Lawrence County Health Profile
Mississippi County Health Profile
Project Team

Lei Zhang, PhD, MBA
Director
Office of Health Data and Research

Vincent Mendy, DrPH, MPH, CPH
Epidemiologist
Office of Health Data and Research

Xiaojian (Jack) Liu, PhD, MS
Business Systems Analyst
Office of Health Data and Research

Manuela Staneva, MPH
Epidemiologist
Office of Health Data and Research

Ling Lu, MS
Business Systems Analyst
Office of Health Informatics

Fei Teng, MPH
Epidemiologist
Office of Health Data and Research

Avery Polk
System Administrator
Office of Health Data and Research

ACKNOWLEDGMENTS

Rodolfo Vargas, MS
Research Biostatistician
Office of Health Data and Research

Meagan Robinson, DrPH(c), MPH
Epidemiologist
Office of Health Data and Research

Christianne Pinell-Jansen, MPH
Epidemiologist
Office of Health Data and Research

Ninglong Han, MS
Research Biostatistician
Office of Health Data and Research

Dick Johnson, MS
Systems Manager
Office of Vital Records

Ron McAnally
BRFSS Coordinator
Office of Vital Records

MSDH, Office of Health Data and Research
# Table of Contents

**Introduction** ................................................................................................................. 1

**Section I: Population Characteristics**
Count County Population Estimates ........................................................................... 2
Demographics of County ............................................................................................... 2
Median Household Income .......................................................................................... 3
Poverty Level ................................................................................................................ 3
Unemployment .............................................................................................................. 3
Education Level .......................................................................................................... 4
Uninsured ...................................................................................................................... 4

**Section II: Health Outcome Indicators**
Health Status .............................................................................................................. 5
Hospitalizations for Substance Use Disorders .......................................................... 5
Depressive Disorder ................................................................................................... 5
High Cholesterol ......................................................................................................... 6
High Blood Pressure ................................................................................................. 6
Obesity ....................................................................................................................... 6
Current Asthma ......................................................................................................... 6

**Section III: Select Chronic Conditions and Infectious Diseases**
Heart Attack .................................................................................................................. 7
Stroke ............................................................................................................................ 7
Type 2 Diabetes .......................................................................................................... 7
Age-adjusted Heart Disease Death Rate by Race ....................................................... 8
Age-adjusted Stroke Death Rate by Race .................................................................. 8
Cancer Age-Adjusted Incidence and Death Rate by Year ......................................... 9
Cancer Age-Adjusted Incidence and Death Rate by Gender and Race ....................... 9
HIV ............................................................................................................................ 10
Gonorrhea .................................................................................................................. 10
Chlamydia ................................................................................................................... 10

**Section IV: Maternal and Child Health**
Prenatal Care ............................................................................................................... 11
Low Birth Weight Deliveries ....................................................................................... 11
Preterm Births ............................................................................................................ 11
Infant Mortality .......................................................................................................... 12
Teen Pregnancy .......................................................................................................... 12

**Section V: Health Behaviors Indicators**
Current Cigarette Smoking .......................................................................................... 13
Alcohol Use ................................................................................................................. 13
Seat Belt Use ............................................................................................................... 13
Pneumonia Vaccination .............................................................................................. 14
Influenza Vaccination ............................................................................................... 14
Fruit Consumption ...................................................................................................... 15
Vegetable Consumption ............................................................................................ 15
Physical Inactivity ..................................................................................................... 15

**Data Sources** ......................................................................................................... 16
**References** ............................................................................................................. 17
Introduction

The mission of the Mississippi State Department of Health (MSDH) is to promote and protect the health of the citizens of Mississippi. The MSDH strives for excellence in government, cultural competence in the carrying out of our mission and to seek local solutions to local problems.

Mississippi has an estimated total population of 2,984,100 residents in 2017. The state is predominantly rural and divided into 82 counties, with 65 considered to be rural. The racial composition is approximately 59.3% white, 37.7% black or African American and 3.0% characterized as other.

