



# ASSESSMENT OF CHILDHOOD AND ADOLESCENT OBESITY IN ARKANSAS

2023–2024 School Year  
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## Executive Summary

In the United States, nearly one-fifth of children and adolescents are classified as obese.<sup>1</sup> This population is more likely to be at risk for a variety of health problems, including cardiovascular disease, type 2 diabetes, and bone and joint problems, among others. Children with obesity experience higher healthcare utilization. Nationally, the total increased medical costs for children classified as obese are estimated to exceed \$5 billion annually, representing more than 1% of the nation's healthcare spending.<sup>2</sup> During the COVID-19 pandemic, the rate of body mass index (BMI) increase among children and adolescents doubled, raising concerns for elevated obesity rates both nationally and in Arkansas.<sup>3</sup>

Passed by the Arkansas 84<sup>th</sup> General Assembly, Act 1220 of 2003 spearheaded initiatives to address obesity among school-age children in Arkansas.<sup>4</sup> Under this legislation, schools are required to collect students' height and weight measurements and include a body mass index (BMI) percentile by age for each student. This requirement begins in kindergarten and continues for even-numbered grades. The act also required improved access to healthier foods and beverages in schools, the creation of local committees to promote physical activity and nutrition, in addition to confidential reporting of each student's BMI measurement to his or her parents or guardians every other year.

While the statewide collection of BMI data helps inform parents about their child's weight status, data and information from the program may assist in developing new policies and improving health outcomes for all Arkansans. A previous study that used data from the Arkansas BMI screening program concluded that the program has greatly improved the ability to identify the children at greatest risk of future obesity, and the ability to predict which children are at an elevated risk of obesity may prove helpful in developing more-effective policies and improved health outcomes.<sup>5</sup> The data is also used by schools, districts, and state agencies when applying for grants.

New this year, the report includes data on severe obesity. The inclusion of severe obesity aligns with the Centers for Disease Control and Prevention's development of extended BMI growth charts, which address the limitations of earlier charts that were not designed to accurately monitor children with very high BMIs.<sup>6</sup> While this report examines severe obesity in a dedicated section, future reports will incorporate this classification into the overall assessment.

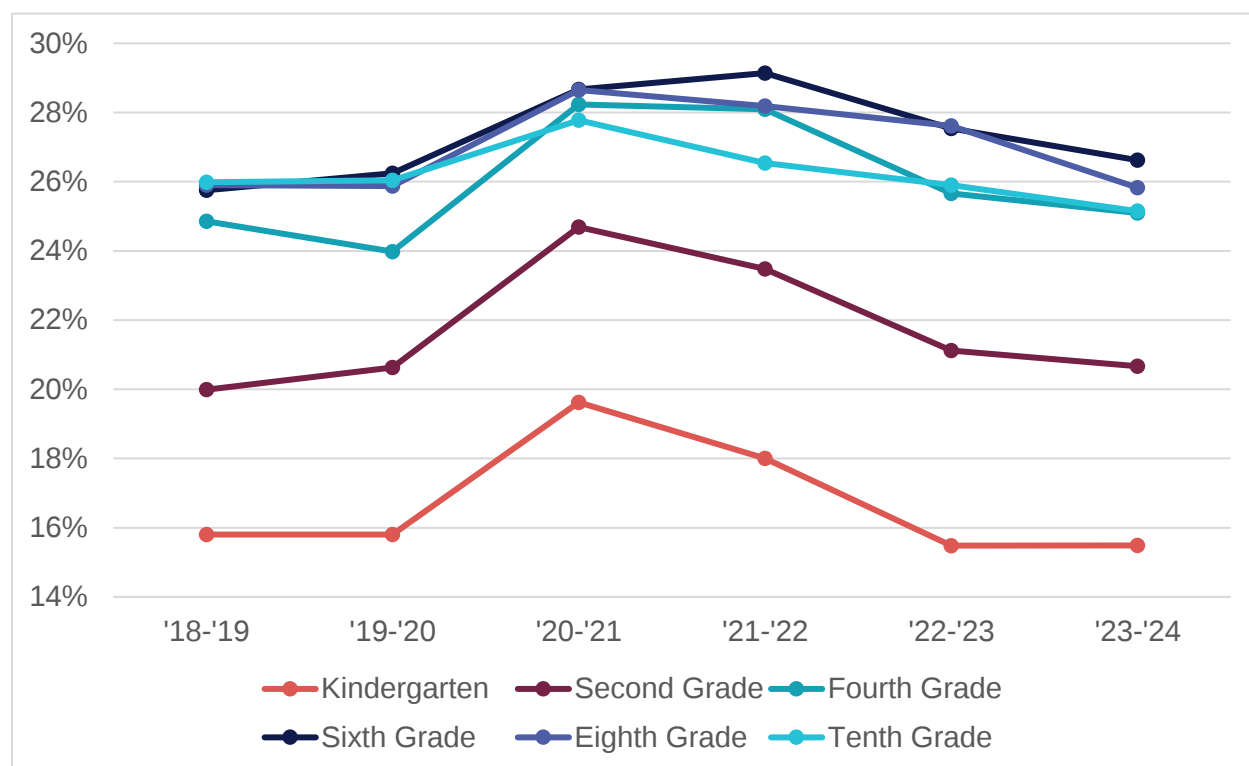
Results from the 2023-2024 school year show that nearly one in four (23.1%) public school-age children had a BMI measurement classified as obese, down from 23.8% in the previous school year (2022-2023). Childhood obesity levels in Arkansas increased from 23.0% in the 2019-2020 school year to peaks of 26.1% and 25.5% in the subsequent two school years before slightly declining. This trend aligns with broader studies indicating pandemic-induced weight gain,<sup>7</sup> especially among younger children.<sup>8</sup>

Figure 1 displays the percentage of children with a BMI measurement in the obese category for the past six measurement periods. From the 2019-2020 to 2020-2021 school year, each grade saw a statistically significant increase in the percentages of students with a BMI in the obese category. For the 2023-2024 school year, while all grades continued showing a decline



in obesity rates from the peaks during the COVID-19 public health emergency, obesity rates for students in second, fourth, and sixth grades remain higher than pre-COVID levels.<sup>a</sup> Obesity levels among students in kindergarten and eighth and tenth grades, however, have returned to or are lower than pre-COVID levels.

**FIGURE 1. PERCENTAGE OF ARKANSAS PUBLIC SCHOOL STUDENTS WITH A BMI CLASSIFICATION OF OBESE, BY GRADE, SCHOOL YEARS 2018-2019 THROUGH 2023-2024**



<sup>a</sup> The collection of BMI data during the 2020-2021 school year was impacted by the COVID-19 pandemic, with only 55% of eligible students having valid BMI measurements recorded, compared to 64% in the previous year. By the 2021-2022 school year, valid BMI measurements increased to 76% of eligible students. Statistical analyses conducted by ACHI confirmed that the 2021-2022 data were comparable to previous years. For further details, refer to the 2022-2023 state report, which can be found at <https://achi.net/body-mass-index-program>.

## Introduction

Act 1220 of 2003 established the first state-level legislation in the country to address the alarming prevalence of childhood obesity. The law is aimed at making changes within schools and school districts to encourage healthier lifestyles for students, school staff, and their families.<sup>9</sup>

Act 201 of 2007<sup>10</sup> amended the original BMI screening requirements of Act 1220 by limiting assessments to students in kindergarten and even-numbered grades 2 through 10, exempting 11th and 12th graders, and offering parents the option to opt out of the screening for their children.

About half of U.S. states require or recommend BMI assessments in schools, either to provide information to parents or to support surveillance and screening initiatives at the district and state levels.<sup>11</sup>

This report focuses solely on the BMI assessments for Arkansas public school students, as mandated by Act 1220 and amended by Act 201.



## BMI Data Collection

The aggregate child BMI assessments presented in this report are an indication of the extent of the problem of childhood and adolescent obesity in Arkansas schools, school districts, and the state.

### PROCESS

To complete the BMI assessments, trained school personnel or student-health professionals obtain one weight and two height measurements for each student. The measurement process is conducted privately with the student facing away from the scale. Data are entered into a secure, web-based computer system that is used to generate individual, confidential child health reports for parents or guardians. All public-school students in grades K, 2, 4, 6, 8, and 10 are measured, with some exceptions (see section titled “Reasons Students’ BMI Could Not Be Assessed” for more information).

### DEFINITION OF BMI

BMI is a constructed value that can be used to assign individuals into underweight, normal or healthy weight, overweight, or obese weight status categories. Using a student’s weight and height measurements, BMI is calculated using the following formula:

$$\text{BMI} = \frac{\text{Weight in pounds}}{(\text{Height in inches})^2} \times 703$$

Boys and girls grow and develop at different rates. Based on the Centers for Disease Control and Prevention (CDC) guidelines, BMI percentiles for students are calculated individually for each boy and girl based on their gender, age, height, and weight.<sup>12</sup>

Following standard classifications based on expert committee recommendations and used by healthcare professionals, BMI percentiles are used to categorize children according to whether they are underweight, healthy weight, overweight, or obese. For children of similar ages and genders, a higher BMI indicates a greater risk for having or developing obesity-related health problems. These BMI-for-age weight status classifications are as follows:

**Obese:** BMI-for-age-and-gender greater than or equal to 95<sup>th</sup> percentile

**Overweight:** BMI-for-age-and-gender greater than or equal to the 85<sup>th</sup> and less than the 95<sup>th</sup> percentile

**Healthy Weight:** BMI-for-age-and-gender greater than or equal to the 5<sup>th</sup> and less than the 85<sup>th</sup> percentile

**Underweight:** BMI-for-age-and-gender less than the 5<sup>th</sup> percentile

Note: While this report includes a new section discussing severe obesity as a distinct category — defined as BMI at or above 120% of the 95th percentile — the primary analyses in this report group students classified as obese and severely obese together in the “obese” category.



