

Table IV-1  
 FEMALE BREAST CANCER (Invasive)

TRENDS IN SEER INCIDENCE<sup>a</sup> AND U.S. MORTALITY<sup>b</sup> USING THE JOINPOINT REGRESSION PROGRAM, 1975-2000  
 WITH UP TO THREE JOINPOINTS BY RACE AND AGE

		<u>Joinpoint Segment 1</u>		<u>Joinpoint Segment 2</u>		<u>Joinpoint Segment 3</u>		<u>Joinpoint Segment 4</u>	
		Year	APC	Year	APC	Year	APC	Year	APC
<u>SEER Cancer Incidence<sup>a</sup></u>									
All Races	All Ages	1975-1980	-0.4	1980-1987	3.7 <sup>c</sup>	1987-2000	0.4 <sup>c</sup>		
All Races	Under 50	1975-1980	-1.4	1980-1986	2.9 <sup>c</sup>	1986-2000	-0.3		
All Races	50 and Over	1975-1982	0.8	1982-1986	5.8 <sup>c</sup>	1986-2000	0.7 <sup>c</sup>		
White	All Ages	1975-1980	-0.3	1980-1987	3.8 <sup>c</sup>	1987-2000	0.4 <sup>c</sup>		
White	Under 50	1975-1980	-1.2	1980-1986	2.8 <sup>c</sup>	1986-2000	-0.3 <sup>c</sup>		
White	50 and Over	1975-1980	-0.1	1980-1987	4.3 <sup>c</sup>	1987-2000	0.7 <sup>c</sup>		
Black	All Ages	1975-1992	2.2 <sup>c</sup>	1992-2000	-0.2				
Black	Under 50	1975-1991	1.5 <sup>c</sup>	1991-2000	-0.9				
Black	50 and Over	1975-1995	2.3 <sup>c</sup>	1995-2000	-1.3				
<u>SEER Delay-Adjusted Incidence<sup>a</sup></u>									
All Races	All Ages	1975-1980	-0.6	1980-1986	4.1 <sup>c</sup>	1986-2000	0.6 <sup>c</sup>		
White	All Ages	1975-1980	-0.5	1980-1987	4.1 <sup>c</sup>	1987-1993	-0.2	1993-2000	1.4 <sup>c</sup>
Black	All Ages	1975-1992	2.3 <sup>c</sup>	1992-2000	0.2				
<u>U.S. Cancer Mortality<sup>b</sup></u>									
All Races	All Ages	1975-1990	0.4 <sup>c</sup>	1990-2000	-2.3 <sup>c</sup>				
All Races	Under 50	1975-1991	-0.4 <sup>c</sup>	1991-2000	-3.7 <sup>c</sup>				
All Races	50 and Over	1975-1990	0.6 <sup>c</sup>	1990-2000	-2.0 <sup>c</sup>				
White	All Ages	1975-1990	0.3 <sup>c</sup>	1990-2000	-2.5 <sup>c</sup>				
White	Under 50	1975-1991	-0.7 <sup>c</sup>	1991-2000	-4.2 <sup>c</sup>				
White	50 and Over	1975-1990	0.5 <sup>c</sup>	1990-2000	-2.2 <sup>c</sup>				
Black	All Ages	1975-1991	1.6 <sup>c</sup>	1991-2000	-1.0 <sup>c</sup>				
Black	Under 50	1975-1987	1.7 <sup>c</sup>	1987-1996	-1.1 <sup>c</sup>	1996-2000	-3.6 <sup>c</sup>		
Black	50 and Over	1975-1993	1.6 <sup>c</sup>	1993-2000	-1.2 <sup>c</sup>				

The APC is the Annual Percent Change based on rates age-adjusted to the 2000 U.S. standard population by 5-year age groups using the Joinpoint Regression Program.

<sup>a</sup> Trends are from the SEER 9 areas.

<sup>b</sup> Trends are from the NCHS public use data file.

<sup>c</sup> The APC is significantly different from zero (p<.05).

Table IV-2  
 FEMALE BREAST CANCER (*In Situ*)

TRENDS IN SEER INCIDENCE<sup>a</sup> USING THE JOINPOINT REGRESSION PROGRAM, 1975-2000  
 WITH UP TO THREE JOINPOINTS BY RACE AND AGE

		<u>Joinpoint Segment 1</u>		<u>Joinpoint Segment 2</u>		<u>Joinpoint Segment 3</u>		<u>Joinpoint Segment 4</u>	
		Year	APC	Year	APC	Year	APC	Year	APC
<u>SEER Cancer Incidence<sup>a</sup></u>									
All Races	All Ages	1975-1982	-0.8	1982-1986	32.3 <sup>b</sup>	1986-2000	6.1 <sup>b</sup>		
All Races	Under 50	1975-1982	-2.3	1982-1986	27.9 <sup>b</sup>	1986-2000	3.8 <sup>b</sup>		
All Races	50 and Over	1975-1981	-1.9	1981-1987	26.0 <sup>b</sup>	1987-2000	6.8 <sup>b</sup>		
White	All Ages	1975-1982	-0.7	1982-1986	33.0 <sup>b</sup>	1986-2000	5.9 <sup>b</sup>		
White	Under 50	1975-1982	-3.9	1982-1985	40.5 <sup>b</sup>	1985-2000	4.0 <sup>b</sup>		
White	50 and Over	1975-1981	-1.3	1981-1987	26.1 <sup>b</sup>	1987-2000	6.5 <sup>b</sup>		
Black	All Ages	1975-1981	2.9	1981-1988	18.9 <sup>b</sup>	1988-2000	7.0 <sup>b</sup>		
Black	Under 50	1975-2000	6.9 <sup>b</sup>						
Black	50 and Over	1975-1980	-2.1	1980-1988	20.8 <sup>b</sup>	1988-2000	7.9 <sup>b</sup>		
<u>SEER Delay-Adjusted Incidence<sup>a</sup></u>									
White	All Ages	1975-1982	-0.7	1982-1986	32.8 <sup>c</sup>	1986-2000	6.0 <sup>c</sup>		
Black	All Ages	1975-1981	2.9	1981-1988	18.8 <sup>c</sup>	1988-2000	7.1 <sup>c</sup>		

The APC is the Annual Percent Change based on rates age-adjusted to the 2000 U.S. standard population by 5-year age groups using the Joinpoint Regression Program.

Trends are from the SEER 9 areas.

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

<sup>a</sup>  
<sup>b</sup>

Table IV-3  
BREAST CANCER (Invasive)SEER INCIDENCE RATES, AGE-ADJUSTED AND AGE-SPECIFIC RATES<sup>a</sup>, BY RACE AND SEX

	All Races			Whites			Blacks		
	Total	Males	Females	Total	Males	Females	Total	Males	Females
<u>AGE-ADJUSTED RATES</u>									
<u>YEAR OF DIAGNOSIS:</u>									
1975	58.0	0.9	105.0	59.4	0.9	107.3	52.0	-	93.4
1976	56.4	1.1	101.9	58.1	1.1	104.8	47.9	-	85.2
1977	55.9	1.0	100.7	57.4	0.9	103.4	49.5	-	86.7
1978	55.8	0.9	100.5	57.5	0.9	103.5	48.2	-	86.0
1979	56.8	1.0	102.1	58.3	0.9	104.7	49.9	-	87.0
1980	56.8	0.9	102.1	58.4	1.0	104.9	50.7	-	89.6
1981	59.3	1.0	106.3	61.2	0.9	109.8	54.3	-	94.2
1982	59.2	1.0	106.4	61.0	0.9	109.9	53.9	-	93.5
1983	61.8	1.0	111.0	63.6	1.1	114.4	58.8	-	103.2
1984	64.4	0.9	115.8	66.5	0.9	119.8	57.9	-	101.5
1985	69.0	1.0	124.0	70.9	1.0	127.7	64.0	-	111.6
1986	70.4	0.9	126.7	72.2	1.0	130.2	66.0	-	114.6
1987	74.7	1.0	134.4	77.8	1.0	140.3	62.8	-	109.0
1988	73.0	1.2	131.2	75.5	1.2	136.2	68.9	-	118.5
1989	70.7	1.1	127.1	73.3	1.0	132.2	60.6	-	105.1
1990	73.0	1.1	131.6	75.2	1.1	136.1	68.3	-	118.2
1991	73.9	1.1	133.5	76.4	1.2	138.5	67.0	-	116.7
1992	72.9	1.0	131.8	74.6	1.0	135.5	70.9	-	122.8
1993	71.2	1.1	129.0	73.1	1.0	133.0	68.4	-	118.7
1994	71.9	1.2	130.6	74.1	1.1	135.3	70.2	-	121.7
1995	72.6	1.0	132.2	74.9	0.9	137.1	71.3	-	123.1
1996	73.1	1.3	133.2	75.0	1.3	137.4	70.8	-	122.8
1997	75.1	1.2	137.1	77.2	1.1	141.8	71.1	-	123.0
1998	76.8	1.1	140.3	79.0	1.2	145.4	68.9	-	120.0
1999	76.2	1.0	139.6	78.4	1.1	144.7	70.7	-	122.3
2000	73.6	1.3	135.1	76.1	1.2	140.9	67.6	3.3	116.3
<u>AGE-ADJUSTED RATES, 1996-2000</u>									
<u>AGE AT DIAGNOSIS:</u>									
All ages	75.0	1.2	137.1	77.1	1.2	142.0	69.8	2.0	120.8
Under 65	46.4	0.5	90.4	47.1	0.5	92.9	45.3	0.7	83.2
65 and over	272.5	5.7	459.6	284.5	5.7	481.4	238.9	10.5	380.8
All ages (world std.) <sup>b</sup>	52.7	0.8	98.6	54.1	0.8	102.2	49.6	1.2	87.7
<u>AGE-SPECIFIC RATES, 1996-2000</u>									
<u>AGE AT DIAGNOSIS:</u>									
<1	-	-	-	-	-	-	-	-	-
1-4	-	-	-	-	-	-	-	-	-
5-9	-	-	-	-	-	-	-	-	-
10-14	-	-	-	-	-	-	-	-	-
15-19	-	-	-	-	-	-	-	-	-
20-24	0.7	-	1.4	0.5	-	1.1	-	-	-
25-29	3.9	-	7.8	3.6	-	7.5	6.5	-	12.1
30-34	12.6	-	25.4	11.9	-	24.4	17.4	-	32.8
35-39	30.5	-	61.0	29.9	-	60.5	35.3	-	66.3
40-44	61.1	-	121.1	61.2	-	122.7	64.0	-	120.0
45-49	100.9	0.9	198.1	102.2	0.9	203.3	99.5	-	184.3
50-54	135.0	1.4	263.5	137.9	1.4	272.1	128.7	-	236.7
55-59	171.8	2.5	333.1	176.5	2.4	346.0	155.6	-	282.3
60-64	200.9	3.8	380.6	208.0	4.0	398.8	179.0	-	318.6
65-69	234.0	3.8	430.1	244.2	3.9	453.8	205.9	-	357.9
70-74	269.9	5.4	476.1	281.5	5.5	499.8	239.0	-	393.6
75-79	296.1	6.0	499.0	309.7	5.8	521.7	260.4	-	415.8
80-84	302.9	9.0	477.8	315.7	9.0	496.9	257.7	-	385.0
85+	286.4	6.7	401.7	299.8	6.1	416.7	252.5	-	339.3

<sup>a</sup> SEER 9 areas. Rates are per 100,000 and are age-adjusted to the 2000 U.S. standard population by 5-year age groups, unless noted.

<sup>b</sup> SEER 9 areas. Rates are per 100,000 and are age-adjusted to the world standard population.

- Statistic not shown. Rate based on less than 25 cases for the time interval.

