

Table XVIII-1  
NON-HODGKIN'S LYMPHOMAS

## TRENDS IN SEER INCIDENCE AND U.S. MORTALITY, BY RACE AND SEX

	All Races			Whites			Blacks		
	Total	Males	Females	Total	Males	Females	Total	Males	Females
<u>INCIDENCE TRENDS (expressed in percents)§:</u>									
<u>1973-93</u>									
All Ages									
Percent Change (PC)	76.1	85.8	62.5	75.9	84.4	62.6	76.8	90.3	61.3
Est. Annual PC (EAPC)	3.3★	3.7★	2.7★	3.3★	3.7★	2.7★	3.9★	4.1★	3.7★
Under 65									
Percent Change (PC)	80.2	100.0	54.3	76.2	95.8	49.3	175.2	202.4	139.5
Est. Annual PC (EAPC)	3.4★	4.2★	2.3★	3.4★	4.1★	2.2★	5.1★	5.7★	4.3★
65 and over									
Percent Change (PC)	71.7	71.1	71.2	75.5	72.5	76.6	-2.4	-1.7	1.9
Est. Annual PC (EAPC)	3.1★	3.2★	3.0★	3.2★	3.3★	3.1★	2.4★	1.9★	3.1★
<u>1975-79 - ALL AGES</u>									
Percent Change (PC)	8.4	8.9	7.6	7.9	8.1	7.7	25.0	36.9	12.9
Est. Annual PC (EAPC)	2.7★	2.5	3.0	2.5	2.1	2.9	7.5	10.4	4.8
<u>1989-93 - ALL AGES</u>									
Percent Change (PC)	3.9	4.0	3.6	2.1	1.8	2.0	7.7	18.1	-5.2
Est. Annual PC (EAPC)	1.6	1.6	1.5	0.9	0.8	0.9	3.1	6.2	-1.1
<u>MORTALITY TRENDS (expressed in percents)δ:</u>									
<u>1973-93</u>									
All Ages									
Percent Change (PC)	36.3	37.6	35.5	36.8	38.0	35.6	42.9	37.7	53.8
Est. Annual PC (EAPC)	1.9★	2.0★	1.8★	1.9★	2.0★	1.8★	2.2★	2.2★	2.4★
Under 65									
Percent Change (PC)	11.0	16.0	3.2	10.5	16.0	1.9	35.2	32.0	42.0
Est. Annual PC (EAPC)	0.8★	1.1★	0.3★	0.8★	1.1★	0.2★	1.7★	1.9★	1.5★
65 and over									
Percent Change (PC)	58.3	56.4	61.4	59.3	56.8	62.6	52.0	44.6	66.2
Est. Annual PC (EAPC)	2.8★	2.7★	2.8★	2.8★	2.7★	2.8★	2.8★	2.6★	3.2★
<u>1975-79 - ALL AGES</u>									
Percent Change (PC)	3.9	5.3	2.8	4.0	5.4	3.0	2.3	3.7	1.1
Est. Annual PC (EAPC)	1.2★	1.5	1.0	1.3★	1.6	1.0	0.1	0.0	0.2
<u>1989-93 - ALL AGES</u>									
Percent Change (PC)	4.9	3.5	6.5	5.1	3.5	6.8	5.1	3.2	7.4
Est. Annual PC (EAPC)	1.5★	1.1	2.0	1.5★	1.1	2.0	1.7	1.1★	2.3

The Est. Annual PC is the Estimated Annual Percent Change (EAPC) over the time interval.

§ SEER Program.

δ NCHS public use tape.

★ The EAPC is significantly different from zero ( $p < .05$ ).

◆ The EAPC for 1989-93 is significantly different from the EAPC for 1975-79 ( $p < .05$ ).

◇ The EAPC for 1989-93 is significantly different from the EAPC for 1975-79 ( $p < .10$ ).

- Statistic could not be calculated.

Table XVIII-2  
NON-HODGKIN'S LYMPHOMAS

## SEER INCIDENCE 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>AGE-ADJUSTED RATES</u>									
YEAR OF DIAGNOSIS:									
1973	8.5	10.0	7.4	8.8	10.4	7.5	6.9	8.6	5.5
1974	8.9	10.4	7.7	9.2	10.7	8.0	5.9	7.5	4.6
1975	9.3	11.0	8.0	9.8	11.4	8.4	5.6	7.0	4.2
1976	9.5	10.7	8.5	9.8	11.0	8.9	5.3	6.5	4.4
1977	9.3	10.8	8.2	9.7	11.3	8.5	5.6	6.2	5.1
1978	10.0	11.8	8.4	10.4	12.3	8.9	6.2	8.3	4.3
1979	10.4	11.8	9.3	10.8	12.0	9.7	7.4	10.1	5.4
1980	10.5	12.4	8.9	10.8	12.6	9.2	7.4	9.3	6.0
1981	11.2	13.2	9.7	11.6	13.5	10.1	6.4	9.1	4.3
1982	11.2	13.0	9.6	11.7	13.7	10.0	8.5	8.7	8.1
1983	11.6	13.8	9.8	12.1	14.5	10.2	8.8	9.7	7.9
1984	12.6	15.1	10.6	13.2	15.6	11.2	8.3	11.2	5.9
1985	12.9	15.2	10.9	13.5	15.9	11.4	8.3	10.0	7.1
1986	13.1	15.9	10.7	13.8	16.8	11.2	8.8	10.8	7.0
1987	13.9	17.3	11.0	14.7	18.4	11.5	8.8	9.3	8.1
1988	14.2	17.4	11.6	14.9	18.2	12.2	9.9	13.5	7.2
1989	14.3	17.6	11.4	15.1	18.6	12.0	9.6	11.7	7.9
1990	15.3	18.8	12.2	15.9	19.5	12.8	11.4	14.2	9.2
1991	15.5	19.6	11.9	16.1	20.3	12.4	11.8	15.8	8.5
1992	15.2	18.8	12.2	15.8	19.3	12.7	11.4	15.4	8.4
1993	15.4	19.0	12.3	15.8	19.5	12.6	11.2	15.2	7.9
<u>AGE-ADJUSTED RATES, 1989-93</u>									
AGE AT DIAGNOSIS:									
All ages	15.1	18.8	12.0	15.7	19.4	12.5	11.1	14.5	8.4
Under 65	8.9	11.5	6.4	9.2	11.9	6.6	8.0	11.1	5.3
65 and over	71.8	84.9	63.2	75.0	88.7	66.0	39.7	45.4	36.6
All ages (world std.) <sup>λ</sup>	12.6	15.8	9.7	13.0	16.3	10.1	9.7	12.9	7.1
<u>AGE-SPECIFIC RATES, 1989-93</u>									
AGE AT DIAGNOSIS:									
0-4	0.6	0.8	0.4	0.6	0.7	0.4	0.5	0.6	0.3
5-9	0.8	1.1	0.4	0.8	1.2	0.4	0.4	0.7	0.0
10-14	1.1	1.5	0.6	1.1	1.6	0.6	0.9	1.3	0.6
15-19	1.5	1.9	1.1	1.7	2.1	1.1	0.7	1.1	0.4
20-24	2.3	2.8	1.8	2.3	2.9	1.8	3.0	3.2	2.7
25-29	4.9	6.9	3.0	4.9	6.8	2.9	5.6	8.0	3.6
30-34	7.1	11.3	3.0	7.3	11.5	3.1	7.5	12.9	2.7
35-39	10.1	15.7	4.5	10.3	16.1	4.6	11.5	19.5	4.7
40-44	12.5	17.6	7.5	12.9	18.0	7.8	13.3	19.9	7.6
45-49	17.3	23.6	11.1	17.8	23.9	11.6	17.1	27.3	8.1
50-54	23.4	29.4	17.6	24.2	30.2	18.4	21.1	27.3	15.8
55-59	30.5	36.6	24.9	31.9	37.9	26.2	22.3	30.3	15.8
60-64	39.4	44.1	35.3	40.9	45.7	36.4	29.8	31.2	28.8
65-69	54.7	62.4	48.4	57.7	65.6	51.0	28.6	29.2	28.2
70-74	71.5	84.0	61.9	74.1	87.2	64.1	50.4	49.9	50.7
75-79	85.9	101.1	75.7	89.9	106.1	79.2	43.3	54.4	36.5
80-84	91.6	108.5	82.3	95.4	112.6	86.3	40.0	57.9	30.6
85+	86.3	115.4	75.0	89.1	120.0	77.6	42.5	62.7	33.8

§ SEER Program. Rates are per 100,000 and are age-adjusted to the 1970 U.S. standard population, except where noted.

λ SEER Program. Rates are per 100,000 and are age-adjusted to the world standard population.

