



Iowa County Health Snapshot Series

*99 county reports prepared for the Iowa State University
Extension and Outreach Community and Economic
Development Unit*



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By Matthew Voss & Shawn Dorius

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Iowa County Health Snapshot Series

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Health in Carroll County: Overview

Dear Community Members & Stakeholders of Carroll County,

We are pleased to share the Iowa County Health Snapshot series, a set of reports designed in partnership with Iowa State University's Community Economic Development to assess the overall landscape of health and well-being across Iowa's 99 counties. The following pages include the health snapshot for your county. The snapshot can be used to see how Carroll County ranks across various health measures compared to the rest of the state and similarly-sized counties. This comparison allows us to identify Carroll County's strengths and opportunities for growth by leveraging data from the Centers for Disease Control and Prevention PLACES dataset.

The report includes 37 health measures organized topically by general health status, risky behavior, health outcomes, prevention, and disability. We provide a general overview of each health topic, followed by a description of each health measure. Health measure descriptions include crude and age-adjusted rates and a ranking that tells you how your county ranks compared to all Iowa counties and counties of similar size to Carroll County. Crude rates tell you the raw, un-adjusted percent of the population experiencing the health measure. Age-adjusted rates account for the age distribution present in your county and presents what the rate would be if your county had a standard age distribution. Crude rates can provide a general comparison between counties and age-adjusted rates can give a fairer comparison between counties with different age structures.

Strengths

Take a look at the top strengths of your county! Below are unadjusted and age-adjusted health measures that represent your county's strengths. We recommend using continued investment in these areas to maintain them as strengths, as well as building on them to improve in other health domains.

Crude			Age-Adjusted		
Health Domain	Statewide County Rank	Micropolitan County Rank	Health Domain	Statewide County Rank	Micropolitan County Rank
Annual Checkup	20th	2nd	Chronic Kidney Disease	17th	3rd
Mental Health	20th	3rd	Any Disability	19th	2nd
Cholesterol Screening	25th	2nd	Stroke	23rd	3rd
Any Disability	26th	2nd	Annual Checkup	26th	6th
Mammography	27th	4th	Health Insurance	26th	3rd

Opportunities

Below are health measures that represent potential areas for growth in your county. We recommend increasing investment in these areas to support community health and well-being.

Crude			Age-Adjusted		
Health Domain	Statewide County Rank	Micropolitan County Rank	Health Domain	Statewide County Rank	Micropolitan County Rank
Arthritis	72nd	13th	Arthritis	81st	10th
Binge Drinking	70th	11th	Taking BP Medication	78th	14th
Dental Visit	65th	7th	Binge Drinking	78th	12th
Obesity	64th	10th	Obesity	70th	11th
Core preventive services for older women	56th	10th	Dental Visit	63rd	7th

Please review the rest of the report to learn more about your county and reach out to us with questions about the report or for recommendations to improve the overall health and well-being in Carroll County.

Sincerely,



Shawn F. Dorius, PhD
Iowa State University
Public Science Collaborative



IOWA STATE UNIVERSITY
Extension and Outreach
Community and Economic Development

This project was supported by funding from Iowa State University’s Extension and Outreach Community and Economic Development Unit, via an award from Iowa State University’s Presidential Strategic Initiative Plan 2022-2031.

How to Use this Report

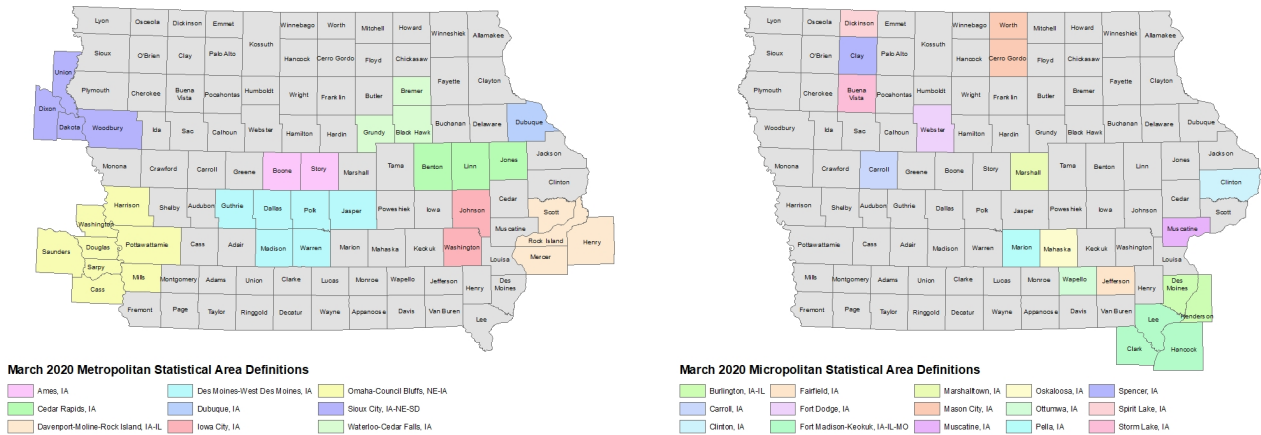
The purpose of the Iowa County Health Snapshot Series is to provide an overview of health in Carroll County that can be used to help inform health-related interventions and programming. This report contains five sections, including the overall health status of Carroll County, a review of risky behaviors in the county, and information on various health outcomes, prevention measures, and disability needs. Each section includes an overview of the health domain, a breakdown of its underlying health measures, and data to see how Carroll County compares to the rest of the state and similarly-sized counties.

With a population of 20,692, Carroll County’s similarly sized counties are defined as micropolitan counties. In Iowa, micropolitan counties have an average population of 30,839, and there are 15 counties that are considered micropolitan counties. To learn more about the county population classifications used in this report, please see the information below the table as well as Appendix 3.

Group	Population Avg.	Number of Counties
Metropolitan Core	175,797	9
Micropolitan	30,839	15
Metropolitan Non-Core	29,821	12
Rural	12,547	63
Total		99

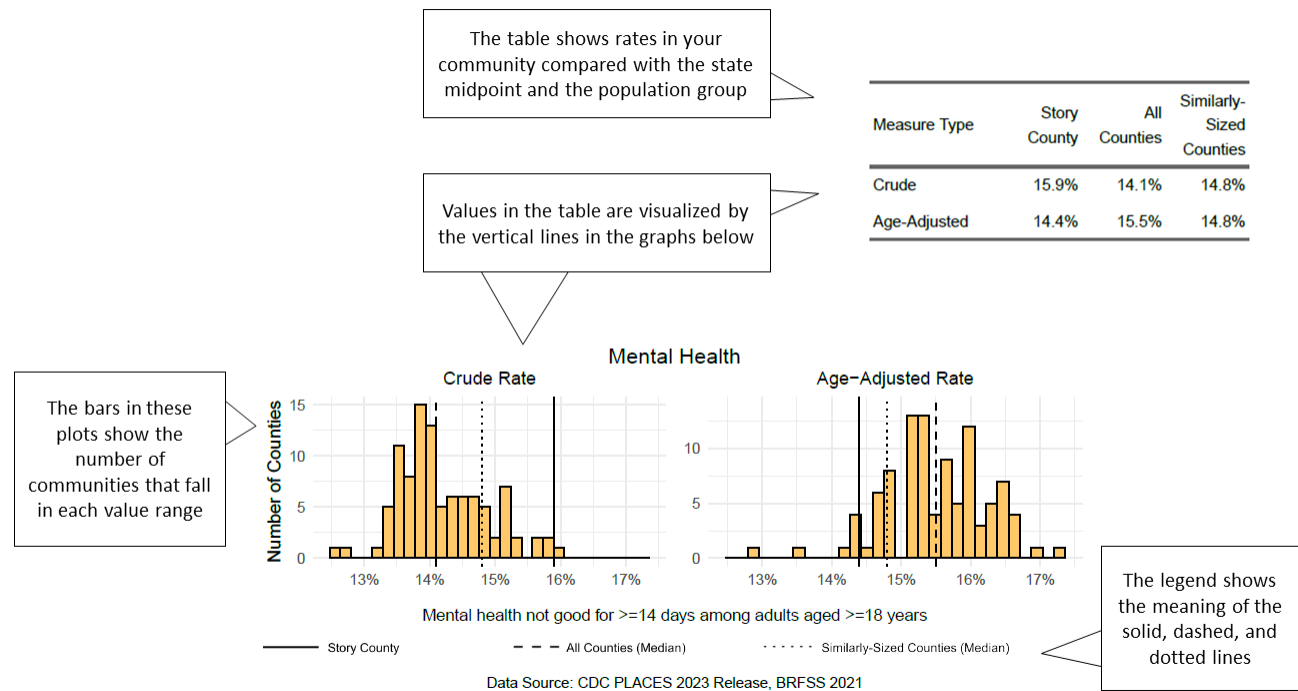
The counties included in each category above are determined by the United States Office of Management and Budget. Iowa has counties in nine metropolitan statistical areas and 15 micropolitan statistical areas. The counties identified as metropolitan and micropolitan can be found in the link and the maps below. Metropolitan core counties are those counties in metropolitan areas that have the city that defines the metropolitan area (e.g., Des Moines and Polk County for the Des Moines Metropolitan Area). Metropolitan non-core counties are those that fall within the metropolitan area, but do not have the core city of the metropolitan area (e.g., Dallas and Jasper Counties in the Des Moines Metropolitan Area).

<https://www.icip.iastate.edu/maps/refmaps/cofips>



Using Story County as an Example

The graphic below is an example of the details included for each health measure. The table in the upper right shows your county's crude and age-adjusted rate estimates alongside their averages across all Iowa counties and similarly-sized counties. The images below show the distribution of the health measure across counties. The vertical lines correspond with the values in the table to show the estimate for the specific county compared to counties across the state. The solid black line in each plot represents the county rate, with the dashed lines indicating the average rate for all Iowa counties and the dotted lines showing the average rate for similarly-sized counties.



The example graphic above displays the poor mental health rate in Story County, Iowa. The left plot shows the crude rate of poor mental health in the county. Crude rates are the raw, un-adjusted percent of the population experiencing the health measure. Notice how the solid black line is closer to the right of the plot than the dashed and dotted lines; this indicates that Story County has a higher crude rate of poor mental health than most counties in the state. However, the age-adjusted rate plot on the right shows the solid line closer to the peak of the distribution and averages for the state and similarly-sized counties, indicating that when accounting for Story County's unique age distribution, Story County's poor mental health rate is not a significant outlier, and is estimated to be lower than the statewide average. Accounting for crude and age-adjusted rates is critical to help inform health interventions as age-adjusted rates can help contextualize the health measure within the population.

Health Status

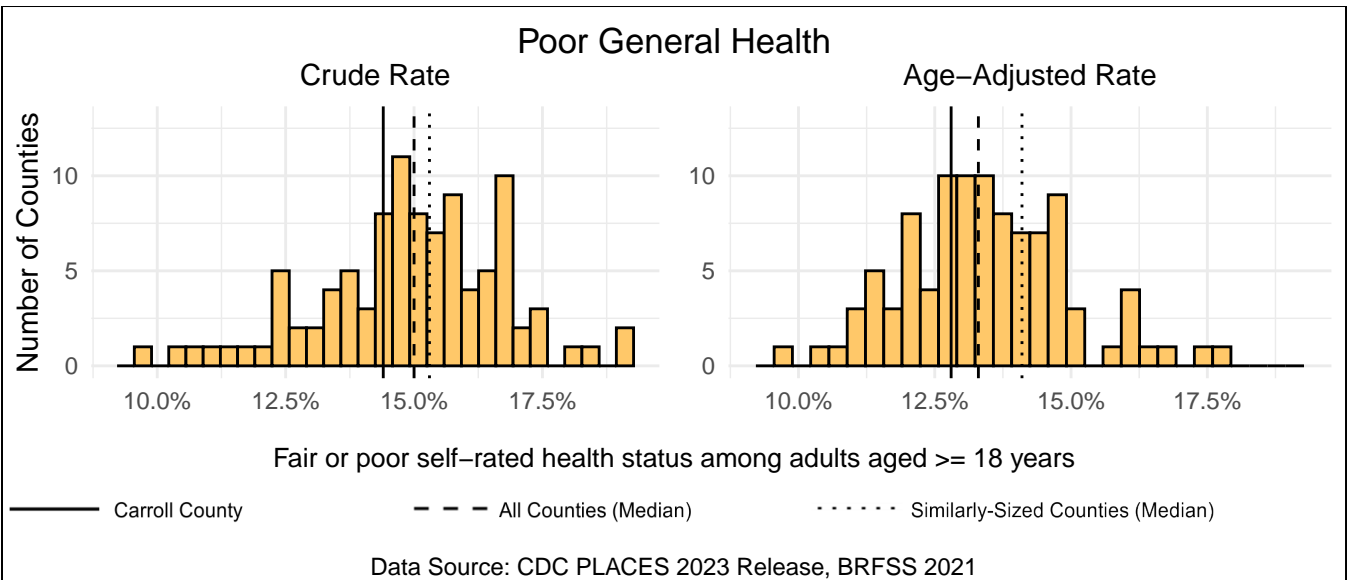
This section reflects measures for overall health, including general, physical, and mental health. These measures are a valuable way to see a simple summary of the health of a country’s population. The questions to calculate these measures ask respondents to evaluate their health status. General health is evaluated on a 5-point scale where respondents can report their health status as one of “excellent,” “very good,” “good,” “fair,” or “poor,” from which the respondents who answer “fair” or “poor” are included in the measure. Physical and mental health are evaluated as the rate of respondents who say they have had 14 or more days in the last 30 days in which their physical or mental health was not good. The URL below includes more information about each variable.

<https://www.cdc.gov/places/measure-definitions/health-status/index.html>

Poor General Health

Carroll County has a crude rate of 14.4% for fair or poor self-rated health status among adults aged ≥ 18 years, which ranks 31st out of 99 Iowa counties (3rd out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 12.8%, which ranks 32nd out of 99 Iowa counties (3rd out of 15 similarly-sized counties).

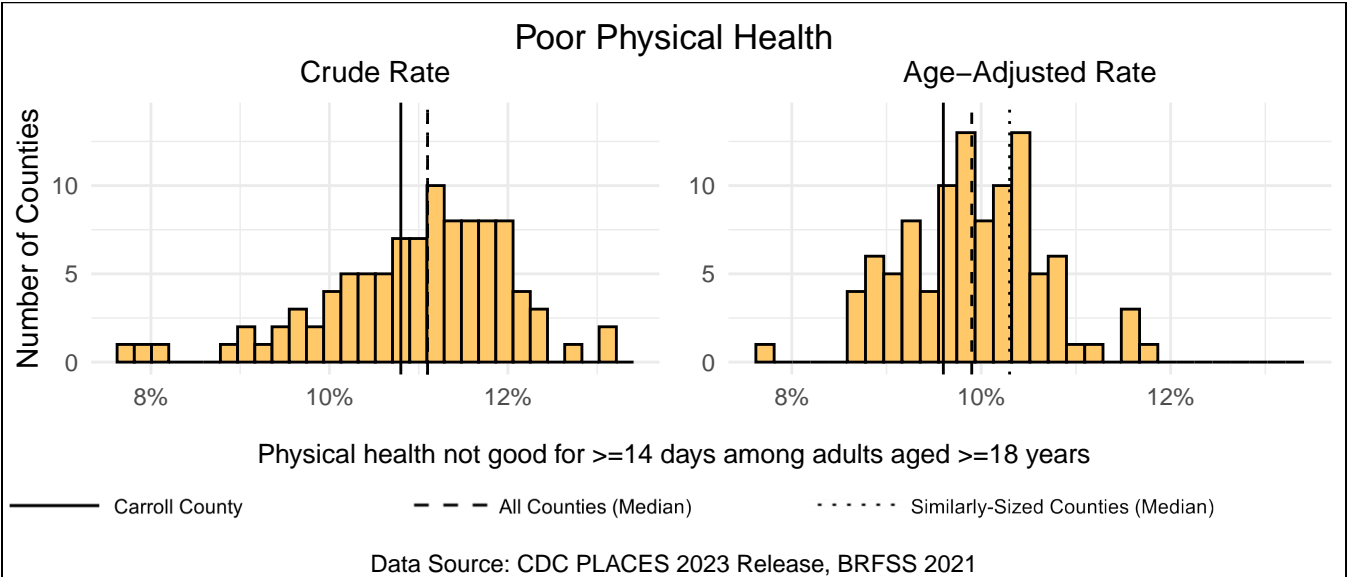
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	14.4%	15.0%	15.3%
Age-Adjusted	12.8%	13.3%	14.1%



Poor Physical Health

Carroll County has a crude rate of 10.8% for physical health not good for ≥ 14 days among adults aged ≥ 18 years, which ranks 34th out of 99 Iowa counties (5th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 9.6%, which ranks 29th out of 99 Iowa counties (3rd out of 15 similarly-sized counties).

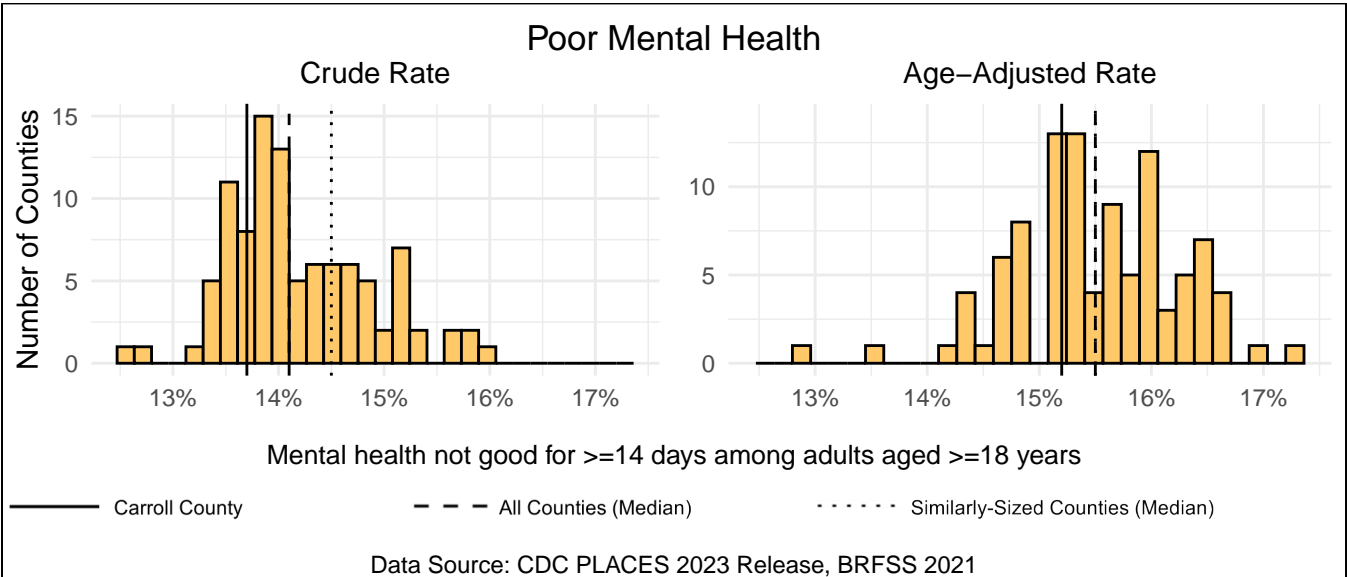
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	10.8%	11.1%	11.1%
Age-Adjusted	9.6%	9.9%	10.3%



Poor Mental Health

Carroll County has a crude rate of 13.7% for mental health not good for ≥ 14 days among adults aged ≥ 18 years, which ranks 20th out of 99 Iowa counties (3rd out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 15.2%, which ranks 28th out of 99 Iowa counties (5th out of 15 similarly-sized counties).

Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	13.7%	14.1%	14.5%
Age-Adjusted	15.2%	15.5%	15.5%



Health Risk Behaviors

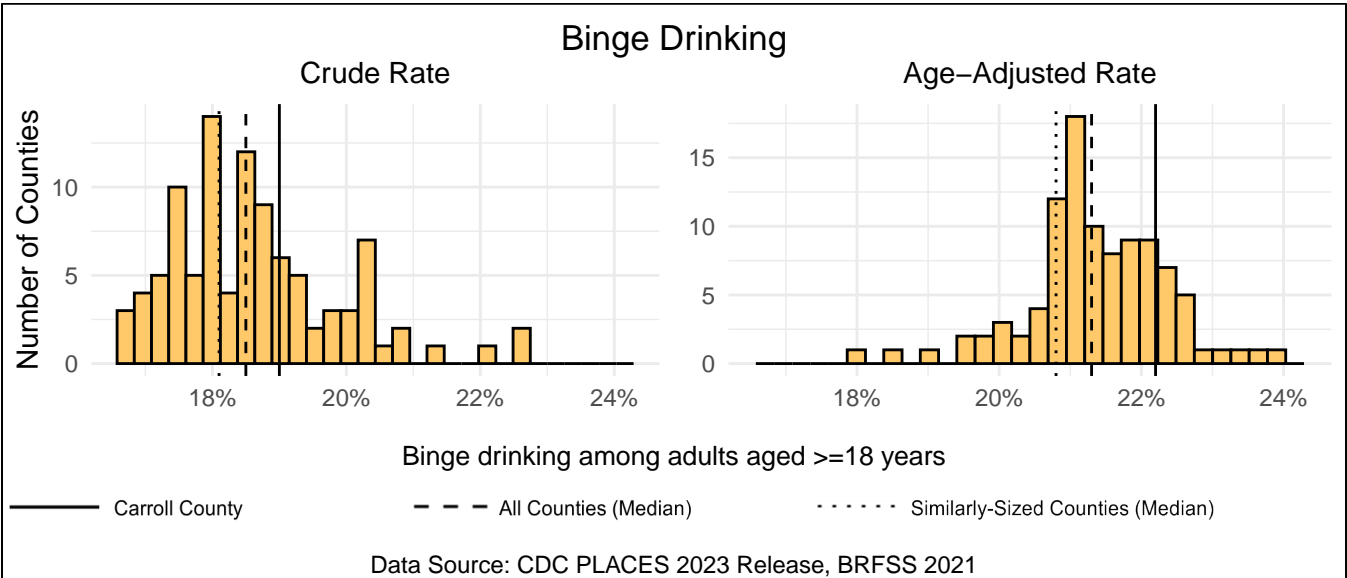
Health risk measures are measures of individual behaviors that can lead to poor health outcomes. These include binge drinking, current smoking, physical inactivity, and getting less than seven hours of nightly sleep. Risk behaviors are the most critical intervention points as they can help save lives and drastically improve health outcomes later in life. Each measure is calculated as the rate of respondents participating in a high level of risk behavior. The exact cutoff points for the behavior depend on the health area. The link below includes more information about each variable.

<https://www.cdc.gov/places/measure-definitions/unhealthy-behaviors/index.html>

Binge Drinking

Carroll County has a crude rate of 19.0% for binge drinking among adults aged ≥ 18 years, which ranks 70th out of 99 Iowa counties (11th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 22.2%, which ranks 78th out of 99 Iowa counties (12th out of 15 similarly-sized counties).

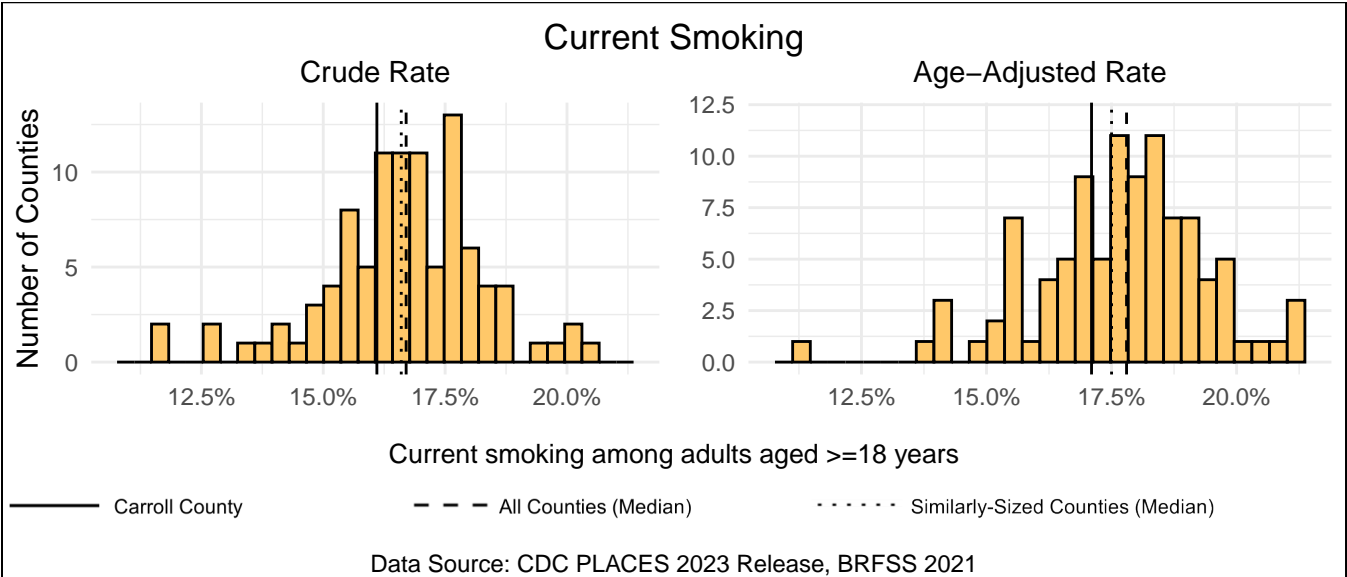
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	19.0%	18.5%	18.1%
Age-Adjusted	22.2%	21.3%	20.8%



Current Smoking

Carroll County has a crude rate of 16.1% for current smoking among adults aged ≥ 18 years, which ranks 30th out of 99 Iowa counties (5th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 17.1%, which ranks 33rd out of 99 Iowa counties (6th out of 15 similarly-sized counties).

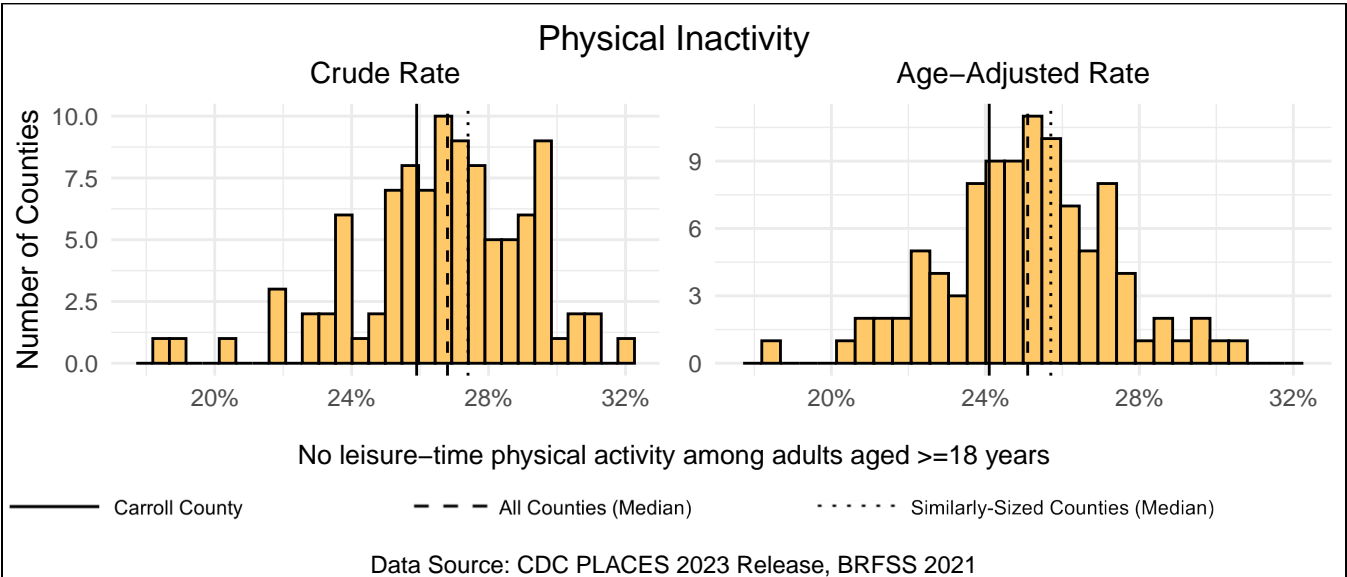
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	16.1%	16.7%	16.6%
Age-Adjusted	17.1%	17.8%	17.5%



Physical Inactivity

Carroll County has a crude rate of 25.9% for no leisure-time physical activity among adults aged ≥ 18 years, which ranks 31st out of 99 Iowa counties (3rd out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 24.1%, which ranks 29th out of 99 Iowa counties (3rd out of 15 similarly-sized counties).

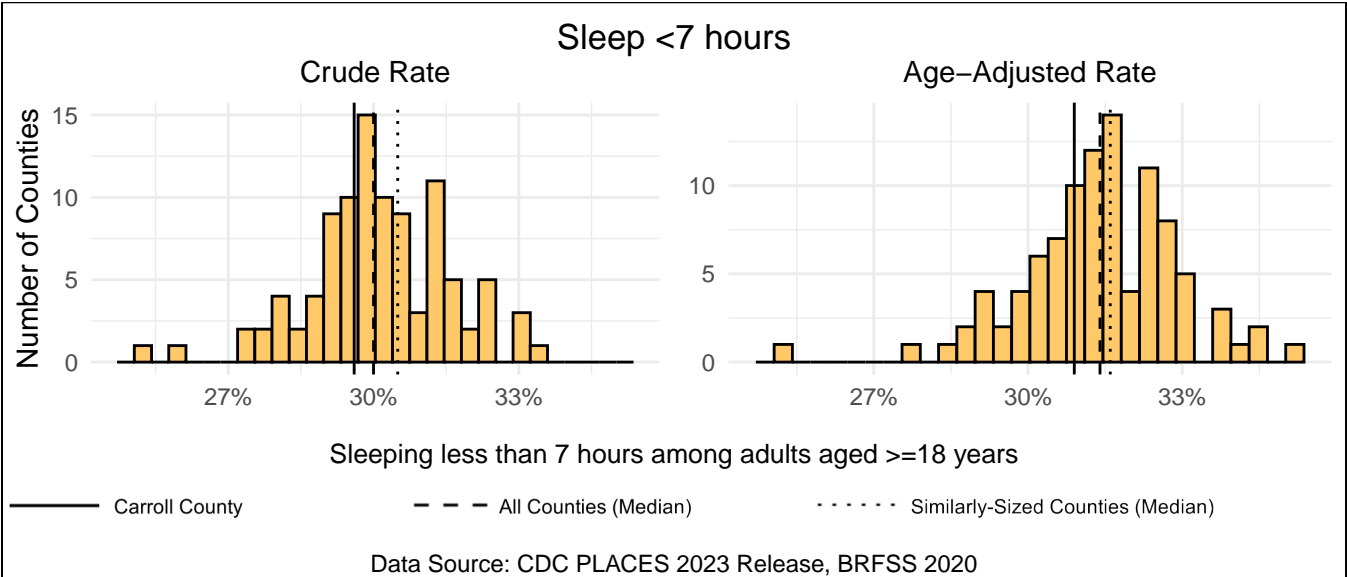
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	25.9%	26.8%	27.4%
Age-Adjusted	24.1%	25.1%	25.7%



Sleep <7 hours

Carroll County has a crude rate of 29.6% for sleeping less than 7 hours among adults aged ≥ 18 years, which ranks 31st out of 99 Iowa counties (4th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 30.9%, which ranks 31st out of 99 Iowa counties (4th out of 15 similarly-sized counties).

Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	29.6%	30.0%	30.5%
Age-Adjusted	30.9%	31.4%	31.6%



Health Outcomes

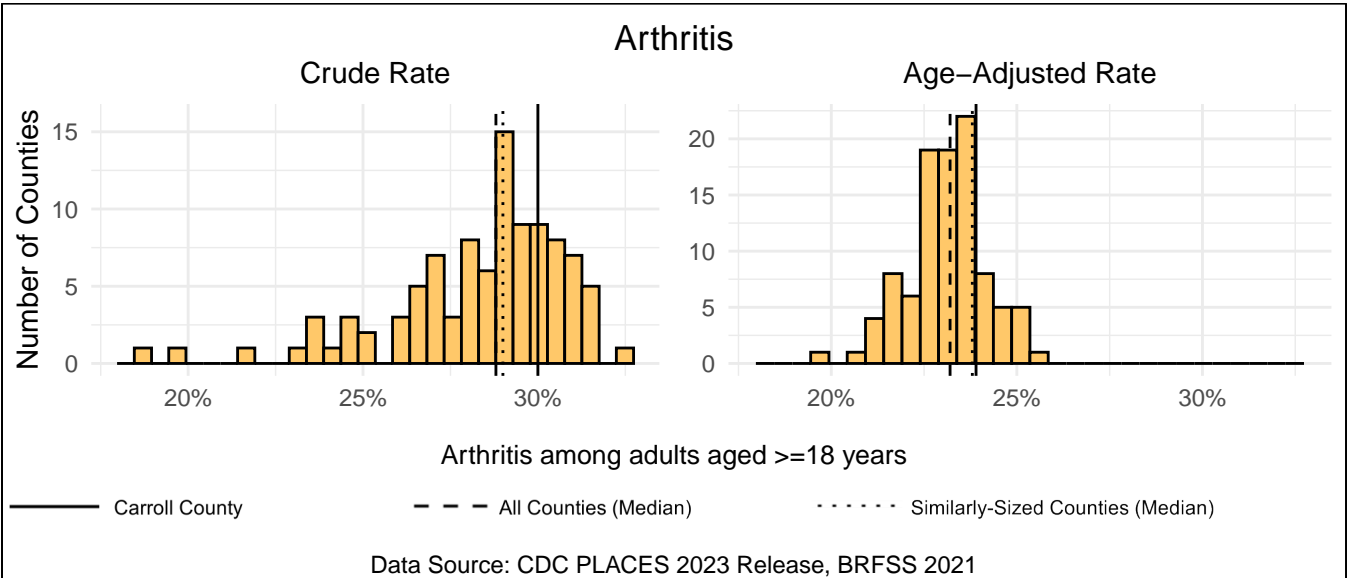
This section includes measures about specific health outcomes such as chronic illness, mental health conditions, and risk factors for future disease. Health outcome measures include but are not limited to arthritis, high blood pressure, cancer, depression, and obesity. Each measure is the percentage of respondents reporting receiving the diagnosis by a doctor, nurse, or other health professional. The link below includes more information about each variable.

<https://www.cdc.gov/places/measure-definitions/health-outcomes/index.html>

Arthritis

Carroll County has a crude rate of 30.0% for arthritis among adults aged ≥ 18 years, which ranks 72nd out of 99 Iowa counties (13th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 23.9%, which ranks 81st out of 99 Iowa counties (10th out of 15 similarly-sized counties).

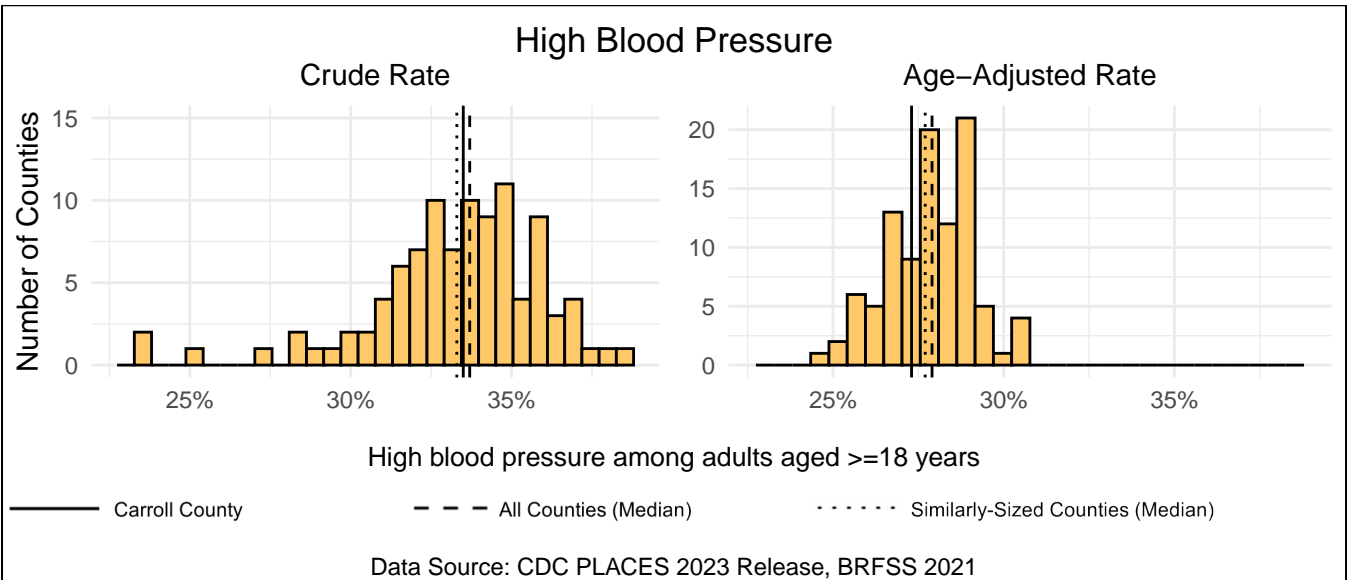
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	30.0%	28.8%	29.0%
Age-Adjusted	23.9%	23.2%	23.8%



High Blood Pressure

Carroll County has a crude rate of 33.5% for high blood pressure among adults aged ≥ 18 years, which ranks 47th out of 99 Iowa counties (9th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 27.3%, which ranks 31st out of 99 Iowa counties (5th out of 15 similarly-sized counties).