A BMI assessment is a screening tool. An individual child's BMI should not be considered a final indicator of whether the child has a weight problem that requires attention. Further evaluation by a health professional is the recommended next step for a child who is classified as overweight or obese.

Aggregate child BMI assessments are, however, an helpful indication of the extent of child and adolescent obesity in schools, school districts, and the state. The data presented in this report serve as a warning about the potential future health problems that Arkansans may face as these children become adults.

## Overview of BMI Reports

### CHILD HEALTH REPORTS

Confidential child health reports are made available to parents or guardians regardless of the student's BMI classification. Child health reports are developed in the eSchoolPlus Cognos reporting system. It includes vision, hearing, scoliosis, and BMI screening results and provides simple suggestions to seek guidance from a doctor if necessary.



If the student was assessed, the report includes the height, weight, and BMI value. The report includes an explanation of what is considered a normal BMI measurement range, and what to do if a child's BMI is above that range.

### SCHOOL- AND DISTRICT-LEVEL REPORTING

Summary BMI profile information for individual schools and districts is published in an online dashboard, starting with data from the 2019-2020 school year.<sup>b</sup> School district reports combine information from all available school data in that district. The dashboard presents BMI classifications for schools separately for male and female students by grade and collectively for all students. Summary statistics for each school and district provide a community assessment of the environmental impact of obesity on public school students. For reporting prior to the 2019-2020 school year, summary statistics appear in the appendices of the reports. Previous reports, which are available on ACHI's website, describe the distribution of BMI status among students in each school or district.

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<sup>b</sup> <https://achi.net/body-mass-index-program>

# Student and School Participation in the BMI Data Collection

In the 2023-2024 school year, 98.8% (1,038 out of 1,051) of Arkansas public schools, in 258 of 259 school districts, contributed measurements in the statewide BMI assessment. Participation rates were similar to or slightly higher than rates in previous years. Fluctuations in the total number of public schools each year are due to school closings, openings, and consolidations.

Only students in even-numbered grades were assessed and included in this report. The totals include BMI assessments that were submitted by June 15, 2024, for 90.2% (197,249 out of 218,655) of public-school students enrolled in grades K, 2, 4, 6, 8, and 10. Among students for whom data was reported, 86.0% (169,671 students) had valid data to allow BMI calculation (see section “Reasons Students’ BMI Could Not Be Assessed”).

Student participation at schools that contributed varied from 0.43% to 100% of the students enrolled in the required grades. High participation allows for confidence in the results reported by schools and school districts. For those schools or school districts with low participation, under-reporting of certain categories is possible.

## Reasons Students’ BMI Could Not Be Assessed

To complete the BMI assessments, school staff collected each student’s height and weight measurements. Fourteen percent of students with records submitted (27,478 out of 197,249) either had data that was classified as “unable to assess” (see Table 1 for a breakdown of reasons) or did not have valid data for height, weight, or both.

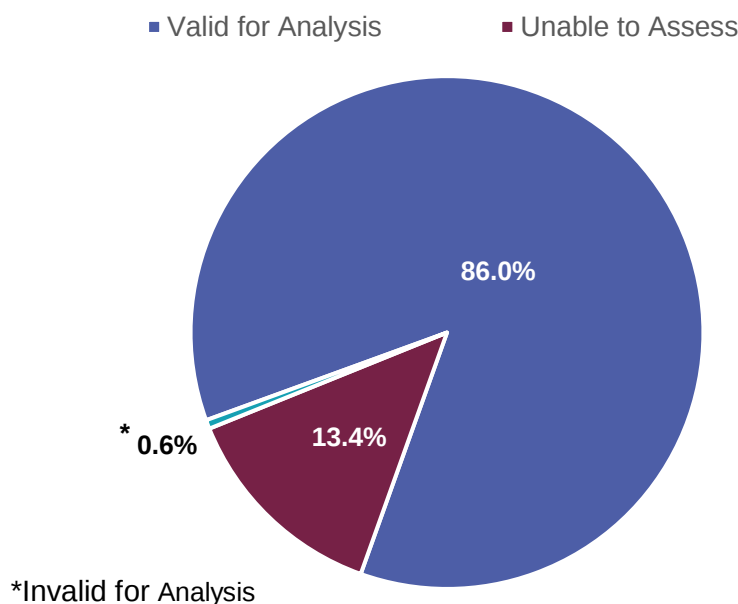
TABLE 1. BREAKDOWN OF KNOWN REASONS FOR BEING ‘UNABLE TO ASSESS’ BMI

|                         |        |       |
|-------------------------|--------|-------|
| Absent                  | 12,305 | 46.5% |
| Parent Refused          | 9,558  | 36.1% |
| Student Refused         | 2,521  | 9.5%  |
| Other                   | 1,737  | 6.6%  |
| Physical Disability     | 285    | 1.1%  |
| Weight Exceeded Scale   | 34     | 0.1%  |
| Inaccurate Measurements | 20     | 0.1%  |
| Pregnant                | 18     | 0.1%  |



A little over half of a percent (1,100 students; see Figure 2) of data submitted was invalid for analysis due to incomplete or incorrect data provided, measurement protocols not being followed, or inaccuracies in the equipment used to complete the assessment.

**FIGURE 2. SCHOOL YEAR 2023-2024 STUDENT BMI ASSESSMENT**



## Statewide Results of the Arkansas BMI Assessment

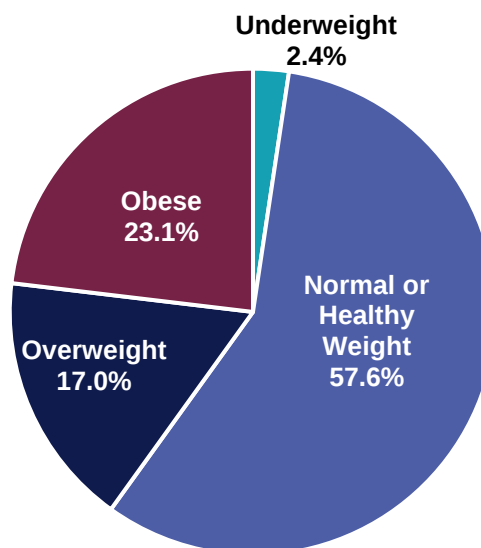
Total public-school enrollment in grades K, 2, 4, 6, 8, and 10 for the 2023-2024 school year, reported by the Arkansas Department of Education, was 218,655 students in 1,051 schools, within 259 school districts. The results presented in this section are based on data from 197,249 individual students (enrolled in grades K, 2, 4, 6, 8, or 10) with valid BMI assessments reported prior to June 15, 2024, by 1,038 schools in 258 school districts. BMI classifications are reported by gender, grade, and race/ethnicity. This section includes statewide percentages of underweight, healthy weight, overweight, and obese students for selected demographic subgroups. Percentages for these four classifications are also reported for the majority of school districts (see online dashboard<sup>c</sup>) and counties in the state (see appendix).

<sup>c</sup> <https://achi.net/body-mass-index-program>

## BMI CLASSIFICATIONS FOR ALL STUDENTS

Figure 3 illustrates the BMI classification distribution of Arkansas students during the 2023-2024 school year. In this year, 40.1% of Arkansas students had BMI measurements that were classified as overweight or obese.

**FIGURE 3. SCHOOL YEAR 2023-2024 STUDENT BMI CLASSIFICATION FOR ARKANSAS PUBLIC SCHOOL STUDENTS**

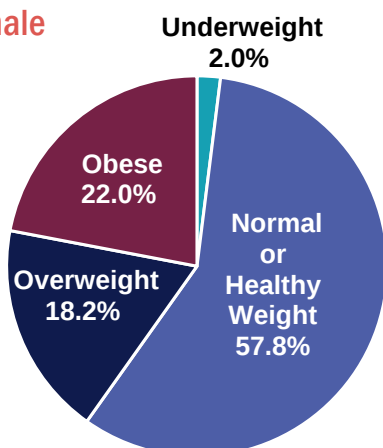


## BMI CLASSIFICATIONS BY GENDER

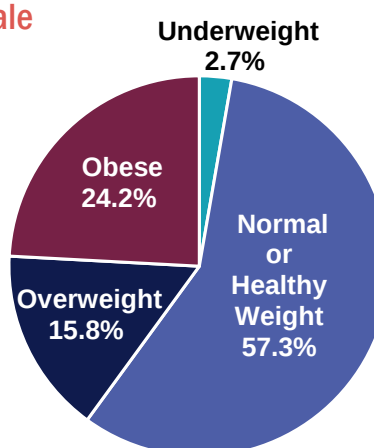
Figure 4 provides BMI classifications by gender for the 2023-2024 school year. More boys (24.2%) than girls (22.0%) were classified as obese. A higher percentage of girls (18.2%) had BMI measurements classified as overweight compared to boys (15.8%). The percentage of BMI measurements classified as healthy weight for girls (57.8%) was higher than for boys (57.3%).

