers for Disease Control and Prevention. Rates are per 100,000 and are age-adjusted to the 2000 US Std Population (19 age groups - Census P25-1130).

<sup>b</sup> The SEER 9 areas are San Francisco, Connecticut, Detroit, Hawaii, Iowa, New Mexico, Seattle, Utah and Atlanta.

The SEER 11 areas comprise the SEER 9 areas plus San Jose-Monterey and Los Angeles.

The SEER 13 areas comprise the SEER 11 areas plus the Alaska Native Registry and Rural Georgia.

The SEER 17 areas comprise the SEER 13 areas plus California excluding SF/SJM/LA, Kentucky, Louisiana and New Jersey.

- Statistic not shown. Rate based on less than 16 cases for the time interval.

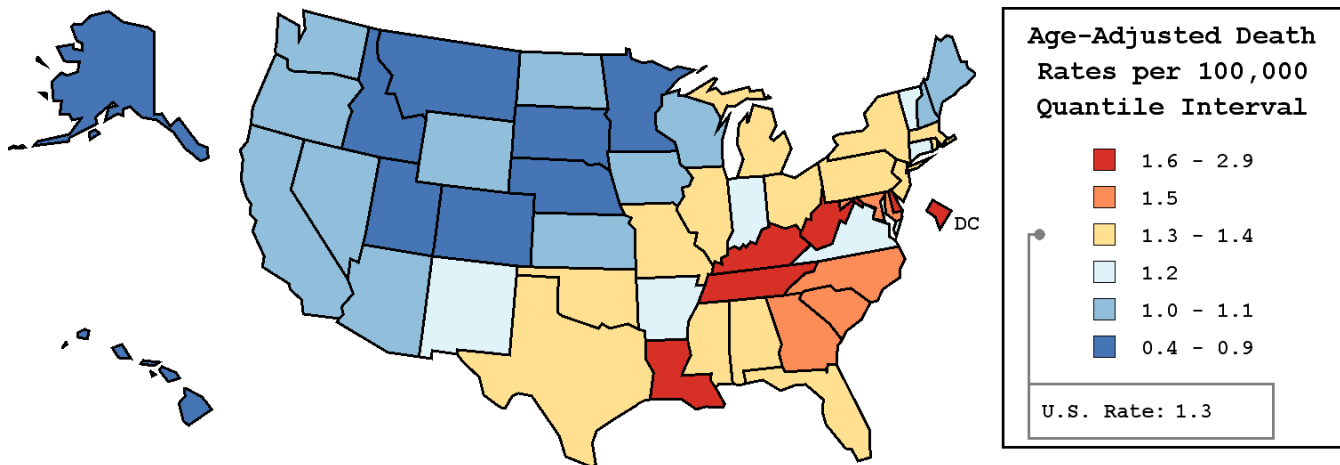
Table XII-13  
LARYNX CANCER (Invasive)

AVERAGE ANNUAL AGE-ADJUSTED CANCER DEATH<sup>a</sup> RATES BY STATE, ALL RACES, 2001-2005

Males and Females

State	Rate	SE	Rank	PD
TOTAL U.S.	1.3	0.01		
High Five States				
D.C.	2.9 <sup>b</sup>	0.32	(01)	123.1 <sup>c</sup>
West Virginia	1.9 <sup>b</sup>	0.13	(02)	46.2 <sup>c</sup>
Louisiana	1.8 <sup>b</sup>	0.09	(03)	38.5 <sup>c</sup>
Delaware	1.6	0.20	(04)	23.1 <sup>c</sup>
Kentucky	1.6 <sup>b</sup>	0.09	(05)	23.1 <sup>c</sup>
Low Five States				
Colorado	0.8 <sup>b</sup>	0.07	(47)	-38.5 <sup>c</sup>
Nebraska	0.8 <sup>b</sup>	0.09	(48)	-38.5 <sup>c</sup>
Hawaii	0.8 <sup>b</sup>	0.11	(49)	-38.5 <sup>c</sup>
Utah	0.5 <sup>b</sup>	0.08	(50)	-61.5 <sup>c</sup>
Alaska	0.4 <sup>b</sup>	0.15	(51)	-69.2 <sup>c</sup>