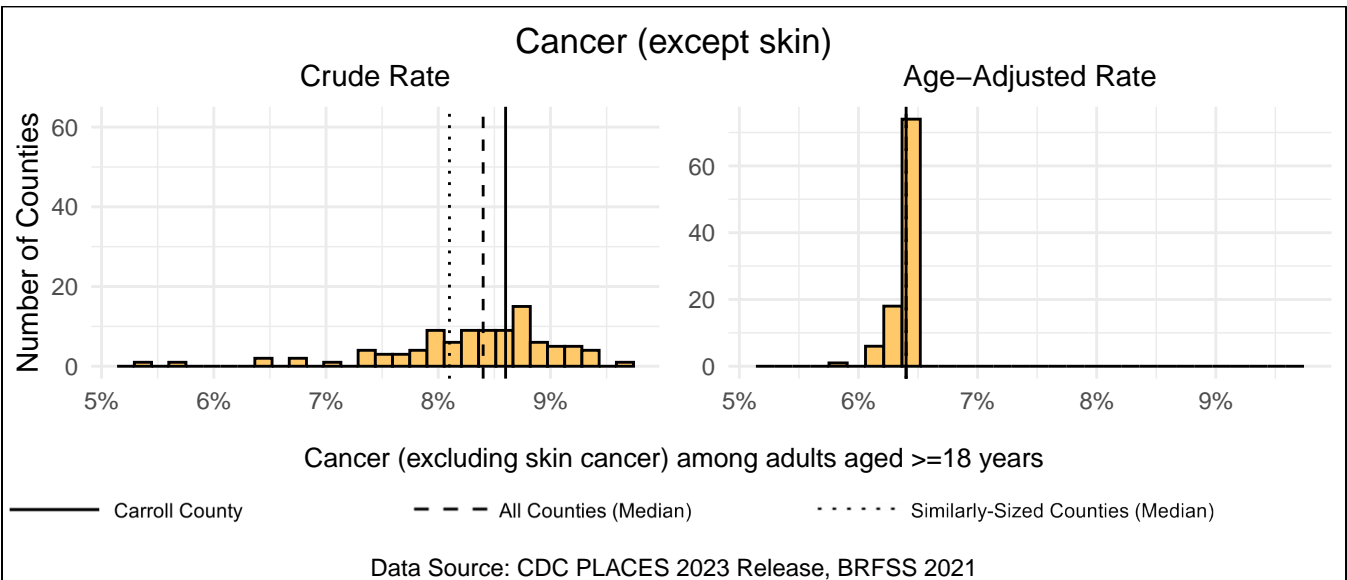
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	33.5%	33.7%	33.3%
Age-Adjusted	27.3%	27.9%	27.7%



Cancer (except skin)

Carroll County has a crude rate of 8.6% for cancer (excluding skin cancer) among adults aged ≥ 18 years, which ranks 55th out of 99 Iowa counties (12th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 6.4%, which ranks 26th out of 99 Iowa counties (7th out of 15 similarly-sized counties).

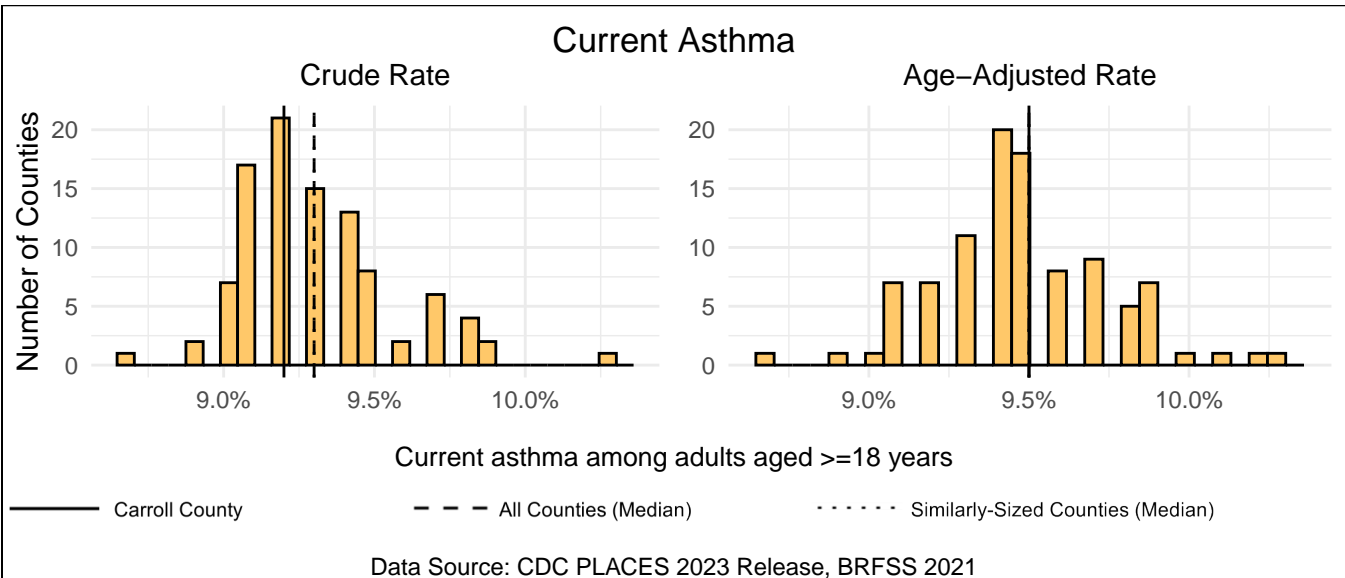
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	8.6%	8.4%	8.1%
Age-Adjusted	6.4%	6.4%	6.4%



Current Asthma

Carroll County has a crude rate of 9.2% for current asthma among adults aged ≥ 18 years, which ranks 28th out of 99 Iowa counties (5th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 9.5%, which ranks 49th out of 99 Iowa counties (8th out of 15 similarly-sized counties).

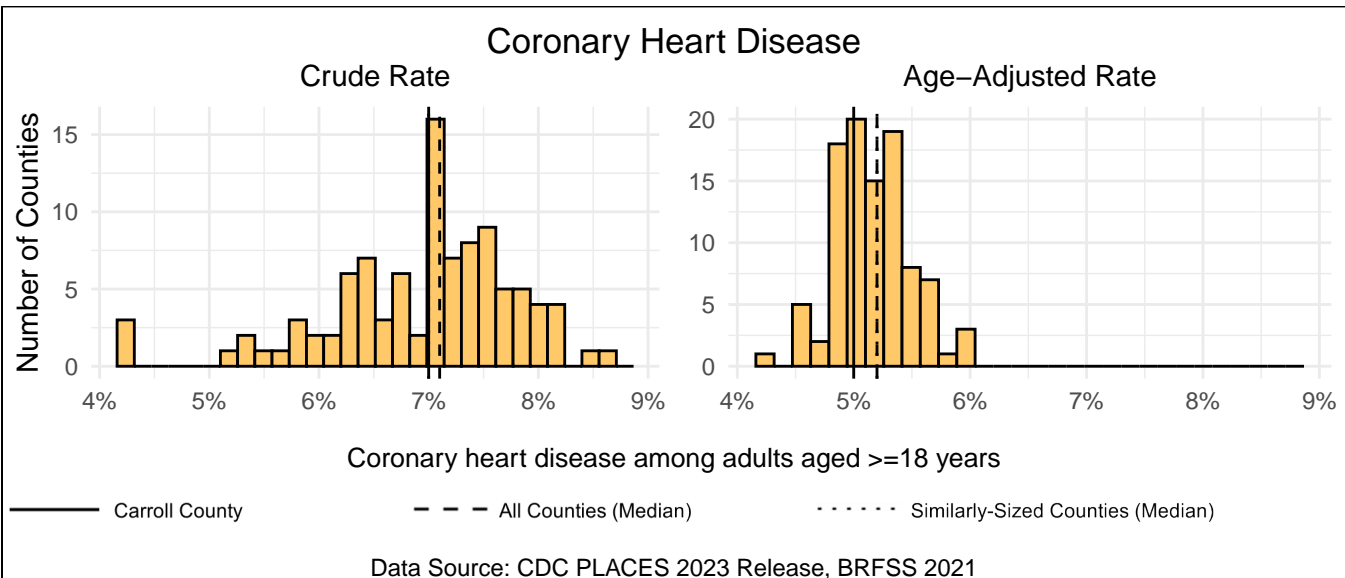
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	9.2%	9.3%	9.3%
Age-Adjusted	9.5%	9.5%	9.5%



Coronary Heart Disease

Carroll County has a crude rate of 7.0% for coronary heart disease among adults aged ≥ 18 years, which ranks 40th out of 99 Iowa counties (7th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 5.0%, which ranks 27th out of 99 Iowa counties (3rd out of 15 similarly-sized counties).

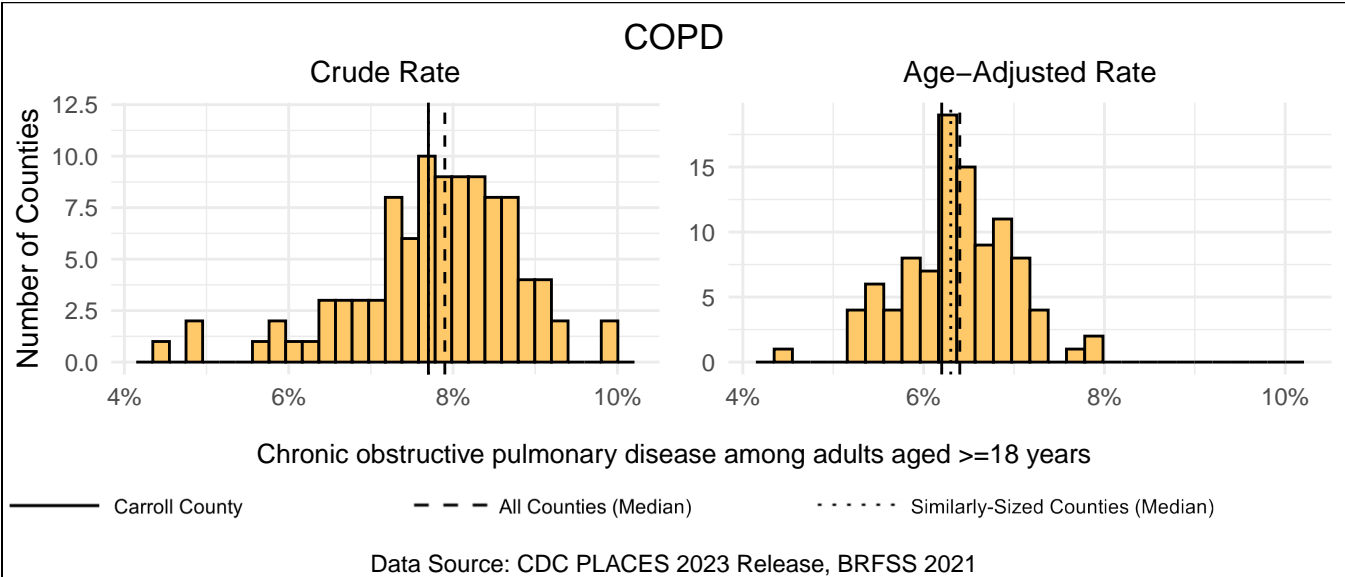
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	7.0%	7.1%	7.0%
Age-Adjusted	5.0%	5.2%	5.2%



COPD

Carroll County has a crude rate of 7.7% for chronic obstructive pulmonary disease among adults aged ≥ 18 years, which ranks 38th out of 99 Iowa counties (7th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 6.2%, which ranks 31st out of 99 Iowa counties (3rd out of 15 similarly-sized counties).

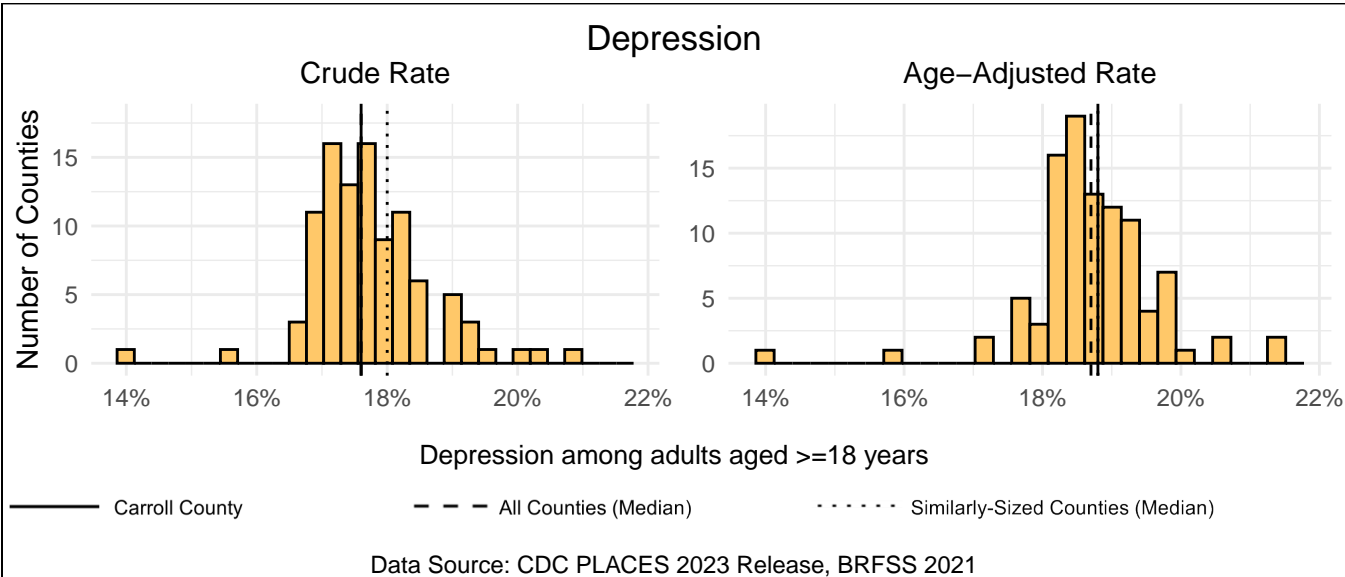
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	7.7%	7.9%	7.7%
Age-Adjusted	6.2%	6.4%	6.3%



Depression

Carroll County has a crude rate of 17.6% for depression among adults aged ≥ 18 years, which ranks 46th out of 99 Iowa counties (4th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 18.8%, which ranks 55th out of 99 Iowa counties (8th out of 15 similarly-sized counties).

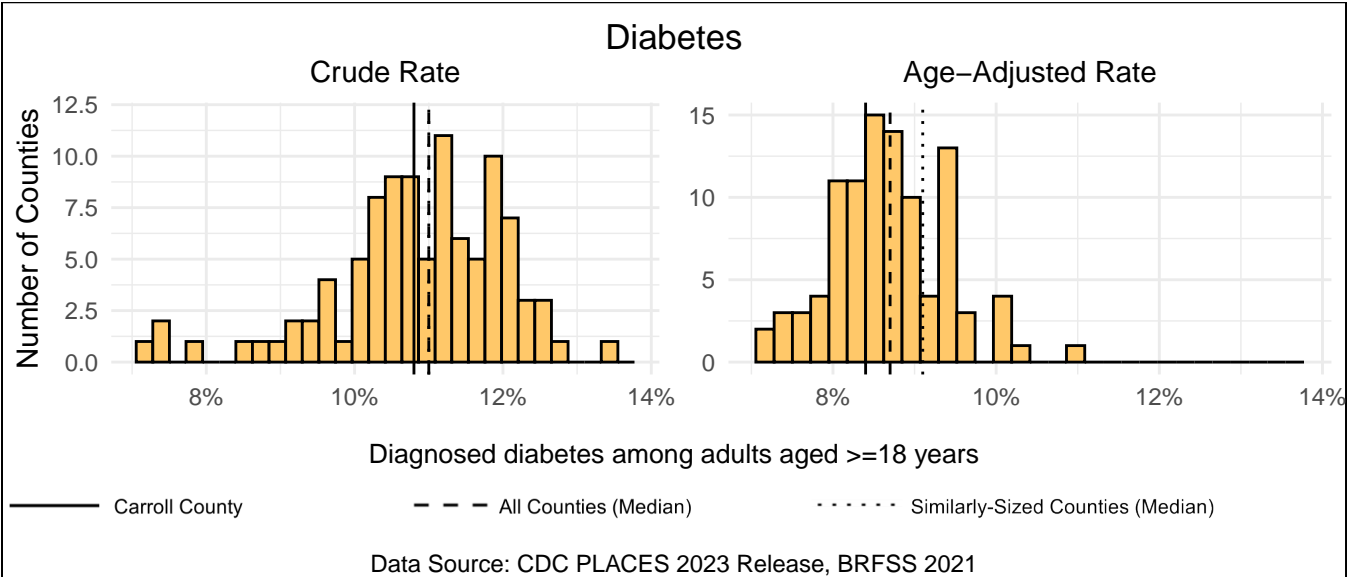
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	17.6%	17.6%	18.0%
Age-Adjusted	18.8%	18.7%	18.8%



Diabetes

Carroll County has a crude rate of 10.8% for diagnosed diabetes among adults aged ≥ 18 years, which ranks 44th out of 99 Iowa counties (6th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 8.4%, which ranks 35th out of 99 Iowa counties (3rd out of 15 similarly-sized counties).

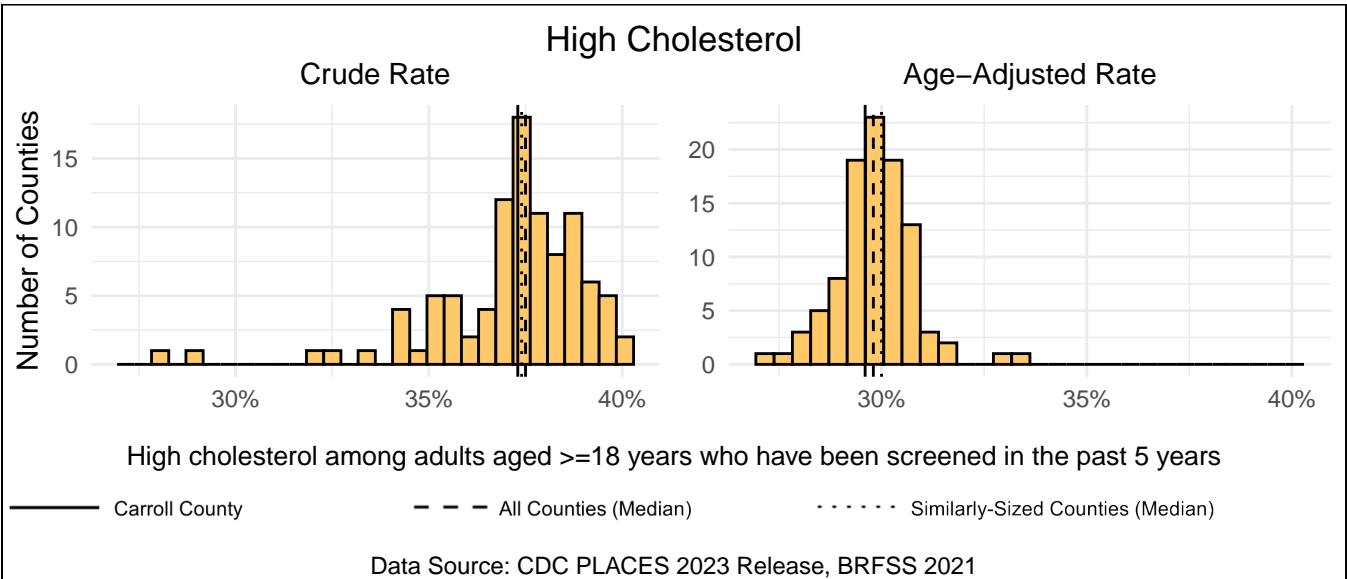
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	10.8%	11.0%	11.0%
Age-Adjusted	8.4%	8.7%	9.1%



High Cholesterol

Carroll County has a crude rate of 37.3% for high cholesterol among adults aged ≥ 18 years who have been screened in the past 5 years, which ranks 42nd out of 99 Iowa counties (7th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 29.6%, which ranks 30th out of 99 Iowa counties (6th out of 15 similarly-sized counties).

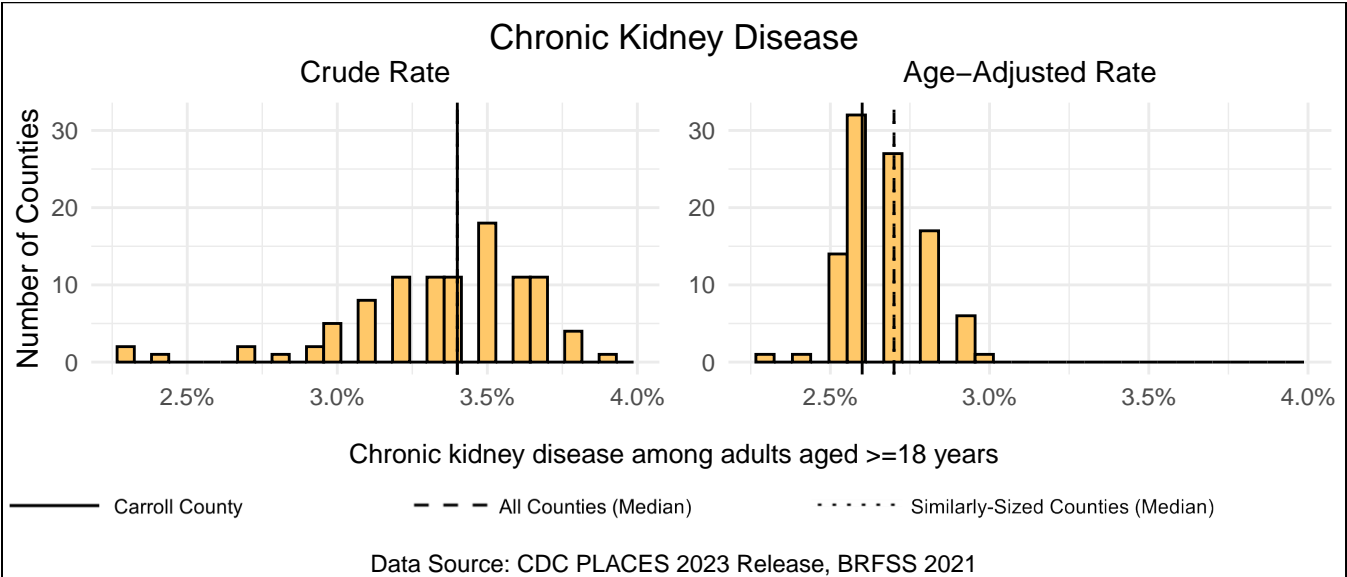
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	37.3%	37.5%	37.4%
Age-Adjusted	29.6%	29.8%	30.0%



Chronic Kidney Disease

Carroll County has a crude rate of 3.4% for chronic kidney disease among adults aged ≥ 18 years, which ranks 44th out of 99 Iowa counties (8th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 2.6%, which ranks 17th out of 99 Iowa counties (3rd out of 15 similarly-sized counties).

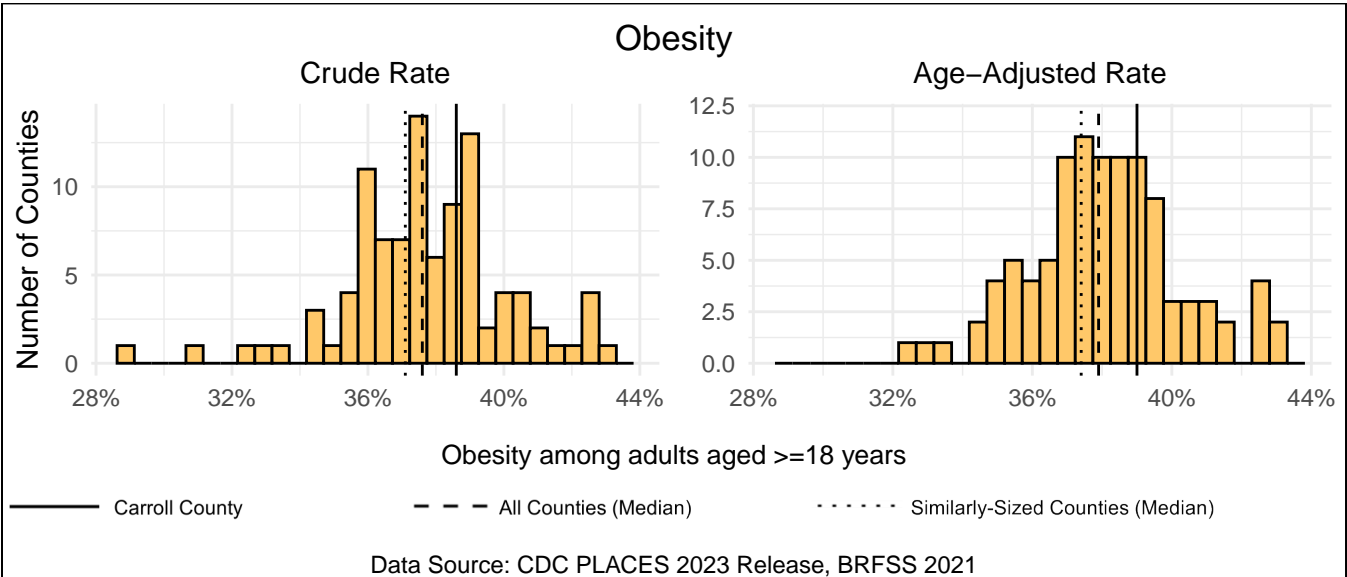
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	3.4%	3.4%	3.4%
Age-Adjusted	2.6%	2.7%	2.7%



Obesity

Carroll County has a crude rate of 38.6% for obesity among adults aged ≥ 18 years, which ranks 64th out of 99 Iowa counties (10th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 39.0%, which ranks 70th out of 99 Iowa counties (11th out of 15 similarly-sized counties).

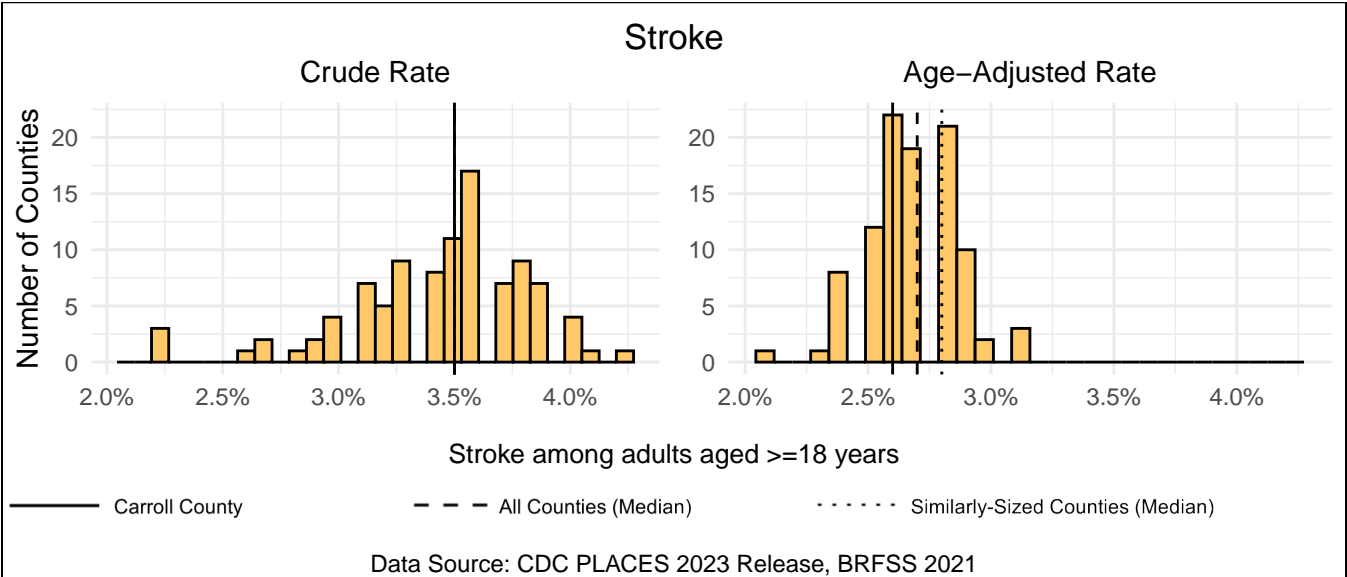
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	38.6%	37.6%	37.1%
Age-Adjusted	39.0%	37.9%	37.4%



Stroke

Carroll County has a crude rate of 3.5% for stroke among adults aged ≥ 18 years, which ranks 43rd out of 99 Iowa counties (8th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 2.6%, which ranks 23rd out of 99 Iowa counties (3rd out of 15 similarly-sized counties).

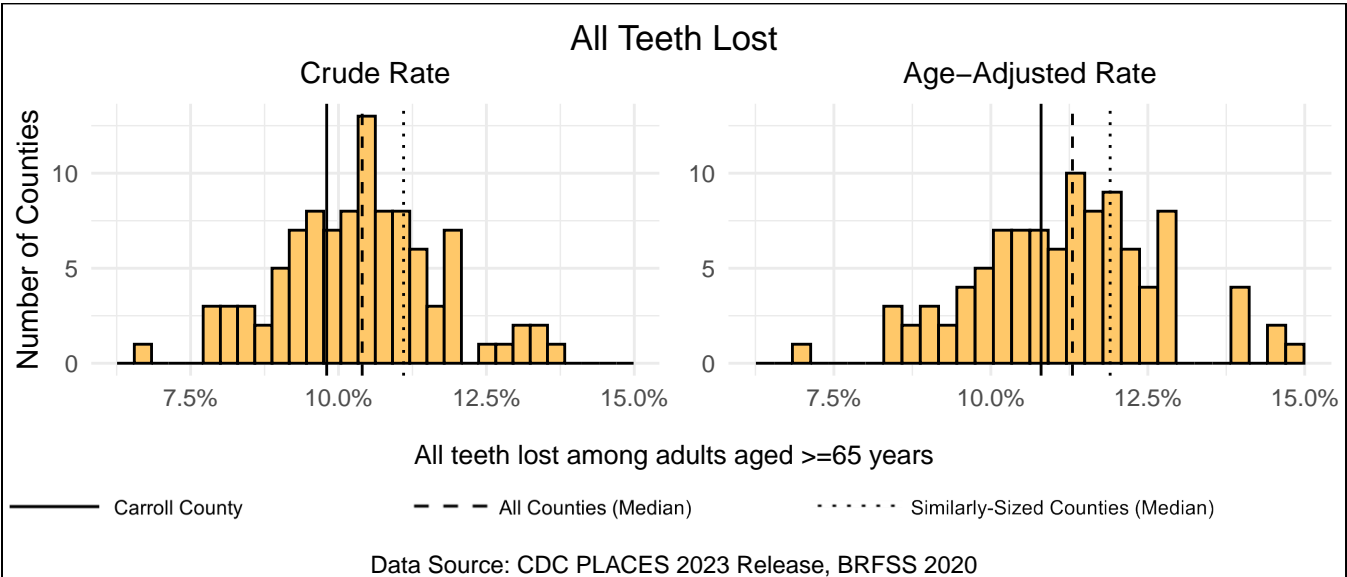
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	3.5%	3.5%	3.5%
Age-Adjusted	2.6%	2.7%	2.8%



All Teeth Lost

Carroll County has a crude rate of 9.8% for all teeth lost among adults aged ≥ 65 years, which ranks 33rd out of 99 Iowa counties (5th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 10.8%, which ranks 36th out of 99 Iowa counties (5th out of 15 similarly-sized counties).

Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	9.8%	10.4%	11.1%
Age-Adjusted	10.8%	11.3%	11.9%



Prevention

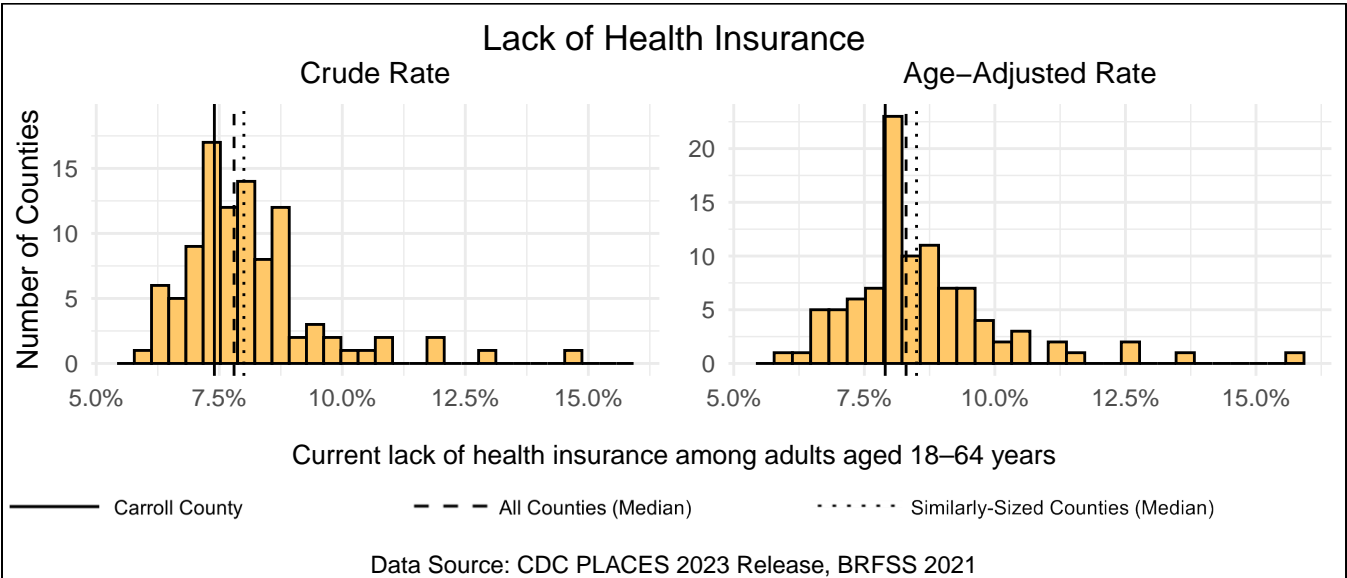
Preventive measures are another practical intervention point for public health professionals as they allow for the early detection of health conditions and improve overall treatment efficacy. This section includes a review of your county’s prevention measures, including preventive screenings and doctor visits. Besides the measure for lack of health insurance, all measures in this section are positive, where a higher rate is a strength for your county. The link below includes more information about each variable.

<https://www.cdc.gov/places/measure-definitions/prevention/index.html>

Lack of Health Insurance

Carroll County has a crude rate of 7.4% for current lack of health insurance among adults aged 18–64 years, which ranks 27th out of 99 Iowa counties (3rd out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 7.9%, which ranks 26th out of 99 Iowa counties (3rd out of 15 similarly-sized counties).

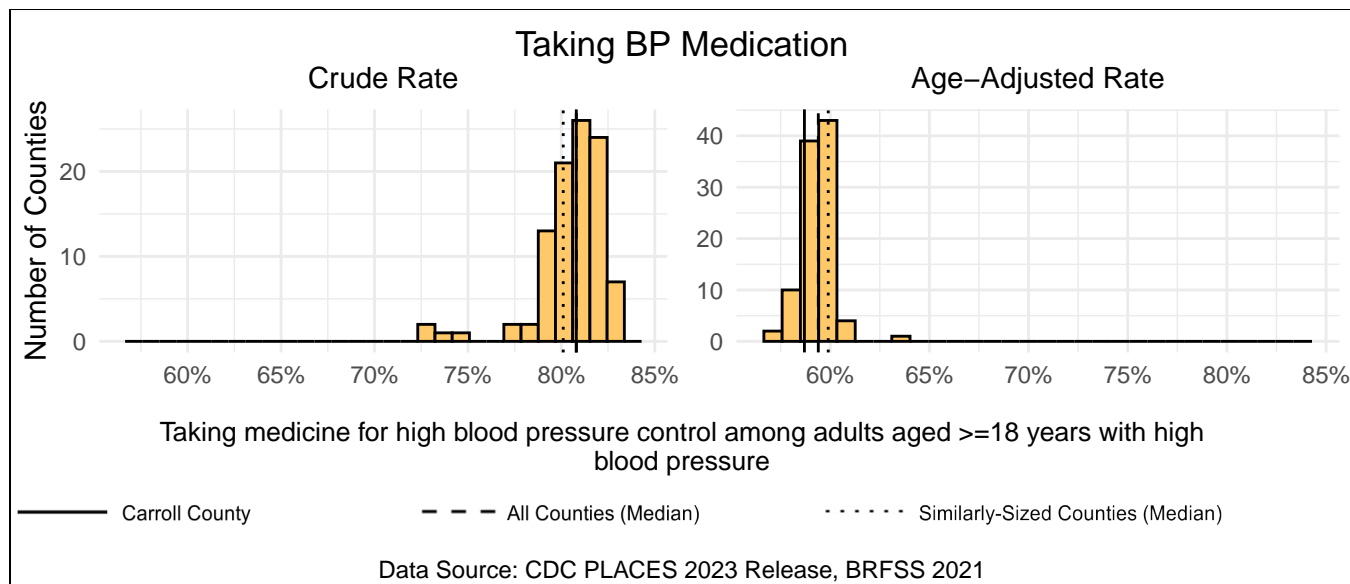
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	7.4%	7.8%	8.0%
Age-Adjusted	7.9%	8.3%	8.5%



Taking BP Medication

Carroll County has a crude rate of 80.8% for taking medicine for high blood pressure control among adults aged ≥ 18 years with high blood pressure, which ranks 49th out of 99 Iowa counties (6th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 58.7%, which ranks 78th out of 99 Iowa counties (14th out of 15 similarly-sized counties).