Table XVIII-3  
NON-HODGKIN'S LYMPHOMASU.S. MORTALITY RATES, AGE-ADJUSTED AND AGE-SPECIFIC RATES<sup>δ</sup>, BY RACE AND SEX

	All Races			Whites			Blacks		
	Total	Males	Females	Total	Males	Females	Total	Males	Females
<u>AGE-ADJUSTED RATES</u>									
YEAR OF DEATH:									
1973	4.7	5.8	3.9	4.9	6.0	4.1	3.2	4.3	2.3
1974	4.8	5.9	4.0	5.0	6.1	4.1	3.3	4.4	2.4
1975	4.7	5.7	3.8	4.8	5.9	3.9	3.2	4.2	2.5
1976	4.7	5.7	3.9	4.9	5.9	4.1	3.0	3.9	2.3
1977	4.8	5.7	4.0	4.9	5.9	4.1	3.3	4.2	2.6
1978	4.9	6.0	4.0	5.0	6.2	4.2	3.3	4.5	2.4
1979	4.9	6.0	4.0	5.1	6.3	4.1	3.1	3.9	2.5
1980	5.1	6.1	4.2	5.3	6.3	4.4	3.3	4.3	2.5
1981	5.0	6.0	4.2	5.2	6.2	4.4	3.3	4.1	2.7
1982	5.3	6.4	4.4	5.5	6.7	4.6	3.4	4.4	2.7
1983	5.4	6.6	4.5	5.6	6.8	4.7	3.6	4.8	2.7
1984	5.4	6.5	4.6	5.7	6.8	4.8	3.5	4.4	2.8
1985	7.0	7.0	4.6	5.9	7.3	4.8	3.8	4.7	3.1
1986	5.9	7.2	4.8	6.1	7.4	5.0	4.1	5.5	3.0
1987	5.8	7.0	4.8	6.0	7.3	5.0	3.9	5.1	3.0
1988	6.0	7.4	4.9	6.2	7.6	5.1	4.1	5.5	3.0
1989	6.2	7.7	5.1	6.4	7.9	5.3	4.4	5.8	3.3
1990	6.2	7.9	5.0	6.5	8.2	5.2	4.4	5.9	3.4
1991	6.5	8.0	5.3	6.7	8.3	5.5	4.7	5.9	3.7
1992	6.5	8.1	5.3	6.8	8.4	5.5	4.6	5.9	3.6
1993	6.5	8.0	5.4	6.8	8.2	5.6	4.7	6.1	3.6
<u>AGE-ADJUSTED RATES, 1989-93</u>									
AGE AT DEATH:									
All ages	6.4	8.0	5.2	6.6	8.2	5.4	4.6	5.9	3.5
Under 65	2.7	3.5	2.0	2.8	3.6	2.0	2.6	3.5	1.8
65 and over	40.0	48.3	34.6	41.8	50.4	36.3	22.8	28.2	19.5
All ages (world std.) <sup>φ</sup>	4.9	6.2	3.9	5.1	6.3	4.1	3.7	4.9	2.8
<u>AGE-SPECIFIC RATES, 1989-93</u>									
AGE AT DEATH:									
0-4	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1
5-9	0.2	0.3	0.1	0.2	0.3	0.1	0.1	0.2	0.1
10-14	0.2	0.3	0.1	0.2	0.4	0.1	0.2	0.2	0.1
15-19	0.4	0.5	0.3	0.4	0.5	0.3	0.4	0.5	0.2
20-24	0.6	0.8	0.4	0.6	0.7	0.4	0.7	1.1	0.4
25-29	0.9	1.3	0.6	0.9	1.3	0.6	1.2	1.7	0.7
30-34	1.4	2.1	0.8	1.4	2.0	0.7	2.0	3.1	1.1
35-39	2.1	3.0	1.2	2.1	3.0	1.1	2.7	4.0	1.5
40-44	2.9	4.0	1.8	2.8	4.0	1.7	3.6	5.0	2.5
45-49	4.7	6.3	3.2	4.8	6.3	3.3	4.8	7.1	3.0
50-54	6.9	8.9	5.0	7.1	9.1	5.1	6.7	9.3	4.6
55-59	10.9	13.7	8.4	11.3	14.2	8.6	9.5	11.7	7.7
60-64	16.7	20.3	13.5	17.4	21.0	14.2	12.1	15.7	9.3
65-69	24.8	29.4	21.0	25.8	30.5	22.0	16.9	21.8	13.4
70-74	36.2	42.8	31.2	37.9	44.6	32.8	20.5	24.0	18.2
75-79	48.5	58.3	42.1	50.6	60.7	44.0	27.7	33.5	24.3
80-84	62.6	76.7	55.1	65.4	80.2	57.6	32.2	40.1	28.0
85+	68.0	87.8	60.4	71.3	92.2	63.4	31.0	41.0	26.8

<sup>δ</sup> NCHS public use tape. Rates are per 100,000 and are age-adjusted to the 1970 U.S. standard population, except where noted.

<sup>φ</sup> NCHS public use tape. Rates are per 100,000 and are age-adjusted to the world standard population.

Table XVIII-4  
NON-HODGKIN'S LYMPHOMAS

## SURVIVAL RATES, BY RACE, SEX, DIAGNOSIS YEAR 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:									
1960-63 <sup>a</sup>	-	-	-	31	31	31	-	-	-
1970-73 <sup>a</sup>	-	-	-	41	39	43	-	-	-
1974-76 <sup>b</sup>	47.0	46.8	47.2	47.4	47.6	47.2	48.4	43.4↑	54.7↑
1977-79 <sup>b</sup>	48.3	45.8	50.8	48.5	46.3	50.7	51.1	44.7	59.3↑
1980-82 <sup>b</sup>	51.3	50.1	52.6	51.8	50.8	52.8	50.5	47.9	53.6
1983-85 <sup>b</sup>	54.0	53.1	55.0	54.6	53.9	55.4	44.9	43.6	46.6
1986-92 <sup>b</sup>	51.3Ω	47.6	55.9Ω	52.1Ω	48.6	56.6Ω	43.8	38.8	50.7
<u>5-YR RELATIVE SURVIVAL RATES, 1986-92<sup>b</sup></u>									
AGE AT DIAGNOSIS:									
<45	50.1	42.2	69.5	51.4	43.2	71.9	39.9	35.5	50.2
45-54	60.3	55.3	68.9	61.4	57.0	69.0	48.6	38.3↑	67.6↑
55-64	58.3	54.9	62.3	58.7	55.3	63.0	57.9	54.2↑	61.7↑
65-74	50.7	47.4	53.9	51.7	48.1	55.3	36.7	31.7↑	40.3↑
75+	38.7	39.4	38.3	39.4	40.5	38.7	42.4↑	44.3↑	37.8↑
Under 65	55.4	49.2	66.1	56.5	50.3	67.1	46.1	39.6	58.1
65 and over	45.9	44.6	46.8	46.7	45.5	47.6	38.4	36.4↑	39.4

<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 Program. They are based on data from population-based registries in Connecticut, New Mexico, Utah, Iowa, Hawaii, Atlanta, Detroit, Seattle-Puget Sound and San Francisco-Oakland. Rates are based on follow-up of patients through 1993.

Ω The difference in rates between 1974-76 and 1986-92 is statistically significant ( $p < .05$ ).

↑ The standard error of the survival rate is between 5 and 10 percentage points.

↑↑ The standard error of the survival rate is greater than 10 percentage points.

- Statistic could not be calculated.

Table XVIII-5  
NON-HODGKIN'S LYMPHOMAS

INCIDENCE, MORTALITY, AND SURVIVAL RATES

By Year of Diagnosis/Death

All Races, Males and Females

Year of Diagnosis/Death

	1973	1974	1975	1976	1977	1978	1979	1980	1981	1982	1983	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993
Incidence																					
SEER	8.5	8.9	9.3	9.5	9.3	10.0	10.4	10.5	11.2	11.2	11.6	12.6	12.9	13.1	13.9	14.2	14.3	15.3	15.5	15.2	15.4
Mortality																					
U.S.	4.7	4.8	4.7	4.7	4.8	4.9	4.9	5.1	5.0	5.3	5.4	5.4	5.7	5.9	5.8	6.0	6.2	6.2	6.5	6.5	6.5
SEER	4.8	5.0	4.7	4.8	4.9	5.1	5.1	5.3	5.2	5.5	5.5	5.6	6.0	6.3	5.9	5.9	6.2	6.3	6.5	6.6	6.3
Relative Survival Rates (SEER)																					
1-year	65.8	68.9	69.1	72.5	70.6	72.6	70.7	72.5	74.7	72.4	76.2	74.1	72.8	71.0	73.2	72.1	71.2	70.8	70.0	70.7	
2-year	55.3	58.0	58.5	62.1	59.5	62.0	62.0	62.6	65.1	63.3	67.0	65.2	64.3	62.5	64.3	63.3	63.1	61.6	60.8		
3-year	49.5	53.8	54.6	57.3	53.4	56.1	55.9	57.2	59.7	58.5	61.3	60.8	60.1	58.5	59.6	59.6	57.8	57.0			
4-year	45.4	48.7	50.7	52.8	49.8	52.0	52.7	54.7	54.8	55.4	57.1	57.2	56.6	54.7	56.6	55.5	54.2				
5-year	42.5	45.0	47.2	48.6	47.2	48.8	48.8	50.6	51.7	51.7	53.7	54.4	54.0	51.4	53.3	52.6					
6-year	40.4	41.4	42.9	46.3	44.4	46.1	45.7	48.4	48.8	48.6	50.2	51.7	51.8	48.6	50.4						
7-year	37.3	38.3	40.5	43.6	42.3	43.2	43.6	46.2	46.7	46.1	47.9	49.6	48.9	46.8							
8-year	35.5	36.8	38.7	41.8	39.9	40.6	42.2	44.1	45.2	45.1	46.2	46.6	46.9								
9-year	33.9	34.7	37.3	39.8	37.6	38.5	41.5	41.9	42.5	44.1	44.7	44.9									
10-year	33.2	33.1	36.0	38.3	36.6	37.6	40.6	40.3	41.0	42.7	43.2										
11-year	33.1	31.7	34.2	37.0	35.8	36.8	39.2	39.4	39.9	41.2											
12-year	31.7	31.3	33.6	35.8	35.5	35.6	38.2	38.1	38.8												
13-year	30.4	30.1	32.8	35.8	34.5	35.6	37.3	36.8													
14-year	28.9	28.9	31.8	34.4	33.9	35.1	35.8														
15-year	28.2	27.3	31.2	32.5	32.6	33.7															
16-year	27.5	26.8	30.3	31.5	31.9																
17-year	26.5	26.2	30.3	31.1																	
18-year	26.2	26.2	30.3																		
19-year	25.8	25.9																			
20-year	25.2																				

Note: Incidence and mortality rates are per 100,000 and are age-adjusted to the 1970 U.S. standard population.