Table IV-4  
BREAST CANCER (Invasive)

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

	All Races			Whites			Blacks		
	Total	Males	Females	Total	Males	Females	Total	Males	Females
<u>AGE-ADJUSTED RATES</u>									
<u>YEAR OF DEATH:</u>									
1975	17.8	0.4	31.4	18.0	0.4	31.8	16.8	0.4	29.5
1976	18.1	0.4	31.8	18.2	0.4	32.2	17.6	0.6	30.5
1977	18.5	0.4	32.5	18.6	0.4	32.7	18.9	0.5	32.8
1978	18.0	0.4	31.7	18.1	0.3	31.9	18.6	0.6	32.1
1979	17.7	0.3	31.2	17.9	0.3	31.5	17.9	0.5	30.8
1980	18.0	0.3	31.7	18.1	0.3	31.9	18.4	0.4	31.7
1981	18.2	0.3	31.9	18.3	0.3	32.1	19.0	0.5	32.6
1982	18.4	0.3	32.2	18.4	0.3	32.3	19.7	0.6	33.7
1983	18.3	0.3	32.1	18.4	0.3	32.2	19.6	0.5	33.5
1984	18.8	0.3	32.9	18.8	0.3	32.9	21.0	0.5	35.9
1985	18.8	0.3	33.0	18.9	0.3	33.1	20.3	0.4	34.9
1986	18.8	0.3	32.9	18.8	0.3	32.9	20.7	0.4	35.4
1987	18.7	0.3	32.7	18.6	0.3	32.6	21.5	0.5	36.7
1988	19.0	0.3	33.2	18.9	0.3	33.1	22.3	0.9	37.8
1989	19.0	0.3	33.2	18.9	0.3	33.2	21.6	0.5	36.6
1990	18.9	0.3	33.1	18.8	0.3	33.0	22.5	0.5	38.0
1991	18.7	0.3	32.7	18.5	0.3	32.4	22.6	0.4	38.3
1992	18.1	0.3	31.6	17.9	0.3	31.4	21.9	0.4	37.1
1993	18.0	0.4	31.4	17.7	0.3	31.1	22.6	0.7	38.0
1994	17.7	0.4	30.9	17.4	0.3	30.6	22.4	0.6	37.7
1995	17.4	0.4	30.6	17.1	0.3	30.1	22.7	0.8	38.2
1996	16.8	0.3	29.5	16.5	0.3	29.0	22.1	0.7	37.1
1997	16.1	0.3	28.2	15.7	0.3	27.6	22.3	0.6	37.4
1998	15.7	0.3	27.5	15.3	0.3	27.0	21.1	0.6	35.5
1999	15.2	0.3	26.6	14.8	0.3	26.0	20.9	0.7	35.2
2000	15.3	0.4	26.7	14.9	0.4	26.3	20.6	0.6	34.6
<u>AGE-ADJUSTED RATES, 1996-2000</u>									
<u>AGE AT DEATH:</u>									
All ages	15.8	0.3	27.7	15.4	0.3	27.2	21.4	0.6	35.9
Under 65	7.5	0.1	14.5	7.1	0.1	13.8	12.0	0.2	21.8
65 and over	73.1	1.9	118.9	73.1	1.8	119.4	86.3	3.5	133.6
All ages (world std.) <sup>b</sup>	10.0	0.2	18.2	9.7	0.2	17.8	14.2	0.4	24.6
<u>AGE-SPECIFIC RATES, 1996-2000</u>									
<u>AGE AT DEATH:</u>									
<1	-	-	-	-	-	-	-	-	-
1-4	-	-	-	-	-	-	-	-	-
5-9	-	-	-	-	-	-	-	-	-
10-14	-	-	-	-	-	-	-	-	-
15-19	-	-	-	-	-	-	-	-	-
20-24	0.1	-	0.1	0.0	-	0.1	-	-	-
25-29	0.5	-	0.9	0.4	-	0.8	1.0	-	1.9
30-34	1.9	-	3.8	1.7	-	3.3	3.8	-	7.3
35-39	4.6	0.1	9.2	4.1	-	8.2	8.9	-	16.5
40-44	8.8	0.1	17.3	8.0	0.1	16.0	15.5	-	29.0
45-49	14.7	0.1	28.8	13.5	0.1	26.8	25.4	-	46.9
50-54	22.1	0.3	43.0	21.1	0.3	41.3	35.2	-	64.4
55-59	29.5	0.6	56.4	28.3	0.5	54.7	44.3	1.1	79.5
60-64	36.4	0.7	68.6	35.7	0.6	67.9	50.1	1.7	88.1
65-69	45.2	1.0	82.7	44.8	1.0	82.8	56.9	1.7	97.7
70-74	58.3	1.4	102.4	58.1	1.3	102.8	73.3	2.8	119.9
75-79	71.9	2.1	120.2	72.0	2.0	120.8	85.7	3.3	135.4
80-84	93.3	2.5	145.8	93.7	2.4	146.8	107.5	4.8	158.0
85+	143.9	4.1	199.4	144.9	3.9	200.7	154.3	7.7	209.6

<sup>a</sup> NCHS public use data file. Rates are per 100,000 and are age-adjusted to the 2000 U.S. standard population by 5-year age groups, unless noted.

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

- Statistic not shown. Rate based on less than 25 cases for the time interval.

Table IV-5  
FEMALE BREAST CANCER (Invasive)

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

	All Races, Females			White Females			Black Females		
	All	<50	50+	All	<50	50+	All	<50	50+
<u>SEER INCIDENCE RATES</u>									
YEAR OF DIAGNOSIS:									
1975	105.0	40.6	273.7	107.3	40.7	281.6	93.4	42.1	227.6
1976	101.9	40.0	264.0	104.8	40.9	272.2	85.2	38.0	208.6
1977	100.7	39.0	262.3	103.4	39.4	270.9	86.7	37.1	216.4
1978	100.5	38.7	262.4	103.5	39.2	272.0	86.0	39.9	206.8
1979	102.1	38.0	269.9	104.7	38.6	277.9	87.0	37.9	215.7
1980	102.1	37.7	270.6	104.9	38.2	279.5	89.6	37.9	225.1
1981	106.3	39.2	282.0	109.8	40.1	292.4	94.2	38.7	239.4
1982	106.4	40.5	279.1	109.9	41.2	289.7	93.5	37.9	239.0
1983	111.0	40.2	296.6	114.4	40.8	306.9	103.2	41.0	266.0
1984	115.8	42.3	308.2	119.8	43.1	320.5	101.5	44.4	251.1
1985	124.0	44.1	333.2	127.7	44.3	345.9	111.6	45.4	284.9
1986	126.7	44.4	342.3	130.2	45.1	353.2	114.6	45.1	296.6
1987	134.4	45.4	367.4	140.3	46.6	385.7	109.0	42.7	282.6
1988	131.2	44.0	359.5	136.2	44.9	375.1	118.5	43.1	316.0
1989	127.1	43.4	346.4	132.2	44.4	362.2	105.1	42.3	269.5
1990	131.6	45.5	356.9	136.1	45.4	373.5	118.2	48.9	299.7
1991	133.5	47.0	360.0	138.5	46.9	378.4	116.7	50.7	289.6
1992	131.8	43.4	363.5	135.5	43.6	376.1	122.8	46.3	323.0
1993	129.0	42.7	355.1	133.0	43.1	368.3	118.7	44.8	312.4
1994	130.6	42.2	361.9	135.3	42.5	378.3	121.7	47.4	316.3
1995	132.2	42.9	365.9	137.1	43.4	382.2	123.1	45.3	326.8
1996	133.2	43.3	368.4	137.4	43.7	382.8	122.8	43.6	330.3
1997	137.1	43.2	382.8	141.8	43.8	398.4	123.0	43.6	331.1
1998	140.3	44.9	390.2	145.4	45.1	408.0	120.0	45.4	315.4
1999	139.6	43.2	392.2	144.7	44.4	407.4	122.3	41.8	333.1
2000	135.1	43.2	375.5	140.9	43.4	396.0	116.3	45.3	302.2
1996-2000	137.1	43.6	381.9	142.0	44.1	398.6	120.8	43.9	322.1
<u>U.S. DEATH RATES</u>									
YEAR OF DEATH:									
1975	31.4	9.1	89.9	31.8	9.0	91.4	29.5	10.7	78.8
1976	31.8	8.7	92.2	32.2	8.6	93.8	30.5	10.2	83.5
1977	32.5	8.9	94.3	32.7	8.7	95.3	32.8	10.5	91.1
1978	31.7	8.7	92.1	31.9	8.5	93.3	32.1	11.4	86.5
1979	31.2	8.6	90.5	31.5	8.3	92.1	30.8	11.4	81.8
1980	31.7	8.6	92.2	31.9	8.4	93.6	31.7	10.8	86.3
1981	31.9	8.5	93.3	32.1	8.2	94.8	32.6	11.5	87.7
1982	32.2	8.4	94.4	32.3	8.2	95.5	33.7	11.2	92.8
1983	32.1	8.2	94.7	32.2	7.9	95.8	33.5	11.2	92.1
1984	32.9	8.6	96.6	32.9	8.2	97.5	35.9	12.5	97.2
1985	33.0	8.6	96.9	33.1	8.3	98.1	34.9	12.0	94.6
1986	32.9	8.6	96.3	32.9	8.3	97.5	35.4	12.9	94.6
1987	32.7	8.4	96.1	32.6	8.0	96.9	36.7	12.9	99.0
1988	33.2	8.4	98.2	33.1	8.0	98.8	37.8	12.7	103.4
1989	33.2	8.4	98.2	33.2	8.1	99.2	36.6	12.4	100.0
1990	33.1	8.3	98.1	33.0	8.0	98.5	38.0	12.0	106.1
1991	32.7	8.2	96.9	32.4	7.7	97.2	38.3	12.3	106.3
1992	31.6	7.8	94.2	31.4	7.4	94.5	37.1	12.0	102.7
1993	31.4	7.4	94.2	31.1	7.0	94.2	38.0	11.7	107.1
1994	30.9	7.4	92.6	30.6	6.9	92.5	37.7	11.7	105.9
1995	30.6	7.3	91.5	30.1	6.8	91.1	38.2	11.7	107.5
1996	29.5	6.9	88.5	29.0	6.4	88.3	37.1	11.7	103.6
1997	28.2	6.7	84.5	27.6	6.2	83.6	37.4	11.0	106.6
1998	27.5	6.3	83.1	27.0	5.8	82.5	35.5	10.6	100.7
1999	26.6	5.7	81.2	26.0	5.2	80.4	35.2	10.3	100.5
2000	26.7	5.9	81.3	26.3	5.4	80.9	34.6	10.0	98.9
1996-2000	27.7	6.3	83.7	27.2	5.8	83.1	35.9	10.7	102.0

<sup>a</sup> SEER 9 areas. Rates are per 100,000 and are age-adjusted to the 2000 U.S. standard population by 5-year age groups, unless noted.  
<sup>b</sup> NCHS public use data file. Rates are per 100,000 and are age-adjusted to the world standard population.  
 - Statistic not shown. Rate based on less than 25 cases for the time interval.

Table IV-6  
FEMALE BREAST CANCER (In Situ)SEER INCIDENCE RATES, AGE-ADJUSTED AND AGE-SPECIFIC RATES<sup>a</sup>, BY RACE AND SEX

	All Races, Females			White Females			Black Females		
	All	<50	50+	All	<50	50+	All	<50	50+
<u>SEER INCIDENCE RATES</u>									
YEAR OF DIAGNOSIS:									
1975	5.8	3.8	11.2	5.9	3.8	11.3	4.0	-	-
1976	5.3	2.7	12.0	5.4	2.9	11.8	-	-	-
1977	4.3	2.6	8.7	4.3	2.6	8.9	-	-	-
1978	4.4	2.3	9.8	4.5	2.5	10.0	-	-	-
1979	4.6	2.8	9.3	4.7	2.9	9.4	4.8	-	-
1980	4.9	3.0	9.7	5.0	3.1	10.2	3.7	-	-
1981	5.0	2.6	11.0	5.0	2.5	11.3	4.1	-	-
1982	5.3	2.7	12.0	5.3	2.7	12.2	5.7	-	13.3
1983	6.1	3.0	14.1	6.2	3.0	14.6	5.5	-	13.2
1984	8.6	4.8	18.6	9.2	5.2	19.6	6.4	-	16.8
1985	11.5	5.9	26.2	12.1	6.3	27.3	8.1	-	20.7
1986	13.6	6.7	31.7	14.3	7.2	33.0	9.2	5.1	20.1
1987	17.4	7.8	42.3	18.2	8.2	44.2	12.1	5.3	29.7
1988	17.6	8.2	42.2	18.1	8.5	43.1	16.2	7.4	39.3
1989	16.5	7.0	41.4	17.1	7.3	42.7	14.6	5.5	38.6
1990	19.1	8.4	47.1	19.9	8.8	49.1	15.1	5.5	40.0
1991	19.8	8.8	48.7	20.4	8.9	50.8	15.3	7.3	36.3
1992	21.5	9.0	54.0	22.2	9.2	56.1	19.0	6.8	50.9
1993	20.8	8.4	53.3	21.4	8.8	54.4	16.6	6.1	44.2
1994	22.3	8.8	57.9	22.9	9.1	59.1	20.0	7.2	53.7
1995	24.7	9.6	64.2	25.0	9.8	64.6	22.4	6.3	64.6
1996	25.5	9.9	66.3	26.0	9.8	68.3	22.2	7.6	60.4
1997	28.4	11.1	73.8	28.9	11.2	75.4	27.6	11.2	70.5
1998	32.7	11.9	87.1	33.6	12.2	89.5	29.3	10.4	78.7
1999	32.6	11.9	86.8	32.9	12.1	87.1	29.2	10.0	79.4
2000	32.7	11.7	87.7	33.5	12.3	89.1	29.3	7.8	85.7
1996-2000	30.4	11.3	80.6	31.0	11.5	82.0	27.6	9.4	75.4
	<u>All Races, Females</u>			<u>White Females</u>			<u>Black Females</u>		
<u>AGE-ADJUSTED RATES, 1996-2000</u>									
AGE AT DIAGNOSIS:									
All ages	30.4			31.0			27.6		
Under 65	23.3			23.8			19.8		
65 and over	79.9			80.7			82.1		
All ages (world std.) <sup>b</sup>	23.0			23.5			20.6		
<u>AGE-SPECIFIC RATES, 1996-2000</u>									
AGE AT DIAGNOSIS:									
<1	-			-			-		
1-4	-			-			-		
5-9	-			-			-		
10-14	-			-			-		
15-19	-			-			-		
20-24	-			-			-		
25-29	0.6			-			-		
30-34	3.1			3.0			3.5		
35-39	11.0			11.2			8.9		
40-44	33.4			34.7			26.5		
45-49	59.3			60.3			49.7		
50-54	75.4			77.6			59.8		
55-59	84.5			87.7			72.8		
60-64	86.2			86.6			81.7		
65-69	92.5			94.6			87.8		
70-74	92.0			93.5			90.0		
75-79	87.5			88.0			97.5		
80-84	64.8			63.7			71.6		
85+	31.2			30.6			38.7		

<sup>a</sup> SEER 9 areas. Rates are per 100,000 and are age-adjusted to the 2000 U.S. standard population by 5-year age groups, unless noted.