State	Rate	SE	Rank	PD	State	Rate	SE	Rank	PD
Alabama	1.4	0.08	(13)	7.7	Montana	0.9	0.13	(44)	-30.8 <sup>c</sup>
Alaska	0.4 <sup>b</sup>	0.15	(51)	-69.2 <sup>c</sup>	Nebraska	0.8 <sup>b</sup>	0.09	(48)	-38.5 <sup>c</sup>
Arizona	1.0 <sup>b</sup>	0.06	(42)	-23.1 <sup>c</sup>	Nevada	1.0	0.10	(40)	-23.1 <sup>c</sup>
Arkansas	1.2	0.09	(30)	-7.7	New Hampshire	1.0	0.12	(41)	-23.1 <sup>c</sup>
California	1.0 <sup>b</sup>	0.03	(38)	-23.1 <sup>c</sup>	New Jersey	1.3	0.05	(18)	0.0
Colorado	0.8 <sup>b</sup>	0.07	(47)	-38.5 <sup>c</sup>	New Mexico	1.2	0.11	(27)	-7.7
Connecticut	1.2	0.08	(28)	-7.7	New York	1.3	0.04	(19)	0.0
Delaware	1.6	0.20	(04)	23.1 <sup>c</sup>	North Carolina	1.5	0.06	(10)	15.4 <sup>c</sup>
D.C.	2.9 <sup>b</sup>	0.32	(01)	123.1 <sup>c</sup>	North Dakota	1.1	0.18	(33)	-15.4 <sup>c</sup>
Florida	1.4 <sup>b</sup>	0.04	(11)	7.7	Ohio	1.4	0.05	(12)	7.7
Georgia	1.5	0.06	(09)	15.4 <sup>c</sup>	Oklahoma	1.3	0.08	(24)	0.0
Hawaii	0.8 <sup>b</sup>	0.11	(49)	-38.5 <sup>c</sup>	Oregon	1.0	0.07	(39)	-23.1 <sup>c</sup>
Idaho	0.9	0.12	(43)	-30.8 <sup>c</sup>	Pennsylvania	1.4	0.04	(17)	7.7
Illinois	1.3	0.05	(20)	0.0	Rhode Island	1.4	0.15	(16)	7.7
Indiana	1.2	0.06	(26)	-7.7	South Carolina	1.5	0.08	(07)	15.4 <sup>c</sup>
Iowa	1.1	0.08	(31)	-15.4 <sup>c</sup>	South Dakota	0.9	0.15	(45)	-30.8 <sup>c</sup>
Kansas	1.1	0.09	(32)	-15.4 <sup>c</sup>	Tennessee	1.6 <sup>b</sup>	0.07	(06)	23.1 <sup>c</sup>
Kentucky	1.6 <sup>b</sup>	0.09	(05)	23.1 <sup>c</sup>	Texas	1.3	0.04	(21)	0.0
Louisiana	1.8 <sup>b</sup>	0.09	(03)	38.5 <sup>c</sup>	Utah	0.5 <sup>b</sup>	0.08	(50)	-61.5 <sup>c</sup>
Maine	1.1	0.12	(36)	-15.4 <sup>c</sup>	Vermont	1.2	0.18	(29)	-7.7
Maryland	1.5	0.07	(08)	15.4 <sup>c</sup>	Virginia	1.2	0.06	(25)	-7.7
Massachusetts	1.4	0.06	(15)	7.7	Washington	1.1 <sup>b</sup>	0.06	(37)	-15.4 <sup>c</sup>
Michigan	1.4	0.05	(14)	7.7	West Virginia	1.9 <sup>b</sup>	0.13	(02)	46.2 <sup>c</sup>
Minnesota	0.9 <sup>b</sup>	0.06	(46)	-30.8 <sup>c</sup>	Wisconsin	1.1	0.06	(34)	-15.4 <sup>c</sup>
Mississippi	1.3	0.09	(23)	0.0	Wyoming	1.1	0.21	(35)	-15.4 <sup>c</sup>
Missouri	1.3	0.06	(22)	0.0					



<sup>a</sup> US Mortality Files, National Center for Health Statistics, Centers for Disease Control and Prevention. Rates are per 100,000 and are age-adjusted to the 2000 US Std Population (19 age groups - Census P25-1130).  
<sup>b</sup> Difference between state rate and total U.S. rate is statistically significant ( $p \leq .0002$ ).  
<sup>c</sup> Absolute percent difference between state rate and total U.S. rate is 15% or more.  
SE Standard error of the rate.  
PD Percent difference between state rate and total U.S. rate.

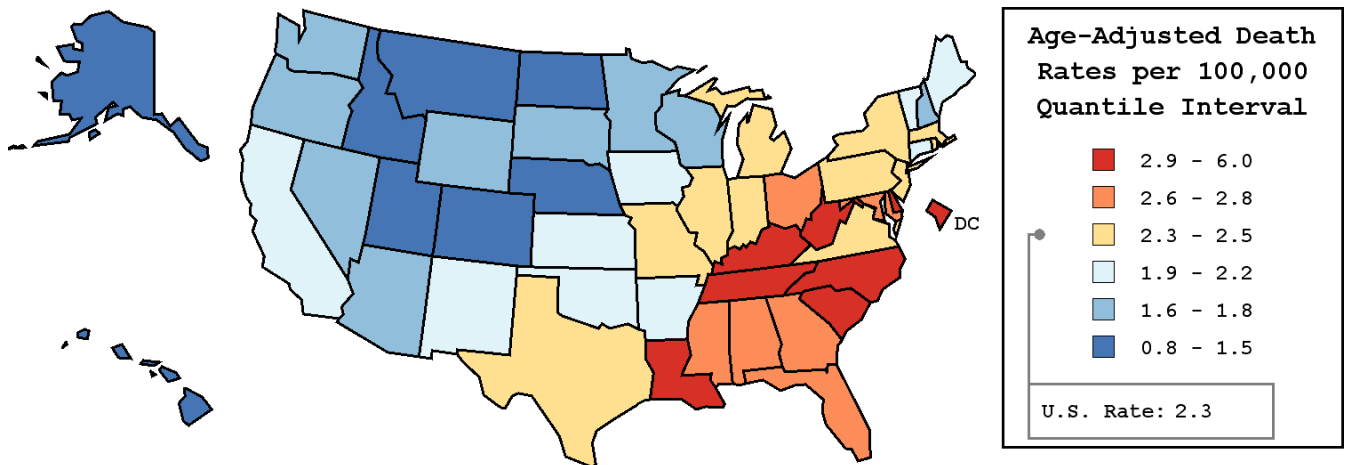
Table XII-14  
LARYNX CANCER (Invasive)

