ADA COUNTY CANCER PROFILE

A publication from the Cancer Data Registry of Idaho, Idaho Hospital Association.

Cancer Incidence 2017–2021 Cancer Mortality 2018–2022 BRFSS 2011–2022

RISK FACTORS AND INTERVENTIONS

CANCER

Cancer is a group of over 100 different diseases, each characterized by the uncontrolled growth and spread of abnormal cells. Cancer risk increases with age and varies by gender and race. As the average age of the population increases, the incidence of cancer will increase as well.

An estimated 42% of all cancers in the United States are due to personal lifestyle factors, such as smoking and sedentary lifestyle, and are preventable (10.3322/caac.21440). Cancers are also attributable to environmental factors and geneenvironment interactions. Other non-modifiable factors, such as age, sex, and family history of specific cancers, are also associated with cancer risk and can help identify people at elevated risk for developing cancer.

For some cancers, early detection can save lives. For example, colorectal cancer screening reduces mortality in adults aged 50–75 years (10.1001/jama.2017.3332). Improved primary prevention, early detection, and effective treatment can reduce the burden of cancer in Idaho.

Aging:

As the population ages, the number of new cancer cases and cancer deaths that occur each year will continue to increase. This trend could be reversed through significant improvements in primary prevention, early detection, and treatment.

Smoking:

Smoking and the use of smokeless tobacco are responsible for most cancers of the lung, trachea, bronchus, larynx, pharynx, oral cavity, and esophagus. Smoking is the leading cause of preventable death in the United States (PMID: 24455788).

Diet:

The U.S. Departments of Agriculture and Health and Human Services recommend the following dietary guidelines: eat a variety of foods; choose a diet with plenty of fruits, vegetables, and whole-grain products; limit the use of sugar, salt, and solid fats; and minimize alcoholic beverage consumption. For details, see https://www.dietaryguidelines.gov

Screening:

Early detection through screening reduces morbidity and mortality for cancers that can be diagnosed early and treated.

FOR MORE INFORMATION

Cancer Data Registry of Idaho P.O. Box 1278 Boise, ID 83701 208-489-1380 https://www.idcancer.org National Cancer Institute
Cancer Information Services
1-800-4CANCER
https://www.cancer.gov/contact

American Cancer Society https://www.cancer.org

CANCER INCIDENCE 2017–2021

Nearly one in two Idahoans are estimated to develop cancer during their lifetime. During 2017–2021, 47,333 cases of invasive cancer were diagnosed among Idaho residents, and 12,448 cases of invasive cancer were diagnosed among Ada County residents (Table 1).

Table 1: Incidence of All Cancers, Female Breast, Prostate, Lung and Bronchus, and Colorectal Cancers in Ada County and the State of Idaho. 2017–2021

Cancer Incidence 2017–2021	Ada County	State of Idaho			
All Sites/Types	12,448	47,333			
Female Breast	2,053	6,943			
Prostate	1,908	6,766			
Lung & Bronchus	1,183	4,959			
Colorectal	814	3,632			

Table 3 (Cancer Incidence 2017–2021, Comparison between Ada County and the Remainder of the State of Idaho) shows the number of observed cases, person-years, crude rates, age- and sex-adjusted rates, expected number of cases based upon age- and sex-specific rates in the remainder of Idaho, and p-values for tests comparing the number of observed and expected cases in Ada County. The table also shows the number of observed cases, person-years, and

crude rates for the remainder of the state of Idaho. Comparisons between the county and the remainder of the state were made for all cancers combined, 23 invasive cancer types, in situ breast cancer, non-malignant brain and other central nervous system tumors, and pediatric (0–19 years) cancer. Separate comparisons for males, females, and both sexes combined are included.

As shown in Table 3, the crude incidence rate of invasive cancer in Ada County was 515.4 cases per 100,000 person-years per year during 2017–2021. Comparing this crude rate with the crude rate for the remainder of Idaho (530.4) gives an estimate of the relative burden of disease in Ada County.

The age- and sex-adjusted incidence rate of invasive cancer in Ada County, all sites combined, was 540.9 cases per 100,000 persons per year during 2017–2021. There were statistically significantly more cases of cancer in Ada County (12,448) than expected (12,208.0) based upon rates in the remainder of the state (p=.031).

There are many reasons why cancer incidence rates differ by county, such as the prevalence of smoking and other lifestyle factors, and access to healthcare.

CANCER MORTALITY 2018–2022

During 2018–2022, cancer was the second leading cause of death in Idaho; 15,233 Idaho residents and 3,684 Ada County residents died from cancer during this period. Most cancer deaths are from five primary sites: lung, colon, pancreas, female breast, and prostate (Table 2).