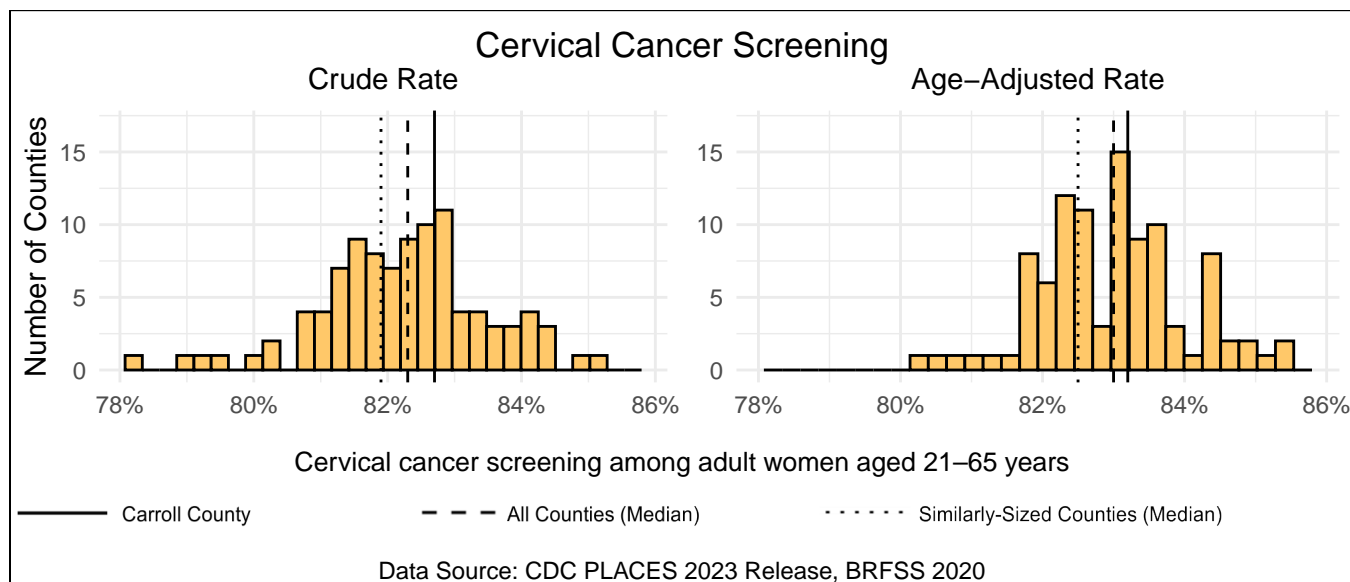
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	80.8%	80.8%	80.1%
Age-Adjusted	58.7%	59.4%	59.9%



Cervical Cancer Screening

Carroll County has a crude rate of 82.7% for cervical cancer screening among adult women aged 21–65 years, which ranks 35th out of 99 Iowa counties (4th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 83.2%, which ranks 39th out of 99 Iowa counties (5th out of 15 similarly-sized counties).

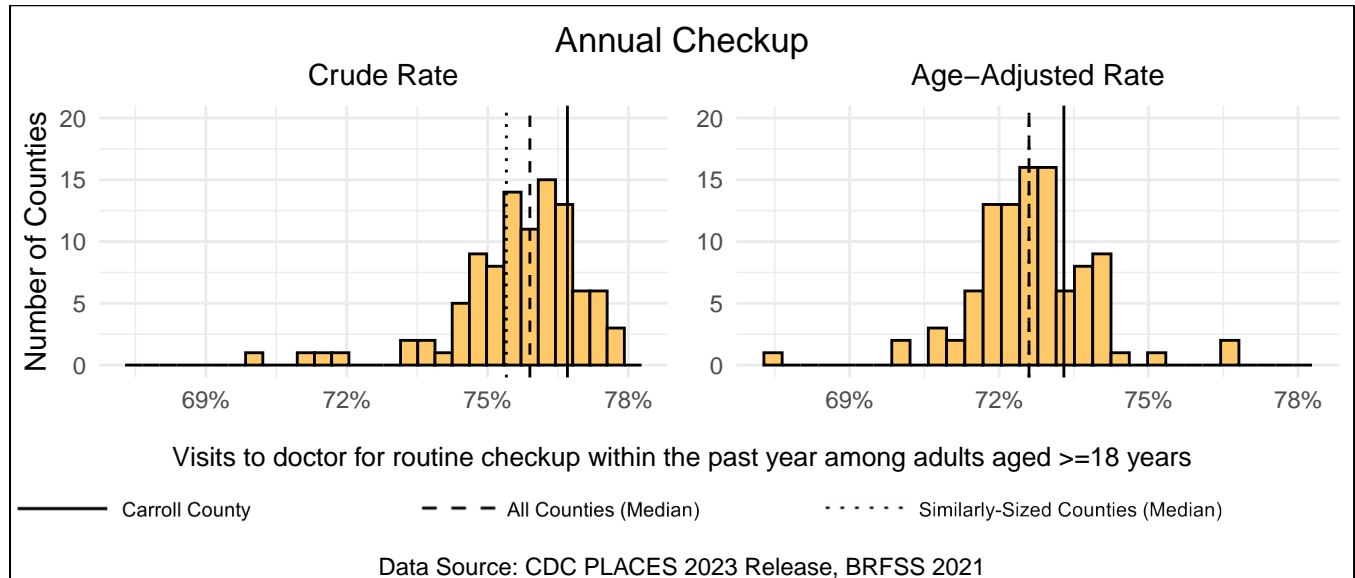
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	82.7%	82.3%	81.9%
Age-Adjusted	83.2%	83.0%	82.5%



Annual Checkup

Carroll County has a crude rate of 76.7% for visits to doctor for routine checkup within the past year among adults aged ≥ 18 years, which ranks 20th out of 99 Iowa counties (2nd out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 73.3%, which ranks 26th out of 99 Iowa counties (6th out of 15 similarly-sized counties).

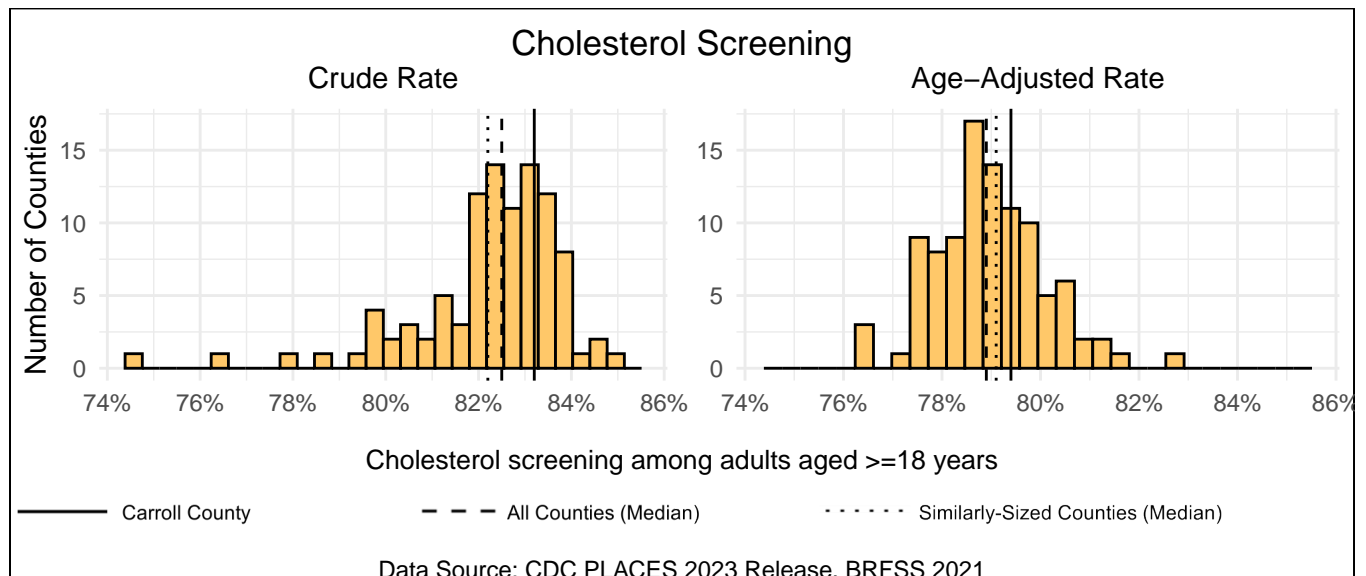
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	76.7%	75.9%	75.4%
Age-Adjusted	73.3%	72.6%	72.6%



Cholesterol Screening

Carroll County has a crude rate of 83.2% for cholesterol screening among adults aged ≥ 18 years, which ranks 25th out of 99 Iowa counties (2nd out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 79.4%, which ranks 30th out of 99 Iowa counties (4th out of 15 similarly-sized counties).

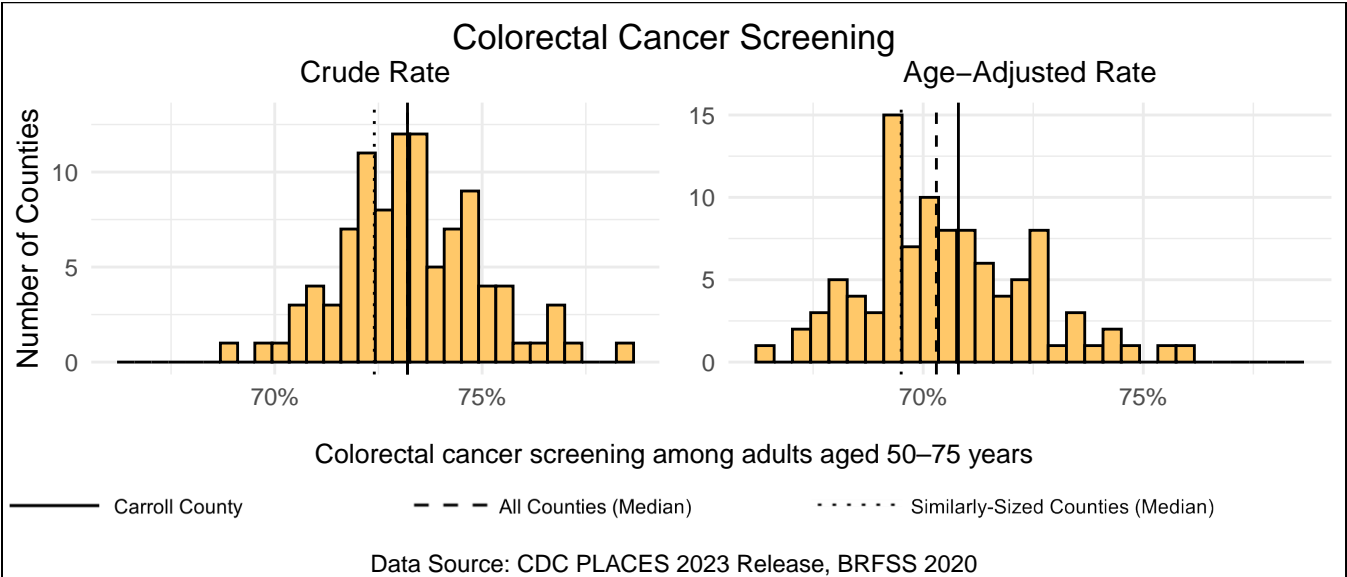
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	83.2%	82.5%	82.2%
Age-Adjusted	79.4%	78.9%	79.1%



Colorectal Cancer Screening

Carroll County has a crude rate of 73.2% for colorectal cancer screening among adults aged 50–75 years, which ranks 49th out of 99 Iowa counties (5th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 70.8%, which ranks 39th out of 99 Iowa counties (4th out of 15 similarly-sized counties).

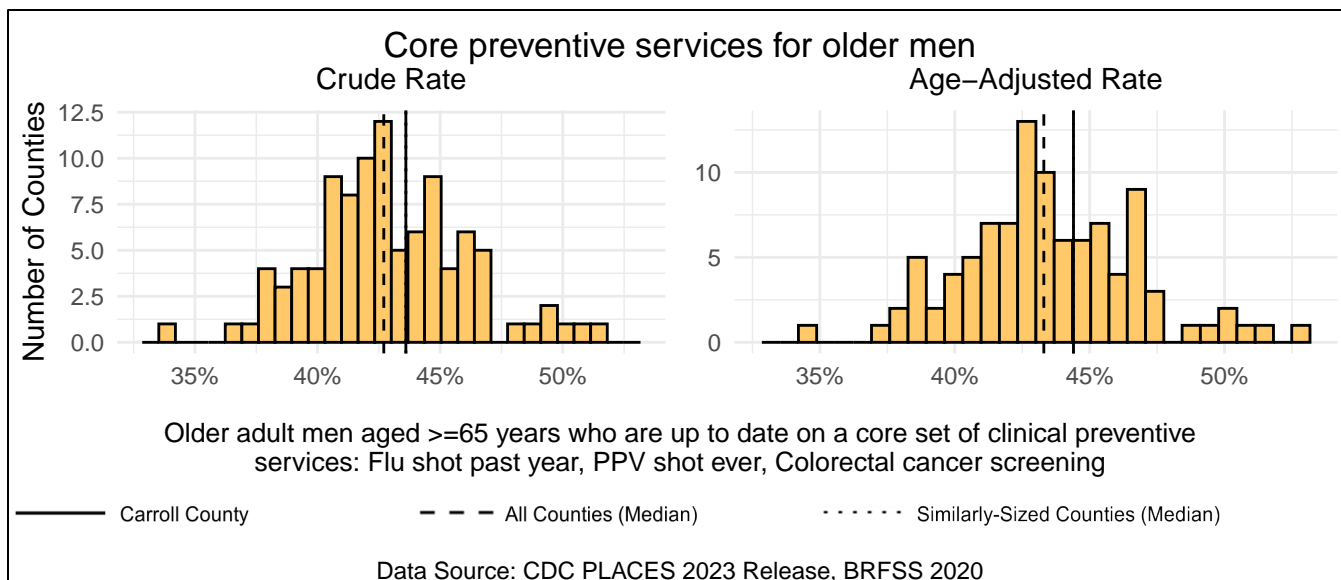
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	73.2%	73.2%	72.4%
Age-Adjusted	70.8%	70.3%	69.5%



Core preventive services for older men

Carroll County has a crude rate of 43.6% for older adult men aged ≥ 65 years who are up to date on a core set of clinical preventive services: flu shot past year, ppv shot ever, colorectal cancer screening, which ranks 38th out of 99 Iowa counties (8th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 44.4%, which ranks 36th out of 99 Iowa counties (8th out of 15 similarly-sized counties).

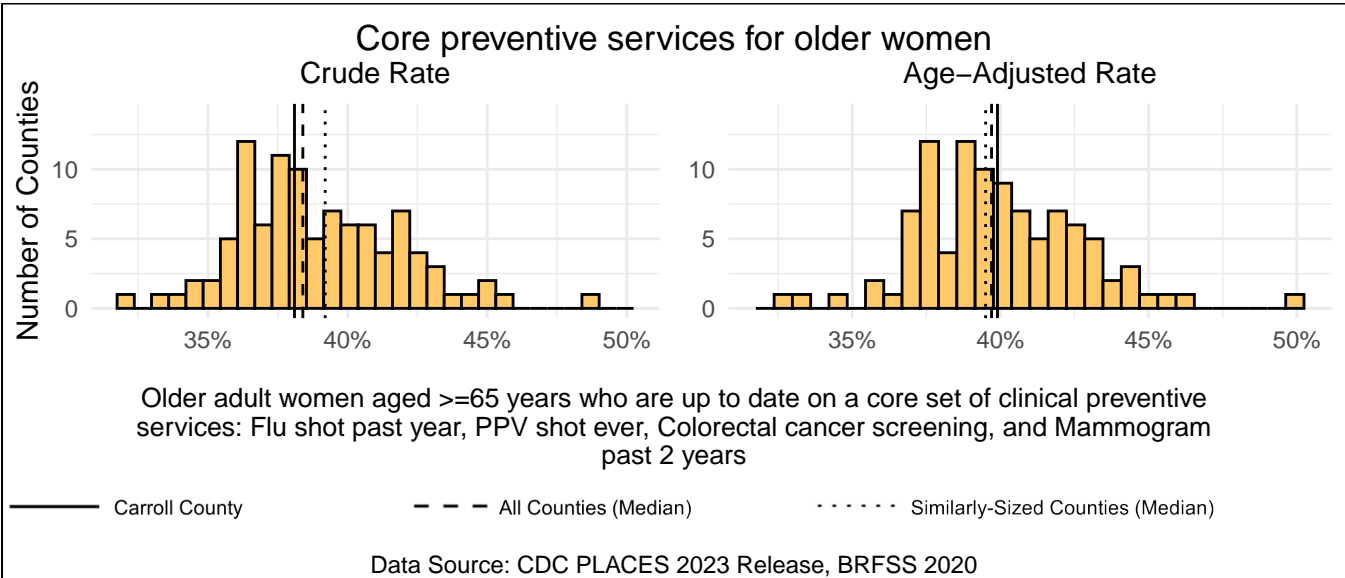
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	43.6%	42.7%	43.6%
Age-Adjusted	44.4%	43.3%	44.4%



Core preventive services for older women

Carroll County has a crude rate of 38.1% for older adult women aged ≥ 65 years who are up to date on a core set of clinical preventive services: flu shot past year, ppv shot ever, colorectal cancer screening, and mammogram past 2 years, which ranks 56th out of 99 Iowa counties (10th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 39.9%, which ranks 45th out of 99 Iowa counties (7th out of 15 similarly-sized counties).

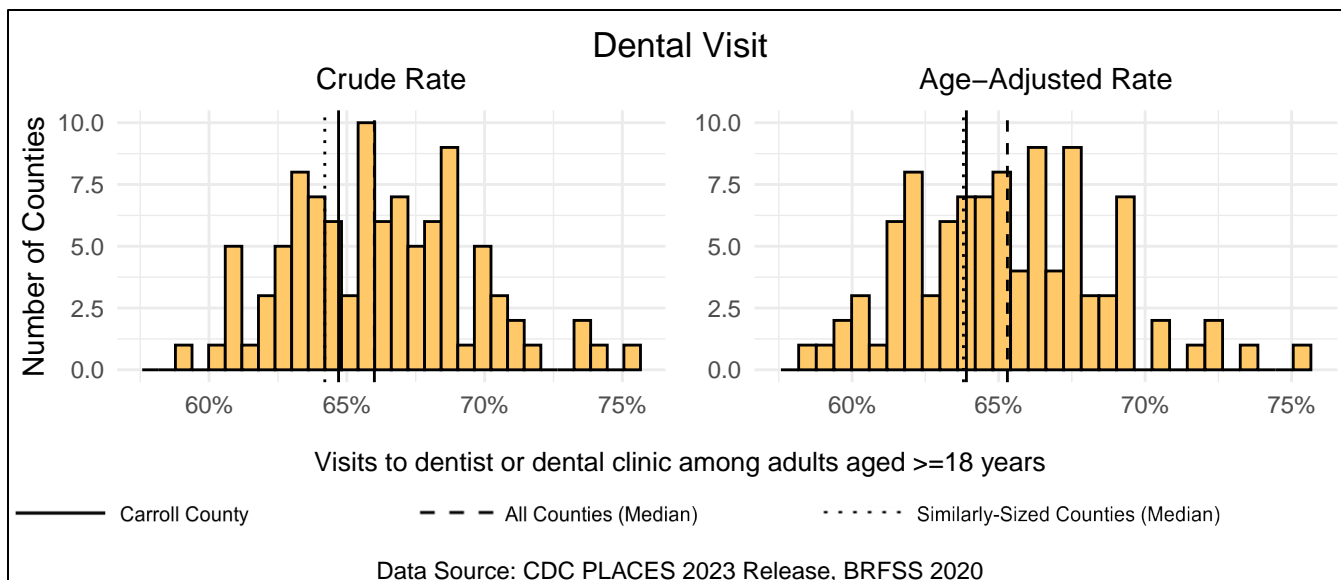
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	38.1%	38.4%	39.2%
Age-Adjusted	39.9%	39.7%	39.5%



Dental Visit

Carroll County has a crude rate of 64.7% for visits to dentist or dental clinic among adults aged ≥ 18 years, which ranks 65th out of 99 Iowa counties (7th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 63.9%, which ranks 63rd out of 99 Iowa counties (7th out of 15 similarly-sized counties).

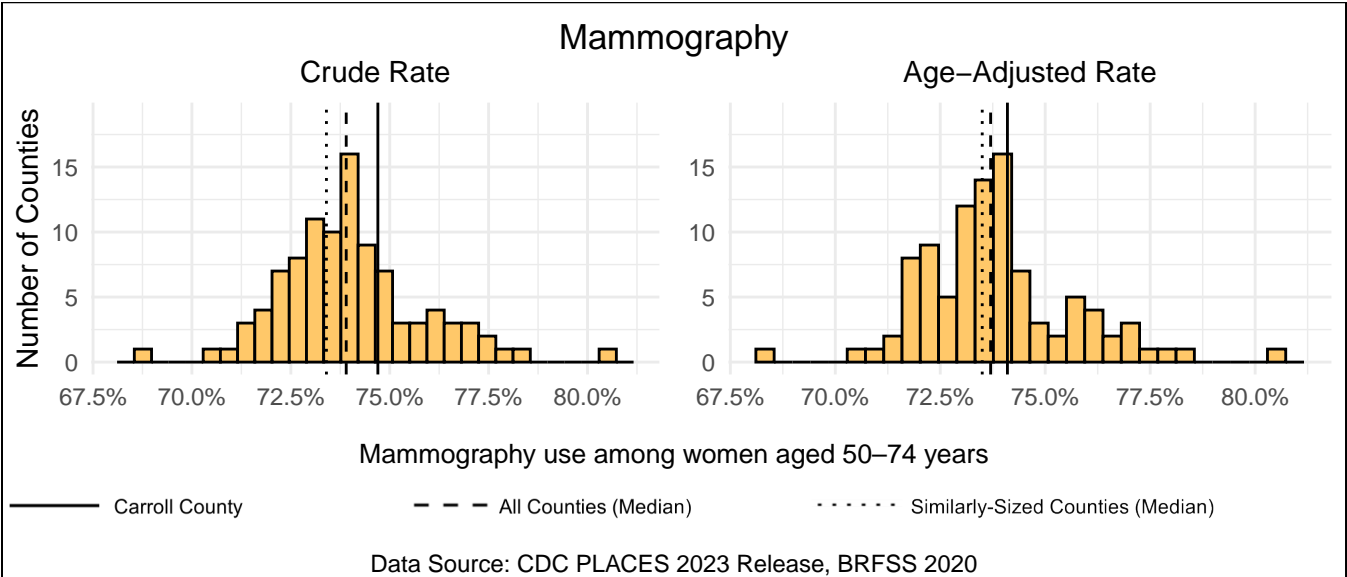
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	64.7%	66.0%	64.2%
Age-Adjusted	63.9%	65.3%	63.8%



Mammography

Carroll County has a crude rate of 74.7% for mammography use among women aged 50–74 years, which ranks 27th out of 99 Iowa counties (4th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 74.1%, which ranks 33rd out of 99 Iowa counties (5th out of 15 similarly-sized counties).

Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	74.7%	73.9%	73.4%
Age-Adjusted	74.1%	73.7%	73.5%



Disability

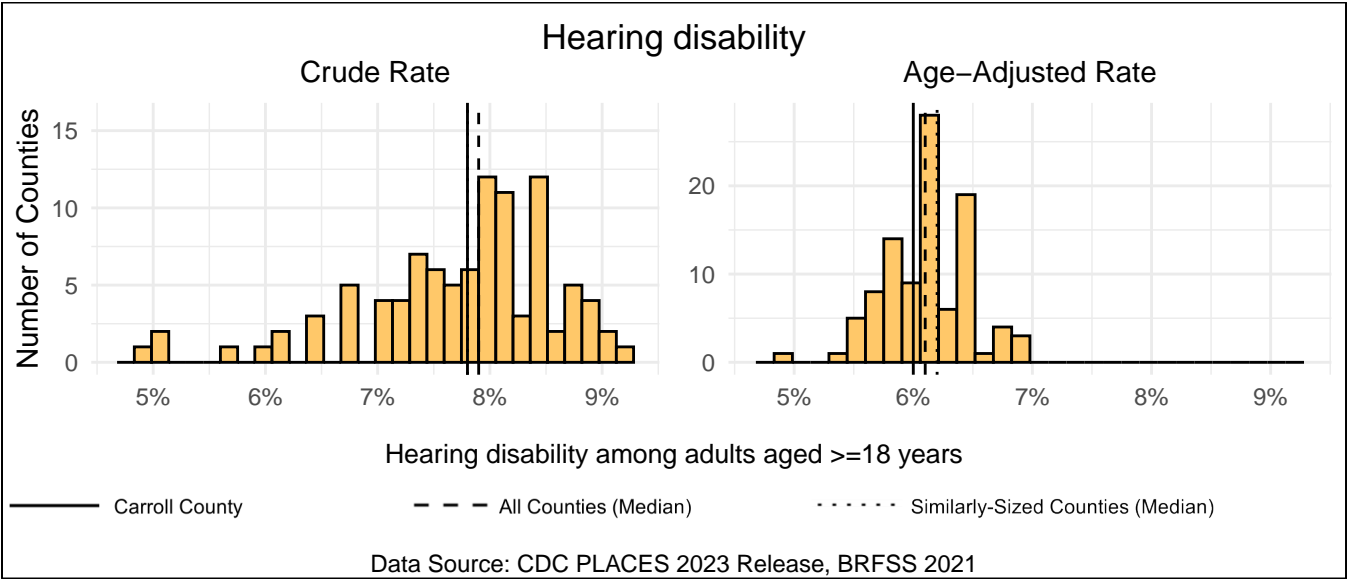
This section includes measures of physical and cognitive disabilities. Respondents were asked to report on six disabilities: hearing, vision, cognition, mobility, self-care, and independent living. The final measure reports the rate of respondents that answered yes to any of the previous six disabilities. The link below includes more information about each variable.

<https://www.cdc.gov/places/measure-definitions/unhealthy-behaviors/index.html>

Hearing disability

Carroll County has a crude rate of 7.8% for hearing disability among adults aged ≥ 18 years, which ranks 42nd out of 99 Iowa counties (8th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 6.0%, which ranks 30th out of 99 Iowa counties (4th out of 15 similarly-sized counties).

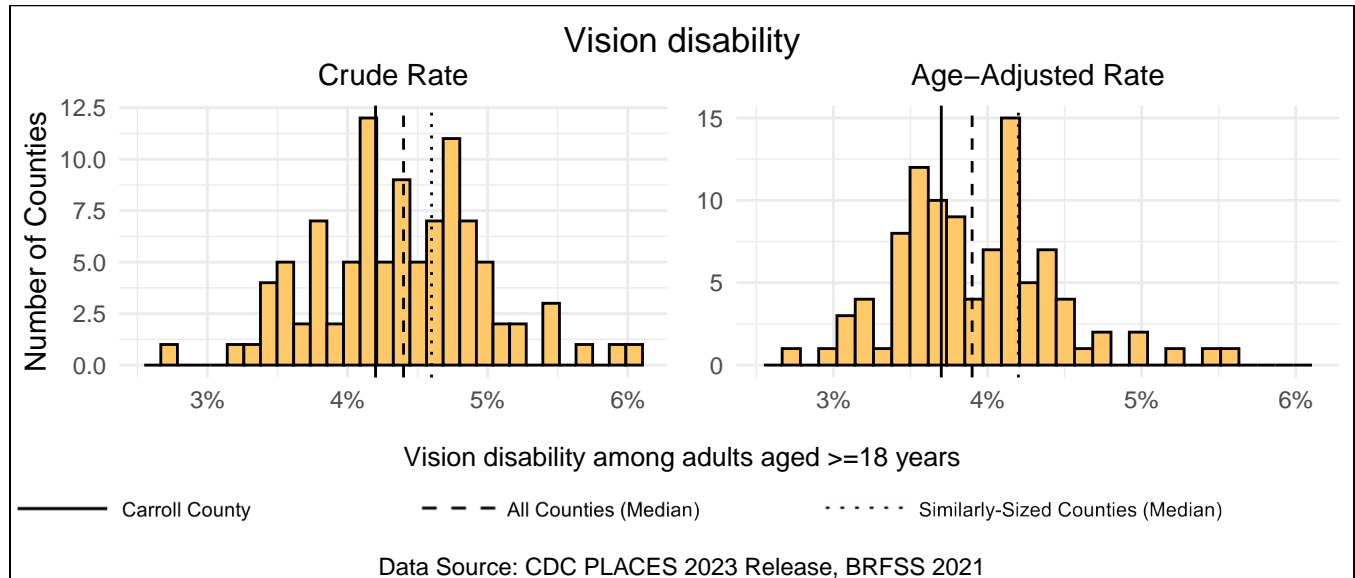
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	7.8%	7.9%	7.8%
Age-Adjusted	6.0%	6.1%	6.2%



Vision disability

Carroll County has a crude rate of 4.2% for vision disability among adults aged ≥ 18 years, which ranks 31st out of 99 Iowa counties (3rd out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 3.7%, which ranks 31st out of 99 Iowa counties (3rd out of 15 similarly-sized counties).

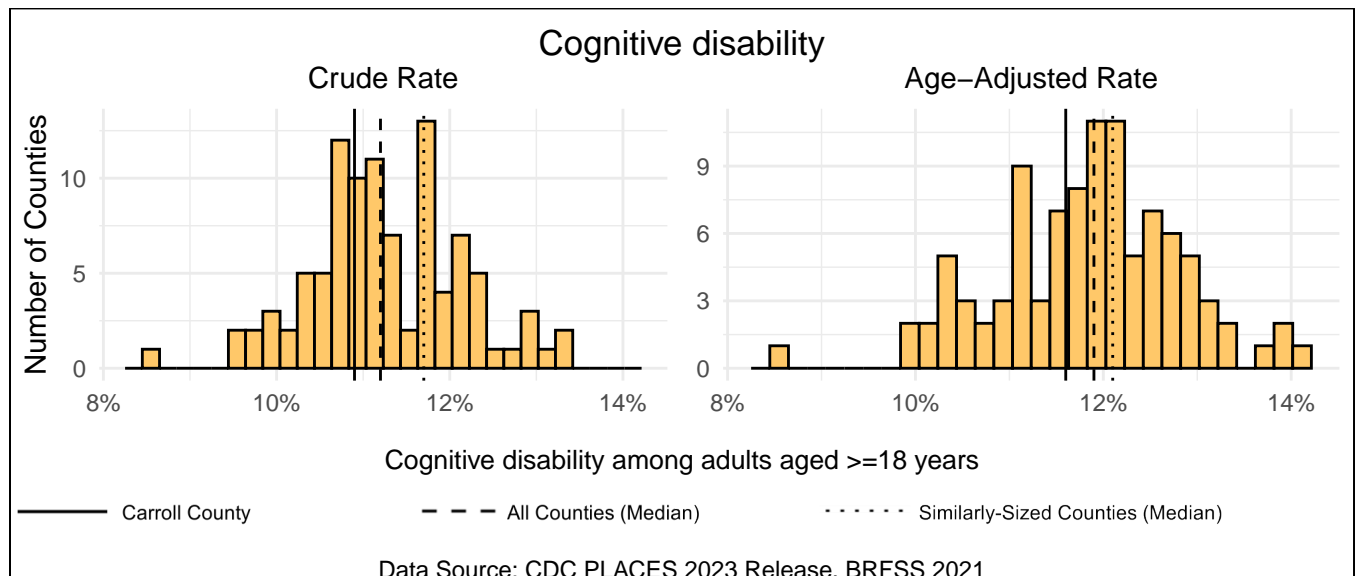
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	4.2%	4.4%	4.6%
Age-Adjusted	3.7%	3.9%	4.2%



Cognitive disability

Carroll County has a crude rate of 10.9% for cognitive disability among adults aged ≥ 18 years, which ranks 33rd out of 99 Iowa counties (5th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 11.6%, which ranks 35th out of 99 Iowa counties (5th out of 15 similarly-sized counties).

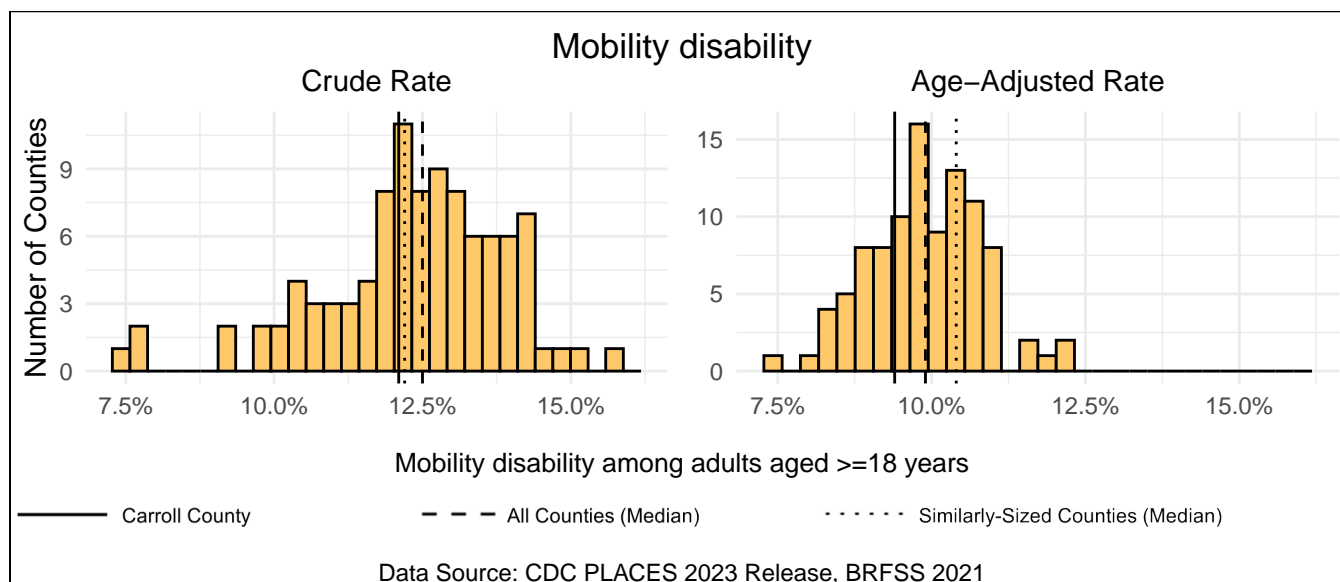
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	10.9%	11.2%	11.7%
Age-Adjusted	11.6%	11.9%	12.1%



Mobility disability

Carroll County has a crude rate of 12.1% for mobility disability among adults aged ≥ 18 years, which ranks 35th out of 99 Iowa counties (3rd out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 9.4%, which ranks 28th out of 99 Iowa counties (3rd out of 15 similarly-sized counties).

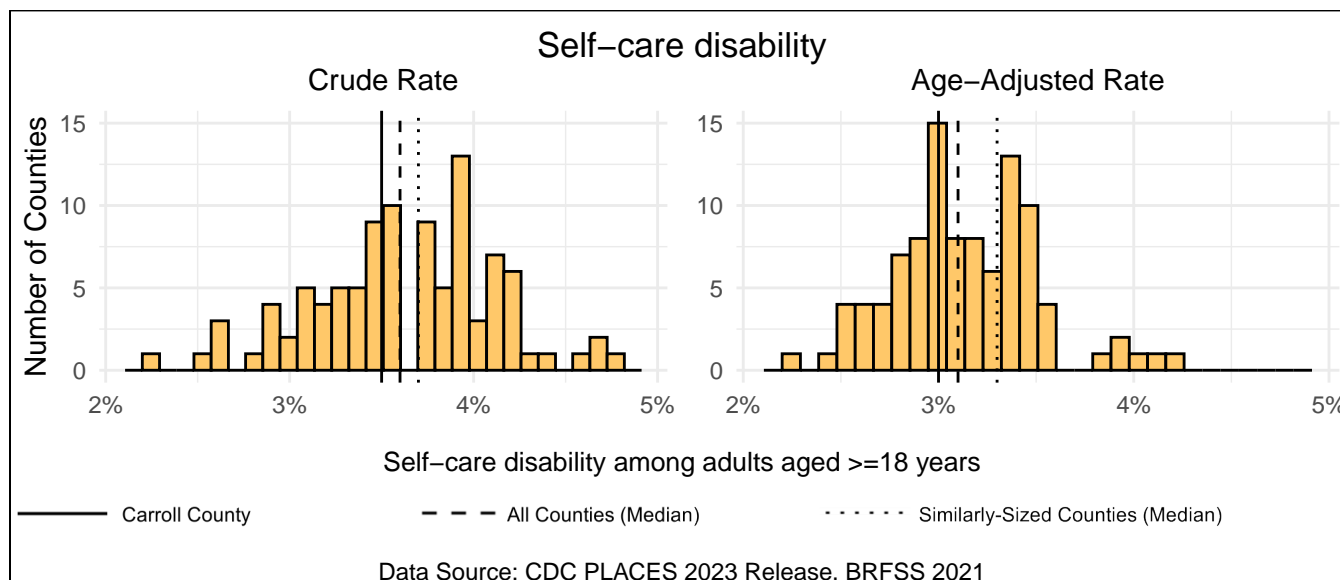
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	12.1%	12.5%	12.2%
Age-Adjusted	9.4%	9.9%	10.4%



Self-care disability

Carroll County has a crude rate of 3.5% for self-care disability among adults aged ≥ 18 years, which ranks 32nd out of 99 Iowa counties (3rd out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 3.0%, which ranks 30th out of 99 Iowa counties (3rd out of 15 similarly-sized counties).