AVERAGE ANNUAL AGE-ADJUSTED CANCER DEATH<sup>a</sup> RATES BY STATE, ALL RACES, 2001-2005

Males

State	Rate	SE	Rank	PD
TOTAL U.S.	2.3	0.02		
High Five States				
D.C.	6.0 <sup>b</sup>	0.73	(01)	160.9 <sup>c</sup>
Louisiana	3.4 <sup>b</sup>	0.19	(02)	47.8 <sup>c</sup>
West Virginia	3.1	0.25	(03)	34.8 <sup>c</sup>
Kentucky	3.0 <sup>b</sup>	0.18	(04)	30.4 <sup>c</sup>
Delaware	2.9	0.39	(05)	26.1 <sup>c</sup>
Low Five States				
Hawaii	1.5 <sup>b</sup>	0.22	(47)	-34.8 <sup>c</sup>
Nebraska	1.5 <sup>b</sup>	0.19	(48)	-34.8 <sup>c</sup>
Montana	1.4 <sup>b</sup>	0.25	(49)	-39.1 <sup>c</sup>
Utah	0.8 <sup>b</sup>	0.15	(50)	-65.2 <sup>c</sup>
Alaska	0.8 <sup>b</sup>	0.32	(51)	-65.2 <sup>c</sup>

State	Rate	SE	Rank	PD	State	Rate	SE	Rank	PD
Alabama	2.6	0.16	(12)	13.0	Montana	1.4 <sup>b</sup>	0.25	(49)	-39.1 <sup>c</sup>
Alaska	0.8 <sup>b</sup>	0.32	(51)	-65.2 <sup>c</sup>	Nebraska	1.5 <sup>b</sup>	0.19	(48)	-34.8 <sup>c</sup>
Arizona	1.8 <sup>b</sup>	0.12	(38)	-21.7 <sup>c</sup>	Nevada	1.7	0.19	(40)	-26.1 <sup>c</sup>
Arkansas	2.2	0.19	(26)	-4.3	New Hampshire	1.6	0.24	(42)	-30.4 <sup>c</sup>
California	1.9 <sup>b</sup>	0.05	(33)	-17.4 <sup>c</sup>	New Jersey	2.5	0.11	(20)	8.7
Colorado	1.5 <sup>b</sup>	0.14	(45)	-34.8 <sup>c</sup>	New Mexico	2.0	0.22	(30)	-13.0
Connecticut	2.2	0.17	(28)	-4.3	New York	2.5	0.08	(18)	8.7
Delaware	2.9	0.39	(05)	26.1 <sup>c</sup>	North Carolina	2.9 <sup>b</sup>	0.13	(08)	26.1 <sup>c</sup>
D.C.	6.0 <sup>b</sup>	0.73	(01)	160.9 <sup>c</sup>	North Dakota	1.5	0.31	(46)	-34.8 <sup>c</sup>
Florida	2.6	0.07	(14)	13.0	Ohio	2.6	0.10	(13)	13.0
Georgia	2.8	0.14	(09)	21.7 <sup>c</sup>	Oklahoma	2.2	0.17	(27)	-4.3
Hawaii	1.5 <sup>b</sup>	0.22	(47)	-34.8 <sup>c</sup>	Oregon	1.7 <sup>b</sup>	0.14	(41)	-26.1 <sup>c</sup>
Idaho	1.5	0.23	(44)	-34.8 <sup>c</sup>	Pennsylvania	2.5	0.09	(15)	8.7
Illinois	2.4	0.10	(21)	4.3	Rhode Island	2.4	0.31	(22)	4.3
Indiana	2.3	0.13	(24)	0.0	South Carolina	2.9	0.18	(07)	26.1 <sup>c</sup>
Iowa	2.1	0.17	(29)	-8.7	South Dakota	1.8	0.31	(37)	-21.7 <sup>c</sup>
Kansas	2.0	0.18	(31)	-13.0	Tennessee	2.9 <sup>b</sup>	0.15	(06)	26.1 <sup>c</sup>
Kentucky	3.0 <sup>b</sup>	0.18	(04)	30.4 <sup>c</sup>	Texas	2.5	0.08	(17)	8.7
Louisiana	3.4 <sup>b</sup>	0.19	(02)	47.8 <sup>c</sup>	Utah	0.8 <sup>b</sup>	0.15	(50)	-65.2 <sup>c</sup>
Maine	1.9	0.24	(34)	-17.4 <sup>c</sup>	Vermont	2.0	0.36	(32)	-13.0
Maryland	2.8	0.16	(10)	21.7 <sup>c</sup>	Virginia	2.3	0.13	(25)	0.0
Massachusetts	2.5	0.13	(16)	8.7	Washington	1.8 <sup>b</sup>	0.12	(36)	-21.7 <sup>c</sup>
Michigan	2.5	0.11	(19)	8.7	West Virginia	3.1	0.25	(03)	34.8 <sup>c</sup>
Minnesota	1.6 <sup>b</sup>	0.12	(43)	-30.4 <sup>c</sup>	Wisconsin	1.8 <sup>b</sup>	0.12	(35)	-21.7 <sup>c</sup>
Mississippi	2.7	0.21	(11)	17.4 <sup>c</sup>	Wyoming	1.7	0.38	(39)	-26.1 <sup>c</sup>
Missouri	2.4	0.13	(23)	4.3					