Table 2: Overall and Cancer Mortality in Ada County and the State of Idaho, 2018–2022

Mortality 2018–2022	Ada County	State of Idaho			
All Deaths	18,272	80,538			
Cancer Deaths	3,684	15,233			
% of All Deaths	20.2%	18.9%			
Lung & Bronchus	679	2,937			
Colorectal	281	1,332			
Pancreas	308	1,190			
Female Breast	295	1,111			
Prostate	207	997			

Table 4 (Cancer Mortality 2018–2022, Comparison between Ada County and the Remainder of the State of Idaho) shows the number of observed deaths, person-years, crude rates, age- and sex-adjusted rates, expected number of deaths based upon age- and sex-specific rates in the remainder of Idaho, and p-values for tests comparing the number of observed and expected deaths for Ada County. The table also shows the number of observed deaths, person-years, and crude rates for the remainder of the state of Idaho. Comparisons between the county and the remainder of the state were made for all deaths, all cancer deaths, and 21 specific cancer types. Separate comparisons for males, females, and both sexes combined are included.

The age- and sex-adjusted cancer mortality rate for Ada County, all sites combined, was 158.7 deaths per 100,000 persons per year during 2018–2022, compared with 171.5 for the remainder of the state. There were statistically significantly fewer cancer deaths in Ada County (3,684) than expected (3,980.8) based upon rates in the remainder of the state (p<.001).

Statistical Note: Rates and percentages based upon 12 or fewer cases or deaths (numerator) should be interpreted with caution. **Data Note:** Mortality data may differ slightly from published official statistics from the Bureau of Vital Records and Health Statistics.