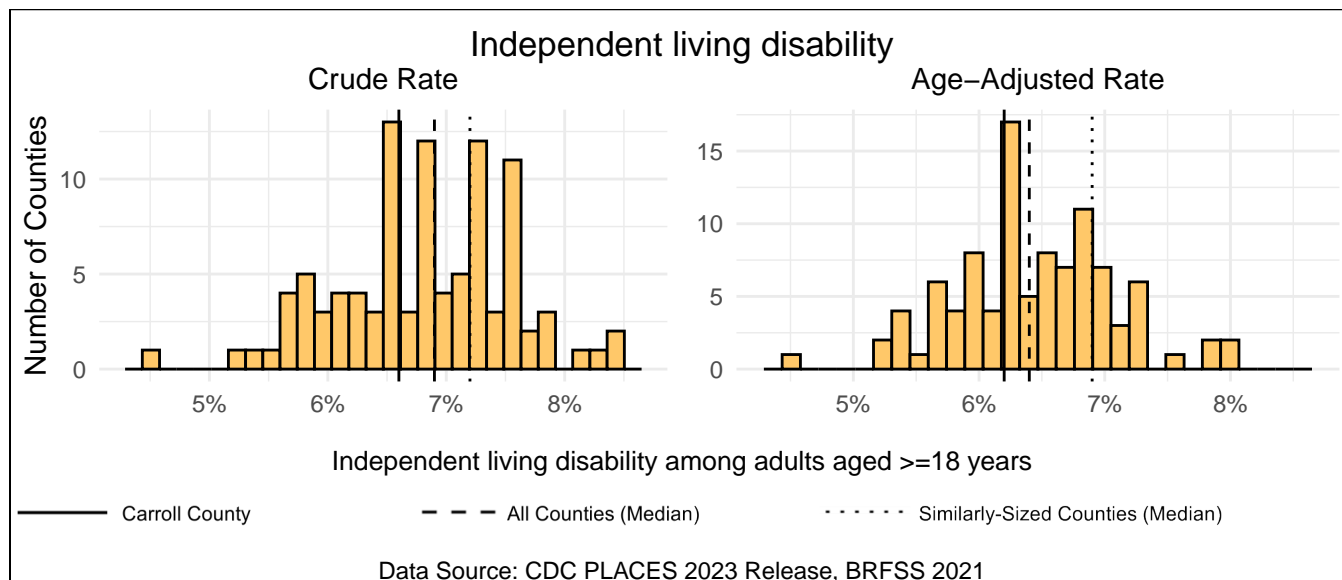
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	3.5%	3.6%	3.7%
Age-Adjusted	3.0%	3.1%	3.3%



Independent living disability

Carroll County has a crude rate of 6.6% for independent living disability among adults aged ≥ 18 years, which ranks 33rd out of 99 Iowa counties (4th out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 6.2%, which ranks 31st out of 99 Iowa counties (3rd out of 15 similarly-sized counties).

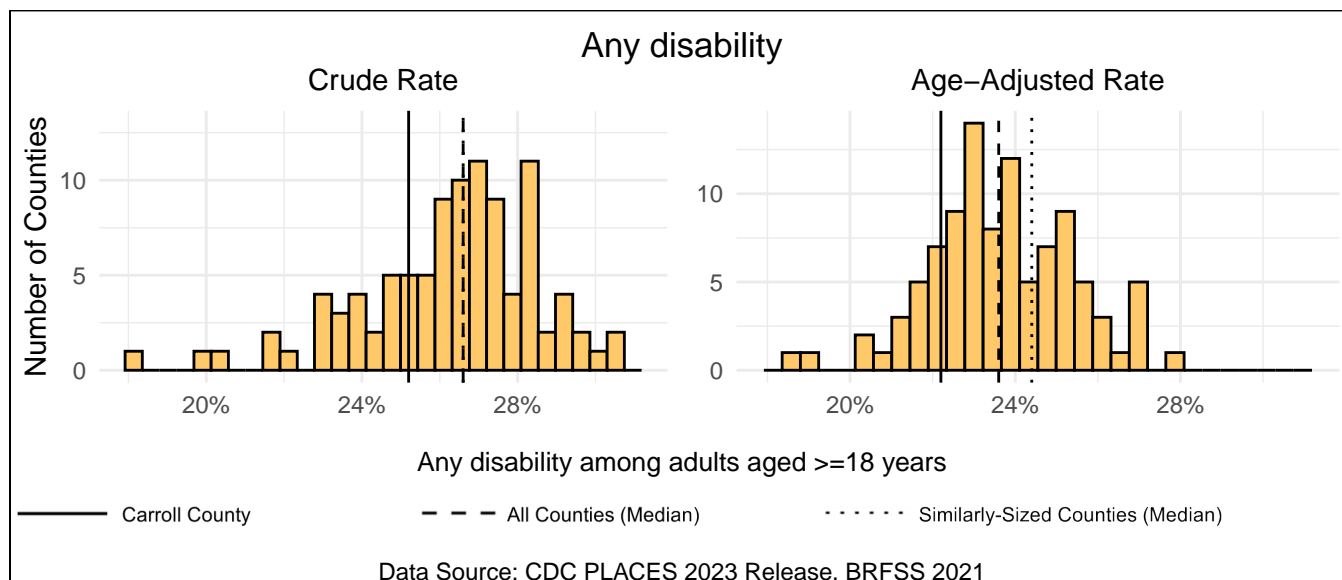
Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	6.6%	6.9%	7.2%
Age-Adjusted	6.2%	6.4%	6.9%



Any disability

Carroll County has a crude rate of 25.2% for any disability among adults aged ≥ 18 years, which ranks 26th out of 99 Iowa counties (2nd out of 15 similarly-sized counties). The age-adjusted rate for Carroll County is 22.2%, which ranks 19th out of 99 Iowa counties (2nd out of 15 similarly-sized counties).

Measure Type	Carroll County	All Counties	Similarly-Sized Counties
Crude	25.2%	26.6%	26.6%
Age-Adjusted	22.2%	23.6%	24.4%



Appendix 1: CDC PLACES Data

This report uses a novel dataset from the Centers for Disease Control and Prevention (CDC) called PLACES: Local Data for Better Health. The PLACES dataset uses small area estimation methods to provide estimates of health measures for counties, places, census tracts, and zip code tabulation areas. The estimates are created with a multilevel statistical modeling framework that utilizes CDC's Behavioral Risk Factor Surveillance System (BRFSS), Census population counts, and American Community Survey demographic and socioeconomic data.

Relevant links for CDC PLACES can be found below:

- [PLACES Homepage](#)
- [Measure Definitions](#)
- [Methodology](#)



Appendix 2: Carroll County PLACES Data

Category	Health Domain	Crude Rate Rank	Crude Rate (95% CI)	Age-Adj. Rate Rank	Age-Adj. Rate (95% CI)
Health Status	Mental Health	20	13.7% (11.7% - 15.7%)	28	15.2% (12.9% - 17.5%)
Health Status	Physical Health	34	10.8% (9.0% - 12.6%)	29	9.6% (8.1% - 11.2%)
Health Status	General Health	31	14.4% (11.9% - 17.0%)	32	12.8% (10.5% - 15.2%)
Health Risk Behaviors	Sleep <7 hours	31	29.6% (28.1% - 31.1%)	31	30.9% (29.2% - 32.6%)
Health Risk Behaviors	Current Smoking	30	16.1% (12.5% - 19.7%)	33	17.1% (13.2% - 20.9%)
Health Risk Behaviors	Physical Inactivity	31	25.9% (20.9% - 31.1%)	29	24.1% (19.3% - 29.0%)
Health Risk Behaviors	Binge Drinking	70	19.0% (15.7% - 22.5%)	78	22.2% (18.4% - 26.2%)
Health Outcomes	Diabetes	44	10.8% (9.0% - 12.6%)	35	8.4% (7.0% - 9.8%)
Health Outcomes	Coronary Heart Disease	40	7.0% (6.0% - 8.0%)	27	5.0% (4.4% - 5.8%)
Health Outcomes	High Blood Pressure	47	33.5% (29.3% - 37.7%)	31	27.3% (23.6% - 31.2%)
Health Outcomes	All Teeth Lost	33	9.8% (6.2% - 14.3%)	36	10.8% (7.1% - 15.5%)
Health Outcomes	Arthritis	72	30.0% (25.7% - 34.3%)	81	23.9% (20.3% - 27.8%)
Health Outcomes	High Cholesterol	42	37.3% (32.8% - 42.2%)	30	29.6% (25.3% - 34.1%)
Health Outcomes	Cancer (except skin)	55	8.6% (7.7% - 9.6%)	26	6.4% (5.7% - 7.1%)
Health Outcomes	COPD	38	7.7% (6.2% - 9.3%)	31	6.2% (5.1% - 7.4%)
Health Outcomes	Depression	46	17.6% (14.3% - 21.2%)	55	18.8% (15.4% - 22.5%)
Health Outcomes	Chronic Kidney Disease	44	3.4% (3.0% - 3.8%)	17	2.6% (2.3% - 2.9%)
Health Outcomes	Current Asthma	28	9.2% (8.1% - 10.5%)	49	9.5% (8.3% - 10.7%)
Health Outcomes	Obesity	64	38.6% (31.2% - 46.2%)	70	39.0% (31.4% - 46.4%)
Health Outcomes	Stroke	43	3.5% (3.0% - 4.0%)	23	2.6% (2.3% - 3.0%)
Prevention	Mammography	27	74.7% (70.1% - 79.1%)	33	74.1% (69.1% - 78.7%)
Prevention	Dental Visit	65	64.7% (61.1% - 68.2%)	63	63.9% (60.0% - 67.8%)
Prevention	Colorectal Cancer Screening	49	73.2% (70.0% - 76.4%)	39	70.8% (67.2% - 74.1%)
Prevention	Core preventive services for older women	56	38.1% (30.8% - 46.2%)	45	39.9% (32.4% - 48.1%)
Prevention	Cervical Cancer Screening	35	82.7% (79.9% - 85.2%)	39	83.2% (80.6% - 85.6%)

Category	Health Domain	Crude Rate Rank	Crude Rate (95% CI)	Age-Adj. Rate Rank	Age-Adj. Rate (95% CI)
Prevention	Annual Checkup	20	76.7% (71.9% - 80.8%)	26	73.3% (68.1% - 77.9%)
Prevention	Taking BP Medication	49	80.8% (77.5% - 83.6%)	78	58.7% (53.6% - 63.6%)
Prevention	Health Insurance	27	7.4% (5.7% - 9.6%)	26	7.9% (6.0% - 10.2%)
Prevention	Cholesterol Screening	25	83.2% (80.2% - 85.8%)	30	79.4% (75.9% - 82.6%)
Prevention	Core preventive services for older men	38	43.6% (35.1% - 52.8%)	36	44.4% (35.8% - 53.2%)
Disability	Cognitive Disability	33	10.9% (9.1% - 12.9%)	35	11.6% (9.5% - 13.6%)
Disability	Independent Living Disability	33	6.6% (5.5% - 7.8%)	31	6.2% (5.2% - 7.3%)
Disability	Mobility Disability	35	12.1% (9.9% - 14.3%)	28	9.4% (7.7% - 11.1%)
Disability	Any Disability	26	25.2% (21.1% - 29.3%)	19	22.2% (18.7% - 26.2%)
Disability	Vision Disability	31	4.2% (3.5% - 4.9%)	31	3.7% (3.1% - 4.3%)
Disability	Hearing Disability	42	7.8% (6.8% - 8.9%)	30	6.0% (5.2% - 6.7%)
Disability	Self-care Disability	32	3.5% (2.9% - 4.1%)	30	3.0% (2.5% - 3.4%)

The 95% confidence interval shown in parentheses represents the range of 95% of CDC area estimates under different model assumptions using Monte Carlo simulations.

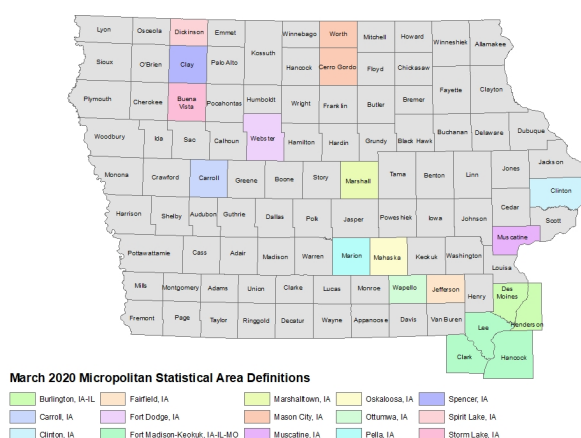
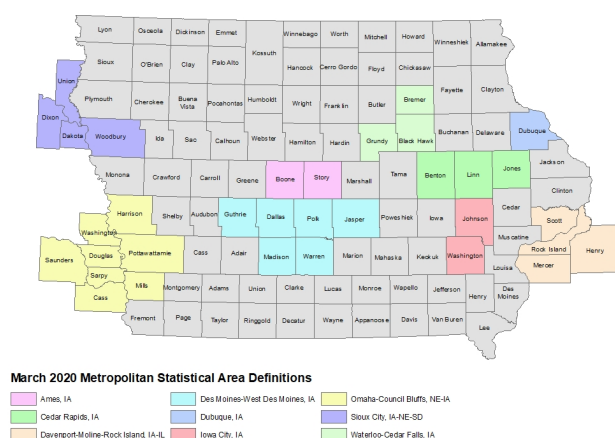
Appendix 3: Micropolitan Counties

Carroll County falls into the group of micropolitan counties. In this data, 15 counties fall into this group. The table below lists all counties in the group, sorted by the population estimate in the CDC PLACES dataset.

County	Population Group	Population
Clinton County	Micropolitan	46,463
Cerro Gordo County	Micropolitan	42,706
Muscatine County	Micropolitan	42,688
Marshall County	Micropolitan	39,853
Des Moines County	Micropolitan	38,491
Webster County	Micropolitan	37,147
Wapello County	Micropolitan	35,256
Marion County	Micropolitan	33,380
Lee County	Micropolitan	33,215
Mahaska County	Micropolitan	21,984
Buena Vista County	Micropolitan	20,771
Carroll County	Micropolitan	20,692
Dickinson County	Micropolitan	17,851
Clay County	Micropolitan	16,440
Jefferson County	Micropolitan	15,647

Metropolitan and micropolitan areas can be found in the link and the maps below.

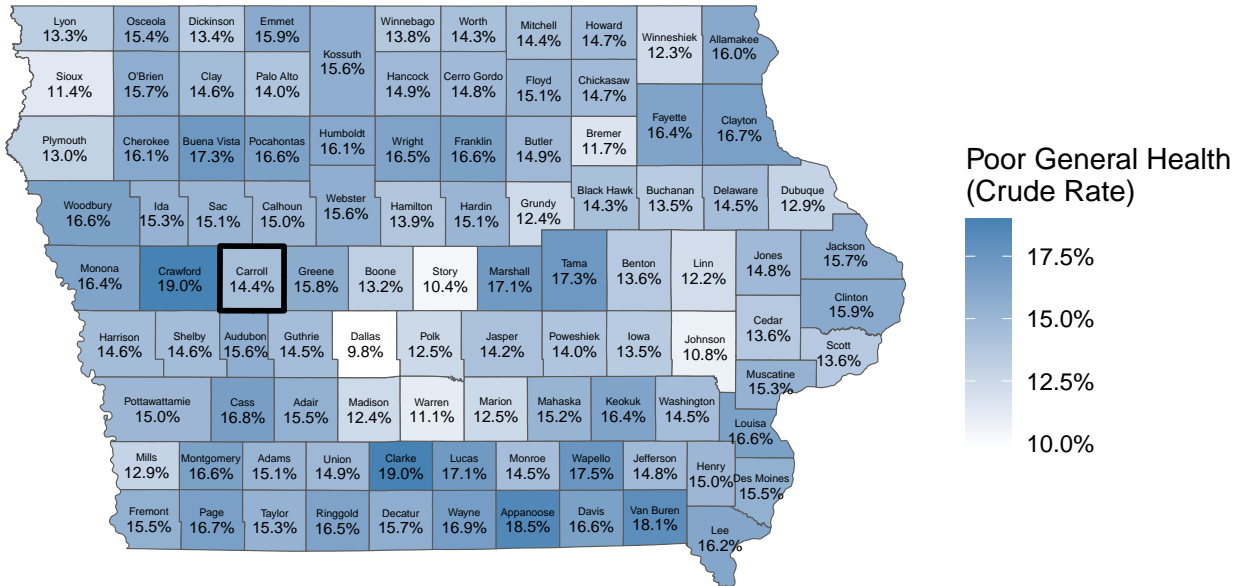
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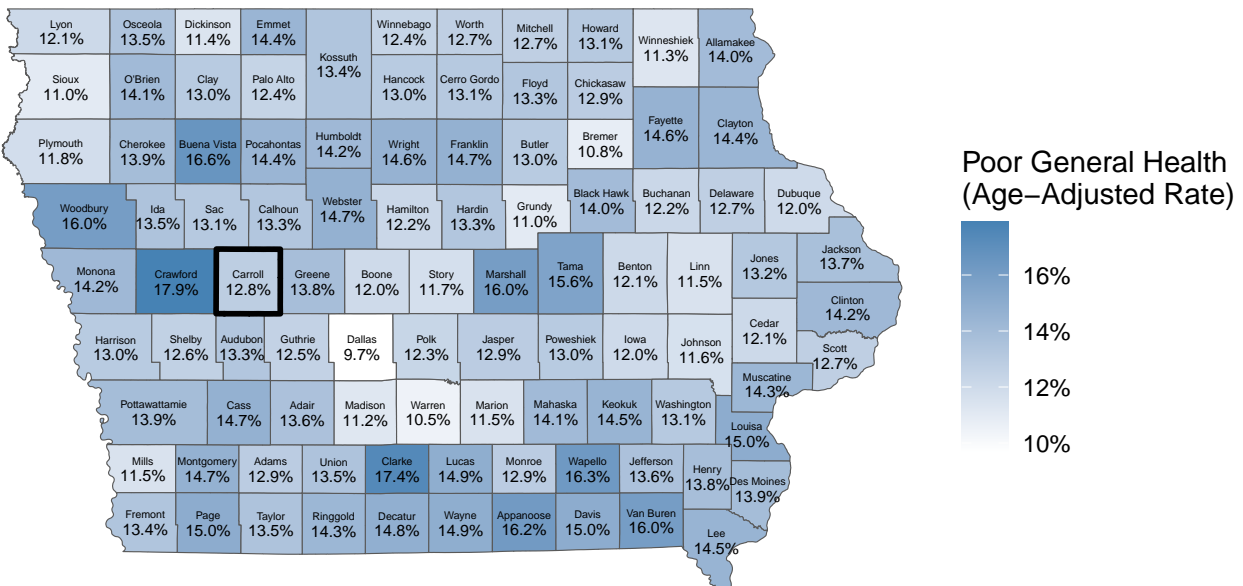
Appendix 4: County Maps

Poor General Health

Fair or poor self-rated health status among adults aged ≥ 18 years



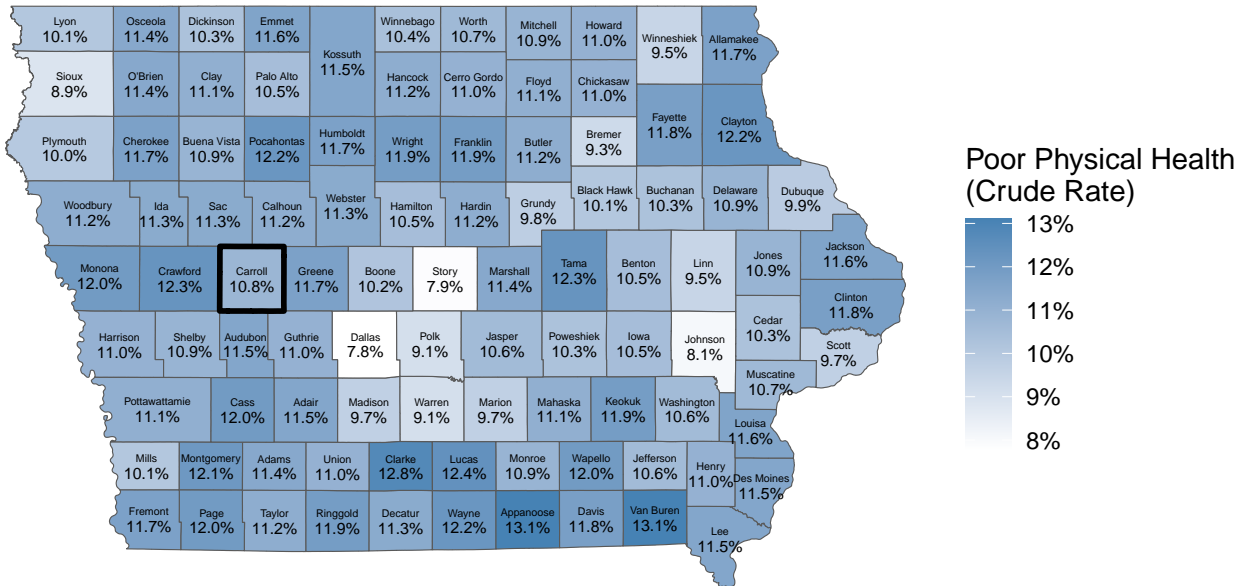
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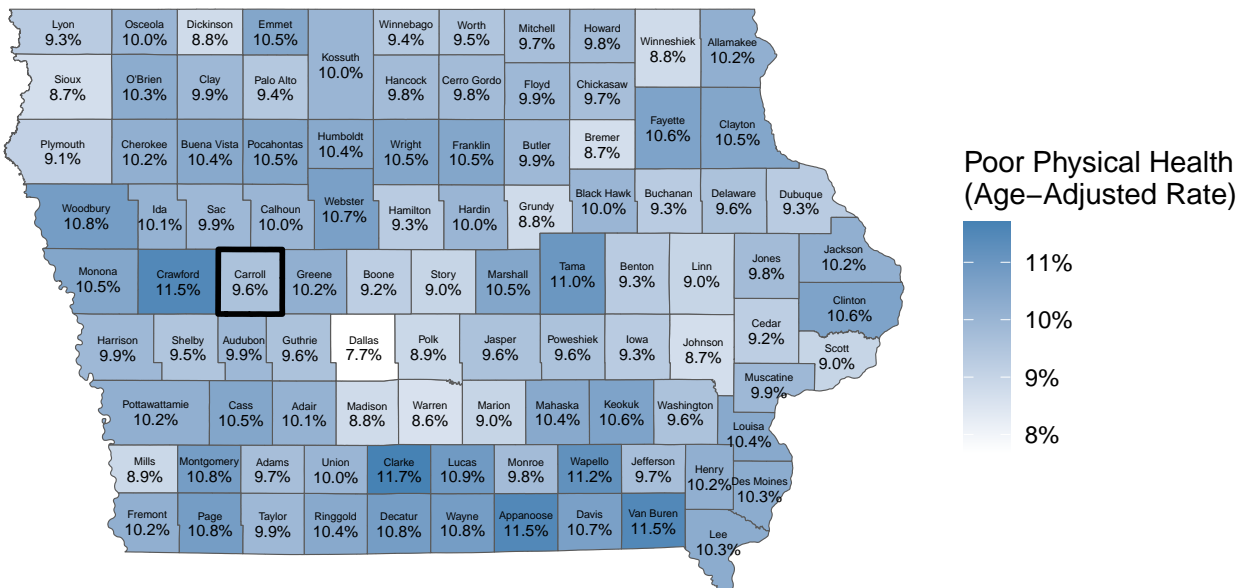
Data Source: CDC PLACES 2023 Release, BRFSS 2021

Poor Physical Health

Physical health not good for ≥ 14 days among adults aged ≥ 18 years



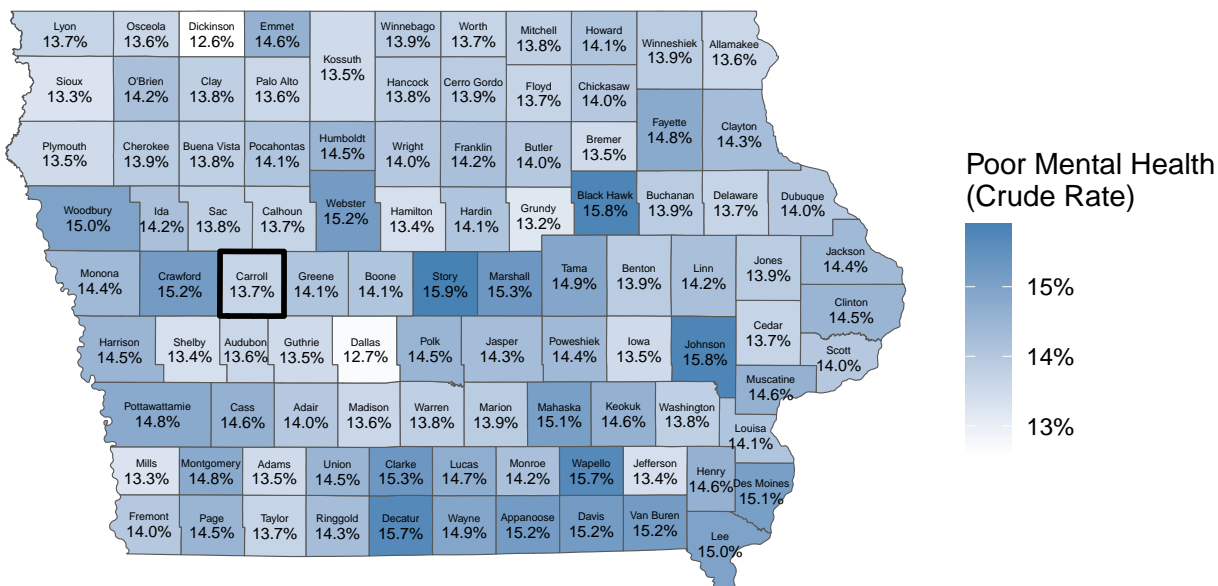
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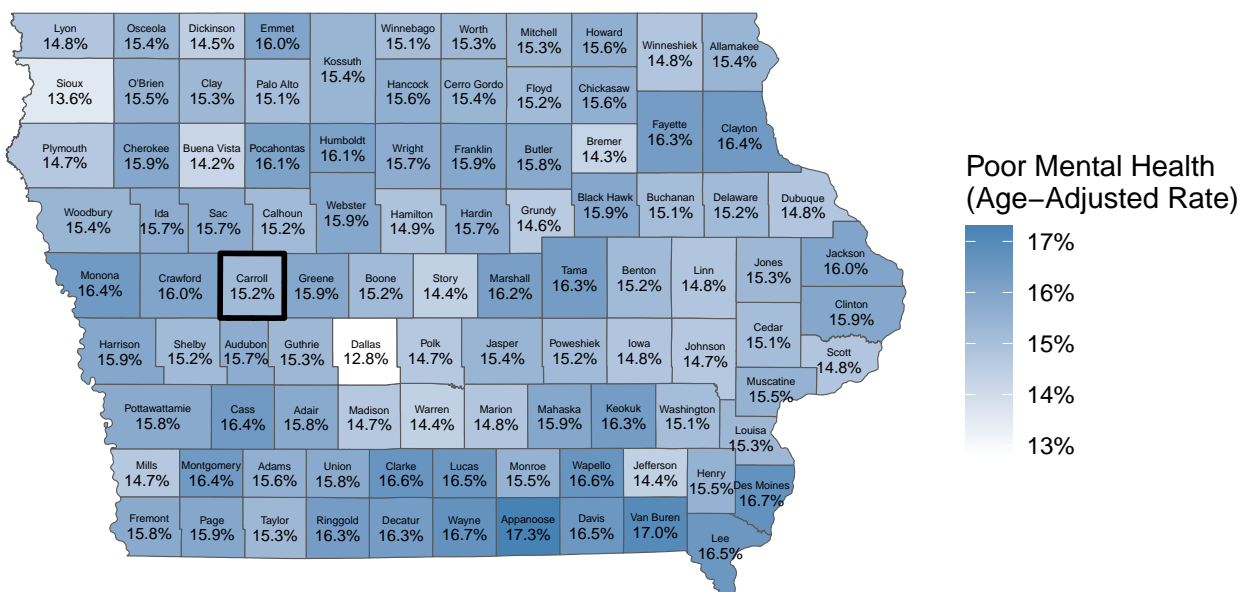
Data Source: CDC PLACES 2023 Release, BRFSS 2021

Poor Mental Health

Mental health not good for ≥ 14 days among adults aged ≥ 18 years



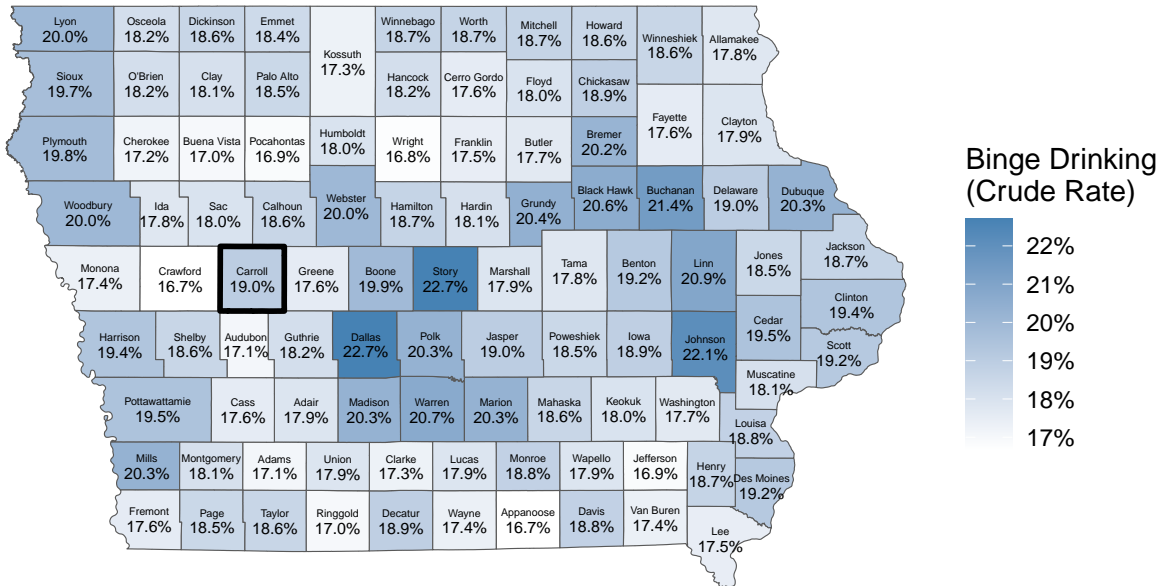
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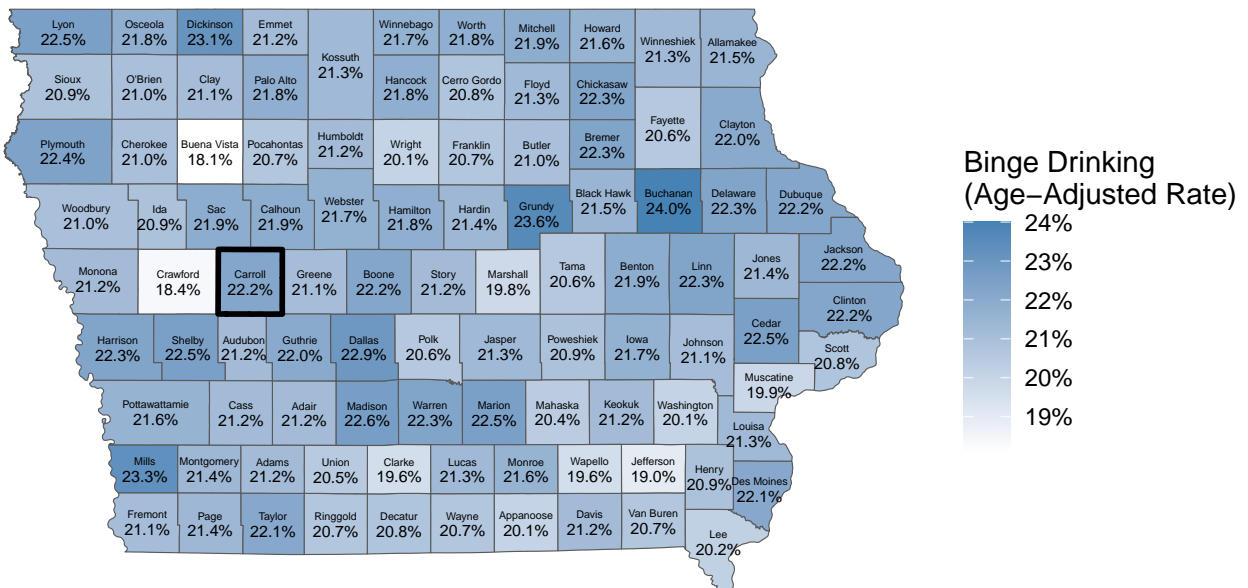
Data Source: CDC PLACES 2023 Release, BRFSS 2021

Binge Drinking

Binge drinking among adults aged ≥ 18 years



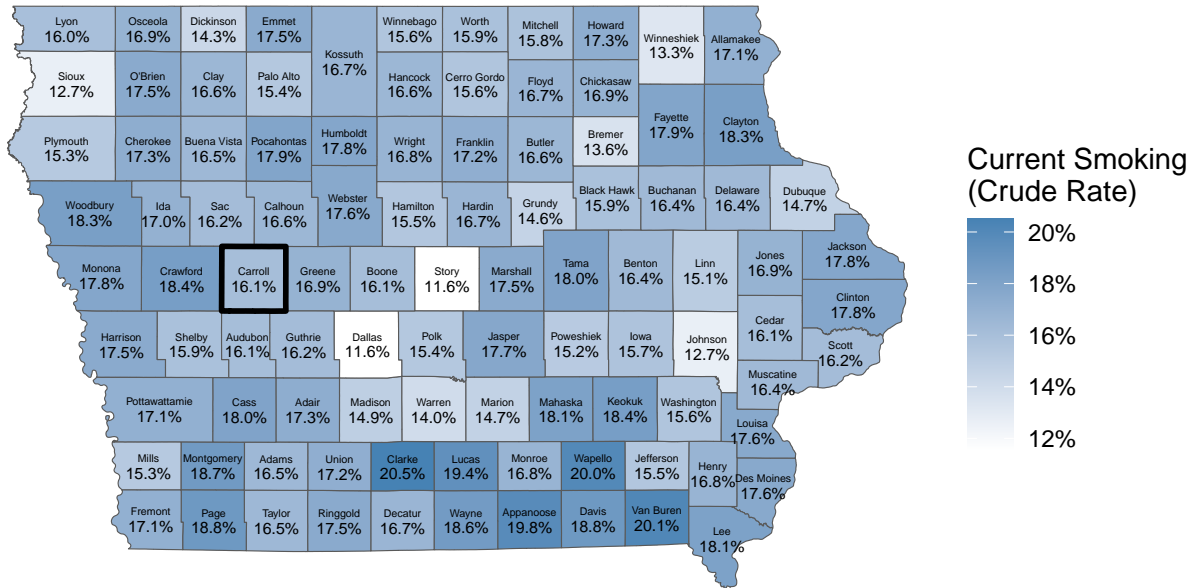
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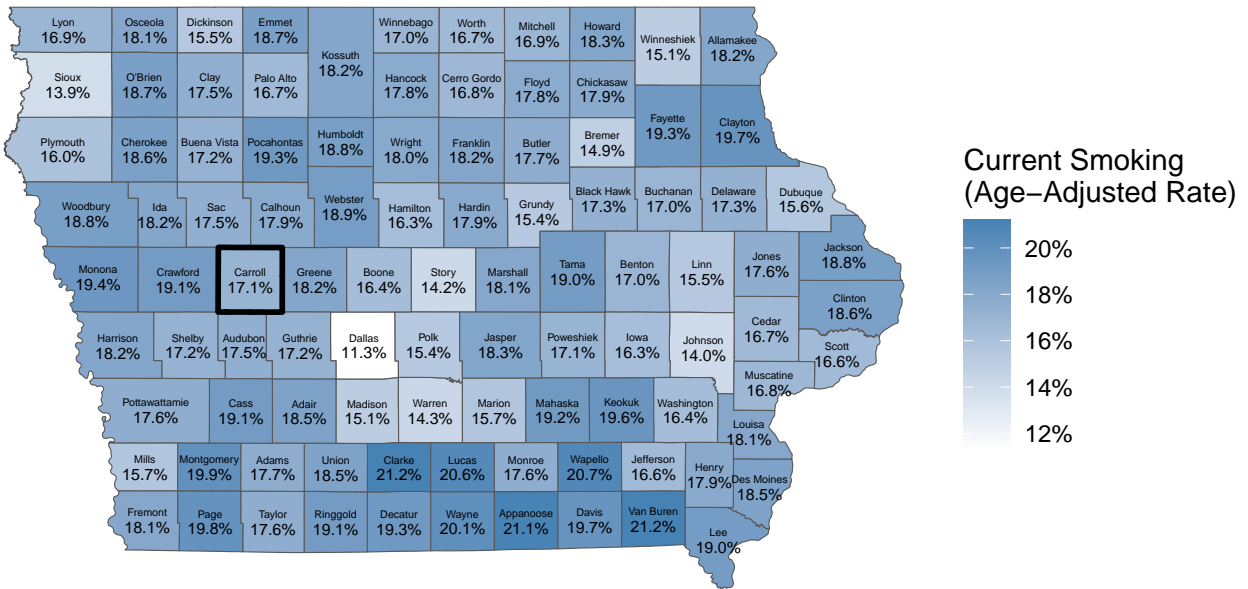
Data Source: CDC PLACES 2023 Release, BRFSS 2021