**FIGURE 4. SCHOOL YEAR 2023-2024 STUDENT BMI CLASSIFICATION BY GENDER**

### Female



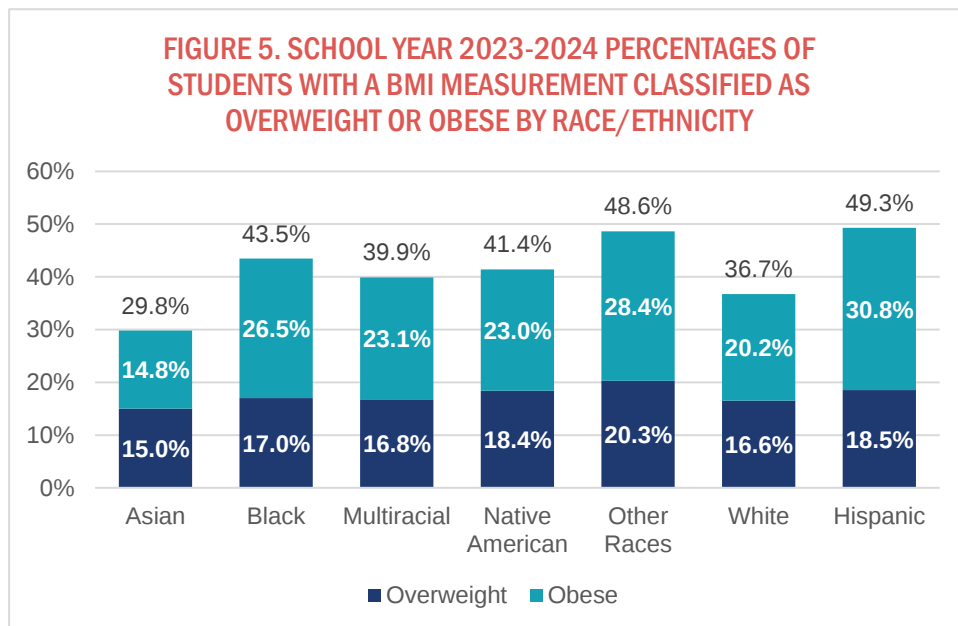
### Male



## BMI CLASSIFICATIONS BY RACE/ETHNICITY

Figure 5 shows the percentages of students with a BMI measurement classified as overweight or obese, grouped by race and ethnicity. As in prior years, Hispanic students had the highest percentage of BMI measurements classified as either overweight or obese at 49.3% combined. Among

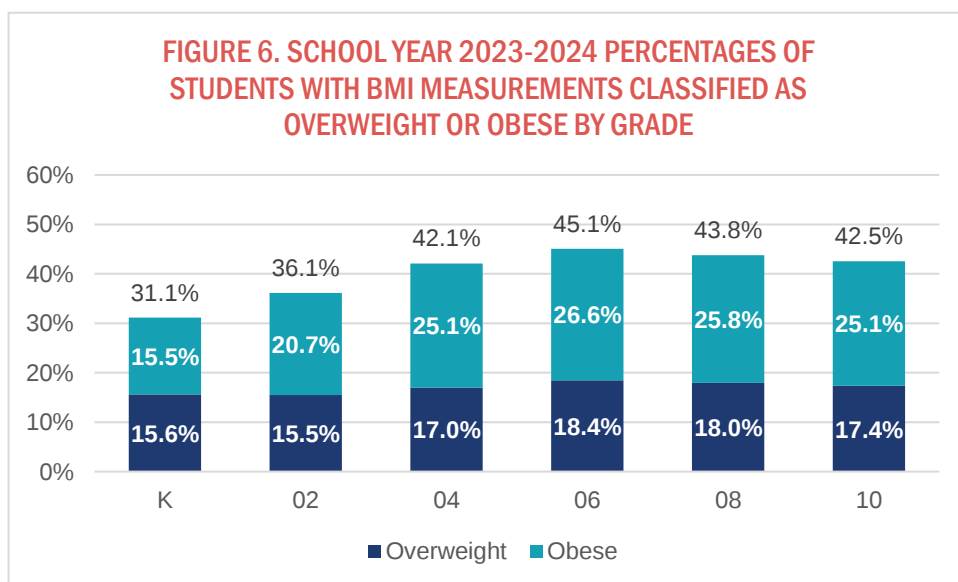
students grouped by Other Races, 48.6% of BMI measurements were classified as overweight or obese, followed by 43.5% of Black students, 41.4% of Native American students, 39.9% of Multiracial students, 36.7% of White students, and 29.8% of Asian students.



## BMI CLASSIFICATIONS BY GRADE

Figure 6 illustrates the percentage of students whose BMI measurement was classified as overweight or obese by grade. Findings indicate that 31.1% of kindergarten students entered the school system either overweight or obese. The percentage of students' BMI

measurements classified as overweight or obese rose with each increasing grade level until grade 6, where it slowly declined to 42.5% in grade 10.

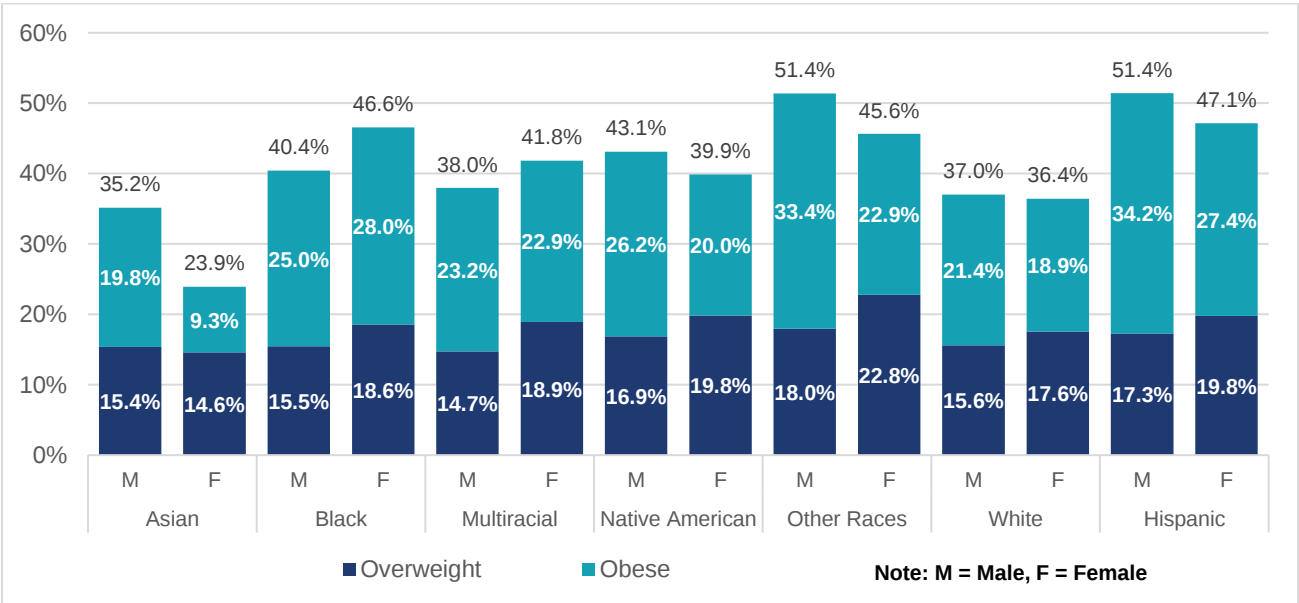


BMI CLASSIFICATIONS BY RACE/ETHNICITY AND GENDER

When evaluating results by race/ethnicity and gender, Hispanic boys and boys grouped by Other Races had the highest percentages of combined BMI measurements classified as overweight or obese (both at 51.4%, see Figure 7). In most other race/ethnicity groups, boys had a higher total percentage of overweight or obese BMI classifications when compared with girls, except for Black and multiracial girls. Among female students, the highest percentage of students with measurements classified as overweight or obese was found in Hispanic students at 47.1%, followed by Black students at 46.6%.

The greatest difference between male students and female students within a race/ethnicity group was among Asian students, where 23.9% of girls were in the two highest BMI classifications compared with 35.2% of boys.