TABLE 3: CANCER INCIDENCE 2017–2021 COMPARISON BETWEEN ADA COUNTY AND THE REMAINDER OF THE STATE OF IDAHO

		Ada County						Remainder of Idaho			
Cancer		Observed	Person	Crude	A.A.I.	Expected		Observed	Person	Crude	
Site/Type	Sex	Cases	Years	Rate (1)	Rate (1,2)	Cases (3)	P-Value (4)	Cases	Years	Rate (1)	
All Sites Combined	Total	12,448	2,415,348	515.4	540.9	12,208.0	0.031 >>	34,885	6,576,758	530.4	
All Sites Combined All Sites Combined	Male Female	6,535 5,913	1,211,536 1,203,812	539.4 491.2	589.1 498.9	6,297.0 5,843.3	0.003 >> 0.365	18,735 16,150	3,300,737 3,276,021	567.6 493.0	
Bladder	Total	554	2,415,348	22.9	25.1	559.5	0.839	1,666	6,576,758	25.3	
Bladder	Male	427	1,211,536	35.2	40.1	434.2	0.752	1,346	3,300,737	40.8	
Bladder	Female	127	1,203,812	10.5	11.1	111.9	0.171	320	3,276,021	9.8	
Brain - malignant	Total	181	2,415,348	7.5	7.6	171.7	0.497	476	6,576,758	7.2	
Brain - malignant Brain - malignant	Male Female	99 82	1,211,536 1,203,812	8.2 6.8	8.3 6.9	101.7 69.6	0.842 0.159	283 193	3,300,737 3,276,021	8.6 5.9	
Brain and other CNS - non-malignant	Total	390	2,415,348	16.1	16.6	413.1	0.266	1,157	6,576,758	17.6	
Brain and other CNS - non-malignant	Male	123	1,211,536	10.2	10.6	132.3	0.448	377	3,300,737	11.4	
Brain and other CNS - non-malignant	Female	267	1,203,812	22.2	22.4	283.3	0.349	780	3,276,021	23.8	
Breast Breast	Total Male	2,073 20	2,415,348 1,211,536	85.8 1.7	87.4 1.8	1,779.5 14.9	0.000 >> 0.243	4,935 45	6,576,758 3,300,737	75.0 1.4	
Breast	Female	2,053	1,211,330	170.5	170.9	1,793.5	0.000 >>	4,890	3,276,021	149.3	
Breast - in situ	Total	468	2,415,348	19.4	19.5	329.5	0.000 >>	901	6,576,758	13.7	
Breast - in situ	Male	1	1,211,536	0.1	0.1	1.1	1.000	3	3,300,737	0.1	
Breast - in situ	Female	467	1,203,812	38.8	38.4	333.0	0.000 >>	898	3,276,021	27.4	
Cervix Colorectal	Female Total	64 814	1,203,812 2,415,348	5.3 33.7	4.9 35.0	91.5 996.5	0.003 << 0.000 <<	230 2,818	3,276,021 6,576,758	7.0 42.8	
Colorectal	Male	420	1,211,536	34.7	36.7	539.4	0.000 <<	1,557	3,300,737	42.0 47.2	
Colorectal	Female	394	1,203,812	32.7	33.4	454.2	0.004 <<	1,261	3,276,021	38.5	
Corpus Uteri	Female	310	1,203,812	25.8	25.9	380.9	0.000 <<	1,044	3,276,021	31.9	
Esophagus	Total	127	2,415,348	5.3	5.6	130.2	0.821	380	6,576,758	5.8	
Esophagus Esophagus	Male Female	107 20	1,211,536 1,203,812	8.8 1.7	9.7 1.7	107.3 20.3	1.000 1.000	322 58	3,300,737 3,276,021	9.8 1.8	
Hodgkin Lymphoma	Total	74	2,415,348	3.1	3.1	54.2	0.012 >>	148	6,576,758	2.3	
Hodgkin Lymphoma	Male	40	1,211,536	3.3	3.3	32.6	0.229	89	3,300,737	2.7	
Hodgkin Lymphoma	Female	34	1,203,812	2.8	2.8	21.5	0.015 >>	59	3,276,021	1.8	
Kidney and Renal Pelvis	Total	461	2,415,348	19.1	19.9	526.1	0.004 <<	1,490	6,576,758	22.7	
Kidney and Renal Pelvis Kidney and Renal Pelvis	Male Female	312 149	1,211,536 1,203,812	25.8 12.4	27.3 12.7	345.3 176.6	0.075 0.037 <<	998 492	3,300,737 3,276,021	30.2 15.0	
Larynx	Total	47	2,415,348	1.9	2.1	59.5	0.037 44	173	6,576,758	2.6	
Larynx	Male	38	1,211,536	3.1	3.5	43.0	0.500	129	3,300,737	3.9	