Current Smoking

Current smoking among adults aged ≥ 18 years



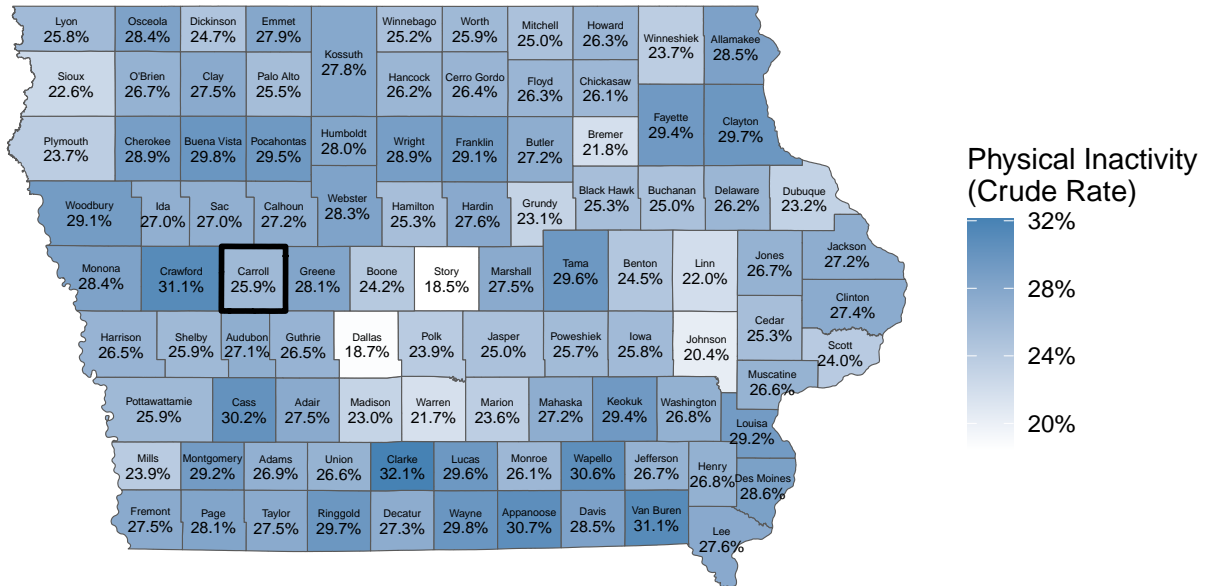
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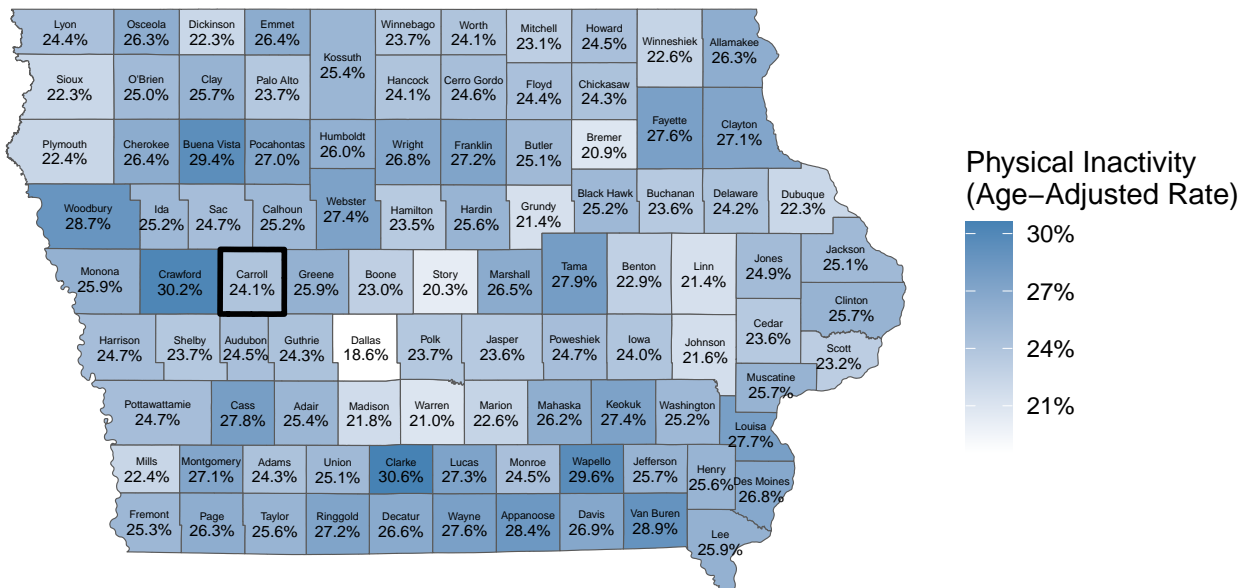
Data Source: CDC PLACES 2023 Release, BRFSS 2021

Physical Inactivity

No leisure-time physical activity among adults aged ≥ 18 years



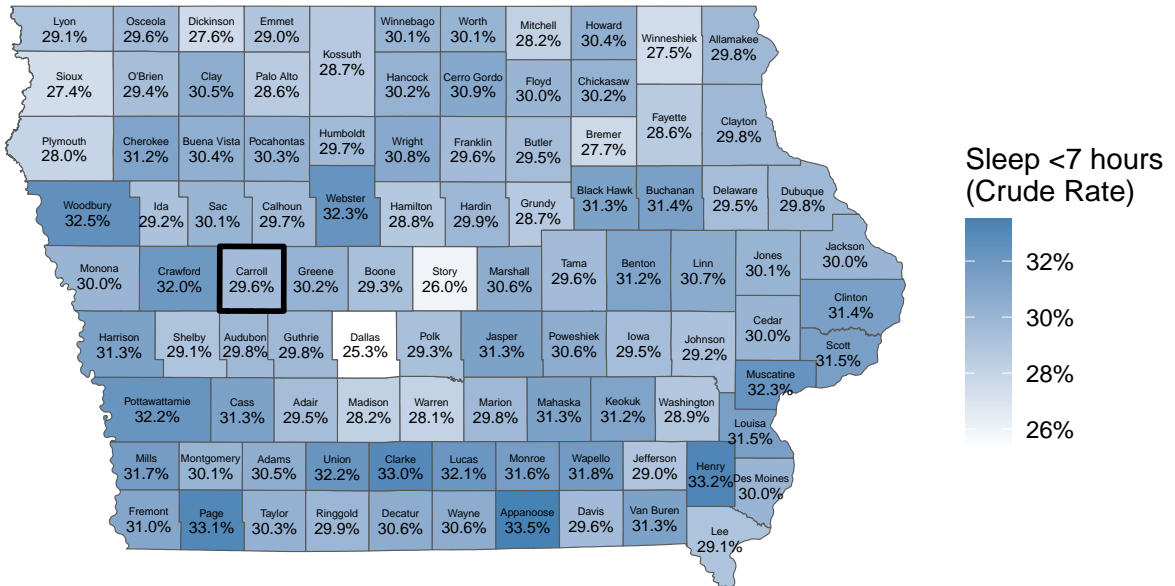
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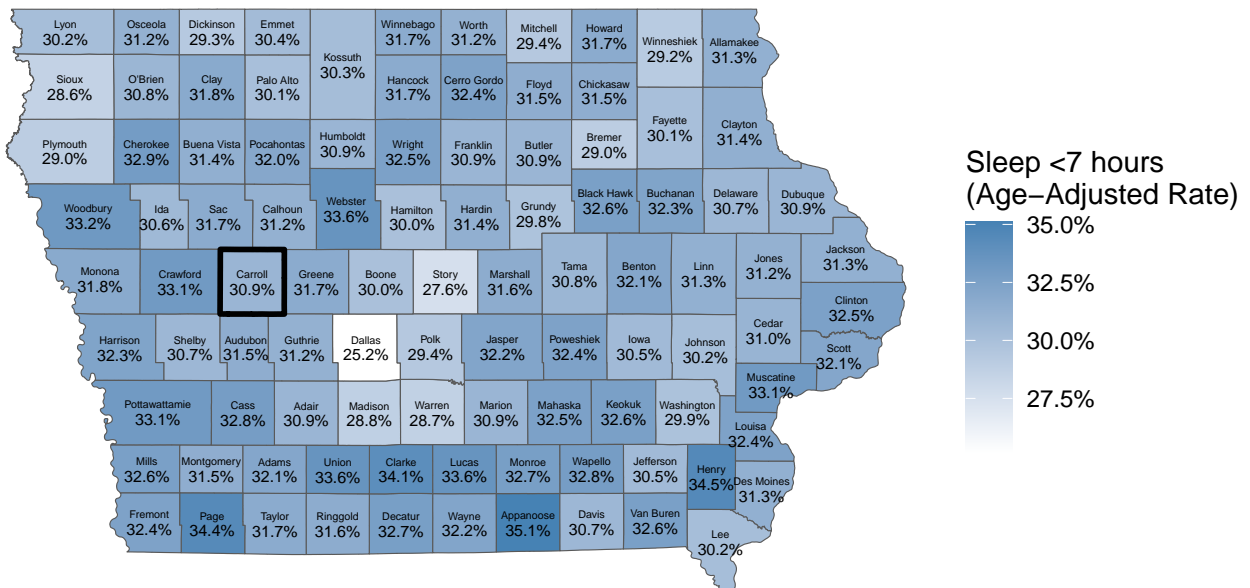
Data Source: CDC PLACES 2023 Release, BRFSS 2021

Sleep <7 hours

Sleeping less than 7 hours among adults aged ≥ 18 years



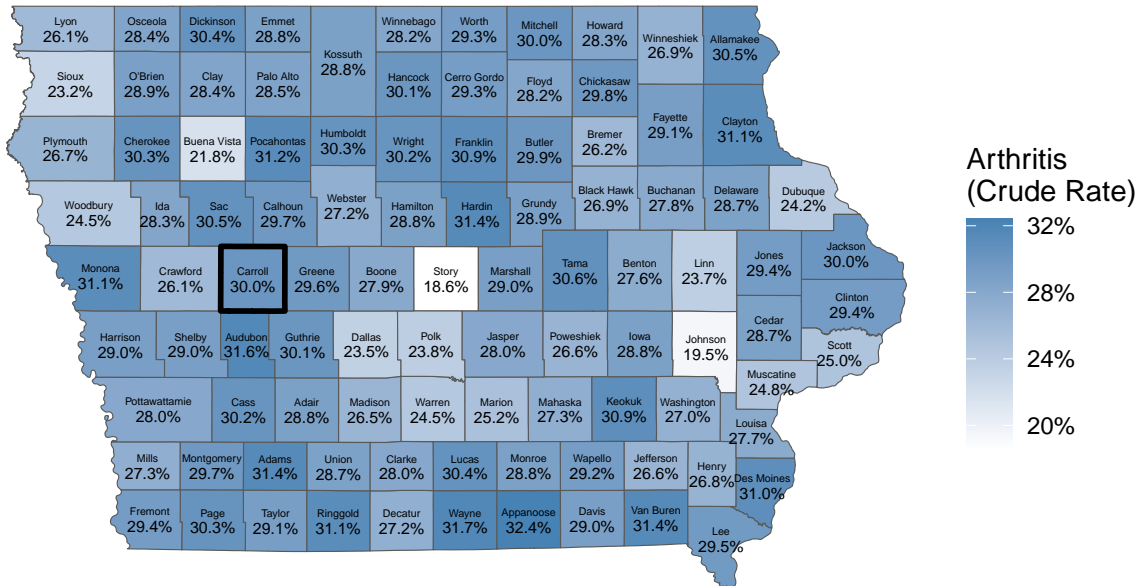
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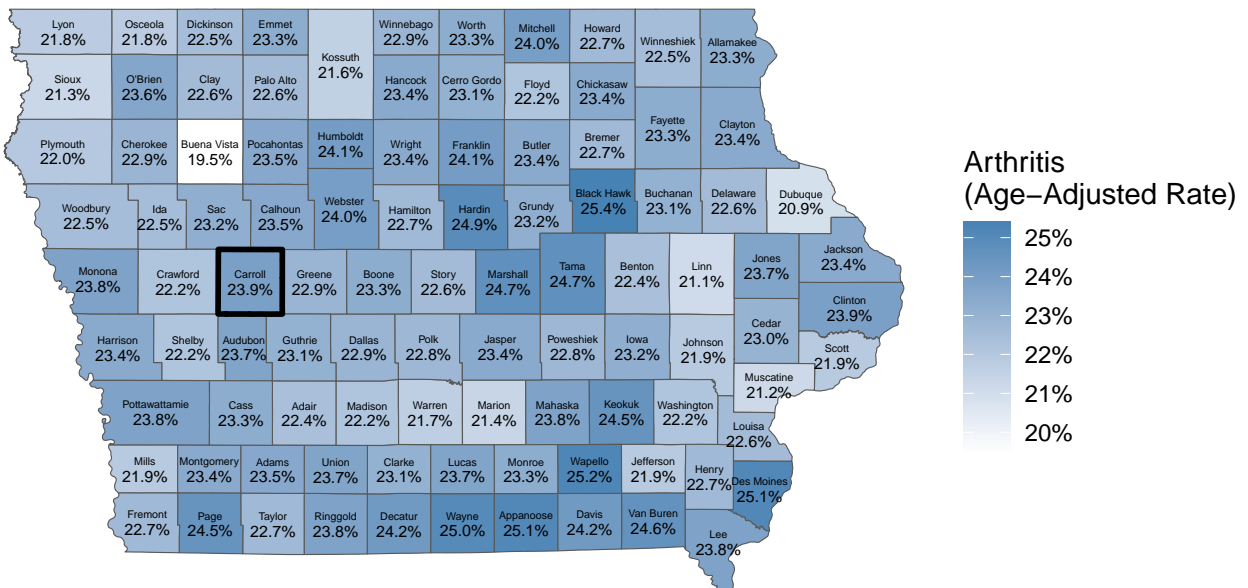
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Arthritis

Arthritis among adults aged ≥ 18 years



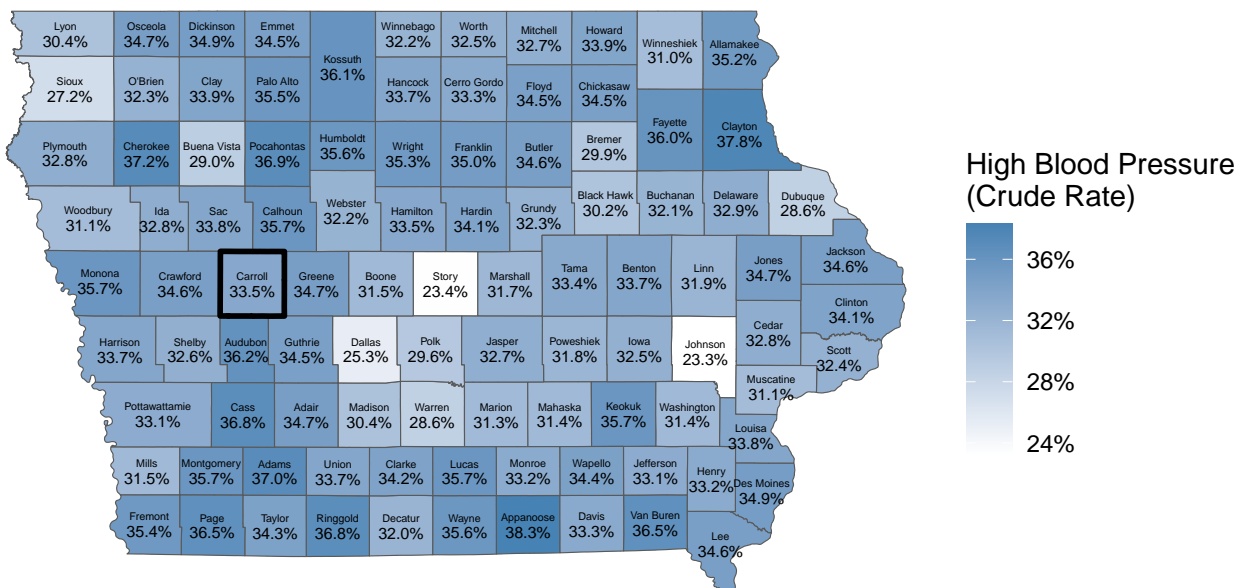
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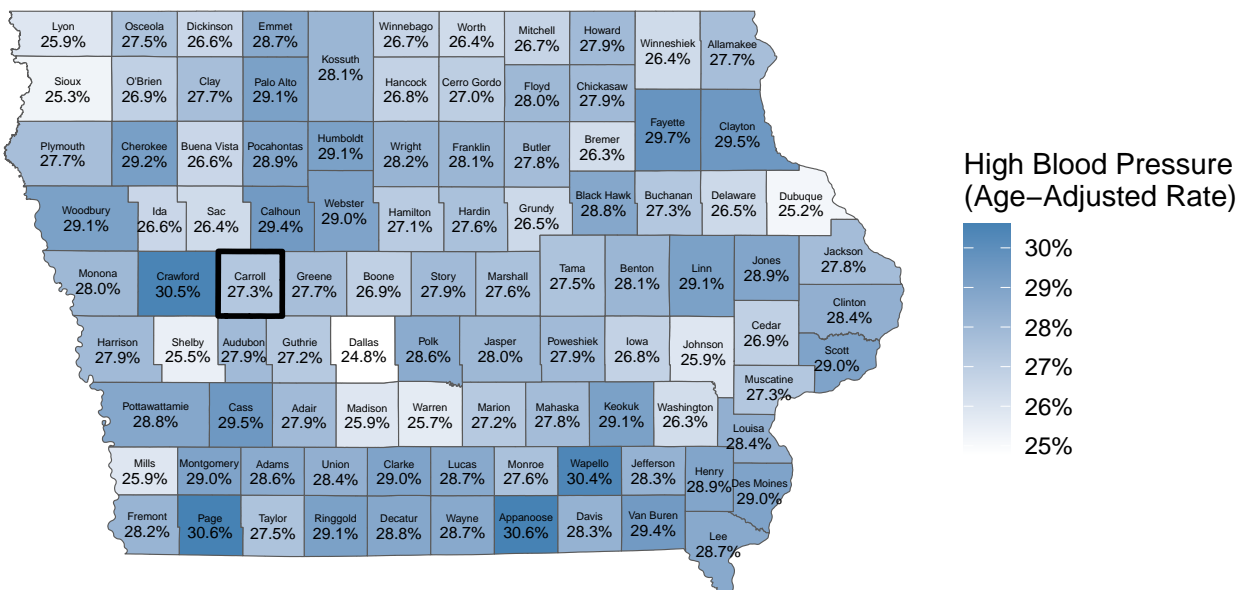
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High Blood Pressure

High blood pressure among adults aged >=18 years



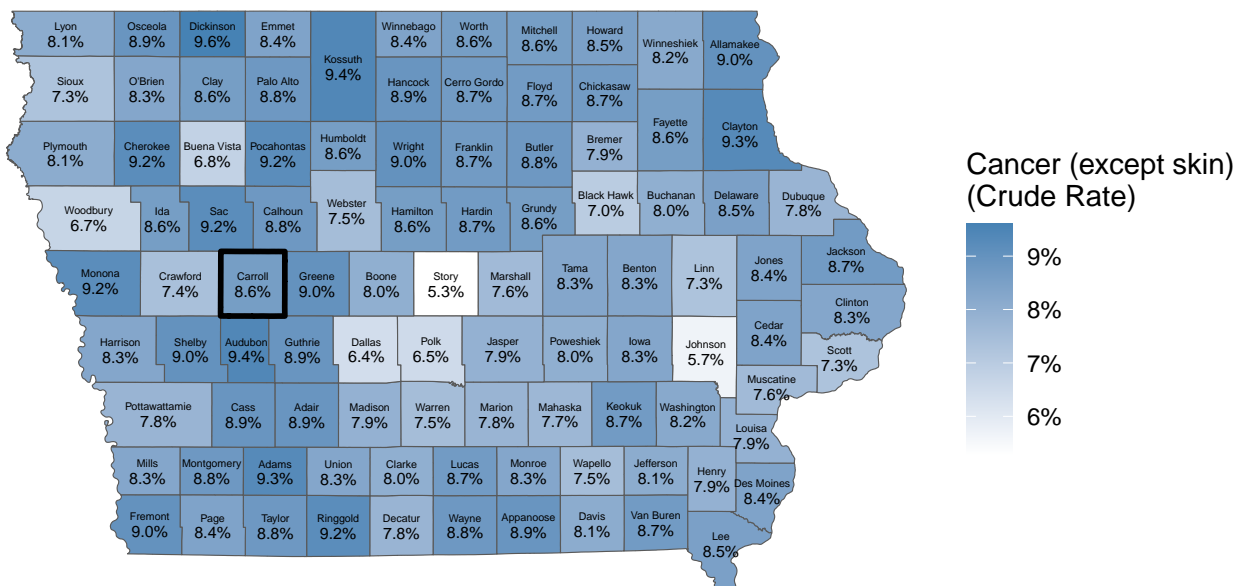
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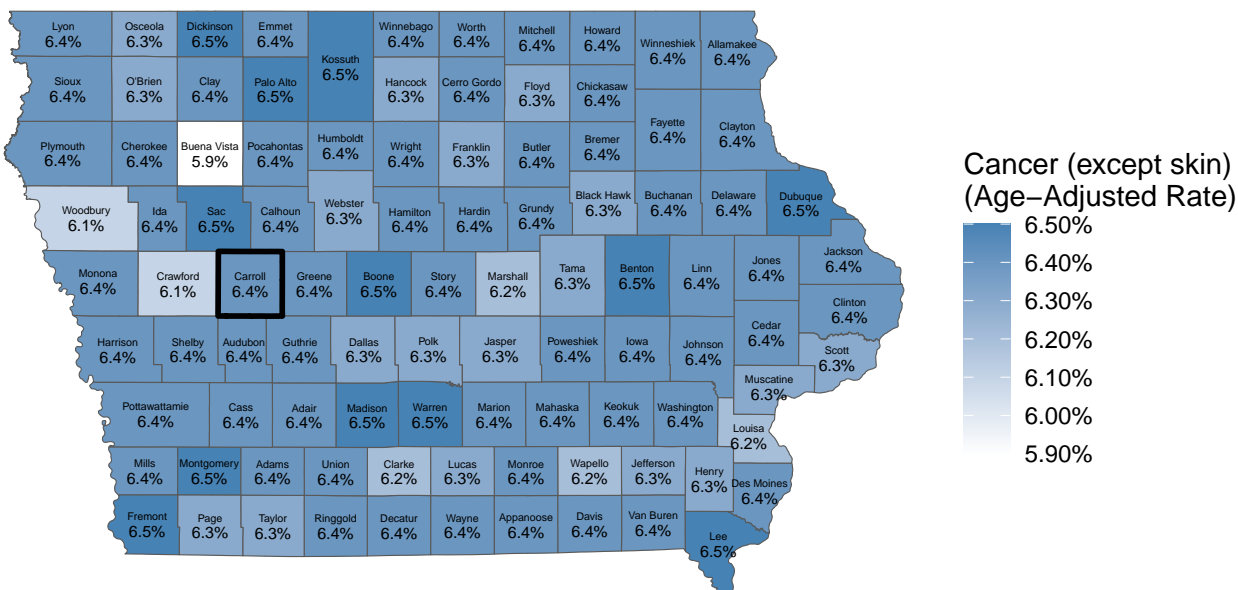
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Cancer (except skin)

Cancer (excluding skin cancer) among adults aged ≥ 18 years



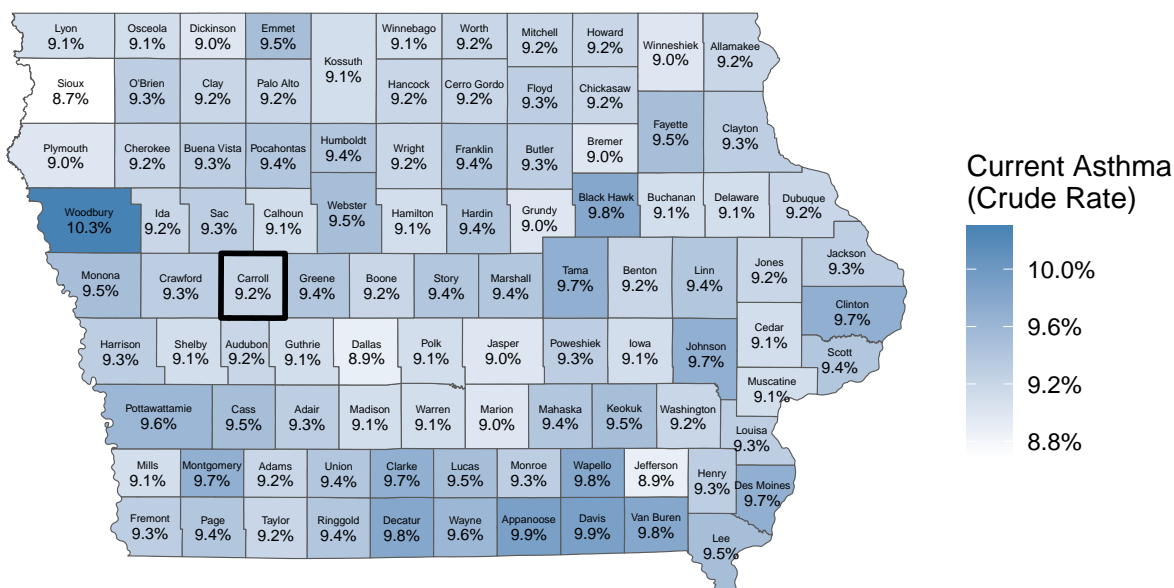
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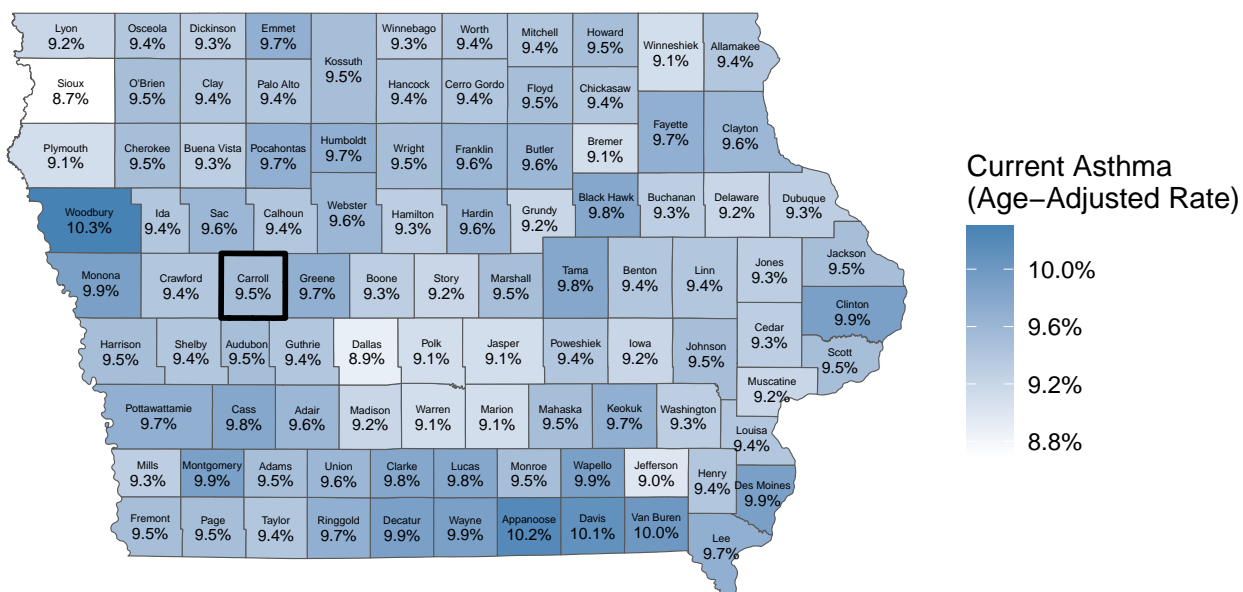
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Current Asthma

Current asthma among adults aged ≥ 18 years



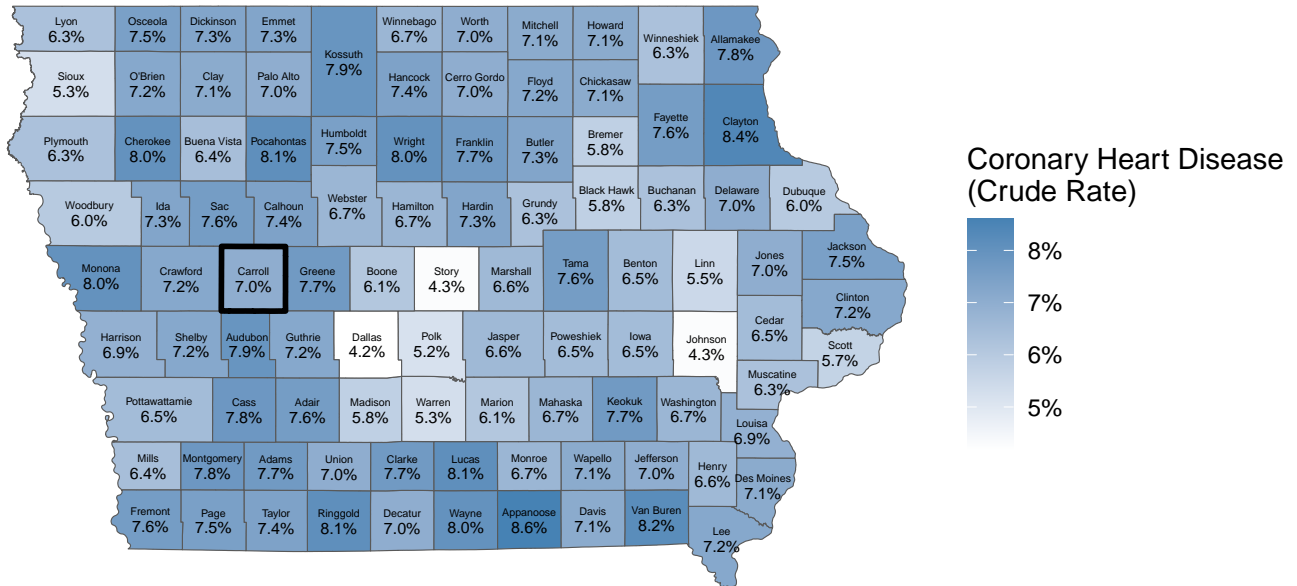
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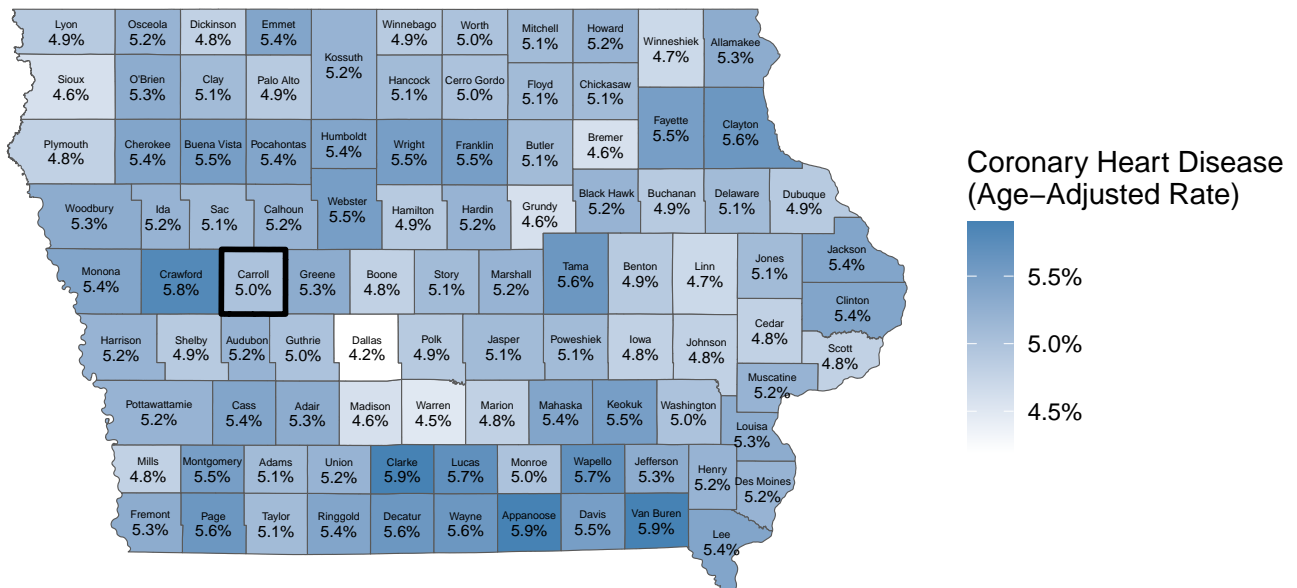
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Coronary Heart Disease

Coronary heart disease among adults aged ≥ 18 years



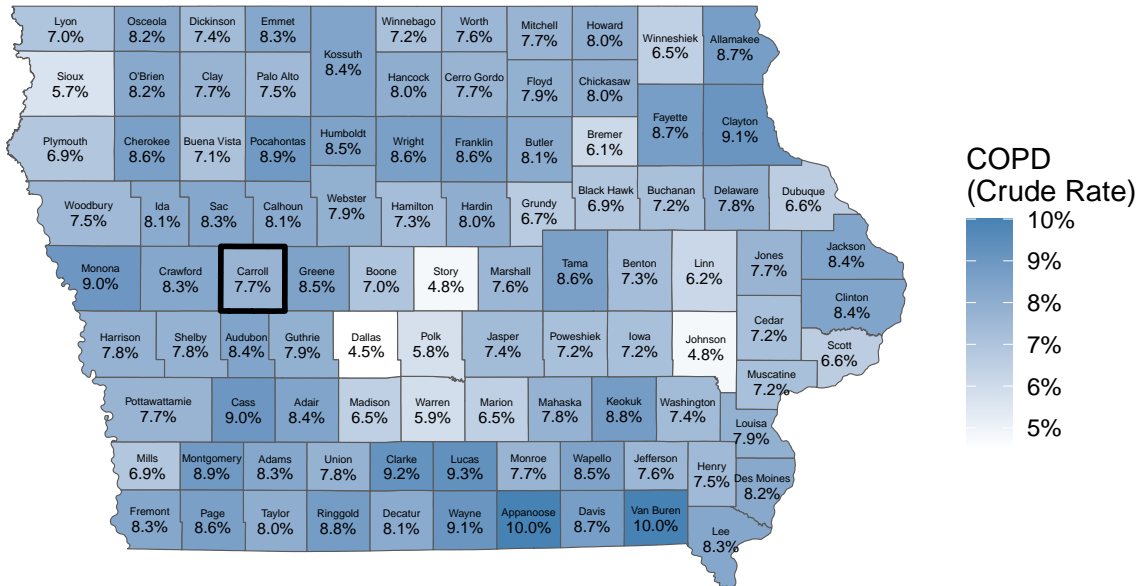
Data Source: CDC PLACES 2023 Release, BRFSS 2021



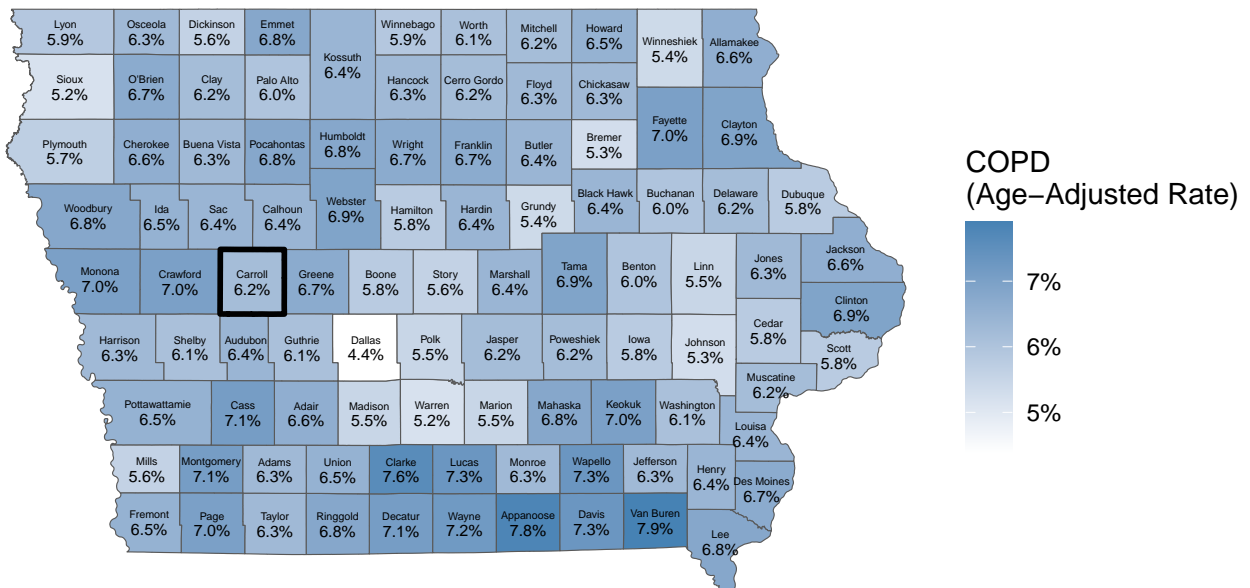
Data Source: CDC PLACES 2023 Release, BRFSS 2021