<sup>b</sup> SEER 9 areas. Rates are per 100,000 and are age-adjusted to the world standard population.

- Statistic not shown. Rate based on less than 25 cases for the time interval.

Table IV-7  
FEMALE BREAST CANCER (Invasive)

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

	All Races, Females			White Females			Black Females		
	All	<50	50+	All	<50	50+	All	<50	50+
<u>5-YR RELATIVE SURVIVAL RATES</u>									
YEAR OF DIAGNOSIS:									
1960-1963 <sup>a</sup>	-	-	-	63	-	-	46	-	-
1970-1973 <sup>a</sup>	-	-	-	68	-	-	51	-	-
1974-1976 <sup>b</sup>	74.7	76.4	74.1	75.3	77.4	74.6	63.2	64.3	62.5
1977-1979 <sup>b</sup>	74.7	75.8	74.4	75.5	76.8	75.0	63.1	65.3	61.8
1980-1982 <sup>b</sup>	76.3	77.1	76.1	77.1	77.9	76.9	65.8	68.8	64.1
1983-1985 <sup>b</sup>	78.1	77.3	78.3	79.2	79.0	79.3	63.5	63.3	63.6
1986-1988 <sup>b</sup>	82.8	80.1	83.8	83.9	81.5	84.7	69.2	67.3	70.2
1989-1991 <sup>b</sup>	84.9	82.6	85.8	86.1	84.5	86.8	71.1	69.1	72.4
1992-1999 <sup>b</sup>	86.6 <sup>c</sup>	84.5 <sup>c</sup>	87.5 <sup>c</sup>	87.9 <sup>c</sup>	86.3 <sup>c</sup>	88.5 <sup>c</sup>	73.5 <sup>c</sup>	71.1 <sup>c</sup>	75.1 <sup>c</sup>
1992-1999 <sup>b</sup>									
ALL STAGES	86.6	84.5	87.5	87.9	86.3	88.5	73.5	71.1	75.1
LOCALIZED	97.0	94.0	98.0	97.6	95.0	98.4	89.7	85.7	91.9
REGIONAL	78.7	78.7	78.7	80.3	80.8	80.2	66.0	66.3	65.7
DISTANT	23.3	30.1	21.0	24.6	32.6	22.2	15.2	19.5	13.0
UNSTAGED	56.0	64.4	53.6	56.3	68.3	53.2	52.0	49.1 <sup>d</sup>	53.6
<i>IN SITU</i> <sup>f</sup>	100.0	99.9	100.0	100.0	100.0	100.0	100.0	99.5	100.0
<u>STAGE DISTRIBUTION (%) 1992-1999<sup>b</sup></u>									
ALL STAGES									
Number of cases	116,587	28,845	87,742	99,078	22,955	76,123	9,801	3,453	6,348
Percent	100%	100%	100%	100%	100%	100%	100%	100%	100%
LOCALIZED	63	56	66	64	57	66	53	48	56
REGIONAL	29	37	26	28	37	26	34	41	31
DISTANT	6	5	6	5	5	6	9	8	9
UNSTAGED	3	2	3	2	2	3	4	3	4
<u>5-YR RELATIVE SURVIVAL RATES, 1992-1999<sup>b</sup></u>									
AGE AT DIAGNOSIS:									
<45	83.1	-	-	85.0	-	-	70.2	-	-
45-54	86.9	-	-	88.5	-	-	73.6	-	-
55-64	87.6	-	-	88.8	-	-	75.9	-	-
65-74	88.9	-	-	89.6	-	-	79.4	-	-
75+	85.8	-	-	86.7	-	-	67.4	-	-
Under 65	86.2	-	-	87.8	-	-	73.1	-	-
65 and over	87.7	-	-	88.5	-	-	74.9	-	-

<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. 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 into 2000.

<sup>c</sup> The difference in rates between 1974-1976 and 1992-1999 is statistically significant ( $p < .05$ ).

<sup>d</sup> The standard error of the survival rate is between 5 and 10 percentage points.

<sup>e</sup> The standard error of the survival rate is greater than 10 percentage points.

<sup>f</sup> *In situ* cases are not included in the All Stages group.

- Statistic could not be calculated.

Table IV-8  
 FEMALE BREAST CANCER (Invasive)  
 INCIDENCE, DEATH, AND SURVIVAL RATES<sup>c</sup>

By Year of Diagnosis/Death

All Races, Females

Year of Diagnosis/Death

	1975- 1979	1980- 1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Incidence																		
SEER <sup>a</sup>	102.1	108.4	124.0	126.7	134.4	131.2	127.1	131.6	133.5	131.8	129.0	130.6	132.2	133.2	137.1	140.3	139.6	135.1
Mortality																		
U.S. <sup>b</sup>	31.7	32.2	33.0	32.9	32.7	33.2	33.2	33.1	32.7	31.6	31.4	30.9	30.6	29.5	28.2	27.5	26.6	26.7
SEER <sup>a</sup>	32.5	32.3	33.5	32.5	33.2	33.4	33.2	31.8	32.5	31.0	30.3	29.2	30.3	29.3	27.8	27.3	25.8	25.4
Relative Survival Rates (SEER <sup>a</sup> )																		
1-year	94.7	95.5	95.9	96.3	96.8	96.8	97.0	97.0	97.3	97.4	97.2	97.6	97.3	97.1	97.5	97.7	97.6	
2-year	88.9	90.5	91.3	91.7	93.2	93.4	93.3	93.4	93.9	94.4	94.1	94.3	94.1	93.9	94.5	95.0		
3-year	83.4	85.1	86.3	87.0	89.2	90.0	90.0	89.8	90.2	91.1	90.9	91.1	91.4	91.1	92.1			
4-year	78.7	80.7	82.3	83.5	86.0	87.2	87.2	86.9	87.6	88.2	88.2	88.7	88.8	89.0				
5-year	74.9	76.9	78.8	80.5	83.2	84.6	84.7	84.7	85.3	85.9	85.9	86.6	86.6					
6-year	71.7	73.9	76.3	78.1	80.6	82.3	82.3	82.6	83.4	84.0	83.9	84.9						
7-year	68.9	71.0	74.1	75.8	78.3	80.4	80.6	80.6	81.6	82.3	82.1							
8-year	66.7	68.7	72.2	74.3	76.9	78.9	79.1	79.2	79.9	81.3								
9-year	64.6	66.7	70.2	72.6	75.0	77.1	77.7	77.8	78.4									
10-year	62.8	64.8	68.5	70.9	73.6	76.1	76.5	76.5										
11-year	61.2	62.9	67.1	69.7	71.9	74.8	75.4											
12-year	59.6	61.7	65.9	68.4	70.6	73.6												
13-year	58.5	60.5	65.0	67.2	69.3													
14-year	57.5	59.2	64.2	66.3														
15-year	56.3	58.3	63.0															
16-year	55.4	57.1																
17-year	54.4																	
18-year	53.6																	
19-year	52.8																	
20-year	52.1																	

<sup>a</sup> Rates are from the SEER 9 areas.

<sup>b</sup> Rates are from the NCHS public use data file.

<sup>c</sup> Incidence and death rates are per 100,000 and are age-adjusted to the 2000 U.S. standard population by 5-year age groups. Survival rates are relative rates expressed as percents.



Table IV-9  
 FEMALE BREAST CANCER (Under 50) (Invasive)

INCIDENCE, DEATH, AND SURVIVAL RATES<sup>c</sup>

By Year of Diagnosis/Death

All Races, Females

Year of Diagnosis/Death

	1975- 1979	1980- 1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	
Incidence																			
SEER <sup>a</sup>	39.3	40.0	44.1	44.4	45.4	44.0	43.4	45.5	47.0	43.4	42.7	42.2	42.9	43.3	43.2	44.9	43.2	43.2	
Mortality																			
U.S. <sup>b</sup>	8.8	8.4	8.6	8.6	8.4	8.4	8.4	8.3	8.2	7.8	7.4	7.4	7.3	6.9	6.7	6.3	5.7	5.9	
SEER <sup>a</sup>	8.7	8.2	8.2	8.5	8.2	8.1	7.7	8.1	8.0	6.8	7.1	6.4	7.0	6.6	6.3	5.6	5.3	5.6	
Relative Survival Rates (SEER <sup>a</sup> )																			
1-year	96.8	97.6	97.6	97.9	98.1	98.5	98.2	97.5	98.5	98.4	98.0	98.4	98.0	97.7	98.1	98.5	98.6		
2-year	90.9	91.5	91.8	92.2	92.6	93.8	93.1	93.0	93.9	94.6	94.2	93.5	93.7	93.7	94.7	95.0			
3-year	84.6	85.6	85.8	86.0	87.1	89.2	88.8	88.3	89.9	90.6	90.1	89.1	89.8	90.6	91.5				
4-year	80.0	81.0	81.2	82.0	83.0	85.6	85.0	84.8	86.6	86.2	87.0	85.9	86.4	87.9					
5-year	76.1	77.1	77.9	78.3	79.5	82.3	82.1	82.1	83.7	83.5	84.5	83.5	83.6						
6-year	73.2	74.1	75.6	75.7	77.0	80.2	79.7	79.8	81.4	81.4	82.7	81.4							
7-year	70.7	71.5	73.4	73.0	74.6	78.2	77.9	78.2	79.2	79.8	80.8								
8-year	68.7	69.2	71.6	71.2	73.0	76.3	76.4	76.2	77.6	78.1									
9-year	66.8	67.4	69.7	70.1	71.0	74.9	74.7	75.0	76.6										
10-year	65.3	65.9	68.5	68.9	69.5	73.6	73.8	73.7											
11-year	63.9	64.5	67.6	67.8	67.9	72.4	72.7												
12-year	62.4	63.5	66.4	66.5	66.4	71.8													
13-year	61.3	62.4	65.4	65.5	65.4														
14-year	60.6	61.2	64.6	64.6															
15-year	59.7	60.4	63.5																
16-year	59.0	59.6																	
17-year	58.4																		
18-year	57.8																		
19-year	57.1																		
20-year	56.3																		

<sup>a</sup> Rates are from the SEER 9 areas.

<sup>b</sup> Rates are from the NCHS public use data file.

<sup>c</sup> Incidence and death rates are per 100,000 and are age-adjusted to the 2000 U.S. standard population by 5-year age groups. Survival rates are relative rates expressed as percents.

Table IV-10  
 FEMALE BREAST CANCER (50 and Over) (Invasive)

INCIDENCE, DEATH, AND SURVIVAL RATES<sup>c</sup>

By Year of Diagnosis/Death

All Races, Females

Year of Diagnosis/Death

	1975- 1979	1980- 1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	
Incidence																			
SEER <sup>a</sup>	266.5	287.5	333.2	342.3	367.4	359.5	346.4	356.9	360.0	363.5	355.1	361.9	365.9	368.4	382.8	390.2	392.2	375.5	
Mortality																			
U.S. <sup>b</sup>	91.8	94.3	96.9	96.3	96.1	98.2	98.2	98.1	96.9	94.2	94.2	92.6	91.5	88.5	84.5	83.1	81.2	81.3	
SEER <sup>a</sup>	94.9	95.5	99.8	95.2	98.9	99.8	99.8	93.6	96.5	94.4	91.2	89.1	91.3	88.8	84.1	84.2	79.4	77.3	
Relative Survival Rates (SEER <sup>a</sup> )																			
1-year	94.0	94.9	95.4	95.8	96.5	96.3	96.7	96.8	96.9	97.1	96.9	97.3	97.0	96.9	97.4	97.4	97.2		
2-year	88.3	90.2	91.1	91.5	93.4	93.2	93.4	93.5	93.9	94.3	94.1	94.6	94.2	93.9	94.5	95.0			
3-year	82.9	84.9	86.5	87.4	89.8	90.3	90.4	90.4	90.3	91.3	91.3	91.8	92.0	91.3	92.3				
4-year	78.2	80.7	82.7	84.0	87.0	87.7	88.0	87.7	88.0	88.9	88.7	89.7	89.8	89.5					
5-year	74.5	76.9	79.1	81.2	84.5	85.4	85.6	85.7	86.0	86.8	86.4	87.8	87.8						
6-year	71.2	73.8	76.6	79.0	81.8	83.1	83.3	83.7	84.2	85.1	84.4	86.3							
7-year	68.3	70.9	74.4	76.9	79.7	81.3	81.7	81.7	82.6	83.4	82.8								
8-year	66.0	68.6	72.5	75.5	78.4	80.0	80.3	80.6	81.0	82.7									
9-year	63.7	66.5	70.5	73.7	76.7	78.2	79.1	79.2	79.3										
10-year	61.8	64.4	68.6	71.9	75.5	77.3	77.9	78.1											
11-year	60.1	62.4	66.9	70.7	73.8	76.1	76.9												
12-year	58.4	61.0	65.9	69.4	72.7	74.7													
13-year	57.2	59.9	65.1	68.3	71.4														
14-year	56.1	58.5	64.3	67.5															
15-year	54.8	57.6	63.2																
16-year	53.7	56.2																	
17-year	52.5																		
18-year	51.6																		
19-year	50.6																		
20-year	49.9																		

<sup>a</sup> Rates are from the SEER 9 areas.