Larynx	Female	9	1,203,812	0.7	0.8	15.6	0.107	44	3,276,021	1.3	
Leukemia	Total	441	2,415,348	18.3	19.4	444.6	0.890	1,286	6,576,758	19.6	
Leukemia Leukemia	Male Female	262 179	1,211,536 1,203,812	21.6 14.9	23.6 15.4	259.9 181.5	0.915 0.892	774 512	3,300,737 3,276,021	23.4 15.6	
Liver and Bile Duct	Total	212	2,415,348	8.8	9.3	218.8	0.677	631	6,576,758	9.6	
Liver and Bile Duct	Male	139	1,211,536	11.5	12.5	153.6	0.252	455	3,300,737	13.8	
Liver and Bile Duct	Female	73	1,203,812	6.1	6.3	62.5	0.211	176	3,276,021	5.4	
Lung and Bronchus	Total	1,183 569	2,415,348 1,211,536	49.0 47.0	53.4 53.1	1,272.9 625.2	0.011 << 0.024 <<	3,776 1,926	6,576,758 3,300,737	57.4 58.4	
Lung and Bronchus Lung and Bronchus	Male Female	614	1,211,330	51.0	53.8	644.1	0.024	1,850	3,276,021	56.4 56.5	
Melanoma of the Skin	Total	964	2,415,348	39.9	41.2	776.3	0.000 >>	2,180	6,576,758	33.1	
Melanoma of the Skin	Male	585	1,211,536	48.3	52.1	446.0	0.000 >>	1,310	3,300,737	39.7	
Melanoma of the Skin	Female	379	1,203,812	31.5	31.2	322.9	0.003 >>	870	3,276,021	26.6	
Myeloma Myeloma	Total Male	191 116	2,415,348 1,211,536	7.9 9.6	8.5 10.5	184.5 110.4	0.651 0.617	537 331	6,576,758 3,300,737	8.2 10.0	
Myeloma	Female	75	1,211,330	6.2	6.5	72.7	0.819	206	3,276,021	6.3	
Non-Hodgkin Lymphoma	Total	500	2,415,348	20.7	21.8	519.5	0.405	1,492	6,576,758	22.7	
Non-Hodgkin Lymphoma	Male	306	1,211,536	25.3	27.2	285.9	0.248	840	3,300,737	25.4	
Non-Hodgkin Lymphoma	Female	194	1,203,812	16.1	16.7	231.6	0.012 <<	652	3,276,021	19.9	
Oral Cavity and Pharynx Oral Cavity and Pharynx	Total Male	349 249	2,415,348 1,211,536	14.4 20.6	15.0 21.8	340.8 238.6	0.671 0.517	966 691	6,576,758 3,300,737	14.7 20.9	
Oral Cavity and Pharynx Oral Cavity and Pharynx	Female	100	1,211,536	8.3	21.6 8.5	236.6 98.9	0.517	275	3,276,021	20.9 8.4	
Ovary	Female	138	1,203,812	11.5	11.5	152.1	0.270	415	3,276,021	12.7	
Pancreas	Total	377	2,415,348	15.6	16.8	380.0	0.906	1,111	6,576,758	16.9	
Pancreas	Male Female	202	1,211,536	16.7	18.5	206.8	0.774	624	3,300,737	18.9	
Pancreas Prostate	Female Male	175 1,908	1,203,812 1,211,536	14.5 157.5	15.2 174.5	171.1 1,608.9	0.785 0.000 >>	487 4,858	3,276,021 3,300,737	14.9 147.2	
Stomach	Total	1,908	2,415,348	4.5	4.8	1,000.9	0.000 >>	365	6,576,758	5.5	
Stomach	Male	69	1,211,536	5.7	6.3	79.3	0.269	238	3,300,737	7.2	
Stomach	Female	40	1,203,812	3.3	3.4	46.0	0.424	127	3,276,021	3.9	
Testis	Male	85	1,211,536	7.0	6.4	75.6	0.308	189	3,300,737	5.7	
Thyroid	Total	311	2,415,348	12.9	12.4	333.3	0.230	874	6,576,758	13.3	
Thyroid Thyroid	Male Female	90 221	1,211,536 1,203,812	7.4 18.4	7.4 17.5	103.6 228.6	0.193 0.646	282 592	3,300,737 3,276,021	8.5 18.1	
Pediatric Age 0 to 19	Total	106	620,640	17.1	17.5	105.2	0.646	319	1,878,684	17.0	
Pediatric Age 0 to 19	Male	47	317,672	14.8	14.8	55.3	0.303	167	956,649	17.5	
Pediatric Age 0 to 19	Female	59	302,968	19.5	19.5	49.8	0.222	152	922,035	16.5	
			he number of cas	100.000							

Notes: 1. Rates are expressed as the number of cases per 100,000 persons per year (person-years).

