







### Introduction

Where we live matters to our health. The health of a community depends on many different factors, including quality of health care, individual behavior, education and jobs, and the environment. We can improve a community's health through programs and policies. For example, people who live in communities with ample park and recreation space are more likely to exercise, which reduces heart disease risk. People who live in communities with smoke-free laws are less likely to smoke or to be exposed to second-hand smoke, which reduces lung cancer risk.

The problem is that there are big differences in health across communities, with some places being much healthier than others. And up to now, it has been hard to get a standard way to measure how healthy a county is and see where they can improve.

The Robert Wood Johnson Foundation and the University of Wisconsin Population Health Institute are pleased to present the 2011 County Health Rankings, a collection of 50 reports that reflect the overall health of counties in every state across the country. For the second year in a row, counties can get a snapshot of how healthy their residents are by comparing their overall health and the factors that influence their health with other counties in their state. This allows communities to see county-to-county where they are doing well and where they need to improve.

Everyone has a stake in community health. We all need to work together to find solutions. The County Health Rankings serve as both a call to action and a needed tool in this effort.





All of the County Health Rankings are based upon this model of population health improvement:



In this model, health outcomes are measures that describe the current health status of a county. These health outcomes are influenced by a set of health factors. These health factors and their outcomes may also be affected by community-based programs and policies designed to alter their distribution in the community. Counties can improve health outcomes by addressing all health factors with effective, evidence-based programs and policies.

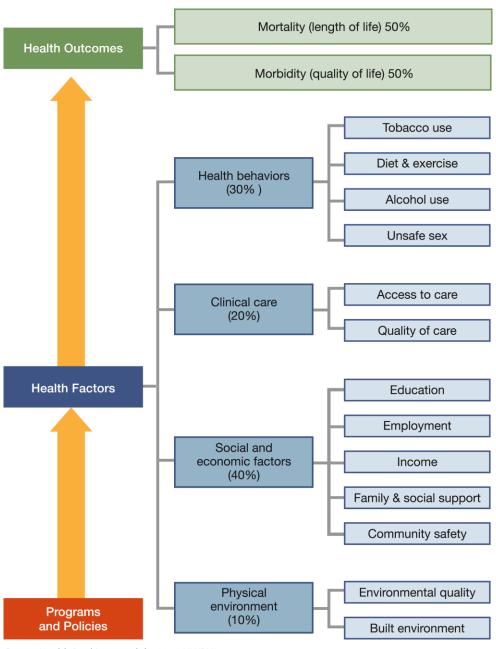
To compile the Rankings, we built on our prior work in Wisconsin, obtained input from a team of expert advisors, and worked closely with staff from the National Center for Health Statistics. Together we selected a number of population health measures based on scientific relevance, importance, and availability of data at the county level.

For a more detailed explanation of our approach, the methods used to compile the Rankings, information on the action steps communities can take to improve their health, and examples of communities in action, see www.countyhealthrankings.org

## The Rankings

This report ranks Ohio counties according to their summary measures of health outcomes and health factors, as well as the components used to create each summary measure. The figure below depicts the structure of the Rankings model. Counties receive a rank for each population health component; those having high ranks (e.g., 1 or 2) are estimated to be the "healthiest."

Our summary health outcomes rankings are based on an equal weighting of mortality and morbidity measures. The summary health factors rankings are based on weighted scores of four types of factors: behavioral, clinical, social and economic, and environmental. The weights for the factors (shown in parentheses in the figure) are based upon a review of the literature and expert input, but represent just one way of combining these factors.



County Health Rankings model ©2010 UWPHI

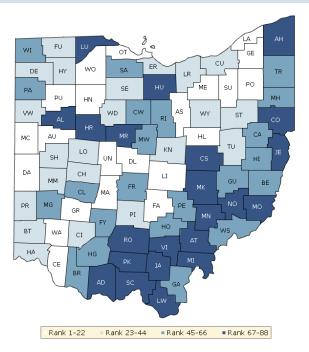
The maps on this page display Ohio's counties divided into groups by health rank. The lighter colors indicate better performance in the respective summary rankings. The green map shows the distribution of summary health outcomes. The blue displays the distribution of the summary rank for health factors.

