



Urinary bladder cancer in the Greater Bay Area

1988-2002

Spring 2005

Urinary bladder cancer is the fourth most common cancer in non-Hispanic white males, comprising 7% of all invasive cancers diagnosed in the Greater Bay Area. In 2002, approximately 1,100 cases were diagnosed and 241 deaths were due to bladder cancer in the Greater Bay Area. The greatest risk factor is smoking, with smokers twice as likely to be diagnosed with bladder cancer than nonsmokers.

INCIDENCE TRENDS

Incidence of bladder cancer is approximately three-times greater in males than females. During the period 1988 through 2002, males experienced a slight decline in the incidence, while rates for females have remained relatively stable (below, Figure 1).

Figure 1. Age-adjusted incidence rates for urinary bladder cancer by sex and year of diagnosis, Greater Bay Area, 1988-2002

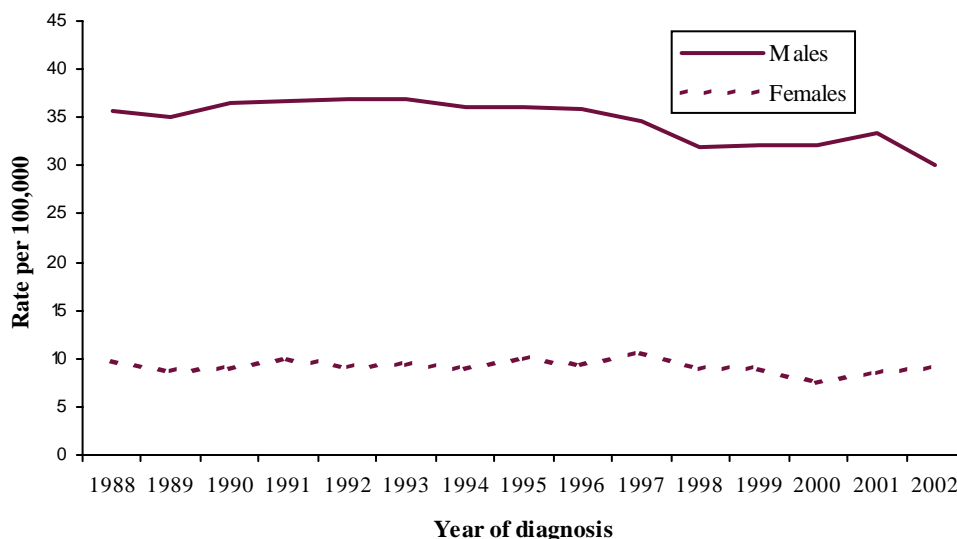


Figure 2. Age-adjusted incidence rates for urinary bladder cancer by sex and race/ethnicity, Greater Bay Area, 1988-2002



RACIAL/ETHNIC PATTERNS

Among males in the Greater Bay Area, non-Hispanic whites had rates twice as high as males in other racial/ethnic groups (right, Figure 2). Among females, there was much less variation across racial/ethnic groups, although rates were still highest in non-Hispanic whites and lowest in Asians/Pacific Islanders.



AGE-SPECIFIC INCIDENCE PATTERNS

Incidence of urinary bladder cancer increases sharply with age in males, particularly after age 60. In females, the increase with age occurs more gradually, peaking in the oldest age groups (right, Figure 3).

Figure 3. Incidence rates by sex and age group at diagnosis for urinary bladder, Greater Bay Area, 1988-2002

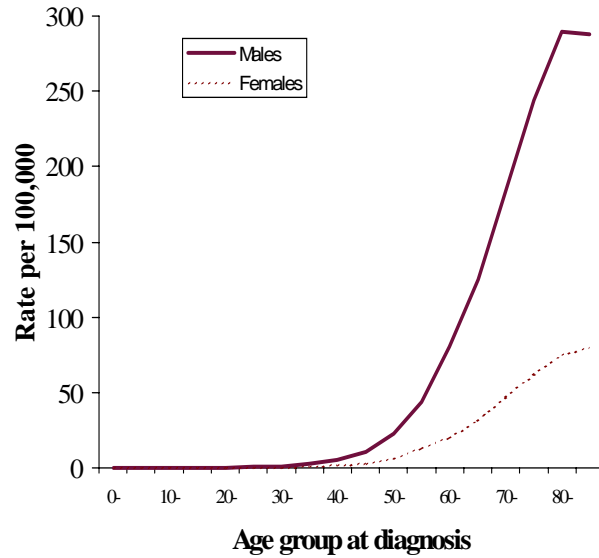
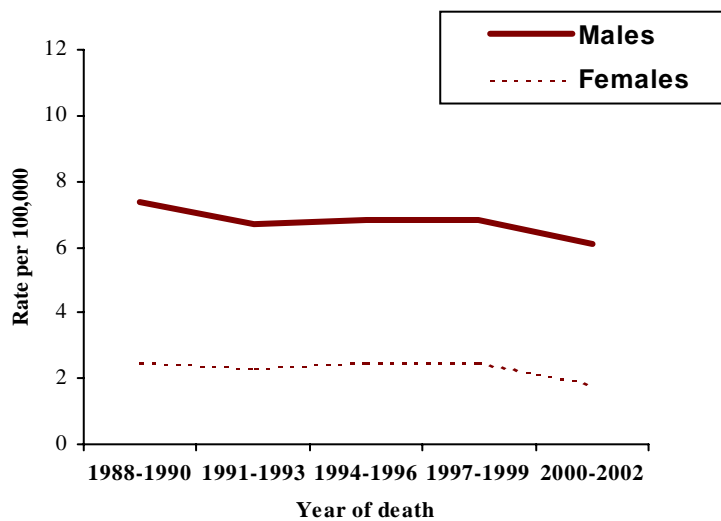


Figure 4. Trends in age-adjusted mortality rates by sex for urinary bladder cancer, Greater Bay Area, 1988-2002



TRENDS IN MORTALITY

Similar to trends observed in other tobacco-related cancers, bladder cancer mortality rates declined slightly in males while remaining relatively stable in females (left, Figure 4).

Technical Notes: Because age distributions vary by population, a standard statistical procedure called “age-adjustment” was used so that we can examine differences in cancer incidence and mortality rates due to factors other than age. Rates are age-adjusted (using the Year 2000 population standard) unless noted to be age-specific. Race/ethnicity was categorized as four mutually-exclusive racial/ethnic groups: non-Hispanic whites (whites), non-Hispanic blacks (blacks), Hispanics, and non-Hispanic Asians/Pacific Islanders (Asians/Pacific Islanders).

About the data: Cancer data have been collected in Alameda, Contra Costa, Marin, San Francisco, and San Mateo counties since 1973, and in Monterey, San Benito, Santa Clara, and Santa Cruz counties since 1988, forming two parts (Regions 1 and 8) of the California Cancer Registry. These counties, referred to as the Greater San Francisco Bay Area are also part of the National Cancer Institute’s Surveillance, Epidemiology, and End Results (SEER) registry program.

Founded in 1974, the mission of the Northern California Cancer Center is to reduce the burden of cancer through surveillance, epidemiology, prevention research and education. Essential to this mission is collaboration with partners in cancer research, education and the community.