^{2.} Age and sex-adjusted incidence (A.A.I.) rates for county use age and sex-specific crude rates for the remainder of the state as standard.

^{3.} Expected cases are based upon age and sex-specific rates for the remainder of the state of Idaho (compare to observed).

^{4.} P-values compare observed and expected cases, are two tailed, based upon the Poisson probability distribution.

[&]quot;<<" denotes significantly fewer cases observed than expected, ">>" denotes significantly more cases observed than expected (p=.05).

TABLE 4: CANCER MORTALITY 2018–2022 COMPARISON BETWEEN ADA COUNTY AND THE REMAINDER OF THE STATE OF IDAHO

All Malignant Cancers Total 3,684 2,477,261 148,7 158,7 3,980.8 0,000 <			Ada County						Remainder of Idaho		
All Causes of Death Male Male 94 1,245,093 78.8 784.3 21,339.7 0,000 << 6,228.3 6,734,133 924.8 All Causes of Death Male 8.832 1,232,168 716.8 746.2 10,271.5 0,000 << 7,333,46 3,385,604 985.8 All Causes of Death Female 8.832 1,232,168 716.8 746.2 10,271.5 0,000 << 7,333,46 3,385,604 985.8 All Causes of Death Female 8.832 1,232,168 716.8 746.2 10,271.5 0,000 << 7,333,46 3,385,604 985.8 All Causes of Death Female 8.832 1,232,168 716.8 746.2 10,271.5 0,000 << 7,333,46 3,385,804 985.8 All Causes of Death Female 8.832 1,232,168 14.4 489.4 1,854.0 0,085	Cause of Death		Observed	Person	Crude	A.A.M.	Expected		Observed	Person	Crude
All Causes of Death Total 18,277 2,477,261 73,7 6 784.3 21,539.7 0,000 << 62,263 6,734,133 924.6 All Causes of Death Female 8,832 1,232,168 716.8 746.2 10,211.5 0,000 << 22,817 3,351,529 682.8 All Causes of Death Female 8,832 1,232,168 746.2 10,211.5 0,000 << 22,817 3,351,529 682.8 All Causes of Death Female 8,832 1,232,168 746.2 10,211.5 0,000 << 22,817 3,351,529 682.8 All Malignant Cancers Female 1,779 1,232,168 144.4 149.4 1,254.0 0,005 << 6,219 3,351,529 155.7 Bladder Female 62 1,245,093 66 7.5 95.1 0,191 293 3,326,004 87.8 Bladder Female 1,779 1,247,278 1,779 1,247,278 1,247		Sex	Deaths					P-Value (4)	Deaths		
All Causes of Death Male 9,440 1,245,093 758,2 262,6 11,257,5 0,000 < 33,346,04 3,382,604 985,8 All Causes of Death Female 8,340 7,345,1529 862,8 7	All Causes of Death	Total	18.272	2.477.261	737.6		21.539.7	0.000 <<	62.263	6.734.133	924.6
All Malignant Cancers Total 3,684 2,477,261 148,7 158,7 3,380,8 0,000 < 11,540 6,734,133 171,5 All Malignant Cancers Female 1,779 1,232,168 169,4 2,014,4 0,000 < 1,630 3,325,604 187,1 All Malignant Cancers Female 1,779 1,232,168 169,4 2,014,4 0,000 < 1,540 3,351,528 155,7 All Malignant Cancers Female 1,779 1,232,168 169,4 2,014,4 0,000 < 1,540 3,351,528 155,7 All Malignant Cancers Female 1,779 1,232,168 169,4 2,014,5 0,000 < 1,540 3,351,528 155,7 All Malignant Cancers Female 1,779 1,232,168 16,73,133 1,550 1,55	All Causes of Death	Male				826.6		0.000 <<			985.8
All Malignant Cancers Male 1,905 1,245,093 153.0 169.4 2,104.4 0.000 <	All Causes of Death	Female	8,832				10,211.5	0.000 <<			862.8
All Malighant Cancers Female 1,779 1,232,168 144.4 149.4 1,864.0 0,082 5,219 3,351,529 155.7 Bladder Tofal Male 82 1,245,033 6.8 7.5 9.5 0,191 233,332,004 8.7 Bladder Tofal 82 1,245,033 6.8 7.5 9.5 0,191 233 3,322,004 8.7 Brain and Other Nervous System Tofal 81 1,245,093 6.5 6.8 7.2 9.0 370 208 3,382,004 6.1 Brain and Other Nervous System Female 81 1,245,093 6.5 6.8 7.2 9.0 370 208 3,382,004 6.1 Brain and Other Nervous System Female 91 1,232,168 5.6 5.7 5.8 2.0 138 106 3,381,529 4.8 Breast Male 81 1,245,093 0.5 6.5 7.2 9.0 370 208 3,382,004 6.1 Breast Female 281 1,245,093 0.2 12.0 12.6 290.9 0.692 828 6,734,133 12.3 Breast Female 283 1,232,168 23.3 24.4 294.0 0.898 81 3,3351,529 4.8 Breast Female 284 1,232,168 23.3 24.4 294.0 0.898 81 3,3351,529 4.8 Colorectal Tofal 284 1,245,093 12.2 13.1 11.9 19.7 0.001 <<											
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Bladder Male 82 1,245,093 6.6 7.5 95.1 0.191 293 3,382,604 8.7											
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Brain and Other Nervous System Total 150 2,477,261 6.1 6.2 131,5 0.121 368 6,734,133 5.5 Brain and Other Nervous System Male 81 1,245,039 6.5 6.8 72.9 0.737 0.208 3,382,064 6.1 Brain and Other Nervous System Female 69 1,232,168 5.6 5.7 58.2 0.183 160 3,381,529 4.8 Breast Male 298 2,477,261 12.0 12.6 290.39 0.892 826 6,734,133 12.3 Breast Male 298 2,477,261 12.0 12.6 290.39 0.892 826 6,734,133 12.3 Breast Male 298 2,477,261 12.0 12.6 290.39 0.892 826 6,734,133 12.3 Breast Male 298 2,477,261 12.0 12.6 200.39 160 3,382,680 20.3 Breast Male 298 2,477,261 12.0 2.0 2.0 2.0 Colorettal Colorettal Male 298 2,477,261 11.3 11.9 369.0 0.000 < 1.061 0.3 Colorettal Male 12.2 1,247,261 11.3 11.9 369.0 0.000 < 1.061 0.3,381,269 11.1 Colorectal Female 129 1,232,168 10.6 10.8 168.2 0.002 < 471 3,381,529 14.1 Colorectal Female 498 1,232,168 10.6 10.8 168.2 0.002 < 471 3,381,529 14.1 Colorectal Female 129 1,232,168 10.5 10.8 168.2 0.002 < 471 3,381,529 3.6 Esophagus Total 125 2,477,261 5.0 5.4 116.1 0.430 336 6,734,133 5.0 Esophagus Male 126 2,477,261 5.0 5.4 116.1 0.430 336 6,734,133 5.0 Esophagus Male 10.0 1,478,68 6.9 9.6 0.385 2.86 3,382,604 0.2 Esophagus Male 10.0 1,478,68 6.9 9.6 0.385 2.86 3,382,604 0.2 Esophagus 10.0 10.0 10.0 10.0 Esophagus 10.0 10.0 10.0 10.0 Esophagus 10.0 10.0 10.0 10.0 10.0 Esophagus 10.0 10.0 10.0 10.0 10.0 10.0 Esophagus 10.0 10.0 10.0 10.0 10.0 10.0 10.0 Esophagus 10.0 10.0 10.0 10.0 10.0 10.0 10.0 10.0 10.0 Esophagus 10.0											8.7