Maps help locate the healthiest and least healthy counties in the state. The health factors map appears similar to the health outcomes map, showing how health factors and health outcomes are closely related.

### **HEALTH OUTCOMES**



### **HEALTH FACTORS**



# **Summary Health Outcomes & Health Factors Rankings**

Counties receive two summary ranks:

- Health Outcomes
- Health Factors

Each of these ranks represents a weighted summary of a number of measures.

Health outcomes represent how healthy a county is while health factors are what influences the health of the county.

Donk	Health Outcomes	Donk	Haalth Fastara
Rank 1	Health Outcomes Delaware	Rank 1	Health Factors Delaware
2	Geauga	2	Geauga
3	Medina	3	Warren
4	Holmes	4	Medina
5	Warren	5	Greene
6	Putnam	6	Wood
7	Mercer	7	Union
8	Greene	8	Fairfield
9	Hancock	9	Mercer
10		10	Hancock
-	Auglaize		
11	Wood	11	Madison
12	Wayne	12	Auglaize
13	Lake	13	Portage
14	Fairfield	14	Lake
15	Williams	15	Clermont
16	Ottawa	16	Putnam
17	Fulton	17	Licking
18	Noble	18	Ashland
19	Shelby	19	Holmes
20	Ashland	20	Summit
21	Union	21	Ottawa
22	Portage	22	Darke
23	Defiance	23	Fulton
24	Henry	24	Wayne
25	Paulding	25	Seneca
26	Licking	26	Miami
27	Darke	27	Wyandot
28	Wyandot	28	Henry
29	Tuscarawas	29	Hamilton
30	Clermont	30	Knox
31	Lorain	31	Defiance
32	Huron	32	Lorain
33	Knox	33	Logan
34	Seneca	34	Shelby
35	Madison	35	Clinton
36	Carroll	36	Cuyahoga
37	Miami	37	Stark
38	Washington	38	Preble
39	Van Wert	39	Van Wert
40	Summit	40	Butler

Rank	Health Outcomes	Rank	Health Factors
41	Columbiana	41	Champaign
42	Sandusky	42	Erie
43	Butler	43	Tuscarawas
44	Stark	44	Pickaway
45	Champaign	45	Montgomery
46	Allen	46	Carroll
47	Logan	47	Williams
48	Morgan	48	Sandusky
49	Richland	49	Fayette
50	Crawford	50	Washington
51	Guernsey	51	Belmont
52	Erie	52	Gallia
53	Hardin	53	Mahoning
54	Brown	54	Franklin
55	Belmont	55	Highland
56	Ashtabula	56	Hocking
57	Pickaway	57	Richland
58	Athens	58	Paulding
59	Muskingum	59	Morrow
60	Preble	60	Clark
61	Coshocton	61	Trumbull
62	Clinton	62	Guernsey
63	Monroe	63	Brown
64	Marion	64	Harrison
65	Franklin	65	Crawford
66	Perry	66	Perry
67	Hamilton	67	Hardin
68	Montgomery	68	Allen
69	Cuyahoga	69	Muskingum
70	Morrow	70	Marion
71	Trumbull	71	Noble
72	Lucas	72	Coshocton
73	Hocking	73	Jackson
74	Clark	74	Lucas
75	Highland	75	Huron
76	Mahoning	76	Columbiana
77	Fayette	77	Athens
78	Jefferson	78	Monroe
79	Harrison	79	Ross
80	Ross	80	Pike
81	Pike	81	Jefferson
82	Adams	82	Morgan
83	Meigs	83	Ashtabula
84	Vinton	84	Adams
85	Gallia	85	Lawrence
86	Jackson	86	Meigs
87	Scioto	87	Vinton
88	Lawrence	88	Scioto

## **Health Outcomes Rankings**

The summary health outcomes ranking is based on measures of mortality and morbidity. Each county's ranks for mortality and morbidity are displayed here. The mortality rank, representing length of life, is based on a measure of premature death: the years of potential life lost prior to age 75.

The morbidity rank is based on measures that represent health-related quality of life and birth outcomes. We combine four morbidity measures: self-reported fair or poor health, poor physical health days, poor mental health days, and the percent of births with low birthweight.