COPD

Chronic obstructive pulmonary disease among adults aged >=18 years



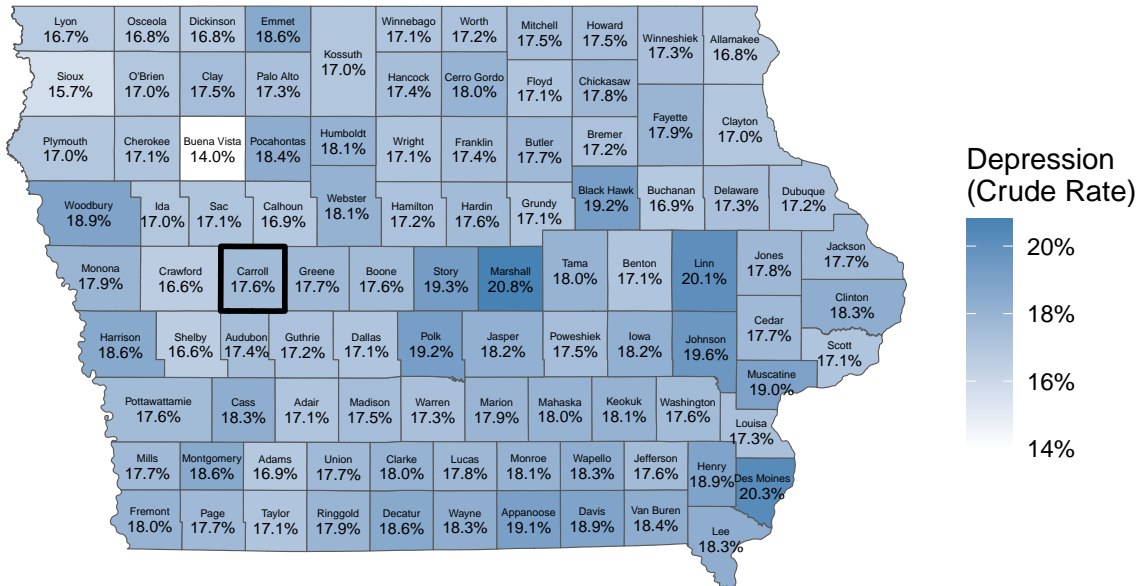
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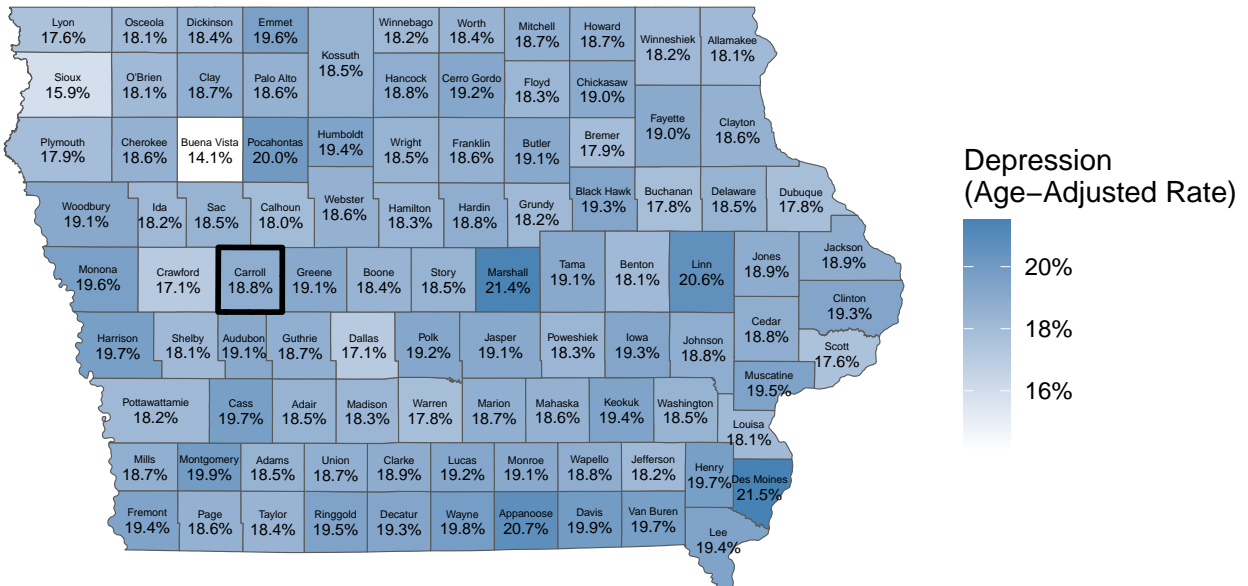
Data Source: CDC PLACES 2023 Release, BRFSS 2021

Depression

Depression among adults aged >=18 years



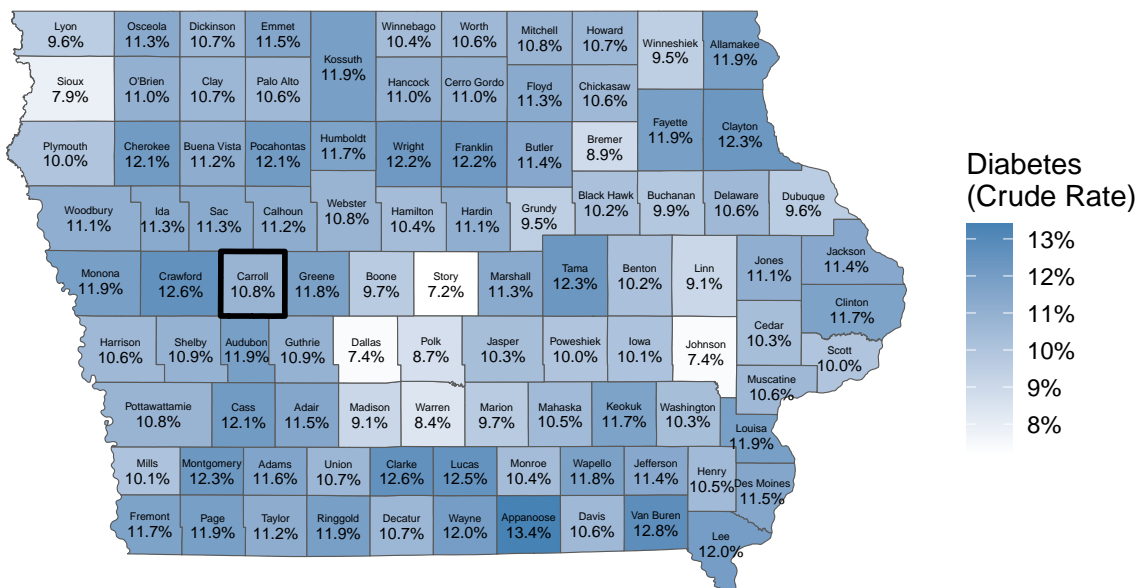
Data Source: CDC PLACES 2023 Release, BRFSS 2021



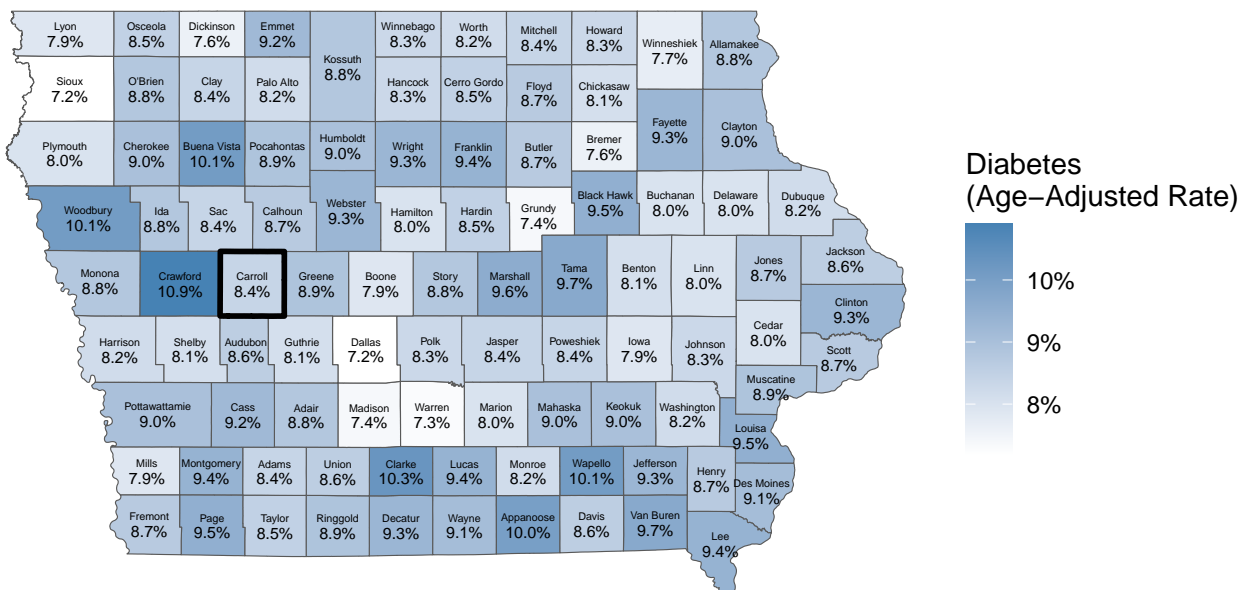
Data Source: CDC PLACES 2023 Release, BRFSS 2021

Diabetes

Diagnosed diabetes among adults aged >=18 years



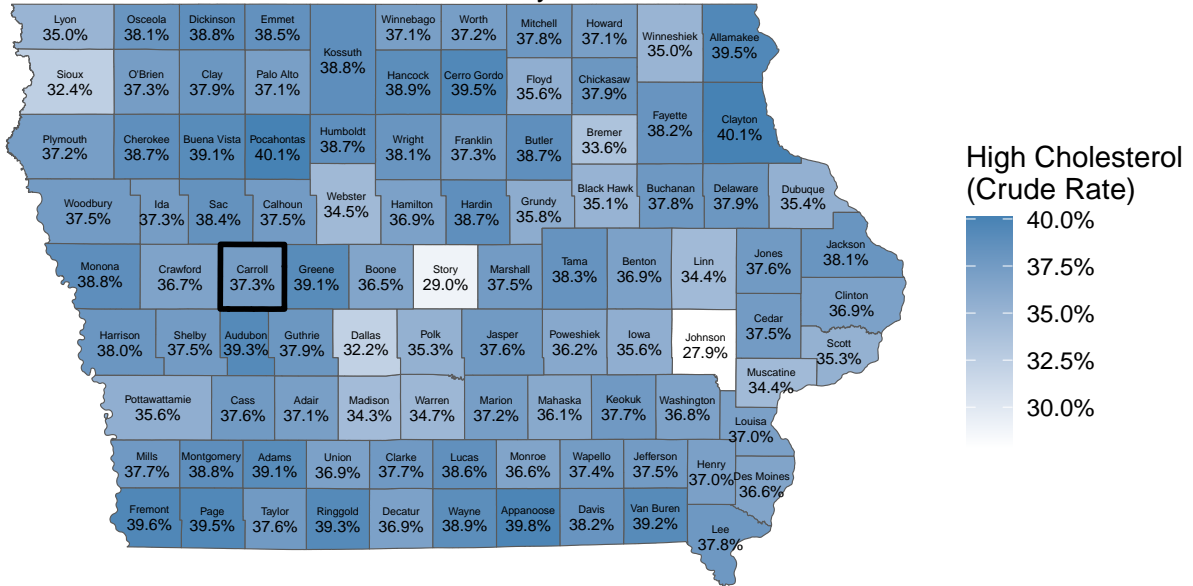
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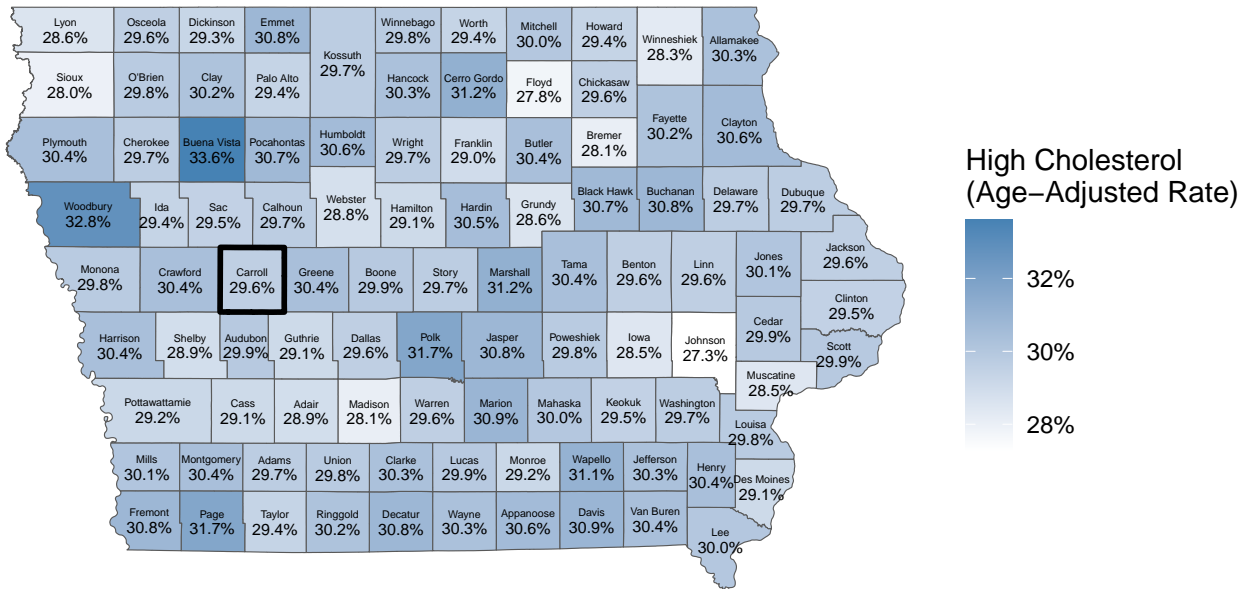
Data Source: CDC PLACES 2023 Release, BRFSS 2021

High Cholesterol

High cholesterol among adults aged ≥ 18 years who have been screened in the past 5 years



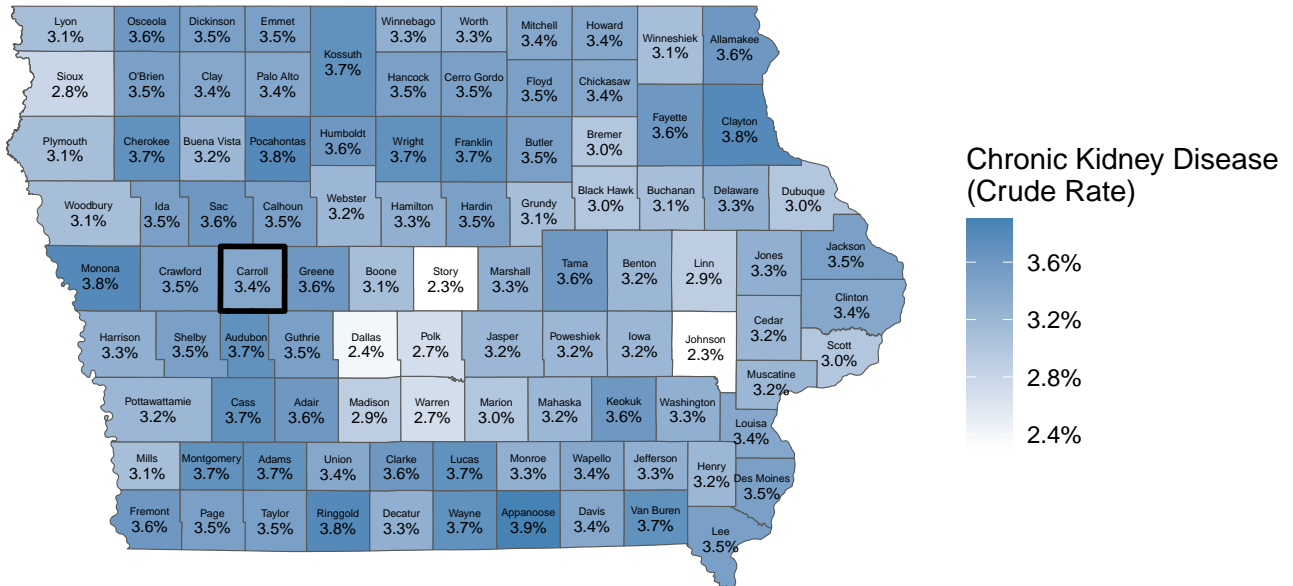
Data Source: CDC PLACES 2023 Release, BRFSS 2021



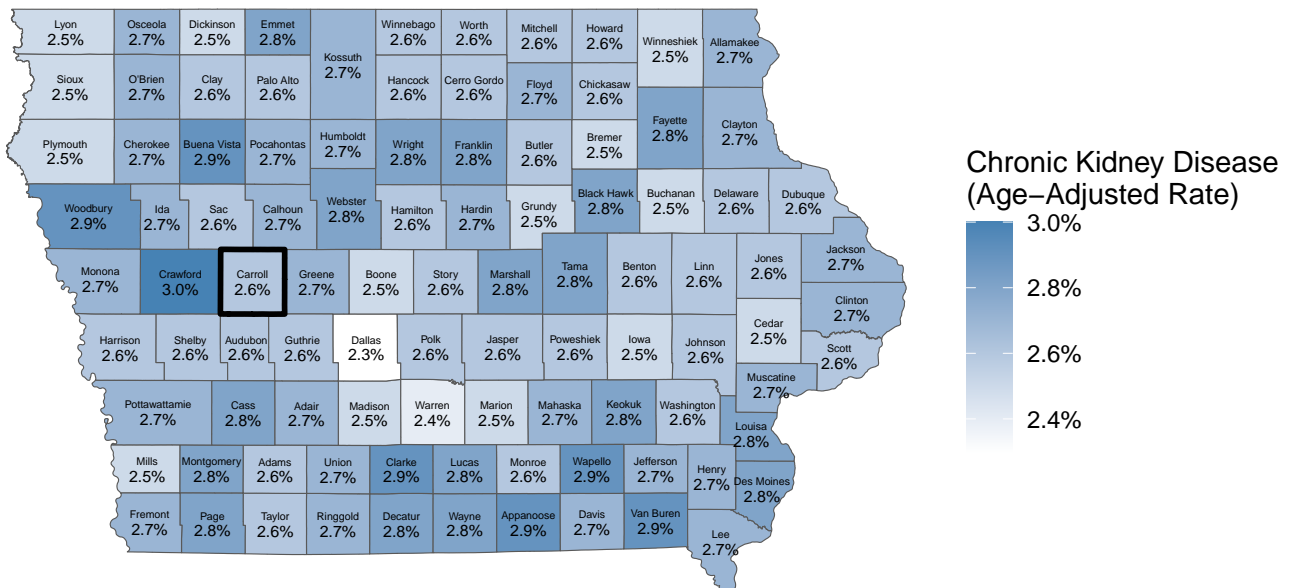
Data Source: CDC PLACES 2023 Release, BRFSS 2021

Chronic Kidney Disease

Chronic kidney disease among adults aged ≥ 18 years



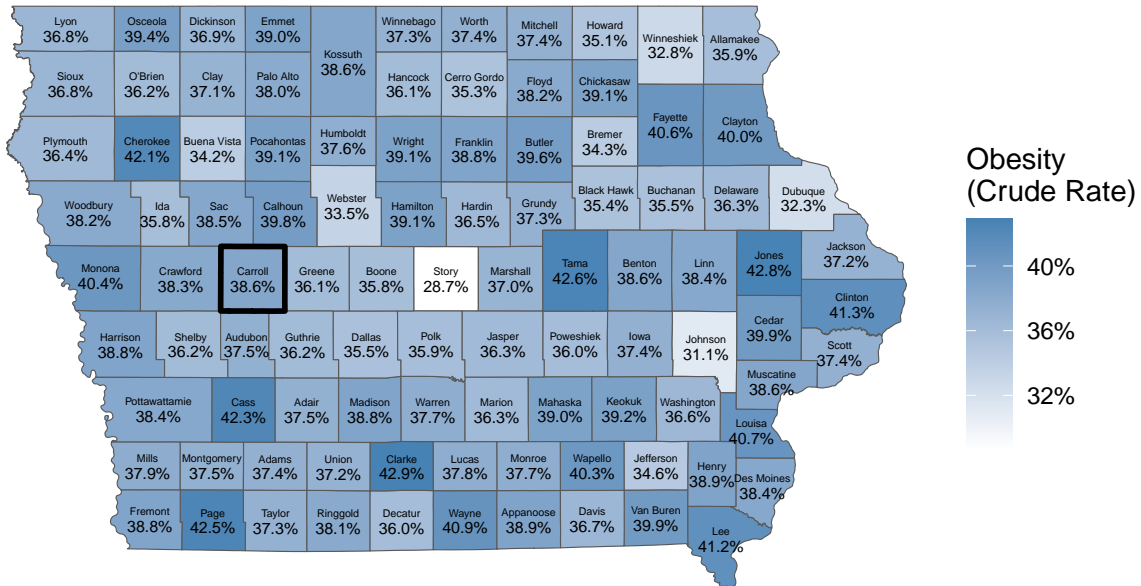
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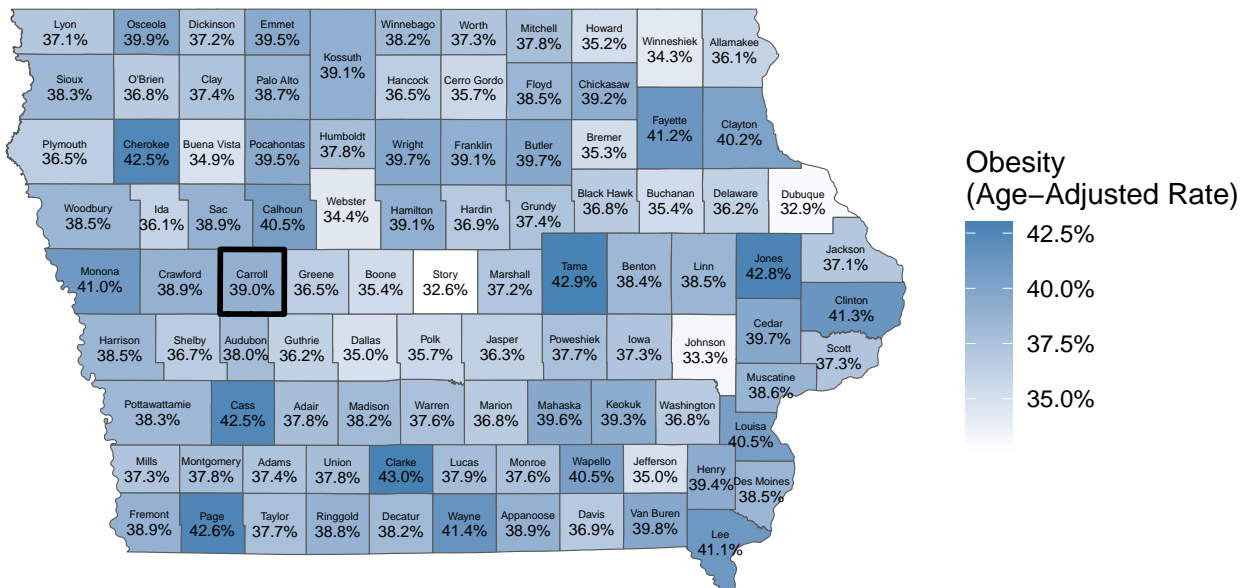
Data Source: CDC PLACES 2023 Release, BRFSS 2021

Obesity

Obesity among adults aged >=18 years



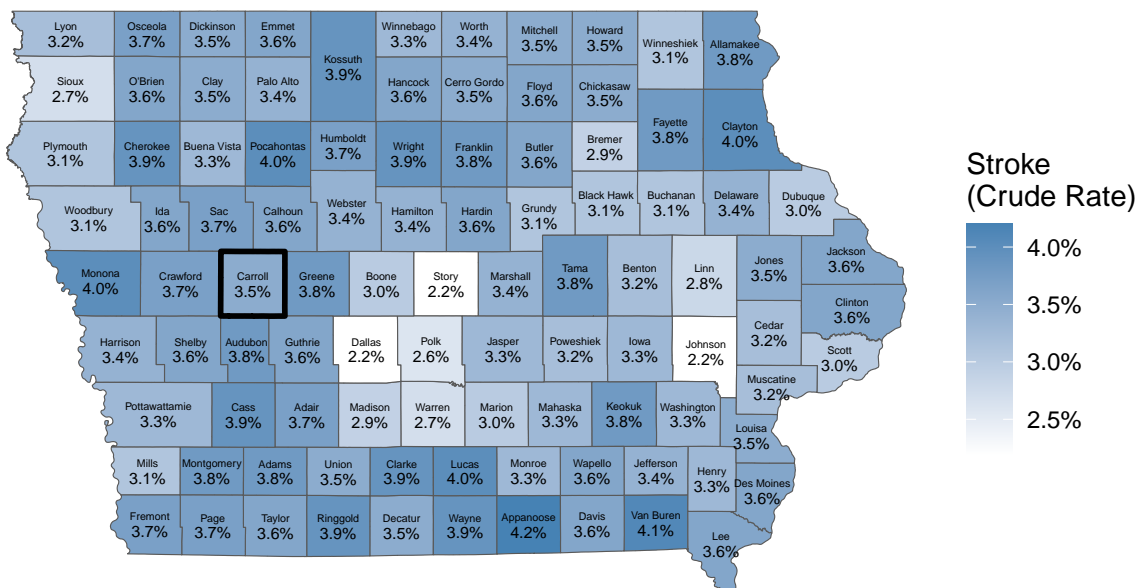
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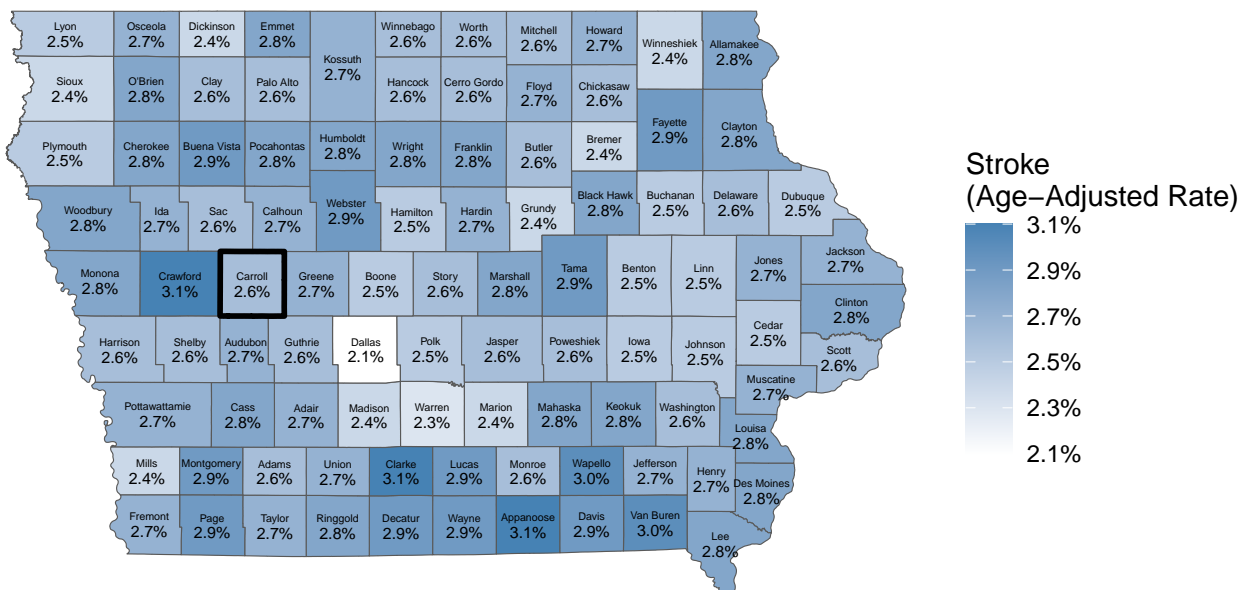
Data Source: CDC PLACES 2023 Release, BRFSS 2021

Stroke

Stroke among adults aged ≥ 18 years



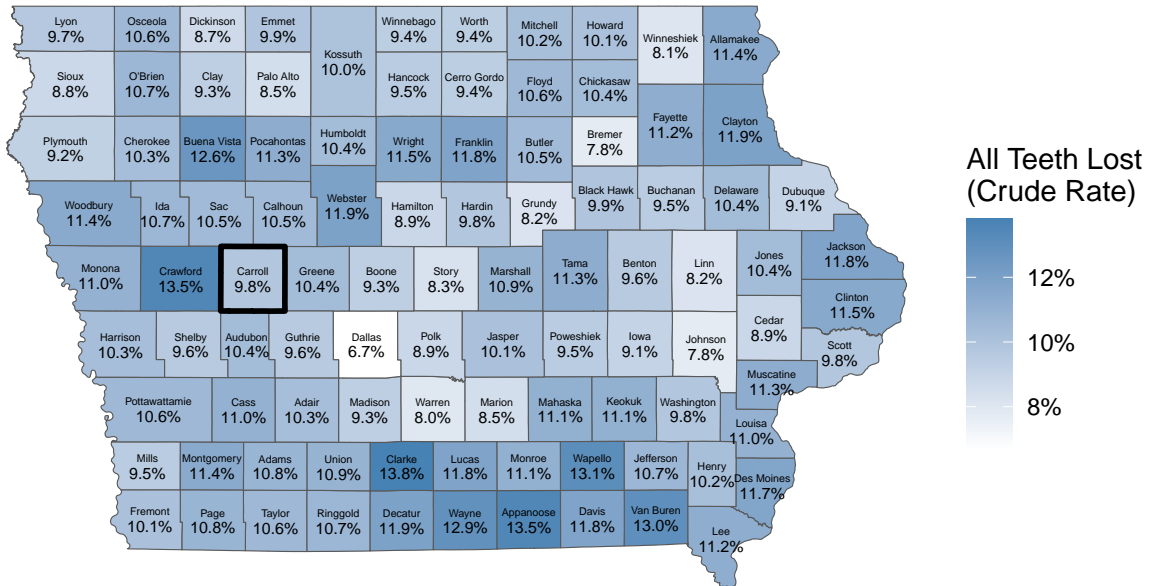
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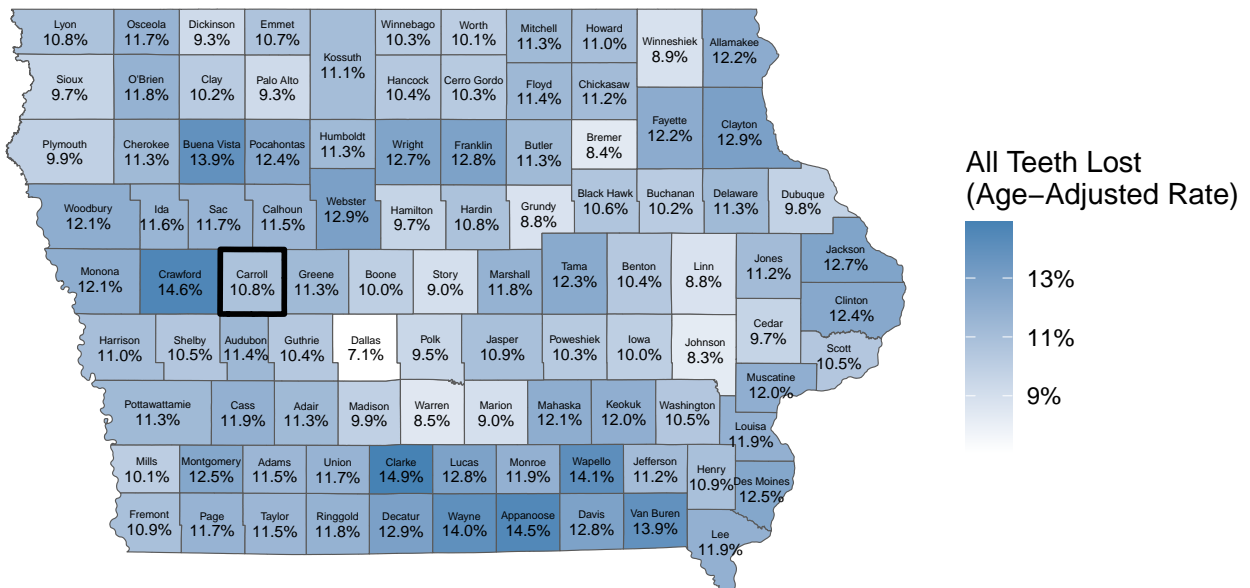
Data Source: CDC PLACES 2023 Release, BRFSS 2021

All Teeth Lost

All teeth lost among adults aged ≥ 65 years



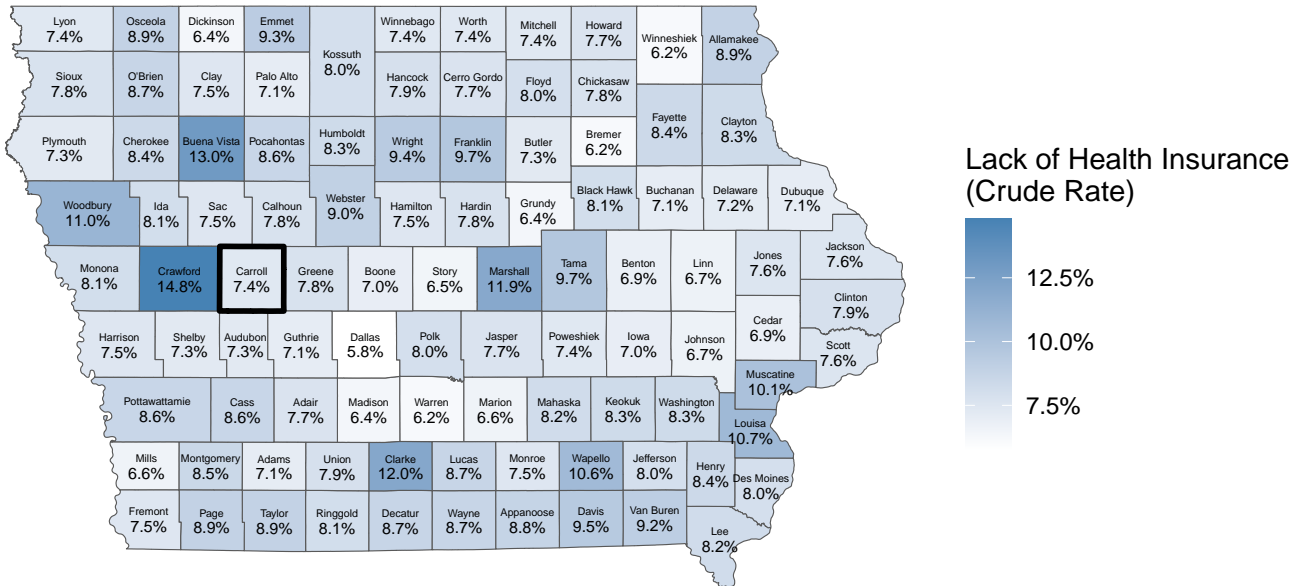
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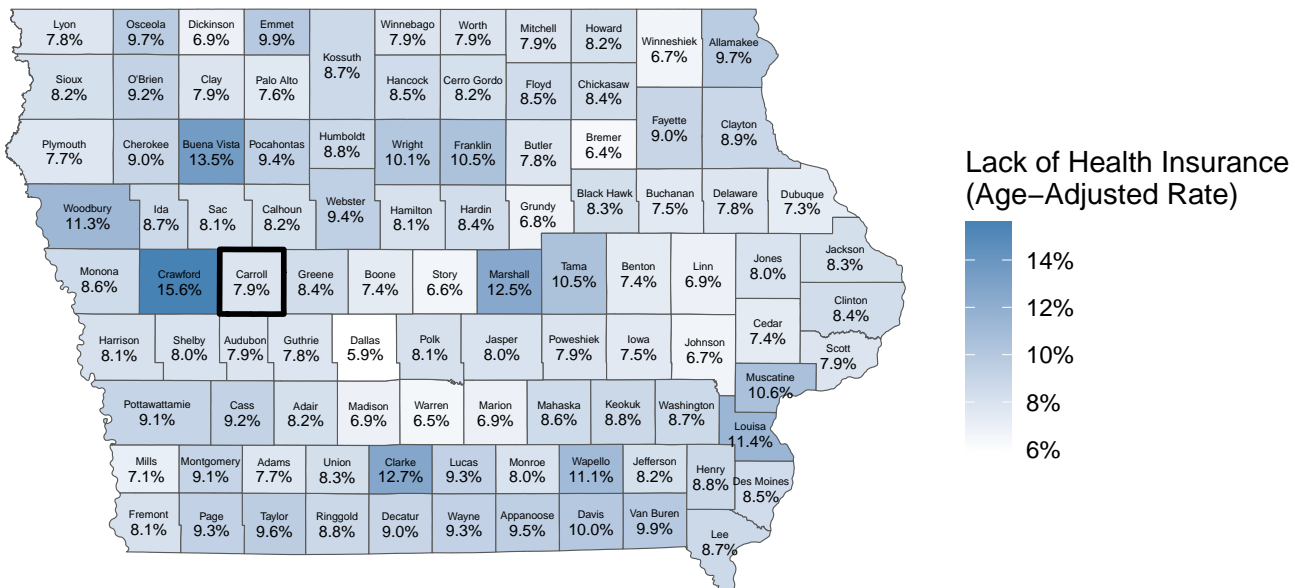
Data Source: CDC PLACES 2023 Release, BRFSS 2020