Brain and Other Nervous System Male 81											
Brain and Other Nervous System Female 69											
Breast Total 298 2,477,261 12.0 12.6 29.0 0.692 826 6,734,133 12.3 Breast Male 295 1,232,168 23.9 24.4 294.0 0.969 816 3,361,629 24.3 Cervix Female 295 1,232,168 23.9 24.4 294.0 0.969 816 3,361,629 24.3 Cervix Female 271 1,232,168 1.7 1.6 25.8 0.397 67 3,351,529 2.0 Colorectal Total 281 2,477,261 11.3 11.9 369.0 0.000 < 1,051 6,734,133 15.6 Colorectal Male 152 1,245,093 12.2 13.1 11.9 369.0 0.000 < 4 1,051 6,734,133 15.6 Colorectal Female 129 1,232,168 10.5 10.8 168.2 0.002 < 4.71 3,351,529 14.1 Colorectal Female 129 1,232,168 10.5 10.8 168.2 0.002 < 4.71 3,351,529 14.1 Colorectal Female 129 1,232,168 10.5 10.8 168.2 0.002 < 4.71 3,351,529 14.1 Colorectal Total 10.5 2,445,093 5.4 5.4 16.1 0.495 3.36 3.32,204 15.5 Esophagus Total 10.5 2,445,093 5.4 5.4 16.1 0.495 3.36 3.351,529 15.5 Esophagus Female 20 1,232,168 16. 17 71.6 0.683 5.3 3.351,529 15.5 Esophagus Female 20 1,232,168 10.5 10.8 10.8 10.8 10.8 10.8 10.8 10.8 Esophagus Female 20 1,232,168 10.5 10.8 10.8 10.8 10.8 10.8 10.8 10.8 Esophagus Female 20 1,232,168 10.5 10.8 10.8 10.8 10.8 10.8 10.8 10.8 Esophagus Female 20 1,232,168 10.5 10.8 10.8 10.8 10.8 10.8 10.8 10.8 10.8 10.8 10.8 Esophagus Female 20 1,232,168 10.5 10.5 10.8 10.											
Breast Male 3 1,245,093 0,2 0,3 3,2 1,000 10 3,382,004 0,3 8	Breast										
Cervix	Breast	Male									
Cervix				1,232,168							
Colorectal Male 152 1,245,093 12.2 13.1 1997 0.001 <<			21	1,232,168	1.7				67	3,351,529	
Colorectal Female 129 1,232,168 10.5 10.8 168.2 0.002 << 471 3,351,529 14.1											
Corpus Uleri											
Esophagus											
Esophagus											
Esophagus											
Hodgkin Lymphoma						9.2					
Hodgkin Lymphoma Male 6											
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Nón-Hodgkin Lymphoma Total 119 2,477,261 4.8 5.2 152.9 0.005 < 449 6,734,133 6.7 Non-Hodgkin Lymphoma Male 67 1,245,093 5.4 6.0 80.3 0.146 243 3,382,604 7.2 Non-Hodgkin Lymphoma Female 52 1,232,168 4.2 4.4 72.0 0.016 243 3,382,604 7.2 Non-Hodgkin Lymphoma Female 52 1,232,168 4.2 4.4 72.0 0.016 243 3,382,604 7.2 Oral Cavity and Pharynx Total 70 2,477,261 2.8 3.0 71.0 0.968 205 6,734,133 3.0 Oral Cavity and Pharynx Male 53 1,245,093 4.3 4.7 46.4 0.371 139 3,382,604 4.1 Oral Cavity and Pharynx Female 17 1,232,168 1.4 1.4 23.7 0.197 66 3,351,529 2.0 Ovary Female											
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Non-Hodgkin Lymphoma Female 52 1,232,168 4.2 4.4 72.0 0.017 < 206 3,351,529 6.1 Oral Cavity and Pharynx Total 70 2,477,261 2.8 3.0 71.0 0.968 205 6,734,133 3.0 Oral Cavity and Pharynx Male 53 1,245,093 4.3 4.7 46.4 0.371 139 3,382,604 4.1 Oral Cavity and Pharynx Female 17 1,232,168 1.4 1.4 23.7 0.197 66 3,351,529 2.0 Ovary Female 96 1,232,168 7.8 8.0 94.7 0.918 265 3,351,529 7.9 Pancreas Total 308 2,477,261 12.4 13.3 302.9 0.785 882 6,734,133 13.1 Pancreas Male 166 1,245,093 13.3 14.8 160.7 0.696 484 3,382,604 14.3 Pancreas Female 142											
Oral Cavity and Pharynx Total Or				1,232,168						3.351.529	
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Pancreas Total 308 2,477,261 12.4 13.3 302.9 0.785 882 6,734,133 13.1 Pancreas Male 166 1,245,093 13.3 14.8 160.7 0.696 484 3,382,604 14.3 Pancreas Female 142 1,232,168 11.5 12.0 140.7 0.935 398 3,351,529 11.9 Prostate Male 207 1,245,093 16.6 19.0 255.0 0.002 <				1,232,168	1.4	1.4			66	3,351,529	2.0
Pancreas Male Pencreas Male Female 166 1,245,093 13.3 14.8 160.7 12.0 140.7 12.0	Ovary			1,232,168							
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Prostate Male 207 1,245,093 16.6 19.0 255.0 0.002 < 790 3,382,604 23.4 Stomach Total 48 2,477,261 1.9 2.0 51.9 0.655 146 6,734,133 2.2 Stomach Male 26 1,245,093 2.1 2.3 31.5 0.375 93 3,382,604 2.7 Stomach Female 22 1,232,168 1.8 1.8 19.7 0.668 53 3,351,529 1.6				1,245,093						3,382,604	
Stomach Total 48 2,477,261 1.9 2.0 51.9 0.655 146 6,734,133 2.2 Stomach Male 26 1,245,093 2.1 2.3 31.5 0.375 93 3,382,604 2.7 Stomach Female 22 1,232,168 1.8 1.8 19.7 0.668 53 3,351,529 1.6						12.0					
Stomach Male 26 1,245,093 2.1 2.3 31.5 0.375 93 3,382,604 2.7 Stomach Female 22 1,232,168 1.8 1.8 19.7 0.668 53 3,351,529 1.6											
Stomach Female 22 1,232,168 1.8 1.8 19.7 0.668 53 3,351,529 1.6											2.2
	<u> </u>							0.000	JJ	3,331,329	1.0