Rank	Mortality	Morbidity
1	Delaware	Holmes
2	Geauga	Mercer
3	Medina	Delaware
4	Putnam	Wayne
5	Warren	Geauga
6	Hancock	Medina
7	Greene	Auglaize
8	Wood	Warren
9	Carroll	Fulton
10	Holmes	Shelby
11	Fairfield	Putnam
12	Lake	Crawford
13	Auglaize	Henry
14	Ottawa	Greene
15	Noble	Knox
16	Ashland	Darke
17	Williams	Wood
18	Tuscarawas	Hancock
19	Mercer	Lake
20	Wyandot	Seneca
21	Portage	Williams
22	Union	Champaign
23	Lorain	Union
24	Fulton	Huron
25	Defiance	Portage
26	Paulding	Noble
27	Erie	Brown
28	Wayne	Madison
29	Shelby	Ottawa
30	Stark	Defiance
31	Licking	Hardin
32	Miami	Van Wert
33	Clermont	Paulding
34	Morgan	Licking
35	Henry	Fairfield
36	Summit	Ashland
37	Butler	Clermont
38	Sandusky	Ashtabula
39	Columbiana	Guernsey
40	Darke	Washington

Rank	Mortality	Morbidity
41	Logan	Wyandot
42	Washington	Lorain
43	Madison	Allen
44	Huron	Tuscarawas
45	Richland	Columbiana
46	Allen	Sandusky
47	Seneca	Butler
48	Belmont	Summit
49	Preble	Highland
50	Coshocton	Logan
51	Knox	Miami
52	Muskingum	Clinton
53	Marion	Perry
54	Morrow	Pickaway
55	Van Wert	Hocking
56	Athens	Richland
57	Cuyahoga	Fayette
58	Guernsey	Athens
59	Monroe	Montgomery
60	Franklin	Belmont
61	Pickaway	Morgan
62	Champaign	Clark
63	Hamilton	Stark
64	Clinton	Trumbull
65	Lucas	Monroe
66	Montgomery	Hamilton
67	Perry	Muskingum
68	Hardin	Franklin
69	Trumbull	Carroll
70	Ashtabula	Lucas
71	Mahoning	Pike
72	Brown	Marion
73	Crawford	Coshocton
74	Clark	Preble
75	Hocking	Mahoning
76	Ross	Jefferson
77	Highland	Harrison
78	Jefferson	Cuyahoga
79	Harrison	Adams
80	Meigs	Erie
81	Fayette	Morrow
82	Lawrence	Vinton
83	Scioto	Ross
84	Pike	Jackson
85	Gallia	Meigs
86	Jackson	Gallia
87	Adams	Scioto
88	Vinton	Lawrence

## **Health Factors Rankings**

The summary health factors ranking is based on four factors: health behaviors, clinical care, social and economic, and physical environment factors. In turn, each of these factors is based on several measures. Health behaviors include measures of smoking, diet and exercise, alcohol use, and risky sex behavior. Clinical

care includes measures of access to care and quality of care. Social and economic factors include measures of education, employment, income, family and social support, and community safety. The physical environment includes measures of environmental quality and the built environment.

