Childhood Cancer

Relative to the prevalence of many forms of adult cancer, cancer in children is relatively rare. Although rare, childhood cancer remains the leading cause of death by disease among children in the US today. In the last decade, over 1,700 children and young adults under the age of 20 are diagnosed with cancer in California each year. Among these, over two-thirds are between 0–14 years. Fortunately, death rates for childhood cancer in California have declined by 62 percent over the past 40 years, from 7.2 (per 100,000) in 1970 to 2.3 in 2016. The reduction in childhood cancer mortality is largely due to advances in treatment and high rates of participation in clinical trials.

In the last five years, the most common types of cancer diagnosed in children and adolescents under the age of 20 years in California are leukemias, followed by brain and other central nervous system tumors, lymphomas, and other malignant epithelial neoplasms and melanomas, which together account for almost half (47 percent) of all cancers in California children and adolescents.
Average Annual Incidence of ALL, by Age and Race/Ethnicity

Lymphoid leukemias, specifically Acute Lymphoblastic Leukemia (ALL), is the most common childhood cancer. ALL is more frequently diagnosed among children less than four years of age compared to older children, and is less frequently diagnosed among African American children compared to children of other race/ethnic groups.

Five-Year Relative Survival in Children and Adolescents, by Diagnostic Category

In California, the five-year relative survival rate for children and adolescents diagnosed between 2007 and 2016 for all cancers combined was 83.3 percent. However, survival rates vary considerably depending on cancer type, patient age, sex, and other characteristics. For the most recent time period, the five-year survival rates among children and adolescents 0–19 years diagnosed with cancer of major categories include leukemia (83.7 percent), lymphomas (94.1 percent), retinoblastoma (97.3 percent), renal tumors (87.5 percent), germ cell tumors (92.4 percent), and brain and central nervous system tumors (71.0 percent). Fortunately, further advancements made towards the treatment of childhood cancers have helped to increase survival rates of many forms of childhood cancer over the last 30 years.

Risk Factors

Certain factors have been shown to be associated with an increased risk of certain types of cancer. The majority of known cancer risk factors are related to individual characteristics (such as age, race/ethnicity, or family history/genetic susceptibility) and behaviors (such as smoking, diet, physical inactivity, unsafe sex, and sun exposure).

For More Information

For more information on breast cancer risk factors, prevention, screening, symptoms, and treatment:

- National Cancer Institute
  Check out the NCI’s What You Need to Know About® Cancer Index at:  www.cancer.gov/about-cancer or call the NCI Cancer Information Service: 1-800-4-CANCER

- Centers for Disease Control and Prevention
  www.cdc.gov

- American Cancer Society (ACS)
  www.cancer.org | 1-800-227-2345

Source: California Cancer Registry (February 2019) California Department of Public Health. Prepared by the California Department of Public Health, California Cancer Registry.