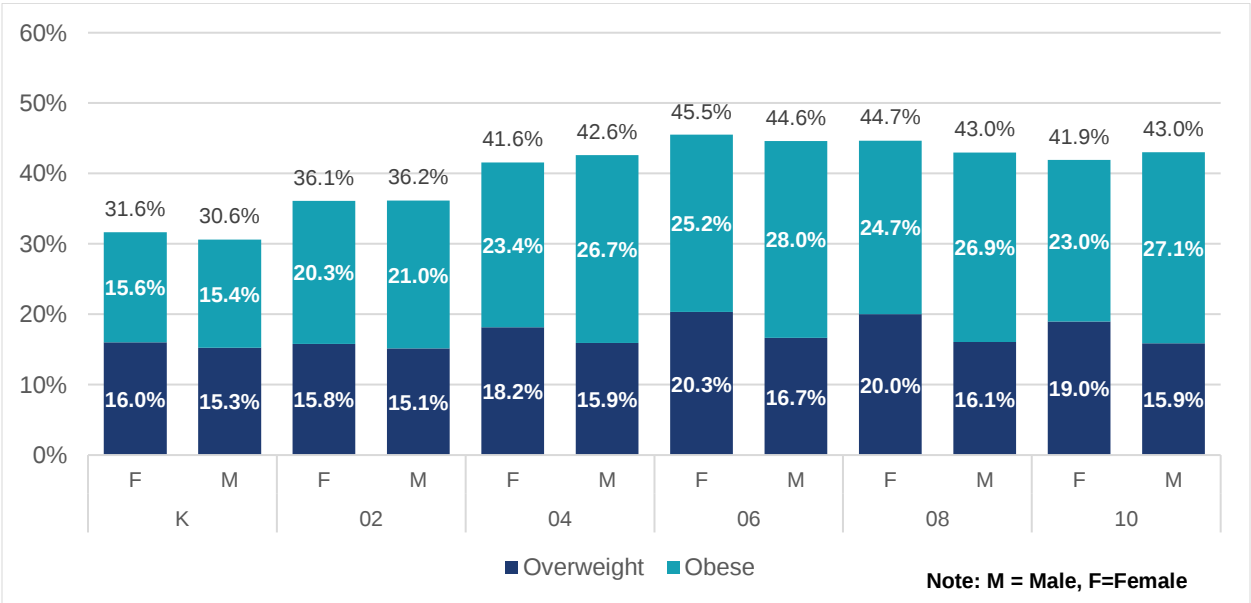
FIGURE 7. SCHOOL YEAR 2023-2024 PERCENTAGES OF STUDENT BMI MEASUREMENTS CLASSIFIED AS OVERWEIGHT OR OBESE BY RACE/ETHNICITY AND GENDER



BMI CLASSIFICATIONS BY GRADE AND GENDER

As illustrated in Figure 8, data show that a slightly higher percentage of girls (31.6%) than boys (30.6%) enter school with BMI measurements classified as either overweight or obese in kindergarten. In the second grade, the percentage of male students (36.2%) and female students (36.1%) that were classified in the overweight or obese category was nearly the same. In the fourth grade, the difference between boys and girls was slightly more pronounced, with 42.6% of male students and 41.6% of female students in the two highest BMI categories. In the sixth grade, male students' BMI measurements were slightly lower than those for female students (44.6% and 45.5%, respectively) for the total overweight or obese categories. In the eighth grade, the difference between genders was the largest of all the grades at 44.7% for girls and 43.0% for boys. In the tenth grade, the difference between boys and girls in the combined overweight or obese BMI categories was similar to that of most other grade levels (43.0% and 41.9%, respectively).

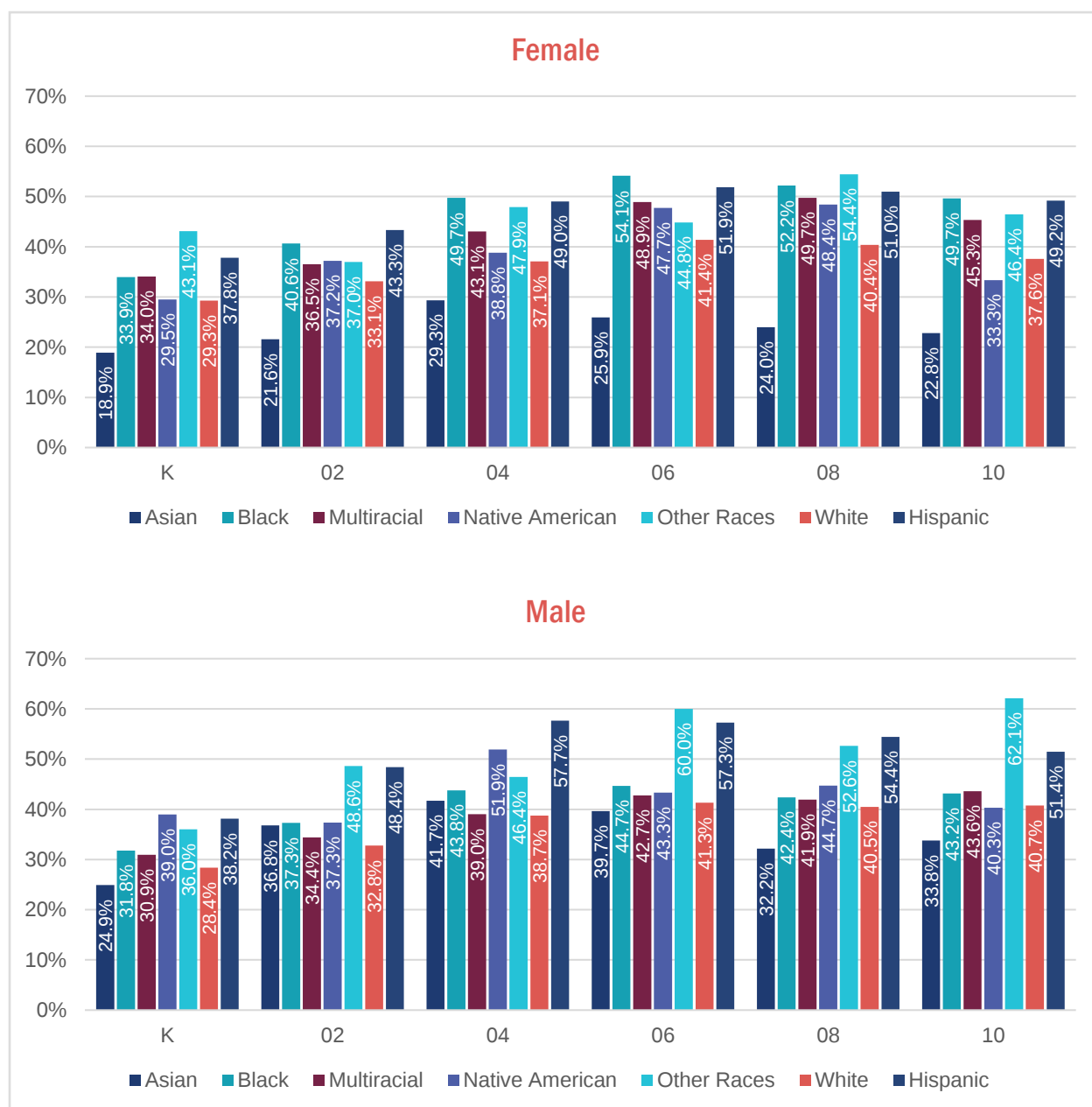
FIGURE 8. SCHOOL YEAR 2023-2024 PERCENTAGES OF STUDENTS WITH BMI MEASUREMENTS CLASSIFIED AS OVERWEIGHT OR OBESE BY GRADE AND GENDER



## BMI CLASSIFICATIONS BY GENDER, GRADE, AND RACE/ETHNICITY GROUP

Analysis of the BMI data shows that some groups of students face a heightened risk for childhood obesity. The percentages of Black and Hispanic students with BMI measurements in the overweight or obese categories was higher across all measured grades compared to their White peers. The highest percentage of BMI measurements classified as overweight or obese was found among male students grouped as Other Race, especially in the tenth grade, where 62.1% were classified as either overweight or obese (see Figure 9).

**FIGURE 9. SCHOOL YEAR 2023-2024 PERCENTAGES OF STUDENTS WITH BMI MEASUREMENTS CLASSIFIED AS OVERWEIGHT OR OBESE BY GENDER, RACE/ETHNICITY, AND GRADE**



## TRENDS IN STUDENT BMI

Data from the previous five years of BMI screenings (see Figure 10) reveal that the distribution of students in each of the four categories (underweight, healthy weight, overweight, and obese) remained steady until the 2020-2021 school year, when the proportion of students with BMI measurements in the overweight or obese categories increased significantly. Compared to the previous measurement year, in the most recent year, the proportion of measurements in the obese level decreased slightly, while those in the overweight level increased slightly. These levels were slightly higher than or equal to their pre-pandemic percentages, respectively.