<sup>a</sup> US Mortality Files, National Center for Health Statistics, Centers for Disease Control and Prevention. Rates are per 100,000 and are age-adjusted to the 2000 US Std Population (19 age groups - Census P25-1130).  
<sup>b</sup> Difference between state rate and total U.S. rate is statistically significant ( $p \leq .0002$ ).  
<sup>c</sup> Absolute percent difference between state rate and total U.S. rate is 15% or more.  
SE Standard error of the rate.  
PD Percent difference between state rate and total U.S. rate.

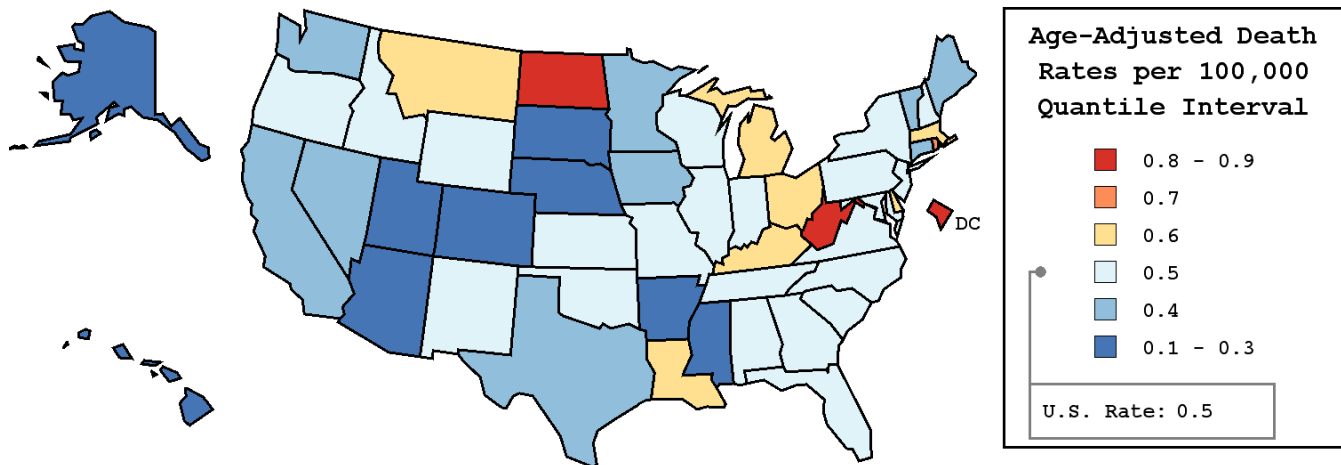
Table XII-15  
LARYNX CANCER (Invasive)

AVERAGE ANNUAL AGE-ADJUSTED CANCER DEATH<sup>a</sup> RATES BY STATE, ALL RACES, 2001-2005

Females

State	Rate	SE	Rank	PD
TOTAL U.S.	0.5	0.01		
High Five States				
West Virginia	0.9	0.12	(01)	80.0 <sup>c</sup>
North Dakota	0.8	0.21	(02)	60.0 <sup>c</sup>
D.C.	0.8	0.23	(03)	60.0 <sup>c</sup>
Rhode Island	0.7	0.14	(04)	40.0 <sup>c</sup>
Louisiana	0.6	0.07	(05)	20.0 <sup>c</sup>
Low Five States				
Mississippi	0.3	0.06	(47)	-40.0 <sup>c</sup>
Hawaii	0.2	0.08	(48)	-60.0 <sup>c</sup>
Utah	0.2 <sup>b</sup>	0.06	(49)	-60.0 <sup>c</sup>
South Dakota	0.1 <sup>b</sup>	0.07	(50)	-80.0 <sup>c</sup>
Alaska	0.1 <sup>b</sup>	0.08	(51)	-80.0 <sup>c</sup>