Survival rates are relative rates expressed as percents.

Table XVIII-6  
NON-HODGKIN'S LYMPHOMAS

INCIDENCE, MORTALITY, AND SURVIVAL RATES

By Year of Diagnosis/Death

All Races, Males

Year of Diagnosis/Death

	1973	1974	1975	1976	1977	1978	1979	1980	1981	1982	1983	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993
Incidence																					
SEER	10.0	10.4	11.0	10.7	10.8	11.8	11.8	12.4	13.2	13.0	13.8	15.1	15.2	15.9	17.3	17.4	17.6	18.8	19.6	18.8	19.0
Mortality																					
U.S.	5.8	5.9	5.7	5.7	5.7	6.0	6.0	6.1	6.0	6.4	6.6	6.5	7.0	7.2	7.0	7.4	7.7	7.9	8.0	8.1	8.0
SEER	5.9	6.2	5.9	5.5	5.9	6.3	6.5	6.2	6.3	6.8	6.5	6.6	7.6	7.8	7.4	7.3	7.7	8.0	7.9	8.3	7.6
Relative Survival Rates (SEER)																					
1-year	62.9	67.6	68.6	71.4	69.3	72.9	69.5	72.9	73.6	71.9	76.3	73.6	71.7	70.1	70.1	69.1	68.5	66.5	66.7	68.0	
2-year	52.9	57.1	61.0	60.7	57.5	61.0	60.4	62.8	65.0	63.2	68.0	64.4	63.2	61.6	61.6	60.7	59.4	57.4	57.0		
3-year	47.5	53.1	56.0	55.7	50.3	55.5	54.1	56.8	59.8	58.0	61.9	59.5	58.6	57.4	57.2	56.2	54.1	52.4			
4-year	44.9	48.7	52.1	51.1	47.3	51.3	50.3	54.0	53.9	54.4	57.7	56.0	54.2	52.9	53.9	51.9	50.2				
5-year	41.5	44.0	48.4	47.7	43.7	47.2	46.4	49.0	50.2	51.1	54.6	53.9	51.2	49.7	51.0	49.1					
6-year	38.4	40.1	44.4	45.5	41.6	44.9	43.3	46.7	47.5	47.5	51.0	50.8	48.6	46.5	48.3						
7-year	34.6	38.3	42.1	42.5	39.8	42.5	41.0	44.8	46.0	44.4	48.3	48.7	45.8	44.5							
8-year	33.1	36.4	41.0	40.6	37.6	40.3	39.6	42.9	44.5	44.1	46.7	45.3	43.9								
9-year	31.7	33.7	39.7	37.5	35.3	38.0	38.8	40.1	42.3	43.3	45.3	43.7									
10-year	30.9	32.0	38.4	35.5	33.8	37.7	38.3	38.3	41.2	41.0	43.3										
11-year	30.7	30.3	36.7	34.1	33.5	37.1	37.4	36.3	39.7	40.0											
12-year	29.6	29.8	36.0	33.2	33.2	36.1	36.9	35.5	39.0												
13-year	28.9	28.9	34.7	32.9	32.0	36.1	35.5	35.1													
14-year	26.6	28.2	33.6	31.2	31.4	36.1	33.8														
15-year	25.6	27.2	32.7	28.8	30.0	34.6															
16-year	24.4	26.4	31.6	27.9	29.1																
17-year	23.0	26.4	31.6	27.0																	
18-year	22.8	26.4	31.6																		
19-year	22.8	26.4																			
20-year	21.6																				

Note: Incidence and mortality rates are per 100,000 and are age-adjusted to the 1970 U.S. standard population.

Survival rates are relative rates expressed as percents.

Table XVIII-7  
NON-HODGKIN'S LYMPHOMAS

INCIDENCE, MORTALITY, AND SURVIVAL RATES

By Year of Diagnosis/Death

All Races, Females

Year of Diagnosis/Death

	1973	1974	1975	1976	1977	1978	1979	1980	1981	1982	1983	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993
Incidence																					
SEER	7.4	7.7	8.0	8.5	8.2	8.4	9.3	8.9	9.7	9.6	9.8	10.6	10.9	10.7	11.0	11.6	11.4	12.2	11.9	12.2	12.3
Mortality																					
U.S.	3.9	4.0	3.8	3.9	4.0	4.0	4.0	4.2	4.2	4.4	4.5	4.6	4.6	4.8	4.8	4.9	5.1	5.0	5.3	5.3	5.4
SEER	3.9	4.2	3.7	4.3	4.2	4.3	4.1	4.7	4.4	4.5	4.7	4.8	4.8	5.0	4.9	4.7	5.1	4.9	5.3	5.3	5.3
Relative Survival Rates (SEER)																					
1-year	68.8	70.4	69.6	73.6	72.0	72.2	71.8	72.1	75.9	72.9	76.2	74.7	73.9	72.0	77.0	75.6	74.6	76.0	74.4	74.0	
2-year	57.8	59.0	55.7	63.6	61.5	63.0	63.6	62.3	65.1	63.4	66.1	66.1	65.5	63.7	67.6	66.3	67.6	66.7	65.9		
3-year	51.5	54.6	52.9	58.8	56.5	56.7	57.7	57.7	59.6	59.0	60.6	62.3	61.8	59.8	62.6	63.6	62.4	62.7			
4-year	45.8	48.7	49.1	54.6	52.5	52.8	55.1	55.4	55.8	56.4	56.4	58.6	59.2	56.9	59.8	59.8	59.2				
5-year	43.5	46.0	45.9	49.4	50.9	50.4	51.1	52.3	53.2	52.3	52.8	54.9	57.1	53.5	56.2	56.9					
6-year	42.4	42.8	41.3	47.0	47.3	47.3	47.9	50.3	50.1	49.6	49.5	52.6	55.4	51.1	53.1						
7-year	40.0	38.3	38.6	44.7	44.8	44.0	46.0	47.7	47.5	47.8	47.5	50.6	52.4	49.4							
8-year	38.0	37.2	36.1	42.9	42.3	40.8	44.7	45.4	46.0	46.1	45.6	48.0	50.2								
9-year	36.0	35.7	34.5	42.0	39.8	39.1	44.0	43.7	42.6	45.0	44.2	46.1									
10-year	35.5	34.3	33.4	41.0	39.5	37.5	42.7	42.3	40.7	44.3	43.1										
11-year	35.4	33.2	31.5	39.7	38.2	36.5	40.9	42.3	40.2	42.5											
12-year	33.8	32.9	30.9	38.2	37.8	35.1	39.4	41.0	38.7												
13-year	31.8	31.4	30.8	38.2	37.0	34.9	39.0	38.6													
14-year	31.0	29.5	29.8	37.3	36.5	34.1	37.6														
15-year	30.7	27.5	29.5	36.0	35.2	32.8															
16-year	30.3	27.2	29.0	34.8	34.7																
17-year	29.8	25.9	29.0	34.8																	
18-year	29.3	25.9	29.0																		
19-year	28.2	25.1																			
20-year	28.2																				

Note: Incidence and mortality rates are per 100,000 and are age-adjusted to the 1970 U.S. standard population.

Survival rates are relative rates expressed as percents.

Table XVIII-8

NON-HODGKIN'S LYMPHOMASNUMBER OF CASES

By SEER Location and Year of Diagnosis, 1973-93

All Races, Males, All Ages

## Year of Diagnosis

SEER Location	1973-79	1980	1981	1982	1983	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993
All Areas <sup>⊕</sup>	6795	1202	1297	1298	1397	1554	1604	1710	1905	1941	2020	2200	2337	2287	2359
All Areas Excluding SF-Oakland SMSA	5534	1001	1084	1086	1173	1271	1314	1331	1480	1516	1548	1684	1796	1766	1839
San Francisco-Oakland SMSA	1261	201	213	212	224	283	290	379	425	425	472	516	541	521	520
San Francisco City/County	336	49	46	59	63	105	106	139	187	175	216	245	224	221	195

AGE-ADJUSTED CANCER INCIDENCE RATES§

By SEER Location and Year of Diagnosis, 1973-93

All Races, Males, All Ages

## Year of Diagnosis

SEER Location	1973-79	1980	1981	1982	1983	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993
All Areas <sup>⊕</sup>	11.0	12.4	13.2	13.0	13.8	15.1	15.2	15.9	17.3	17.4	17.6	18.8	19.6	18.8	19.0
All Areas Excluding SF-Oakland SMSA	10.7	12.3	13.1	13.0	13.9	14.8	15.0	14.9	16.2	16.5	16.4	17.3	18.2	17.6	17.8
San Francisco-Oakland SMSA	12.1	12.7	13.4	13.2	13.5	16.4	16.0	20.8	22.5	21.6	23.5	26.1	26.3	25.3	25.0
San Francisco City/County	12.2	12.2	11.7	14.0	14.8	24.7	22.5	30.9	40.2	36.0	45.1	53.4	45.6	46.5	40.3

§ SEER Program. Rates are per 100,000 males and are age-adjusted to the 1970 U.S. standard population. Each rate has been age-adjusted by 5-year age groups.