<sup>b</sup> Rates are from the NCHS public use data file.

<sup>c</sup> Incidence and death rates are per 100,000 and are age-adjusted to the 2000 U.S. standard population by 5-year age groups. Survival rates are relative rates expressed as percents.

Table IV-11  
BREAST CANCER (Invasive)

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 (12 SEER Areas) With Cancer and  
 Lifetime Risk (Percent) of Dying (Total U.S.) From Cancer

1998-2000

All Races

Current Age	Males				Females			
	+10 yrs	+20 yrs	+30 yrs	Eventually	+10 yrs	+20 yrs	+30 yrs	Eventually
0	0.00	0.00	0.00	0.11	0.00	0.00	0.05	13.51
10	0.00	0.00	0.00	0.12	0.00	0.05	0.44	13.71
20	0.00	0.00	0.01	0.12	0.05	0.44	1.87	13.74
30	0.00	0.01	0.02	0.12	0.40	1.83	4.49	13.76
40	0.00	0.02	0.05	0.12	1.45	4.14	7.59	13.52
50	0.02	0.05	0.08	0.12	2.78	6.34	9.82	12.45
60	0.04	0.07	0.10	0.11	3.81	7.53	9.81	10.36

Lifetime Risk of Being Diagnosed = 0.11%  
 Lifetime Risk of Dying = 0.03%

Lifetime Risk of Being Diagnosed = 13.51%  
 Lifetime Risk of Dying = 3.03%

Whites

Current Age	Males				Females			
	+10 yrs	+20 yrs	+30 yrs	Eventually	+10 yrs	+20 yrs	+30 yrs	Eventually
0	0.00	0.00	0.00	0.12	0.00	0.00	0.04	14.28
10	0.00	0.00	0.00	0.12	0.00	0.04	0.44	14.46
20	0.00	0.00	0.01	0.12	0.04	0.43	1.89	14.49
30	0.00	0.01	0.02	0.12	0.39	1.86	4.64	14.51
40	0.00	0.02	0.06	0.12	1.48	4.29	7.98	14.26
50	0.02	0.05	0.09	0.12	2.90	6.70	10.42	13.17
60	0.04	0.08	0.11	0.11	4.06	8.05	10.44	10.98

Lifetime Risk of Being Diagnosed = 0.12%  
 Lifetime Risk of Dying = 0.03%

Lifetime Risk of Being Diagnosed = 14.28%  
 Lifetime Risk of Dying = 3.03%

Blacks

Current Age	Males				Females			
	+10 yrs	+20 yrs	+30 yrs	Eventually	+10 yrs	+20 yrs	+30 yrs	Eventually
0	0.00	0.00	0.00	0.14	0.00	0.00	0.07	10.14
10	0.00	0.00	0.00	0.14	0.00	0.07	0.51	10.44
20	0.00	0.00	0.01	0.14	0.07	0.51	1.86	10.47
30	0.00	0.01	0.04	0.15	0.44	1.80	4.06	10.49
40	0.01	0.04	0.08	0.15	1.39	3.70	6.34	10.25
50	0.04	0.08	0.12	0.15	2.43	5.21	7.66	9.33
60	0.05	0.09	0.11	0.14	3.09	5.80	7.26	7.65

Lifetime Risk of Being Diagnosed = 0.14%  
 Lifetime Risk of Dying = 0.04%

Lifetime Risk of Being Diagnosed = 10.14%  
 Lifetime Risk of Dying = 3.24%

Table IV-12  
 FEMALE BREAST CANCER (Invasive)

AGE-ADJUSTED SEER INCIDENCE AND U.S. DEATH RATES

By Race/Ethnicity and Sex

Incidence<sup>a</sup>

RACE/ETHNICITY	Rate 1996-2000	Trend 1992-2000
	Rate per 100,000 persons	APC (%)
	Females	Females
All Races	135.0	0.8 <sup>d</sup>
White	140.8	0.9 <sup>d</sup>
White Hispanic <sup>b</sup>	92.7	1.1
White Non-Hispanic <sup>b</sup>	148.3	1.1 <sup>d</sup>
Black	121.7	0.2
Asian/Pacific Islander	97.2	2.1 <sup>d</sup>
Amer Ind/Alaska Nat	58.0	-3.7 <sup>d</sup>
Hispanic <sup>b</sup>	89.8	1.3 <sup>d</sup>

Mortality<sup>c</sup>

RACE/ETHNICITY	Rate 1996-2000	Trend 1992-2000
	Rate per 100,000 persons	APC (%)
	Females	Females
All Races	27.7	-2.4 <sup>d</sup>
White	27.2	-2.6 <sup>d</sup>
White Hispanic <sup>b</sup>	18.3	-1.5 <sup>d</sup>
White Non-Hispanic <sup>b</sup>	27.4	-2.5 <sup>d</sup>
Black	35.9	-1.1 <sup>d</sup>
Asian/Pacific Islander	12.5	-1.1
Amer Ind/Alaska Nat	14.9	-0.6
Hispanic <sup>b</sup>	17.9	-1.4 <sup>d</sup>

The APC is the Annual Percent Change over the time interval.

- Statistic not shown. Rate based on less than 25 cases for the time interval. Trend based on less than 10 cases for at least one year within the time interval.

<sup>a</sup> Incidence data are from the 12 SEER areas (San Francisco, Connecticut, Detroit, Hawaii, Iowa, New Mexico, Seattle, Utah, Atlanta, San Jose-Monterey, Los Angeles, and Alaska Native Registry).

<sup>b</sup> 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 do not include cases from Detroit, Hawaii and Alaska Native Registry. For mortality, information is included for all states except Connecticut, Oklahoma, New York, and New Hampshire.

<sup>c</sup> Mortality data are analyzed from a public use file provided by the National Center for Health Statistics (NCHS).

<sup>d</sup> The APC is significantly different from zero (p<.05).

Table IV-13  
 FEMALE BREAST CANCER (*In Situ*)

AGE-ADJUSTED SEER INCIDENCE

By Race/Ethnicity and Sex

Incidence<sup>a</sup>

RACE/ETHNICITY	Rate 1996-2000	Trend 1992-2000
	Rate per 100,000 persons	APC (%)
	<u>Females</u>	<u>Females</u>
All Races	28.7	6.6 <sup>c</sup>
White	29.6	6.5 <sup>c</sup>
White Hispanic <sup>b</sup>	16.1	7.0 <sup>c</sup>
White Non-Hispanic <sup>b</sup>	30.6	6.4 <sup>c</sup>
Black	25.8	7.3 <sup>c</sup>
Asian/Pacific Islander	23.2	8.4 <sup>c</sup>
Amer Ind/Alaska Nat	9.6	-
Hispanic <sup>b</sup>	15.7	7.4 <sup>c</sup>

- The APC is the Annual Percent Change over the time interval. Statistic not shown. Rate based on less than 25 cases for the time interval. Trend based on less than 10 cases for at least one year within the time interval.

<sup>a</sup> Incidence data are from the 12 SEER areas (San Francisco, Connecticut, Detroit, Hawaii, Iowa, New Mexico, Seattle, Utah, Atlanta, San Jose-Monterey, Los Angeles, and Alaska Native Registry).

<sup>b</sup> 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 do not include cases from Detroit, Hawaii and Alaska Native Registry. For mortality, information is included for all states except Connecticut, Oklahoma, New York, and New Hampshire.

<sup>c</sup> The APC is significantly different from zero ( $p < .05$ ).

Table IV-14  
FEMALE BREAST CANCER (Invasive)

AGE-ADJUSTED SEER INCIDENCE RATES<sup>a</sup> AND SEER DEATH RATES<sup>b</sup>  
 By Registry, Race and Age

	All Races, Females			White Females			Black Females		
	All	<50	50+	All	<50	50+	All	<50	50+
<u>SEER INCIDENCE RATES<sup>a</sup>, 1996-2000</u>									
REGISTRY									
12 registries	135.0	42.8	376.5	140.8	43.3	396.2	121.7	43.4	326.6
11 registries	135.0	42.8	376.5	140.8	43.3	396.2	121.7	43.4	326.6
9 registries	137.1	43.6	381.9	142.0	44.1	398.6	120.8	43.9	322.1
San Francisco-Oakland	143.0	46.9	394.6	159.4	49.7	446.5	118.5	44.0	313.5
Connecticut	143.1	46.5	396.0	144.3	47.0	399.3	115.7	39.5	315.2
Metropolitan Detroit	136.1	43.8	378.0	140.2	44.1	391.7	123.9	43.3	335.1
Hawaii	131.1	45.2	356.1	152.1	50.6	417.6	-	-	-
Iowa	130.4	40.5	365.8	130.5	40.4	366.6	128.8	46.4	344.6
New Mexico	116.9	39.1	320.6	122.3	41.3	334.6	94.4	-	271.7
Seattle-Puget Sound	150.0	43.5	428.6	155.3	44.3	445.7	118.3	41.3	319.8
Utah	116.8	34.0	333.6	118.7	34.6	338.9	-	-	-
Metropolitan Atlanta	137.4	45.8	377.5	145.0	45.5	405.7	120.6	46.8	313.9
San Jose-Monterey	139.0	41.4	394.4	149.4	43.1	427.8	111.2	36.6	306.4
Los Angeles	127.4	40.8	354.3	134.2	40.9	378.7	124.5	42.2	339.8
<u>SEER DEATH RATES<sup>b</sup>, 1996-2000</u>									
REGISTRY									
12 registries	26.8	6.0	81.3	27.2	5.5	83.8	36.0	10.9	101.7
11 registries	26.8	6.0	81.3	27.2	5.5	83.8	36.0	10.9	101.6
9 registries	27.1	5.9	82.6	27.2	5.4	84.4	36.0	10.5	103.0
San Francisco-Oakland	26.6	6.2	80.0	29.0	5.7	90.0	35.1	12.0	95.6
Connecticut	27.8	5.7	85.7	27.5	5.5	85.2	33.1	8.2	98.5
Metropolitan Detroit	31.0	7.1	93.7	29.1	5.8	90.3	37.8	11.2	107.6
Hawaii	20.0	4.4	60.7	27.1	-	87.6	-	-	-
Iowa	26.5	5.3	82.3	26.4	5.2	82.0	37.4	-	113.0
New Mexico	25.4	6.6	74.7	26.1	7.0	76.3	40.2	-	-
Seattle-Puget Sound	26.1	5.0	81.4	26.5	4.9	83.0	39.4	10.9	114.0
Utah	23.7	4.9	73.0	23.8	4.9	73.1	-	-	-
Metropolitan Atlanta	29.1	6.6	87.9	27.2	4.8	85.7	35.1	10.1	100.6
San Jose-Monterey	24.7	4.9	76.5	27.2	5.1	85.2	28.0	-	-
Los Angeles	26.3	6.5	78.1	26.9	6.0	81.4	36.4	12.6	98.7

Note: San Jose-Monterey and Los Angeles are new SEER areas as of 1992 and their data are only used in tables where indicated.

<sup>a</sup> SEER 9 areas. Incidence rates are per 100,000 and are age-adjusted to the 2000 U.S. standard population by 5-year age groups.

<sup>b</sup> NCHS public use data file. Death rates are per 100,000 and are age-adjusted to the 2000 U.S. standard population by 5-year age groups.

- Statistic could not be calculated or populations are inadequate.