Population health outcomes can be measured by premature death rates, or deaths of individuals before the age of 75, as these deaths may have occurred due to poor health outcomes. The state of Mississippi has the highest rate of premature death in the United States (U.S.) with 500.9 deaths per 100,000 (MS Vital Records, 2016). Many of these deaths are due to chronic conditions. The number one cause of death in Mississippi is heart disease with an adjusted mortality rate of 233.5 per 100,000 population in 2016. The second leading cause of death in Mississippi is cancer with an age-adjusted rate of 187.7 deaths per 100,000 population (2016). The most frequently diagnosed cancer is lung cancer. In 2016, the rate of obesity among adults in Mississippi was 37.3%. In Mississippi, congenital heart disease (CHD) affects approximately 1 in 64 live births (1.56%). This rate is nearly twice that of the U.S. which has a rate of CHD affecting approximately 1 in 125 live births. Mississippi has the highest rate of infant mortality in the U.S. with a total rate of 8.6 deaths per 1,000 live births (2016). There is a large racial disparity in infant mortality rates with the rate among whites at 6.8 and that for blacks at 11.4 per 1,000 live births (2016).

Historically, Mississippi has ranked poorly in a range of health indicators such as infant mortality, obesity, and teenage pregnancy. Statewide, behavioral risk factors including unhealthy eating habits and lack of physical activity have led to increased rates of chronic illnesses. As the poorest state in the nation, Mississippi faces greater challenges than many other states to prevent and combat illnesses. At the same time, there have been some significant public health successes: Mississippi is recognized as a national leader in childhood immunizations. Program development resources, such as the County Health Profiles, assist in statewide efforts to build a culture of health and improve Mississippi’s health status.

This report can be used as a resource to assist in the planning for ongoing and new health programs throughout the state of Mississippi, as well as to inform the general public of their county’s health status.

MSDH is administered at the level of public health regions. However, to be consistent with other surveillance reports, some of the indicators in the County Health Profiles are still presented by public health district.
### Population Characteristics

**Lawrence County Population Estimates by Year**

![Population Estimates Graph]

<table>
<thead>
<tr>
<th>Year</th>
<th>Total</th>
<th>&lt;18</th>
<th>18-44</th>
<th>45-64</th>
<th>65+</th>
</tr>
</thead>
<tbody>
<tr>
<td>2011</td>
<td>12687</td>
<td>3448</td>
<td>3708</td>
<td>3593</td>
<td>1938</td>
</tr>
<tr>
<td>2012</td>
<td>12551</td>
<td>3399</td>
<td>3675</td>
<td>3519</td>
<td>1958</td>
</tr>
<tr>
<td>2013</td>
<td>12514</td>
<td>3326</td>
<td>3694</td>
<td>3531</td>
<td>1963</td>
</tr>
<tr>
<td>2014</td>
<td>12502</td>
<td>3290</td>
<td>3646</td>
<td>3546</td>
<td>2020</td>
</tr>
<tr>
<td>2015</td>
<td>12622</td>
<td>3336</td>
<td>3708</td>
<td>3522</td>
<td>2056</td>
</tr>
</tbody>
</table>

### Population by Age, Gender and Race, 2010

<table>
<thead>
<tr>
<th>Age (years)</th>
<th>Gender</th>
<th>Race</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>&lt;18</td>
<td>Male</td>
<td>Black</td>
<td>Total</td>
</tr>
<tr>
<td></td>
<td>1,639</td>
<td>1,197</td>
<td>3,266</td>
</tr>
<tr>
<td></td>
<td>Female</td>
<td>White</td>
<td></td>
</tr>
<tr>
<td></td>
<td>1,627</td>
<td>2,001</td>
<td></td>
</tr>
<tr>
<td>18-44</td>
<td>Male</td>
<td>Black</td>
<td>Total</td>
</tr>
<tr>
<td></td>
<td>2,065</td>
<td>1,282</td>
<td>4,147</td>
</tr>
<tr>
<td></td>
<td>Female</td>
<td>White</td>
<td></td>
</tr>
<tr>
<td></td>
<td>2,082</td>
<td>2,664</td>
<td></td>
</tr>
<tr>
<td>45-64</td>
<td>Male</td>
<td>Black</td>
<td>Total</td>
</tr>
<tr>
<td></td>
<td>1,805</td>
<td>1,109</td>
<td>3,594</td>
</tr>
<tr>
<td></td>
<td>Female</td>
<td>White</td>
<td></td>
</tr>
<tr>
<td></td>
<td>1,789</td>
<td>2,437</td>
<td></td>
</tr>
<tr>
<td>65+</td>
<td>Male</td>
<td>Black</td>
<td>Total</td>
</tr>
<tr>
<td></td>
<td>838</td>
<td>386</td>
<td>1,922</td>
</tr>
<tr>
<td></td>
<td>Female</td>
<td>White</td>
<td></td>
</tr>
<tr>
<td></td>
<td>1,084</td>
<td>1,522</td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>Male</td>
<td>Black</td>
<td>Total</td>
</tr>
<tr>
<td></td>
<td>6,347</td>
<td>3,974</td>
<td>12,929</td>
</tr>
<tr>
<td></td>
<td>Female</td>
<td>White</td>
<td></td>
</tr>
<tr>
<td></td>
<td>6,582</td>
<td>8,624</td>
<td></td>
</tr>
</tbody>
</table>