⊕ All Areas refers to all SEER data collection areas. The San Francisco-Oakland SMSA represents 15% of all persons in the SEER areas. For this age group, all SEER areas may not be generalizable to the United States for Non-Hodgkin's Lymphoma.

Table XVIII-9

NON-HODGKIN'S LYMPHOMASNUMBER OF CASES

By SEER Location and Year of Diagnosis, 1973-93

All Races, Males, Ages 0-19

## Year of Diagnosis

SEER Location	1973-79	1980	1981	1982	1983	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993
All Areas <sup>⊕</sup>	299	38	51	49	58	48	41	43	49	42	44	46	55	45	41
All Areas Excluding SF-Oakland SMSA	253	35	45	41	52	43	37	36	43	40	38	38	49	40	31
San Francisco-Oakland SMSA	46	<4	6	8	6	5	4	7	6	<4	6	8	6	5	10
San Francisco City/County	12	<4	<4	0	<4	<4	0	<4	0	0	0	<4	<4	0	<4

AGE-ADJUSTED CANCER INCIDENCE RATES<sup>§</sup>

By SEER Location and Year of Diagnosis, 1973-93

All Races, Males, Ages 0-19

## Year of Diagnosis

SEER Location	1973-79	1980	1981	1982	1983	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993
All Areas <sup>⊕</sup>	1.2	1.1	1.5	1.5	1.7	1.5	1.3	1.3	1.5	1.3	1.3	1.4	1.6	1.3	1.2
All Areas Excluding SF-Oakland SMSA	1.2	1.2	1.5	1.4	1.8	1.5	1.3	1.2	1.5	1.4	1.3	1.3	1.7	1.3	1.0
San Francisco-Oakland SMSA	1.4	-	1.4	1.8	1.5	1.2	0.9	1.6	1.4	-	1.4	1.8	1.2	1.1	2.1
San Francisco City/County	2.1	-	-	0.0	-	-	0.0	-	0.0	0.0	0.0	-	-	0.0	-

§ SEER Program. Rates are per 100,000 males aged 0-19 and are age-adjusted to the 1970 U.S. standard population. Each rate has been age-adjusted by 5-year age groups.

⊕ All Areas refers to all SEER data collection areas. The San Francisco-Oakland SMSA represents 15% of all persons in the SEER areas. For this age group, all SEER areas may not be generalizable to the United States for Non-Hodgkin's Lymphoma.

Table XVIII-10

NON-HODGKIN'S LYMPHOMASNUMBER OF CASES

By SEER Location and Year of Diagnosis, 1973-93

All Races, Males, Ages 20-54

## Year of Diagnosis

SEER Location	1973-79	1980	1981	1982	1983	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993
All Areas <sup>⊕</sup>	1896	333	350	365	352	457	492	564	642	653	746	834	919	875	922
All Areas Excluding SF-Oakland SMSA	1540	276	283	303	281	351	372	394	431	440	471	562	621	614	642
San Francisco-Oakland SMSA	356	57	67	62	71	106	120	170	211	213	275	272	298	261	280
San Francisco City/County	91	15	14	14	20	50	55	89	126	125	163	169	166	160	146

AGE-ADJUSTED CANCER INCIDENCE RATES§

By SEER Location and Year of Diagnosis, 1973-93

All Races, Males, Ages 20-54

## Year of Diagnosis

SEER Location	1973-79	1980	1981	1982	1983	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993
All Areas <sup>⊕</sup>	6.4	7.4	7.6	8.0	7.5	9.5	10.0	11.0	12.1	11.9	13.2	14.4	15.4	14.4	14.8
All Areas Excluding SF-Oakland SMSA	6.3	7.4	7.4	8.0	7.2	8.9	9.3	9.4	10.0	10.1	10.2	11.8	12.8	12.5	12.5
San Francisco-Oakland SMSA	6.8	7.4	8.6	8.1	8.6	12.4	13.2	18.9	22.4	20.8	27.1	26.6	27.8	24.1	25.9
San Francisco City/County	7.7	8.3	8.0	7.2	10.2	26.0	24.1	42.8	59.4	54.6	73.7	77.4	69.9	71.9	63.7

§ SEER Program. Rates are per 100,000 males aged 20-54 and are age-adjusted to the 1970 U.S. standard population. Each rate has been age-adjusted by 5-year age groups.

⊕ All Areas refers to all SEER data collection areas. The San Francisco-Oakland SMSA represents 15% of all persons in the SEER areas. For this age group, all SEER areas may not be generalizable to the United States for Non-Hodgkin's Lymphoma.

Table XVIII-11

NON-HODGKIN'S LYMPHOMASNUMBER OF CASES

By SEER Location and Year of Diagnosis, 1973-93

All Races, Males, Ages 55+

## Year of Diagnosis

SEER Location	1973-79	1980	1981	1982	1983	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993
All Areas⊕	4600	831	896	884	987	1049	1071	1103	1214	1246	1230	1320	1363	1367	1396
All Areas Excluding SF-Oakland SMSA	3741	690	756	742	840	877	905	901	1006	1036	1039	1084	1126	1112	1166
San Francisco-Oakland SMSA	859	141	140	142	147	172	166	202	208	210	191	236	237	255	230
San Francisco City/County	233	33	31	45	42	54	51	48	61	50	53	75	57	61	48

AGE-ADJUSTED CANCER INCIDENCE RATES§

By SEER Location and Year of Diagnosis, 1973-93

All Races, Males, Ages 55+

## Year of Diagnosis

SEER Location	1973-79	1980	1981	1982	1983	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993
All Areas⊕	40.8	46.2	49.3	47.6	52.3	54.8	54.9	55.8	60.5	61.7	60.2	63.5	64.9	63.7	64.2
All Areas Excluding SF-Oakland SMSA	39.9	45.7	49.6	47.6	53.0	54.6	55.3	54.3	59.7	61.1	60.3	61.8	63.5	61.4	63.4
San Francisco-Oakland SMSA	45.2	48.4	47.9	47.4	48.4	55.7	52.6	63.6	64.9	65.4	59.5	73.0	72.9	76.2	68.7
San Francisco City/County	42.7	41.7	39.8	57.4	52.2	68.5	63.8	59.5	76.6	65.6	69.8	102.3	79.1	81.7	64.5

§ SEER Program. Rates are per 100,000 males aged 55+ and are age-adjusted to the 1970 U.S. standard population. Each rate has been age-adjusted by 5-year age groups.

⊕ All Areas refers to all SEER data collection areas. The San Francisco-Oakland SMSA represents 15% of all persons in the SEER areas. For this age group, all SEER areas may not be generalizable to the United States for Non-Hodgkin's Lymphoma.

Table XVIII-12

NON-HODGKIN'S LYMPHOMASAGE-ADJUSTED CANCER SEER INCIDENCE RATES<sup>§</sup>, 1978-93

By The Working Formulation and Year of Diagnosis

All Races, Males and Females

Working Formulation	Year of Diagnosis															
	1978	1979	1980	1981	1982	1983	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993
Total	10.0	10.4	10.5	11.2	11.2	11.6	12.6	12.9	13.1	13.9	14.2	14.3	15.3	15.5	15.2	15.4
Low Grade:	2.6	2.7	2.9	2.9	2.9	3.1	3.2	3.3	3.5	3.4	3.6	3.3	3.6	3.6	3.6	3.5
A: Small, lymphocytic	0.9	1.0	1.0	1.1	1.1	1.1	1.2	1.2	1.2	1.4	1.4	1.3	1.4	1.3	1.5	1.4
B: Follicular, small cleaved	1.4	1.3	1.4	1.3	1.2	1.5	1.4	1.3	1.5	1.2	1.4	1.2	1.3	1.4	1.2	1.2
C: Follicular, mixed small cleaved and large cell	0.4	0.5	0.5	0.5	0.5	0.6	0.6	0.7	0.8	0.7	0.7	0.7	0.9	0.9	0.9	0.9
Intermediate Grade:	5.3	5.3	5.1	5.6	5.3	5.4	5.8	6.0	5.9	6.3	6.4	6.3	6.8	6.6	6.3	6.5
D: Follicular, large cell	0.2	0.3	0.2	0.2	0.3	0.2	0.3	0.4	0.3	0.4	0.4	0.5	0.4	0.4	0.4	0.5
E: Diffuse, small cleaved	1.9	1.7	1.6	1.7	1.2	1.3	1.2	1.1	0.8	1.0	1.0	1.0	1.0	0.8	0.8	0.8
F: Diffuse, mixed small cleaved and large cell	0.6	0.7	0.6	0.7	0.8	0.9	0.9	1.0	0.9	0.9	0.9	0.8	0.8	0.8	0.7	0.7
G: Diffuse, large cell	2.6	2.7	2.8	3.0	3.1	3.0	3.4	3.6	3.8	4.0	4.1	4.1	4.6	4.6	4.5	4.5
High Grade:	0.4	0.4	0.5	0.6	1.0	1.1	1.1	1.2	1.4	1.6	1.7	1.9	1.8	2.0	1.9	1.9
H: Large cell, immunoblastic	0.1	0.1	0.2	0.2	0.4	0.6	0.6	0.6	0.7	0.9	0.9	1.1	1.1	1.2	1.2	1.3
I: Lymphoblastic	0.1	0.1	0.1	0.1	0.2	0.2	0.1	0.2	0.2	0.2	0.2	0.2	0.2	0.1	0.2	0.2
J: Small noncleaved; Burkitt's	0.2	0.2	0.3	0.3	0.4	0.3	0.4	0.4	0.5	0.6	0.6	0.6	0.4	0.6	0.5	0.5
Unclassified Grade	1.6	2.0	1.9	2.2	2.0	2.0	2.4	2.4	2.3	2.6	2.5	2.9	3.1	3.3	3.0	3.1

§ SEER Program. Rates are per 100,000 and are age-adjusted to the 1970 U.S. standard population.