Lack of Health Insurance

Current lack of health insurance among adults aged 18–64 years



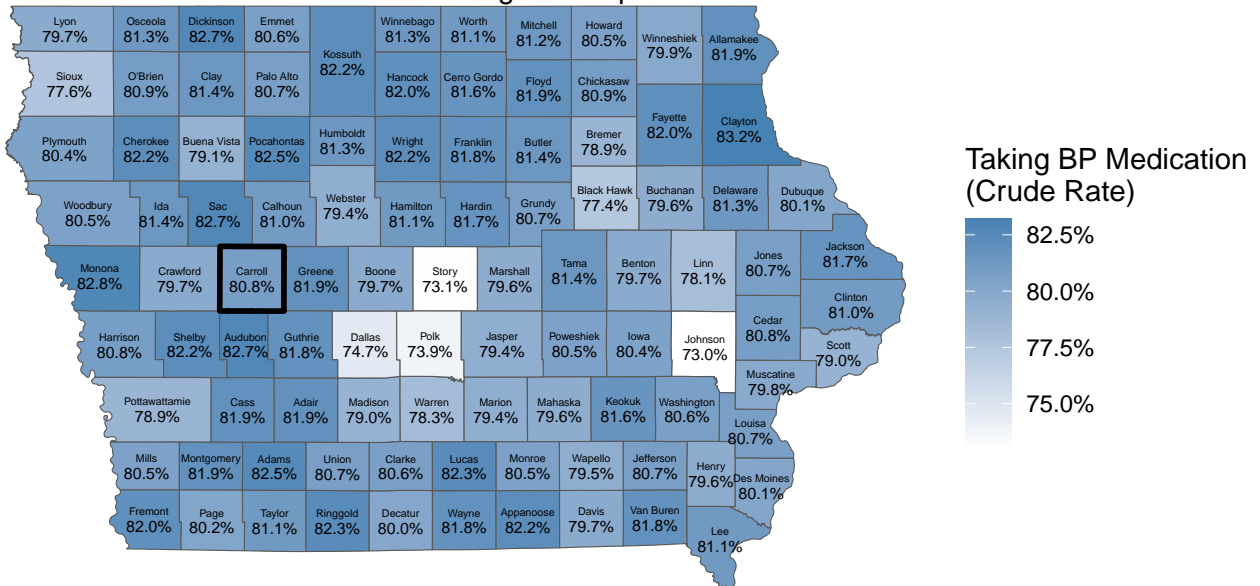
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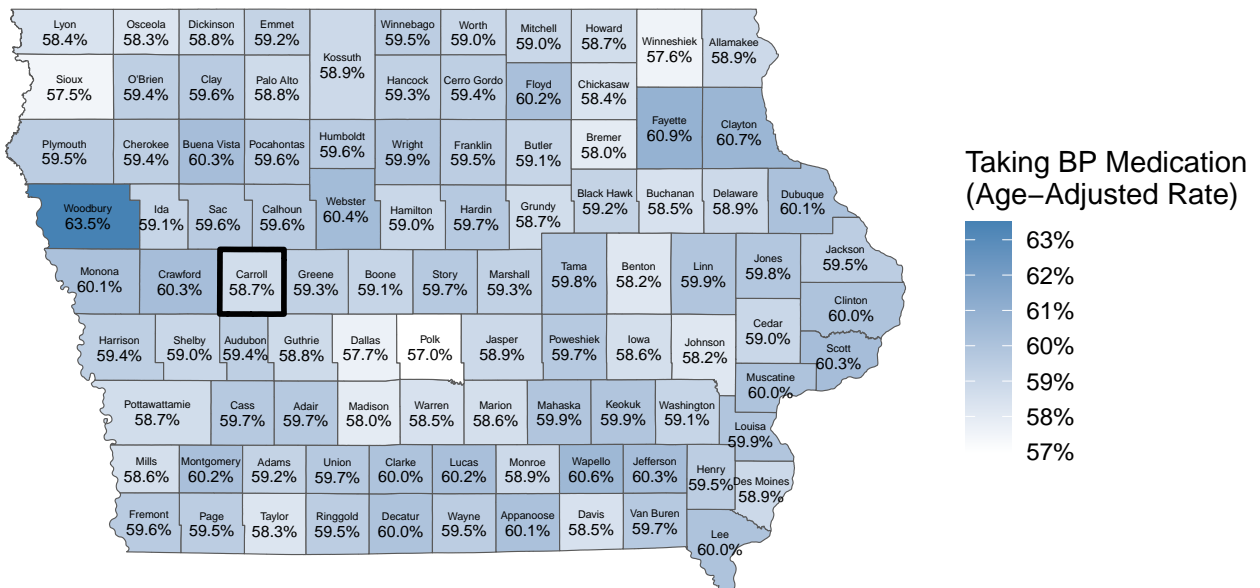
Data Source: CDC PLACES 2023 Release, BRFSS 2021

Taking BP Medication

Taking medicine for high blood pressure control among adults aged ≥ 18 years with high blood pressure



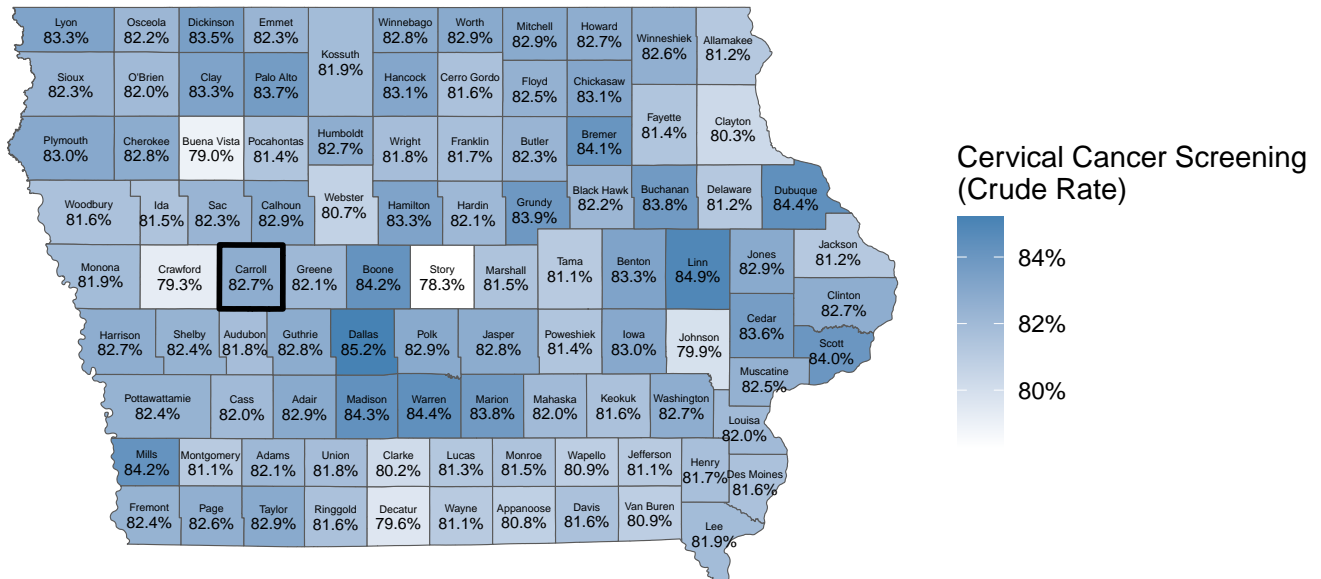
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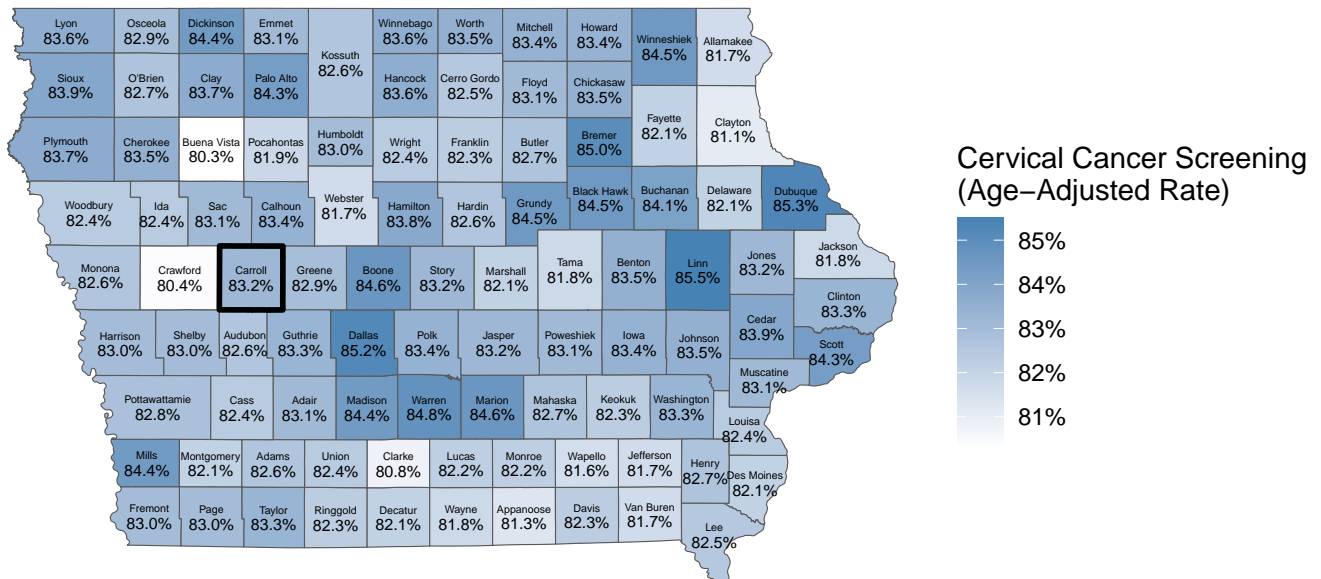
Data Source: CDC PLACES 2023 Release, BRFSS 2021

Cervical Cancer Screening

Cervical cancer screening among adult women aged 21–65 years



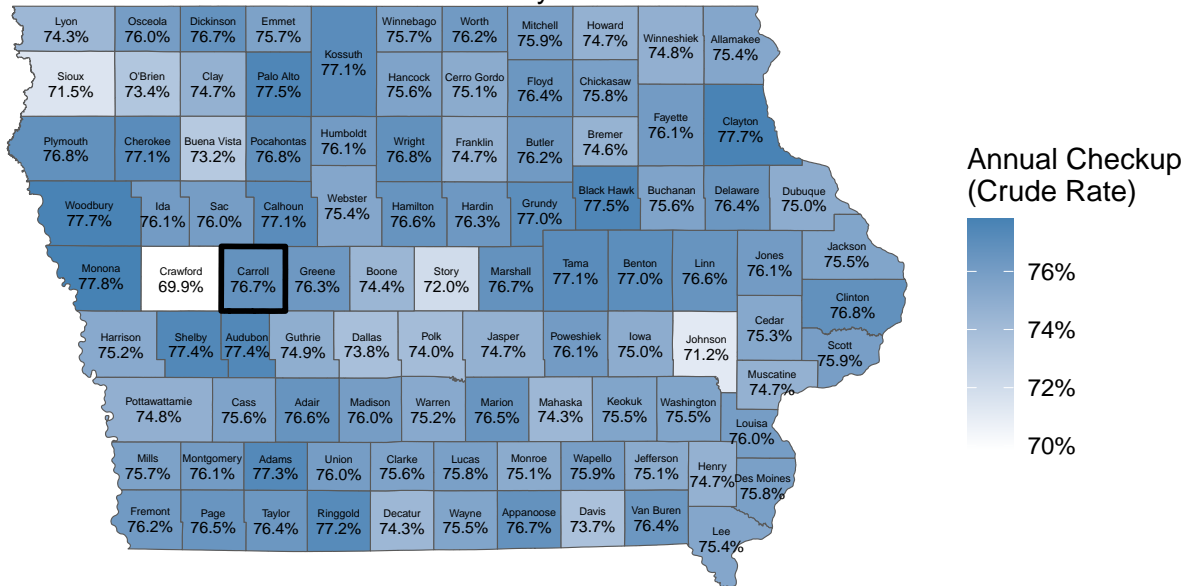
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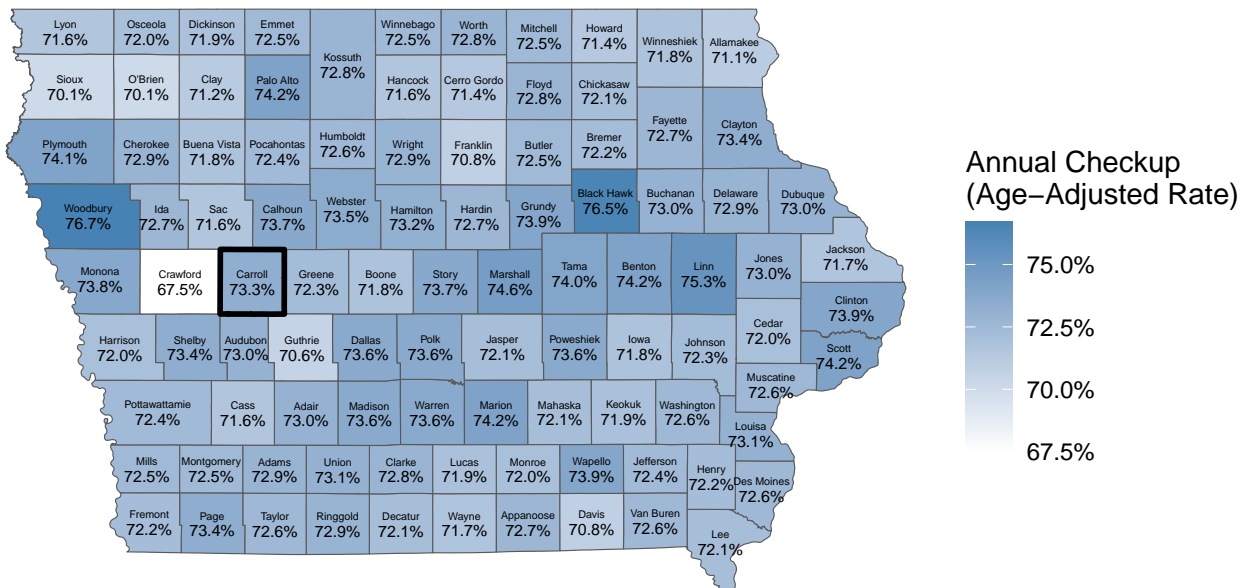
Data Source: CDC PLACES 2023 Release, BRFSS 2020

Annual Checkup

Visits to doctor for routine checkup within the past year among adults aged ≥ 18 years



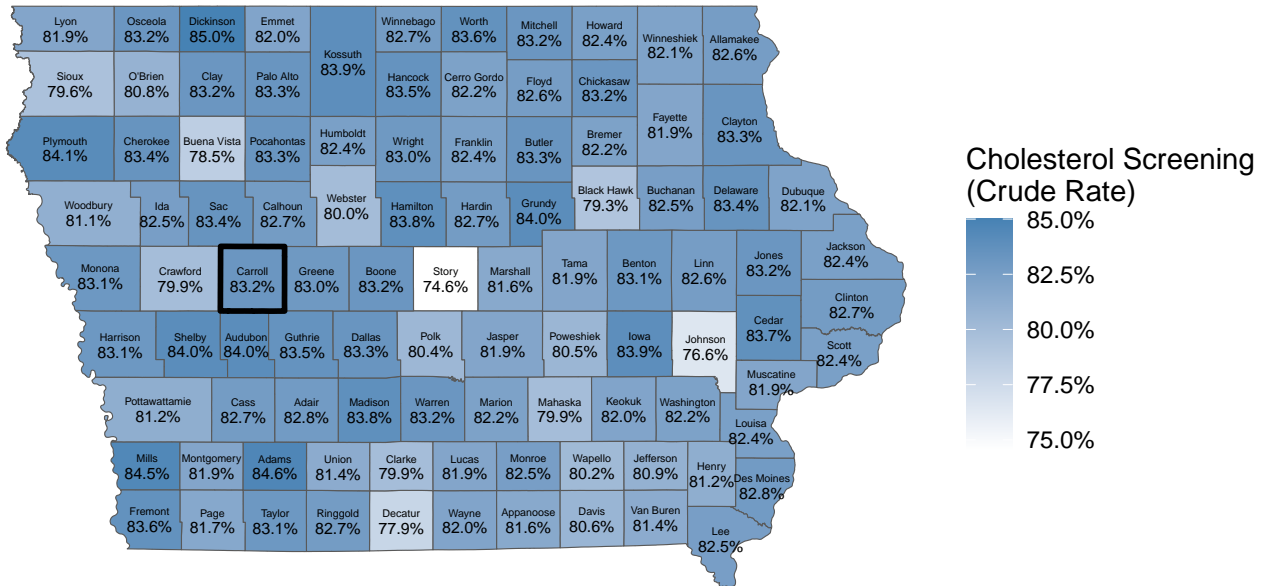
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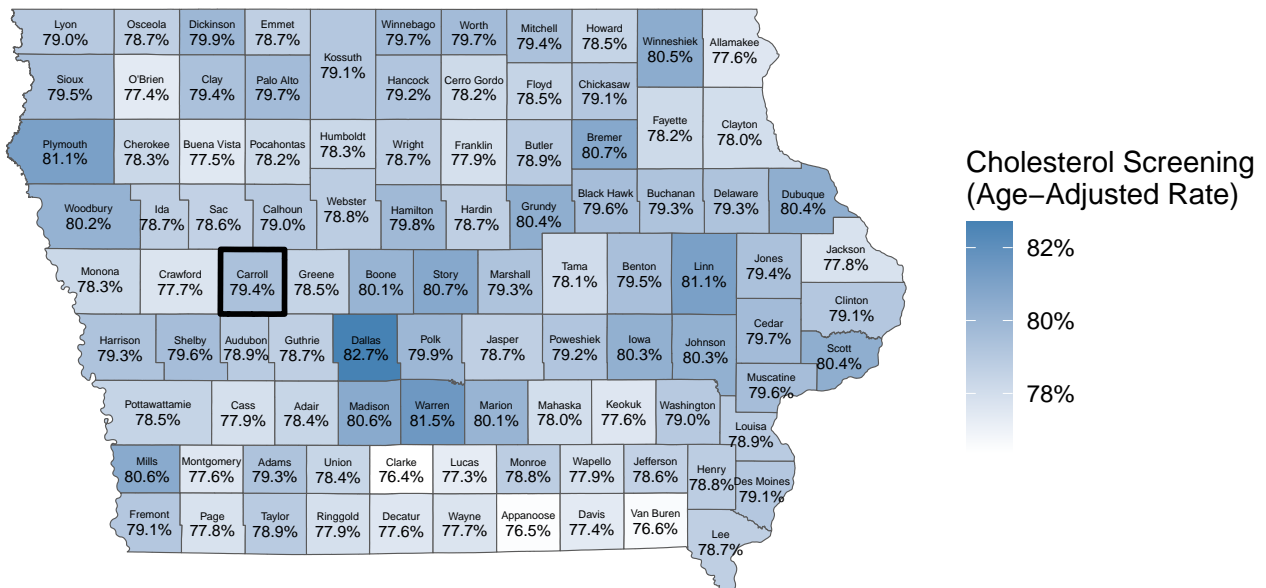
Data Source: CDC PLACES 2023 Release, BRFSS 2021

Cholesterol Screening

Cholesterol screening among adults aged ≥ 18 years



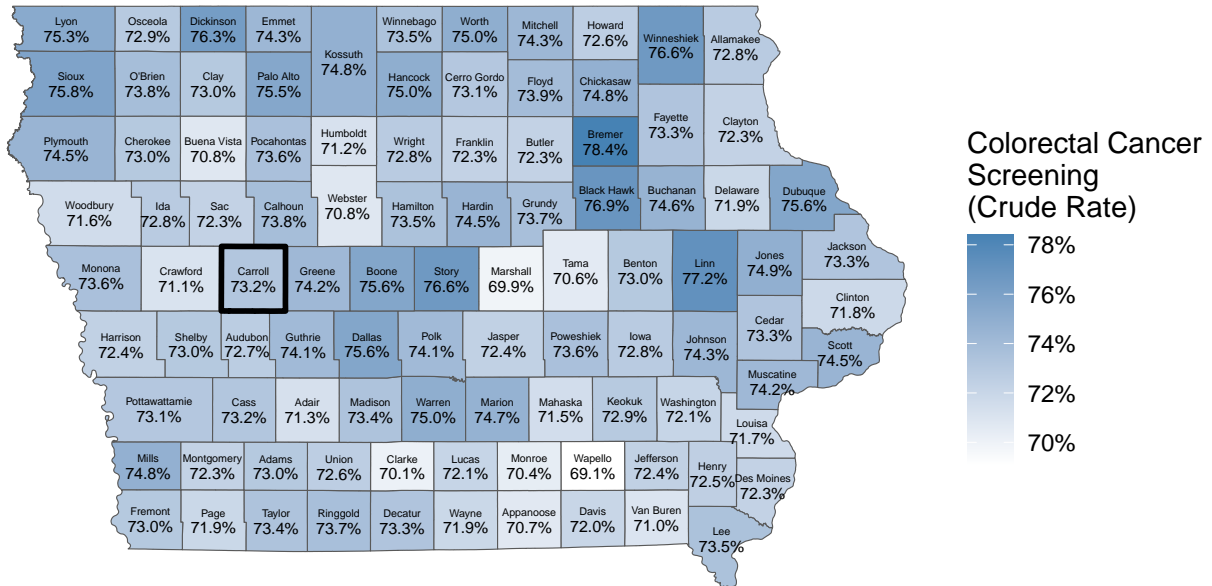
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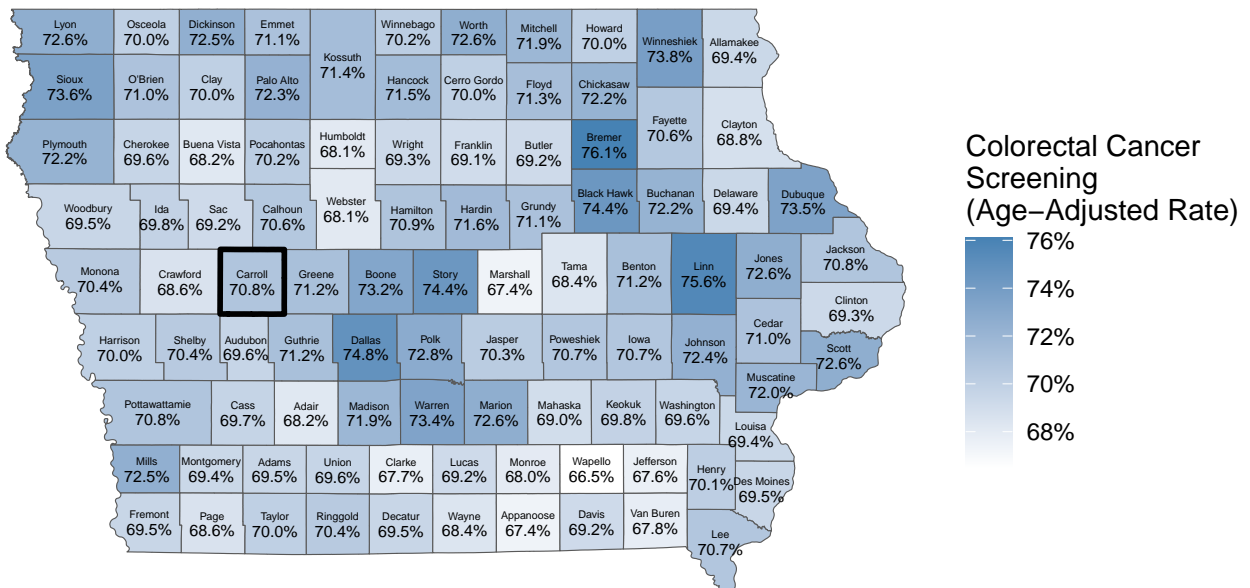
Data Source: CDC PLACES 2023 Release, BRFSS 2021

Colorectal Cancer Screening

Colorectal cancer screening among adults aged 50–75 years



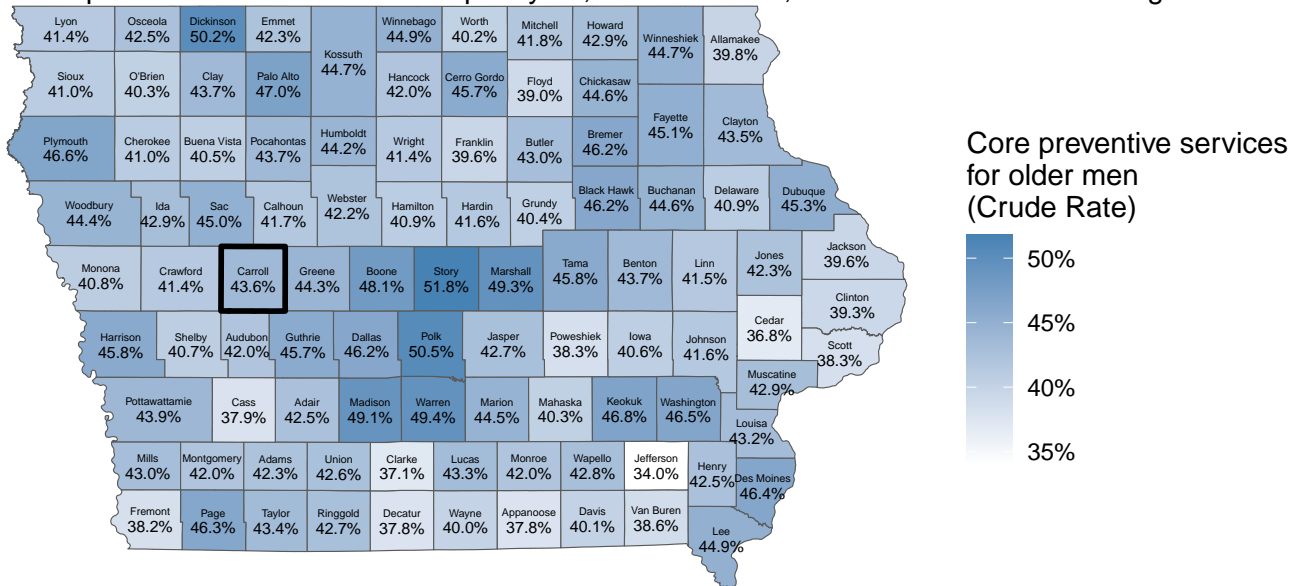
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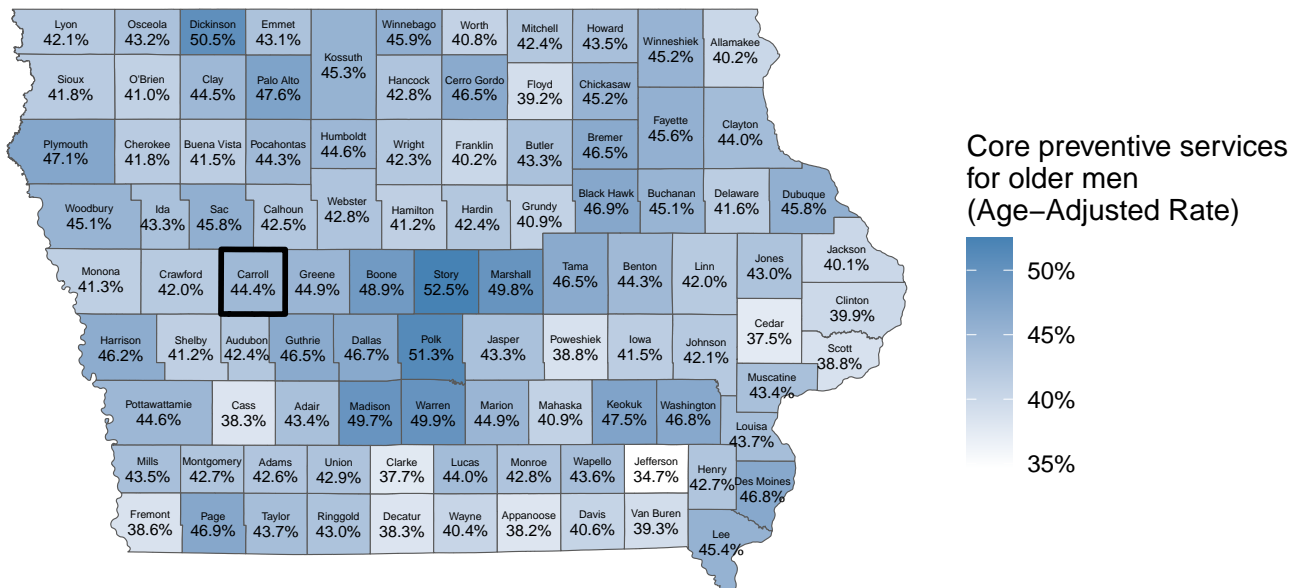
Data Source: CDC PLACES 2023 Release, BRFSS 2020

Core preventive services for older men

Older adult men aged ≥ 65 years who are up to date on a core set of clinical preventive services: Flu shot past year, PPV shot ever, Colorectal cancer screening



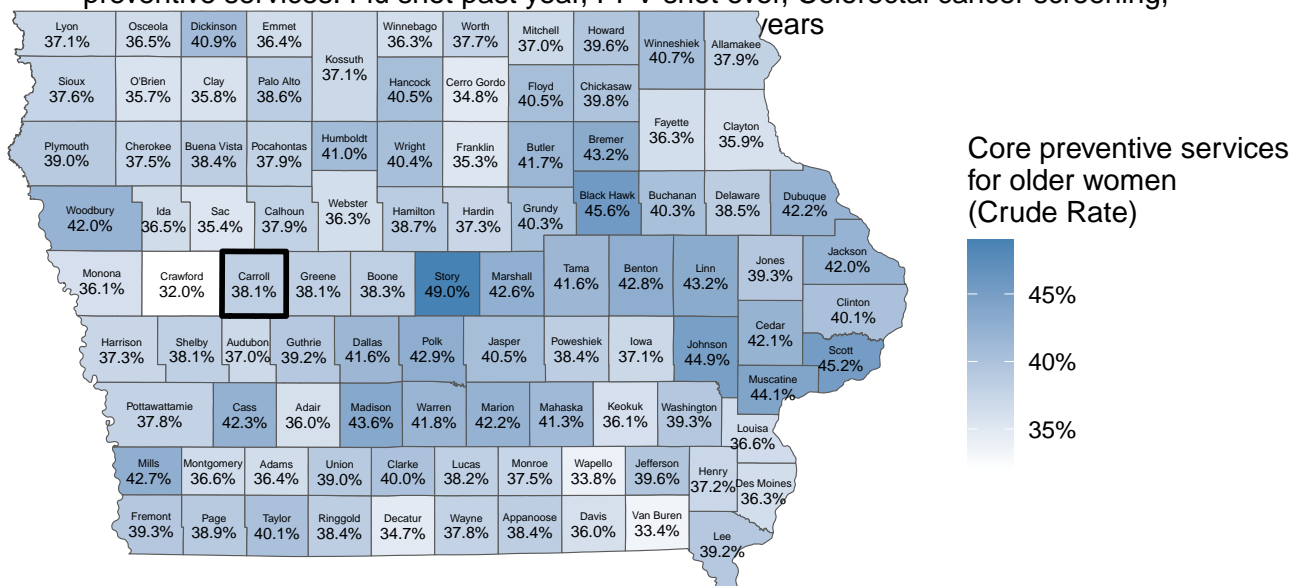
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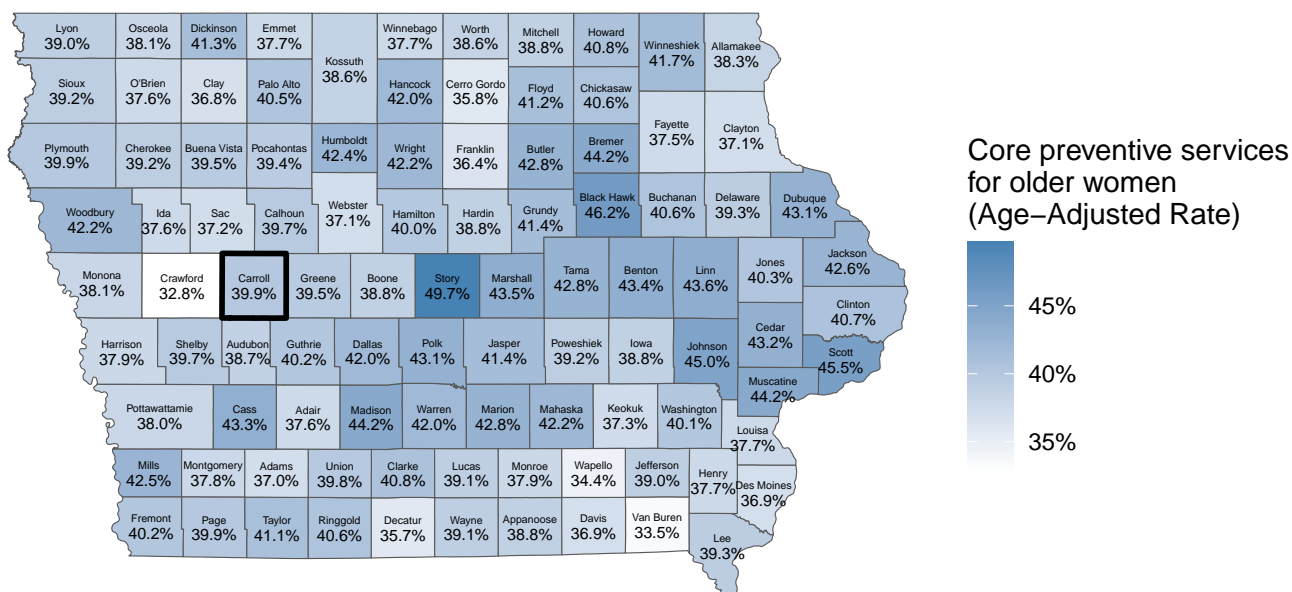
Data Source: CDC PLACES 2023 Release, BRFSS 2020

Core preventive services for older women

Older adult women aged ≥ 65 years who are up to date on a core set of clinical preventive services: Flu shot past year, PPV shot ever, Colorectal cancer screening,



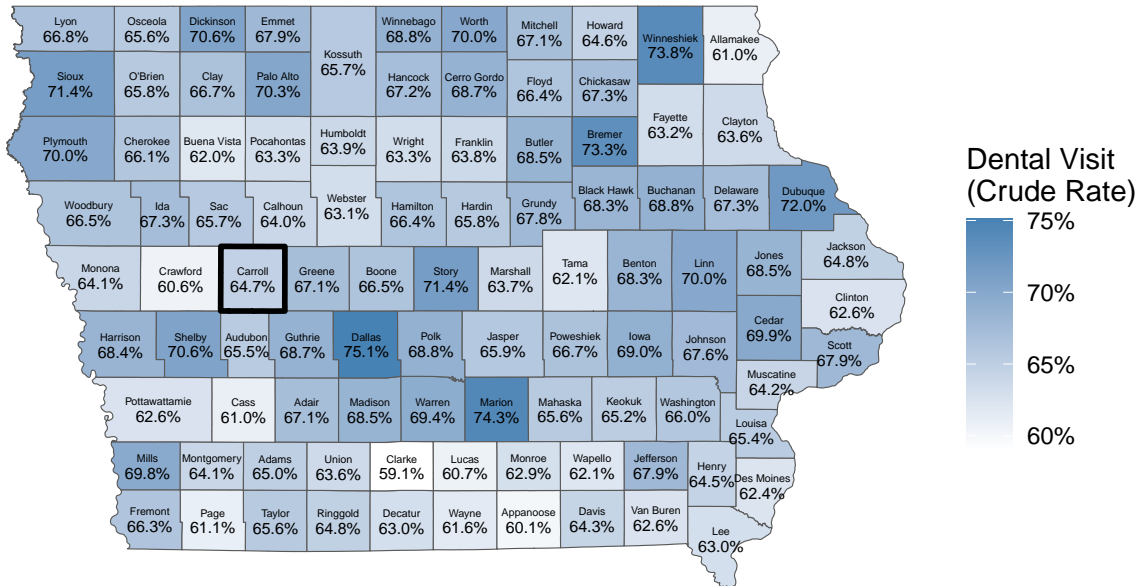
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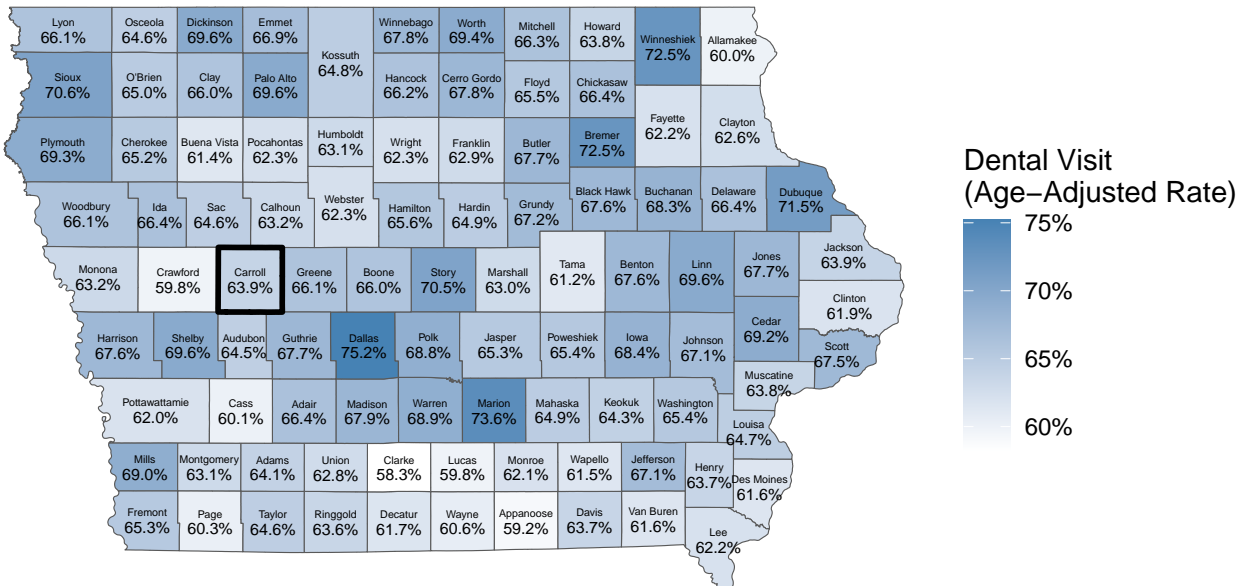
Data Source: CDC PLACES 2023 Release, BRFSS 2020