Table IV-15  
 FEMALE BREAST CANCER (*In Situ*)

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

	All Races, Females			White Females			Black Females		
	All	<50	50+	All	<50	50+	All	<50	50+
<u>SEER INCIDENCE RATES<sup>a</sup>, 1996-2000</u>									
REGISTRY									
12 registries	28.7	10.5	76.3	29.6	10.8	78.8	25.8	8.8	70.5
11 registries	28.7	10.5	76.3	29.6	10.8	78.8	25.8	8.8	70.5
9 registries	30.4	11.3	80.6	31.0	11.5	82.0	27.6	9.4	75.4
San Francisco-Oakland	31.4	11.9	82.4	32.6	11.6	87.6	23.6	8.7	62.6
Connecticut	37.1	15.6	93.4	37.3	15.6	94.2	28.8	12.3	72.0
Metropolitan Detroit	37.6	14.2	98.9	38.7	15.2	100.2	33.9	10.9	94.0
Hawaii	30.1	11.0	80.2	30.6	12.0	79.3	-	-	-
Iowa	22.4	8.1	59.8	22.7	8.3	60.3	-	-	-
New Mexico	20.4	7.3	54.5	21.6	7.9	57.3	-	-	-
Seattle-Puget Sound	31.8	11.0	86.4	32.7	11.4	88.5	25.3	-	69.6
Utah	21.0	6.8	58.4	21.4	6.9	59.4	-	-	-
Metropolitan Atlanta	28.5	9.9	77.2	31.6	11.0	85.5	22.0	8.2	58.3
San Jose-Monterey	30.0	10.8	80.2	31.5	11.1	84.7	24.8	-	-
Los Angeles	22.8	8.0	61.6	24.2	8.4	65.7	21.1	7.1	57.8

Note: San Jose-Monterey and Los Angeles are new SEER areas as of 1992 and their data are only used in tables where indicated.

<sup>a</sup> SEER 9 areas. Incidence rates are per 100,000 and are age-adjusted to the 2000 U.S. standard population by 5-year age groups.

- Statistic could not be calculated or populations are inadequate.

Table IV-16  
FEMALE BREAST CANCER (Invasive)

AVERAGE ANNUAL AGE-ADJUSTED CANCER DEATH<sup>a</sup> RATES BY STATE, 1996-2000

All Races, Females

State	Rate	SE	Rank	PD	State	Rate	SE	Rank	PD
TOTAL U.S.	27.7	0.06							
High Five States									
District of Columbia	37.6 <sup>bc</sup>	1.54	(01)	35.7					
New Jersey	31.3 <sup>bc</sup>	0.36	(02)	13.0					
Delaware	31.2 <sup>b</sup>	1.22	(03)	12.6					
Illinois	30.3 <sup>c</sup>	0.30	(04)	9.4					
Louisiana	30.2 <sup>c</sup>	0.51	(05)	9.0					
Low Five States									
South Dakota	25.0	1.09	(47)	-9.7					
Montana	24.9 <sup>b</sup>	1.00	(48)	-10.1					
Colorado	24.0 <sup>bc</sup>	0.50	(49)	-13.4					
Utah	23.7 <sup>bc</sup>	0.76	(50)	-14.4					
Hawaii	20.0 <sup>bc</sup>	0.80	(51)	-27.8					
Alabama	26.5	0.46	(34)	-4.3	Montana	24.9 <sup>b</sup>	1.00	(48)	-10.1
Alaska	25.2	1.74	(46)	-9.0	Nebraska	25.6	0.73	(42)	-7.6
Arizona	25.2 <sup>c</sup>	0.44	(45)	-9.0	Nevada	26.4	0.78	(36)	-4.7
Arkansas	25.4 <sup>c</sup>	0.58	(44)	-8.3	New Hampshire	28.1	0.93	(16)	1.4
California	26.5 <sup>c</sup>	0.18	(33)	-4.3	New Jersey	31.3 <sup>bc</sup>	0.36	(02)	13.0
Colorado	24.0 <sup>bc</sup>	0.50	(49)	-13.4	New Mexico	25.4	0.76	(43)	-8.3
Connecticut	27.8	0.53	(17)	0.4	New York	30.0 <sup>c</sup>	0.24	(06)	8.3
Delaware	31.2 <sup>b</sup>	1.22	(03)	12.6	North Carolina	27.0	0.36	(25)	-2.5
District of Columbia	37.6 <sup>bc</sup>	1.54	(01)	35.7	North Dakota	26.6	1.20	(30)	-4.0
Florida	25.6 <sup>c</sup>	0.23	(41)	-7.6	Ohio	29.8 <sup>c</sup>	0.30	(07)	7.6
Georgia	27.1	0.38	(24)	-2.2	Oklahoma	26.8	0.53	(26)	-3.2
Hawaii	20.0 <sup>bc</sup>	0.80	(51)	-27.8	Oregon	26.6	0.54	(29)	-4.0
Idaho	26.6	0.93	(28)	-4.0	Pennsylvania	29.6 <sup>c</sup>	0.28	(09)	6.9
Illinois	30.3 <sup>c</sup>	0.30	(04)	9.4	Rhode Island	29.3	0.97	(10)	5.8
Indiana	28.4	0.42	(14)	2.5	South Carolina	27.8	0.51	(18)	0.4
Iowa	26.5	0.55	(32)	-4.3	South Dakota	25.0	1.09	(47)	-9.7
Kansas	26.2	0.60	(38)	-5.4	Tennessee	27.3	0.42	(20)	-1.4
Kentucky	27.3	0.50	(21)	-1.4	Texas	26.1 <sup>c</sup>	0.24	(39)	-5.8
Louisiana	30.2 <sup>c</sup>	0.51	(05)	9.0	Utah	23.7 <sup>bc</sup>	0.76	(50)	-14.4
Maine	26.4	0.83	(35)	-4.7	Vermont	27.2	1.26	(22)	-1.8
Maryland	29.6 <sup>c</sup>	0.46	(08)	6.9	Virginia	28.6	0.40	(13)	3.2
Massachusetts	28.7	0.40	(11)	3.6	Washington	25.8 <sup>c</sup>	0.42	(40)	-6.9
Michigan	28.4	0.33	(15)	2.5	West Virginia	27.8	0.70	(19)	0.4
Minnesota	26.7	0.46	(27)	-3.6	Wisconsin	26.5	0.42	(31)	-4.3
Mississippi	28.6	0.62	(12)	3.2	Wyoming	26.3	1.46	(37)	-5.1
Missouri	27.2	0.41	(23)	-1.8					

<sup>a</sup> NCHS public use data file. Rates are per 100,000 and are age-adjusted to the 2000 U.S. standard population by 5-year age groups.

<sup>b</sup> Absolute percent difference between state rate and total U.S. rate is 10% or more.

<sup>c</sup> Difference between state rate and total U.S. rate is statistically significant ( $p \leq .0002$ ).

SE Standard error of the rate.

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



Table IV-17  
BREAST CANCER (Invasive)

Estimated United States Cancer Prevalence Counts<sup>a</sup> on January 1, 2000  
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	0 to <10	0 to <25	>=25 <sup>f</sup>	Complete <sup>g</sup>
<u>Race/Sex</u>									
All Races <sup>b</sup>	774,287	529,022	357,116	192,249	127,139	1,303,309	1,979,813	+	+
Males	4,591	2,707	1,714	930	487	7,298	10,429	+	+
Females	769,696	526,315	355,402	191,319	126,652	1,296,011	1,969,384	228,120	2,197,504
White <sup>b</sup>	682,617	475,623	325,741	175,439	117,057	1,158,240	1,776,477	+	+
Males	3,985	2,382	1,529	863	458	6,367	9,217	+	+
Females	678,632	473,241	324,212	174,576	116,599	1,151,873	1,767,260	212,145	1,979,405
Black <sup>b</sup>	64,797	38,575	23,047	12,512	7,251	103,372	146,182	+	+
Males	476	-	-	-	-	713	960	+	+
Females	64,321	38,338	22,887	12,451	7,225	102,659	145,222	14,350	159,572
Asian/Pacific Islander <sup>c</sup>	18,403	10,246	+	+	+	28,649	+	+	+
Males	70	55	+	+	+	125	+	+	+
Females	18,333	10,191	+	+	+	28,524	+	+	+
Hispanic <sup>d</sup>	32,491	19,602	+	+	+	52,093	+	+	+
Males	143	-	+	+	+	212	+	+	+
Females	32,348	19,533	+	+	+	51,881	+	+	+

Estimated prevalence percent<sup>a</sup> on January 1, 2000, of the SEER 11 population diagnosed in the previous 10 years  
By Age at Prevalence, Race/Ethnicity and Sex

Age at Prevalence	Age Specific (Crude)										Age-Adjusted <sup>e</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>	0.4150%	-	-	0.0055%	0.0744%	0.3810%	0.9432%	1.3844%	1.8618%	2.0733%	0.4559%
Males	0.0048%	-	-	-	-	0.0022%	0.0085%	0.0205%	0.0300%	0.0444%	0.0061%
Females	0.8150%	-	-	0.0113%	0.1503%	0.7530%	1.8320%	2.5879%	3.2275%	3.1290%	0.8278%
White <sup>c</sup>	0.4564%	-	-	0.0050%	0.0735%	0.3863%	0.9790%	1.4735%	1.9851%	2.1902%	0.4778%
Males	0.0050%	-	-	-	-	0.0023%	0.0076%	0.0211%	0.0305%	0.0452%	0.0061%
Females	0.9037%	-	-	0.0104%	0.1510%	0.7753%	1.9257%	2.7867%	3.4552%	3.2864%	0.8744%
Black <sup>c</sup>	0.2787%	-	-	0.0095%	0.0892%	0.3613%	0.8436%	1.1468%	1.4813%	1.6075%	0.3905%
Males	0.0046%	-	-	-	-	-	0.0178%	-	-	-	0.0082%
Females	0.5270%	-	-	0.0180%	0.1683%	0.6750%	1.5367%	2.0354%	2.4327%	2.3020%	0.6740%
Asian/Pacific Islander <sup>c</sup>	0.2803%	-	-	0.0054%	0.0650%	0.3582%	0.7525%	0.9437%	1.1177%	1.0866%	0.3206%
Males	0.0028%	-	-	-	-	-	-	-	-	-	0.0038%
Females	0.5408%	-	-	0.0106%	0.1260%	0.6770%	1.4169%	1.7012%	1.9495%	1.8276%	0.5826%
Hispanic <sup>d</sup>	0.1478%	-	-	0.0043%	0.0495%	0.2642%	0.6028%	0.8906%	1.2280%	1.3950%	0.3024%
Males	0.0011%	-	-	-	-	-	-	-	-	-	0.0035%
Females	0.3015%	-	-	0.0093%	0.1048%	0.5272%	1.1475%	1.6094%	2.0937%	2.1181%	0.5416%

<sup>a</sup> US 2000 cancer prevalence counts are based on 2000 cancer prevalence proportions from the SEER registries and 1/1/2000 US population estimates based on the average of 1999 and 2000 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 d) SEER 11 Areas excluding Hawaii and Detroit.

<sup>e</sup> Percentages are age-adjusted to the 2000 US standard population by 5-year age groups.

<sup>f g</sup> (f) Cases diagnosed 25 years or more ago were estimated using the completeness index method (Capocaccia et. al. 1997, Merrill et. al. 2000). (g) Complete prevalence is obtained by summing 0 to <25 with >=25.

- Statistics not shown. Rate based on less than 25 cases estimated alive for the time interval.

+ Not available.