Table XVIII-13  
NON-HODGKIN'S LYMPHOMAS

Percent Diagnosed With Cancer In 10, 20 and 30 Years and In Remaining Lifetime,  
 Given Cancer Free At Current Age By Race and Sex

Lifetime Risk (Percent) of Being Diagnosed With Cancer and  
 Lifetime Risk (Percent) of Dying From Cancer

SEER Areas, 1991-93

All Races

Current Age	Males				Females			
	+10 yrs	+20 yrs	+30 yrs	Eventually	+10 yrs	+20 yrs	+30 yrs	Eventually
0	0.01	0.03	0.08	1.93	0.00	0.01	0.04	1.64
10	0.02	0.07	0.20	1.95	0.01	0.03	0.07	1.65
20	0.05	0.19	0.38	1.95	0.03	0.06	0.16	1.65
30	0.14	0.33	0.64	1.93	0.04	0.14	0.33	1.63
40	0.20	0.51	0.94	1.84	0.10	0.30	0.66	1.61
50	0.32	0.77	1.34	1.71	0.20	0.57	1.09	1.54
60	0.49	1.11	1.45	1.51	0.39	0.93	1.31	1.41

Lifetime Risk of Being Diagnosed = 1.93%  
 Lifetime Risk of Dying = 0.90%

Lifetime Risk of Being Diagnosed = 1.64%  
 Lifetime Risk of Dying = 0.85%

Whites

Current Age	Males				Females			
	+10 yrs	+20 yrs	+30 yrs	Eventually	+10 yrs	+20 yrs	+30 yrs	Eventually
0	0.01	0.03	0.08	2.03	0.00	0.01	0.04	1.72
10	0.02	0.07	0.20	2.04	0.01	0.03	0.07	1.73
20	0.05	0.19	0.38	2.04	0.02	0.06	0.16	1.73
30	0.14	0.34	0.65	2.02	0.04	0.14	0.35	1.71
40	0.20	0.52	0.98	1.92	0.10	0.31	0.69	1.69
50	0.33	0.81	1.40	1.79	0.21	0.60	1.14	1.62
60	0.51	1.16	1.51	1.57	0.41	0.97	1.38	1.47

Lifetime Risk of Being Diagnosed = 2.03%  
 Lifetime Risk of Dying = 0.96%

Lifetime Risk of Being Diagnosed = 1.72%  
 Lifetime Risk of Dying = 0.92%

Blacks

Current Age	Males				Females			
	+10 yrs	+20 yrs	+30 yrs	Eventually	+10 yrs	+20 yrs	+30 yrs	Eventually
0	0.01	0.02	0.08	1.14	0.00	0.01	0.04	0.84
10	0.01	0.08	0.23	1.16	0.01	0.04	0.08	0.86
20	0.06	0.22	0.45	1.17	0.04	0.08	0.15	0.85
30	0.16	0.40	0.65	1.15	0.04	0.12	0.27	0.83
40	0.25	0.52	0.72	1.05	0.08	0.23	0.43	0.80
50	0.29	0.51	0.76	0.88	0.16	0.37	0.63	0.76
60	0.27	0.56	0.68	0.71	0.23	0.52	0.63	0.66

Lifetime Risk of Being Diagnosed = 1.14%  
 Lifetime Risk of Dying = 0.42%

Lifetime Risk of Being Diagnosed = 0.84%  
 Lifetime Risk of Dying = 0.38%

Table XVIII-14  
NON-HODGKIN'S LYMPHOMASAVERAGE ANNUAL AGE-ADJUSTED CANCER MORTALITY<sup>δ</sup> RATES BY STATE, 1989-93

All Races, Males and Females

State	Rate	SE	Rank	PD	State	Rate	SE	Rank	PD
TOTAL U.S.	6.4	0.02							
High Five States									
North Dakota	7.8 <sup>⊛</sup>	0.45	(01)	21.9					
Vermont	7.4 <sup>⊛</sup>	0.49	(02)	15.6					
Rhode Island	7.3	0.34	(03)	14.1					
Minnesota	7.0	0.17	(04)	9.4					
Iowa	7.0	0.20	(05)	9.4					
Low Five States									
Hawaii	5.4 <sup>⊛</sup>	0.30	(47)	-15.6					
South Carolina	5.3 <sup>⊕⊛</sup>	0.17	(48)	-17.2					
Georgia	5.3 <sup>⊕⊛</sup>	0.13	(49)	-17.2					
Mississippi	5.2 <sup>⊕⊛</sup>	0.19	(50)	-18.8					
Alaska	5.0 <sup>⊛</sup>	0.63	(51)	-21.9					
Alabama	5.8	0.16	(44)	-9.4	Montana	6.6	0.36	(25)	3.1
Alaska	5.0 <sup>⊛</sup>	0.63	(51)	-21.9	Nebraska	6.9	0.27	(07)	7.8
Arizona	6.3	0.17	(31)	-1.6	Nevada	6.1	0.31	(37)	-4.7
Arkansas	6.8	0.21	(13)	6.3	New Hampshire	7.0	0.34	(06)	9.4
California	6.1	0.06	(34)	-4.7	New Jersey	6.6	0.12	(22)	3.1
Colorado	5.9	0.19	(43)	-7.8	New Mexico	5.6	0.27	(46)	-12.5
Connecticut	6.5	0.18	(26)	1.6	New York	6.9 <sup>⊕</sup>	0.08	(08)	7.8
Delaware	6.6	0.42	(20)	3.1	North Carolina	6.0	0.13	(42)	-6.3
District of Columbia	6.6	0.44	(18)	3.1	North Dakota	7.8 <sup>⊛</sup>	0.45	(01)	21.9
Florida	6.0	0.08	(40)	-6.3	Ohio	6.9	0.10	(09)	7.8
Georgia	5.3 <sup>⊕⊛</sup>	0.13	(49)	-17.2	Oklahoma	6.6	0.19	(24)	3.1
Hawaii	5.4 <sup>⊛</sup>	0.30	(47)	-15.6	Oregon	6.4	0.19	(28)	0.0
Idaho	6.6	0.34	(23)	3.1	Pennsylvania	6.8	0.09	(12)	6.3
Illinois	6.6	0.10	(21)	3.1	Rhode Island	7.3	0.34	(03)	14.1
Indiana	6.7	0.14	(17)	4.7	South Carolina	5.3 <sup>⊕⊛</sup>	0.17	(48)	-17.2
Iowa	7.0	0.20	(05)	9.4	South Dakota	6.3	0.38	(30)	-1.6
Kansas	6.7	0.21	(14)	4.7	Tennessee	6.4	0.15	(29)	0.0
Kentucky	6.2	0.17	(33)	-3.1	Texas	6.1	0.08	(36)	-4.7
Louisiana	6.2	0.17	(32)	-3.1	Utah	6.0	0.28	(39)	-6.3
Maine	6.6	0.30	(19)	3.1	Vermont	7.4 <sup>⊛</sup>	0.49	(02)	15.6
Maryland	6.1	0.15	(35)	-4.7	Virginia	6.1	0.14	(38)	-4.7
Massachusetts	6.8	0.14	(11)	6.3	Washington	6.5	0.15	(27)	1.6
Michigan	6.7	0.11	(16)	4.7	West Virginia	6.0	0.22	(41)	-6.3
Minnesota	7.0	0.17	(04)	9.4	Wisconsin	6.7	0.15	(15)	4.7
Mississippi	5.2 <sup>⊕⊛</sup>	0.19	(50)	-18.8	Wyoming	5.6	0.48	(45)	-12.5
Missouri	6.8	0.15	(10)	6.3					

<sup>δ</sup> NCHS public use tape. Rates are per 100,000 and are age-adjusted to the 1970 U.S. standard population.

SE Standard error of the rate.

PD Percent difference between state rate and total U.S. rate.

<sup>⊛</sup> Absolute difference between state rate and total U.S. rate is 15% or more.<sup>⊕</sup> Difference between state rate and total U.S. rate is statistically significant (p<=.0002).