Statistical Notes: Rates based upon 12 or fewer cases (numerator) should be interpreted with caution.

Mortality statistics presented differ from BVRHS official statistics due to differences in methodology.

Data Source: Bureau of Vital Records and Health Statistics (BVRHS), Division of Public Health, Idaho Department of Health and Welfare, 2023.

^{2.} Age and sex-adjusted mortality (A.A.M.) rates for county use age and sex-specific crude rates for the remainder of the state as standard.

^{3.} Expected cases are based upon age and sex-specific rates for the remainder of the state of Idaho (compare to observed).

^{4.} P-values compare observed and expected cases, are two tailed, based upon the Poisson probability distribution.

[&]quot;<<" denotes significantly fewer cases observed than expected, ">>" denotes significantly more cases observed than expected (p=.05).

Cancer Screening and Risk Factors

The Division of Public Health (DPH), Idaho Department of Health and Welfare, under a cooperative agreement with the Centers for Disease Control and Prevention, has conducted telephone Behavioral Risk Factor Surveys since 1984. These surveys are conducted with randomly selected adult Idahoans to measure population prevalences of risk factors for major causes of death in the U.S., including cancer. DPH provided Behavioral Risk Factor Surveillance System (BRFSS) data from 2011 through 2022 to CDRI staff, who performed the analyses reported in these *County Profiles*. Analysis weights were post-stratified to 2022 population estimates by age group, sex, and county, beginning with the BRFSS raked weights. Not all questions were asked in all years. Crude prevalence estimates are presented herein; a minimum of 50 respondents was required to generate county-level statistics. Results may differ from IDHW reports due to differences in methods. Cancer screening and risk factor measures were selected to assist in monitoring *Comprehensive Cancer Alliance for Idaho* (CCAI) objectives. Wald log-linear chi-square statistics were used to test for independence of the selected measures and other variables, such as age and race, taking the complex survey design into account.

Cancer Screening and Risk Factor Prevalence Estimates, 2011–2022

	State of								
Measure	Idaho	HD 1	HD 2	HD 3	HD 4	HD 5	HD 6	HD 7	Ada County
Access to Care									
Have Health Insurance, Age < 65 (2021–2022)	90.0%	89.3%	87.8%	86.4%	92.6%	87.2%	89.1%	92.6%	93.1%
Not See Doctor Due to Cost in Past Year (2020–2022)	10.4%	9.5%	11.0%	11.0%	10.2%	10.2%	10.4%	11.3%	10.2%
Cancer Screening									
Mammogram Past 2 Years, Age 40–74 (2014–2022, even years)	62.9%	61.0%	70.0%	60.3%	66.1%	58.9%	61.0%	62.5%	66.2%
Pap Test Past 3 Years, Cervix Intact Age 21–65 (2018, 2020)	71.1%	73.7%	73.6%	70.9%	72.9%	69.4%	69.3%	65.5%	73.8%
Colorectal Cancer Screening, Age 45–75 (2022)		61.0%	62.5%	60.8%	67.2%	65.0%	60.4%	60.2%	67.2%
Tobacco Use									
Current Tobacco User (2020–2022)	22.1%	24.3%	20.4%	24.8%	21.3%	22.5%	22.6%	18.1%	20.5%
Other Cancer-Related									
Healthy Weight by Body Mass Index, Age 20+ (2020–2022)	30.0%	30.0%	30.1%	26.5%	33.7%	27.5%	26.7%	30.2%	34.0%
Any Physical Activity Besides Job Past 30 Days (2018–2022)	79.1%	79.0%	78.0%	75.4%	82.7%	75.2%	76.7%	81.0%	83.5%
Meet Physical Activity Guidelines (2011, 2013, 2015, 2017, 2019)	22.0%	22.8%	19.2%	20.0%	25.2%	19.5%	20.4%	20.3%	25.5%
Home Ever Tested for Radon (2016, 2018, 2020)	22.9%	30.8%	18.3%	16.9%	25.2%	20.1%	23.0%	21.0%	25.8%

Access to Care

Have Health Insurance - 2021-2022

Statewide, 90.0% of adults aged 18–64 reported having health care coverage. Health care coverage differed significantly by race/ethnicity, with 91.4% of white non-Hispanics, compared to 81.5% of Hispanics and 90.5% of Native Americans, having health insurance. Spanish-speaking respondents were significantly less likely to be insured (46.0%) than English-speaking respondents (90.5%). Health care coverage differed significantly by age of respondent, with 87.2% of persons aged 18–29, and 93.4% of persons aged 50–64, having health insurance. Health care coverage differed significantly by county, with a range of 64.8% in Idaho County to 95.9% in Shoshone County having health insurance.

Not See Doctor Due to Cost in Past Year – 2020–2022

Statewide, 10.4% of adults aged 18+ reported they needed to see a doctor but could not because of cost sometime in the past 12 months. Inability to see a doctor due to cost differed significantly by race/ethnicity (9.2% of white non-Hispanics, 16.9% of Hispanics, and 15.7% of Native Americans). Inability to see a doctor due to cost differed significantly by annual household income (21.9% for less than \$15,000, 5.8% for greater than \$50,000).