**FIGURE 10. TRENDS IN BMI CLASSIFICATIONS FOR ARKANSAS PUBLIC SCHOOL STUDENTS**

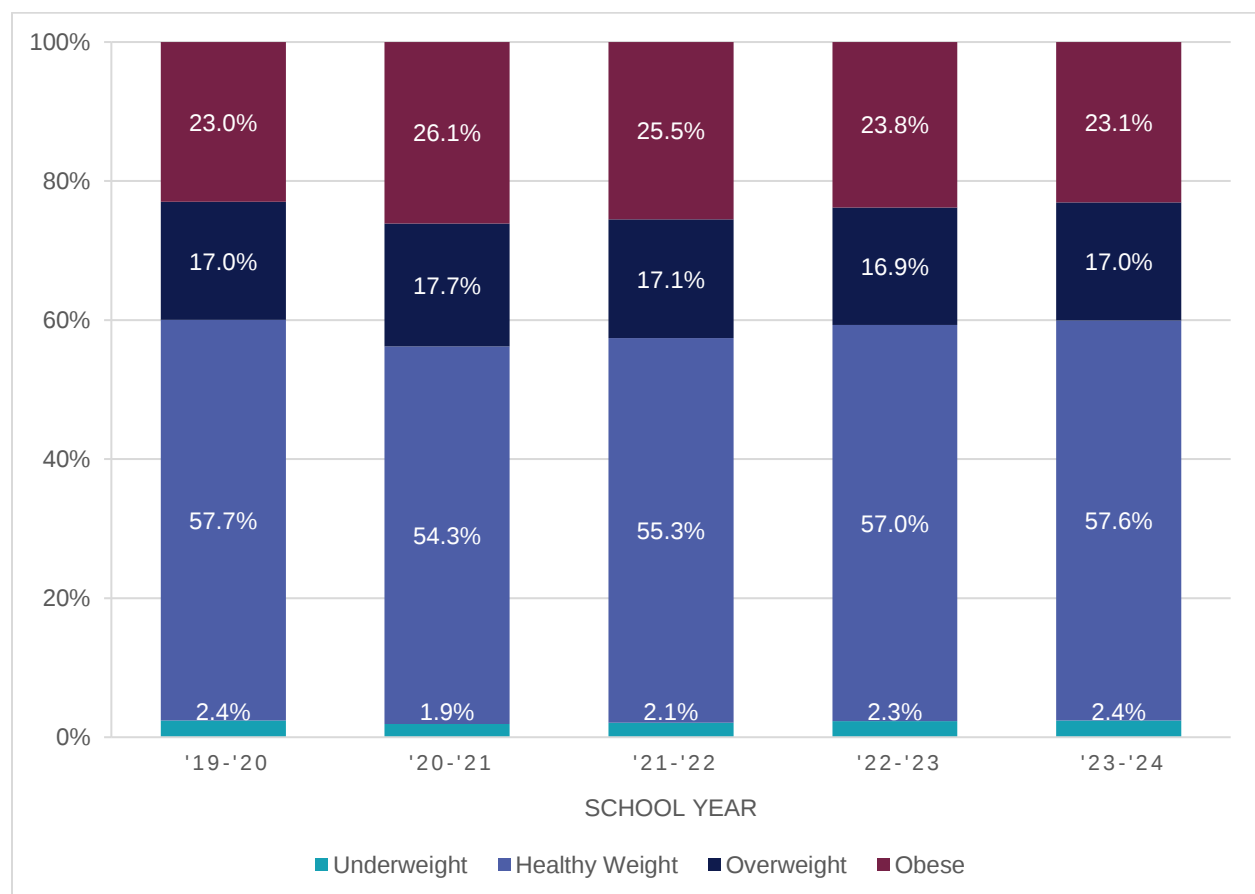


Figure 11 illustrates the trends of students with BMI measurements classified as overweight or obese at kindergarten and at grade 10 over the 21 years of data collected. There was modest improvement in the percentages of students classified as overweight or obese entering kindergarten from the 2003-2004 (32.6%) school year to the 2019-2020 school year (31.2%). However, in the 2020-2021 school year, the percentage increased sharply to an 18-year high of 36.1%. The 2021-2022 and 2022-2023 school years saw steady decreases to 31.0% from that high mark, with the 2023-2024 school year seeing just a slight increase



to 31.1%. Similarly, the percentage of students classified as either overweight or obese in grade 10 saw an 18-year high of 44.8% in the 2020-2021 school year, up six percentage points from the initial grade 10 assessment of 38.6% in the 2003-2004 school year, but it has reduced slightly to 42.5% in the 2023-2024 school year, which is the lowest it has been since the 2014-2015 school year. The online interactive dashboard shows trends from the 2019-2020 school year forward.

**FIGURE 11. PERCENTAGE OF STUDENTS WITH BMI MEASUREMENTS CLASSIFIED AS OVERWEIGHT OR OBESE BY GRADE, SCHOOL YEARS 2003-2004 THROUGH 2023-2024**

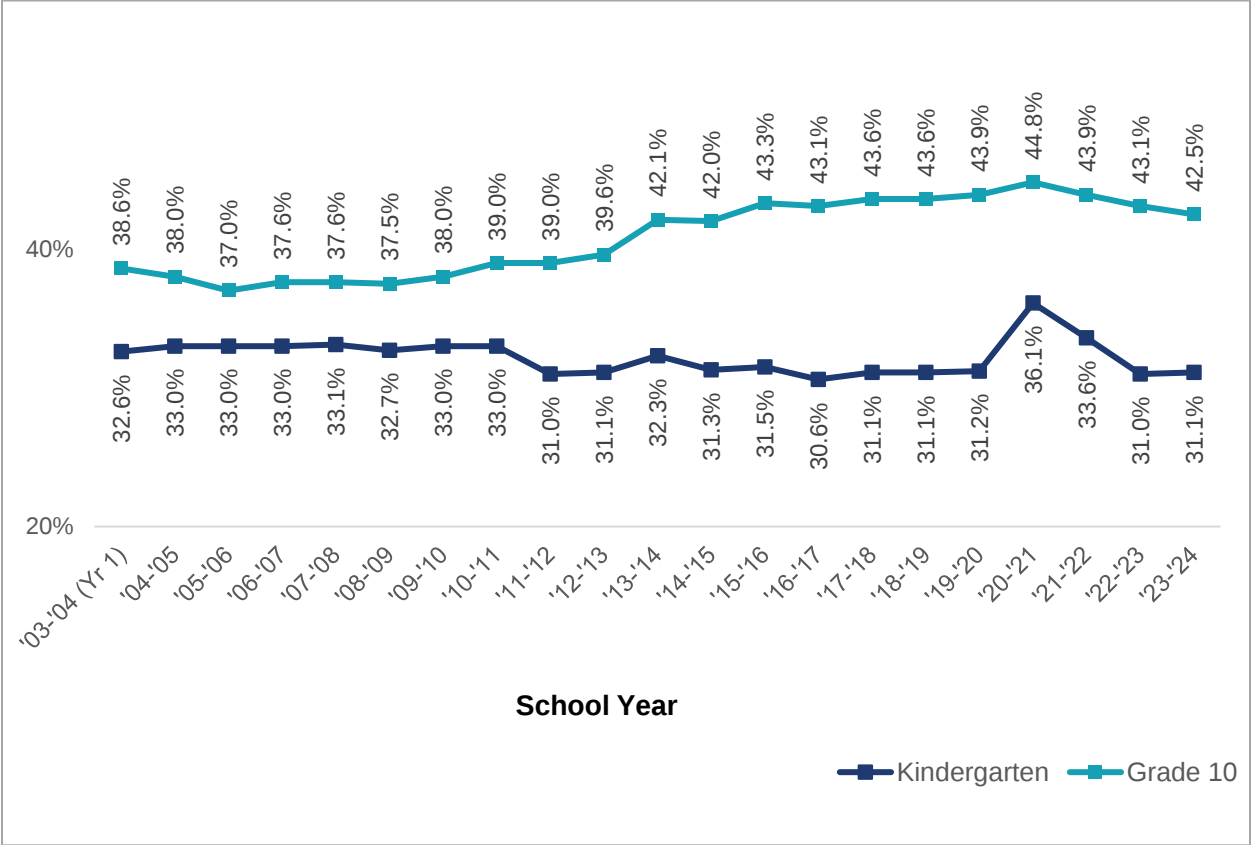
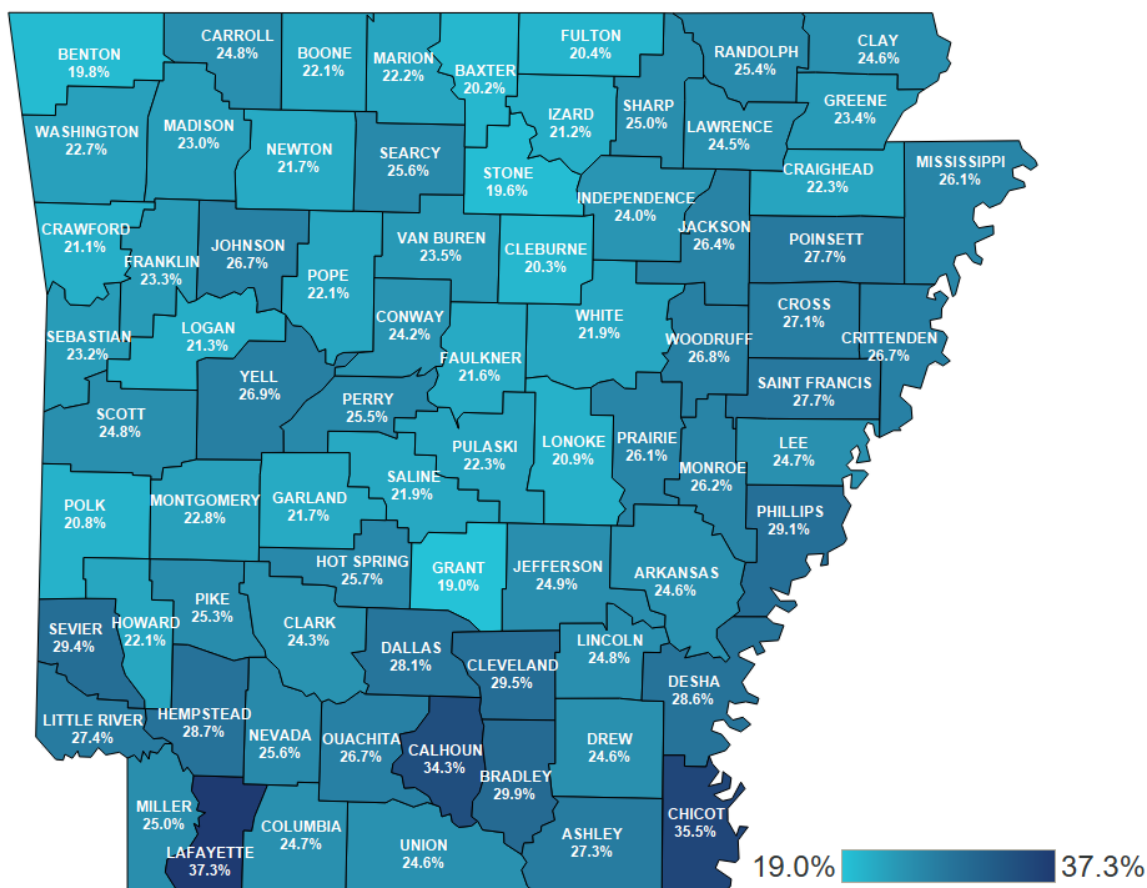


Figure 12 displays the percentage of students with a BMI classification of obese, among schools located in each county. Calculations are based on valid measurements among students in even grades: kindergarten through grade 10. Grant County had the lowest percentage of valid measurements classified as obese, at 19.0%, while Lafayette County had the highest percentage at 37.3%. While all county-level data meets minimum thresholds for inclusion based on individual counts of students, some rural counties experienced relatively low numbers of eligible students having valid measurements in the most recent school year.