Rank	Health Behaviors	Rank	Clinical Care	Rank	Social & Economic Factors	Rank	Physical Environment
1	Delaware	1	Delaware	1	Delaware	1	Jackson
2	Geauga	2	Warren	2	Geauga	2	Lorain
3	Warren	3	Cuyahoga	3	Medina	3	Pike
4	Holmes	4	Greene	4	Warren	4	Licking
5	Medina	5	Montgomery	5	Union	5	Highland
6	Wood	6	Lucas	6	Mercer	6	Fayette
7	Ashland	7	Mahoning	7	Fairfield	7	Greene
8	Darke	8	Hamilton	8	Greene	8	Clark
9	Greene	9	Clinton	9	Lake	9	Montgomery
10	Madison	10	Stark	10	Putnam	10	Morrow
11	Seneca	11	Clermont	11	Wood	11	Hocking
12	Mahoning	12	Medina	12	Auglaize	12	Richland
13	Hamilton	13	Licking	13	Hancock	13	Erie
14	Carroll	14	Putnam	14	Portage	14	Geauga
15	Summit	15	Shelby	15	Clermont	15	Wyandot
16	Trumbull	16	Henry	16	Madison	16	Belmont
17	Cuyahoga	17	Fairfield	17	Butler	17	Medina
18	Preble	18	Summit	18	Ottawa	18	Crawford
19	Portage	19	Defiance	19	Licking	19	Ottawa
20	Mercer	20	Geauga	20	Henry	20	Clermont
21	Hancock	21	Franklin	21	Fulton	21	Ross
22	Auglaize	22	Fulton	22	Miami	22	Paulding
23	Fairfield	23	Wayne	23	Holmes	23	Delaware
24	Wayne	24	Gallia	24	Knox	24	Coshocton
25	Clinton	25	Logan	25	Seneca	25	Mercer
26	Defiance	26	Hancock	26	Wayne	26	Gallia
27	Highland	27	Lorain	27	Wyandot	27	Sandusky
28	Adams	28	Fayette	28	Belmont	28	Ashland
29	Miami	29	Lake	29	Washington	29	Monroe
30	Tuscarawas	30	Muskingum	30	Erie	30	Perry
31	Champaign	31	Ross	31	Summit	31	Noble
32	Union	32	Van Wert	32	Sandusky	32	Union
33	Guernsey	33	Madison	33	Tuscarawas	33	Warren
34	Richland	34	Wood	34	Champaign	34	Knox
35	Ottawa	35	Clark	35	Darke	35	Fulton
36	Paulding	36	Union	36	Preble	36	Huron
37	Pickaway	37	Darke	37	Ashland	37	Madison
38	Hardin	38	Ottawa	38	Van Wert	38	Auglaize
39	Morrow	39	Butler	39	Shelby	39	Tuscarawas
40	Fulton	40	Ashland	40	Lorain	40	Portage

Rank	Health Behaviors	Rank	Clinical Care	Rank	Social & Economic Factors	Rank	Physical Environment
41	Noble	41	Knox	41	Logan	41	Van Wert
42	Logan	42	Auglaize	42	Stark	42	Columbiana
43	Williams	43	Huron	43	Athens	43	Pickaway
44	Wyandot	44	Miami	44	Morrow	44	Hancock
45	Van Wert	45	Wyandot	45	Defiance	45	Wood
46	Gallia	46	Williams	46	Pickaway	46	Ashtabula
47	Shelby	47	Pickaway	47	Hardin	47	Allen
48	Lake	48	Portage	48	Williams	48	Harrison
49	Clermont	49	Allen	49	Franklin	49	Marion
50	Harrison	50	Marion	50	Harrison	50	Brown
51	Fayette	51	Crawford	51	Hocking	51	Lawrence
52	Meigs	52	Brown	52	Paulding	52	Guernsey
53	Brown	53	Highland	53	Clinton	53	Fairfield
54	Montgomery	54	Trumbull	54	Hamilton	54	Muskingum
55	Perry	55	Perry	55	Jefferson	55	Stark
56	Washington	56	Sandusky	56	Lawrence	56	Adams
57	Morgan	57	Champaign	57	Carroll	57	Franklin
58	Licking	58	Erie	58	Allen	58	Mahoning
59	Athens	59	Richland	59	Coshocton	59	Morgan
60	Pike	60	Hocking	60	Fayette	60	Logan
61	Knox	61	Mercer	61	Gallia	61	Lucas
62	Crawford	62	Washington	62	Monroe	62	Miami
63	Belmont	63	Seneca	63	Clark	63	Summit
64	Henry	64	Guernsey	64	Columbiana	64	Athens
65	Erie	65	Carroll	65	Brown	65	Darke
66	Vinton	66	Preble	66	Noble	65	Shelby
67	Stark	67	Tuscarawas	67	Cuyahoga	67	Wayne
68	Lorain	68	Columbiana	68	Montgomery	68	Carroll
69	Butler	69	Lawrence	69	Guernsey	69	Champaign
70	Clark	70	Jefferson	70	Richland	70	Defiance
71	Muskingum	71	Pike	71	Perry	71	Williams
72	Sandusky	72	Scioto	72	Crawford	72	Seneca
73	Putnam	73	Jackson	73	Jackson	73	Preble
74	Marion	74	Ashtabula	74	Marion	74	Lake
75	Hocking	75	Morgan	75	Muskingum	75	Putnam
76	Coshocton	76	Belmont	76	Highland	76	Trumbull
77	Monroe	77	Holmes	77	Ross	77	Holmes
78	Jackson	78	Paulding	78	Trumbull	78	Clinton
79	Huron	79	Harrison	79	Huron	79	Scioto
80	Franklin	80	Coshocton	80	Ashtabula	80	Henry
81	Columbiana	81	Vinton	81	Meigs	81	Cuyahoga
82	Ashtabula	82	Hardin	82	Lucas	82	Meigs
83	Lucas	83	Morrow	83	Scioto	83	Vinton
84	Allen	84	Noble	84	Mahoning	84	Hamilton
85	Jefferson	85	Monroe	85	Morgan	85	Jefferson
86	Ross	86	Adams	86	Vinton	86	Washington
87	Scioto	87	Meigs	87	Adams	87	Hardin
88	Lawrence	88	Athens	88	Pike	88	Butler