State	Rate	SE	Rank	PD	State	Rate	SE	Rank	PD
Alabama	0.5	0.06	(14)	0.0	Montana	0.6	0.15	(08)	20.0 <sup>c</sup>
Alaska	0.1 <sup>b</sup>	0.08	(51)	-80.0 <sup>c</sup>	Nebraska	0.3	0.08	(46)	-40.0 <sup>c</sup>
Arizona	0.3	0.05	(45)	-40.0 <sup>c</sup>	Nevada	0.4	0.09	(35)	-20.0 <sup>c</sup>
Arkansas	0.3	0.06	(43)	-40.0 <sup>c</sup>	New Hampshire	0.5	0.12	(25)	0.0
California	0.4 <sup>b</sup>	0.02	(41)	-20.0 <sup>c</sup>	New Jersey	0.5	0.05	(20)	0.0
Colorado	0.3	0.06	(44)	-40.0 <sup>c</sup>	New Mexico	0.5	0.10	(27)	0.0
Connecticut	0.4	0.06	(37)	-20.0 <sup>c</sup>	New York	0.5	0.03	(23)	0.0
Delaware	0.6	0.16	(06)	20.0 <sup>c</sup>	North Carolina	0.5	0.04	(31)	0.0
D.C.	0.8	0.23	(03)	60.0 <sup>c</sup>	North Dakota	0.8	0.21	(02)	60.0 <sup>c</sup>
Florida	0.5	0.03	(12)	0.0	Ohio	0.6	0.04	(10)	20.0 <sup>c</sup>
Georgia	0.5	0.05	(22)	0.0	Oklahoma	0.5	0.07	(19)	0.0
Hawaii	0.2	0.08	(48)	-60.0 <sup>c</sup>	Oregon	0.5	0.07	(21)	0.0
Idaho	0.5	0.12	(15)	0.0	Pennsylvania	0.5	0.04	(17)	0.0
Illinois	0.5	0.04	(24)	0.0	Rhode Island	0.7	0.14	(04)	40.0 <sup>c</sup>
Indiana	0.5	0.05	(29)	0.0	South Carolina	0.5	0.06	(32)	0.0
Iowa	0.4	0.07	(40)	-20.0 <sup>c</sup>	South Dakota	0.1 <sup>b</sup>	0.07	(50)	-80.0 <sup>c</sup>
Kansas	0.5	0.08	(28)	0.0	Tennessee	0.5	0.06	(13)	0.0
Kentucky	0.6	0.07	(11)	20.0 <sup>c</sup>	Texas	0.4	0.03	(38)	-20.0 <sup>c</sup>
Louisiana	0.6	0.07	(05)	20.0 <sup>c</sup>	Utah	0.2 <sup>b</sup>	0.06	(49)	-60.0 <sup>c</sup>
Maine	0.4	0.10	(36)	-20.0 <sup>c</sup>	Vermont	0.4	0.14	(39)	-20.0 <sup>c</sup>
Maryland	0.5	0.06	(18)	0.0	Virginia	0.5	0.05	(26)	0.0
Massachusetts	0.6	0.05	(07)	20.0 <sup>c</sup>	Washington	0.4	0.05	(34)	-20.0 <sup>c</sup>
Michigan	0.6	0.05	(09)	20.0 <sup>c</sup>	West Virginia	0.9	0.12	(01)	80.0 <sup>c</sup>
Minnesota	0.4	0.05	(42)	-20.0 <sup>c</sup>	Wisconsin	0.5	0.05	(33)	0.0
Mississippi	0.3	0.06	(47)	-40.0 <sup>c</sup>	Wyoming	0.5	0.20	(16)	0.0
Missouri	0.5	0.05	(30)	0.0					



<sup>a</sup> US Mortality Files, National Center for Health Statistics, Centers for Disease Control and Prevention. Rates are per 100,000 and are age-adjusted to the 2000 US Std Population (19 age groups - Census P25-1130).  
<sup>b</sup> Difference between state rate and total U.S. rate is statistically significant ( $p \leq .0002$ ).  
<sup>c</sup> Absolute percent difference between state rate and total U.S. rate is 15% or more.  
SE Standard error of the rate.  
PD Percent difference between state rate and total U.S. rate.

Table XII-16  
LARYNX CANCER (Invasive)

Estimated United States Cancer Prevalence Counts<sup>a</sup> on January 1, 2005  
By Race/Ethnicity, Sex and Years Since Diagnosis