# SEER Incidence, Delay Adjusted Incidence and US Death Rates+ Female Breast Cancer, by Race

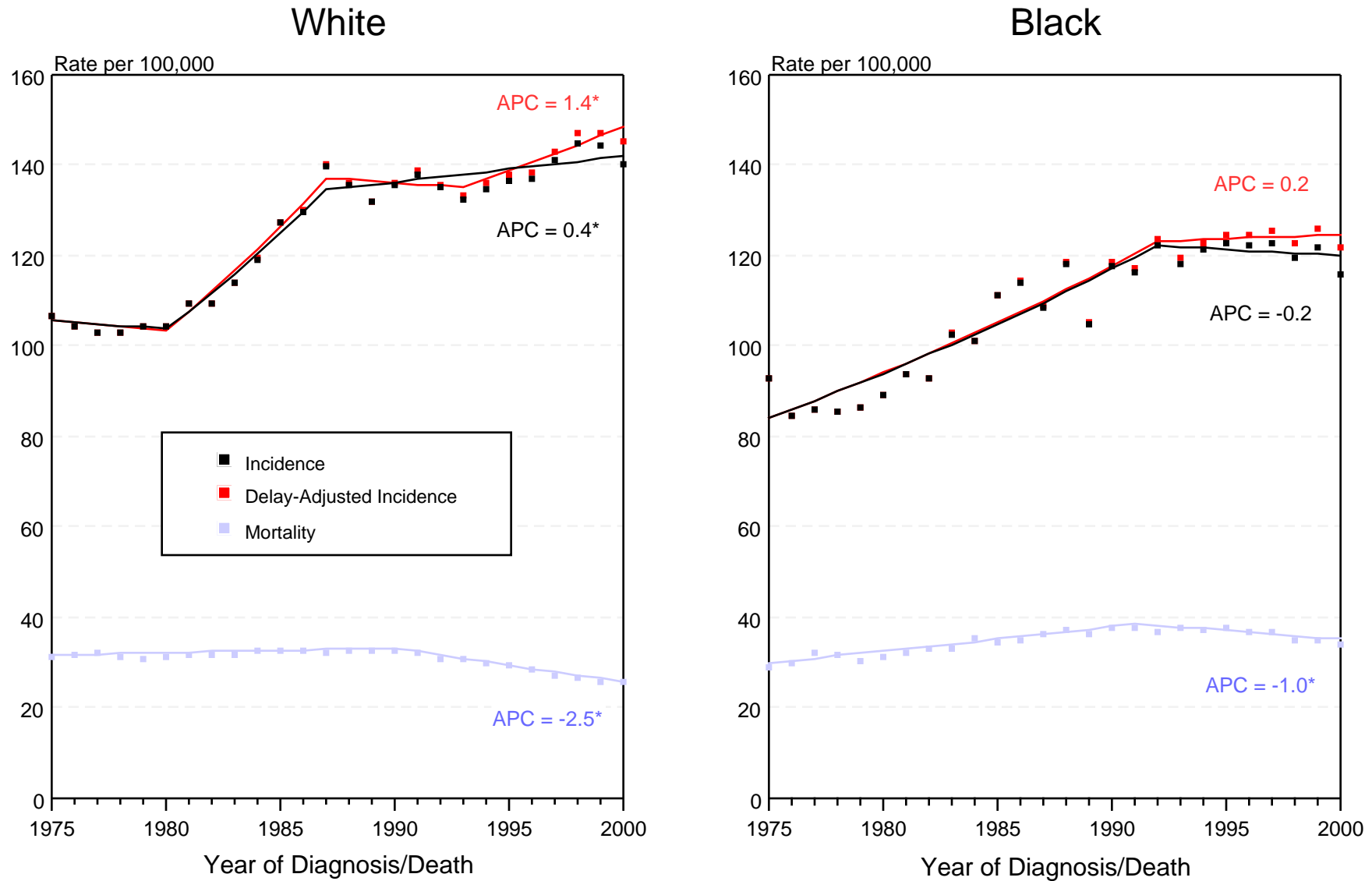


Figure IV-1

+ Source: SEER 9 areas and NCHS public use data file. Rates are age-adjusted to the 2000 US standard million population by 5-year age groups. Regression lines and APCs are calculated using the Joinpoint Regression Program. 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+ Female Breast Cancer, by Age and Race

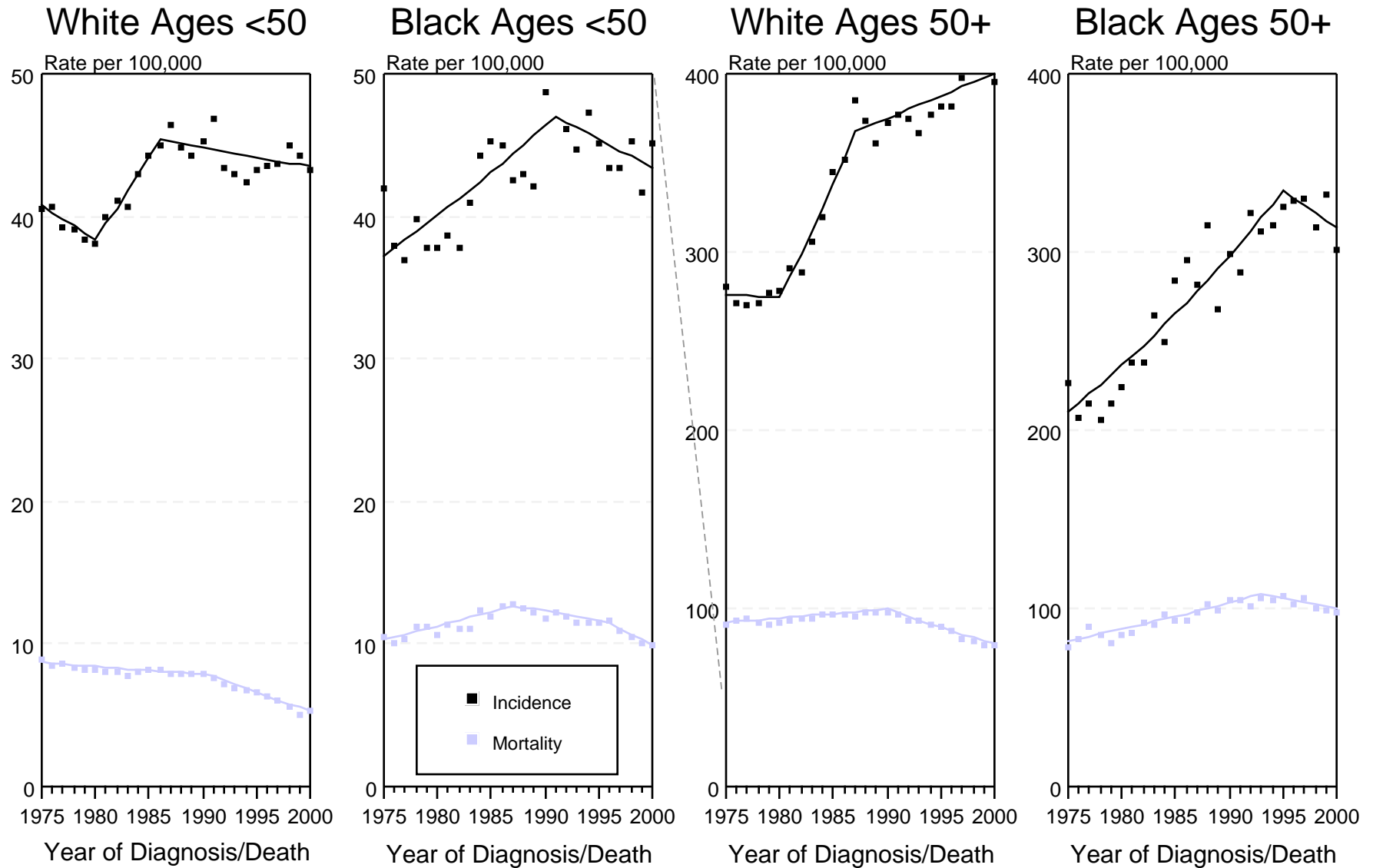


Figure IV-2

+ Source: SEER 9 areas and NCHS public use data file. Rates are age-adjusted to the 2000 US standard million population by 5-year age groups. Regression lines are calculated using the Joinpoint Regression Program.

# SEER Incidence and Delay Adjusted Incidence Rates+ Female Breast Cancer (*In Situ*), by Race

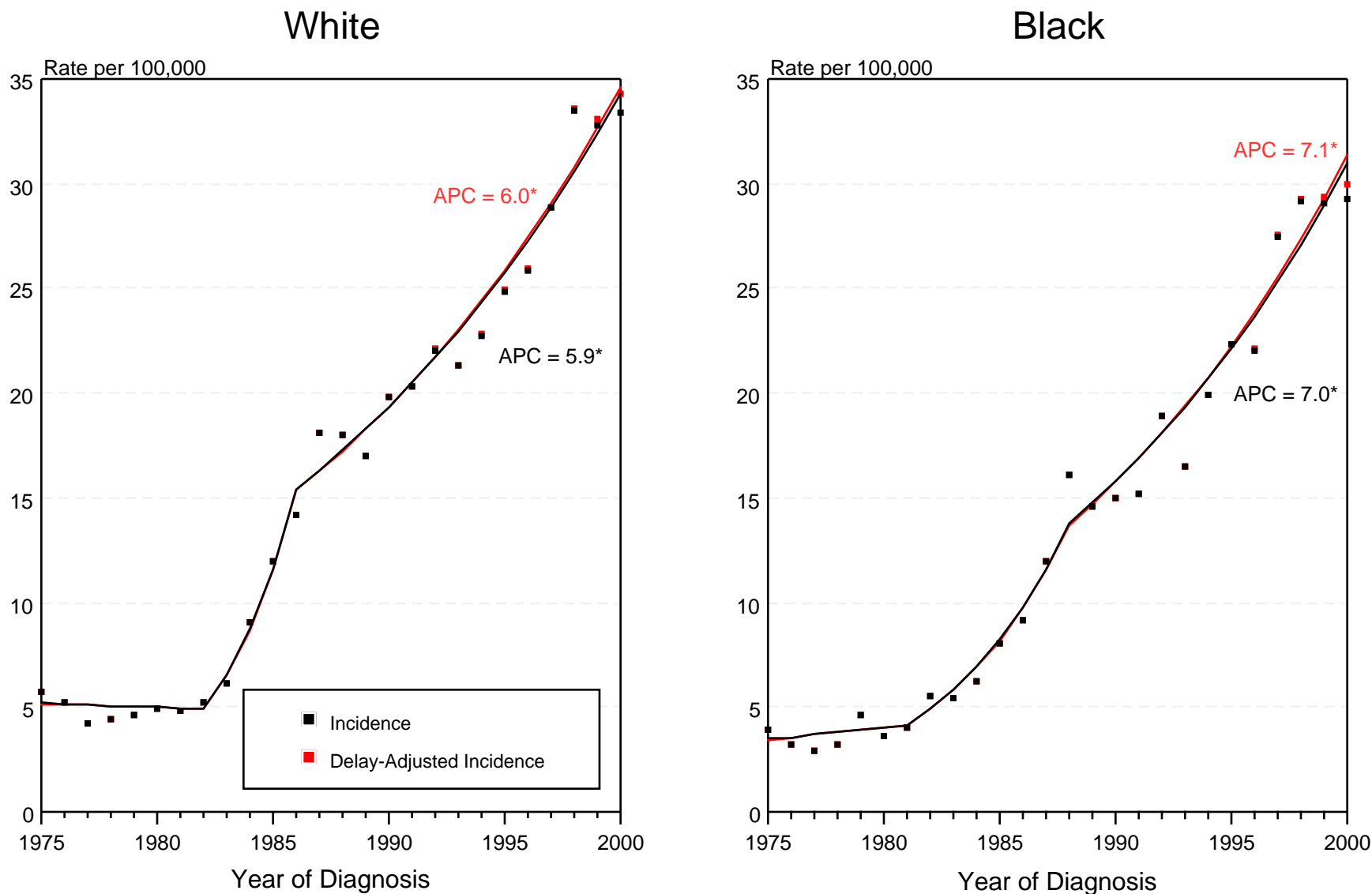


Figure IV-3

+ Source: SEER 9 areas. Rates are age-adjusted to the 2000 US standard million population by 5-year age groups. Regression lines and APCs are calculated using the Joinpoint Regression Program. 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 ( $p < 0.05$ ).

