

## Questions:

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### 1. What is the County Cancer Data Dashboard?

The Wisconsin Cancer Collaborative County Cancer Data Dashboard is an interactive and user-friendly way to find cancer outcomes and risk factors for every county in Wisconsin. The dashboard is an extension of the [County Cancer Profiles produced by the Wisconsin Cancer Collaborative](#). The dashboard is free to use.

### 2. What can I use this data for?

This data can help you identify potential needs and strengths in your community. You can use this data to help support evidence-based programs and interventions, funding applications, community-level assessments, strategic planning initiatives, public awareness campaigns, and more.

### 3. What does it mean when the dashboard says, “data is suppressed”?

According to the [Wisconsin Cancer Reporting System](#), when data is suppressed, it means there were fewer than 6 cases or deaths in that county, and the data is withheld in order to protect confidentiality.

### 4. Why do we only have cancer data from 2018-2022?

The [Wisconsin Cancer Reporting System](#) (WCRS) is Wisconsin’s cancer registry. [Cancer registries](#) are information systems designed to collect and manage data about people with cancer.

When a patient in Wisconsin is diagnosed with cancer, a hospital cancer registrar sends that patient’s cancer and treatment information to the WCRS. (This information is shared anonymously to protect patient confidentiality.)

The WCRS gathers information about all cancer cases in Wisconsin and then reviews and combines that information to make sure it’s accurate and complete. The process of collecting, reviewing, analyzing, and publishing the large quantities of data takes a lot of time. Right now, the most recent data available is from 2022.

When looking at a smaller population size, such as a county or a specific cancer type, the number of cancer cases from a single year can be relatively low, and sometimes that data is suppressed. When we combine several years of data for the same population, we can see a higher number of cancer cases. This allows us to calculate an average number of cancer cases per year, as well as a rate (the number of cancer cases per every 100,000 people).

This is why we used data from 2018 through 2022 in the County Cancer Data Dashboard.

#### 5. What is the difference between case (absolute numbers) and rates (per 100,000), and why is this important to recognize when doing any data analysis/comparison?

Cases count the total number of cancer diagnoses in a population within a specified time. For example, you can count the number of new cancer cases within a year in Wisconsin.

Rates help us compare cancer cases across different populations. Rates are the number of cases in a specified time period *divided by the population at risk* for that illness or event. For example, if “County A” had 2 cases of cancer in a year in a population of 1,000 people at risk of cancer, the rate would be 0.002. This number is hard to interpret since the population at risk is so much larger than the case count.

To get a better understanding of the level of disease across a population, you can multiply that 0.002 by 100,000, which gives you 200. You would interpret this as, “in 2022, for every 100,000 people in County A, 200 people developed cancer”.

Why do we do this? Epidemiologists and public health specialists use rates to describe the level of disease in a population when they want to compare two or more populations. For example, “County B” also had 2 cases of cancer in 2022, however their at-risk population was 2,000. How do you determine which county had higher levels of cancer? For “County B” we would calculate the rate as  $2/2,000=0.001$ . Again, since this number is so small, you’d multiply it by 100,000 to get 100. So, “in 2022, for every 100,000 people in County B, 100 people developed cancer”.

In another example, “County A” had 52 cases of cancer in their population of 10,000 people, and “County B” had 103 cases of cancer in their population of 20,000 people. To compare these very different case numbers and population sizes, we would need to calculate rates. In “County A” we divide the number of cases, 52, by the population of 10,000 to get 0.0052, and then we multiply that number by 100,000 to get a rate of 520 cases per 100,000 people in “County A”. In “County B” we do the same thing and divide 103 cases by 20,000 people, which equals 0.00515. Again, we multiply 0.00515 by 100,000 to get a rate of 515 per 100,000 people. As you can see, while “County B” had more counts or cases of cancer, the rate of cancer in “County A” is higher.

The Wisconsin Cancer Collaborative uses rates in the County Cancer Dashboard so that you can compare how your county is doing compared to another county or the state, even when the two counties of interest are different (large population vs small).