Years Since Diagnosis	0 to <5	5 to <10	10 to <15	15 to <20	20 to <25	25 to <30	0 to <15 <sup>e</sup>	0 to <30 <sup>e</sup>	>=30 <sup>g</sup>	Complete <sup>h</sup>
<u>Race/Sex</u>										
All Races <sup>b</sup>	30,668	21,764	15,514	10,707	6,913	3,422	67,947	88,989	4,107	93,096
Males	24,542	17,315	12,404	8,755	5,470	2,849	54,262	71,335	3,367	74,702
Females	6,126	4,449	3,110	1,952	1,443	573	13,685	17,654	740	18,394
White <sup>b</sup>	25,720	18,695	13,416	9,297	6,282	3,079	57,830	76,488	3,323	79,811
Males	20,593	14,947	10,715	7,724	5,035	2,563	46,254	61,576	2,713	64,289
Females	5,127	3,748	2,701	1,573	1,247	516	11,576	14,912	610	15,522
Black <sup>b</sup>	4,058	2,563	1,810	1,199	527	270	8,431	10,429	283	10,712
Males	3,162	1,938	1,469	909	351	221	6,569	8,051	242	8,293
Females	896	625	341	290	176	49	1,862	2,378	41	2,419
Asian/Pacific Islander <sup>c</sup>	527	328	171	+	+	+	1,026	+	+	+
Males	465	283	148	+	+	+	896	+	+	+
Females	62	45	23	+	+	+	130	+	+	+
Hispanic <sup>d</sup>	1,449	853	619	+	+	+	2,919	+	+	+
Males	1,201	741	509	+	+	+	2,450	+	+	+
Females	248	112	110	+	+	+	469	+	+	+

Estimated prevalence percent<sup>a</sup> on January 1, 2005, of the SEER 11 population diagnosed in the previous 15 years  
By Age at Prevalence, Race/Ethnicity and Sex

Age at Prevalence	Age Specific (Crude)										Age-Adjusted <sup>f</sup>
	All Ages	0-9	10-19	20-29	30-39	40-49	50-59	60-69	70-79	80+	All Ages
<u>Race/Sex</u>											
All Races <sup>c</sup>	0.0195%	-	-	0.0002%	0.0009%	0.0066%	0.0299%	0.0834%	0.1211%	0.0890%	0.0207%
Males	0.0317%	-	-	0.0002%	0.0010%	0.0094%	0.0501%	0.1429%	0.2250%	0.2042%	0.0378%
Females	0.0076%	-	-	0.0003%	0.0008%	0.0037%	0.0107%	0.0299%	0.0415%	0.0255%	0.0074%
White <sup>c</sup>	0.0211%	-	-	0.0003%	0.0011%	0.0071%	0.0302%	0.0859%	0.1244%	0.0914%	0.0213%
Males	0.0338%	-	-	-	0.0011%	0.0100%	0.0501%	0.1455%	0.2265%	0.2098%	0.0383%
Females	0.0084%	-	-	0.0004%	0.0010%	0.0042%	0.0108%	0.0309%	0.0445%	0.0269%	0.0078%
Black <sup>c</sup>	0.0209%	-	-	-	0.0010%	0.0077%	0.0499%	0.1261%	0.1655%	0.0917%	0.0290%
Males	0.0346%	-	-	-	-	0.0110%	0.0859%	0.2232%	0.3418%	0.2290%	0.0555%
Females	0.0086%	-	-	-	-	0.0048%	0.0200%	0.0501%	0.0488%	0.0255%	0.0105%
Asian/Pacific Islander <sup>c</sup>	0.0090%	-	-	-	-	0.0023%	0.0102%	0.0340%	0.0664%	0.0676%	0.0102%
Males	0.0163%	-	-	-	-	0.0044%	0.0192%	0.0654%	0.1346%	0.1484%	0.0206%
Females	0.0022%	-	-	-	-	-	0.0023%	0.0077%	0.0169%	0.0139%	0.0023%
Hispanic <sup>d</sup>	0.0068%	-	-	0.0003%	0.0008%	0.0039%	0.0148%	0.0532%	0.0920%	0.0658%	0.0140%
Males	0.0110%	-	-	-	0.0009%	0.0051%	0.0258%	0.1036%	0.1858%	0.1487%	0.0275%
Females	0.0023%	-	-	-	-	0.0026%	0.0045%	0.0110%	0.0243%	0.0180%	0.0039%

<sup>a</sup> US 2005 cancer prevalence counts are based on 2005 cancer prevalence proportions from the SEER registries and 1/1/2005 US population estimates based on the average of 2004 and 2005 population estimates from the US Bureau of the Census. Prevalence was calculated using the First Malignant Primary Only for a person.

<sup>b c d</sup> Statistics based on (b) SEER 9 Areas (c) SEER 11 Areas and Rural Georgia (d) NHIA for Hispanic for SEER 11 Areas and Rural Georgia.

<sup>e</sup> Maximum limited-duration prevalence: 30 years for 1975-2005 SEER 9 data; 15 years for 1990-2005 SEER 11 data (used to calculate prevalence for Hispanics and Asian Pacific Islanders).

<sup>f</sup> Percentages are age-adjusted to the 2000 US Standard Population (19 age groups - Census P25-1130) by 5-year age groups.

<sup>g h</sup> (g) Cases diagnosed more than 30 years ago were estimated using the completeness index method (Capocaccia et. al. 1997, Merrill et. al. 2000). (h) Complete prevalence is obtained by summing 0 to <30 and >=30.

- Statistic not shown. Statistic based on fewer than 5 cases estimated alive in SEER for the time interval.

+ Not available.