Table XVIII-15  
NON-HODGKIN'S LYMPHOMASAVERAGE ANNUAL AGE-ADJUSTED CANCER MORTALITY<sup>δ</sup> RATES BY STATE, 1989-93

All Races, Males

State	Rate	SE	Rank	PD	State	Rate	SE	Rank	PD
TOTAL U.S.	8.0	0.04							
High Five States									
Rhode Island	9.7 <sup>*</sup>	0.60	(01)	21.3					
Vermont	9.5 <sup>*</sup>	0.84	(02)	18.8					
District of Columbia	9.3 <sup>*</sup>	0.79	(03)	16.3					
New Hampshire	9.3 <sup>*</sup>	0.61	(04)	16.3					
New York	9.0 <sup>⊕</sup>	0.14	(05)	12.5					
Low Five States									
New Mexico	6.7 <sup>*</sup>	0.43	(47)	-16.3					
South Carolina	6.5 <sup>*</sup>	0.29	(48)	-18.8					
Georgia	6.4 <sup>⊕*</sup>	0.22	(49)	-20.0					
Wyoming	6.3 <sup>*</sup>	0.78	(50)	-21.3					
Alaska	5.3 <sup>*</sup>	0.92	(51)	-33.8					
Alabama	6.8 <sup>*</sup>	0.26	(46)	-15.0	Montana	7.8	0.59	(32)	-2.5
Alaska	5.3 <sup>*</sup>	0.92	(51)	-33.8	Nebraska	8.1	0.44	(21)	1.3
Arizona	7.7	0.28	(35)	-3.8	Nevada	7.9	0.51	(30)	-1.3
Arkansas	8.2	0.36	(18)	2.5	New Hampshire	9.3 <sup>*</sup>	0.61	(04)	16.3
California	7.6	0.11	(36)	-5.0	New Jersey	8.2	0.20	(17)	2.5
Colorado	7.5	0.32	(38)	-6.3	New Mexico	6.7 <sup>*</sup>	0.43	(47)	-16.3
Connecticut	7.8	0.30	(31)	-2.5	New York	9.0 <sup>⊕</sup>	0.14	(05)	12.5
Delaware	7.9	0.70	(28)	-1.3	North Carolina	7.5	0.22	(37)	-6.3
District of Columbia	9.3 <sup>*</sup>	0.79	(03)	16.3	North Dakota	8.9	0.71	(06)	11.3
Florida	7.5	0.13	(41)	-6.3	Ohio	8.6	0.18	(08)	7.5
Georgia	6.4 <sup>⊕*</sup>	0.22	(49)	-20.0	Oklahoma	8.0	0.31	(24)	0.0
Hawaii	7.2	0.50	(43)	-10.0	Oregon	8.2	0.32	(16)	2.5
Idaho	8.1	0.56	(20)	1.3	Pennsylvania	8.4	0.16	(13)	5.0
Illinois	8.4	0.17	(10)	5.0	Rhode Island	9.7 <sup>*</sup>	0.60	(01)	21.3
Indiana	8.3	0.25	(14)	3.8	South Carolina	6.5 <sup>*</sup>	0.29	(48)	-18.8
Iowa	8.5	0.33	(09)	6.3	South Dakota	7.9	0.64	(26)	-1.3
Kansas	8.2	0.36	(15)	2.5	Tennessee	8.1	0.26	(22)	1.3
Kentucky	7.7	0.29	(33)	-3.8	Texas	7.7	0.15	(34)	-3.8
Louisiana	7.9	0.29	(29)	-1.3	Utah	6.8 <sup>*</sup>	0.45	(44)	-15.0
Maine	7.9	0.50	(27)	-1.3	Vermont	9.5 <sup>*</sup>	0.84	(02)	18.8
Maryland	7.5	0.27	(39)	-6.3	Virginia	7.4	0.23	(42)	-7.5
Massachusetts	8.4	0.24	(11)	5.0	Washington	8.1	0.26	(23)	1.3
Michigan	8.0	0.19	(25)	0.0	West Virginia	7.5	0.38	(40)	-6.3
Minnesota	8.6	0.28	(07)	7.5	Wisconsin	8.1	0.25	(19)	1.3
Mississippi	6.8 <sup>*</sup>	0.33	(45)	-15.0	Wyoming	6.3 <sup>*</sup>	0.78	(50)	-21.3
Missouri	8.4	0.25	(12)	5.0					

<sup>δ</sup> NCHS public use tape. Rates are per 100,000 and are age-adjusted to the 1970 U.S. standard population.

SE Standard error of the rate.

PD Percent difference between state rate and total U.S. rate.

<sup>\*</sup> Absolute difference between state rate and total U.S. rate is 15% or more.<sup>⊕</sup> Difference between state rate and total U.S. rate is statistically significant (p<=.0002).

Table XVIII-16  
NON-HODGKIN'S LYMPHOMASAVERAGE ANNUAL AGE-ADJUSTED CANCER MORTALITY<sup>δ</sup> RATES BY STATE, 1989-93

All Races, Females

State	Rate	SE	Rank	PD	State	Rate	SE	Rank	PD
TOTAL U.S.	5.2	0.03			Alabama	5.1	0.19	(28)	-1.9
High Five States					Alaska	4.6	0.83	(45)	-11.5
North Dakota	6.8*	0.57	(01)	30.8	Arizona	5.0	0.20	(34)	-3.8
Nebraska	6.1*	0.34	(02)	17.3	Arkansas	5.6	0.26	(11)	7.7
Iowa	5.9	0.24	(03)	13.5	California	5.0	0.08	(38)	-3.8
Minnesota	5.8	0.20	(04)	11.5	Colorado	4.7	0.22	(43)	-9.6
Vermont	5.7	0.58	(05)	9.6	Connecticut	5.5	0.22	(17)	5.8
Low Five States					Delaware	5.7	0.52	(07)	9.6
Georgia	4.5	0.15	(47)	-13.5	District of Columbia	4.5	0.47	(48)	-13.5
District of Columbia	4.5	0.47	(48)	-13.5	Florida	4.8	0.10	(41)	-7.7
Nevada	4.4*	0.35	(49)	-15.4	Georgia	4.5	0.15	(47)	-13.5
Mississippi	4.0⊕*	0.22	(50)	-23.1	Hawaii	3.7*	0.34	(51)	-28.8
Hawaii	3.7*	0.34	(51)	-28.8	Idaho	5.3	0.42	(21)	1.9
					Illinois	5.2	0.12	(26)	0.0
					Indiana	5.4	0.17	(20)	3.8
					Iowa	5.9	0.24	(03)	13.5
					Kansas	5.6	0.25	(14)	7.7
					Kentucky	5.0	0.20	(35)	-3.8
					Louisiana	5.0	0.20	(32)	-3.8
					Maine	5.7	0.37	(08)	9.6
					Maryland	5.1	0.19	(31)	-1.9
					Massachusetts	5.6	0.16	(10)	7.7
					Michigan	5.7	0.14	(06)	9.6
					Minnesota	5.8	0.20	(04)	11.5
					Mississippi	4.0⊕*	0.22	(50)	-23.1
					Missouri	5.7	0.18	(09)	9.6
					Montana	5.5	0.45	(18)	5.8
					Nebraska	6.1*	0.34	(02)	17.3
					Nevada	4.4*	0.35	(49)	-15.4
					New Hampshire	5.1	0.39	(27)	-1.9
					New Jersey	5.3	0.14	(22)	1.9
					New Mexico	4.7	0.33	(44)	-9.6
					New York	5.3	0.09	(23)	1.9
					North Carolina	4.9	0.15	(40)	-5.8
					North Dakota	6.8*	0.57	(01)	30.8
					Ohio	5.5	0.12	(16)	5.8
					Oklahoma	5.4	0.22	(19)	3.8
					Oregon	5.0	0.23	(37)	-3.8
					Pennsylvania	5.6	0.11	(13)	7.7
					Rhode Island	5.6	0.39	(12)	7.7
					South Carolina	4.5	0.20	(46)	-13.5
					South Dakota	5.0	0.46	(33)	-3.8
					Tennessee	5.1	0.17	(29)	-1.9
					Texas	4.8	0.10	(42)	-7.7
					Utah	5.3	0.36	(24)	1.9
					Vermont	5.7	0.58	(05)	9.6
					Virginia	5.0	0.16	(36)	-3.8
					Washington	5.2	0.19	(25)	0.0
					West Virginia	4.9	0.27	(39)	-5.8
					Wisconsin	5.6	0.18	(15)	7.7
					Wyoming	5.1	0.61	(30)	-1.9

<sup>δ</sup> NCHS public use tape. Rates are per 100,000 and are age-adjusted to the 1970 U.S. standard population.

SE Standard error of the rate.

PD Percent difference between state rate and total U.S. rate.

\* Absolute difference between state rate and total U.S. rate is 15% or more.

⊕ Difference between state rate and total U.S. rate is statistically significant (p&lt;=.0002).