# 2011 County Health Rankings: Measures, Data Sources, and Years of Data

	Measure	Data Source	Years of Data
HEALTH OUTCOMES			
Mortality	Premature death	National Center for Health Statistics	2005-2007
Morbidity	Poor or fair health	Behavioral Risk Factor Surveillance System	2003-2009
·	Poor physical health days	Behavioral Risk Factor Surveillance System	2003-2009
	Poor mental health days	Behavioral Risk Factor Surveillance System	2003-2009
	Low birthweight	National Center for Health Statistics	2001-2007
HEALTH FACTORS			
HEALTH BEHAVIORS			
Tobacco	Adult smoking	Behavioral Risk Factor Surveillance System	2003-2009
Diet and Exercise	Adult obesity	National Center for Chronic Disease Prevention and Health Promotion	2008
Alcohol Use	Excessive drinking	Behavioral Risk Factor Surveillance System	2003-2009
	Motor vehicle crash death rate	National Center for Health Statistics	2001-2007
High Risk Sexual Behavior	Sexually transmitted infections	National Center for Hepatitis, HIV, STD and TB Prevention	2008
	Teen birth rate	National Center for Health Statistics	2001-2007
CLINICAL CARE			
Access to Care	Uninsured adults	Small Area Health Insurance Estimates, U.S. Census	2007
	Primary care providers	Health Resources & Services Administration	2008
Quality of Care	Preventable hospital stays	Medicare/Dartmouth Institute	2006-2007
	Diabetic screening	Medicare/Dartmouth Institute	2006-2007
	Mammography screening	Medicare/Dartmouth Institute	2006-2007
SOCIOECONOMIC FACT	ORS		
Education	High school graduation	National Center for Education Statistics <sup>1</sup>	2006-2007
	Some college	American Community Survey	2005-2009
Employment	Unemployment	Bureau of Labor Statistics	2009
Income	Children in poverty	Small Area Income and Poverty Estimates, U.S. Census	2008
Family and Social Support	Inadequate social support	Behavioral Risk Factor Surveillance System	2005-2009
	Single-parent households	American Community Survey	2005-2009
Community Safety	Violent crime <sup>2</sup>	Uniform Crime Reporting, Federal Bureau of Investigation	2006-2008
PHYSICAL ENVIRONME	NT		
Air Quality <sup>3</sup>	Air pollution-particulate matter days	U.S. Environmental Protection Agency / Centers for Disease Control and Prevention	2006
	Air pollution-ozone days	U.S. Environmental Protection Agency / Centers for Disease Control and Prevention	2006
Built Environment	Access to healthy foods	Census Zip Code Business Patterns	2008
	Access to recreational facilities	Census County Business Patterns	2008

<sup>&</sup>lt;sup>1</sup> State data sources for KY, NH, NC, PA, SC, and UT (2008-2009).

<sup>&</sup>lt;sup>2</sup> Homicide rate (2001-2007) from National Center for Health Statistics for AK, AZ, AR, CO, CT, GA, ID, IN, IA, KS, KY, LA, MN, MS, MT, NE, NH, NM, NC, ND, OH, SD, UT, and WV. State data source for IL.

<sup>&</sup>lt;sup>3</sup> Not available for AK and HI.

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