Dental Visit

Visits to dentist or dental clinic among adults aged >=18 years



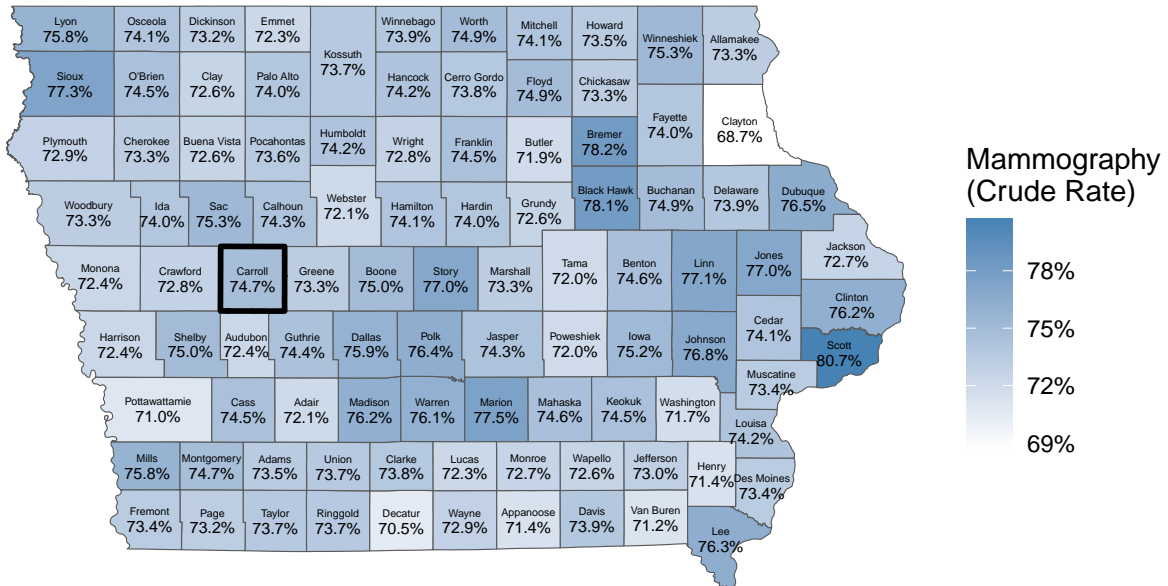
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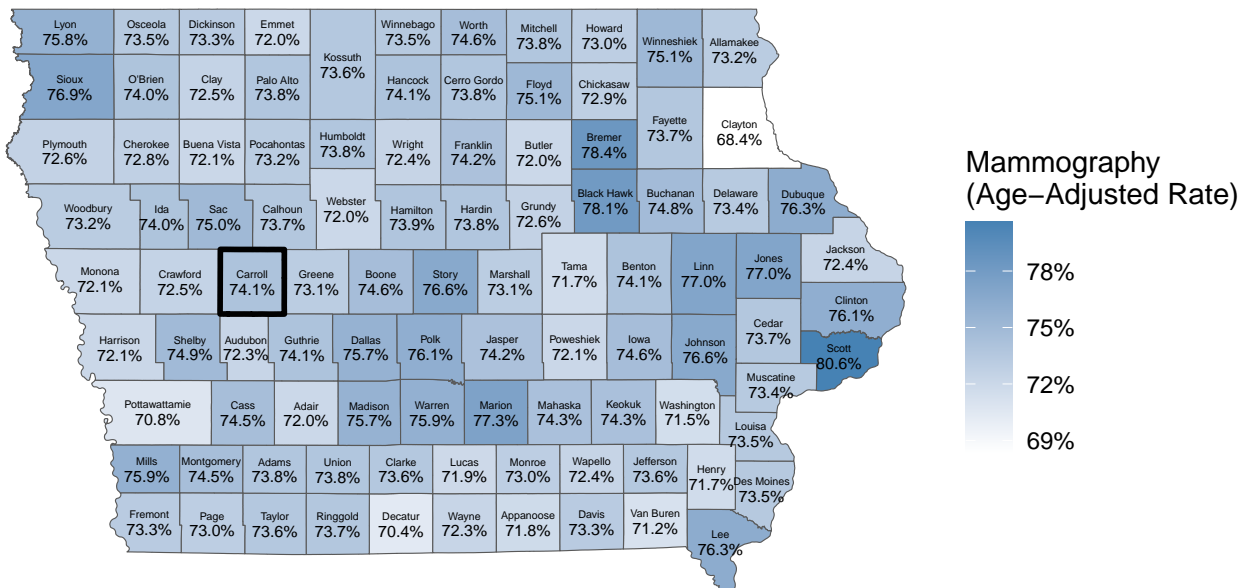
Data Source: CDC PLACES 2023 Release, BRFSS 2020

Mammography

Mammography use among women aged 50–74 years



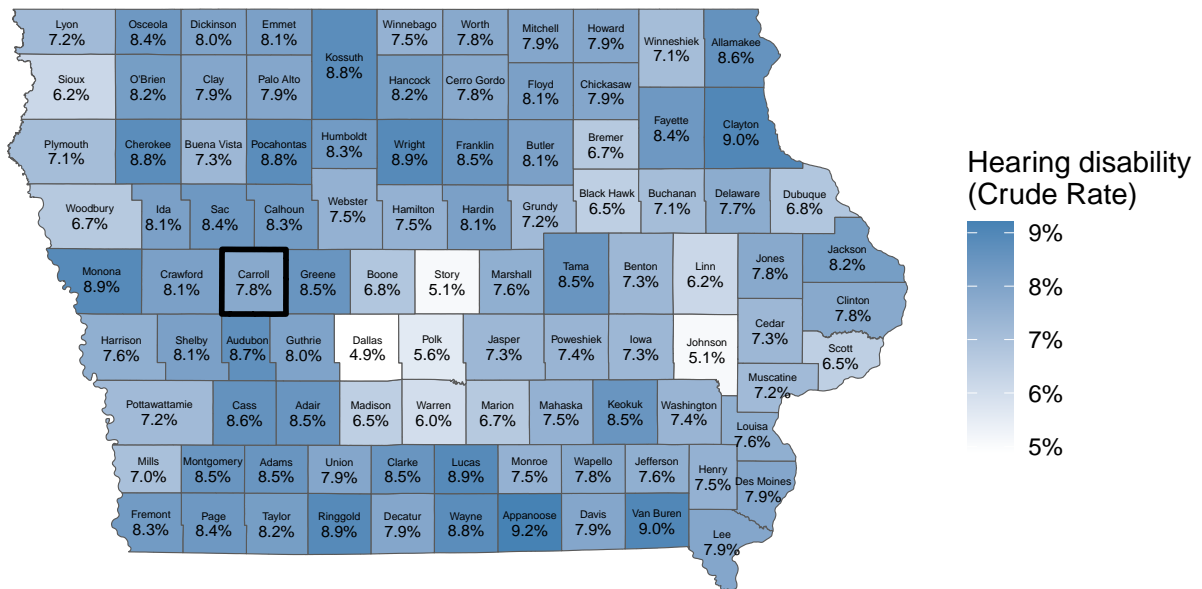
Data Source: CDC PLACES 2023 Release, BRFSS 2020



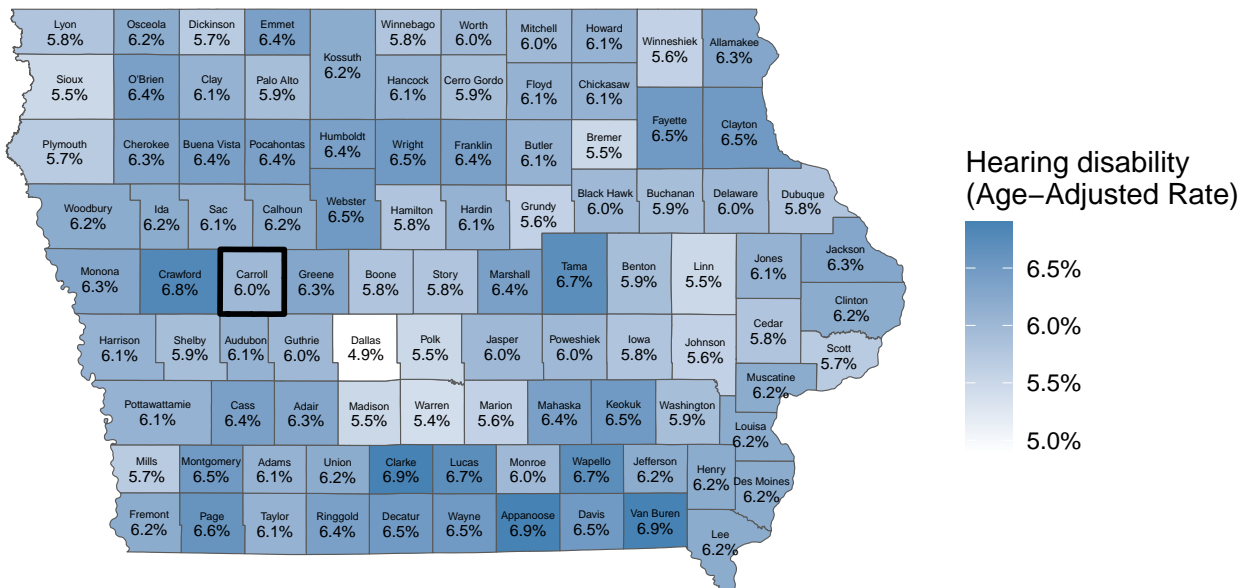
Data Source: CDC PLACES 2023 Release, BRFSS 2020

Hearing disability

Hearing disability among adults aged ≥ 18 years



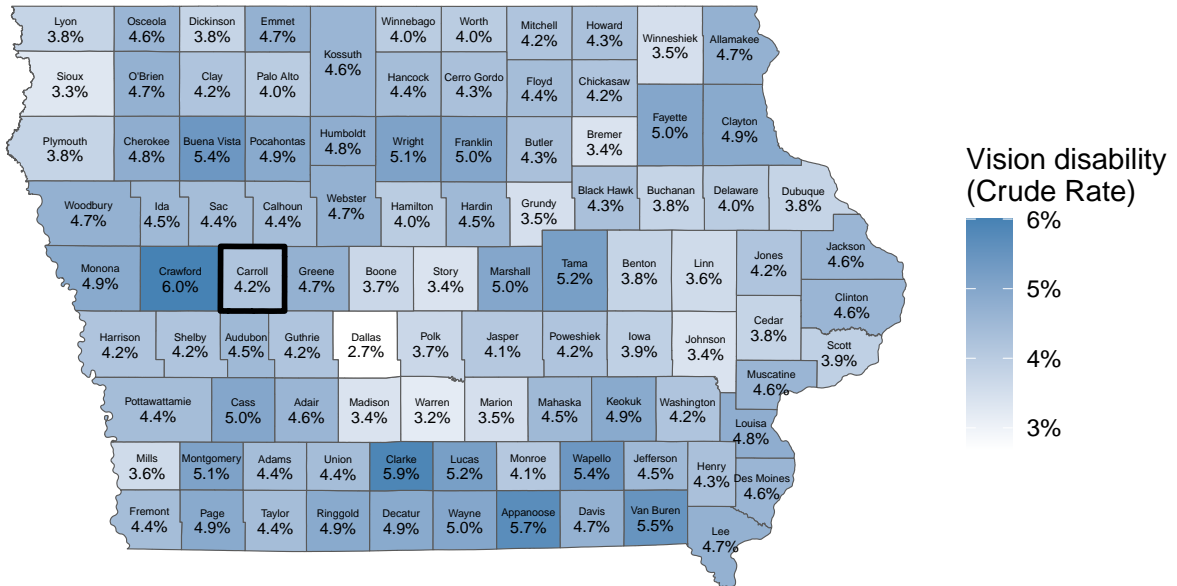
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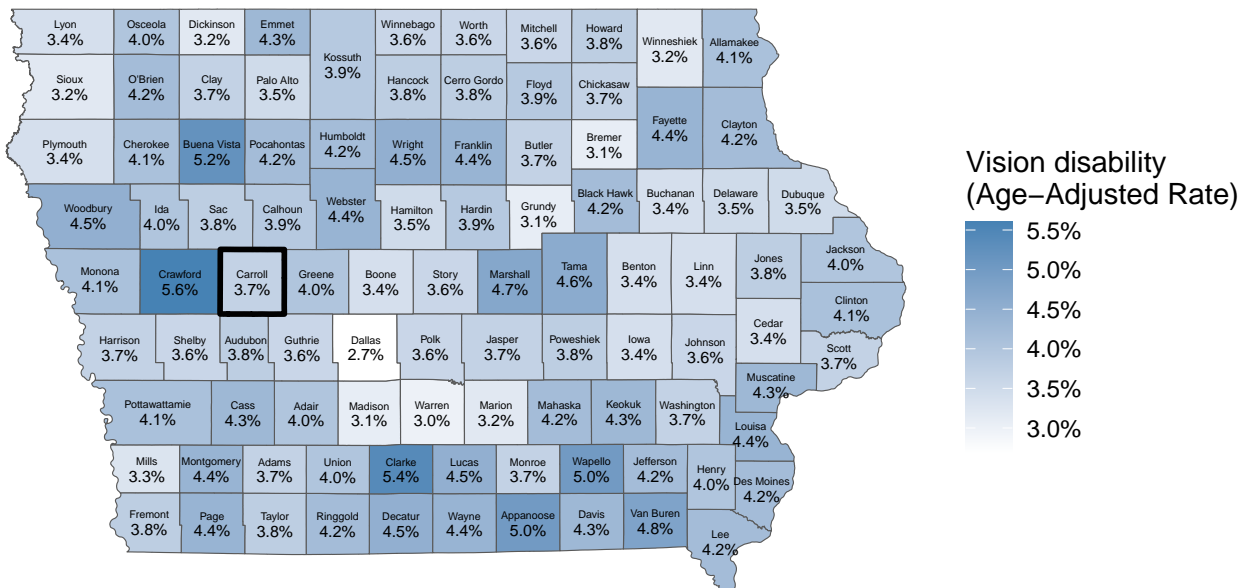
Data Source: CDC PLACES 2023 Release, BRFSS 2021

Vision disability

Vision disability among adults aged >=18 years



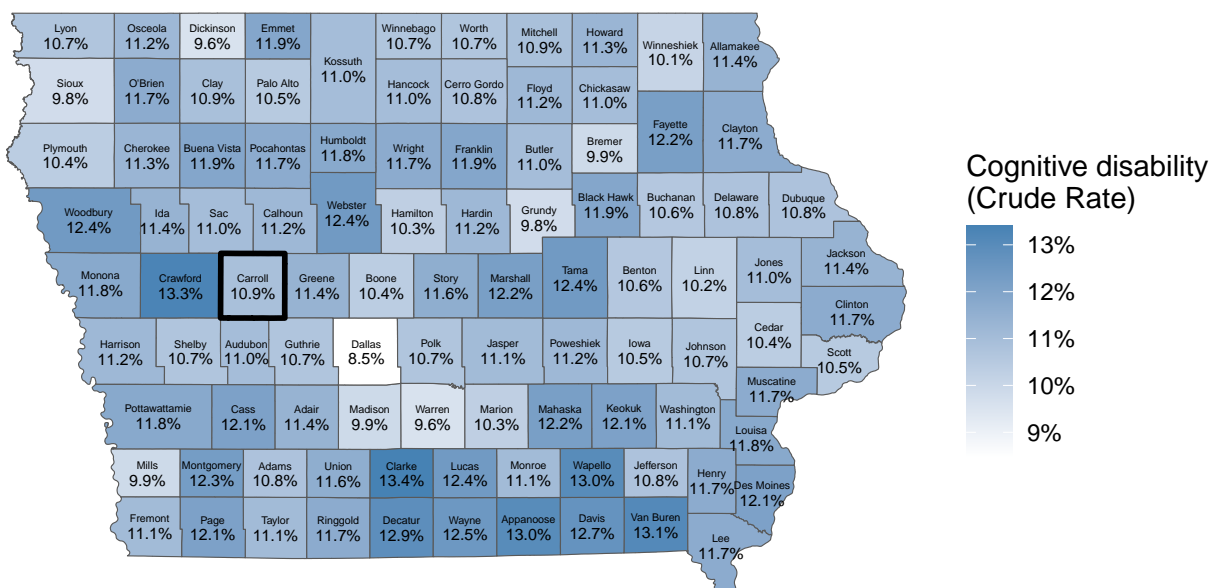
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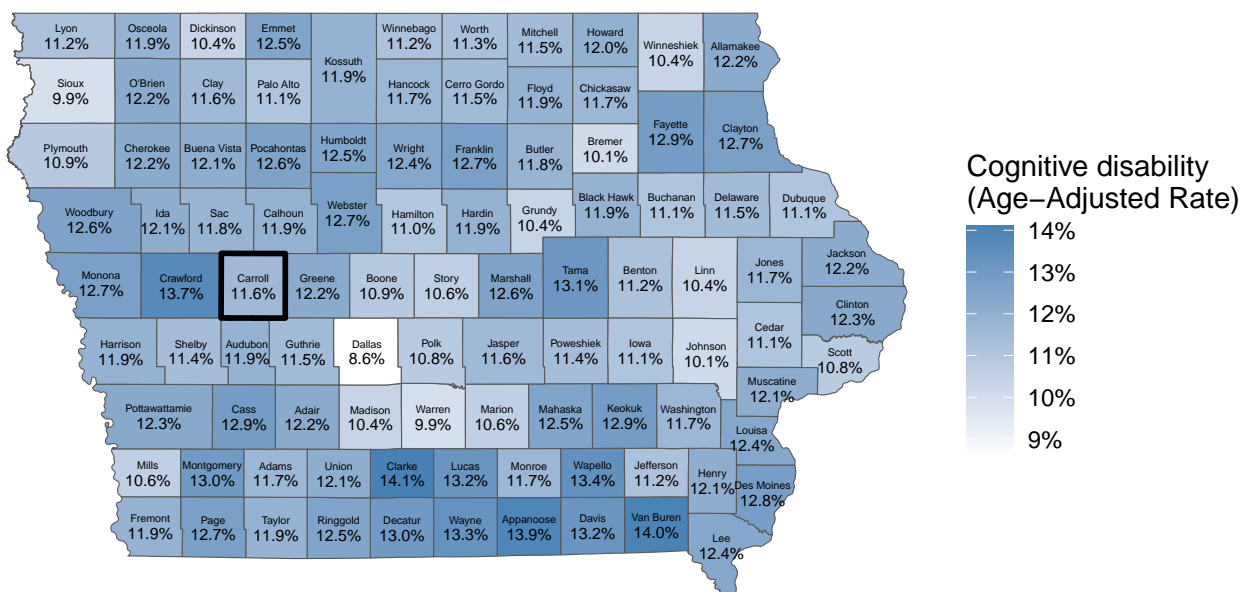
Data Source: CDC PLACES 2023 Release, BRFSS 2021

Cognitive disability

Cognitive disability among adults aged >=18 years



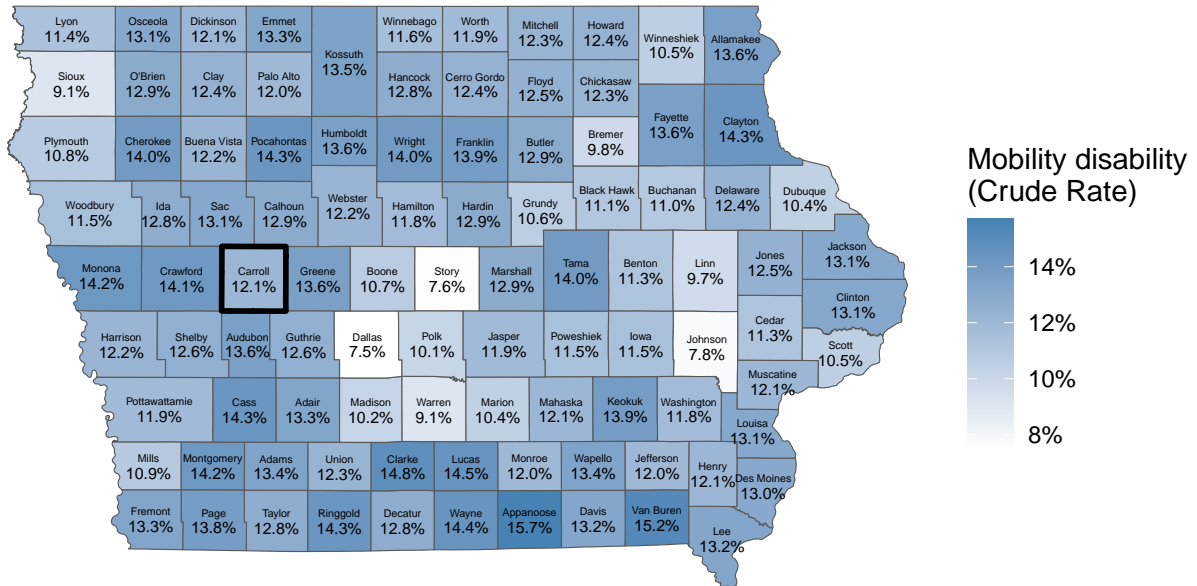
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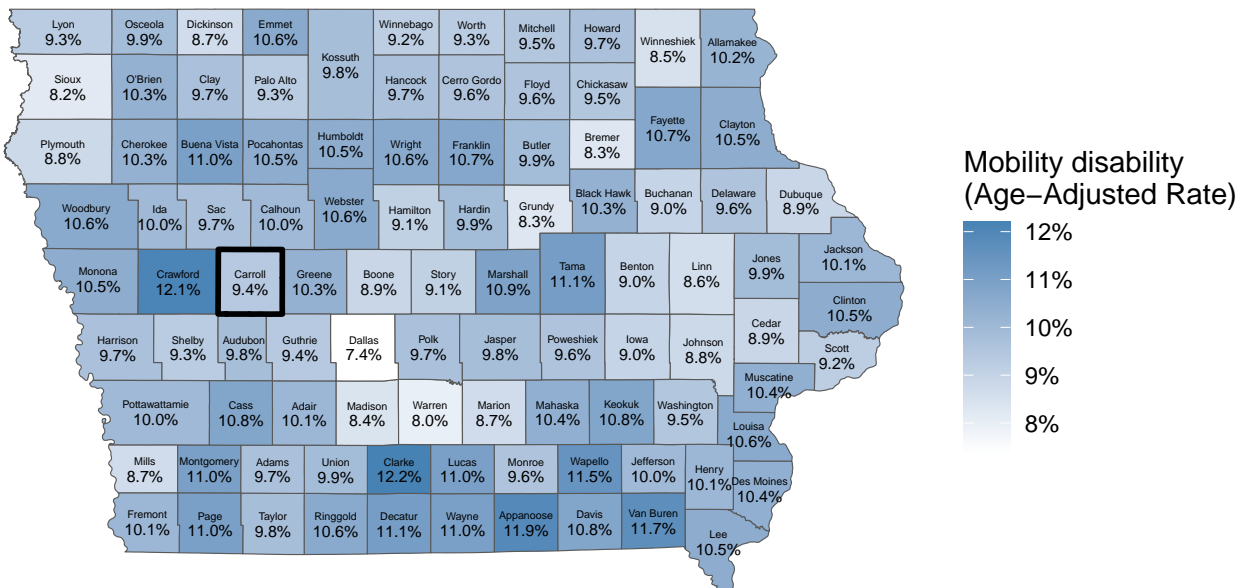
Data Source: CDC PLACES 2023 Release, BRFSS 2021

Mobility disability

Mobility disability among adults aged ≥ 18 years



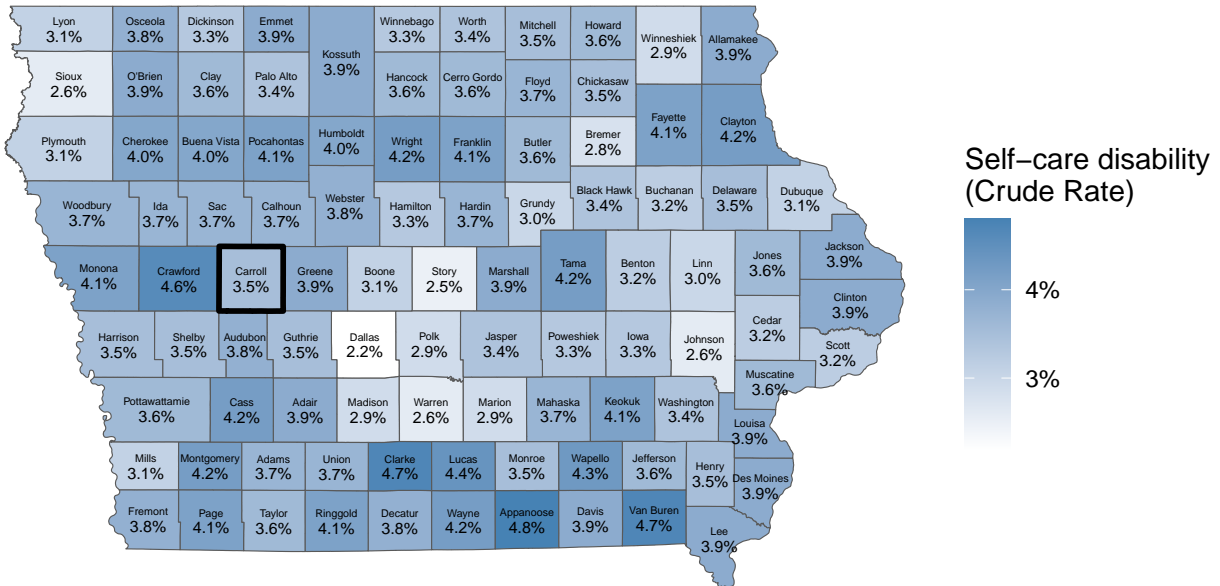
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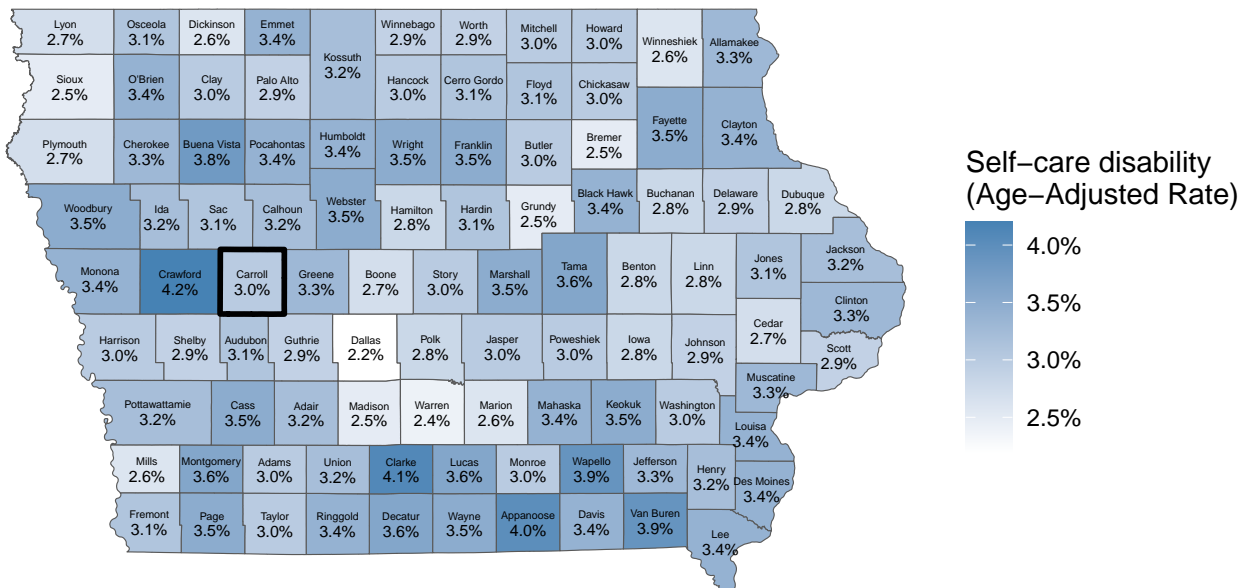
Data Source: CDC PLACES 2023 Release, BRFSS 2021

Self-care disability

Self-care disability among adults aged >=18 years



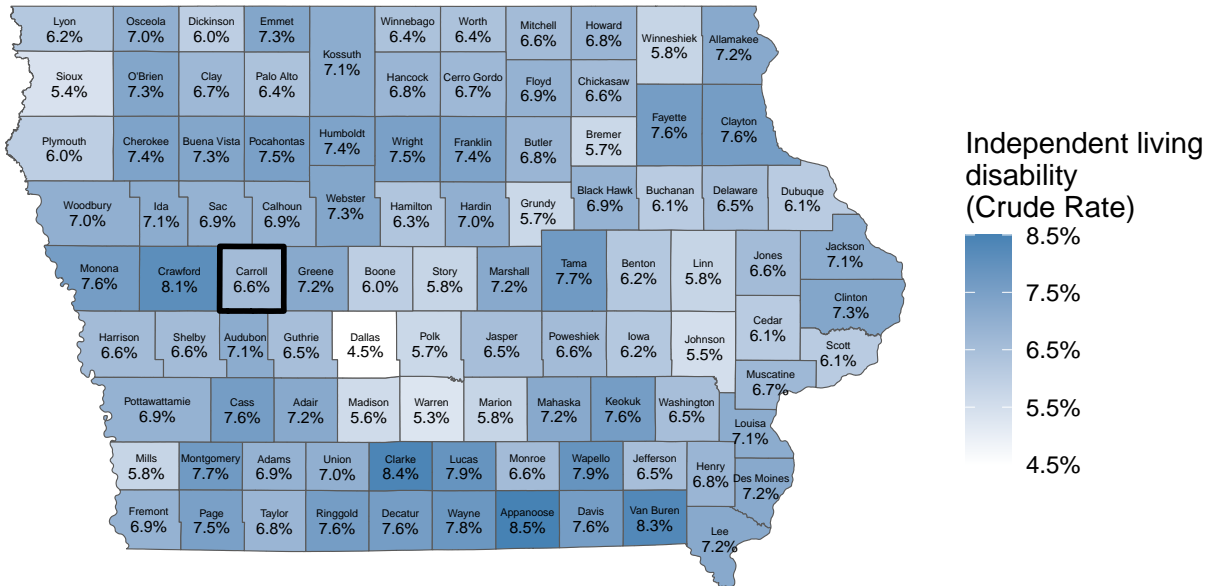
Data Source: CDC PLACES 2023 Release, BRFSS 2021



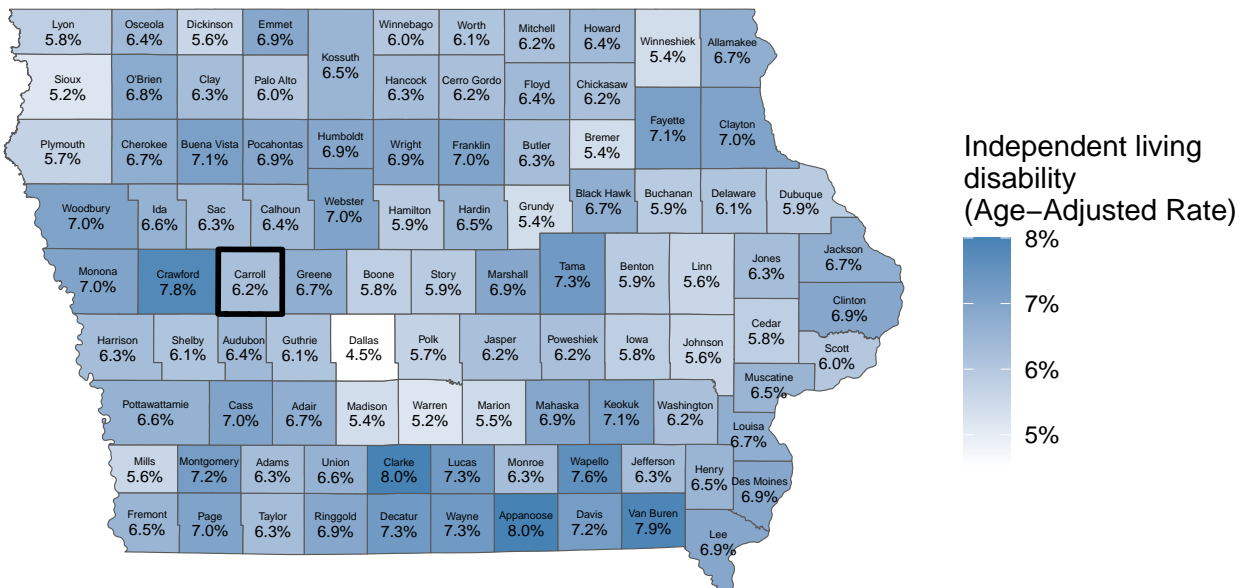
Data Source: CDC PLACES 2023 Release, BRFSS 2021

Independent living disability

Independent living disability among adults aged ≥ 18 years



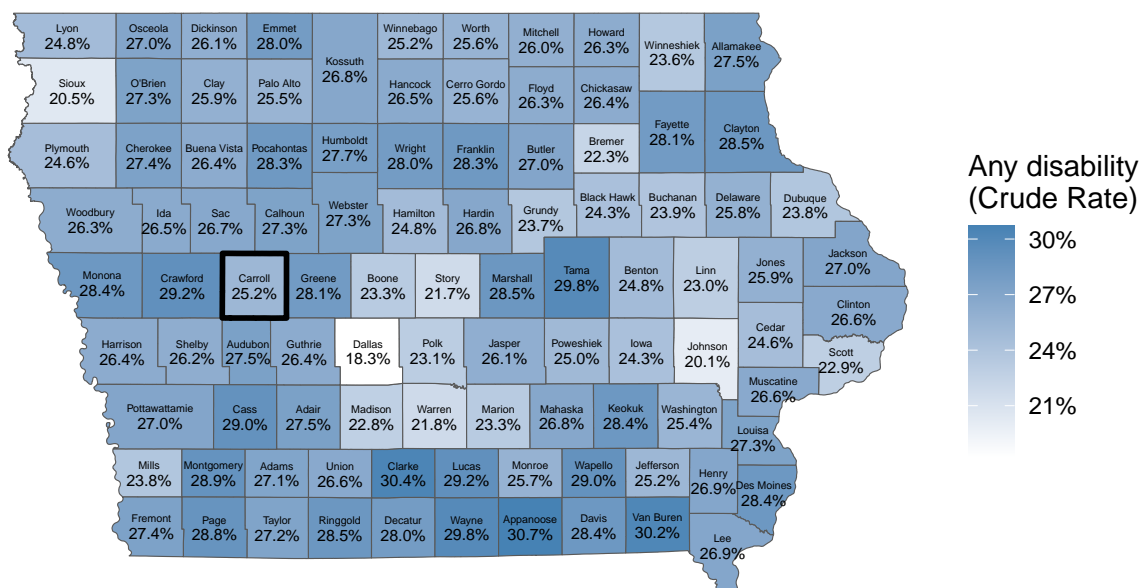
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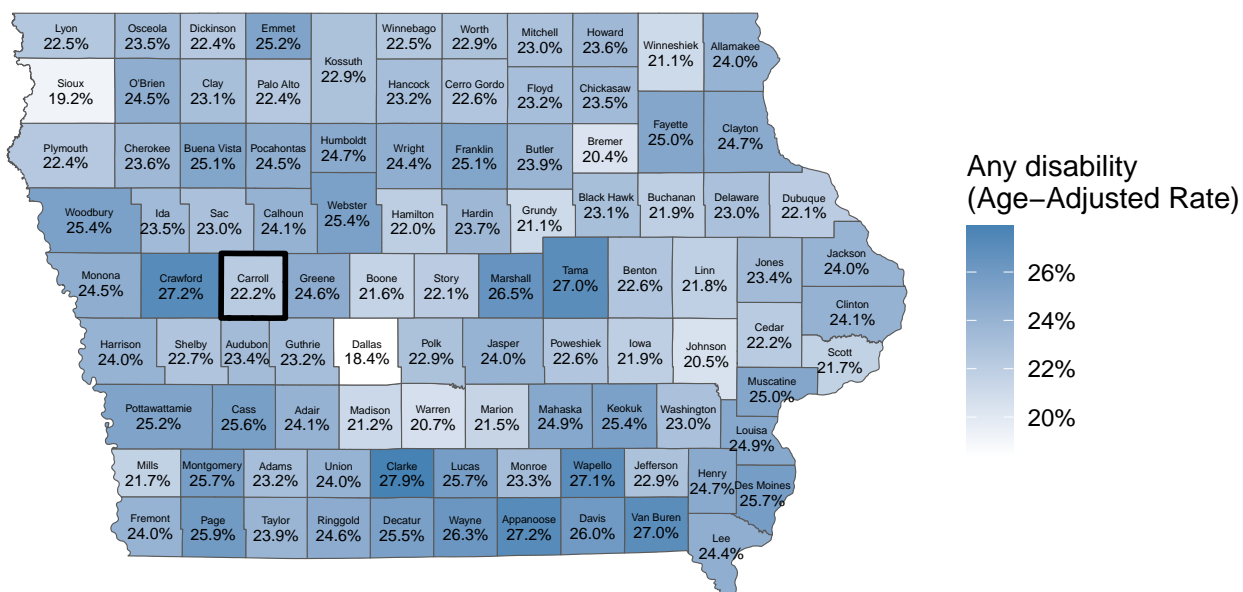
Data Source: CDC PLACES 2023 Release, BRFSS 2021

Any disability

Any disability among adults aged >=18 years



Data Source: CDC PLACES 2023 Release, BRFSS 2021



Data Source: CDC PLACES 2023 Release, BRFSS 2021