**FIGURE 12. PERCENTAGE OF STUDENTS CLASSIFIED AS OBESE, BY COUNTY LOCATION OF SCHOOL, FOR SCHOOL YEAR 2023-2024**



## A LOOK AT SEVERE OBESITY

Severe obesity is a BMI sub-category that is used to group individuals whose BMI is at the high end of the obesity category. For adults 20 years old and older, the CDC defines obesity — regardless of sex — as a BMI of 30 or greater and severe obesity as a BMI of 40 or greater.<sup>13</sup> Among U.S. adults, the prevalence of severe obesity has increased in recent years to nearly 10%. As with obesity, adults with severe obesity face higher medical costs per person than adults with healthy weight. In 2019, for example, the excess medical cost associated with an adult with severe obesity was nearly twice that of an adult with obesity.<sup>14</sup>

In 2022, the CDC introduced the Extended BMI-for-Age Growth Charts to address limitations in the previous growth charts, which were based on data from 1963 to 1980, a period when obesity prevalence was lower and data on severe obesity in children were limited.<sup>15</sup> To improve clinical utility, the CDC expanded the growth charts using more recent data and methods. For children and teens aged 2 through 19 years, the CDC defines severe obesity as a BMI that is 120% of the 95<sup>th</sup> percentile or greater.<sup>16</sup> In August 2023, the nationwide prevalence of severe obesity in youth was around 7%.<sup>17</sup>



Beginning next year, this report will fully incorporate a separate severe obesity category for students with a BMI at or above 120% of the 95<sup>th</sup> percentile — using the CDC’s definition. This will allow for separate monitoring of severe obesity and uncover its prevalence among Arkansas youth. This section illustrates how the severe obesity category will be used going forward and applies it to some of our analyses using this year’s data. In future reports, categories will be defined as noted below.

**Severely Obese:** BMI-for-age-and-gender greater than or equal to 120% of the 95<sup>th</sup> percentile.

**Obese:** BMI-for-age-and-gender greater than or equal to 95<sup>th</sup> percentile and less than 120% of the 95<sup>th</sup> percentile.

**Overweight:** BMI-for-age-and-gender greater than or equal to the 85<sup>th</sup> and less than the 95<sup>th</sup> percentile.

**Healthy Weight:** BMI-for-age-and-gender greater than or equal to the 5<sup>th</sup> and less than the 85<sup>th</sup> percentile.

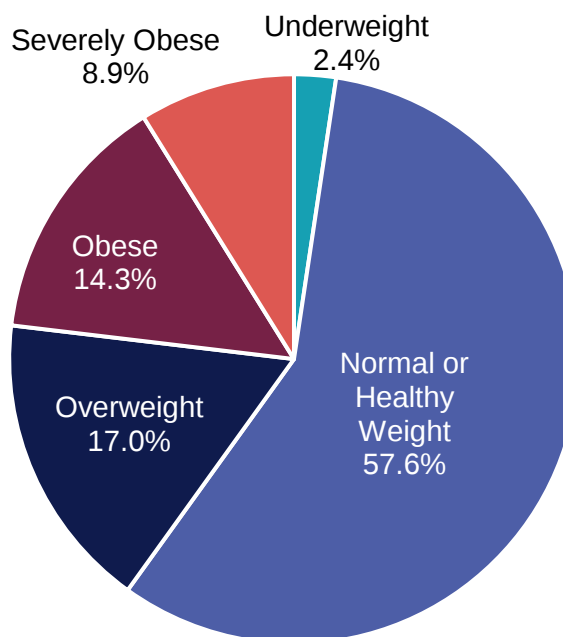
**Underweight:** BMI-for-age-and-gender less than the 5<sup>th</sup> percentile.

## BMI Classifications for All Students

Figure 13 is identical to Figure 3 except that the obesity classification is divided here to show those who meet the threshold for severe obesity.

In the 2023-2024 school year, 23.1% of Arkansas students had BMI measurements that were classified as obese or severely obese, and over a third of these students met the threshold for the severe obesity category. This equates to almost 9% of students measured being classified as severely obese, which is about two percentage points higher than for students nationwide.<sup>17</sup>

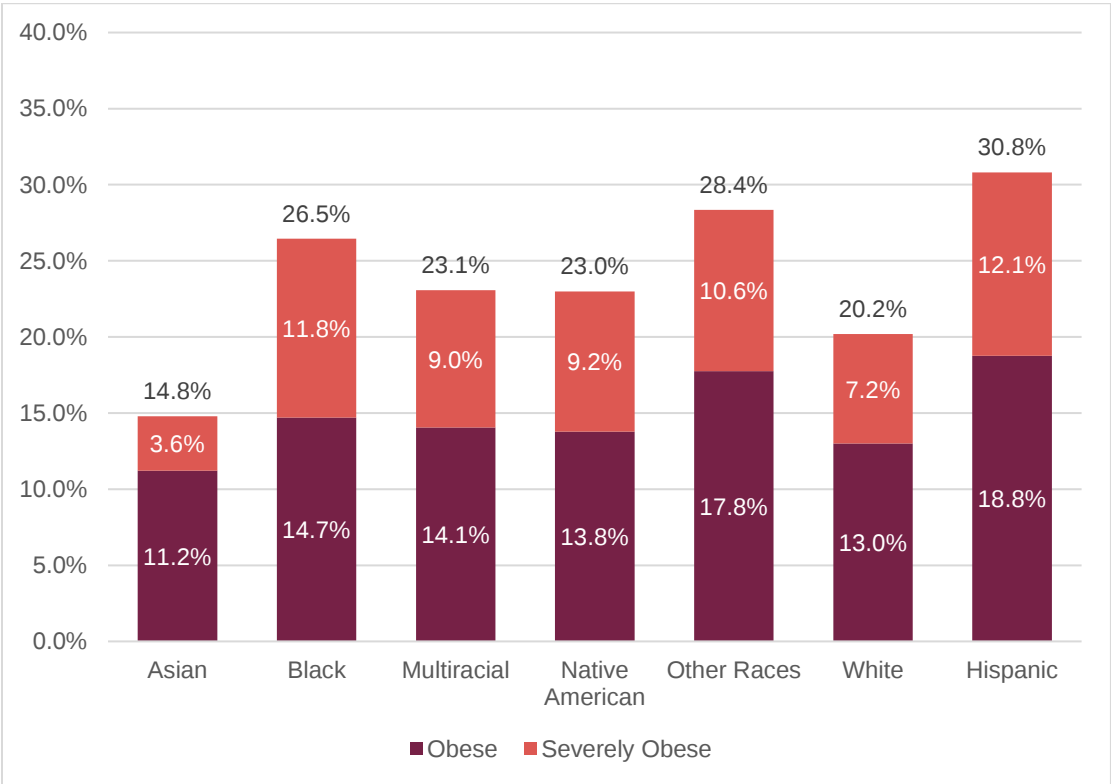
**FIGURE 13. STUDENT BMI CLASSIFICATION FOR ARKANSAS PUBLIC SCHOOL STUDENTS, ALL BMI CATEGORIES, SCHOOL YEAR 2023-2024**