### Percent of Population by Gender and Race, 2010

![Percent Bar Graph]

- Male: 49.1%
- Female: 50.9%
- Black: 30.7%
- White: 66.7%
- Other Races: 2.6%

**Source:** U.S. Census, 2010
Social and Economic Characteristics

Median Household Income, 2015

- County: $39,460
- State: $40,630

Percent of Population Below Poverty level, 2015

- County: 16.6%
- State: 22.1%

Percent of Population Unemployed, 2016

- County: 6.7%
- State: 5.9%

Source: U.S. Census Bureau, American Community Survey
Social and Economic Characteristics

Educational Attainment of the Population Aged 25 and Older
2009-2013

Source: U.S. Census Bureau, the 2009-2013 American Community Surveys

Percent of Population Uninsured, 2014

Source: U.S. Census Bureau, Small Area Health Insurance Estimates
Health Outcome Indicators

Percent of Adults (18 years or older) By Self Reported Health Status, 2011-2015

- Excellent: 38.3% (County), 44.1% (MS)
- Good: 31.8% (County), 32.3% (MS)
- Fair/Poor: 29.9% (County), 23.6% (MS)

Source: 1. Mississippi Behavioral Risk Factor Surveillance System
2. Mississippi Hospital Discharge Data System
Health Outcome Indicators

Percent of Adults (18 years or older) Reporting
High Cholesterol, 2011-2015

<table>
<thead>
<tr>
<th>County</th>
<th>State</th>
</tr>
</thead>
<tbody>
<tr>
<td>39.8</td>
<td>40.5</td>
</tr>
</tbody>
</table>

Percent of Adults (18 years or older) Reporting
High Blood Pressure, 2011-2015

<table>
<thead>
<tr>
<th>County</th>
<th>State</th>
</tr>
</thead>
<tbody>
<tr>
<td>46.1</td>
<td>41.3</td>
</tr>
</tbody>
</table>

Percent of Adults (18 years or older) Reporting
Obesity, 2011-2015

<table>
<thead>
<tr>
<th>County</th>
<th>State</th>
</tr>
</thead>
<tbody>
<tr>
<td>37.5</td>
<td>35.1</td>
</tr>
</tbody>
</table>

Percent of Adults (18 years or older) Reporting
Current Asthma, 2011-2015

<table>
<thead>
<tr>
<th>County</th>
<th>State</th>
</tr>
</thead>
<tbody>
<tr>
<td>7.7</td>
<td>7.9</td>
</tr>
</tbody>
</table>

Source: Mississippi Behavioral Risk Factor Surveillance System
Select Chronic Conditions

Percent of Adults (18 years or older) Reporting Heart Attack, 2011-2015

Percent of Adults (18 years or older) Reporting Stroke, 2011-2015

Percent of Adults (18 years or older) Reporting Type 2 Diabetes, 2011-2015

Source: Mississippi Behavioral Risk Factor Surveillance System
**Select Chronic Conditions**

**Age-adjusted Heart Disease Death Rate by Race**

2010-2014

![Bar chart showing age-adjusted heart disease death rates by race and overall.]

- White: 306.5
- Black: 282.6
- Overall: 301.4

**Age-adjusted Stroke Death Rate by Race**

2010-2014

![Bar chart showing age-adjusted stroke death rates by race and overall.]

- White: 61.4
- Black: 94.8
- Overall: 71.1

*Insufficient data*

**Source:** Mississippi Vital Statistics
Age-Adjusted Cancer Incidence and Death Rate by Gender and Race, 2010-2014

Source: Mississippi Cancer Registry
Select Infectious Diseases

HIV, 2010-2014

Rate per 100,000 population

<table>
<thead>
<tr>
<th></th>
<th>County</th>
<th>State</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rate</td>
<td>7.9</td>
<td>16.7</td>
</tr>
</tbody>
</table>

Gonorrhea, 2010-2014

Rate per 100,000 population

<table>
<thead>
<tr>
<th></th>
<th>County</th>
<th>State</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rate</td>
<td>88.6</td>
<td>198.2</td>
</tr>
</tbody>
</table>