# Breast Cancer Incidence Rates, 1975-2000 by Age, *In Situ* vs Malignant All Races, Female

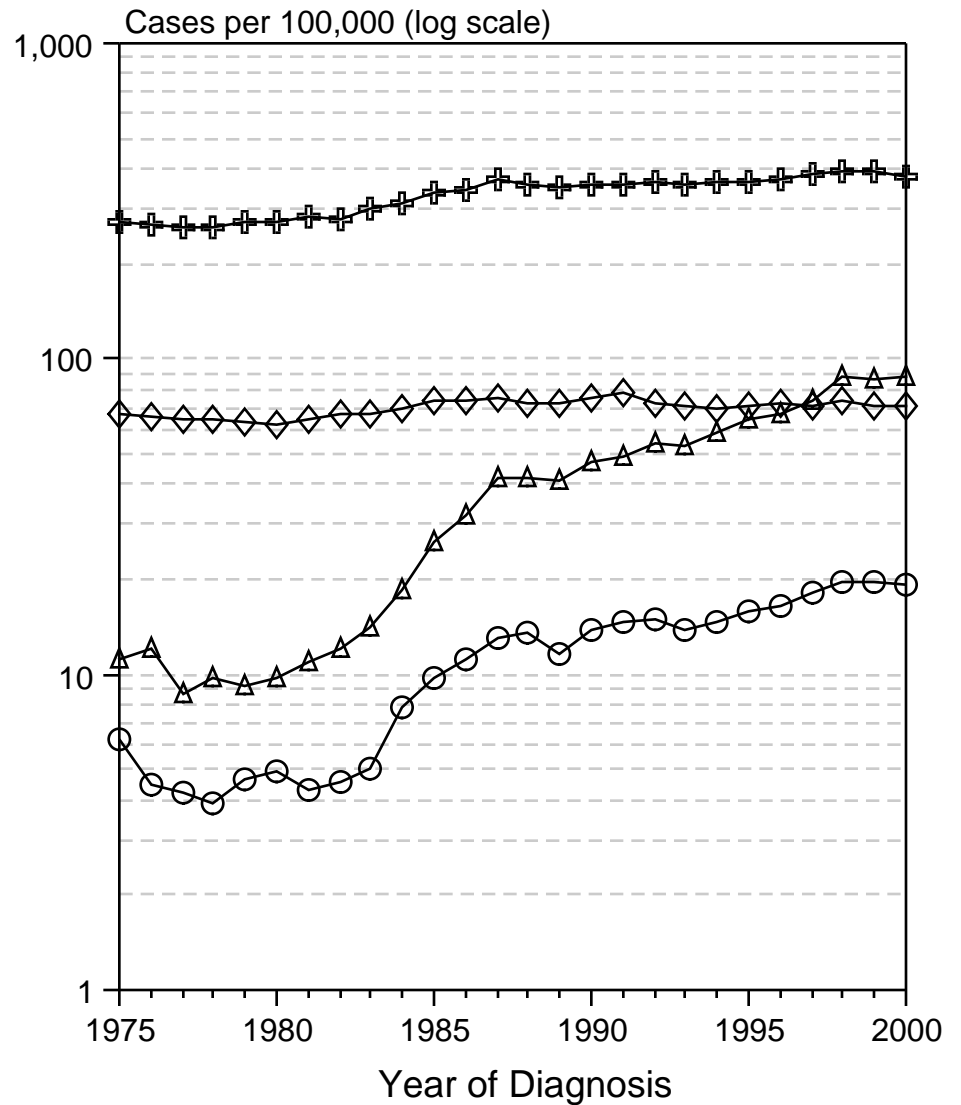
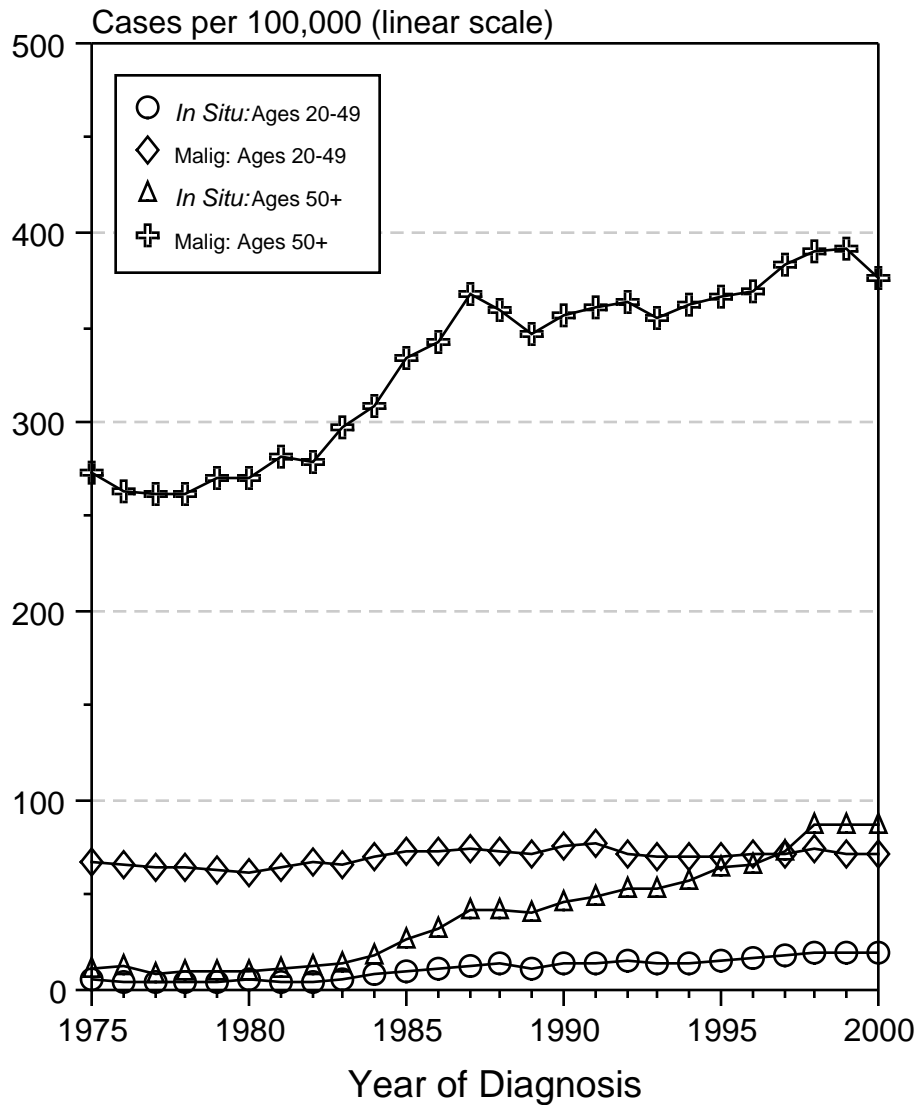


Figure IV-4

Source: SEER 9 areas. Rates are age-adjusted to 2000 US standard million population by 5-year age groups.

# Breast Cancer Incidence Rates, 1975-2000 by Age, *In Situ* vs Malignant White Female

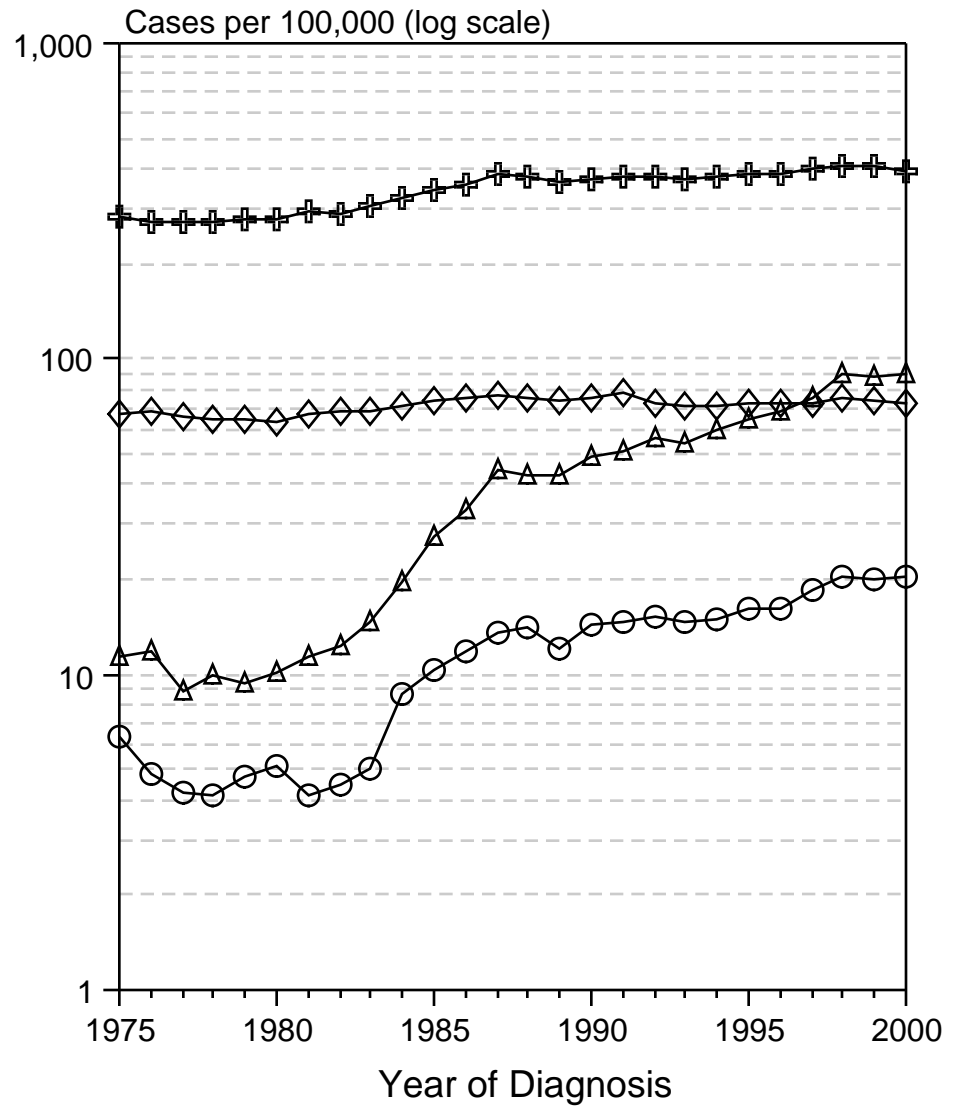
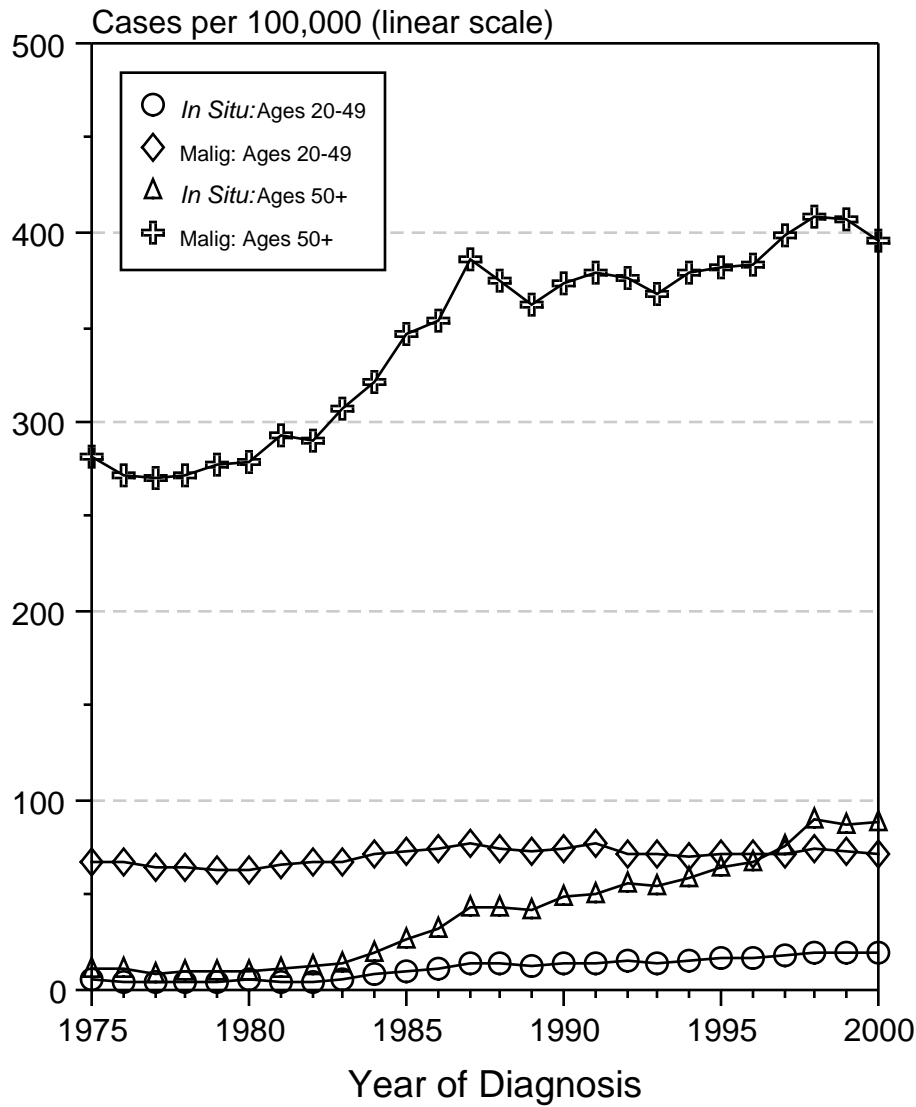


Figure IV-5

Source: SEER 9 areas. Rates are age-adjusted to 2000 US standard million population by 5-year age groups.