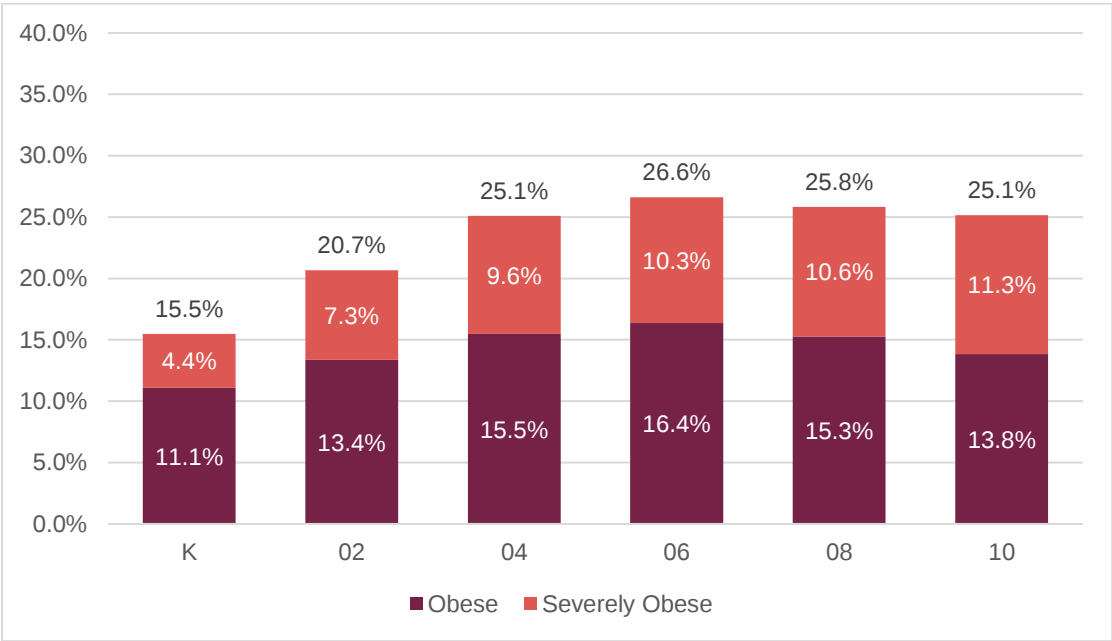
## BMI Classifications Across Demographics

Severe obesity was prevalent in differing levels across student demographics in the 2023-2024 school year. Like the gender-specific results for obesity shown in Figure 4, more boys than girls were classified as severely obese (9.7% and 8.0%, respectively; not shown). Across race and ethnicity, severe obesity had a similar prevalence to the combined categories of overweight and obesity shown in Figure 5. Hispanic students had the highest percentage of BMI measurements classified as severely obese and Asian students had the lowest (12.1% and 3.6%, respectively). Lastly, the percentage of students in the severe obesity category rose with each grade level, with 4.4% of kindergarteners and 11.3% of 10th graders in this category. Figures 14 and 15 show severe obesity levels by race/ethnicity and grade level, respectively.

**FIGURE 14. PERCENTAGE OF STUDENTS WITH BMI MEASUREMENTS CLASSIFIED AS OBESE OR SEVERELY OBESE BY RACE/ETHNICITY, SCHOOL YEAR 2023-2024**



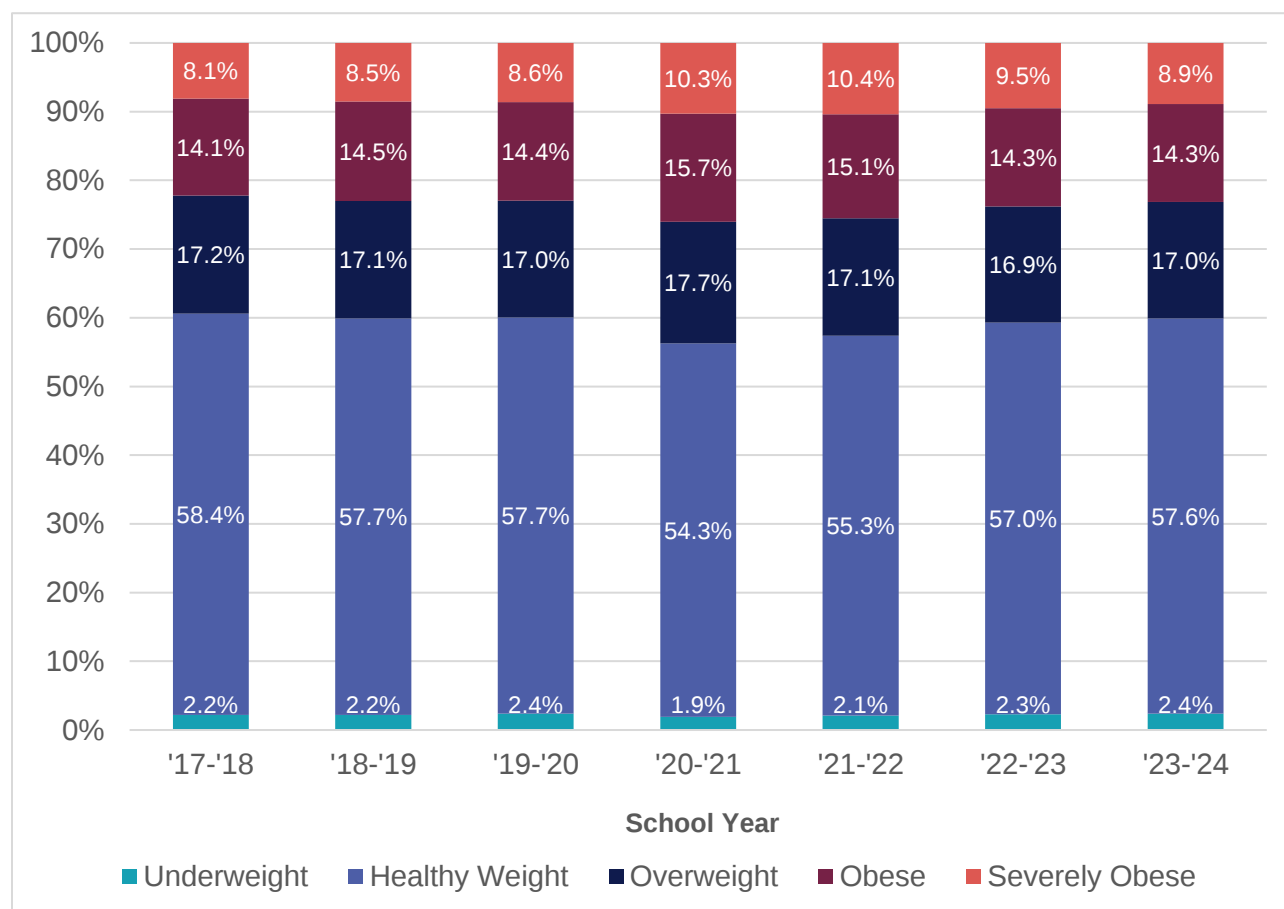
**FIGURE 15. PERCENTAGE OF STUDENTS WITH BMI MEASUREMENTS CLASSIFIED AS OBESE OR SEVERELY OBESE BY GRADE, SCHOOL YEAR 2023-2024**



## Trends In Severe Obesity

For the past seven school years, the prevalence of severe obesity in Arkansas students has followed a similar path to that of obesity. As expected, the proportion of children in the severe obese category is less than that of the obese category. However, more than 1 in 3 children who are obese are in this highest risk category. Severe obesity rose in prevalence during the peak of the pandemic and, although it has since dropped, this percentage remains higher than pre-pandemic levels. These findings are shown in Figure 16.

**FIGURE 16. TRENDS IN BMI CLASSIFICATIONS FOR ARKANSAS PUBLIC SCHOOL STUDENTS, 2017-2018 THROUGH 2023-2024 SCHOOL YEARS**



## Implications for State Policy

Arkansas must take collaborative and comprehensive action to address childhood obesity. Schools play a critical role in obesity prevention by offering opportunities for physical activity, nutritious meals, and health education. However, many Arkansas children face barriers to accessing healthy food and maintaining an active lifestyle. Increasing participation in federal nutrition programs, such as the Supplemental Nutrition Assistance Program (SNAP), the Special Supplemental Nutrition Program for Women, Infants, and Children (WIC), and the Community Eligibility Provision (CEP), can improve access to nutritious foods for children and families. Ensuring that school meal programs meet or exceed federal nutrition standards can further promote healthy eating habits among students. Promoting adherence to wellness policies — such as compliance with Smart Snacks standards and ensuring vending machines offer healthy options for students and staff — can also create a healthier school environment.

To improve physical activity levels, Arkansas should encourage innovative scheduling practices, such as recess before lunch, and implement policies requiring movement breaks, such as two minutes of physical activity for every hour of seated time. These strategies not only increase activity but also improve behavioral and academic outcomes. Schools should also invest in safe areas for physical activity, such as playgrounds and gymnasiums, while providing staff with professional development to support quality physical education programs. Arkansas should implement evidence-based, sequential physical education curricula in schools, ensuring students receive the education and skills necessary to adopt lifelong healthy behaviors.

Addressing mental health is another vital component of combating childhood obesity. Adverse childhood experiences (ACEs) and chronic stress have been linked to obesity-related behaviors and poor health outcomes. Professional development for educators on identifying and addressing ACEs, as well as integrating mental health initiatives into schools, can help mitigate these underlying factors and support healthier outcomes for students.

The American Academy of Pediatrics Clinical Practice Guideline for the Evaluation and Treatment of Children and Adolescents with Obesity highlights the importance of a child-focused, family-centered approach, emphasizing intensive health behavior and lifestyle treatment as foundational to effective care.<sup>18</sup> These recommendations can be leveraged to implement comprehensive strategies that reduce obesity-related health risks and improve overall well-being.



## Conclusion

A total of 40.1% of Arkansas public school students who had a BMI measurement in the 2023-2024 school year are classified as either overweight or obese, down from 40.7% in the 2022-2023 school year. BMI measurements in 2020-2021 indicated the highest percentages of grade-level obese classifications since student BMI measurement began in Arkansas. The proportion of students with a BMI measurement in the obese category remains higher than pre-pandemic levels for 2023-2024 school year measurements, which underscores the need for continued efforts to address child health and wellness.