Chlamydia, 2010-2014

Rate per 100,000 population

<table>
<thead>
<tr>
<th></th>
<th>County</th>
<th>State</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rate</td>
<td>621.5</td>
<td>686.7</td>
</tr>
</tbody>
</table>

Source: Mississippi Vital Statistics
Maternal and Child Health

Percent of Infants Born to Pregnant Women Receiving Prenatal Care Beginning in the First Trimester, Lawrence County & State, 2010-2014

- **County:** 72.5%
- **State:** 80.4%

Percent of Low Birth Weight Deliveries, Lawrence County & State, 2010-2014

- **County:** 11.9%
- **State:** 11.7%

Percent of Preterm Births, Lawrence County & State, 2010-2014

- **County:** 15.3%
- **State:** 15.3%

*Source: Mississippi Vital Statistics*
Infant Mortality Rate, District VII & State, 2011-2015

Teen Pregnancy, Female aged 15 to 19, Lawrence County & State, 2010-2014

1. Infant mortality rate at county level was not reliable, so the district level data was used as a close measure for this county.

Source: Mississippi Vital Records
Health Behavior Indicators

Percent of Mississippi adults (18 years or older) reporting being current smokers, Lawrence County & State, 2011-2015

Percent of Mississippi adults (18 years or older) reporting alcohol use in past 30 days, Lawrence County & State, 2011-2015

Percent of Mississippi adults (18 years or older) reporting always wearing seat belts, Lawrence County & State, 2011-2015

Source: Mississippi Behavioral Risk Factor Surveillance System
Health Behaviors Indicators

Percent of adults (18 years or older) reporting received a pneumonia vaccination, Lawrence County & State, 2011-2015

- County: 68.9%
- State: 66.8%

Percent of adults (18 years or older) reporting received an influenza vaccination, Lawrence County & State, 2011-2015

- County: 59.3%
- State: 64.0%

Source: Mississippi Behavioral Risk Factor Surveillance System
Health Behaviors Indicators

Percent of adults (18 years or older) reporting consuming at least five or more fruits daily, Lawrence County & State, 2011-2015

- County: 54.8%
- State: 49.5%

Percent of adults (18 years or older) reporting consuming at least five or more vegetables daily, Lawrence County & State, 2011-2015

- County: 72.1%
- State: 69.1%

Percent of adults (18 years or older) reporting doing physical activity or exercise during the past 30 days, Lawrence County & State, 2011-2015

- County: 31.9%
- State: 34.8%

Source: Mississippi Behavioral Risk Factor Surveillance System
Data Sources

**Behavioral Risk Factor Surveillance System (BRFSS)**
The BRFSS is an ongoing, state-based, random digit-dialed telephone survey of non-institutionalized U.S. adults aged 18 years or older. The survey collects information on health risk behaviors, preventive health practices, and health care access primarily related to chronic disease and injury. The BRFSS operates in 50 states, the District of Columbia, and three U.S. territories (Puerto Rico, U.S. Virgin Islands, and Guam). Self-reported data may be subject to errors for several reasons: an individual may have difficulty remembering events that occurred a long time ago or the frequency of certain behaviors; some respondents may over-report socially desirable behaviors or under-report behaviors they perceive to be less acceptable (e.g., social desirability or recall bias); respondents may also report certain risks, behaviors and perceptions differently due to their respective cultural and linguistic backgrounds (e.g., non-response) and data might be subject to systematic error resulting from non-coverage (e.g., lower telephone coverage among populations of low socioeconomic status). Additional information on Mississippi BRFSS methods is available at: [http://msdh.ms.gov/brfss/](http://msdh.ms.gov/brfss/).

**Mississippi Vital Statistics**
The Mississippi STatistically Automated Health Resource System (MSTAHRS) allows for the retrieval of vital records and other health related data on Mississippi residents. Deaths are coded using the Tenth Revision of the International Classification of Diseases (ICD-10). Death rates are age-adjusted to the projected year 2000 U.S. standard population and expressed as per 100,000 population. Available at: [http://mstahrs.msdh.ms.gov/](http://mstahrs.msdh.ms.gov/)

**QuickFacts Data**

**2010 Census Data**
The Summary File 1 data tables provide the most detailed information available so far from the 2010 Census about a community's entire population, including cross-tabulations of age, sex, households, families, relationship to householder, housing units, detailed race and Hispanic or Latino origin groups, and group quarters. Available at: [https://www.census.gov/2010census/](https://www.census.gov/2010census/)
References