# Breast Cancer Incidence Rates, 1975-2000 by Age, *In Situ* vs Malignant Black Female

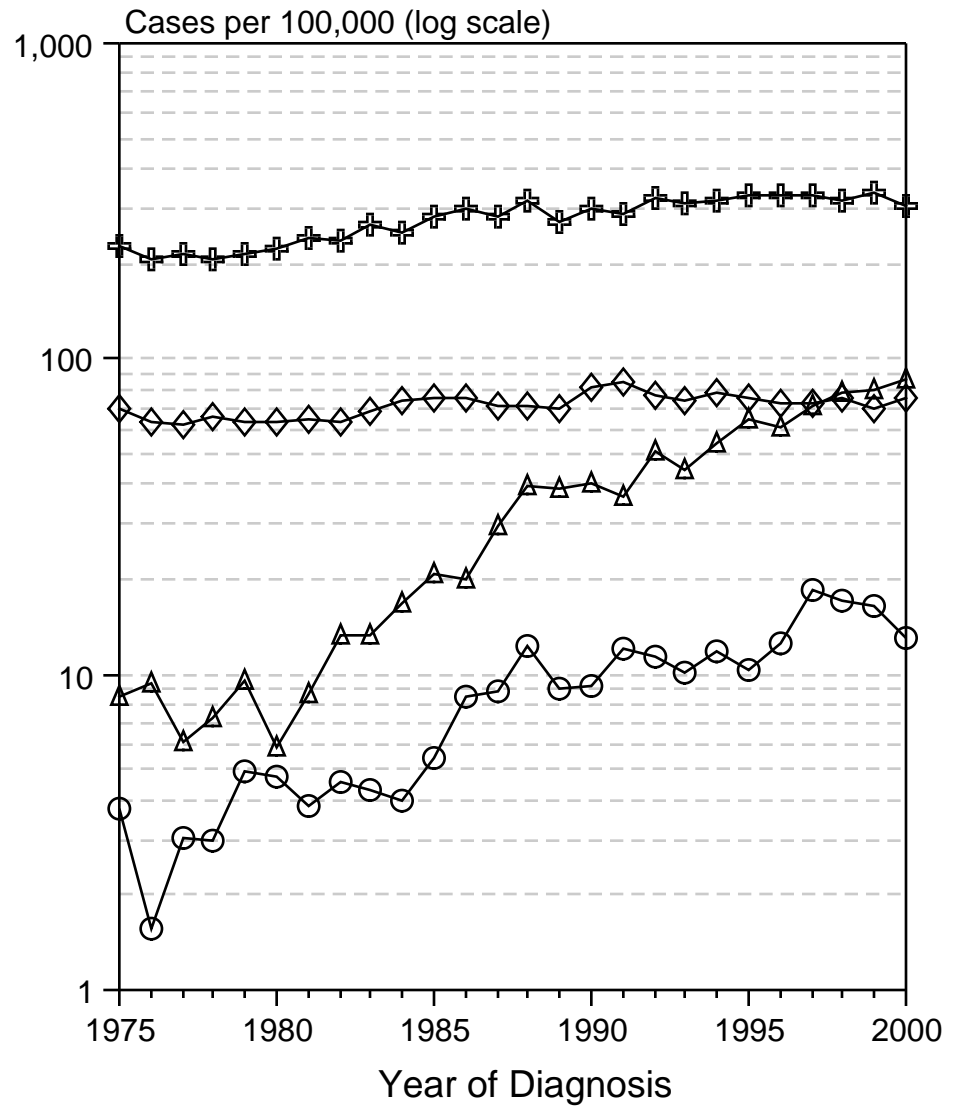
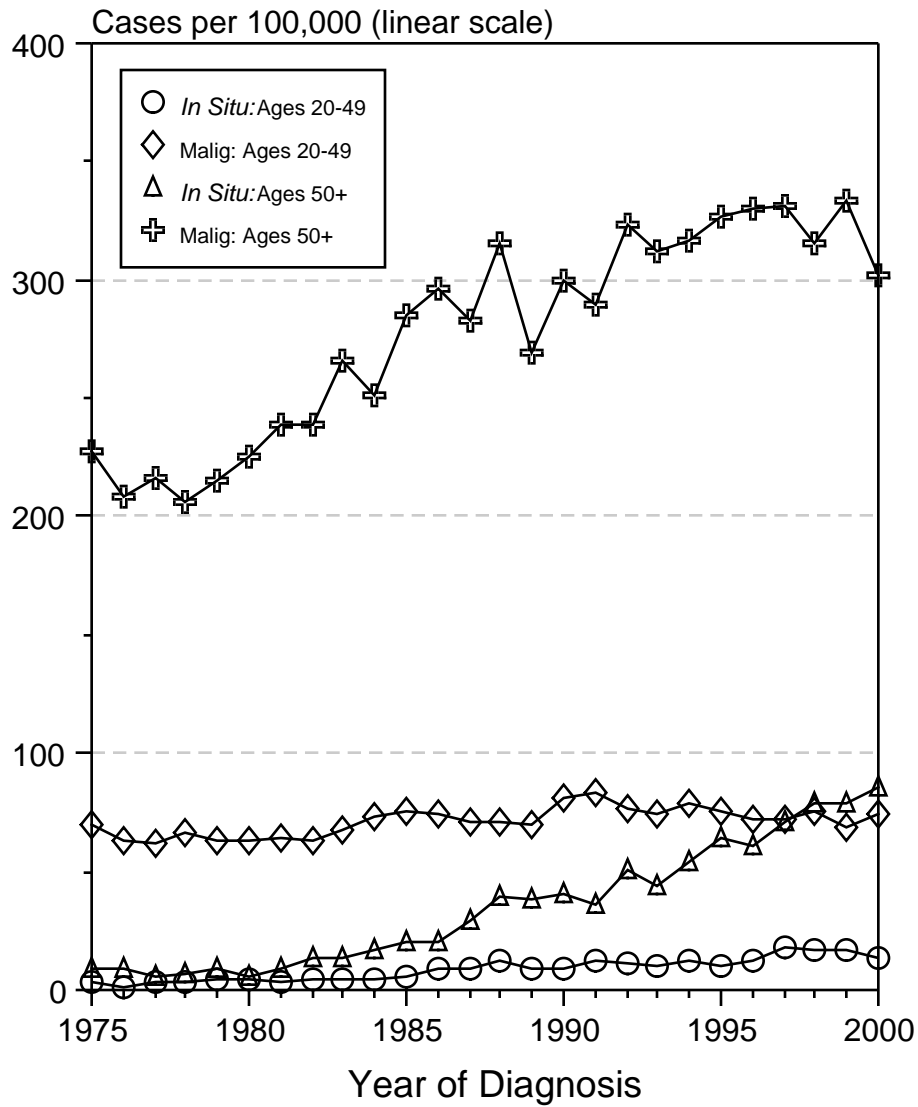
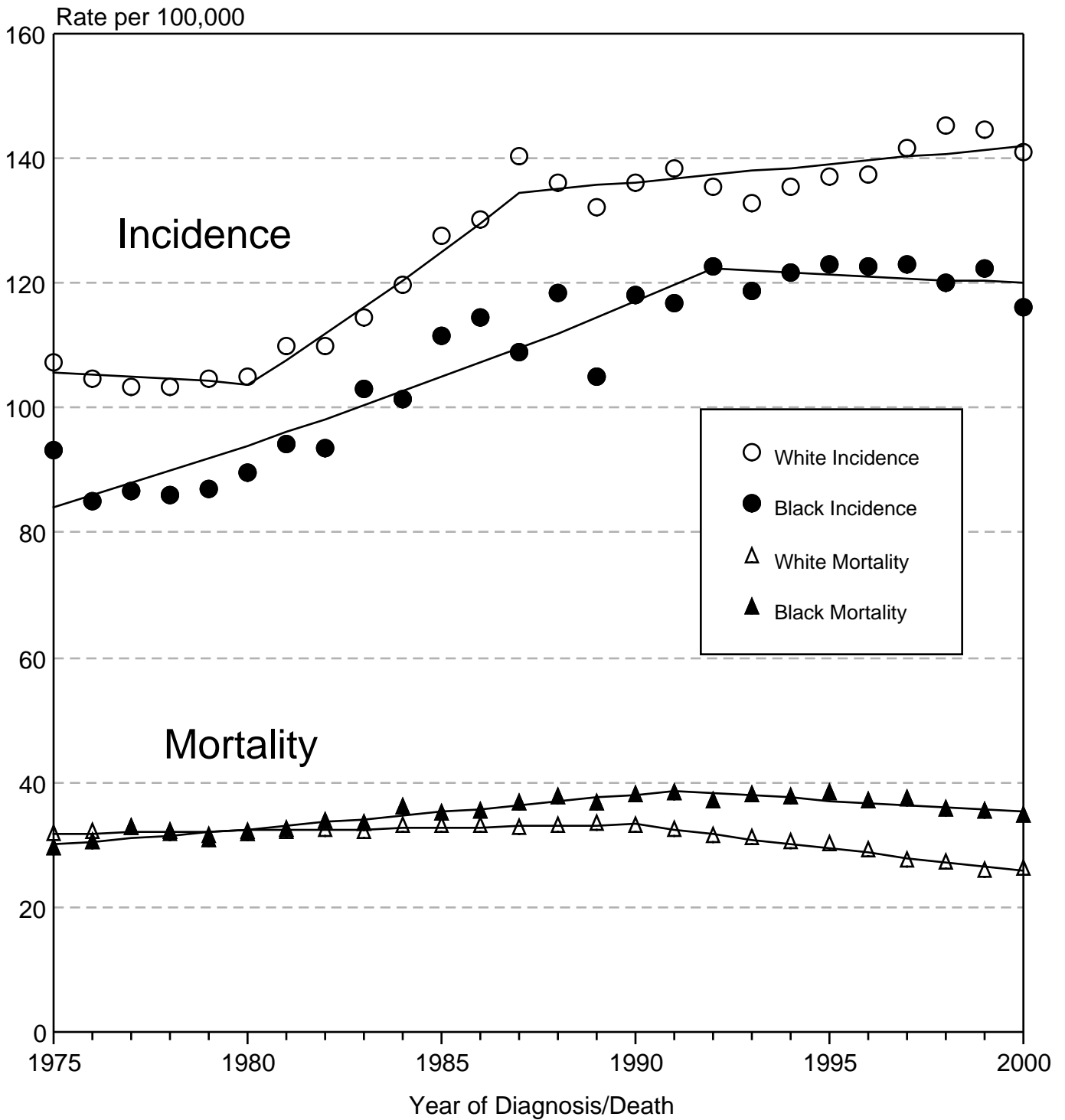


Figure IV-6

Source: SEER 9 areas. Rates are age-adjusted to 2000 US standard million population by 5-year age groups.

Figure IV-7

# Breast Cancer Incidence & Mortality White Females vs Black Females

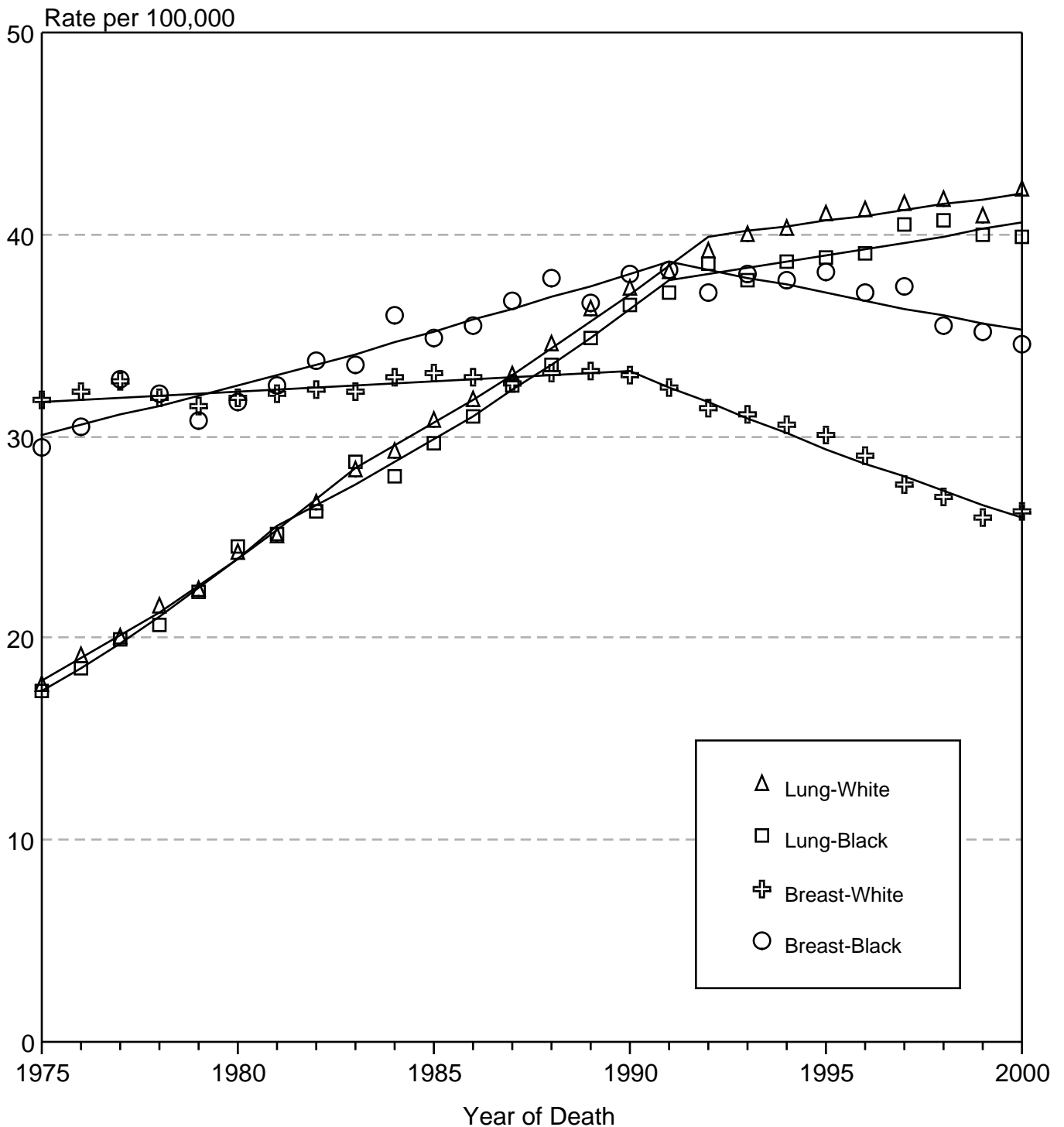


Source: NCHS public use data file. Rates are age-adjusted to the 2000 US standard million population by 5-year age groups. Regression lines are calculated using the Joinpoint Regression Program.



Figure IV-8

# Breast vs Lung Cancer Mortality White Females vs Black Females United States, 1975-2000



Source: NCHS public use data file. Rates are age-adjusted to the 2000 US standard million population by 5-year age groups. Regression lines are calculated using the Joinpoint Regression Program.