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## Appendix: BMI Classification by County

In this table, if fewer than five students are included in a BMI category, that group is not reported. For example, if fewer than five students are in the underweight category at a school in a particular county, the corresponding table cell is left blank. Schools that are missing valid measurements for 20% or more of the students enrolled in participating grades are excluded from the table.

| County     | Underweight (%) | Healthy Weight (%) | Overweight (%) | Obese (%) | Overweight or Obese (%) |
|------------|-----------------|--------------------|----------------|-----------|-------------------------|
| ARKANSAS   | 1.8%            | 54.0%              | 19.7%          | 24.6%     | 44.2%                   |
| ASHLEY     | 1.4%            | 55.6%              | 15.7%          | 27.3%     | 43.1%                   |
| BAXTER     | 1.9%            | 60.5%              | 17.3%          | 20.2%     | 37.6%                   |
| BENTON     | 2.9%            | 61.2%              | 16.1%          | 19.8%     | 35.9%                   |
| BOONE      | 2.1%            | 59.4%              | 16.5%          | 22.1%     | 38.6%                   |
| BRADLEY    | 2.4%            | 49.3%              | 18.4%          | 29.9%     | 48.3%                   |
| CALHOUN    |                 | 47.5%              | 16.0%          | 34.3%     | 50.3%                   |
| CARROLL    | 1.9%            | 55.3%              | 18.1%          | 24.7%     | 42.9%                   |
| CHICOT     | 2.5%            | 49.6%              | 12.5%          | 35.5%     | 47.9%                   |
| CLARK      | 1.9%            | 57.8%              | 16.0%          | 24.3%     | 40.3%                   |
| CLAY       | 1.4%            | 54.6%              | 19.4%          | 24.6%     | 44.0%                   |
| CLEBURNE   | 2.1%            | 58.9%              | 18.7%          | 20.3%     | 39.0%                   |
| CLEVELAND  |                 | 53.8%              | 15.8%          | 29.5%     | 45.3%                   |
| COLUMBIA   | 2.9%            | 56.2%              | 16.3%          | 24.7%     | 41.0%                   |
| CONWAY     | 1.8%            | 56.0%              | 18.0%          | 24.2%     | 42.2%                   |
| CRAIGHEAD  | 2.7%            | 58.2%              | 16.8%          | 22.3%     | 39.2%                   |
| CRAWFORD   | 3.5%            | 58.8%              | 16.6%          | 21.1%     | 37.7%                   |
| CRITTENDEN | 2.4%            | 54.5%              | 16.4%          | 26.7%     | 43.1%                   |
| CROSS      | 2.3%            | 53.6%              | 17.1%          | 27.1%     | 44.1%                   |
| DALLAS     |                 | 52.2%              | 18.3%          | 28.1%     | 46.4%                   |
| DESHA      | 1.9%            | 52.0%              | 17.5%          | 28.6%     | 46.1%                   |
| DREW       | 2.0%            | 56.2%              | 17.2%          | 24.6%     | 41.8%                   |
| FAULKNER   | 2.1%            | 59.5%              | 16.8%          | 21.6%     | 38.4%                   |
| FRANKLIN   | 2.9%            | 57.7%              | 16.1%          | 23.3%     | 39.4%                   |
| FULTON     | 1.5%            | 62.3%              | 15.8%          | 20.4%     | 36.2%                   |
| GARLAND    | 2.9%            | 57.6%              | 17.8%          | 21.7%     | 39.5%                   |



| County       | Underweight (%) | Healthy Weight (%) | Overweight (%) | Obese (%) | Overweight or Obese (%) |
|--------------|-----------------|--------------------|----------------|-----------|-------------------------|
| GRANT        | 6.5%            | 58.5%              | 16.0%          | 19.0%     | 35.0%                   |
| GREENE       | 2.2%            | 58.1%              | 16.3%          | 23.4%     | 39.7%                   |
| HEMPSTEAD    | 1.4%            | 51.6%              | 18.4%          | 28.7%     | 47.0%                   |
| HOT SPRING   | 1.7%            | 53.7%              | 18.9%          | 25.7%     | 44.6%                   |
| HOWARD       | 2.0%            | 59.6%              | 16.3%          | 22.1%     | 38.4%                   |
| INDEPENDENCE | 3.4%            | 54.8%              | 17.7%          | 24.0%     | 41.7%                   |
| IZARD        | 2.7%            | 59.4%              | 16.7%          | 21.2%     | 37.9%                   |
| JACKSON      | 2.0%            | 54.5%              | 17.1%          | 26.4%     | 43.5%                   |
| JEFFERSON    | 2.1%            | 55.5%              | 17.5%          | 24.9%     | 42.4%                   |
| JOHNSON      | 2.0%            | 54.3%              | 17.1%          | 26.7%     | 43.7%                   |
| LAFAYETTE    |                 | 46.6%              | 14.2%          | 37.3%     | 51.5%                   |
| LAWRENCE     | 1.9%            | 56.0%              | 17.6%          | 24.5%     | 42.1%                   |
| LEE          |                 | 54.0%              | 19.8%          | 24.7%     | 44.5%                   |
| LINCOLN      | 2.7%            | 54.6%              | 18.0%          | 24.8%     | 42.8%                   |
| LITTLE RIVER | 1.4%            | 53.2%              | 18.0%          | 27.4%     | 45.4%                   |
| LOGAN        | 2.4%            | 58.6%              | 17.8%          | 21.3%     | 39.0%                   |
| LONOKE       | 1.9%            | 61.2%              | 16.0%          | 20.9%     | 36.9%                   |
| MADISON      | 2.0%            | 57.9%              | 17.1%          | 23.0%     | 40.1%                   |
| MARION       | 2.4%            | 57.7%              | 17.7%          | 22.2%     | 39.9%                   |
| MILLER       | 1.9%            | 56.0%              | 17.1%          | 25.0%     | 42.1%                   |
| MISSISSIPPI  | 2.6%            | 54.5%              | 16.9%          | 26.1%     | 43.0%                   |
| MONROE       |                 | 53.3%              | 19.3%          | 26.2%     | 45.5%                   |
| MONTGOMERY   | 2.8%            | 57.5%              | 17.0%          | 22.8%     | 39.8%                   |
| NEVADA       | 1.0%            | 55.4%              | 17.9%          | 25.6%     | 43.6%                   |
| NEWTON       | 3.6%            | 57.6%              | 17.2%          | 21.7%     | 38.8%                   |
| OUACHITA     | 2.6%            | 52.5%              | 18.2%          | 26.7%     | 44.9%                   |
| PERRY        | 1.8%            | 56.2%              | 16.5%          | 25.5%     | 42.0%                   |
| PHILLIPS     | 1.6%            | 53.3%              | 16.0%          | 29.1%     | 45.1%                   |
| PIKE         |                 | 55.1%              | 18.9%          | 25.3%     | 44.1%                   |
| POINSETT     | 2.6%            | 53.6%              | 16.1%          | 27.7%     | 43.8%                   |
| POLK         | 2.0%            | 60.7%              | 16.5%          | 20.8%     | 37.3%                   |
| POPE         | 2.3%            | 58.8%              | 16.9%          | 22.1%     | 38.9%                   |
| PRAIRIE      | 1.7%            | 54.6%              | 17.6%          | 26.1%     | 43.7%                   |



| County        | Underweight (%) | Healthy Weight (%) | Overweight (%) | Obese (%) | Overweight or Obese (%) |
|---------------|-----------------|--------------------|----------------|-----------|-------------------------|
| PULASKI       | 2.8%            | 58.3%              | 16.6%          | 22.3%     | 38.9%                   |
| RANDOLPH      | 1.9%            | 54.4%              | 18.4%          | 25.4%     | 43.8%                   |
| SAINT FRANCIS | 2.2%            | 48.8%              | 21.2%          | 27.7%     | 49.0%                   |
| SALINE        | 2.1%            | 59.2%              | 16.8%          | 21.9%     | 38.7%                   |
| SCOTT         | 2.3%            | 57.3%              | 15.5%          | 24.8%     | 40.3%                   |
| SEARCY        |                 | 55.3%              | 17.6%          | 25.6%     | 43.2%                   |
| SEBASTIAN     | 2.0%            | 57.4%              | 17.3%          | 23.2%     | 40.6%                   |
| SEVIER        | 2.1%            | 51.0%              | 17.5%          | 29.4%     | 46.9%                   |
| SHARP         | 1.5%            | 54.8%              | 18.7%          | 25.0%     | 43.7%                   |
| STONE         | 4.4%            | 63.2%              | 12.8%          | 19.6%     | 32.4%                   |
| UNION         | 1.9%            | 55.3%              | 18.3%          | 24.6%     | 42.8%                   |
| VAN BUREN     | 2.5%            | 58.2%              | 15.9%          | 23.5%     | 39.4%                   |
| WASHINGTON    | 2.1%            | 58.3%              | 16.9%          | 22.7%     | 39.6%                   |
| WHITE         | 3.2%            | 57.1%              | 17.7%          | 21.9%     | 39.7%                   |
| WOODRUFF      | 4.2%            | 52.3%              | 16.8%          | 26.8%     | 43.6%                   |
| YELL          | 1.8%            | 52.4%              | 18.9%          | 26.9%     | 45.8%                   |