Cancer Screening

Mammogram - 2014-2022, even years

Statewide, 62.9% of women aged 40–74 reported having a mammogram in the past 2 years. Insured women were about twice as likely to have had a mammogram in the past 2 years (66.3% versus 31.2%). Mammography rates differed significantly by county, with a range in screening of 41.6% in Owyhee County to 76.1% in Nez Perce County. In 2022, Idaho ranked 49th among states and the District of Columbia for mammography screening rates among women aged 40+.

Pap Test - 2018, 2020

Statewide, 71.1% of women with an intact cervix and aged 21–65 reported having a Pap test in the past 3 years. Women with health insurance were significantly more likely to have timely Pap screening than uninsured women (75.0% versus 52.8% screened in the past 3 years). Pap screening differed significantly by county, with a range of 50.6% in Bingham County to 78.9% in Bannock County. In 2020, Idaho ranked 49th among states and the District of Columbia for Pap screening rate.

<u>Colorectal Cancer Screening</u> – 2022

Statewide, 63.3% of adults aged 45–75 reported being current for colorectal cancer screening.** Persons with health insurance were over twice as likely to be current for colorectal cancer screening. In 2022, Idaho ranked 42nd among states and the District of Columbia in the percentage of adults aged 45–75 and older who reported being up-to-date for colorectal cancer screening.

^{**} Current for colorectal cancer screening means a blood stool test in the past year, sigmoidoscopy in the past 5 years and blood stool test in the past 3 years, blood stool DNA test in the past 3 years, virtual colonoscopy in the past 5 years, or a colonoscopy in the past 10 years.

Cancer Screening and Risk Factors

Tobacco Use

Current Tobacco Use - 2020-2022

Current tobacco use includes at least 1 form of cigarettes; cigars, cigarillos, filtered little cigars; regular pipes, water pipes, hookah; e-cigarettes; and/or smokeless tobacco products every day or some days. Statewide, 22.1% of adults aged 18 and older were current tobacco users. Tobacco use differed significantly by age of respondent, with 28.9% of persons aged 18–29, and 10.7% of persons aged 65 and older reporting current tobacco use. Tobacco use was lower among white non-Hispanics (21.5%) than among Native Americans (38.0%). Tobacco use differed significantly by county, with a range of 6.1% in Madison County to 33.5% in Elmore County. Counties with higher rates of tobacco use had significantly higher rates of lung cancer.

Other Cancer-Related

Healthy Weight by Body Mass Index - 2020-2022

Statewide, 30.0% of adults aged 20 and older were in the healthy weight range as measured by body mass index (BMI 18.5–24.9). BMI differed significantly by race/ethnicity, with 30.5% of white non-Hispanics, compared to 25.8% of Hispanics and 21.5% of Native Americans, being in the healthy weight range. Males (24.4%) were significantly less likely to be in the healthy weight range than females (35.7%). BMI differed significantly by age of respondent, with 41.1% of persons aged 18–29, and 23.4% of persons aged 50–64, being in the healthy weight range. BMI differed significantly by county, with a range of 11.7% in Power County to 44.3% in Blaine County of adults being in the healthy weight range.

Any Physical Activity - 2018-2022

CCAI is measuring physical activity with two metrics: Any physical activity besides job in past 30 days and meeting aerobic and strength physical activity guidelines during the past month or week. Statewide, 79.1% of adults aged 18 and older reported physical activity besides their job in the past 30 days. Physical activity differed significantly by age of respondent, with 83.7% of persons aged 18–29, and 72.5% of persons aged 65+, reporting any physical activity besides their job. The percentage of adults reporting any physical activity differed significantly by county, with a range of 66.9% in Oneida County to 88.3% in Teton County. Counties with higher rates of physical activity had significantly lower rates of overall and colorectal cancer.

Physical Activity Guidelines – 2011, 2013, 2015, 2017, 2019 Statewide, 22.0% of adults aged 18 and older met aerobic and strength physical activity guidelines during the past month or week. Meeting physical activity guidelines differed significantly by age of respondent, with 26.2% of persons aged 18–29, and 19.2% of persons aged 50–64, meeting guidelines. The percentage of adults meeting physical activity guidelines differed significantly by county, with a range of 9.5% in Franklin County to 30.7% in Blaine County.

Home Radon Testing - 2016, 2018, 2020

Statewide, 22.9% of adults have ever tested their house for radon. Radon test usage varied significantly by race/ethnicity, with 25.1% of white non-Hispanics, 7.3% of Hispanics, and 25.4% of Native Americans having ever tested their house for radon. Radon test usage was higher for persons aged 50+ than for younger persons. Home radon testing differed significantly by county, with a range of 8.7% in Cassia County to 54.7% in Blaine County.

This project has been funded in whole or in part with Federal funds from the National Cancer Institute, National Institutes of Health, Department of Health and Human Services, under Contract No. HHSN261201800006I and the Centers for Disease Control and Prevention, Department of Health and Human Services, under Cooperative Agreement NU58DP007160. The findings and conclusions in this report are those of the authors and do not necessarily represent the official position of the Centers for Disease Control and Prevention or the National Cancer Institute.