# SEER Incidence, Delay Adjusted Incidence and US Death Rates<sup>a</sup> Larynx Cancer, by Race and Sex

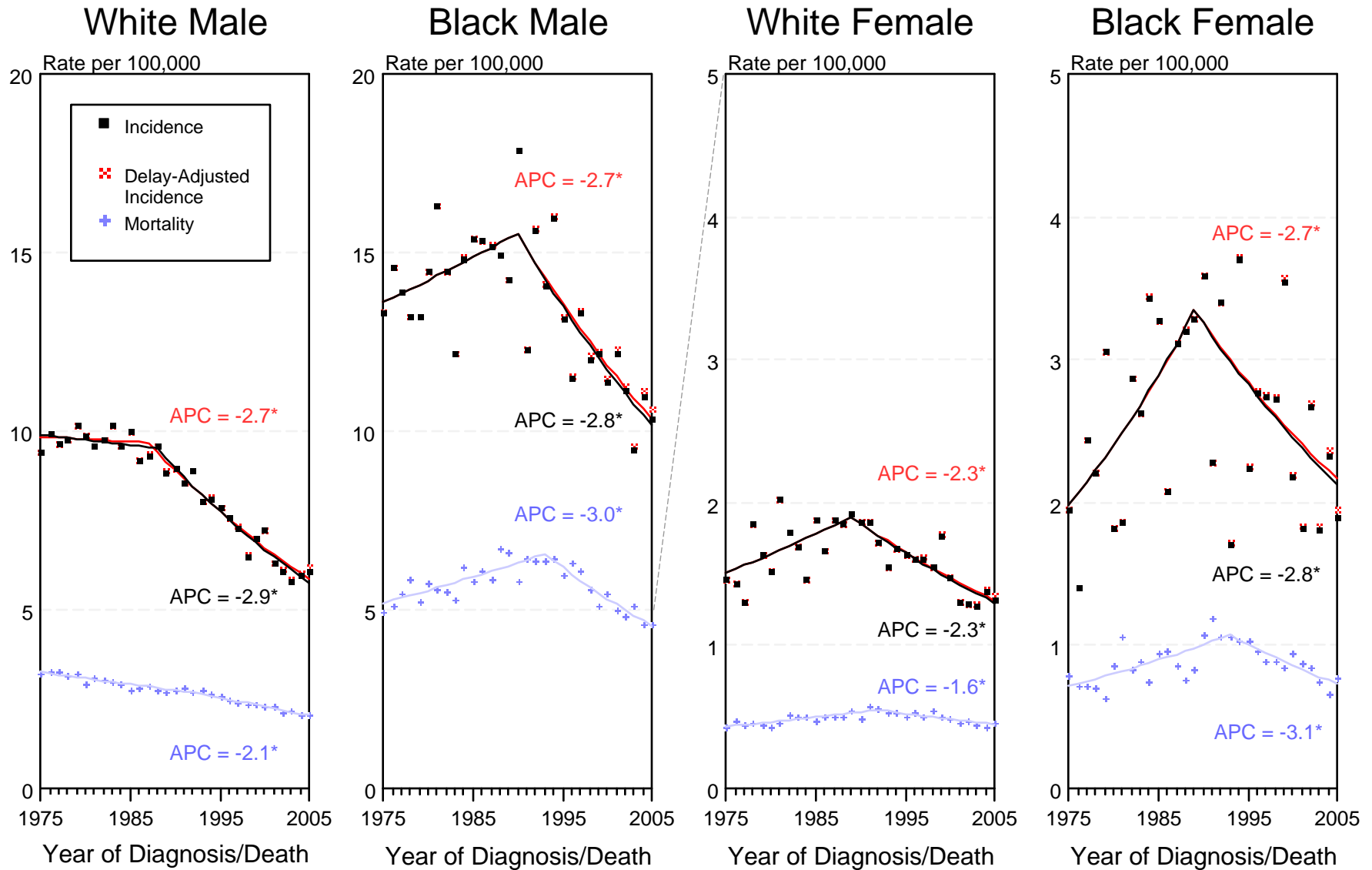


Figure XII-1

- <sup>a</sup> Source: SEER 9 areas and US Mortality Files (National Center for Health Statistics, CDC). Rates are age-adjusted to the 2000 US Std Population (19 age groups - Census P25-1103). Regression lines and APCs are calculated using the Joinpoint Regression Program Version 3.3.1, April 2008, National Cancer Institute. The APC is the Annual Percent Change for the regression line segments. The APC shown on the graph is for the most recent trend.
- \* The APC is significantly different from zero (p < 0.05).