## Definitions:

**Adult inactivity rate**: Percentage of adults aged 20 and over who report no leisure-time physical activity.

**Age-Adjusted Rate**: Older age groups generally have higher cancer rates than younger age groups. To address this issue for purposes of analysis, most cancer incidence and mortality rates in major publications have been age-adjusted. This removes the effect of different age distributions between populations and allows for direct comparison of those populations.

**Binge Drinking**: consuming 4 or more drinks on an occasion for a woman, or 5 or more drinks on an occasion for a man.

**Excessive Drinking**: consuming 8 or more drinks per week for a woman, or 15 or more drinks per week for a man.

**HPV-Related Cancers**: These are cancers caused by human papillomavirus (HPV). These include: almost all anal cancers, cervical cancers, and cervical cancer pre-cancers, and the majority of oropharyngeal cancers (including the back of the throat, base of the tongue, and tonsils), vaginal cancers, vulvar cancers, and penile cancers.

**Incidence**: This measures the number of new cases of illness in a given time period. Incidence rate is calculated as the number of new cases over a specified period, divided by the population.

**Mortality Rate**: This measures the number of new deaths during a given time period among a specific population.

**Obesity Rate**: Percentage of the adult population (ages 20 and older) that reports a body mass index (BMI) greater than or equal to 30 kg/m<sup>2</sup>.

**Poverty Rate**: Percentage of the total population living below the Federal Poverty Level. For example, the 2021 [Federal Poverty Level](#) for a family of four is \$26,500 per year.

## Sources:

**American Community Survey**: The American Community Survey (ACS) helps local officials, community leaders, and businesses understand the changes taking place in their communities. It is the premier source for detailed population and housing information about our nation. 5-year estimates are 60 months' worth of collected data. It is the most reliable of the ACS estimates.

**American Medical Association**: The American Medical Association (AMA) is the largest and only national association that convenes 190+ state and specialty medical societies and other critical stakeholders.

**Area Health Resource File**: The Area Health Resources Files (AHRF) include data on Health Care Professions, Health Facilities, Population Characteristics, Economics, Health Professions Training, Hospital Utilization, Hospital Expenditures, and Environment at the county, state and national levels, from over 50 data sources.

**Behavioral Risk Factor Surveillance System**: The Wisconsin Behavioral Risk Factor Survey (BRFS) is part of the Behavioral Risk Factor Surveillance System (BRFSS), an ongoing system of health surveys

carried out by 54 state and territory health departments. BRFSS is coordinated by the U.S. Centers for Disease Control and Prevention (CDC) and uses dual landline and cell phone samples to conduct interviews with more than 400,000 adults ages 18 and older every year.

**Census Population Housing:** The census tells us who we are and where we are going as a nation. The census helps our communities determine where to build everything from schools to supermarkets, and from homes to hospitals. It helps the government decide how to distribute funds and assistance to states and localities. It is also used to draw the lines of legislative districts and reapportion the seats each State holds in Congress.

**Environmental Public Health Tracking Network:** The National Environmental Public Health Tracking Network (Tracking Network) brings together health data and environment data from national, state, and city sources and provides supporting information to make the data easier to understand.

**Feeding America Map the Meal Gap:** Feeding America conducts annual Map the Meal Gap study to improve understanding of food insecurity and food costs at the local level.

**Small Area Health Insurance Estimates (SAHIE) Program:** The U.S. Census Bureau's Small Area Health Insurance Estimates program produces the only source of data for single-year estimates of health insurance coverage status for all counties in the U.S. by selected economic and demographic characteristics.

**U.S. Bureau of Labor Statistics:** The Bureau of Labor Statistics measures labor market activity, working conditions, price changes, and productivity in the U.S. economy to support public and private decision making.

**Wisconsin Cancer Reporting System:** Wisconsin's cancer registry. [Cancer registries](#) are information systems designed for the collection, storage, and management of data on people with cancer.

**Wisconsin Department of Public Instruction:** The Department of Public Instruction is the state agency that advances public education and libraries in Wisconsin.

**Wisconsin Immunization Registry:** The Wisconsin Immunization Registry, also called WIR, is an internet database that tracks vaccine records for Wisconsin children and adults.

Ask a question or offer feedback on the Data Dashboard by emailing us [info@wicancer.org](mailto:info@wicancer.org).