Table XVIII-17  
 NON-HODGKIN'S LYMPHOMAS  
 AGE-ADJUSTED SEER INCIDENCE RATES§, SEER MORTALITY RATESδ, AND 5-YEAR RELATIVE SURVIVAL RATESϕ  
 By Registry, Race and Sex

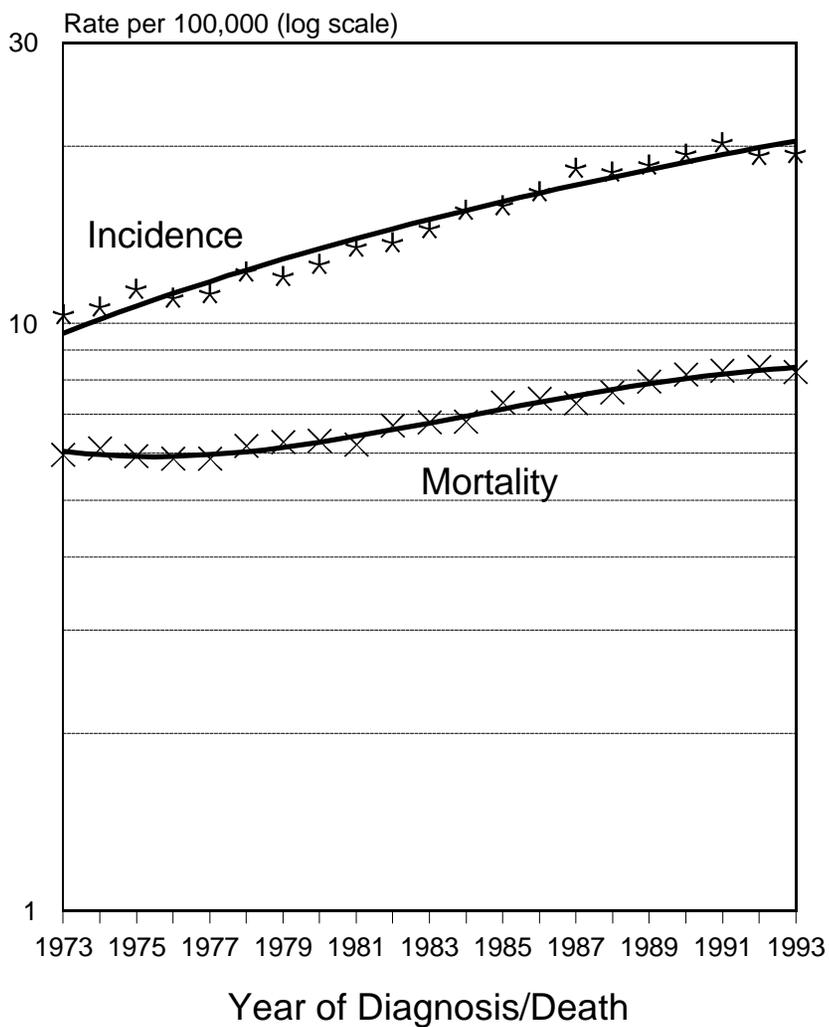
	All Races			Whites			Blacks		
	Total	Males	Females	Total	Males	Females	Total	Males	Females
<u>SEER INCIDENCE RATES§, 1989-93</u>									
REGISTRY									
Standard 9 registries	15.1	18.8	12.0	15.7	19.4	12.5	11.1	14.5	8.4
San Francisco-Oakland	18.2	25.2	11.8	20.1	28.0	12.7	12.8	17.7	8.5
Connecticut	15.5	18.5	13.0	15.6	18.7	13.1	12.7	15.7	10.3
Metropolitan Detroit	14.8	17.9	12.2	15.6	18.4	13.3	10.6	14.6	7.5
Hawaii	11.8	14.7	9.0	14.8	20.4	8.7	-	-	-
Iowa	15.0	17.7	12.8	14.9	17.6	12.9	-	-	-
New Mexico	10.7	12.4	9.1	11.1	13.0	9.4	-	-	-
Seattle-Puget Sound	15.6	19.0	12.6	15.5	19.0	12.4	12.4	12.9	11.5
Utah	14.1	16.6	11.9	14.2	16.8	11.9	-	-	-
Metropolitan Atlanta	14.0	17.0	11.7	14.8	17.9	12.4	10.6	12.3	9.0
San Jose-Monterey	14.5	17.6	11.9	14.7	17.6	12.3	12.2	13.2	9.5
Los Angeles	14.3	18.3	10.8	15.4	19.7	11.5	10.0	12.7	7.7
<u>SEER MORTALITY RATESδ, 1989-93</u>									
REGISTRY									
Standard 9 registries	6.4	7.9	5.2	6.7	8.3	5.5	4.3	5.6	3.4
San Francisco-Oakland	6.3	8.3	4.7	6.9	9.1	5.3	4.5	6.1	3.3
Connecticut	6.5	7.8	5.5	6.6	7.8	5.6	5.6	7.1	4.4
Metropolitan Detroit	6.6	8.2	5.5	7.2	8.8	5.9	4.5	5.8	3.5
Hawaii	5.4	7.2	3.7	7.2	8.8	5.4	-	-	-
Iowa	7.0	8.5	5.9	7.1	8.6	5.9	-	-	-
New Mexico	5.6	6.7	4.7	5.7	6.9	4.7	-	-	-
Seattle-Puget Sound	6.5	8.4	5.1	6.7	8.6	5.1	4.0	4.7	3.1
Utah	6.0	6.8	5.3	6.1	6.9	5.3	-	-	-
Metropolitan Atlanta	5.4	6.3	4.6	6.0	7.0	5.1	3.2	3.9	2.7
San Jose-Monterey	6.3	7.8	5.0	6.6	8.3	5.3	4.1	3.9	4.1
Los Angeles	6.3	7.9	5.1	6.7	8.3	5.6	4.7	6.2	3.5
<u>SURVIVAL RATESϕ, 1986-92</u>									
REGISTRY									
Standard 9 registries	51.3	47.6	55.9	52.1	48.6	56.6	43.8	38.8	50.7
San Francisco-Oakland	44.3	36.1	59.1	44.4	36.4	59.4	43.8	32.3	59.4↑
Connecticut	52.4	50.6	54.2	52.8	51.5	54.3	43.9	36.7↑	52.2↑
Metropolitan Detroit	51.0	50.1	52.0	52.6	52.4	52.9	42.5	39.1	46.9
Hawaii	44.6	43.3	46.3	42.5	39.3↑	48.6↑	-	-	-
Iowa	54.4	54.0	54.8	54.5	54.0	55.0	-	-	-
New Mexico	55.4	55.8	54.9	56.4	56.4	56.3	-	-	-
Seattle-Puget Sound	55.2	50.2	61.7	55.4	50.8	61.5	45.0↑	30.4↑	65.0↑
Utah	56.3	57.4	55.0	56.4	57.3	55.2	-	-	-
Metropolitan Atlanta	51.9	45.4	59.7	53.2	45.3	62.3	45.9	45.3↑	46.8↑

Note: San Jose-Monterey and Los Angeles are new SEER areas as of 1992 and their data are only used in this table and not other tables in this section.

- § SEER Program. Incidence rates are per 100,000 and are age-adjusted to the 1970 U.S. standard population.  
 δ NCHS public use tape. Mortality rates are per 100,000 and are age-adjusted to the 1970 U.S. standard population.  
 ϕ Survival rates are relative rates expressed as percents and are based on follow-up of patients through 1993.  
 ↑ The standard error of the survival rate is between 5 and 10 percentage points.  
 ↑ The standard error of the survival rate is greater than 10 percentage points.  
 - Statistic could not be calculated or populations are inadequate.