# SEER Incidence and US Death Rates<sup>a</sup> Larynx Cancer, Both Sexes

Joinpoint Analyses for Whites and Blacks from 1975-2005

and for Asian/Pacific Islanders, American Indians/Alaska Natives and Hispanics from 1992-2005

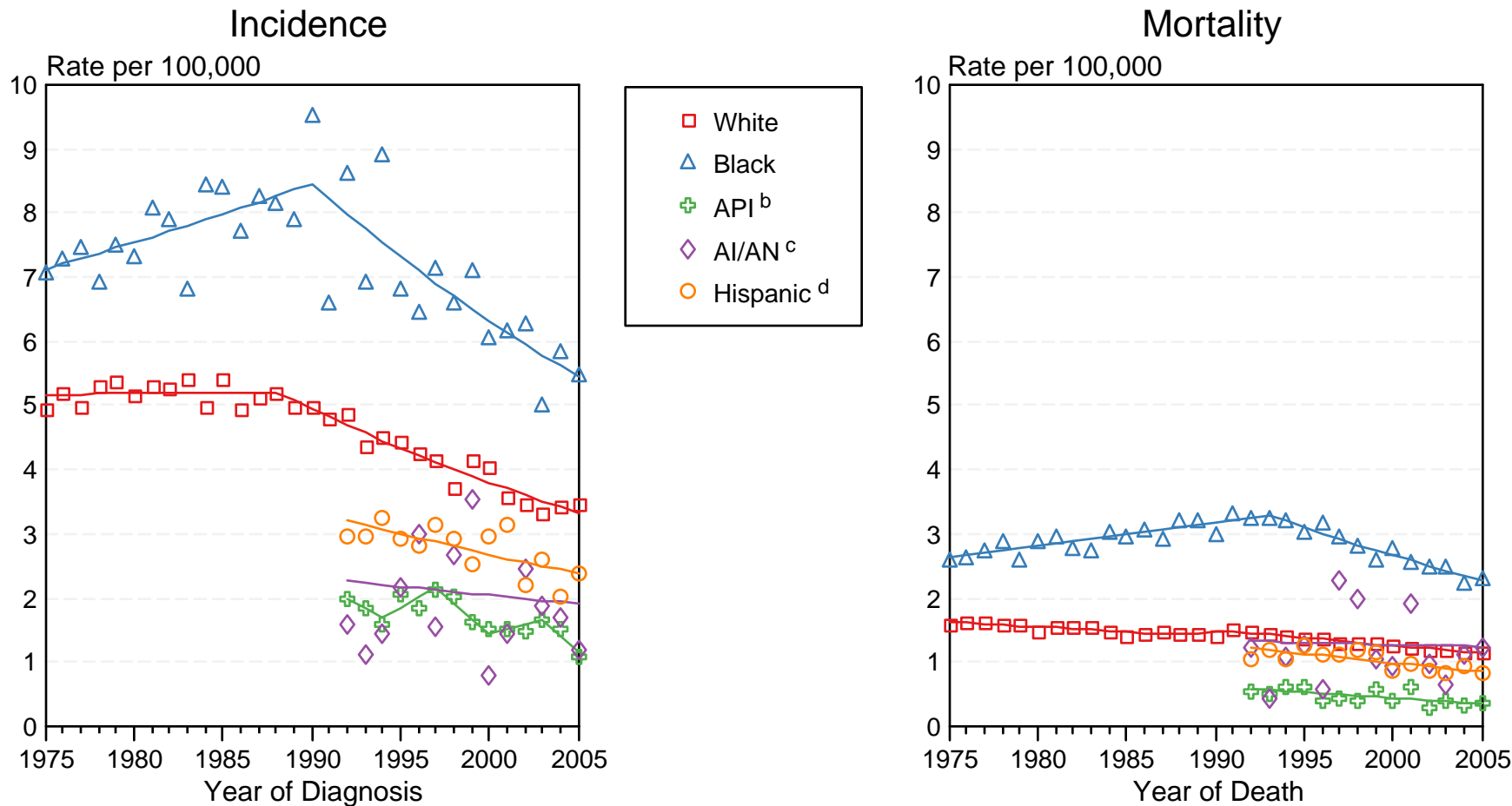


Figure XII-2

Source: Incidence data for whites and blacks are from the SEER 9 areas (San Francisco, Connecticut, Detroit, Hawaii, Iowa, New Mexico, Seattle, Utah, Atlanta). Incidence data for Asian/Pacific Islanders, American Indians/Alaska Natives and Hispanics are from the SEER 13 Areas (SEER 9 Areas, San Jose-Monterey, Los Angeles, Alaska Native Registry and Rural Georgia). Mortality data are from US Mortality Files, National Center for Health Statistics, CDC.

<sup>a</sup> Rates are age-adjusted to the 2000 US Std Population (19 age groups - Census P25-1103). Regression lines are calculated using the Joinpoint Regression Program Version 3.3.1, April 2008, National Cancer Institute. Joinpoint analyses for Whites and Blacks during the 1975-2005 period allow a maximum of 4 joinpoints. Analyses for other ethnic groups during the period 1992-2005 allow a maximum of 3 joinpoints.

<sup>b</sup> API = Asian/Pacific Islander.

<sup>c</sup> AI/AN = American Indian/Alaska Native. Rates for American Indian/Alaska Native are based on the CHSDA(Contract Health Service Delivery Area) counties.

<sup>d</sup> Hispanic is not mutually exclusive from whites, blacks, Asian/Pacific Islanders, and American Indians/Alaska Natives. Incidence data for Hispanics are based on NHIA and exclude cases from the Alaska Native Registry. Mortality data for Hispanics exclude cases from Connecticut, Maine, Maryland, Minnesota, New Hampshire, New York, North Dakota, Oklahoma, and Vermont.