# SEER Incidence and U.S. Mortality Non-Hodgkin's Lymphoma, Male By Race

## White



## Black

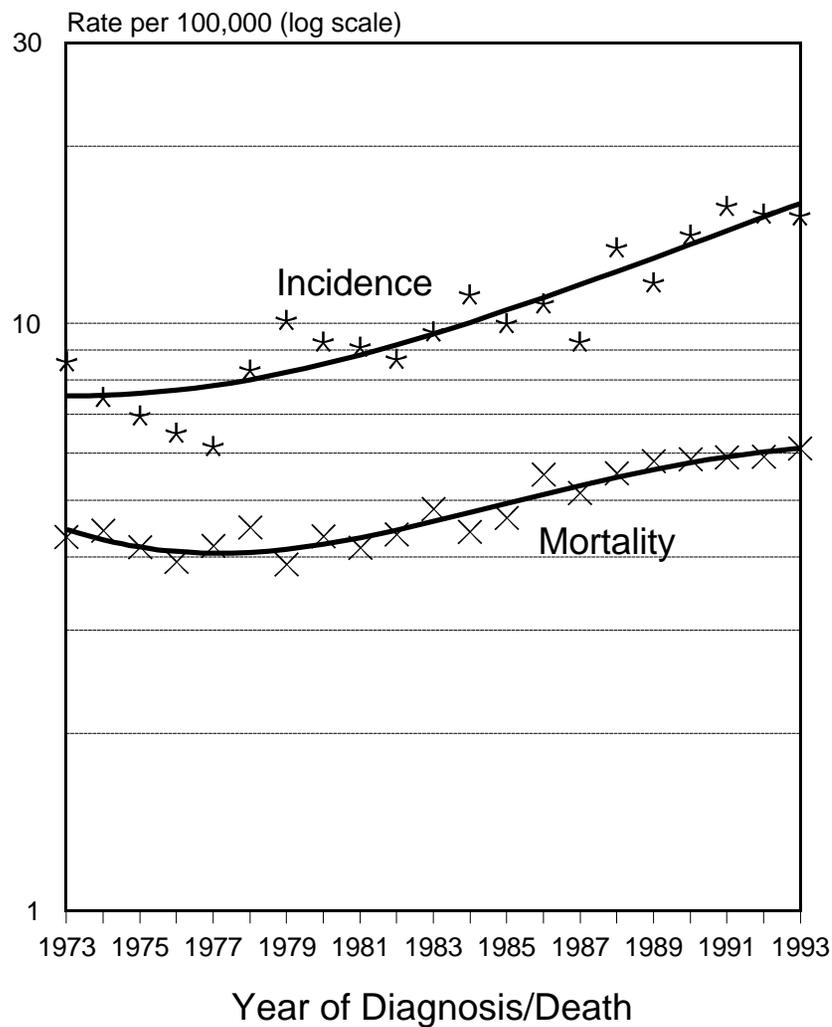


Figure XVIII-1

# SEER Incidence and U.S. Mortality Non-Hodgkin's Lymphoma, Female By Race

## White

## Black

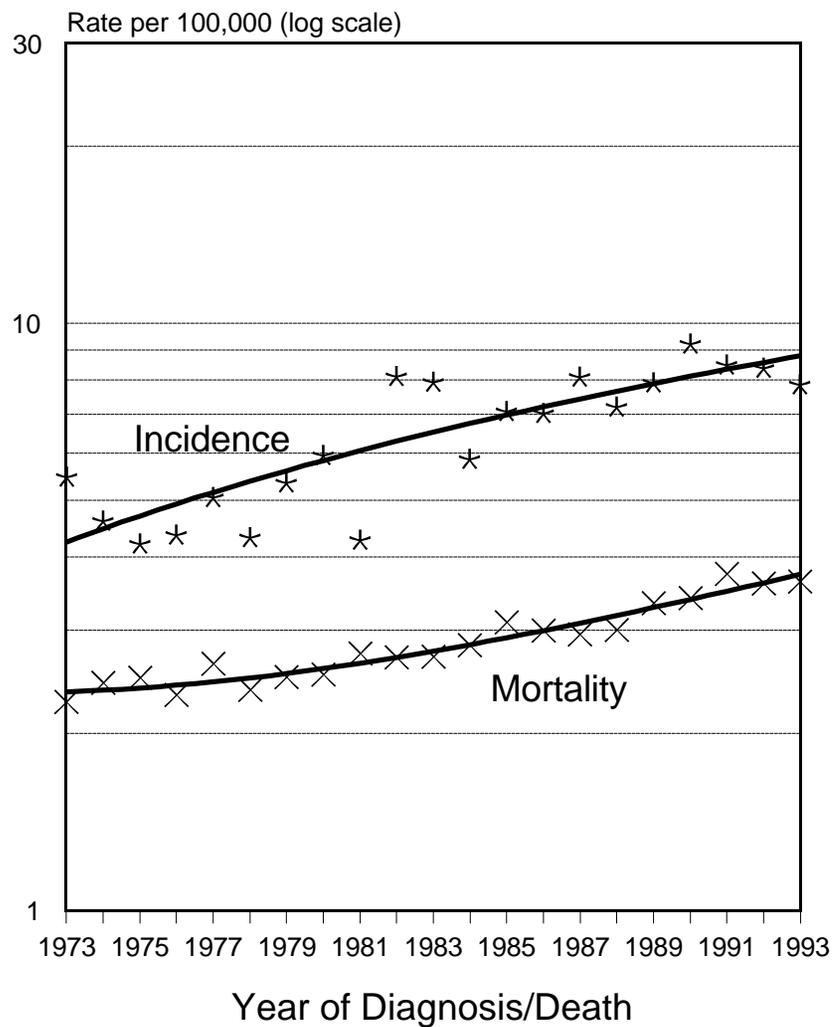
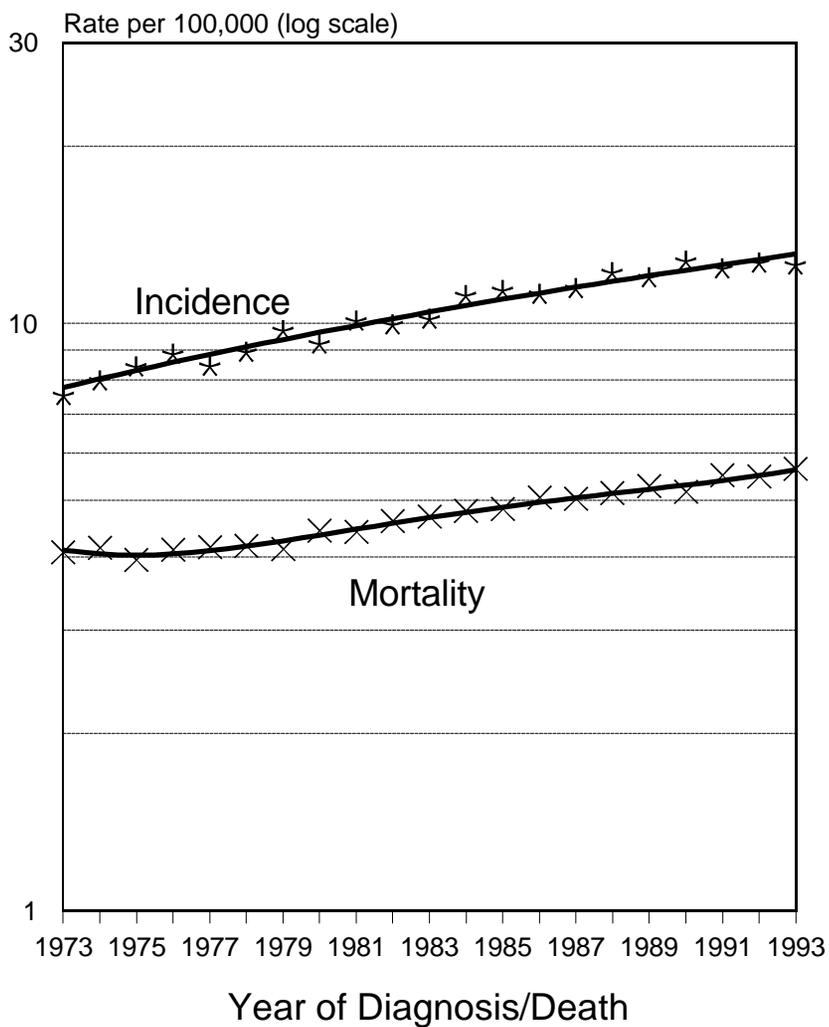
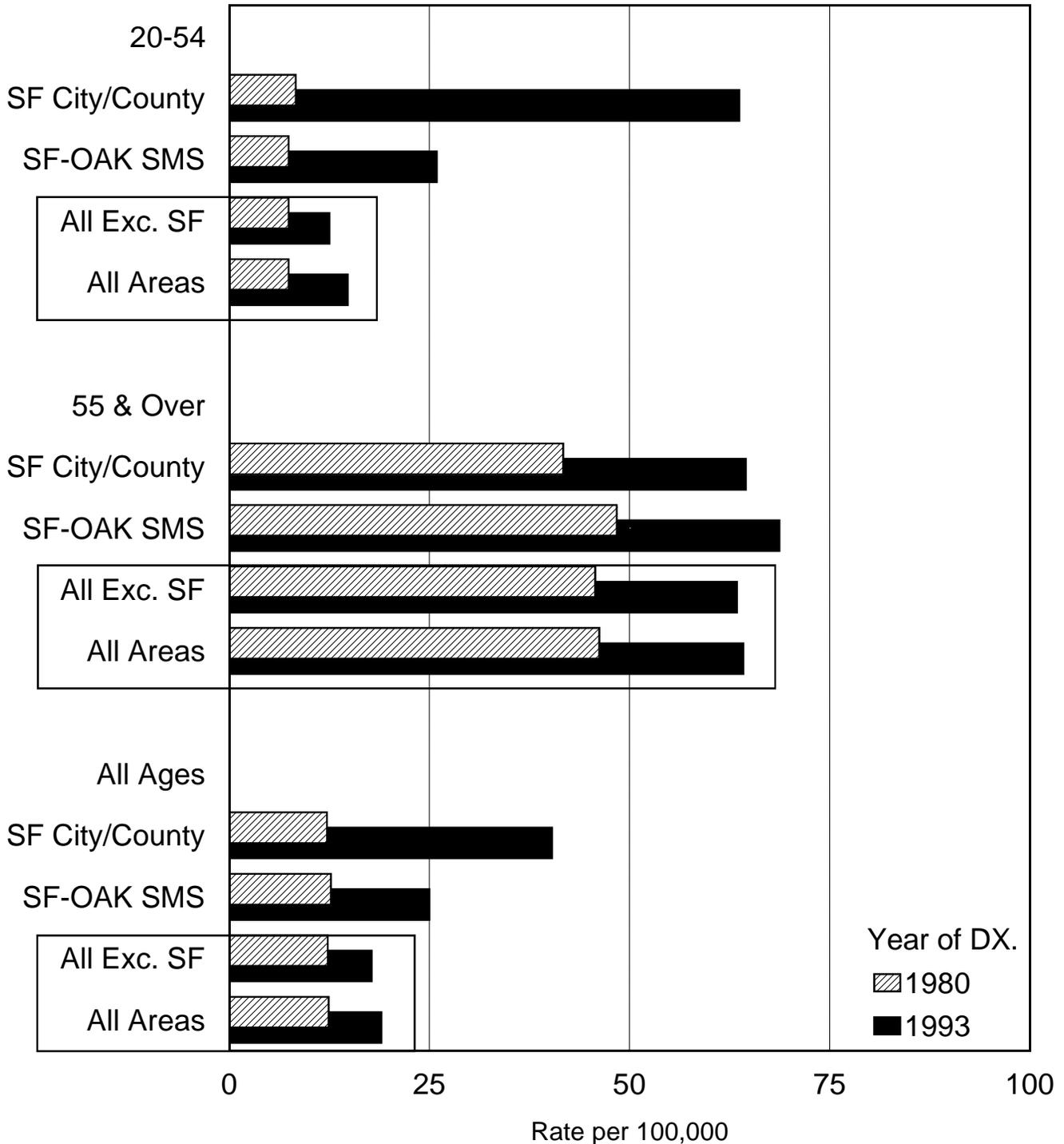


Figure XVIII-2

# Non-Hodgkin's Lymphoma Incidence Rates Males

AGE/AREA



# Non-Hodgkin's Lymphoma SEER Incidence by Age 1973-75 vs. 1991-93 All Races, Males

